Baseline Water Quality Data

Inventory and Analysis

Chickasaw National Recreation Area

Water Resources Division and Servicewide Inventory and Monitoring Program

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National Park Service - Department of the Interior
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BASELINE WATER QUALITY DATA

INVENTORY AND ANALYSIS

CHICKASAW NATIONAL RECREATION AREA

National Park Service
Water Resources Division
Fort Collins, CO 80525

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EXECUTIVE SUMMARY

This document presents the results of surface-water-quality data retrievals for Chickasaw National Recreation Area (CHIC) from six of the United States Environmental Protection Agency's (EPA) national databases: (1) Storage and Retrieval (STORET) water quality database management system; (2) River Reach File (RF3); (3) Industrial Facilities Discharge (IFD); (4) Drinking Water Supplies (DRINKS); (5) Water Gages (GAGES); and (6) Water Impoundments (DAMS). This document is one product resulting from a cooperative contractual endeavor between the National Park Service's (NPS) Servicewide Inventory and Monitoring Program, the National Park Service's Water Resources Division (WRD), and Horizon Systems Corporation to retrieve, format, and analyze surface water quality data for all units of the National Park System containing significant water resources. The primary goal of the project is to provide descriptive water quality information in a manner and format that is both consistent with the goals of the Servicewide Inventory and Monitoring Program and useable by park resource managers. The document provides: (1) a complete inventory of all retrieved water quality parameter data, water quality stations, and the entities responsible for the data collection; (2) descriptive statistics and appropriate graphical plots of water quality data characterizing period of record, annual, and seasonal central tendencies and trends; (3) a comparison of the park's water quality data to relevant EPA and WRD water quality screening criteria; and (4) an Inventory Data Evaluation and Analysis (IDEA) to determine what Servicewide Inventory and Monitoring Program "Level I" water quality parameters have been measured within the study area. Accompanying the report are disks containing digital copies of all data used in the report, as well as all components of the report (tables, figures, etc.).

The results of the retrievals for the study area from the IFD, DRINKS, GAGES, and DAMS databases located two industrial/municipal dischargers; eight drinking water intakes; eight active or inactive U. S. Geological Survey (USGS) or U. S. Army Corps of Engineers water gages (including stream, spring, and well); and 25 water impoundments. The results of the STORET retrieval for the study area yielded 30,222 observations for 181 separate parameters collected by the NPS, USGS, and EPA at 156 monitoring stations from 1951 through 1995. Of the 30,222 observations, approximately 86 percent were reported by the NPS from 1967 through 1994. Of the 156 monitoring stations, 117 stations were located within the park boundary (see Station Period of Record Tabulation). One station within the park boundary was established but contained no data appropriate for statistical analysis.

Most of the monitoring stations represent either one-time or intensive single-year sampling efforts by the collecting agencies. Twenty-eight stations within the study area (20 within the park boundary) yielded longer-term records consisting of multiple observations for several important water quality parameters (see Station Period of Record Tabulation). The stations yielding the longest-term records within the park boundary are: (1) Rock Creek at Sulphur, Oklahoma (CHIC 0066); (2) Antelope Spring (CHIC 0128); (3) Travertine Creek at Sycamore Crossing (CHIC 0108); (4) Guy Sandy Creek near Lake of the Arbuckles (CHIC 0056); (5) Buffalo Spring - the Source of Travertine Creek (CHIC 0088); (6) Travertine Creek at Lincoln Bridge (CHIC 0109); (7) Rock Creek near Lincoln Bridge (CHIC 0103); (8) Rock Creek near Black Sulphur Spring pump house (CHIC 0114); and (9) Rock Creek above Highway 7 Bridge (CHIC 0144). The stations yielding the longest-term records within the study area, but outside of the park boundary, are: (1) Buckhorn Creek 0.9 miles below Lowrance Springs (CHIC 0039); (2) Buckhorn Creek just below Catfish Farm (CHIC 0030); (3) Buckhorn Creek 0.9 miles below Catfish Farm (CHIC 0017); (4) Buckhorn Creek 3.3 miles below Catfish Farm (CHIC 0006); (5) Buckhorn Creek at Lowrance Springs (CHIC 0048): (6) Guy Sandy Creek at Highway 7 Bridge (CHIC 0146); and (7) Rock Creek at bridge near campground (CHIC 0080)[†].

Screening criteria consisting of published EPA water-quality criteria and instantaneous concentration values selected by the WRD were used to identify potential water quality problems within the study area. While the criteria represent important threshold concentrations of pollutants, it is important to remember that criteria may have been exceeded due to any number of natural or anthropogenic factors, including errors in field, laboratory,

[†]Water quality station location descriptions are verbatim from STORET. Any misspellings and abbreviations in STORET are replicated in this document.

and/or recording procedures. The reader is advised to read the Introduction for additional caveats in interpreting the exceeded criteria in this report. The results of the CHIC water quality criteria screen found 18 groups of parameters that exceeded screening criteria at least once within the study area. Dissolved oxygen, pH, chloride, cadmium, chromium, copper, selenium, silver, and zinc exceeded their respective EPA criteria for the protection of freshwater aquatic life. Chloride, fluoride, sulfate, antimony, copper, lead, thallium, and methylene chloride exceeded their respective EPA drinking water criteria. Fecal-indicator bacteria concentrations (total coliform and fecal coliform) and turbidity exceeded the WRD screening limits for freshwater bathing and aquatic life, respectively.

Dissolved oxygen concentrations were measured 1,607 times at 69 monitoring stations from 1967 through 1995. Of the 1,585 observations used in the criteria analysis (see Composite Type Screen in the Methodology and EPA Water Quality Criteria Analysis for Station in the Interpretive Guide To Water Quality Results for explanation), 242 observations at 24 stations were less than or equal to the 4 milligrams per liter (mg/L) EPA criterion for the protection of aquatic life from 1974 through 1994. Approximately 65 percent of the observations exceeding the criterion were reported within the park boundary near Travertine Creek, at Buffalo Spring (CHIC 0088) and Antelope Spring (CHIC 0128), from 1987 through 1994.

The pH was measured 1,984 times at 98 monitoring stations from 1951 through 1995. Of the 1,969 observations used in the criteria analysis (see Composite Type Screen in the Methodology for explanation), 20 observations at 19 stations were outside the pH range of 6.5 to 9.0 standard units (SU) (EPA chronic criteria for freshwater aquatic life) from 1976 through 1995. Eighteen observations were greater than or equal to pH 9.0 and two observations were less than pH 6.5. The highest pH of 10.1 SU was reported in Rock Creek at Sulphur Campgrounds (CHIC 0075) in December 1976. The lowest pH of 2.5 SU was reported in Buckhorn Creek, 0.9 miles below a Catfish farm (CHIC 0017) in December 1992. Fourteen of the 20 observations exceeding the criteria were collected at 13 stations in the northeastern corner of the park.

Turbidity was measured 1,232 times at 16 monitoring stations from 1987 through 1994. One observation of 51.7 Nephelometric Turbidity Units in Guy Sandy Creek near Lake of the Arbuckles (CHIC 0056) exceeded the WRD screening criterion of 50 Jackson Candle/Formazin/Nephelometric Turbidity Units in January 1988.

Total coliform concentrations were measured 499 times at 54 monitoring stations from 1967 through 1976. Of the 495 observations used in the criteria analysis (see Remark Code Screen in the Methodology for explanation), 134 observations at 38 stations equaled or exceeded the WRD bathing water screening criterion of 1,000 Colony Forming Units/Most Probable Number per 100 milliliter (CFU/MPN/100 ml) from 1967 through 1976. Approximately 69 percent of the observations exceeding the criterion were reported from 30 stations in the northeastern corner of the park, including the highest value of 1,930,000 CFU/100 ml in Rock Creek at Sandy Beach (CHIC 0133) in December 1976. Fecal coliform concentrations were measured 526 times at 31 stations from 1967 through 1977. One-hundred-thirty-five observations at 22 stations equaled or exceeded the WRD bathing water screening criterion of 200 CFU/MPN/100 ml from 1969 through 1977. Approximately 79 percent of the observations exceeding the criterion were reported from 15 stations in the northeastern corner of the park, including the highest value of 500,000 CFU/100 ml in Travertine Creek below the swimming area (CHIC 0083) in July 1977.

Total chloride concentrations were measured 212 times at 66 monitoring stations from 1951 through 1995. Of the 197 observations used in the criteria analysis (see Composite Type Screen in the Methodology for explanation), 53 observations at 17 stations exceeded the secondary drinking water criterion of 250 mg/L from 1951 through 1993. Five of these 53 observations also exceeded the acute freshwater criterion of 860 mg/L. The highest concentration of 2,300 mg/L was reported in Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0035) in May 1969.

Dissolved fluoride concentrations were measured 30 times at six monitoring stations (CHIC 0005, CHIC 0031, CHIC 0034, CHIC 0035, CHIC 0047, CHIC 0066) from 1969 through 1995. One concentration of 6.8 mg/L in Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0034) exceeded the drinking water criterion of 4.0 mg/L in May 1969.

Total sulfate concentrations were measured 1,392 times at 43 monitoring stations from 1960 through 1995. Of the 1,377 observations used in the criteria analysis (see Composite Type Screen in the Methodology for explanation), two concentrations, 1,210 mg/L and 1,120 mg/L in Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0035 and CHIC 0034, respectively), exceeded the secondary drinking water criterion of 250 mg/L in May 1969.

Total antimony concentrations were measured 12 times at 12 springs in the northeastern corner of the park in October 1993. Two concentrations, 29 micrograms per liter (µg/L) at Pavilion Spring - Outlet E (CHIC 0097) and 25 µg/L at Antelope Spring (CHIC 0128), exceeded the drinking water criterion of 6 µg/L.

Cadmium concentrations (including dissolved and total) were measured 51 times at 27 monitoring stations from 1977 through 1995. Of the 37 observations used in the criteria analysis (see EPA Water Quality Criteria Analysis for Station in the Interpretive Guide To Water Quality Results for explanation), two total concentrations of 4.0 µg/L reported within the park boundary, at Hillside Spring (CHIC 0087) and Pavilion Spring - Outlet E (CHIC 0097), exceeded the acute freshwater criterion of 3.9 µg/L in October 1993.

Chromium concentrations (including dissolved, hexavalent, and total) were measured 53 times at 29 monitoring stations from 1969 through 1995. One hexavalent concentration of 20 µg/L in Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0035) exceeded the acute freshwater criterion of 16 µg/L in May 1969.

Copper concentrations (including dissolved and total) were measured 115 times at 33 monitoring stations from 1969 through 1995. Sixty-five observations at seven stations, in Lake of the Arbuckles (CHIC 0011, CHIC 0033, CHIC 0040, CHIC 0041), Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0034, CHIC 0035), and Red Flag Spring (CHIC 0065), exceeded the acute freshwater criterion of 18 µg/L from 1969 through 1993. Fifty-seven of these 65 concentrations also exceeded the drinking water criterion of 1,300 µg/L. Approximately 98 percent of the observations exceeding the criteria were reported from four stations in Lake of the Arbuckles (CHIC 0011, CHIC 0033, CHIC 0040, CHIC 0041) during 1977, including the highest concentration of 16,700 µg/L in the Buckhorn Creek Branch (CHIC 0011) in August 1977.

Lead concentrations (including dissolved and total) were measured 53 times at 29 monitoring stations from 1969 through 1995. Six observations at six stations, in an intermittent tributary to Buckhorn Creek (CHIC 0005), Lowrance Springs (CHIC 0047), Red Flag Spring (CHIC 0065), Travertine Creek at Lincoln Bridge (CHIC 0116), Antelope Spring (CHIC 0128), and Rock Creek at the Highway 177 Bridge (CHIC 0149), exceeded the drinking water criterion of 15 µg/L during 1977 and 1993. The highest concentration of 40 µg/L was reported at Lowrance Springs (CHIC 0047) in October 1977.

Total selenium concentrations were measured 35 times at 13 monitoring stations from 1990 through 1995. Two concentrations reported within the park boundary, 40 µg/L at Antelope Spring (CHIC 0128) and 28 µg/L at Pavilion Spring - Outlet D (CHIC 0096), exceeded the acute freshwater criterion of 20 µg/L in October 1993.

Silver concentrations (including dissolved and total) were measured 14 times at 13 monitoring stations during 1993 and 1994. Four observations, ranging from 7.3 µg/L to 8.9 µg/L, at four stations within the park boundary, Red Flag Spring (CHIC 0065), Hillside Spring (CHIC 0087), Pavilion Spring - Outlet E (CHIC 0097), and Antelope Spring (CHIC 0128), exceeded the acute freshwater criterion of 4.1 µg/L in October 1993. The highest concentration of 8.9 µg/L was reported at Hillside Spring (CHIC 0087).

Total thallium concentrations were measured 12 times at 12 springs in the northeastern corner of the park in October 1993. Two concentrations of 17 µg/L at Pavilion Spring - Outlets A and E (CHIC 0091 and CHIC 0097, respectively) exceeded the drinking water criterion of 2.0 µg/L.

Zinc concentrations (including dissolved and total) were measured 98 times at 29 monitoring stations from 1969 through 1995. Three observations, ranging from 160 µg/L to 1,200 µg/L, in an intermittent tributary to Buckhorn Creek (CHIC 0005), Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0035), and Lowrance Springs (CHIC 0047), exceeded the acute freshwater criterion of 120 µg/L during 1969 and 1977. The highest

concentration of 1,200 µg/L was reported in Rock Creek at the Oklahoma Gas and Electric Plant (CHIC 0035) in May 1969.

Methylene chloride concentrations were measured 11 times at 11 springs in the northeastern corner of the park in October 1993. All eleven observations exceeded the drinking water criterion of 5.0 µg/L. The highest concentration of 2,320 µg/L was reported at Sulphur Bromide Spring (CHIC 0061).

The IDEA conducted for CHIC indicates that STORET data exist for all 13 Level I parameter groups in the study area. For ten groups, at least 67 percent of the observations were recorded since 1985. For the group Bacteria, no observations were recorded since 1977. Data for ten groups were recorded at less than half of the 156 monitoring stations. For the group Chlorophyll, only 12 observations were recorded at five stations. Relative to other parameter groups, data were limited for the groups Flow, Chlorophyll and Toxic Elements. Results for 14 of the 126 EPA priority toxic pollutants (consisting of organic parameters and metals) were retrieved from STORET. Of the 156 monitoring stations, approximately 62 percent were located in an area comprising the northeastern corner of CHIC and Rock Creek, north of the park.

Surface water resources in the CHIC study area include Washita River; Lake of the Arbuckles, Veterans Lake, and many other smaller reservoirs; Rock, Travertine, Buckhorn, Guy Sandy, and numerous other creeks; Antelope, Buffalo, Lowrance, Pavilion, Red Flag, Sulfur Bromide, and other freshwater and mineral springs; and many small ponds. CHIC was established in 1976 by combining Platt National Park and Arbuckle Recreational Area. Platt National Park had been established in 1906 to preserve freshwater and mineral springs in the area. These springs are primary attractions for many park visitors today. The data inventories and analyses contained in this report indicate that surface waters within the study area have been impacted by human activities. Potential anthropogenic sources of contaminants include municipal and industrial wastewater discharges; stormwater runoff; agricultural, livestock, and fish hatchery operations; oil and gas development; residential development; quarrying operations; recreational use; and atmospheric deposition.

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INTRODUCTION

The National Park Service's (NPS) Organic Act of 1916 states that the mission of the NPS is to promote and regulate the use of national parks, monuments, and other units "... to conserve the scenery and the natural and historic objects and wildlife therein and to provide for the enjoyment of the same in such a manner and by such means as will leave them unimpaired for the enjoyment of future generations." One task embodied by this mission is preserving and protecting water resources and water dependent environments in parks. Ensuring the integrity of park water quality, due to its importance in sustaining natural, aquatic park ecosystems and supporting human consumptive and recreational use, is fundamental to successfully addressing this task. The first step in ensuring the integrity of park water quality is defining historic and extant water quality.

This document represents one product of an ongoing effort by the NPS Water Resources Division (WRD) and the Servicewide Inventory and Monitoring Program to characterize baseline water quality using existing data at park units containing significant natural resources. This effort was initiated in 1993 by the award of a contract to Horizon Systems Corporation to retrieve, format, and analyze surface water quality data from the Environmental Protection Agency's (EPA) Storage and Retrieval (STORET) database system. The scope of work identified in the Request For Proposals outlined several sequential, interrelated project phases, including, but not limited to: (1) determining the water quality retrieval/query area around each park; (2) downloading and assessing the quality of the data from STORET; (3) generating basic water quality summary statistics and graphic plots; (4) reformatting water quality data for compatibility with the park-based Water Quality Data Management System presently under-development; and (5) providing recommendations concerning possible hardware, software, and personnel options for storing combined park databases in a centralized NPS water quality database. This report documents the results of phases one through four of this effort for this park unit.

Goal

The goal of this document is to provide descriptive water quality information in a format usable for park planning purposes (eg. Water Resources Management Plans, Resource Management Plans, and General Management Plans). The report is designed to characterize baseline water quality rather than assess specific water quality problems at a park. This is consistent with the Servicewide Inventory and Monitoring Program's goal of obtaining basic, "Level I", water quality parameters for key waterbodies at each park (National Park Service 1993). Consequently, this report is best used as a reference document to help design new goal-driven water quality monitoring programs rather than as conclusive evidence of previous or existing water quality problems.

Purpose

The purpose of this report is to inventory existing park water quality data; establish baseline water quality at the park; identify potential water quality problems; and establish a park water quality database. This report is intended to enable park resource managers to compare and contrast water quality data collected as part of ongoing inventory and monitoring programs with historical water quality trends. Additionally, this report is intended to foster better designed park-based water quality inventory and monitoring programs in the future. The water quality databases which accompany this report will also lay the groundwork for establishing a NPS water quality database that will allow Regions and Washington Offices to generate regional and national assessments of park water quality.

Objectives

Specific objectives of the study documented in this report are to:

1. Retrieve water quality and related data from the EPA's STORET and other database systems;

2. Develop a complete inventory of all retrieved data;

3. Produce descriptive statistics and appropriate time series and box-and-whiskers plots of water quality data to characterize period of record, annual, and seasonal central tendencies and trends;

4. Compare water quality data with relevant national EPA water quality criteria on a station-by-station and study area basis;

5. Determine the presence and/or absence of the Servicewide Inventory and Monitoring Program's "Level I" water quality parameters within the study area; and

6. Reformat water quality and other related data for use in the park-based Water Quality Data Management System, presently under-development, and other appropriate analytical tools.

Document Overview

This report is comprised of five chapters. The first chapter, this Introduction, provides a brief statement of the study's background; goal, purpose, and objectives; and the key personnel who helped produce the document. This chapter also contains this brief overview of the document's contents and important interpretive caveats to consider when referring to and using this document. The second chapter focuses on the methods, procedures, and databases that were employed to retrieve and analyze water quality data for the park. The third chapter is the user's interpretive guide to chapter four. Chapter three explains how to interpret all the tables and figures presented in chapter four. Chapter four, which likely comprises the majority of the document (unless there isn't much water quality data for the park), contains detailed inventories, descriptive statistics, graphics, and national EPA water quality criteria comparisons characterizing the park unit's water quality data on a station-by-station basis and over the entire study area. This chapter also contains a comparison of park water quality data with the Servicewide Inventory and Monitoring Program's "Level I" water quality inventory parameters and a listing of water quality observations that were outside the STORET edit criteria range. Chapter five, the Appendices, contains more specialized materials such as the file names and database structures included on floppy disk(s) with this report; STORET edit criteria; national EPA water quality criteria; Servicewide Inventory and Monitoring Program's "Level I" water quality inventory parameters; selected water quality references; and other materials which provide background on the methods, procedures, and databases used or produced by this study.

The water quality and other related data referenced in this report accompany the document on floppy disk. The water quality parameter data file is in DBASE III+[1] format and will be useable in the park-based Water Quality Data Management System presently under-development. The water quality stations, industrial facilities discharges, drinking water intakes, water gages, water impoundments, and River Reach databases are also in DBASE III+ and/or ASCII format for ready-use in Geographic Information Systems (GIS), Computer-Aided Design Systems, or Desktop Mapping Systems.

Caveats

While intended primarily as a reference document, it is important that users peruse the first three chapters and Appendices of this report to better understand and interpret the results presented in chapter four. As a means for identifying potential areas for more intensive study, comparisons of the park's water quality data with relevant national EPA water quality criteria for appropriate designated uses[2] and with the Servicewide Inventory and

[1]The use and/or mention of specific proprietary hardware or software packages is for informational purposes only and is not intended to connote or denote an endorsement.

[2]The Environmental Protection Agency's Quality Criteria for Water 1995 Final Draft (Silver Book) was the primary source of water quality criteria. In the spirit of the other caveats offered in this section, it is important to recognize that water quality criteria are often revised when new or better information become available.

Monitoring Program's "Level I" water quality inventory parameters have been made. Extreme caution must be exercised in interpreting the results of these comparisons. Observations that exceed water quality criteria may have occurred due to any number of natural or anthropogenic factors, as well as other reasons. For example, STORET is a "user-beware" water quality database system. While there is some rudimentary edit (bounds) checking of any data entered in STORET (See Appendix C), users are basically free to enter their own data. Beyond data entry errors, the possibility of inaccurate data entering the system due to inappropriate measurement techniques, sample mistreatment, and other reasons is a serious concern. Consequently, if observations for a particular parameter frequently exceed the EPA water quality criterion over a prolonged time period, the best approach is to examine in detail the data exceeding the criterion. Questions which should be asked regarding the data include: What water source(s) are manifesting the problem? Does the data make sense? Was it collected by a reputable organization following a sound study plan and employing accepted techniques? If the answers to these questions still cause concern, a specific cause and effect water quality investigation focusing on the parameters of concern may be warranted. Similarly, the absence of particular Servicewide Inventory and Monitoring Program "Level I" water quality parameters from the park only means that no entity or organization has collected and entered this data into the EPA's STORET database. Too frequently, data that are collected in and around NPS units never make it into the EPA's national water quality database. These data may exist in published or unpublished reports, file cabinets, or other databases. Before definitively concluding that no baseline data exist for a particular parameter, these alternative resting grounds for data should be investigated. Such a detailed exploration, however, was beyond the scope of this study.

Key Personnel

Many individuals contributed to the design and implementation of this project. The primary contributors and their roles in the project are briefly mentioned below.

National Park Service, Water Resources Division:

Dean Tucker was the Contracting Officer's Technical Representative responsible for designing, coordinating, and implementing all aspects of this effort.

Mike Matz coordinated and managed the team which prepared all components of the report.

Gary Rosenlieb provided administrative oversight and was involved in quality control for all tasks related to this project.

Barry Long and Roy Irwin reviewed technical tasks and provided water quality expertise related to data analysis.

Gary Smillie provided hydrologic expertise in the determination of hydrologic seasons.

Donnie Dustin and Greg Harp helped prepare reports and write the Executive Summaries.

Elizabeth Eisenhauer, Brad Van Deusen, Brian Verbeck, Robert Flynn, and Dawn Grandbois provided digital cartographic support, both in determining retrieval/query areas and producing maps and graphics.

Kelli O'Connor, Mary Beth Talty, Todd Widegren, Curtis Cooper, Paul McElvery, J. Chris Echohawk, Kristie Maczko, Jim McQuarrie, and Adam Henson uploaded water quality data to STORET prior to report preparation.

Jacquie Nolan designed the cover.

Horizon Systems:

Cindy McKay served as Project Manager for Horizon Systems, performed the initial requirements analysis, and was involved in all quality control tasks related to the project.

Alan Cahoon was responsible for automating the procedures which produced the water quality databases and Water Quality Results chapter.

Sue Hanson, P.E., provided technical advice for writing this document.

Dr. Jim Loftis was the data quality analyst for the project.

Armando F. Ballofet, P.E., served as the local technical liaison between Horizon Systems and the NPS.

Other National Park Service:

Several other individuals provided invaluable technical review, comments, administrative support, and/or other assistance, including: Dan Kimball, Bill Jackson, Mark Flora, Gary Williams, John Karish, Brendhan Zubricki, Richard Hammerschlag, Randy Ferrin, Gary Vequist, Mike Martin, Kevin Berghoff, and Dyra Monroe.

METHODOLOGY

This section provides an overview of the procedures and criteria used to retrieve and analyze water quality data for each park unit. Generating baseline water quality data inventories and analyses for all NPS units is a monumental task. To accomplish this undertaking given a very limited budget, the procedures employed to produce each report had to be as generic and automated as possible. Consequently, customization of reports to individual park needs and issues was not feasible. Moreover, such customization was beyond the scope of this effort which was simply intended to produce baseline water quality data inventories for all parks rather than customized issue-driven reports. During the procedure-development stages of the project, specifications for the final product evolved, within the context of the aforementioned resource constraints, to focus on comprehensive water quality baseline data inventories and concise, descriptive statistical examinations of the available water quality data for each park unit. Detailed below are the data sources and final methods and procedures that were used to create the baseline water quality inventories, analyses, databases, and other products for each park unit. A thorough understanding of the limitations of the data sources and procedures described in this chapter and the next (Interpretive Guide to Water Quality Results) is a prerequisite to intelligent use of the results presented in this document.

Delineation of Park Study Area

The first step in retrieving water resources-related data for each park was deciding on a procedure to determine the study area boundary. Since water flows through parks, utilizing the park boundary as a simple query/study area was deemed inadequate. On the other end of the continuum, using the entire watershed as the study area was considered superfluous given: (1) the areal extent of certain park watersheds (eg. the entire Mississippi River); (2) the sheer volume of potentially irrelevant data such a large study area could generate; and (3) the resources required to specify the watershed for each park unit. The approach which was ultimately adopted - a modified hydrologic boundary - reflects a compromise between the park boundary and the entire watershed. Thus the study area employed for each park is an area extending at least three miles upstream and one mile downstream from the park boundary. Although these distances are somewhat arbitrary, this approach is easy to automate and was felt to limit the data retrieved, in most instances, to that of most importance to the park. Extending the query area one mile downstream of the park was intended to capture any data immediately downstream of the park which may reflect the quality of the water in the park. A current (as possible) copy of each park's boundary was obtained in digital format directly from the park or digitized from Regional land status maps, U.S. Geological Survey (USGS) quadrangles, or other sources. Using GIS techniques, the boundary was used to create the three miles upstream, one mile downstream buffer. For a few parks with which WRD water quality specialists were very familiar with potential water quality threats and/or valuable sources of data that may lie just outside the study area, the study area may have been tweaked (enlarged) to cover these areas of concern or interest. Unfortunately, a customized study area was not feasible for all park units. Hence, the three miles upstream, one mile downstream buffer was the primary study area employed for most parks. This study area was transferred to the EPA mainframe computer and used as the basis for all water resources-related data retrievals from the data sources described below.

Data Sources

The EPA maintains many mainframe data systems related to national water resources (U.S. Environmental Protection Agency 1992). Six of these data systems were used for this project:

- STOrage and RETrieval System (STORET) - water quality parameter data, locations of sampling stations, descriptive elements about stations and parameters;
- Industrial Facilities Discharge (IFD) - locations of industrial and municipal point source discharge facilities;

- Drinking Water Supplies (DRINKS) - locations of intake pipes for drinking water supplies;
- Water Gages (GAGES) - locations of USGS and other water gages;
- Water Impoundments (DAMS) - locations of most large water impoundments (greater than 10,000 acre feet at normal pool volume) and many smaller impoundments; and
- River Reach File, Version 3 (RF3) - 1:100,000 scale geographical representation of surface waters (rivers, lakes, etc.) with a unique identifier assigned to each surface water segment and connectivity information useful for routing and navigation.

STORET is the national water quality data repository (U.S. Environmental Protection Agency 1989). Water quality data is entered in STORET by public agencies (federal, state, or local) that collect water samples and/or perform laboratory analysis. As such, STORET is a "user-beware" data system. Although the EPA manages the STORET data system and, since November 1983, has imposed some minimum quality control criteria on the data (See Appendix C), data are generated and input to STORET by the "owner" agencies. Consequently, the EPA does not certify any data within STORET. Currently, there are over 800,000 active and inactive sampling stations and more than 225 million observations covering in excess of 13,000 water quality parameters entered in STORET. The earliest data dates back to the turn of the century. Using the bi-monthly update cycle, user agencies may store results of recent monitoring activities in STORET. Included in STORET is USGS WATSTORE water quality data, which is updated on a monthly basis. Although STORET contains a phenomenal amount of data, it is important to note that data exist in STORET only if the collectors decide to upload their data to the system. Since many agencies and researchers do not upload their data to STORET, the absence of water quality data in the system for a particular area doesn't mean that there has never been any water quality data collected for the area. The data may exist in published or unpublished reports, file cabinets, or in agency-specific databases. Identifying and retrieving these other sources of data were beyond the scope of the present effort. All parameter data and water quality station location data downloaded from STORET within the park's study area are included in DBASE III+ format files on disk(s) accompanying this report (See Appendices A and B).

The data within the IFD database are extracted from the EPA's Permit Compliance System (PCS). IFD contains the facility locations of all industrial and municipal dischargers which require a National Pollutant Discharge Elimination System (NPDES) permit to operate. Over 7,100 municipal, federal, and industrial facilities discharging into the waters of the United States are tracked by PCS and IFD. If any industrial facilities discharges exist within the study area, a file in DBASE III+ format documenting a variety of information about each discharge accompanies this report on disk (See Appendices A and B).

The EPA DRINKS database identifies locations of drinking water supply intakes. This file contains data for 850 supplies which serve more than 25,000 people, and 6,800 supplies which serve between 1,000 and 25,000 people. If any drinking water intakes exist within the study area, a file in DBASE III+ format documenting a variety of information about each intake accompanies this report on disk (See Appendices A and B).

The GAGES data originates primarily with the USGS and copies are maintained on the EPA mainframe computer for ease of integration with other EPA national data systems. Although other agency's water gages, as well as some artificial gages, may appear in GAGES, the vast majority of gages are stream gages belonging to the USGS. The GAGES database contains approximately 36,000 records for both active and inactive gaging stations. If any USGS or other agency stream gages occur within the study area, a file in DBASE III+ format documenting several fields of information about each gage accompanies this report on disk (See Appendices A and B).

The Water Impoundment database was originally compiled by the U.S. Army Corps of Engineers in response to a Congressional inquiry on dam safety hazards (GKY and Associates 1990). The EPA subsequently modified the database for use in water quality investigations. Of the 68,155 dams in the database, 2,125 are considered large (impounding 10,000 acre feet or more at normal pool volume). It is important to note that while the database includes entries for 66,030 smaller dams, estimates place the actual number of dams in the U.S. at several million

(including small farm ponds). If any water impoundments occur within the study area, a file in DBASE III+ format documenting several fields of information about each impoundment accompanies this report on disk (See Appendices A and B).

The RF3 data system is a hydrologic database of surface water features across the U.S. (excluding, at present, Idaho, Oregon and Washington, which currently operate a different system - although this data is expected to be converted to RF3 soon, Alaska and Hawaii). RF3 was created primarily from 1:100,000 scale USGS Digital Line Graph data. RF3 is made up of over 3,000,000 individual "reaches". A reach is generally defined as a portion of surface water between two confluences (U.S. Environmental Protection Agency 1993). The linework underlying RF3 contains over 95,000,000 coordinate points. RF3 is designed to facilitate hydrologic routing, identifying upstream and downstream elements, and specifying the exact location of any point on a stream network. RF3 data exists as a series of traces with associated attributes. The EPA project which is producing RF3 is being conducted in three phases: Compilation, Assessment, and Revision. The Compilation phase is complete except for Idaho, Washington, Oregon, and Alaska. The Assessment phase was completed during the first half of 1994; while the Revision phase was begun in March 1994. One important outcome of the Revision phase is that the reach codes which uniquely identify each surface water feature will change. Consequently, these codes should not be used, at this time, as keys for relating other data to RF3. The RF3 data provided with this document is provisional and should be used only to provide a geographic backdrop for the park's water quality data. RF3 data covering each USGS catalog unit (a geographic area representing a single or multiple drainage basin(s), or some other distinct hydrologic feature (U.S. Geological Survey 1982)) touched by the park's study area is included in ASCII export and DBASE III+ formats on the disk(s) accompanying this report (See Appendices A and B).

For additional information on any of these data systems, contact the EPA Office of Water at (202) 260-7028.

Data Retrieval and Analysis Procedures

The six EPA data systems discussed above reside on the EPA mainframe computer located in Research Triangle Park, N.C. Horizon Systems used a dedicated, leased telephone line with a data transfer rate of 9600 bits per second to download data occurring within the park's study area from all the databases. The bisynchronous communication software and hardware provided error checking during all data transfer procedures.

As described above, the park study/query area boundary was used to select the water quality stations, industrial facilities discharges, drinking water intakes, water gages, water impoundments, and river reaches associated with the park unit. For various reasons, screening criteria (described later in this section) were employed to select appropriate water quality stations, parameters, and observations. Horizon Systems wrote several mainframe programs to automate, to the greatest extent feasible, the STORET data retrieval and storage procedures. Once the data were extracted from the EPA data systems, they were downloaded to a microcomputer for statistical analyses and reformatted into DBASE III+ compatible format.

Specifically, once on the PC, the data were processed to:

(1) Reformat the data into DBASE III+ format and other database structures;
(2) Eliminate questionable data outside the STORET edit criteria ranges (See Appendix C);
(3) Display on a map the location of water quality monitoring stations and other water resources themes;
(4) Determine the frequency of water quality observations by station, parameter, and station/parameter;
(5) Generate descriptive period-of-record water quality statistics in a tabular format;
(6) Generate appropriate descriptive annual and seasonal analyses of the water quality data in a tabular format;
(7) Plot appropriate period of record time series and annual and seasonal box-and-whisker graphs;
(8) Compare the water quality data against relevant EPA national criteria; and

(9) Compare the water quality data against the NPS Servicewide Inventory and Monitoring Program's "Level I" water quality parameters.

Special customized microcomputer programs (primarily written in Clipper and Microsoft Professional BASIC) and procedures were created to address each of these tasks. All reformatted database files are included on disk(s) accompanying this document. The contents of these databases are described briefly below. Complete database structures are included in Appendices A and B. The descriptive water quality tabular statistics (see "Statistical Analyses" below) were computed based upon NPS specifications. Command or batch files were generated to drive STATGRAPHICS 7.0 in order to produce all the time series and box-and-whiskers plots.

Park Unit Databases

Up to seven digital databases in DBASE III+ and other formats have been created for the park by querying the water resources-related data sources described above. The disk(s) containing these databases accompany the report. The contents of each of these databases are discussed briefly below. More detailed documentation of these databases is included in Appendices A and B.

(A) Water Quality Parameter Data: This database includes all the water quality parameter data downloaded from STORET that passed the STORET Edit Criteria, Date, Station Type, and Phase 0 Parameter screens (described below) and is summarized tabularly and graphically in this document. This constitutes the park's baseline water quality data. Since it is already in digital format, more sophisticated analysis of the data is possible than the descriptive statistics and graphics presented here.

(B) Water Quality Station Locations: This database consists of the STORET header information describing each station where water quality data was collected. As the latitude and longitude of the station are included in the database, this file is easily imported into the park's GIS.

(C) Industrial Facility Discharge Locations: This database includes any industrial or municipal point source discharges located within the park's study area. As the latitude and longitude of each discharge facility are included in the database, this file is easily imported into the park's GIS.

(D) Drinking Water Intake Locations: This database includes any drinking water intakes located within the park's study area. As the latitude and longitude of each intake are included in the database, this file is easily imported into the park's GIS.

(E) Water Gage Locations: This database includes water (stream, lake, estuary, well, spring, climate, or other) gages located within the park's study area. Most of the gages will likely be stream gages belonging to the USGS. As the latitude and longitude of each gage are included in the database, this file is easily imported into the park's GIS.

(F) Water Impoundment Locations: This database includes any water impoundments (dams) located within the park's study area. As the latitude and longitude of each impoundment are included in the database, this file is easily imported into the park's GIS.

(G) River Reach Data: This database includes all stream traces (1:100,000 scale) and attributes for reaches falling within any USGS catalog unit that touches the park's study area. The traces are geo-referenced in ASCII format. The attributes are in both ASCII export and DBASE III+ formats. This information is also readily incorporated into the park's GIS.

The absence of any of these seven files from the disk(s) accompanying the report indicates that there was either no data of this type within the park's study area or the data was unavailable. Several other files are included on the disk(s) accompanying this report, including digital copies of all the figures and tables contained in the document and some other items. Refer to Appendices A and B for detailed documentation of these files. Not included on

disk is an Encyclopedia File (for WRD reference) that documents the minimum and maximum values for each water quality parameter and the parks in which those values were recorded. When Baseline Water Quality Data Inventory and Analysis reports have been completed for all parks, this Encyclopedia File will be available upon request from the NPS WRD.

Screening Methodologies and Procedures

Developing automated or semi-automated procedures to produce baseline water quality inventories and analyses for all national park units required constant testing and debugging of procedures. Three parks, Rock Creek Park, Yellowstone National Park, and Indiana Dunes National Lakeshore, were used to pilot test and refine the automated procedures. It became evident, after a preliminary analysis of all the downloaded STORET data, especially for Indiana Dunes National Lakeshore, that the specifications for the graphical analyses could generate hundreds (possibly thousands) of plots, many of which would not necessarily be useful. Also, there were many stations; parameters; and/or observations downloaded that were not part of the study's objectives; not overly useful; or of dubious quality. In order to reduce the number of graphical plots (time series, annual and seasonal box-and-whiskers) to fit within project resources, various screening criteria were investigated. Ultimately, a comprehensive set of screening criteria were developed to reduce the number of graphical plots. After initial counts of the total number of possible time series and annual and seasonal box-and-whiskers plots were generated, these counts were used to decide which screening criteria would be applied to limit the number of these plots produced for the park unit. Additional screening criteria were employed to restrict the tabular descriptive statistics results to only those deemed useful to the park. Table A provides the categories of screening criteria and to which analyses the screens were applied. A "yes" entry in the table means that the screening category eliminated or prevented data from appearing in certain tables and plots contained in the document. Consequently, in understanding how data from STORET was used in this report, it may be helpful to keep in mind the three general types of screening criteria: (1) screens that apply to stations; (2) screens that apply to certain parameters at stations; and/or (3) screens that apply only to particular observations of parameters at stations. A detailed description of each of the screening criteria categories follows this table. *It is important to note that statistics in "Inventory" reports may not be consistent with statistics in "Overview" reports since different categories of screening criteria were applied*. Also, if attempting to replicate the results of the statistical and graphical analyses presented in this document, be sure to follow the same screening methodologies.

<u>STORET Edit Criteria</u>

As mentioned previously, STORET is a "user-beware" data system. As the EPA doesn't certify any data in STORET, public agencies enter and are responsible for the quality of their own data. Only data entered since November 1983 have been subjected to any rudimentary edit/bounds checking. Agencies entering data since this date can elect to override the edit/bounds checking for individual observations. USGS WATSTORE water quality data is entered into STORET without any EPA edit/bounds checking to ensure data integrity between WATSTORE and STORET. Unfortunately, during the course of our pilot tests, erroneous USGS and EPA water quality data values were discovered. In order to eliminate as much "bad" data as possible, all water quality data downloaded from STORET was subjected to automatic edit/bounds checking (STORET Edit Criteria contained in Appendix C) for the 190 most common parameters. Observations falling outside the STORET Edit Criteria were documented (See the Water Quality Observations Outside STORET Edit Criteria for Park section in the Water Quality Results chapter) and then retained or discarded from the database and all tables and plots based on whether the value was judged as being in the realm of possibility. Although the STORET Edit Criteria screen likely removed some "bad" data for these common parameters, the probability of other erroneous data in the database is high. Be sure to consult the Caveat section in the Introduction.

Table A. Categories of Screening Criteria and to Which Output Products They Apply (A "yes" Entry Means the Screening Category Eliminated or Prevented Data From Being Used in the Product):

Screening Category	Data Download	Overview Tables	Inventory Tables	Annual Tables	Seasonal Tables	Standards Tables	Plots (All)
STORET Edit Criteria	yes	yes	yes	yes	yes	yes	yes
Date	yes	yes	yes	yes	yes	yes	yes
Station Type	yes	yes	yes	yes	yes	yes	yes
Phase 0 Parameter	yes	yes	yes	yes	yes	yes	yes
Phase 1 Parameter	no	no	yes	yes	yes	yes	yes
Media Type	no	no	yes	yes	yes	yes	yes
Remark Codes	no	no	yes	yes	yes	yes	yes
Composite Type	no	no	yes	yes	yes	yes	yes
Phase 2 Parameter	no	no	no	no	no	no	yes
Observations/Period of Record	no	no	no	yes	yes	no	yes

Date Screen

Every water quality observation in STORET typically has a sampling date associated with it. Unfortunately, STORET does not prevent users from entering incorrect dates. Consequently, any water quality observation with an incorrect and/or suspect date (eg. a month greater than 12; a day greater than 31; or a sample date later than the STORET retrieval date) were discarded.

Station Type Screen

STORET contains data from a wide variety of stations classified by the type of waterbody in which samples were collected. As this project's purpose was to inventory and analyze surface-water quality, the following surface-water station types were retrieved (clarification provided in parentheses):

Station Types Included In Retrieval

(a) STREAM
(b) CANAL
(c) LAKE
(d) RESERV (Reservoir)
(e) SPRING
(f) FWTLND (Fresh Water Wetland)
(g) SWTLND (Salt Water Wetland)
(h) ESTURY (Estuary)
(i) OCEAN

Ground water and/or other station type data may have been retrieved if the entering agency classified the station type incorrectly. Rectifying this error was beyond the scope and resources of this project.

Phase 0 Parameter Screen

Nearly all water quality parameters associated with each station type listed above were retrieved. The only exception to this was the exclusion of most of the STORET administrative parameters. A complete list of STORET administrative parameters is included in Appendix D. The few administrative parameters that were included in the retrievals are as follows:

Code	STORET Administrative Parameter Description
00027	Code No. for Agency Collecting Sample
00028	Code No. for Agency Analyzing Sample
00063	Sampling Points, Number of In a Cross Section
00111	Ratio of Fecal Coliform to Fecal Streptococci
00115	Sample Treatment Code (1=Raw, 2=Treated)
34772	NPDES Number, Cross Reference
45580	Method of Analysis
74065	Stream Flow Class
74066	Annual Runoff
74067	Soil Classification
74068	Water Quality Designated Use Classification

Phase 1 Parameter Screen

Some of the data retrieved from STORET was not suitable for statistical or graphical analysis. Consequently, this screening criterion eliminated all parameters which were not suitable for statistical or graphical analysis within the context of this project. The full list of these parameters is presented in Appendix E. Examples of parameters excluded from statistical and graphical analysis include the administrative parameters mentioned above, land use acreage, encoded values, dates, latitude/longitude, etc. Excluded parameters do, however, appear in the Parameter Period of Record and Station/Parameter Period of Record (two of the "Overview" Tables), as well as in the water quality parameter file included on disk(s) accompanying this report.

Media Type Screen

Water quality samples can be taken in a variety of aqueous media. Water quality data were retrieved from STORET only if the media were WATER or VERT (vertically integrated). WATER and VERT samples comprise the overwhelming majority of samples in STORET. The media screen eliminated the following water quality sampling media:

Media Screen	Description
BOTTOM	Sampled At the Bottom
DREDGE	Sampled By Dredge
PORE	Pore Sample
CORE	Core Sample

Remark Code Screen

STORET enables the agency collecting water quality samples to provide a qualifying remark for each parameter observation. These remarks provide additional information about the measured or observed value entered into STORET (See Appendix B - Parameter Data File for a complete listing and description of all remark codes). Based on the STORET remark codes, two potential screens were applied to water quality observations based on whether the measured value was used in subsequent analyses: (1) Elimination or (2) Modification/Inclusion.

Elimination:
Non-composite water quality parameters with the remark codes presented in Table B were eliminated from the period of record, annual, and seasonal descriptive statistics and graphics. Not including observations with these remarks was justified by the fact that most of the remarks: (A) indicate either less confidence in the measured value; (B) are remarks for nominal or categorical data that doesn't lend itself to statistical analysis; or, (C) complicate the statistical analysis beyond the scope of this effort. Observations containing these remark codes comprise a very small fraction of the data. Although statistical analyses weren't undertaken on this data, all water quality observations, regardless of remark code, are included on disk(s) accompanying this report. If you re-analyze this data in order to replicate the results presented here, be sure to eliminate all non-composite observations with the remark codes presented in Table B.

Table B. Non-composite Parameters With the Following Remark Codes Were Eliminated From Statistical and Graphical Analysis:

Remark Code	Description of STORET Remark Code
F	Female Species.
J	Estimated, Not the Result of Analytic Measurement.
M	Presence Verified, But Not Quantified, Below Quantification Limit. For Species, Male. For Oxygen Reduction Potential, Indicates Negative Value.
N	Presumptive Evidence of Presence.
O	Analysis Lost.
V	Analyte Was Detected In Sample and Method Blank.
W	Less Than Lowest Value Reportable Under Remark "T".
Z	Too Many Colonies Were Present to Count (TNTC), Value Represents Filtration Value.

Modification/Inclusion:
Water quality parameter observations with the remark codes presented in Table C were halved prior to inclusion in period of record, annual, and seasonal descriptive statistics and graphics. These remark codes deal with observations that were below the detection limit for the parameter. The common water quality data analysis convention for these remark codes is to use half of the detection limit in statistical analyses (Ward, Loftis, and McBride 1990; Gilbert 1987). Although this is a somewhat defensible treatment of observations below the detection limit, the statistics that may be computed using these halved values may not be defensible. Consequently, any computed statistics in inventory, annual, or seasonal tables that are comprised of 50% or more K, T, and U remark codes are footnoted "Computed with 50% or more of the total observations as values that were half the detection limit." This will provide the user with some caution in using and interpreting these results. Water quality data included on disk(s) accompanying this report that may have these remark codes are stored as the original entry (detection limit). If you re-analyze this data in order to replicate the results presented here, be sure to substitute half the detection limit value in the database whenever these remark codes are encountered.

Table C. The Value of Water Quality Parameters With the Following Remark Codes Were Halved (Half of the Detection Limit Entered In STORET) Prior to Inclusion In Descriptive Statistics and Graphics:	
Remark Code	**Description of STORET Remark Code**
K	Off-scale Low, Actual Value Not Known, But Known to Be Less Than Value Shown.
T	Less Than Detection Criteria.
U	Analyzed For But Not Detected, Value is Detection Limit For Process Used. If Species, Undetermined.

Composite Type Screen

Sometimes data entered in STORET represent something other than a single measurement at one location at one point in time. These samples are typically referred to as composite samples due to the fact that they vary temporally and spatially. Consequently, the observation entered into STORET for composite data is typically a computed value that summarizes the data over time and/or space. Such data complicate statistical and graphical analyses and must be handled separately. Such treatment was beyond the scope of this study; although composite values typically represent only a fraction of STORET observations. The composite type screen eliminates all composite observations from statistical and graphical analyses, except those with a composite type code of "A" that have a one day or less sampling period and those with a composite type code "D". All water quality observations, regardless of composite type code, are included on disk(s) accompanying this report. If you re-analyze this data in order to replicate the results presented here, be sure to exclude all composite observations except those with a code of "A" that have a one day or less sampling period and those with a code of "D". Table D presents a list of possible STORET composite type codes.

Table D. Possible STORET Composite Type Codes	
Composite Type Code	**STORET Composite Type Description**
A	Average
H	Maximum
L	Minimum
N	Number of Observations
#	Number of Observations
S	Standard Deviation
U	Sum of Squares
V	Variance
C	Coefficient of Error
X	Coefficient of Variance
E	Skewness
F	Kurtosis
Z	Number of Obs. That Exceed An Established Limit
%	Precision
$	Accuracy
B	N/A
D	Indicates Replicate Sample

Phase 2 Parameter Screen

Due to budgetary limitations, the number of graphical plots (time series, annual and seasonal box-and-whiskers) produced had to be manageable - typically no more than 100 total plots. After scrutinizing the results of the pilot tests and the Baseline Water Quality Data Inventory and Analysis Reports produced for the first group of parks, the 19 parameters which, typically, were the most frequently measured at nearly all stations were water temperature, stage, discharge, and various meteorological measurements (See Table E). Consequently, most of the graphical plots produced would be of water temperature, stage, discharge, and meteorological conditions. Although these are important parameters, particularly in conjunction with other water quality parameters, it was felt that plotting resources would be better allocated to other water quality parameters. Consequently the STORET parameter codes listed in Table E never generated graphical plots. It is important to note, however, that these parameters are included in all other aspects of the project, including all applicable period of record, annual, and seasonal descriptive statistics tables.

Table E. Frequently Measured STORET Codes That Were Prevented From Generating Plots	
STORET Parameter Code	**STORET Parameter Description**
00003	Sampling Station Location, Vertical (Feet)
00010	Water Temperature (Degrees Centigrade)
00020	Temperature, Air (Degrees Centigrade)
00021	Temperature, Air (Degrees Fahrenheit)
00025	Barometric Pressure (MM of HG)
00032	Cloud Cover (Percent)
00035	Wind Velocity (Miles Per Hour)
00036	Wind Direction in Degrees from Trun N (Clockwise)
00040	Wind Direction (Azimuth)
00045	Precipitation, Total (Inches Per Day)
00046	Precipitation, Total (Inches Per Week)
00052	Humidity, Relative (Percent)
00061	Stream Flow, Instantaneous (CFS)
00065	Stream Stage (Feet)
81903	Depth of Bottom of Water @ Sample Site (Feet)
82553	Rainfall In 1 Day Inclusive Prior to Sample (Inches)
82554	Rainfall In 7 Days Inclusive Prior to Sample (Inches)
82371	Rainfall In 3 Days Inclusive Prior to Sample (Inches)
82372	Rainfall In 14 Days Inclusive Prior to Sample (Inches)
85599	Precipitation, Total/Period-Rain Equivalent (Cm/Sample)

Observations/Period of Record Screen

Despite never plotting water temperature, stage, discharge, and meteorological measurements, the number of plots generated by some parks still exceeded the 100 plot limit. Also, some rationale was needed to plot only those parameters with sufficient data density to make a meaningful statistical graphic. For example, time series plots comprised of only a few observations or annual or seasonal box-and-whiskers plots with limited observations and/or data in only one or two years or seasons are not very informative. Consequently, a number of plotting criteria were developed to limit the number of time series and box-and-whiskers plots to, at most, 100 informative graphics by using each parameter's number of observations and period of record. Similar, albeit less stringent criteria, were used for including results of annual and seasonal analyses in descriptive statistics tables. Consequently, there are more summaries of annual and seasonal results in tables than in graphics. Whenever an entry in an annual or seasonal table generated a plot, this entry was footnoted to notify the reader of the presence of the graphic. Due to differing quantities of data at parks, different screening criteria were employed. The same

criteria for appearance in seasonal and annual tables were used for all parks. Table F presents the least stringent plot screens.

Table F. Least Stringent Plot Screening Criteria Used to Limit the Number of Plots Generated

Time Series: To generate a time series plot, a station/parameter combination must have a period of record of at least 2 years and a total of at least 8 observations. Annual Analysis: To generate an annual box-and-whiskers plot, a station/parameter combination must have at least 9 observations in each of at least 4 years. The years do not have to be consecutive. Seasonal Analysis: To generate a seasonal box-and-whiskers plot, a station/parameter combination must have at least 9 observations in each of 2 seasons and a period of record of at least 6 years and observations in at least 3 of the 6 years. The years do not have to be consecutive.

The exact three plot screens used varied by park unit and are documented in the Overview section of the Water Quality Results chapter. If your park's plotting criteria deviated from these least stringent criteria, it is because too many plots would have been generated using these criteria.

The criteria used for appearance of station/parameter combinations in annual and seasonal analysis tables are presented in Table G. These tabular criteria, which are actually the least stringent plotting criteria, were constant from park to park.

Table G. Criteria Used for Generating Entries in Annual and Seasonal Analysis Tables

Annual Analysis: For an entry to appear in an annual table, a station/parameter combination must have at least 9 observations in each of at least 4 years. The years do not have to be consecutive. Seasonal Analysis: For an entry to appear in a seasonal table, a station/parameter combination must have at least 9 observations in each of 2 seasons and a period of record of at least 6 years and observations in at least 3 of the 6 years. The years do not have to be consecutive.

Statistical Definitions

Since this report is intended only to characterize historical and/or existing water quality at the park rather than address specific water quality problems, only simple descriptive statistics are presented. Inferential and non-parametric statistical analysis to examine relationships and trends were beyond the scope of the study. The complete water quality dataset is provided on disk accompanying this report to afford the opportunity for more detailed exploratory data analysis. The descriptive statistics are included in the inventory, annual, and seasonal tables. Table H provides a brief definition of each descriptive statistic provided for each parameter at a station.

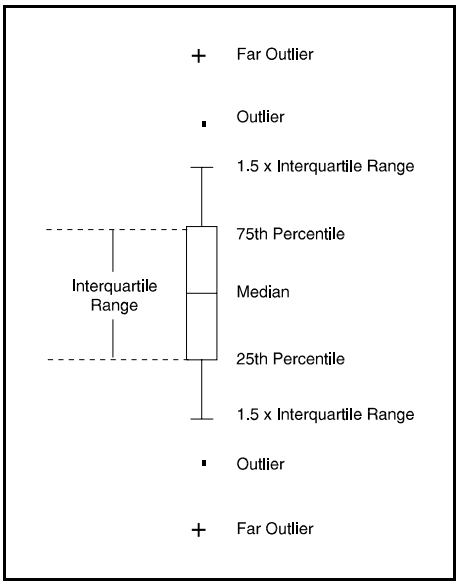
Table H. Definition of Descriptive Statistics Contained in Inventory, Annual, and Seasonal Tables

Observations:	The number of samples collected.
Median:	The median is the 50th percentile or the value in a dataset sorted in ascending order that exceeds 50% of all observations, yet is also exceeded by the remaining 50% of all observations.
Mean:	The sum of all observations collected divided by the number of observations.
Maximum:	The maximum value observed.
Minimum:	The minimum value observed.
Variance:	This is a measure of variability or dispersion of the observations; or, in other words, describes how many observations are close (or far), from the mean. It is calculated as the weighted average of the squared deviations from the mean.
Standard Deviation:	The positive square root of the variance.
10th Percentile:	The value in a dataset sorted in ascending order that exceeds 10% of all observations, yet is itself exceeded by the remaining 90% of all observations.
25th Percentile:	The value in a dataset sorted in ascending order that exceeds 25% of all observations, yet is itself exceeded by the remaining 75% of all observations. The 25th percentile is also known as the first quartile.
75th Percentile:	The value in a dataset sorted in ascending order that exceeds 75% of all observations, yet is itself exceeded by the remaining 25% of all observations. The 75th percentile is also known as the third quartile.
90th Percentile:	The value in a dataset sorted in ascending order that exceeds 90% of all observations, yet is itself exceeded by the remaining 10% of all observations.

As with the tabular descriptive statistics, the scope of the project limited the generation of exploratory graphics to time series plots and annual and seasonal box-and-whiskers plots. Plots were only generated, however, provided the parameter met or exceeded the relevant plotting criteria specified in the previous section.

Time series plots display the parameter concentration on the Y-axis and the date on the X-axis. This provides the user with a visual feeling for not only the parameter's concentration and variability over time, but also the density of data in different time periods. The time series plots provide a visual representation of the data in the basic station inventory. Due to software limitations, a line connects each measured value in sequence regardless of the time period between samples. Readers are cautioned not to assume that the concentration of the parameter between any two data points can be represented by a straight line. It is likely that the concentration varied between any two observations, particularly if the observations are separated by a significant time period.

The annual and seasonal box-and-whisker plots provide a graphical overview of the measured data and give the user a better understanding of the data's distribution and possible outliers. In essence, the box-and-whisker plots provide a visual representation of the data contained in the annual and/or seasonal tables. The interpretation of the boxes is provided in the figure to the right. Each box encompasses the middle 50 percent of measured values (from the 75th to 25th percentiles). The difference between the 75th and 25th percentiles is also known as the interquartile range. The horizontal line inside each box is the median or 50th percentile. The lines which extend out from each end of the box are the whiskers. The whiskers extend out from first quartile (25th percentile) and third quartile (75th percentile) to the smallest data point within 1.5 interquartile ranges from the first and third quartiles. Observations that extend beyond the whiskers are known as outliers. Far outliers are observations whose values lie more than three interquartile ranges below the first quartile or above the third quartile. These are designated with plus signs.



INTERPRETIVE GUIDE

TO WATER QUALITY RESULTS

This interpretive guide discusses each of the products presented in the next chapter - Water Quality Results. This chapter highlights how each of the tables and figures were prepared and how they can be used. Each subheading in this chapter corresponds to a particular product in the subsequent Water Quality Results chapter.

Overview

The Overview provides a brief one-page summary of the results of the various database retrievals for both the study area and the park. The study area results include the park results since the study area encompasses the park and all lands and waters within at least 3 miles upstream and 1 mile downstream of the park. Thus, the GIS estimated acreage of the study area should always be greater than the park acreage. The park acreage was computed from the digital boundary that was obtained for the park. More than likely this acreage will differ, perhaps significantly, from the "official" published acreage for the park due to the spatial and temporal accuracy of the digital boundary, treatment of inholdings, and other concerns. The number of STORET stations is the number of locations within the study area and park where an agency monitored (or intended to monitor) water quality. The number of stations with no data reveals the number of stations created in STORET for which water quality data were never entered. The number of stations with no statistical analysis reports the number of stations in the study area and park that contain data not amenable to normal parametric statistics. The number of longer term stations indicates the number of stations in the study area and park with at least 6 parameters having periods-of-record extending 2 years with an average of at least 1 observation per year over the period-of-record. The date of STORET retrieval is the calendar date when Horizon Systems downloaded all the data from STORET. Thus, the report documents all data entered in STORET prior to the retrieval date. Keep in mind that an agency can upload archival data at any time. Consequently, a retrieval date only guarantees that as of that date, this report contains all the data that had been entered into STORET. The period of record is the earliest date for which water quality data exist in STORET for the study area and park up to the date when the most recent data were entered prior to the retrieval date. The number of parameters measured is the number of unique water quality parameters measured within the study area and park and entered in STORET. The number of water quality observations is the sum of the total number of observations across all parameters within the study area and park. The number of industrial/municipal facilities discharges, drinking water intakes, water gages, and water impoundments are the number of each of these entities found within the study area and park. The number of time series, annual, and seasonal plots are the number of these different types of graphics produced by station/parameter combinations within the study area and park using the plotting criteria described in the previous chapter. The hydrologic seasons, described below, are the seasons used for the seasonal water quality data analysis. The time series, annual, and seasonal criteria are the plot and tabular screening criteria described in the previous chapter.

Regional Location Map

The Regional Location Map provides a small scale, general representation of the park and study area location within the United States. Digital, reproducible copies of this graphic are included on the disk(s) accompanying this report.

Water Quality Monitoring Locations Map(s)

The Water Quality Monitoring Locations Map(s) usually provides a larger scale representation of the park and study area than the Regional Location Map. This map indicates the locations within the study area where water quality has been monitored and the data entered into STORET. The water quality monitoring stations are labelled sequentially with the rightmost significant digits. The station names were assigned in numerically ascending order by latitude (for parks with a greater north-south extent than east-west) or longitude (for parks with a greater east-

west extent than north-south). Thus, this map serves as a visual index to the water quality data contained in the report. Since the 1:100,000 scale hydrography (from the River Reach File Ver. 3.0 or other sources) is displayed on the map, users can refer to the map to locate the station number on the reach in which they are interested and then find the appropriate section in the report that documents the water quality at that station. If the scale allows, USGS catalog units are also displayed on the map to provide an approximation of drainage basins. More than one Water Quality Monitoring Location map may be presented if the scale requires breaking the area into multiple maps for legibility. If multiple maps are necessary, an index map showing the geographic extent of each sub-map or panel will be present. Digital, reproducible copies of this graphic are included on the disk(s) accompanying this report. The digital, geo-referenced data files documented in Appendices A and B will allow the park to create water quality monitoring stations as a coverage in their GIS.

Dischargers, Drinking Intakes, Gages, and Impoundments Map(s)

The Dischargers, Drinking Intakes, Gages, and Impoundments Map(s) displays the same information as the Water Quality Monitoring Location Map(s) except the water quality stations are replaced by industrial/municipal facilities discharges, drinking water intakes, active and inactive gage locations, and water impoundments. This map also serves as a visual index allowing the user to determine the identification code of each discharger, drinking intake, gage, or impoundment. This number can then be used to obtain additional information about the entity on the following page of the report or to refer to the more detailed database files accompanying the report on disk. These more detailed database files are geo-referenced (See Appendices A and B), thus allowing the park to create these coverages in their GIS. More than one Dischargers, Drinking Intakes, Gages, and Impoundments map may be presented if the scale requires breaking the area into multiple maps for legibility. If multiple maps are necessary, an index map showing the geographic extent of each sub-map or panel will be present. Digital, reproducible copies of this graphic are also included on the disk(s) accompanying this report.

Industrial Facilities Discharges, Drinking Water Intakes, Water Gages, and Water Impoundments Table

This table provides some additional information about each of the discharges, drinking intakes, water gages, and water impoundments displayed on the previous map(s). This information generally includes the site identification number; the station or facility name; an address or some other indication of location; and some other pertinent information. More detailed information about each of these entities is contained in the database files on disk accompanying the report (See Appendices A and B).

Representative Mean Annual Hydrograph for Seasonal Analysis

One component of the water quality data analysis contained in the document is a seasonal analysis of the data (where adequate data exist). In order to undertake this analysis, some representation of the park's seasons was required. Seasons can be based on many factors (eg. hydrologic, climatic, recreational use, etc.). Since project resources did not allow us to contact every park and discuss with resource management staff what appropriate seasons may be for the park, WRD staff elected to adopt primarily a hydrologic/climatic definition of the seasons which uses a process of hydrograph separation to glean seasons from stream discharge patterns. The procedure employed to make these determinations was as follows:

(1) Find the nearest USGS Hydro-Climatic Data Network (HCDN) station (U.S. Geological Survey 1992) to the park that is most representative of streamflow conditions at the park. The HCDN is basically a subset of USGS streamflow stations, including only those stations that are unaffected by artificial diversions, storage, or other disruptions of the natural channel. All HCDN stations generally have at least a 20 year period of record. Consequently, discharge patterns at these stations should reflect only hydrologic and climatic influences. For the most part, selected HCDN sites were typically within 15-20 miles of the park. In some parks where WRD staff were aware of the existence of a stream gage located within the park that would be more representative of park waters even though it wasn't an HCDN site, this gage was selected.

(2) Retrieve the daily discharge values for the selected station from the USGS Daily Values File and generate a mean annual hydrograph and a box-and-whiskers plot of daily flows by month.

(3) Interpret the plots based on our knowledge of the hydrologic regime at these parks and assign seasons.

This approach, used for the majority of parks, assumes that most water quality data at the park will be found in streams and that the discharge pattern of the selected stream is representative of the seasons for all park waterbodies. Although this assumption may be weak for certain parks, project resources did not allow a more thorough investigation. For parks where there wasn't any stream gage (HCDN or otherwise) deemed representative of park waters, precipitation records from a nearby meteorological station were obtained from the National Climatic Data Center. Plotting daily average precipitation and box-and-whiskers of monthly precipitation sums allowed WRD hydrologists to make a rough approximation of climatic seasons for use in analyzing the water quality data.

Again, it is important to note the many ways of defining "seasons" and thus the limitations of the seasonal analysis contained in this document. For certain parks it may be more useful to perform a seasonal analysis with seasons defined by recreational use patterns or some other natural or anthropogenic factor. This option is available to the park since all the water quality data analyzed in this document is contained on disk(s) accompanying this report. Digital, reproducible copies of this seasonal analysis graphic are also included on the disk(s) accompanying this report.

Contacts for Agency Codes Retrieved

This table provides a list of the organizations who have entered data into STORET. A contact name at the organization and a phone number are also supplied. The agency code in the first column is the key for identifying which stations belong to that agency. This code will appear in the first line of each station's inventory. Although the agencies listed in this table are potential partners for future water quality monitoring or management endeavors, don't be surprised if the name of the contact and/or the telephone number is out of date. This information is entered when an agency first creates a station. The agency may not update this information when the initial contact moves on or the telephone number changes. Nonetheless, it is likely that the contact or someone else at the agency may be able to provide you with project reports or other information relative to the agency's data. A digital copy of this table accompanies this report on disk (See Appendices A and B).

Quantity of Data Retrieved by Agency Code

This table displays the period-of-record; numbers of water quality stations, longer-term stations, and stations without data; total number of water quality observations; and the number of unique water quality parameters measured by each agency within the study area and park boundary. Using this table, a park can quickly determine which agencies collect the most data in and around the park and whether they have monitored recently. A digital copy of this table accompanies this report on disk (See Appendices A and B).

Station Period of Record Tabulation

The Station Period of Record Tabulation provides a quick overview of the names of all the stations within the study area where water quality has been monitored and data entered into STORET. It also furnishes the total number of observations taken at each station and the frequency of observations between certain dates: (1) 01/01/85 until the most recent date data were measured; (2) 01/01/75 - 12/31/84; and (3) prior to 01/01/75. The station identification number, the four character park abbreviation code followed by a four digit number, provides the means to jump from a particular station in the table to the statistical and graphical analyses for this station contained in the Station-By-Station Results section. The Station Period of Record Tabulation reveals which water

quality stations were situated within the park as defined by the park's GIS boundary. The Station Period of Record Tabulation also footnotes longer-term water quality stations. Longer-term stations are those that have at least 6 parameters with an average of one or more observations per year for those parameters during a period of record extending at least two years. Note that although a station may not be flagged as longer-term, it can still harbor much important data (albeit for only a few parameters or over a very long term with just a few observations). A digital copy of this table accompanies this report on disk (See Appendices A and B).

Parameter Period of Record Tabulation

The Parameter Period of Record Tabulation provides a complete listing of every water quality parameter ever measured in the study area and entered into STORET. This table is a summation of all the water quality observations for each parameter across all stations in the study area. Like the Station Period of Record Tabulation, the total number of observations for each parameter and the frequency of observations between: (1) 01/01/85 until the most recent date data were measured; (2) 01/01/75 - 12/31/84; and (3) prior to 01/01/75 are provided. This table is handy for quickly assessing whether particular parameters have been measured in the study area. The Parameter Period of Record Tabulation also shows how many in-park (and total) water quality stations contained data for each parameter. Some administrative parameters and parameters not suitable for statistical analysis within the context of this project (as discussed in the Screening Methodologies and Procedures section of the Methodology chapter) are listed in the Parameter Period of Record Tabulation, but not in the Station-By-Station Results section. A digital copy of this table accompanies this report on disk (See Appendices A and B).

Station/Parameter Period of Record Tabulation

The Station/Parameter Period of Record Tabulation combines the information found in the Station Period of Record Tabulation and the Parameter Period of Record Tabulation. This table provides a listing of all the stations where a particular water quality parameter was measured in the study area and the data entered into STORET. The table provides the start and end dates of the period of record of each parameter at each station; the number of years of measurement (computed from the start and end dates); whether the station/parameter combination occurred within the park boundary; the total number of observations for each parameter at each station, and whether a time series (T), annual (A), and/or seasonal (S) plot was generated for the station/parameter combination in the Station-By-Station Results section. This table is very useful when you need to determine at which locations within the study area (or park) particular parameters were monitored and how much data was collected there. Some administrative parameters and parameters not suitable for statistical analysis within the context of this project (as discussed in the Screening Methodologies and Procedures section of the Methodology chapter) are listed in the Station/Parameter Period of Record Tabulation, but not in the Station-By-Station Results section. A digital copy of this table accompanies this report on disk (See Appendices A and B).

Station-By-Station Results

Probably the most voluminous portion of the document is the Station-By-Station Results. Here the results of the water quality analyses for each station are presented in sequence. The results include the station inventory; parameter inventory; EPA water quality criteria analysis; and, as applicable, time series graphics and annual and seasonal tables and box-and-whiskers graphics. Each of these products are discussed below.

Station Inventory for Station

Each station's data commences with its Station Inventory. The Station Inventory provides the descriptive attributes about each water quality monitoring station contained in STORET. This includes a variety of locational information such as a verbal description, the Federal Information Processing codes for county and state, latitude and longitude, and other items; the station type (stream, spring, estuary, etc.); monitoring agency; creation date; indices to the River Reach File; whether the station lies within the park boundary; and several other attributes. This water quality station location data is also contained on disk(s) accompanying the report (See Appendices A and B).

Parameter Inventory for Station

Following the descriptive attributes about a station is the Parameter Inventory for the station. The Parameter Inventory provides a complete inventory and descriptive summary of all the water quality parameter data for the station. This table furnishes the parameter STORET code and name; the period of record for this parameter at this station; and the descriptive statistics defined in the Statistical Definitions in the previous chapter. Three different footnotes can appear on a parameter's descriptive statistics. Two asterisks (**) in the 10th, 25th, 75th, or 90th percentile columns indicates that there was insufficient data to compute these statistics for this parameter. Percentiles were not computed unless the parameter had at least 9 observations. Two number signs (##) next to the number of observations indicates that more than 50 percent of the observations entered into the computations as values that were taken to be half the detection limit. Caution should be employed in interpreting and using statistical results when more than half the values are set to half the detection limit. The letter "p" following a numeric STORET parameter code in the Parameter Inventory indicates that a time series plot was produced for this parameter at this station. Digital, reproducible copies of the Parameter Inventory tables are contained on the disk(s) accompanying this report.

Two downloaded parameter groups, pH and bacteriological, received special treatment whenever descriptive statistics were computed in the Parameter Inventory (as well as subsequent annual and seasonal tables). Whenever pH appears in a descriptive statistics table, the entry is increased to 3 entries: (1) the original pH entry; (2) pH computed from conversion to and from μeq/l H^+; and (3) μeq/l H^+. The reason for these conversions is that pH is actually the negative logarithm of the hydrogen ion concentration. To be technically correct in computing descriptive statistics, pH values must be converted to μeq/l H^+ (Kunkle and Wilson 1984). Once the descriptive statistics are computed using the pH values expressed as μeq/l H^+, the results can be converted back to pH. The three pH entries in the descriptive statistics table will all have the same STORET code.

Whenever a bacteriological parameter appears in a descriptive statistics table, the entry is increased to 3 entries: (1) the original bacteriological entry; (2) an entry computed using the log of each measured value; and (3) an entry that simply reports the geometric mean. The reason for converting to logs and displaying the geometric mean is convention. Bacteriological water quality standards typically reference the geometric mean rather than the arithmetic. The three bacteriological entries in the descriptive statistics tables will all have the same STORET code.

EPA Water Quality Criteria Analysis for Station

The EPA Water Quality Criteria Analysis table follows the Parameter Inventory. This table presents a comparison between the station's STORET water quality data and applicable national water quality criteria for freshwater and marine aquatic organisms; drinking water; and other concerns. Comparison against applicable State water quality criteria was not feasible given project resources. Appendix F provides the relevant national EPA water quality criteria values. In most cases, the EPA water quality criteria values are single sample concentrations that can be directly compared to single sample STORET entries. There are, however, two notable exceptions to this single sample/single value comparison: ammonia and fecal-indicator bacteria. For these two parameters, criteria are either derived from or depend on the results of other chemical characteristics of the water or require a time series statistical treatment of multiple samples to determine whether the criterion has been exceeded. The EPA ammonia criterion is pH and temperature dependent. To calculate the criterion for each ammonia sample value was beyond

the scope of this project. Consequently, ammonia criteria were not included in Appendix F or the EPA Water Quality Criteria Analyses. Un-ionized ammonia criteria can be determined from formula table values included in the EPA Silver Book (Environmental Protection Agency 1995).

For the purposes of this project, fecal-indicator bacteria data were flagged as exceeding criteria when their concentrations exceeded 200, 1000, 126, and 33 (fresh)/35 (salt) colony forming units or most probable number for single samples of fecal coliform, total coliform, E. coli, and enterococci, respectively. These values represent only approximations of the criteria for primary contact recreation waters where criteria are typically expressed in terms of a geometric mean computed with no less than 5 samples during a given month. When a fecal-indicator bacterial observation exceeds a criterion in the EPA Water Quality Criteria Analysis section, the reader should refer to the corresponding geometric mean calculations in the preceding Parameter Inventory. Long-term geometric means that exceed the respective water quality criteria for multiple samples are more indicative of chronic bacteriological problems than single sample values.

Water quality observations carrying non-detection or below-detection limit remark codes (K, T, and U) required special treatment in the EPA Water Quality Criteria Analysis. As with the statistics in the Parameter Inventory, half the detection limit was the value used in the EPA Water Quality Criteria Analysis. For certain observations, however, half the detection limit may exceed a water quality criterion. For those observations it would be inappropriate to classify them as exceeding a criterion since the actual value wasn't known. Thus, it was decided that any below detection limit or non-detect observations that exceed a water quality criterion using half the detection value would be excluded from the EPA Water Quality Criteria Analysis. If non-detect or below detection limit values are excluded from the EPA Water Quality Criteria Analysis for a particular parameter, the total observations for that parameter will be footnoted with an ampersand (&). This will also explain the difference between the total observations in the Parameter Inventory and the EPA Water Quality Criteria Analysis. Non-detect or below detection limit values are included in the EPA Water Quality Criteria Analysis, however, if half the detection limit doesn't exceed the parameter's criterion.

The EPA Water Quality Criteria Analysis for each station lists the parameter; the standard type and value; the total number of observations for the parameter at this station; the number of observations that exceeded the standard value; and the proportion of observations that exceeded the standard value. Water quality observations are considered as having exceeded a criterion regardless of whether the criterion represents a maximum acceptable value or a minimum acceptable value. The table also breaks down the water quality criteria analysis on a seasonal basis to allow the reader to discern whether parameter observations tend to exceed criteria during only certain seasons or year round. Although the EPA Water Quality Criteria Analysis table is a good starting point for assessing potential water quality problems at the station, the reader is strongly encouraged to read the caveat section in the Introduction concerning drawing conclusions about water quality problems from this table. Digital, reproducible copies of these tables accompany the report on disk (See Appendices A and B).

Time Series Plots for Station

Following the EPA Water Quality Criteria analysis will be any Time Series Plots for each parameter that met the time series plot screening criterion selected for the park unit. If a time series plot is generated for a particular parameter at a station, a "p" will appear next to the STORET parameter code in the Parameter Inventory. If no time series plots are present for the particular station, the data did not meet the time series screening criterion listed in the Overview section of the Water Quality Results chapter. The x-axis on these plots is the period of record, listing only the 2-digit calendar year for clarity (i.e. 1983 is presented as 83). The y-axis is the concentration of the selected parameter in its measurement units. In general, the units for a given parameter are given either on the y-axis or in the parameter description in the subtitle of the graph. Subtitle and/or y-axis parameter descriptions may be truncated on the plots so as to not exceed the maximum number of plotting characters. Y-axis values less than zero are sometimes shown for better representation of the entire plot. The station identification code, parameter description, and parameter STORET code are presented in the main title. The footnote provides a descriptive location name. Observations on the plot are represented as squares. Lines are drawn connecting each successive observation. As mentioned previously in the Statistical Definitions section of the Methodology chapter, the interconnecting line is drawn only for ease of reading and provides no indication of what the actual parameter

values were between the two observed measurements. Digital, reproducible copies of all time series plots accompany the report on disk (See Appendices A and B).

For time series plots of pH, the original pH values are plotted. For time series plots of bacteriological data, the log of the measured value is plotted. Hence, the y-axis of a time series plot for bacteriological parameters is log-linear.

Annual Analysis for Station

If more than 9 observations exist in each of at least 4 years for a particular parameter at a station, an Annual Analysis table will be generated. Entries will be made in the table for each parameter having more than 9 observations in each of at least 4 years. The Annual Analysis presents the same descriptive statistics as the Parameter Inventory table, except that it provides the statistics by year, rather than the entire period of record. Although some of the years may not contain 9 observations, these years still have an entry in the table. A parameter needs only to have 9 observations in any 4 years of its period of record to qualify for the Annual Analysis table. Like the Parameter Inventory, percentiles with fewer than 9 observations are not computed and entries computed with greater than 50 percent of the data values set to half the detection limit are flagged. Entries in the Annual Analysis table that also meet the annual analysis box-and-whisker plot screening criterion will be flagged with a "p" next to the STORET code. Digital, reproducible copies of these tables accompany the report on disk (See Appendices A and B).

Annual Box-and-Whiskers Plots for Station

Entries in the Annual Analysis table that meet the annual box-and-whisker plot screening criterion will generate Annual Box-and-Whiskers Plots. The interpretation of box-and-whiskers plots is explained in the Statistical Definitions section of the Methodology chapter. A box is generated for each year of the period of record, even if less than 9 observations were recorded in the year. The axis labeling and plot titling is the same as for the time series plots. Digital, reproducible copies of these graphics accompany the report on disk (See Appendices A and B).

For annual box-and-whiskers plots of pH, μeq/l H^+ are plotted. For annual box-and-whiskers plots of bacteriological data, the log of the measured value is plotted. Hence, the y-axis of an annual box-and-whiskers plot for bacteriological parameters is log-linear.

Seasonal Analysis for Station

As explained above, a park's hydrologic seasons for seasonal water quality analysis were determined using a process of hydrograph separation and other techniques. If a parameter has more than 9 observations in each of 2 seasons with a period of record of at least 6 years and observations in at least 3 of the 6 years, a Seasonal Analysis table will be generated for the station. The Seasonal Analysis presents the same descriptive statistics as the Parameter Inventory table, except that it provides the statistics by season, rather than the entire period of record. Although certain parameters for a season at a station may not contain 9 observations, these parameters can still have an entry in the table. A parameter needs only to have 9 observations in each of 2 seasons with a period of record of at least 6 years and observations in at least 3 of the 6 years to qualify for the Seasonal Analysis table. Consequently, some of the parameters could have fewer than 9 observations in a particular season but still generate a table entry. Like the Parameter Inventory and Annual Analysis, percentiles with fewer than 9 observations are not computed and entries computed with greater than 50 percent of the data values set to half the detection limit are flagged. Entries in the Seasonal Analysis table that also meet the seasonal analysis box-and-whisker plot screening criterion will be flagged with a "p" next to the STORET code. Digital, reproducible copies of these tables accompany the report on disk (See Appendices A and B).

Seasonal Box-and-Whiskers Plots for Station

Entries in the Seasonal Analysis table that meet the seasonal box-and-whisker plot screening criterion will generate Seasonal Box-and-Whiskers Plots. The interpretation of box-and-whiskers plots is explained in the Statistical Definitions section of the Methodology chapter. A box is generated for each season of the period of record, even if less than 9 observations were recorded in the season. On the x-axis, the seasons are labeled 1 through the number of seasons defined for the park through hydrograph separation. The actual calendar dates that correspond to these numerically labeled seasons exist in the Overview section and the Seasonal Analysis tables in the Water Quality Results chapter. The axis labeling and plot titling are the same as for the time series and annual box-and-whiskers plots. Digital, reproducible copies of these graphics accompany the report on disk (See Appendices A and B).

For seasonal box-and-whiskers plots of pH, μeq/l H^+ are plotted. For seasonal box-and-whiskers plots of bacteriological data, the log of the measured value is plotted. Hence, the y-axis of a seasonal box-and-whiskers plot for bacteriological parameters is log-linear.

EPA Water Quality Criteria Analysis for Entire Park Study Area

This table essentially summarizes all the individual station-by-station EPA water quality criteria analyses in the study area. (Refer to the EPA Water Quality Criteria Analysis for Station section above for more detailed information on the treatment of special cases in the EPA Water Quality Criteria Analysis for Entire Park Study Area.) This table presents a comparison between the study area's STORET water quality data and applicable national water quality criteria for freshwater and marine aquatic organisms; drinking water; and other concerns. Comparison against applicable State water quality criteria was not feasible given project resources. Appendix F provides the relevant national EPA water quality criteria values. The EPA Water Quality Criteria Analysis for the Entire Park Study Area lists the parameter; the standard type and value; the total number of observations for the parameter at this station; the number of observations that exceeded the standard value; and the proportion of observations that exceeded the standard value. Water quality observations are considered as having exceeded a criterion regardless of whether the criterion represents a maximum acceptable value or a minimum acceptable value. The table also breaks down the water quality criteria analysis on a seasonal basis to allow the reader to discern whether parameter observations tend to exceed criteria during only certain seasons or year round. Although the EPA Water Quality Criteria Analysis for the Entire Park Study Area is a good starting point for assessing potential water quality problems at the park, the reader is strongly encouraged to read the caveat section in the Introduction before drawing conclusions about water quality problems from this table. A digital, reproducible copy of this table accompanies the report on disk (See Appendices A and B).

NPS Servicewide Inventory and Monitoring Program
Level I Water Quality Inventory Data Evaluation and Analysis (IDEA)

One of the objectives of this Baseline Water Quality Data Inventory and Analysis project is to perform an IDEA - an Inventory Data Evaluation and Analysis - to determine the presence and/or absence of Servicewide Inventory and Monitoring Program "Level I" water quality parameter groups in the park's study area. The Strategic Plan for Conducting Baseline Natural Resource Inventories in the National Park Service (National Park Service 1993) identified the basic water quality parameters displayed in Table I as the parameters that all parks must have for "key" waterbodies (determined on the basis of size, uniqueness, threats, etc.) within park boundaries. Since these parameters can be measured in different ways and with different units, there are multiple STORET codes associated with each parameter; hence the concept of parameter groups. The Strategic Plan distinguishes between those parameter groups required for all parks and parameter groups required only on a case-by-case basis.

The IDEA basically compares the parameters listed in the Parameter Period of Record Tabulation and Station/Parameter Period of Record Tabulation with the "Level I" Servicewide Inventory and Monitoring water quality parameter groups, listed in Table I and in Appendix G, and notes, not only the presence or absence of each parameter group, but the total number of observations for each parameter present in the group; the number of

observations between certain time periods; and the total number of stations within the study area at which the parameter was measured. The total number of different (unique) stations measuring parameters for the group is in parentheses on each parameter group's summary line.

The first page of the IDEA lists the missing Servicewide Inventory and Monitoring Program "Level I" groups. If a parameter group appears on this list, no data for any of the parameters defining the group (See Appendix G) was retrieved for it within the study area. So-called non-priority parameter groups may appear in the missing list. Non-priority parameters are park-specific parameters (case-by-case) which may not be applicable to your park. Consequently, if you believe a particular parameter, not included in IDEA (See Appendix G), to be important for your park, you will have to consult the Parameter and Station/Parameter Period of Record Tabulations to determine the presence or absence of this parameter for the park. Although considered a "Level I" parameter, biological data, obtained through rapid bioassessment or other means, is not considered in this report which deals specifically with surface water chemistry. Following the Missing Level I Group list is the Present Level I Group list which displays the summary results for each Servicewide Inventory and Monitoring "Level I" water quality parameter group that was found.

Table I. Basic "Level I" Water Quality Parameters Identified as Required and Optional By the Servicewide Inventory and Monitoring Program for "Key" Park Waterbodies

Required Parameter Groups:
(1) Alkalinity
(2) pH
(3) Conductivity
(4) Dissolved Oxygen
(5) Rapid Bioassessment Baseline (EPA/State protocols, involving fish and macroinvertebrates)
(6) Temperature
(7) Flow

Case-By-Case Parameters Groups:
(8) Toxic Elements
(9) Clarity/Turbidity
(10) Nitrate/Nitrogen
(11) Phosphate/Phosphorus
(12) Chlorophyll
(13) Sulfates
(14) Bacteria

The last page of the IDEA summarizes the information from the Missing and Present Level I Group lists. This page provides information on the temporal and spatial distributions of the data. Included in this table are the total number of observations for each parameter group; the number of observations since January 1, 1985; the percent of the total observations since January 1, 1985; the number of stations measuring each parameter group; the percent of the total number of stations with data measuring the parameter group; the number of observations per station with data; the period-of-record for this parameter group; and the average number of observations per year of the period-of-record.

In interpreting the results of the IDEA, the reader should first consult the Missing Level I Group list. For the parameter groups listed, there was no baseline water quality data within the study area entered in STORET. Consequently, these parameter groups could be a higher priority for data collection. It is important, however, to realize that data within these parameter groups may have been already collected but not entered into STORET. The resources for this project did not enable us to pursue thorough literature and file cabinet reviews to dredge up

every last iota of data. If data exists for certain Servicewide Inventory and Monitoring Program "Level I" water quality parameter groups in a park's file cabinet, it is the park's responsibility to factor that data into their IDEA. Consequently, the listing of a parameter group on the Missing "Level I" Group list is not a WRD endorsement to launch a study to collect these data. The IDEA is intended to simply note that no data exist for these parameter groups in STORET for the park. It is the park's responsibility to ascertain whether such data has already been collected by the park or other entities before embarking on a new study. In fact, in the future the WRD will require that any park study plan proposing to collect baseline water quality data show that they have consulted their Baseline Water Quality Data Inventory and Analysis report and searched in other locations (file cabinets, published literature, etc.) for the data they propose to collect. A similar interpretation springs from the Present "Level I" Group list. Insufficient data density in certain time periods for particular parameter groups is not necessarily cause for launching a new inventory and/or monitoring program. The park should still consult with other potential sources of data. Again, the IDEA is designed to provide only a quick check on data in STORET for the Servicewide Inventory and Monitoring Program "Level I" water quality parameter groups.

Water Quality Observations Outside STORET Edit Criteria for Park

STORET data entered after November 1983 were subjected to rudimentary edit/bounds checking for 190 common parameters (See the STORET Edit Criteria in Appendix C). None of the data entered into STORET prior to that time has been subjected to edit/bounds checking. Moreover, to maintain exact comparability with USGS WATSTORE data, WATSTORE data entered into STORET has never been subjected to the EPA edit/bounds checking. During the pilot test phase of this project, obviously incorrect data was identified from both USGS and other agency data in STORET. As a consequence, all data downloaded from STORET was filtered through the STORET edit criteria to identify parameter observation values that fall outside any edit criterion ranges. This section documents the station name, parameter, date, time, parameter value, agency, and STORET station name of every observation that fell outside the range of an edit criterion. Not all data falling outside an edit criterion are necessarily incorrect. Such data may represent unique or special conditions. Consequently, every observation falling outside a STORET edit criterion was scrutinized to determine, in our best professional judgement, whether the value was in the realm of possibility or obviously incorrect. Water quality observations that appeared to be obviously incorrect are marked with an "X" in the Disposition column of this table. These values were not retrieved or included in any of the inventory tables or graphs. Water quality values outside a STORET edit criterion but within the realm of possibility were retained and included in inventory tables and graphs. The Water Quality Observations Outside STORET Edit Criteria for Park table documents all values that were outside an edit criterion range. This documentation is also necessitated by the fact that agencies can override the STORET edit criteria for individual observations. Although the edit criteria eliminate some potentially "bad" data from the report, the probability of other incorrect data, for both the 190 parameters that are edit/bound checked and all the other STORET parameters that aren't error checked, is high. Readers should consult the Caveat section in the Introduction for guidelines on the use and interpretation of STORET data. The responsibility for correcting these observations rests with the collecting agency.

WATER QUALITY RESULTS

OVERVIEW FOR CHIC

Study Area Boundary Description

The study area includes the park and all areas within at least 3 miles upstream of the park unit boundary and at least 1 mile downstream.

	Study Area	Park
GIS Estimated Acreage:	123402	9982
# STORET Stations:	156	117
# Stations With No Data:	0	0
# Stations With No Stat. Analysis:	1	1
# Longer Term Stations:	28	20
Date of STORET Retrieval:	09/10/97	09/10/97
Period of Record:	09/10/51-08/23/95	09/16/59-08/23/95
# Parameters Measured:	181	149
# Water Quality Observations:	30222	19985
# Industrial/Municipal Facilities:	2	1
# Drinking Water Intakes:	8	6
# Water Gages:	8	5
# Water Impoundments:	25	2
# Total Plots:	134	0
# Time Series:	41	0
# Annual:	52	0
# Seasonal:	41	0

Hydrologic Definition of Seasons:

1. September 15 - February 28
2. March 1 - June 30
3. July 1 - September 14

Time Series Plot Criteria:

To be included in the time series plots, a station/parameter combination must have at least 7 years and at least 32 observations.

Annual Analysis Criteria:

To be included in the annual box-and-whisker plots, a station/parameter combination must have at least 9 observations in each of at least 7 years.

To be included in the annual analysis tables, a station/parameter combination must have at least 9 observations in each of at least 4 years.

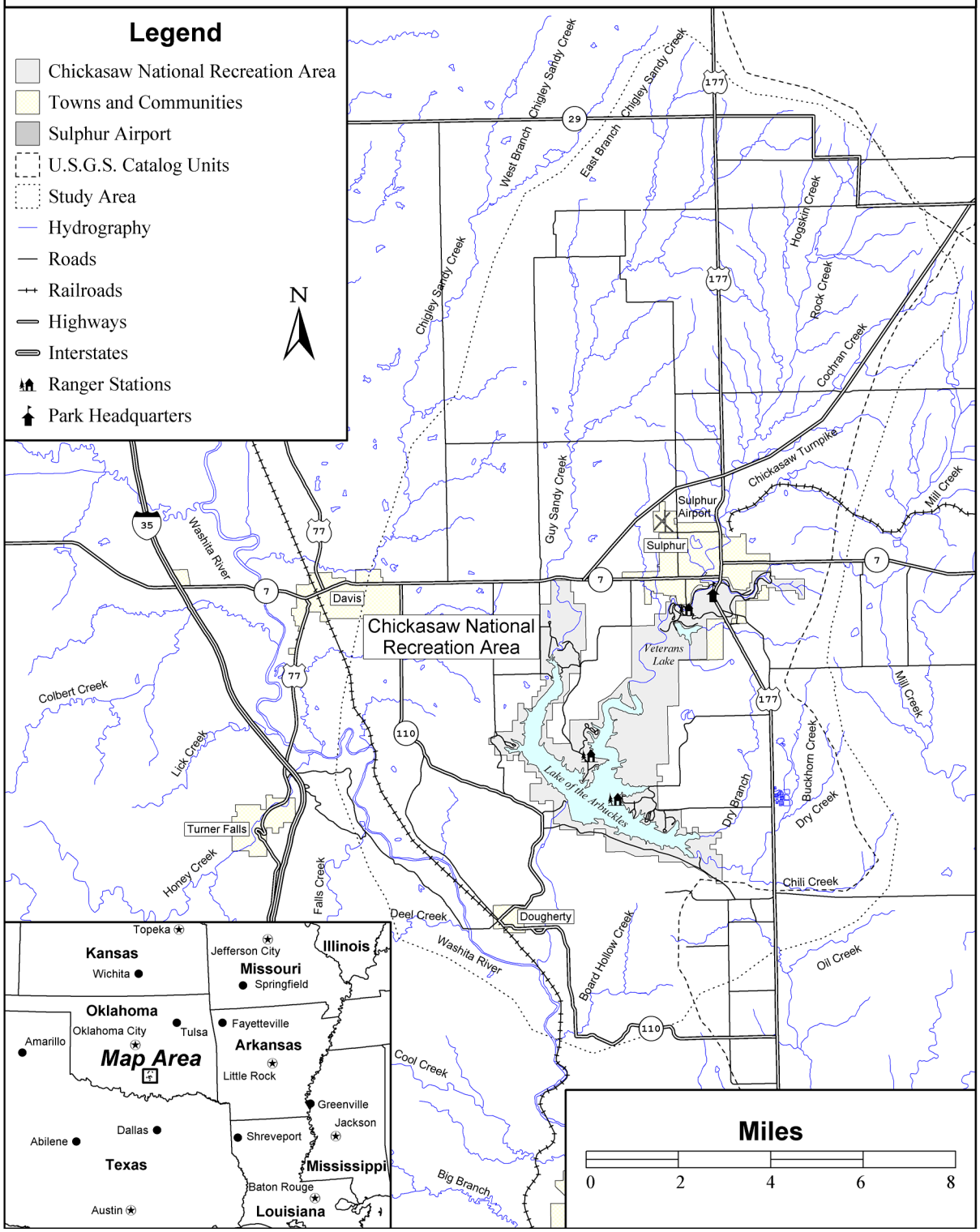
Seasonal Analysis Criteria:

To be included in the seasonal box-and-whisker plots, a station/parameter combination must have at least 9 observations in each of 2 seasons and a period of record of at least 7 years and observations in at least 3 of the 7 years.

To be included in the seasonal analysis tables, a station/parameter combination must have at least 9 observations in each of 2 seasons and a period of record of at least 6 years and observations in at least 3 of the 6 years.

Chickasaw National Recreation Area

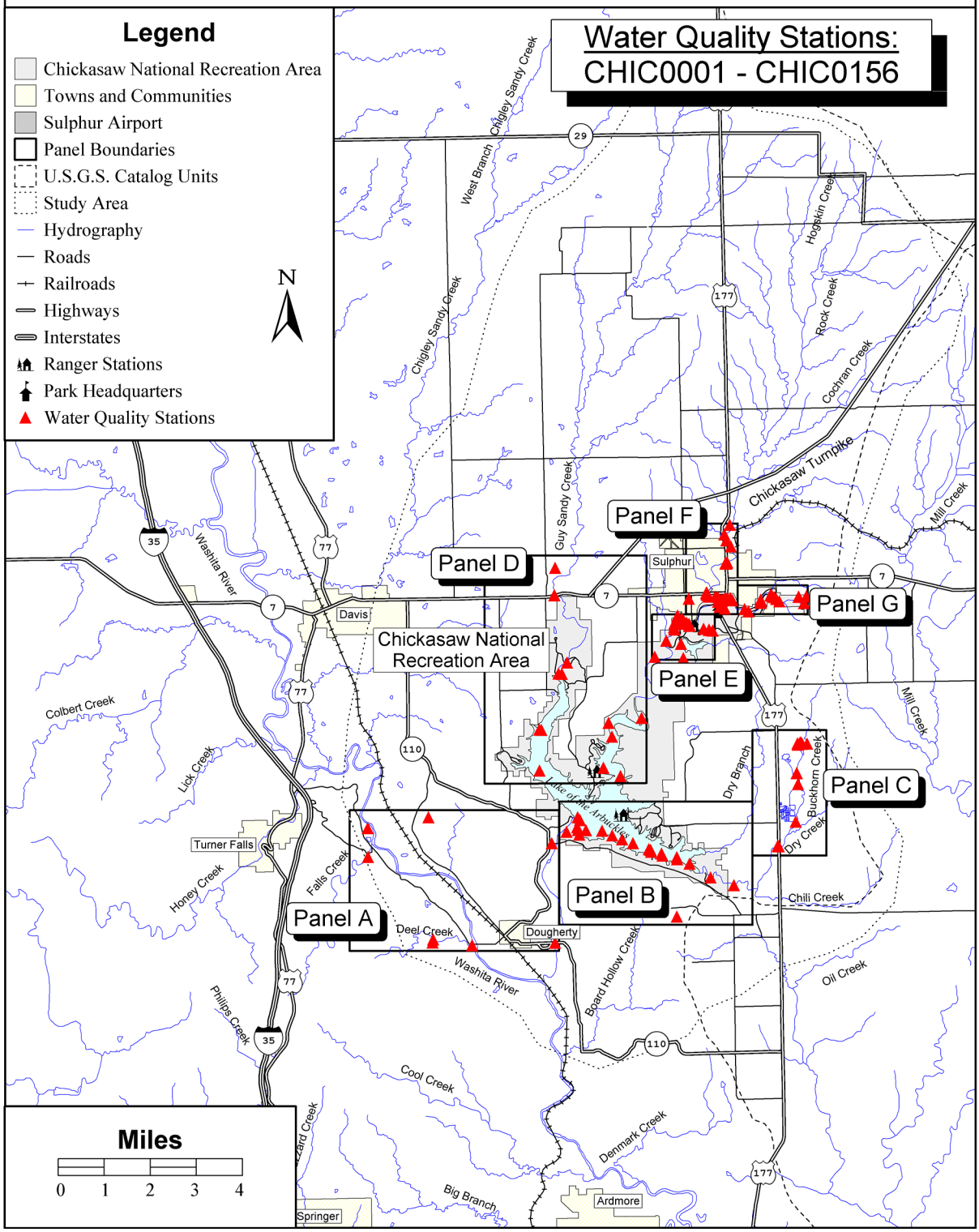
Regional Location Map

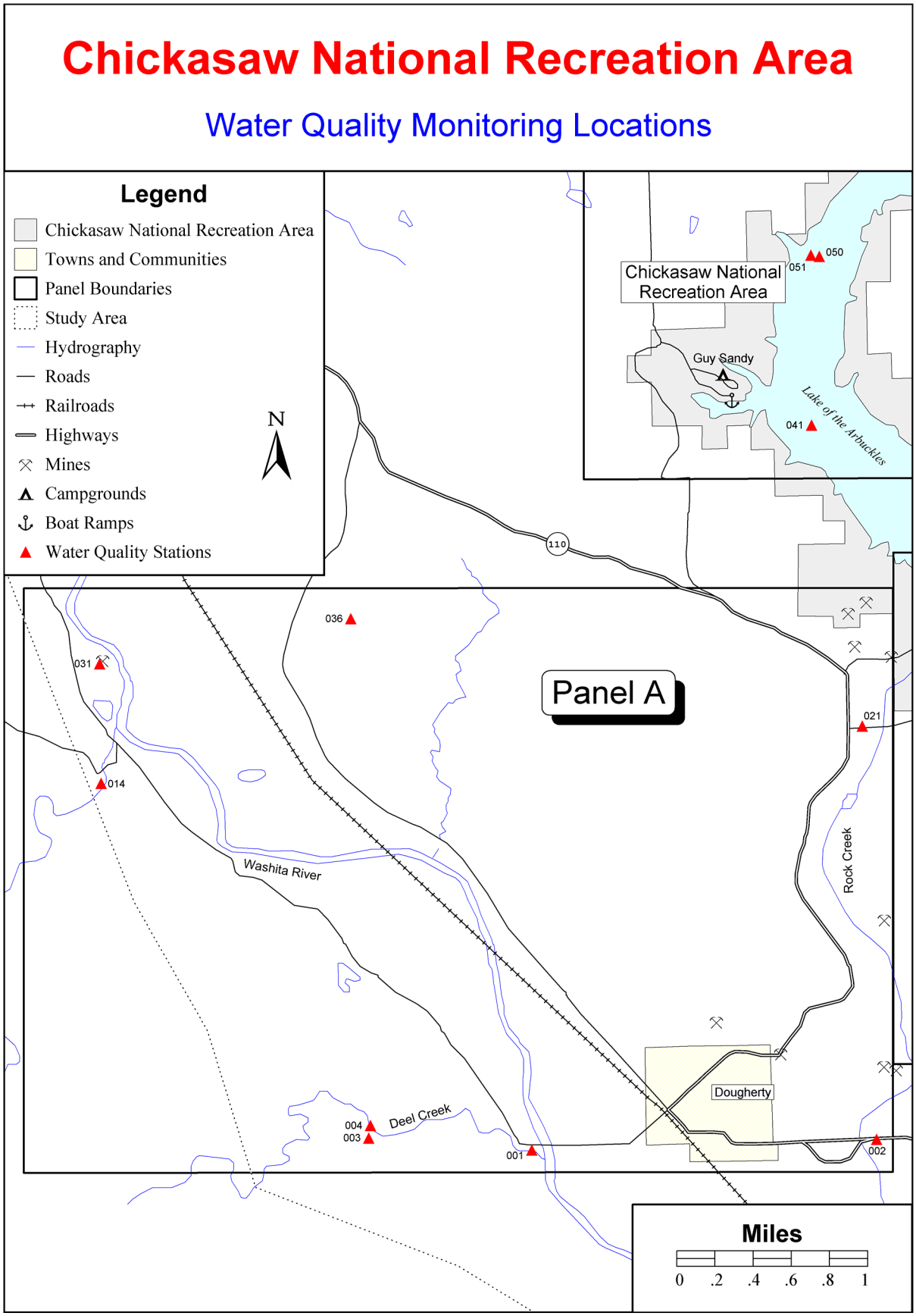


Chickasaw National Recreation Area

Water Quality Monitoring Locations

Graphic Panel Index




Chickasaw National Recreation Area
Water Quality Monitoring Locations
Legend
Chickasaw National Recreation Area
Towns and Communities
Panel Boundaries
Study Area
Hydrography
Roads
Railroads
Highways
Mines
Campgrounds
Boat Ramps
Water Quality Stations
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Chickasaw National Recreation Area
Guy Sandy
Lake of the Arbuckles
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051
041
110
036
031
014
Panel A
021
Washita River
Rock Creek
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Miles
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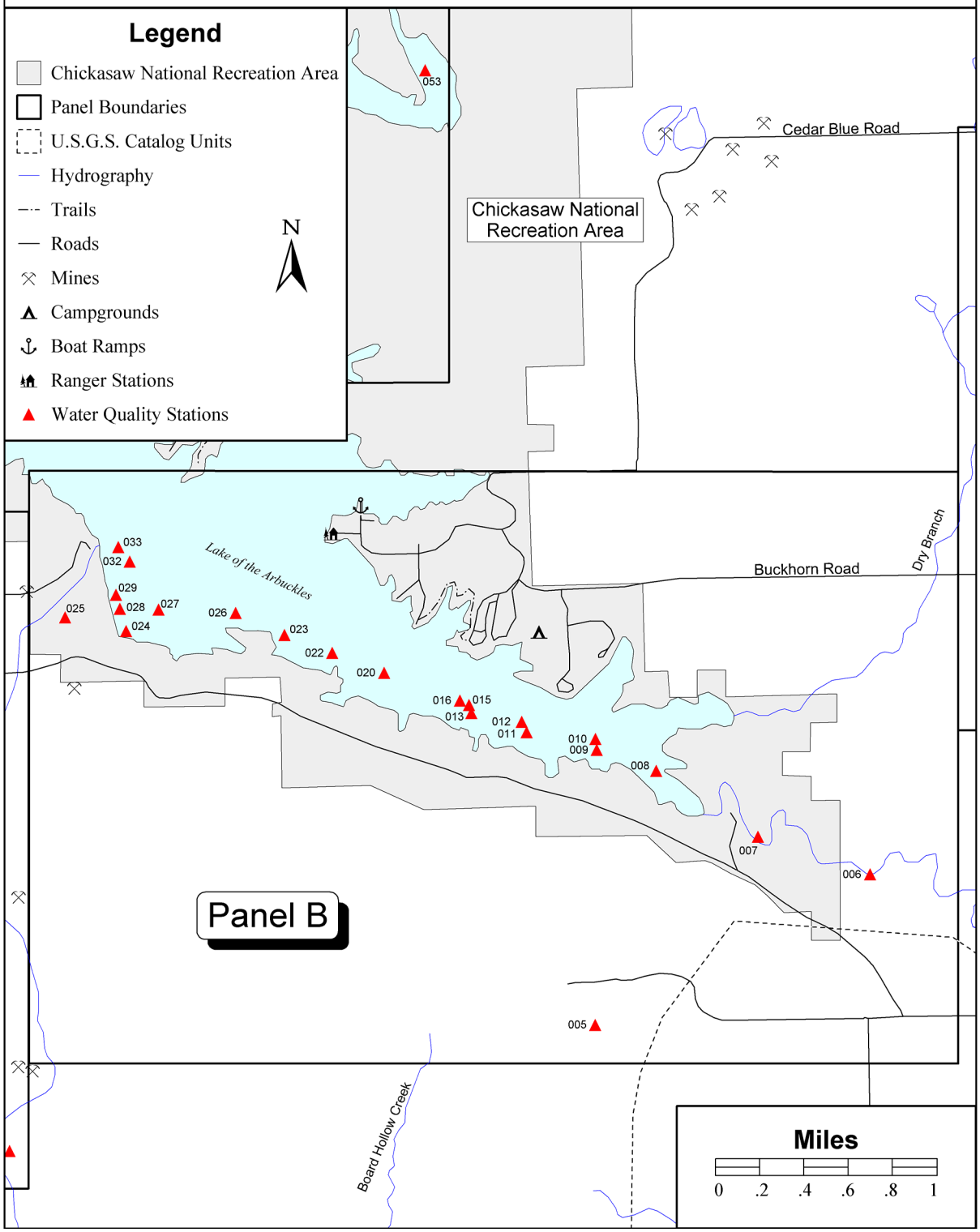
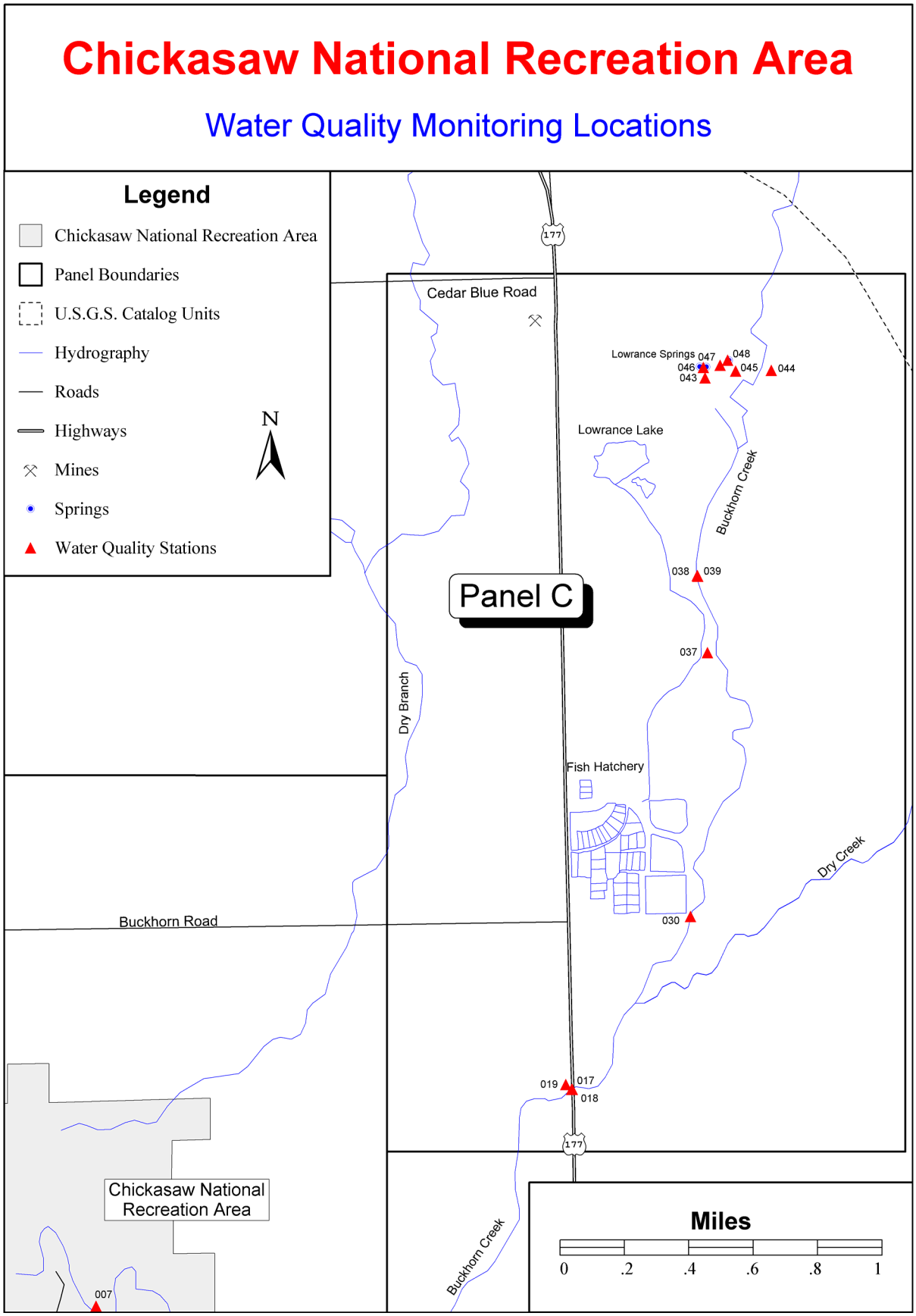
Chickasaw National Recreation Area

Water Quality Monitoring Locations




Chickasaw National Recreation Area
Water Quality Monitoring Locations
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Lowrance Lake
Buckhorn Creek
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Dry Branch
Fish Hatchery
Dry Creek
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Buckhorn Road
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Chickasaw National Recreation Area
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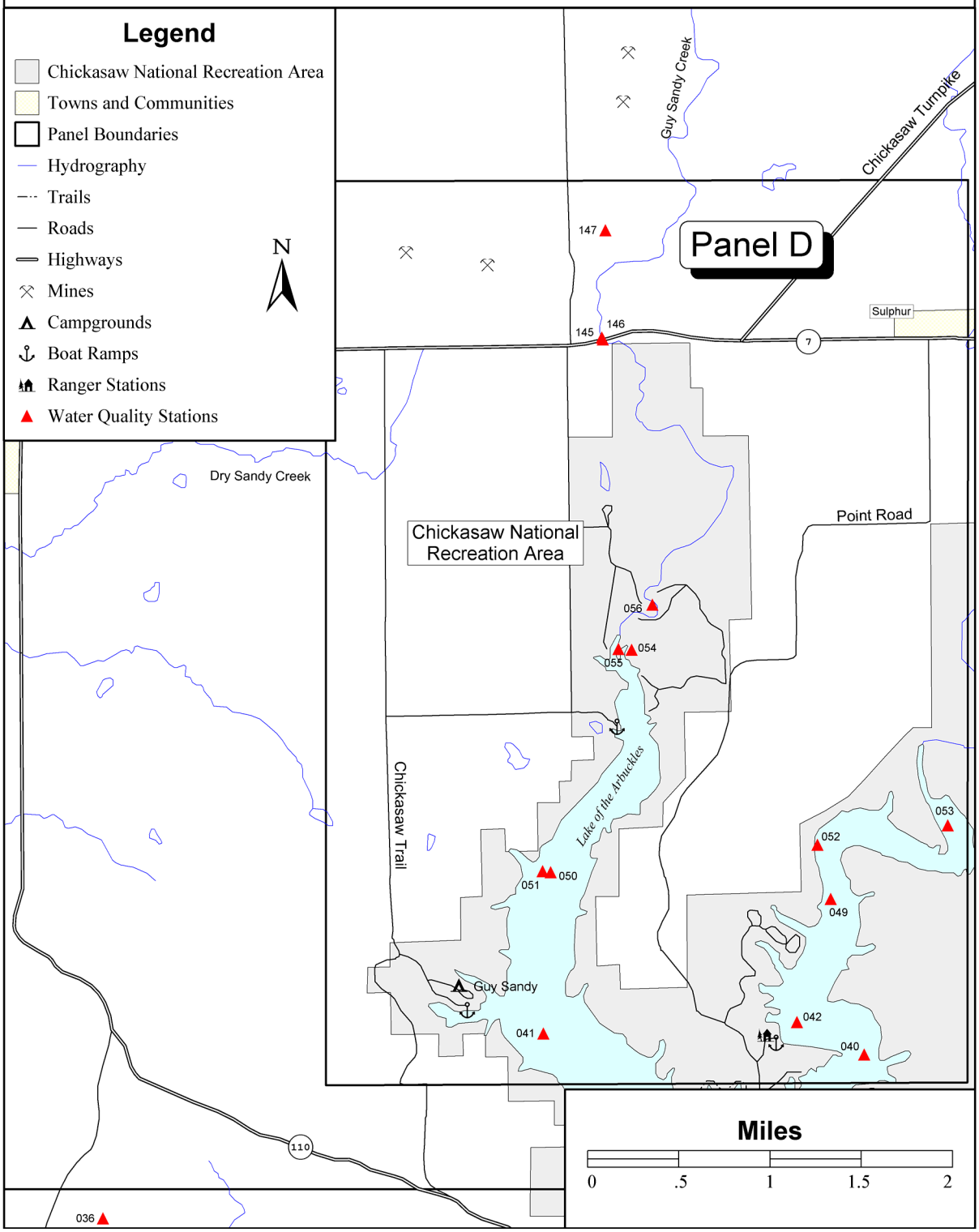
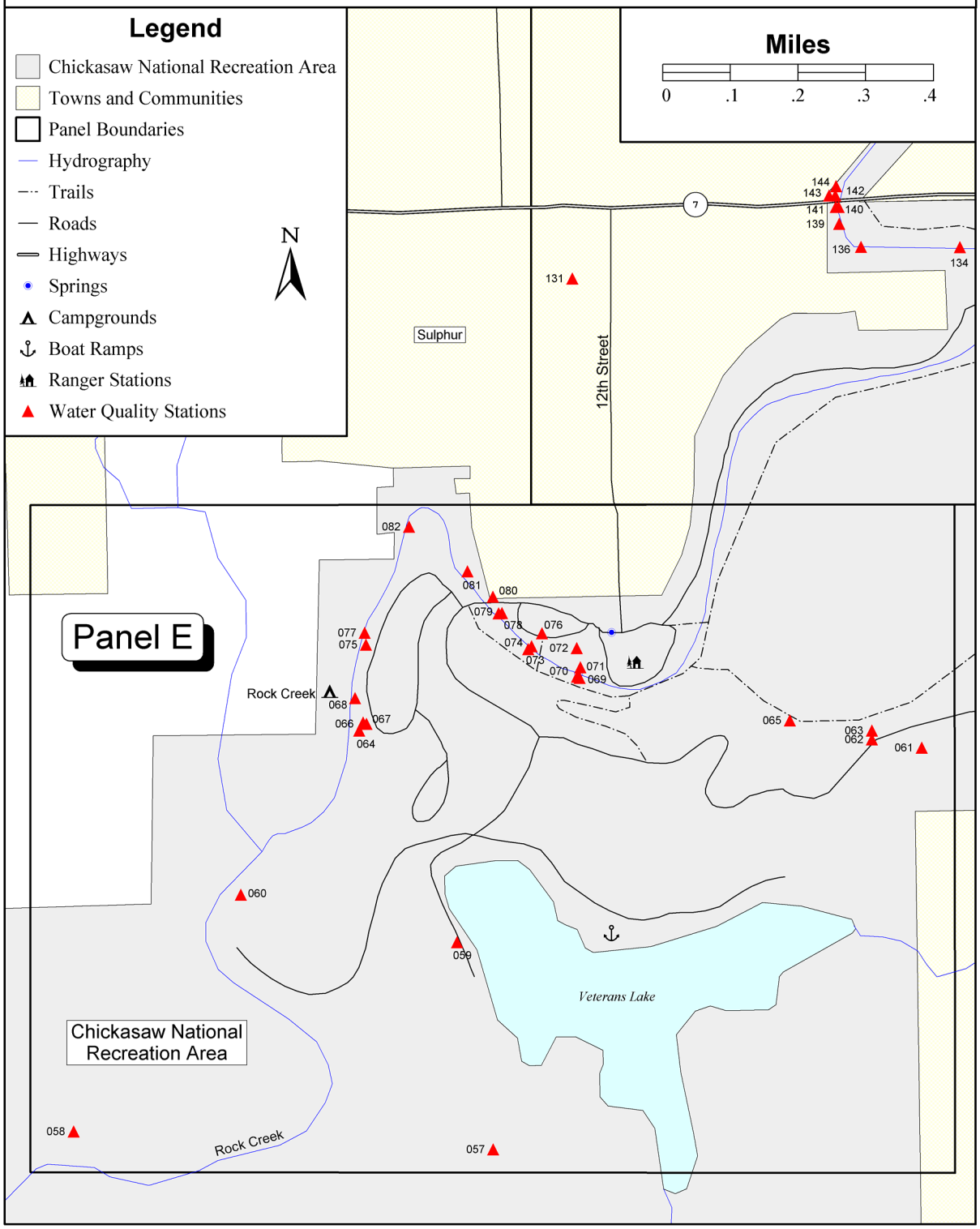
Chickasaw National Recreation Area

Water Quality Monitoring Locations



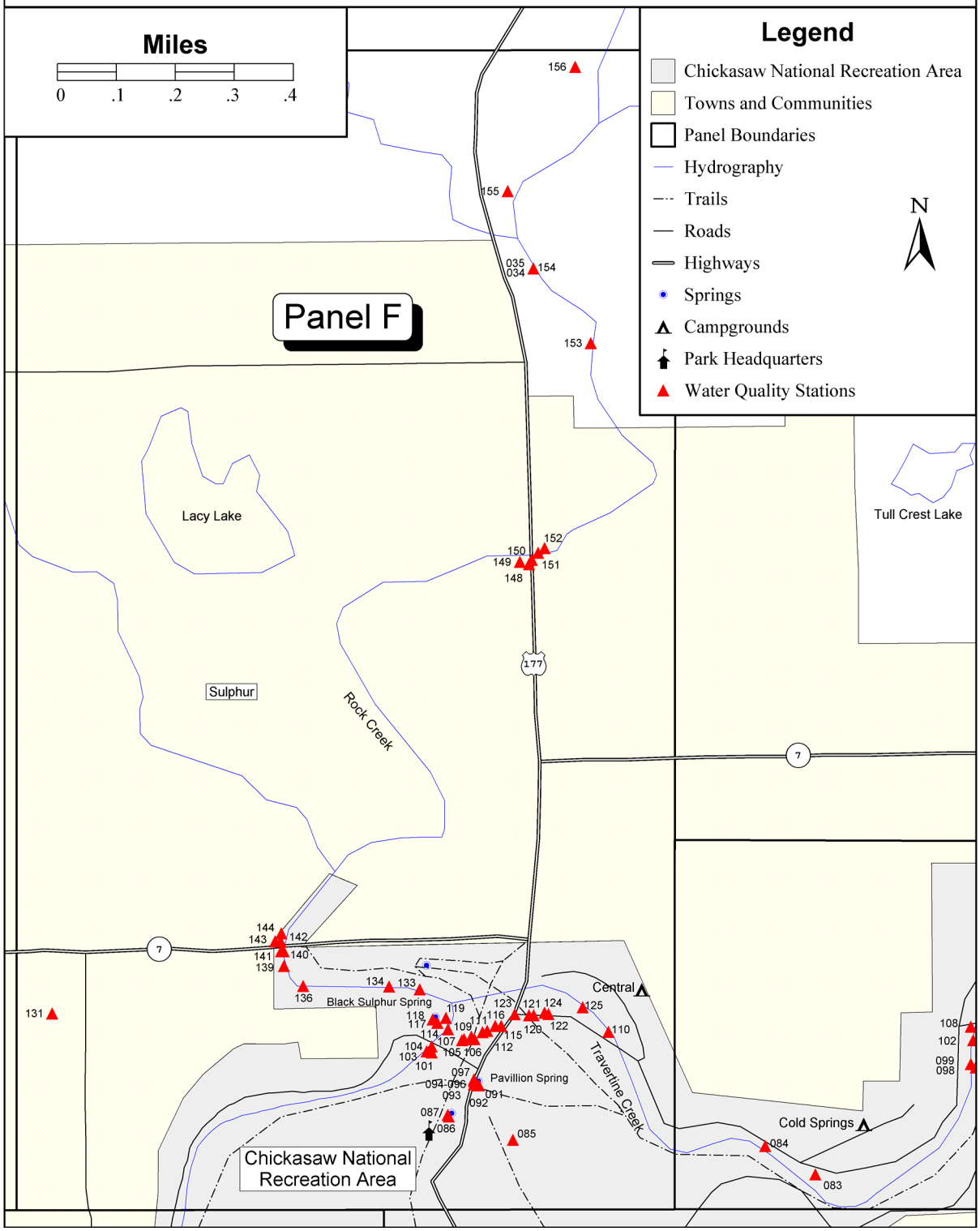
Chickasaw National Recreation Area

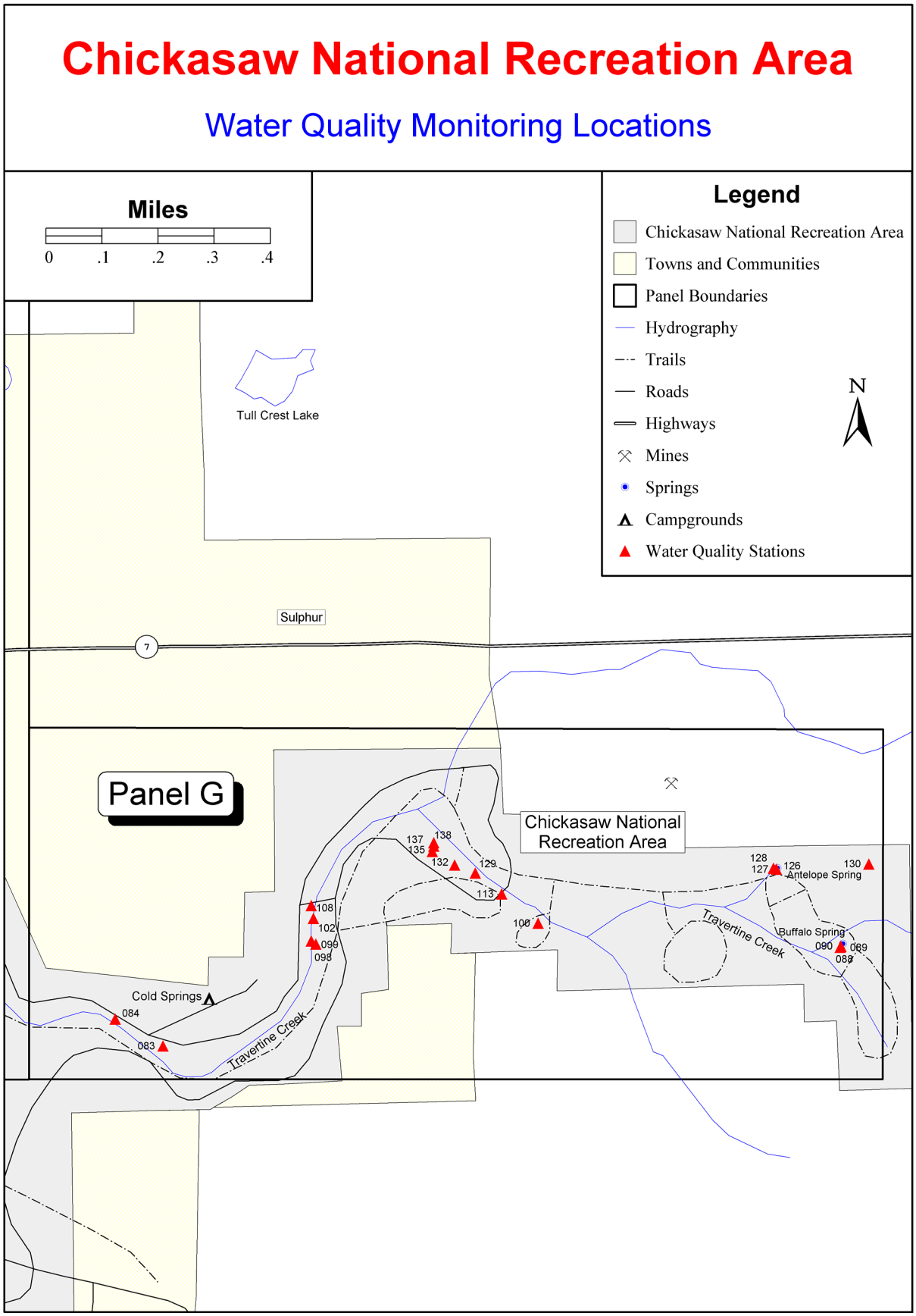
Water Quality Monitoring Locations



Chickasaw National Recreation Area

Water Quality Monitoring Locations




Chickasaw National Recreation Area
Water Quality Monitoring Locations
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Chickasaw National Recreation Area
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Antelope Spring
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Travertine Creek
Buffalo Spring
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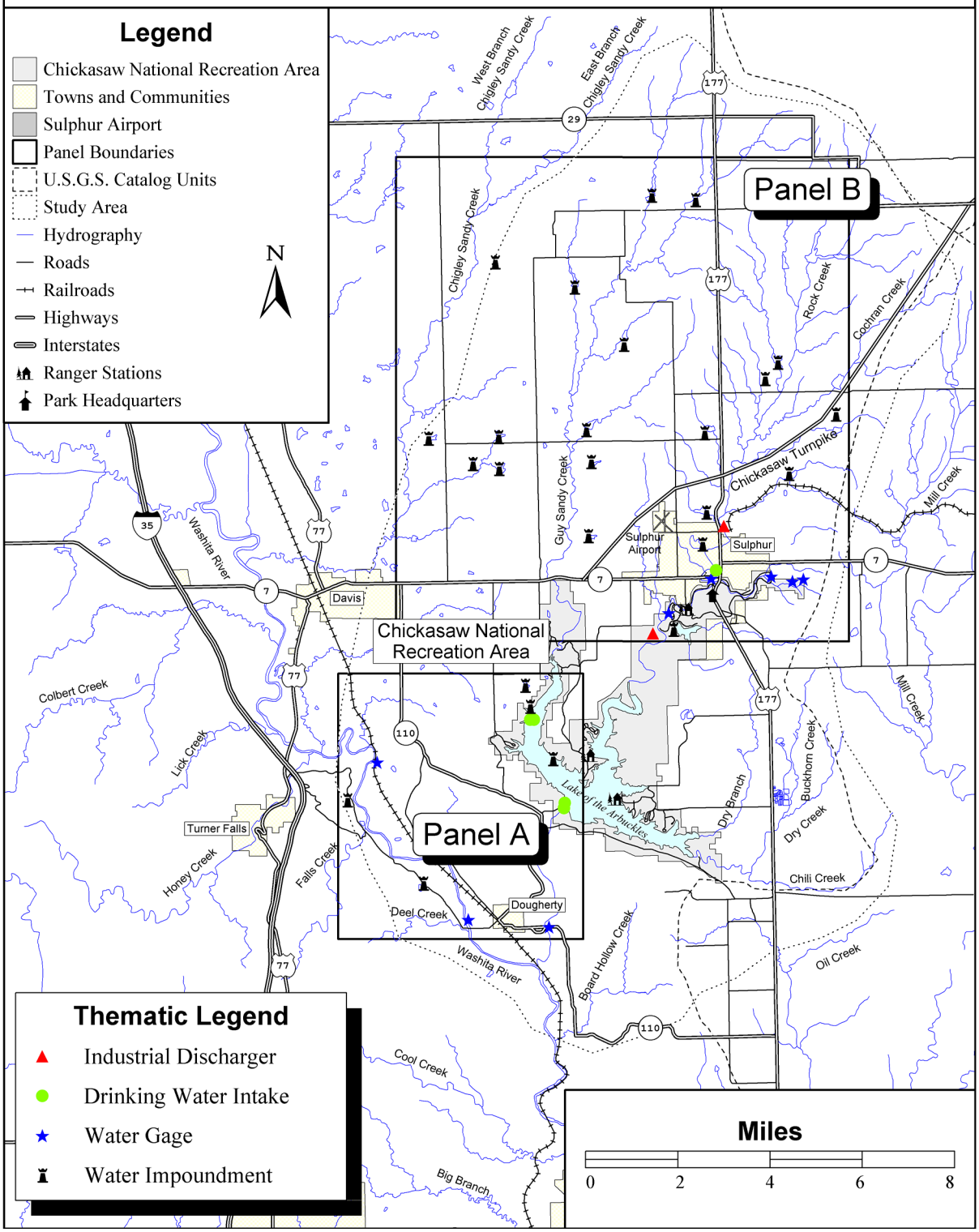
088

Chickasaw National Recreation Area

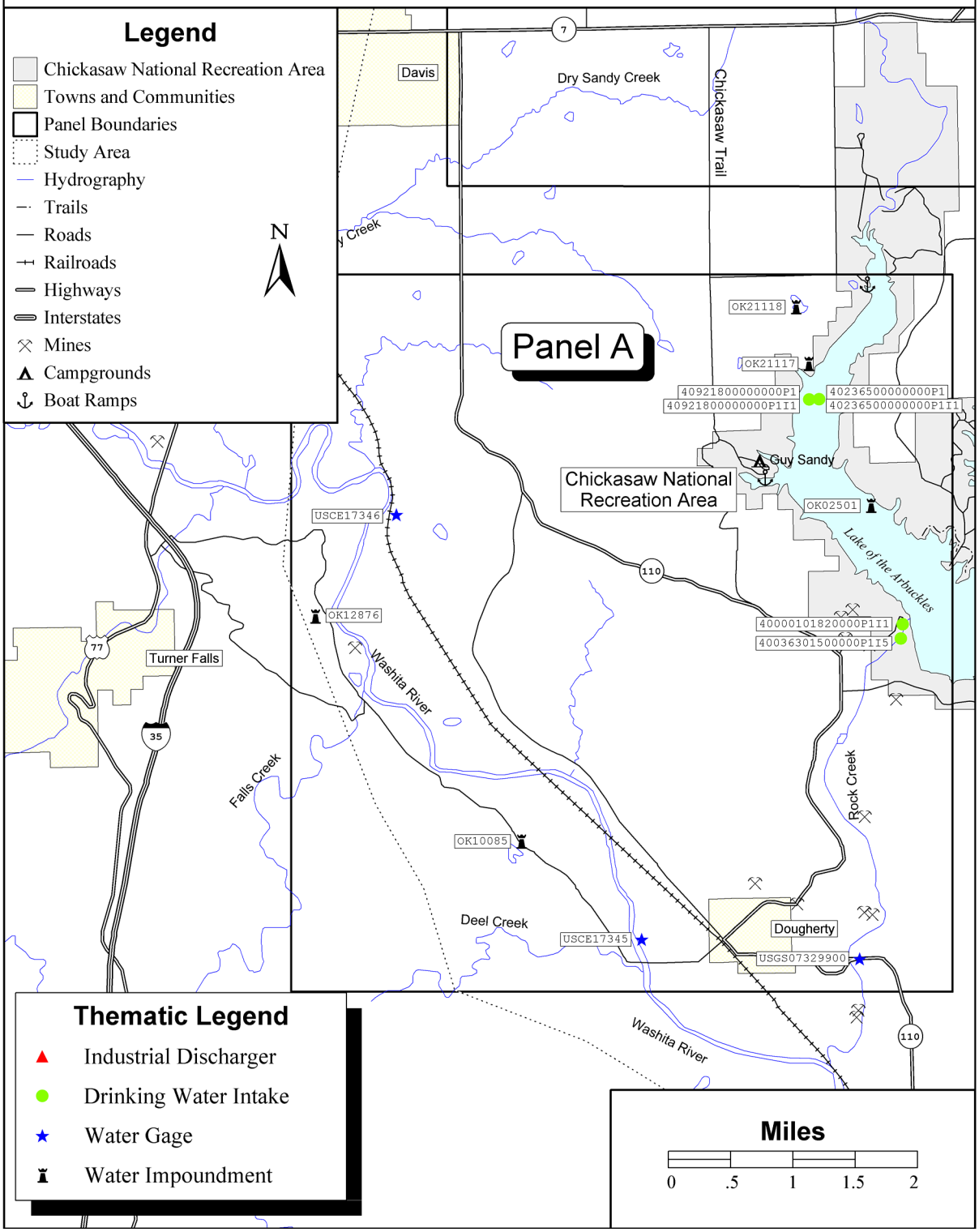
Dischargers, Drinking Intakes, Water Gages, & Water Impoundments

Graphic Panel Index



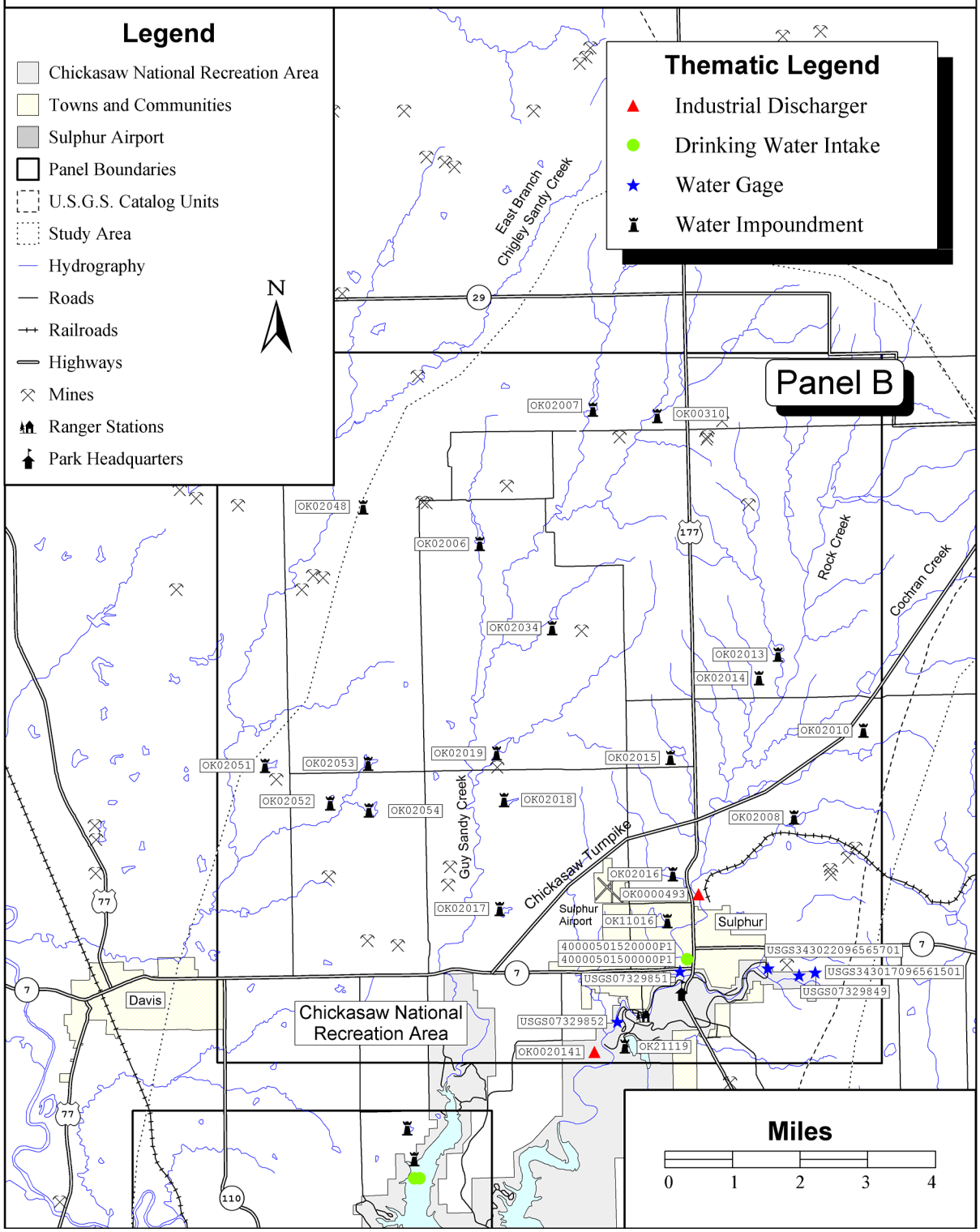
Chickasaw National Recreation Area

Dischargers, Drinking Intakes, Water Gages, & Water Impoundments



Chickasaw National Recreation Area

Dischargers, Drinking Intakes, Water Gages, & Water Impoundments



Industrial Facility Discharges, Drinking Water Intakes, Water Gages, and Water Impoundments Within the CHIC Study Area

Industrial Facility Discharges

Site ID	Station/Facility Name	Address	City	Facility Receiving Water Name
OK0000493	OK GAS & ELEC ARBUCKLE	P O BOX 321	OKLAHOMA CITY	1080
OK0020141	SULPHUR, CITY OF	400 WEST MUSKOGEE	SULPHUR	DRY SANDY CREEK WASHITA RIVER

Drinking Water Intakes

Site ID	Station/Facility Name	City	Population Served	Avg. Daily Production (Gal./Day)
40000101820000P1I1	ARBUCKLE LK	ARDMORE	9000	0000.00
40000501500000P1	SULPHUR WD	SULPHUR	400	6000.00
40000501520000P1	SULPHUR WD	SULPHUR	1200	0000.00
40036301500000P1I5	LAKE OF THE ARBUCKL	ARDMORE	32000	0.00
40236500000000P1	TREATMENT PLANT	DAVIS	3000	
40236500000000P1I1	ARBUCKLE LK	DAVIS	3000	
40921800000000P1	TREATMENT PLANT	WYNNEWOOD	2400	
40921800000000P1I1	ARBUCKLE LK	WYNNEWOOD	2400	

Water Gages

Site ID	Station Name	Site Type	Drainage Area (Square Miles)	Begin Year	End Year
USCE17345	WASHITA R NR DOUGHER	Stream			
USCE17346	WASHITA R NR DOUGHER	Stream			
USGS07329900	ROCK CREEK AT DOUGHERTY, OK		3800.00	1957	1967
USGS07329849	ANTELOPE SPRING AT SULPHUR, OK	Spring		1986	1989
USGS07329851	OUTFLOW FROM VENDOME WELL AT SULPHUR, OK	Stream		1986	1989
USGS07329852	ROCK CREEK AT SULPHUR, OK	Stream	44.10	1990	1996
USGS343017096561501	01S-03E-01 ABA 1 SULPHUR EAST GW WELL	Well			
USGS343022096565701	01S-03E-01 BBB 1 SULPHUR WEST GW WELL	Well			

Water Impoundments

Site ID	Impoundment Name	Owner	Primary Purpose	Type of Dam	Downstream Hazard	Year Completed
OK00310	ROCK CREEK SITE-4A	MURRAY CO CONS DIST	Flood	Earth	Low	1969
OK02006	SCS-ROCK CREEK SITE-2	MURRAY CO CONS DIST	Flood	Earth	Low	1964
OK02007	SCS-ROCK CREEK SITE-3	MURRAY CO CONS DIST	Flood	Earth	Low	1964
OK02008	SCS-ROCK CREEK SITE 17	MURRAY CO CONS DIST	Flood	Earth	Low	1961
OK02010	SCS-ROCK CREEK SITE-15	MURRAY CO CONS DIST	Flood	Earth	Significant	1962
OK02013	SCS-ROCK CREEK SITE-12	MURRAY CO CONS DIST	Flood	Earth	Low	1962
OK02014	SCS-ROCK CREEK SITE-11	MURRAY CO CONS DIST	Flood	Earth	Low	1962
OK02015	SCS-ROCK CREEK SITE-10	MURRAY CO CONS DIST	Flood	Earth	Significant	1961
OK02016	SCS-ROCK CREEK SITE-9	MURRAY CO CONS DIST	Flood	Earth	Low	1961
OK02017	SCS-ROCK CREEK SITE-8	MURRAY CO CONS DIST	Flood	Earth	Low	1964
OK02018	SCS-ROCK CREEK SITE-7	MURRAY CO CONS DIST	Flood	Earth	Low	1964
OK02019	SCS-ROCK CREEK SITE-6	MURRAY CO CONS DIST	Flood	Earth	Low	1966

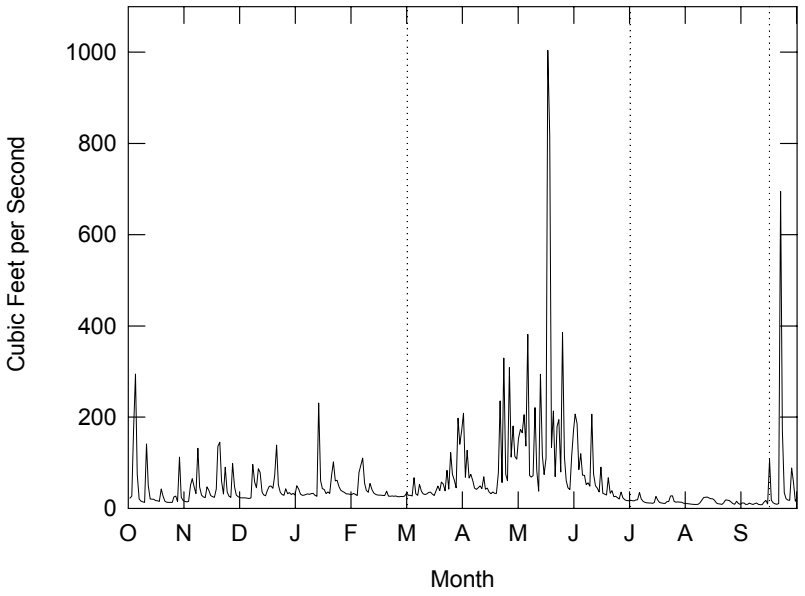
Industrial Facility Discharges, Drinking Water Intakes, Water Gages, and Water Impoundments Within the CHIC Study Area

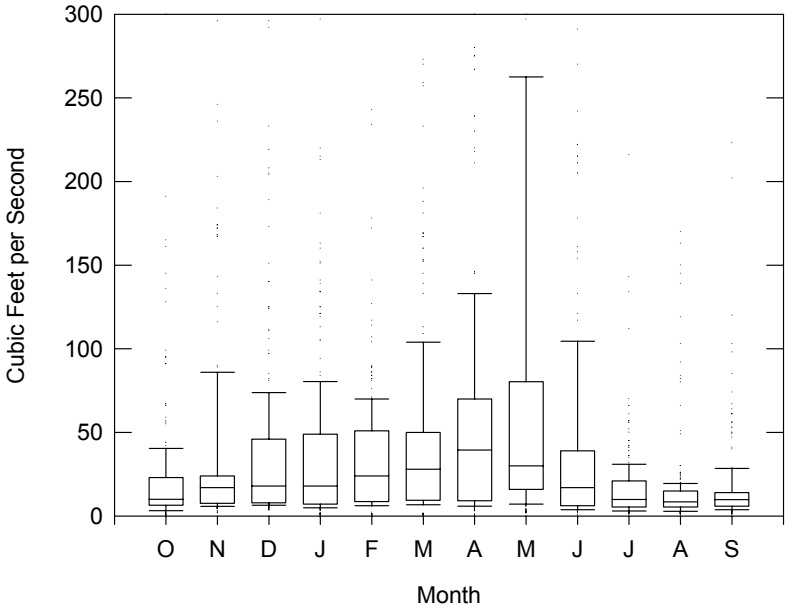
Water Impoundments

Site ID	Impoundment Name	Owner	Primary Purpose	Type of Dam	Downstream Hazard	Year Completed
OK02034	SCS-ROCK CREEK SITE-5	MURRAY CO CONS DIST	Flood	Earth	Low	1964
OK02048	SCS-CHIGLEY SANDY CREEK SITE-7	MURRAY CO CONS DIST	Flood	Earth	Low	1955
OK02051	SCS-CHIGLEY SANDY CREEK SITE-1	MURRAY CO CONS DIST	Flood	Earth	Low	1955
OK02052	SCS-CHIGLEY SANDY CREEK SITE-1	MURRAY CO CONS.DIST	Flood	Earth	Low	1955
OK02053	SCS-CHIGLEY SANDY CREEK SITE-1	MURRAY CO CONS DIST	Flood	Earth	Low	1955
OK02054	SCS-CHIGLEY SANDY CREEK SITE-1	MURRAY CO CONS DIST	Flood	Earth	Low	1956
OK02501	ARBUCKLE LAKE	DOI BR	Supply	Earth	High	1966
OK10085	AMOS CONST. CO.	AMOS CONST.	Rec.	Earth	Significant	1940
OK11016	LACY	SULPHUR-DAVIS ELKS LODGE	Rec.	Earth	High	1920
OK12876	HAGEE GSS NO.1	GERALD HAGEE	Farm	Earth	Low	1979
OK21117	OKNONAME 09903	J. THOMAS	Rec.	Earth	Low	1940
OK21118	OKNONAME 09902	J. THOMAS	Rec.	Earth	Low	1940
OK21119	VETERANS LAKE	CITY OF SULPHR	Rec.	Earth	Low	1950

REPRESENTATIVE MEAN ANNUAL HYDROGRAPH FOR SEASONAL ANALYSIS

CHICKASAW NATIONAL RECREATION AREA
Rock Creek at Dougherty, OK
07329900, 11 year record





Representative mean annual hydrograph (top) and distribution of daily flows by month (bottom) for hydrologic season determination. Box and whiskers represent a five number summary; bottom whisker cap is 10th percentile, bottom of box is 25th percentile, internal line is median, top of box is 75th percentile, and top whisker is 90th percentile. Hydrologic seasons for Chickasaw National Recreation Area are: Mar. 1 to Jun. 30, Jul. 1 to Sep. 14, and Sep. 15 to Feb. 28.

CONTACTS FOR AGENCY CODES RETRIEVED FOR CHIC

AGENCY	PRIMARY CONTACT NAME	ORGANIZATION	PHONE NUMBER(S)	
11NPSWRD	TUCKER, DEAN	NATIONAL PARK SERVICE	(970)225-3516	(970)225-3518
112WRD	WILLIAMS, OWEN	US GEOLOGICAL SURVEY	(703)648-5610	
11EPALES	LAMBOU, VICTOR W.	USEPA	(702)798-2259	
21OK13II	PARRISH, DAVE	USEPA REGION 6	(214)655-2289	

QUANTITY OF DATA RETRIEVED FOR CHIC BY AGENCY CODE

WITHIN THE ENTIRE STUDY AREA (S.A.) AND JUST WITHIN THE PARK

		Period of Record		Water Quality Stations		Longer Term[1] Stations		No Data Stations		Water Quality Observations		Water Quality Parameters	
Agency	Organization	Study Area /	Park Only	S.A. /	Park	S.A. /	Park	S.A. /	Park	S.A. /	Park	S.A. /	Park
11NPSWRD	NATIONAL PARK SERVICE	01/28/67-03/04/94	01/28/67-03/04/94	118	96	26	19	0	0	26075	17230	102	100
112WRD	US GEOLOGICAL SURVEY	09/10/51-08/23/95	09/16/59-08/23/95	27	16	2	1	0	0	3091	1932	106	75
11EPALES	USEPA	03/30/73-10/20/75	03/30/73-10/20/75	8	5	0	0	0	0	1011	823	19	19
21OK13II	USEPA REGION 6	05/06/69-12/11/70	No Data in Park	3	0	0	0	0	0	45	0	21	0
Totals		09/10/51-08/23/95	09/16/59-08/23/95	156	117	28	20	0	0	30222	19985	181	149

[1]Station With At Least 6 Parameters Having An Average of 1 Or More Observations Per Year During a Period of Record Extending At Least 2 Years.

Station Period of Record Tabulation
From 09/10/51 To 08/23/95

Station Ident.	Location Description	In Park	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75
CHIC0001	DEEL CK.200 FT UPSTREAM OF WASHITA R. CONFLUENCE	No	4	0	4	0
CHIC0002[1]	ROCK CREEK AT DOUGHERTY, OK	No	773	0	0	773
CHIC0003	UNNAMED SPRING 1.5 MILES WEST OF DOUGHERTY	No	4	0	4	0
CHIC0004	UNNAMED SPRING 1.5 MILES WEST OF DOUGHERTY	No	2	0	2	0
CHIC0005	02S-03E-09 AAB 1	No	43	5	38	0
CHIC0006[1]	Buckhorn Creek 3.3m Below Catfish Farm	No	1145	1145	0	0
CHIC0007	BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	27	0	27	0
CHIC0008	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 1M DEPTH	Yes	20	0	20	0
CHIC0009	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 2M DEPTH	Yes	20	0	20	0
CHIC0010	BUCKHORN CREEK ARM OF ARBUCKLE RESERVOIR	Yes	10	10	0	0
CHIC0011	BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	172	0	172	0
CHIC0012	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 4M DEPTH	Yes	20	0	20	0
CHIC0013	BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	268	0	0	268
CHIC0014	FALLS CREEK ABOVE PRICE FALLS	No	15	0	15	0
CHIC0015	ARBUCKLE LAKE	Yes	151	0	0	151
CHIC0016	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 7M DEPTH	Yes	20	0	20	0
CHIC0017[1]	Buckhorn Creek 0.9m Below Catfish Farm	No	1205	1205	0	0
CHIC0018	BUCKHORN CREEK AT HIGHWAY 177	No	82	0	82	0
CHIC0019	BUCKHORNE CREEK	No	59	0	49	10
CHIC0020	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 11M DEPTH	Yes	20	0	20	0
CHIC0021	ROCK CREEK	No	64	0	53	11
CHIC0022	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 15M DEPTH	Yes	20	0	20	0
CHIC0023	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 19M DEPTH	Yes	20	0	20	0
CHIC0024	ARBUCKLE LAKE	Yes	250	0	0	250
CHIC0025	ARBUCKLE DAM SPILLWAY	Yes	9	0	9	0
CHIC0026	ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 24M DEPTH	Yes	20	0	20	0
CHIC0027	ARBUCKLE RESERVOIR IN CENTRAL POOL	Yes	79	0	79	0
CHIC0028	CENTRAL POOL NEAR DAM ON ARBUCKLE RESERVOIR	Yes	1056	0	0	1056
CHIC0029	ARBUCKLE RESERVOIR NEXT TO ARBUCKLE DAM	Yes	47	0	47	0
CHIC0030[1]	Buckhorn Creek Just Below Catfish Farm	No	1205	1205	0	0
CHIC0031	02S-02E-33 CBB 1	No	39	0	39	0
CHIC0032	CENTRAL POOL OF ARBUCKLE RESERVOIR	Yes	140	0	140	0
CHIC0033	ARBUCKLE RESERVOIR NEAR CENTRAL POOL	Yes	133	0	133	0
CHIC0034		No	19	0	0	19
CHIC0035		No	19	0	0	19
CHIC0036		No	7	0	0	7
CHIC0037	BUCKHORN CREEK 1 MILE SOUTH OF LOWRANCE SPRINGS	No	10	0	10	0
CHIC0038	BUCKHORN CREEK 3/4 MI. SOUTH OF LOWRANCE SPRINGS	No	8	0	8	0
CHIC0039[1]	Buckhorn Creek 0.9m Below Lowrance Springs	No	1206	1206	0	0
CHIC0040	ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	91	0	91	0
CHIC0041	GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	87	0	87	0
CHIC0042	ROCK CREEK ARM OF ARBUCKLE RESERVOIR	Yes	10	10	0	0
CHIC0043	01S-03E-24 BDA 2 LOWRANCE SPRINGS 1	No	19	19	0	0
CHIC0044	LOWRANCE SPRINGS NR DRAKE, OK	No	48	0	0	48
CHIC0045	01S-03E-24 ACB 1 LOWRANCE SPRING 2	No	21	21	0	0
CHIC0046	UNNAMED SPRING NEXT TO LOWRANCE SPRINGS	No	4	0	4	0
CHIC0047	01S-03E-24 BDA 1	No	44	5	39	0
CHIC0048[1]	Buckhorn Creek at Lowrance Springs	No	1177	1177	0	0
CHIC0049	ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	268	0	0	268
CHIC0050	GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	268	0	0	268
CHIC0051	ARBUCKLE LAKE	Yes	168	0	0	168
CHIC0052	ARBUCKLE LAKE	Yes	194	0	0	194
CHIC0053	ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	24	0	24	0
CHIC0054	GUY SANDY CREEK ARM OF ARBUCKLE RESERVOIR	Yes	10	10	0	0
CHIC0055	GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR	Yes	41	0	41	0
CHIC0056[1]	Guy Sandy Creek near Lake of the Arbuckles	Yes	1147	1147	0	0
CHIC0057	ROCK CREEK	Yes	60	0	49	11
CHIC0058	01S-03E-09 BDAC 1 SULPHUR TREATMENT PLANT	Yes	18	0	18	0
CHIC0059	VETERANS LAKE AT DAM	Yes	42	42	0	0
CHIC0060	ROCK CREEK S OF PLATT NATL PK NR SULPHUR, OK	Yes	54	0	0	54
CHIC0061[1]	Sulphur Bromide Spring	Yes	151	151	0	0
CHIC0062	01S-03E-03 DCB 1 RAVINE SPRING	Yes	19	19	0	0
CHIC0063[1]	Taff's Spring	Yes	162	162	0	0
CHIC0064	ROCK CREEK 200 YD SOUTH OF SIPHON AT CAMPGROUND	Yes	9	0	9	0
CHIC0065[1]	Red Flag Spring	Yes	161	161	0	0
CHIC0066[1]	ROCK CREEK AT SULPHUR, OK	Yes	1595	1595	0	0
CHIC0067	ROCK CREEK BELOW INVERTED SIPHON AT CAMPGROUNDS	Yes	27	0	27	0
CHIC0068	01S-03E-04 DACD 1 BELOW SIPHONS CAMPGROUND	Yes	28	0	28	0
CHIC0069	ROCK CREEK AT THE BROMIDE FOOT BRIDGE	Yes	3	0	3	0
CHIC0070	ROCK CREEK ABOVE BROMIDE FOOT BRIDGE	Yes	7	0	7	0
CHIC0071	01S-03E-03 CBDB 1 ABOVE BROMIDE FOOT BRIDG	Yes	9	0	9	0

Station Period of Record Tabulation
From 09/10/51 To 08/23/95

Station Ident.	Location Description	In Park	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75
CHIC0072	BROMIDE SPRING	Yes	211	0	0	211
CHIC0073	ROCK CREEK NORTH OF VETERANS LAKE	Yes	2	0	2	0
CHIC0074[1]	Unnamed Spring in Bed of Rock Cr	Yes	147	147	0	0
CHIC0075	ROCK CREEK AT SULPHUR CAMPGROUNDS	Yes	177	0	177	0
CHIC0076	MEDICINE SPRING	Yes	213	0	0	213
CHIC0077	01S-03E-04 DABD 1 CAMPGROUND	Yes	16	0	16	0
CHIC0078	ROCK CREEK SOUTH OF CAMPGROUND ENTRANCE BRIDGE	Yes	9	0	9	0
CHIC0079	ROCK CREEK AT BROMIDE FOOT BRIDGE	Yes	1	0	1	0
CHIC0080[1]	Rock Creek at Bridge near Campground	No	1145	1145	0	0
CHIC0081	ROCK CREEK CAMPGROUND SWIM AREA	Yes	2	0	2	0
CHIC0082	ROCK CREEK BETWEEN 2 SIPHONS NEAR CAMPGROUND	Yes	9	0	9	0
CHIC0083	TRAVERTINE CREEK BELOW THE SWIMMING AREA	Yes	188	0	188	0
CHIC0084	01S-03E-02 BDBD 1 BELOW SWIMMING AREA	Yes	8	0	8	0
CHIC0085	01S-03E-03 AACA 1 TRAVERTINE AT HWY 177	Yes	15	0	15	0
CHIC0086	HILLSIDE SPRING JUST WEST OF HIGHWAY 177	Yes	348	0	0	348
CHIC0087[1]	Hillside Spring	Yes	163	163	0	0
CHIC0088[1]	Buffalo Spring - the Source of Travertine Creek	Yes	1146	1146	0	0
CHIC0089	BUFFALO SPRING NEAR TRAVERTINE CREEK	Yes	41	0	41	0
CHIC0090	BUFFALO SPRING NEAR TRAVERTINE CREEK	Yes	5	0	5	0
CHIC0091[1]	Pavilion Spring - Outlet A	Yes	322	322	0	0
CHIC0092	PAVILION SPRING JUST EAST OF HIGHWAY 177	Yes	212	0	0	212
CHIC0093	01S-03E-03 AACD 1 PAVILION SPRING	Yes	4	2	0	2
CHIC0094[1]	Pavilion Spring - Outlet B	Yes	322	322	0	0
CHIC0095[1]	Pavilion Spring - Outlet C	Yes	320	320	0	0
CHIC0096[1]	Pavilion Spring - Outlet D	Yes	323	323	0	0
CHIC0097[1]	Pavilion Spring - Outlet E	Yes	291	291	0	0
CHIC0098	TRAVERTINE CREEK AT BEAR FALLS	Yes	6	0	6	0
CHIC0099	TRAVERTINE CK 250 FEET NE OF COLD SPRING CAMP	Yes	3	0	3	0
CHIC0100	TRAVERTINE CREEK SOUTH SIDE OF THE NATURE CENTER	Yes	3	0	3	0
CHIC0101	ROCK CREEK 50 FT SOUTH OF LOW WATER BRIDGE	Yes	2	0	2	0
CHIC0102	TRAVERTINE CK .25 MILES NE OF COLD SPRING CAMP	Yes	3	0	3	0
CHIC0103[1]	Rock Creek near Lincoln Bridge	Yes	1145	1145	0	0
CHIC0104	ROCK CREEK AT SANDY BEACH	Yes	5	0	5	0
CHIC0105	TRAVERTINE CREEK 100 FT WEST OF LINCOLN BRIDGE	Yes	9	0	9	0
CHIC0106	TRAVERTINE CREEK UPSTREAM OF INVERTED SIPHON	Yes	3	0	3	0
CHIC0107	01S-03E-03 AACA 1 INV. SIPHON LINCOLN BRID	Yes	12	0	12	0
CHIC0108[1]	Travertine Creek at Sycamore Crossing	Yes	1149	1149	0	0
CHIC0109[1]	Travertine Creek at Lincoln Bridge	Yes	1146	1146	0	0
CHIC0110	TRAVERTINE CREEK 1/2 MILE NW OF COLD SPRING CAMP	Yes	6	0	6	0
CHIC0111	TRAVERTINE CK AT INVERTED SIPHON BELOW BRIDGE	Yes	15	0	15	0
CHIC0112	TRAVERTINE CREEK 200 FT EAST OF LINCOLN BRIDGE	Yes	3	0	3	0
CHIC0113	TRAVERTINE CREEK BELOW THE NATURE CENTER	Yes	126	0	126	0
CHIC0114[1]	Rock Creek near Black Sulphur Spring Pump House	Yes	1144	1144	0	0
CHIC0115	TRAVERTINE CK BETWEEN LINCOLN & HWY 177 BRIDGES	Yes	6	0	6	0
CHIC0116	TRAVERTINE CREEK AT LINCOLN BRIDGE	Yes	149	0	149	0
CHIC0117[1]	Black Sulphur Spring	Yes	151	151	0	0
CHIC0118	BLACK SULPHUR SPRING	Yes	214	0	0	214
CHIC0119	ROCK CK AT SANDY BEACH UPSTREAM OF TRAVERTINE CK	Yes	12	0	12	0
CHIC0120	DISCHARGE FROM CULVERT 50 FT EAST OF BRIDGE	Yes	6	0	6	0
CHIC0121	01S-03E-03 AAAD 1 CULVERT E. OF HWY 177	Yes	26	0	26	0
CHIC0122	TRAVERTINE CREEK EAST OF CHIC_SCH_T4_2	Yes	6	0	6	0
CHIC0123	TRAVERTINE CREEK AT HWY 177	Yes	13	0	13	0
CHIC0124	TRAVERTINE CREEK NEAR CULVERT EAST OF HWY 177	Yes	41	0	41	0
CHIC0125	TRAVERTINE CREEK AT CENTRAL CAMPGROUND SWIM AREA	Yes	1	0	1	0
CHIC0126	ANTELOPE SPRINGS NEAR TRAVERTINE CREEK	Yes	32	0	32	0
CHIC0127	ANTELOPE SPRINGS NEAR TRAVERTINE CREEK	Yes	3	0	3	0
CHIC0128[1]	Antelope Spring	Yes	1192	1192	0	0
CHIC0129	TRAVERTINE CREEK BELOW THE NATURE CENTER	Yes	3	0	3	0
CHIC0130	01S-03E-01 ABA 1	Yes	18	0	0	18
CHIC0131	01S-03E-03 AABC 1 SANDY BEACH	No	52	0	52	0
CHIC0132	TRAVERTINE CREEK AT LITTLE NIAGARA WATERFALL	Yes	5	0	5	0
CHIC0133	ROCK CREEK AT SANDY BEACH	Yes	204	0	204	0
CHIC0134	ROCK CREEK AT BLACK SULPHUR BEACH	Yes	1	0	1	0
CHIC0135	01S-03E-02 AAAB 1 LITTLE NIAGRA	Yes	16	0	16	0
CHIC0136	ROCK CREEK NEAR CULVERT AT HWY 7	Yes	5	0	5	0
CHIC0137	TRAVERTINE CREEK AT LITTLE NIAGARA FOOT BRIDGE	Yes	11	0	11	0
CHIC0138	TRAVERTINE CREEK AT LITTLE NIAGARA	Yes	14	0	14	0
CHIC0139	STORM CULVERT 20 FT SOUTH OF BROADWAY BRIDGE	Yes	9	0	9	0
CHIC0140	ROCK CREEK SOUTH OF BROADWAY BRIDGE	Yes	9	0	9	0
CHIC0141	ROCK CREEK AT HWY 7 DOWNSTREAM FROM BRIDGE	Yes	8	0	8	0
CHIC0142	ROCK CREEK AT HWY 7 UNDER BRIDGE	Yes	203	0	203	0

Station Period of Record Tabulation
From 09/10/51 To 08/23/95

Station Ident.	Location Description	In Park	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75
CHIC0143	01S-03E-03 ABBB 1 UNDER HWY 7 BRIDGE	Yes	52	0	52	0
CHIC0144[1]	Rock Creek Above Highway 7 Bridge	Yes	1145	1145	0	0
CHIC0145	GUY SANDY CREEK AT HIGHWAY 7	No	67	0	67	0
CHIC0146[1]	Guy Sandy Creek at Highway 7 Bridge	No	1148	1148	0	0
CHIC0147	GUY SANDY CREEK	No	65	0	55	10
CHIC0148	01N-03E-34 ADAC 1 BELOW HWY 177 BRIDGE	No	26	0	26	0
CHIC0149	ROCK CREEK AT HWY 177 DOWNSTREAM OF BRIDGE	No	215	0	215	0
CHIC0150	ROCK CREEK BELOW BRIDGE 1/2 MI EAST OF LACY LAKE	No	9	0	9	0
CHIC0151	01N-03E-34 ADAD 1 ABOVE HWY 177 BRIDGE	No	10	0	10	0
CHIC0152	ROCK CREEK AT HWY 177 UPSTREAM OF BRIDGE	No	8	0	8	0
CHIC0153	ROCK CREEK BELOW OG&E COOLING WATER DISCHARGE	No	74	0	74	0
CHIC0154	ROCK CREEK AT OG&E COOLING WATER DISCHARGE	No	36	0	36	0
CHIC0155	ROCK CREEK ABOVE OG&E COOLING WATER DISCHARGE	No	76	0	76	0
CHIC0156	ROCK CREEK N OF SULPHUR, OK	No	84	0	0	84

[1]Longer Term Station With At Least 6 Parameters Having An Average of 1 Or More Observations Per Year During a Period of Record Extending At Least 2 Years.

Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Parameter Code	Name	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Stations Total	Stations Park
00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	466	11	156	299	27	27
00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE	51	0	0	51	4	4
00009	X-SEC. LOC.(FT FROM LEFT BANK LOOKING DOWNSTRM)	53	53	0	0	1	1
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	1914	1492	263	159	97	62
00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	70	70	0	0	2	2
00025	BAROMETRIC PRESSURE (MM OF HG)	78	78	0	0	1	1
00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	122	87	34	1	21	14
00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	124	87	36	1	22	14
00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	12	0	0	12	4	4
00045	PRECIPITATION, TOTAL (INCHES PER DAY)	12	0	0	12	1	1
00058	FLOW, RATE GALLONS/MIN	3	0	3	0	3	0
00059	FLOW, RATE, INSTANTANEOUS GALLONS/MIN	2	2	0	0	2	1
00060	FLOW, STREAM, MEAN DAILY CFS	4	0	0	4	2	1
00061	FLOW, STREAM, INSTANTANEOUS CFS	195	80	10	105	12	3
00065	STAGE, STREAM (FEET)	78	78	0	0	1	1
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	51	0	0	51	4	4
00076	TURBIDITY,HACH TURBIDIMETER (FORMAZIN TURB UNIT)	3	3	0	0	1	1
00077	TRANSPARENCY, SECCHI DISC (INCHES)	10	0	0	10	4	4
00080	COLOR (PLATINUM-COBALT UNITS)	3	0	3	0	3	0
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	79	0	28	51	5	5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	1751	1628	13	110	57	33
00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	132	0	132	0	14	9
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	68	0	68	0	9	9
00300	OXYGEN, DISSOLVED MG/L	1539	1289	188	62	60	43
00310	BOD, 5 DAY, 20 DEG C MG/L	262	0	155	107	41	32
00335	COD, .025N K2CR2O7 MG/L	27	0	27	0	13	10
00340	COD, .25N K2CR2O7 MG/L	307	0	205	102	61	50
00400	PH (STANDARD UNITS)	242	82	46	114	43	23
00403	PH, LAB, STANDARD UNITS SU	1714	1550	164	0	58	42
00405	CARBON DIOXIDE (MG/L AS CO2)	48	0	3	45	8	2
00406	PH, FIELD, STANDARD UNITS SU	28	0	28	0	1	1
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	1537	1371	70	96	66	45
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	234	0	0	234	4	4
00435	ACIDITY, TOTAL (MG/L AS CACO3)	3	0	3	0	3	0
00440	BICARBONATE ION (MG/L AS HCO3)	60	12	3	45	20	14
00445	CARBONATE ION (MG/L AS CO3)	48	0	3	45	8	2
00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	27	27	0	0	4	2
00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	27	27	0	0	4	2
00500	RESIDUE, TOTAL (MG/L)	15	0	0	15	6	5
00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C),MG/L	2	0	0	2	2	0
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	90	0	79	11	37	27
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	13	0	0	13	7	5
00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	10	10	0	0	1	1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	1460	1308	84	68	56	40
00613	NITRITE NITROGEN, DISSOLVED (MG/L AS N)	10	10	0	0	1	1
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	1209	965	0	244	37	30
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	6	0	0	6	3	2
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	1409	1358	36	15	51	35
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	174	25	90	59	25	16
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	118	17	42	59	12	7
00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	12	12	0	0	3	1
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	2	0	0	2	2	0
00665	PHOSPHORUS, TOTAL (MG/L AS P)	180	37	84	59	40	30
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	936	936	0	0	26	19
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	110	10	41	59	9	6
00741	SULFITE, AS S IN WATER MG/L	12	0	0	12	4	4
00745	SULFIDE, TOTAL (MG/L AS S)	15	0	0	15	5	5
00900	HARDNESS, TOTAL (MG/L AS CACO3)	1429	1366	3	60	39	26
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	48	0	3	45	8	2
00915	CALCIUM, DISSOLVED (MG/L AS CA)	75	27	3	45	12	4
00916	CALCIUM, TOTAL (MG/L AS CA)	12	12	0	0	12	12
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	75	27	3	45	12	4
00927	MAGNESIUM, TOTAL (MG/L AS MG)	12	12	0	0	12	12
00929	SODIUM, TOTAL (MG/L AS NA)	12	12	0	0	12	12
00930	SODIUM, DISSOLVED (MG/L AS NA)	72	27	3	42	12	3
00931	SODIUM ADSORPTION RATIO	44	0	3	41	7	1
00932	SODIUM, PERCENT	40	0	3	37	7	1
00933	SODIUM,PLUS POTASSIUM (MG/L)	1	0	0	1	1	1
00935	POTASSIUM, DISSOLVED (MG/L AS K)	30	27	3	0	7	2
00937	POTASSIUM, TOTAL MG/L AS K)	12	12	0	0	12	12
00940	CHLORIDE,TOTAL IN WATER MG/L	212	40	109	63	66	45

Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Parameter Code	Name	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Stations Total	Stations Park
00945	SULFATE, TOTAL (MG/L AS SO4)	1392	1367	3	22	43	28
00950	FLUORIDE, DISSOLVED (MG/L AS F)	30	25	3	2	6	1
00951	FLUORIDE, TOTAL (MG/L AS F)	15	0	0	15	5	5
00955	SILICA, DISSOLVED (MG/L AS SI02)	33	28	3	2	9	2
01000	ARSENIC, DISSOLVED (UG/L AS AS)	3	0	3	0	3	0
01002	ARSENIC, TOTAL (UG/L AS AS)	35	35	0	0	13	13
01007	BARIUM, TOTAL (UG/L AS BA)	12	12	0	0	12	12
01012	BERYLLIUM, TOTAL (UG/L AS BE)	12	12	0	0	12	12
01020	BORON, DISSOLVED (UG/L AS B)	24	24	0	0	1	1
01022	BORON, TOTAL (UG/L AS B)	12	12	0	0	12	12
01025	CADMIUM, DISSOLVED (UG/L AS CD)	6	3	3	0	6	3
01027	CADMIUM, TOTAL (UG/L AS CD)	45	37	8	0	21	18
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	8	5	3	0	7	4
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	2	0	0	2	2	0
01034	CHROMIUM, TOTAL (UG/L AS CR)	43	35	8	0	21	18
01037	COBALT, TOTAL (UG/L AS CO)	12	12	0	0	12	12
01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	34	0	34	0	4	4
01040	COPPER, DISSOLVED (UG/L AS CU)	39	3	34	2	12	7
01042	COPPER, TOTAL (UG/L AS CU)	76	36	40	0	25	22
01045	IRON, TOTAL (UG/L AS FE)	52	2	48	2	8	6
01046	IRON, DISSOLVED (UG/L AS FE)	80	24	56	0	9	6
01049	LEAD, DISSOLVED (UG/L AS PB)	8	3	3	2	8	3
01051	LEAD, TOTAL (UG/L AS PB)	45	37	8	0	21	18
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	61	0	61	0	5	5
01055	MANGANESE, TOTAL (UG/L AS MN)	186	12	55	119	23	21
01056	MANGANESE, DISSOLVED (UG/L AS MN)	81	24	57	0	9	6
01059	THALLIUM, TOTAL (UG/L AS TL)	12	12	0	0	12	12
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	12	12	0	0	12	12
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	12	12	0	0	12	12
01065	NICKEL, DISSOLVED (UG/L AS NI)	3	3	0	0	3	3
01067	NICKEL, TOTAL (UG/L AS NI)	12	12	0	0	12	12
01075	SILVER, DISSOLVED (UG/L AS AG)	2	2	0	0	1	1
01077	SILVER, TOTAL (UG/L AS AG)	12	12	0	0	12	12
01082	STRONTIUM, TOTAL (UG/L AS SR)	12	12	0	0	12	12
01087	VANADIUM, TOTAL (UG/L AS V)	12	12	0	0	12	12
01090	ZINC, DISSOLVED (UG/L AS ZN)	29	0	27	2	8	3
01092	ZINC, TOTAL (UG/L AS ZN)	69	37	32	0	24	21
01097	ANTIMONY, TOTAL (UG/L AS SB)	12	12	0	0	12	12
01105	ALUMINUM, TOTAL (UG/L AS AL)	12	12	0	0	12	12
01106	ALUMINUM, DISSOLVED (UG/L AS AL)	3	0	3	0	3	0
01127	GERMANIUM, TOTAL (UG/L AS GE)	12	12	0	0	12	12
01132	LITHIUM, TOTAL (UG/L AS LI)	12	12	0	0	12	12
01147	SELENIUM, TOTAL (UG/L AS SE)	35	35	0	0	13	13
01152	TITANIUM, TOTAL (UG/L AS TI)	12	12	0	0	12	12
01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	24	0	24	0	3	3
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	61	0	61	0	5	5
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	427	0	85	342	25	22
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	58	0	58	0	28	27
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	14	0	14	0	7	7
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	194	0	0	194	5	5
31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	4	0	4	0	4	4
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	328	0	178	150	22	17
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	539	0	195	344	43	37
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	265	0	0	265	9	9
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	275	0	0	275	9	9
32211	CHLOROPHYLL-A UG/L SPECTROPHOTOMETRIC ACID. METH.	1	1	0	0	1	1
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	11	0	0	11	4	4
34423	METHYLENE CHLORIDE TOTWUG/L	11	11	0	0	11	11
39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	27	27	0	0	4	2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	1366	1366	0	0	26	19
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	1366	1366	0	0	26	19
46000	PHENOLS MG/L	15	0	0	15	5	5
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	235	27	203	5	50	34
70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	3	0	3	0	3	0
70302	SOLIDS, DISSOLVED-TONS PER DAY	2	0	2	0	2	0
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	7	0	3	4	5	1
70310	PH, STANDARD UNITS, BOTTOM MUDS	40	0	40	0	8	8
70331	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .062MM	13	6	0	7	2	1
70332	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .125MM	6	0	0	6	1	0
70333	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .250MM	5	0	0	5	1	0
70334	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .500MM	3	0	0	3	1	0

Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Parameter Code	Name	Total Obs	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Stations Total	Stations Park
70337	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .002MM	7	0	0	7	1	0
70338	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .004MM	7	0	0	7	1	0
70339	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .008MM	7	0	0	7	1	0
70340	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .016MM	7	0	0	7	1	0
70341	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .031MM	4	0	0	4	1	0
70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	11	0	0	11	5	5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	1112	1080	32	0	41	28
71825	ACIDITY, TOTAL (MG/L AS H)	3	0	3	0	3	0
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	6	0	0	6	3	2
71870	BROMIDE (MG/L AS BR)	27	12	0	15	17	17
71875	HYDROGEN SULFIDE (MG/L)	205	205	0	0	12	12
71890	MERCURY, DISSOLVED (UG/L AS HG)	3	0	3	0	3	0
71900	MERCURY, TOTAL (UG/L AS HG)	34	34	0	0	13	13
72025	DEPTH OF POND OR RESERVOIR IN FEET	11	0	0	11	4	4
72103	SAMPLE LOCATION,RIGHT BANK(LOOKING DOWNSTREAM)(FT)	8	8	0	0	1	1
74010	IRON, TOTAL (MG/L AS FE)	129	12	0	117	16	16
78412	CADMIUM SEDWETWTMG/KG	3	3	0	0	3	3
78413	CHROMIUM SEDWETWTMG/KG	3	3	0	0	3	3
78414	COPPER SEDWETWTMG/KG	3	3	0	0	3	3
78415	LEAD SEDWETWTMG/KG	3	3	0	0	3	3
78417	NICKEL SEDWETWTMG/KG	3	3	0	0	3	3
80154	SUSP. SEDIMENT CONCENTRATION-EVAP. AT 110C (MG/L)	25	6	0	19	2	1
80155	SUSPENDED SEDIMENT DISCHARGE (TONS/DAY)	16	0	0	16	1	0
80164	BED MATERIAL SIEVE DIAMETER,% FINER THAN .062MM	8	0	0	8	1	0
80165	BED MATERIAL SIEVE DIAMETER,% FINER THAN .125MM	14	0	0	14	1	0
80166	BED MATERIAL SIEVE DIAMETER,% FINER THAN .250MM	18	0	0	18	1	0
80167	BED MATERIAL SIEVE DIAMETER,% FINER THAN .500MM	18	0	0	18	1	0
80168	BED MATERIAL SIEVE DIAMETER,% FINER THAN 1.00MM	18	0	0	18	1	0
80169	BED MATERIAL SIEVE DIAMETER,% FINER THAN 2.00MM	18	0	0	18	1	0
80170	BED MATERIAL SIEVE DIAMETER,% FINER THAN 4.00MM	15	0	0	15	1	0
80171	BED MATERIAL SIEVE DIAMETER,% FINER THAN 8.00MM	14	0	0	14	1	0
80172	BED MATERIAL SIEVE DIAMETER,% FINER THAN 16.0MM	3	0	0	3	1	0
80173	BED MATERIAL SIEVE DIAMETER,% FINER THAN 32.0MM	2	0	0	2	1	0
81024	DRAINAGE AREA IN SQUARE MILES (SQ. MI.)	5	0	5	0	2	0
81903	DEPTH OF BOTTOM OF WATER BODY @ SAMPLE SITE, FEET	28	28	0	0	1	1
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	1229	1229	0	0	15	8
82398	SAMPLING METHOD (CODES)	15	15	0	0	2	2
84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)	4	1	2	1	4	2
84001	AQUIFER NAME CODE (SEE USGS CATALOG)	4	1	2	1	4	2

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0007	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	06/21/76-07/04/77	1	6	
CHIC0008	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0009	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0011	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	05/16/77-11/24/78	1	19	
CHIC0012	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0013	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	04/02/68-04/01/70	1	28	
CHIC0015	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	06/12/74-10/23/74	0	12	
CHIC0016	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0020	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0022	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0023	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0024	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	03/30/74-10/23/74	0	19	
CHIC0026	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	01/25/75-08/08/75	0	5	
CHIC0027	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	03/15/78-11/24/78	0	8	
CHIC0028	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	04/02/68-04/01/70	1	150	
CHIC0029	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	06/21/76-07/04/77	1	8	
CHIC0032	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	05/09/75-08/08/75	0	28	
CHIC0033	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	05/16/77-11/24/78	1	14	
CHIC0040	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	05/16/77-12/30/77	0	10	
CHIC0041	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	05/16/77-12/30/77	0	10	
CHIC0049	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	04/02/68-04/01/70	1	28	
CHIC0050	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	04/02/68-04/01/70	1	28	
CHIC0051	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	03/30/73-10/23/74	1	19	
CHIC0052	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	03/30/74-10/23/74	0	15	
CHIC0053	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	06/21/76-07/04/77	1	5	
CHIC0055	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	06/21/76-07/04/77	1	8	
CHIC0066	Yes	00003	SAMPLING STATION LOCATION, VERTICAL (FEET)	08/21/91-08/21/91	0	11	
CHIC0015	Yes	00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE	06/12/74-10/23/74	0	10	
CHIC0024	Yes	00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE	03/30/74-10/23/74	0	17	
CHIC0051	Yes	00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE	03/30/73-10/23/74	1	11	
CHIC0052	Yes	00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE	03/30/74-10/23/74	0	13	
CHIC0066	Yes	00009	X-SEC. LOC.(FT FROM LEFT BANK LOOKING DOWNSTRM)	08/21/91-08/23/95	4	53	
CHIC0001	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/15/79-02/15/79	0	1	
CHIC0002	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/10/51-06/12/62	10	51	
CHIC0003	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/29/77-12/29/77	0	1	
CHIC0004	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/29/77-12/29/77	0	1	
CHIC0005	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/19/77-07/28/88	10	2	
CHIC0006	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	7	81	
CHIC0008	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0009	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0012	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0014	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/24/77-02/14/79	1	3	
CHIC0015	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/12/74-10/23/74	0	10	
CHIC0016	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0017	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	7	85	
CHIC0018	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/12/77-06/13/77	0	7	
CHIC0020	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0022	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0023	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0024	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/74-10/23/74	0	17	
CHIC0026	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	0	5	
CHIC0030	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	7	85	
CHIC0031	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/31/78-08/31/78	0	1	
CHIC0032	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/09/75-08/08/75	0	28	
CHIC0034	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/06/69-05/06/69	0	1	
CHIC0035	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/06/69-05/06/69	0	1	
CHIC0036	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/11/70-12/11/70	0	1	
CHIC0037	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/77-09/27/77	0	2	
CHIC0038	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/22/77-02/14/79	1	2	
CHIC0039	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	7	85	
CHIC0043	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	0	1	
CHIC0044	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/05/52-12/28/55	3	3	
CHIC0045	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	0	1	
CHIC0046	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/77-02/22/77	0	1	
CHIC0047	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/18/77-07/25/88	10	2	
CHIC0048	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	6	83	
CHIC0051	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/73-10/23/74	1	11	
CHIC0052	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/74-10/23/74	0	13	
CHIC0056	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	6	81	
CHIC0058	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	0	2	
CHIC0059	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/91-08/26/91	0	3	
CHIC0060	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/16/59-09/16/59	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0061	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	1	8	
CHIC0062	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	0	1	
CHIC0063	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	1	9	
CHIC0065	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	1	9	
CHIC0066	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	5	78	
CHIC0067	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/76	0	3	
CHIC0068	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/76	0	3	
CHIC0070	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/14/76	0	1	
CHIC0071	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/14/76	0	1	
CHIC0074	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/22/89-06/25/90	1	8	
CHIC0075	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-06/23/77	0	15	
CHIC0077	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	0	2	
CHIC0080	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	81	
CHIC0083	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-01/21/77	0	6	
CHIC0084	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	0	2	
CHIC0086	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/30/67-05/22/67	0	47	
CHIC0087	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	1	9	
CHIC0088	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	6	81	
CHIC0089	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-12/12/76	0	3	
CHIC0091	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	3	26	
CHIC0094	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	3	26	
CHIC0095	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	3	26	
CHIC0096	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	3	26	
CHIC0097	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	3	22	
CHIC0103	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	81	
CHIC0107	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	0	2	
CHIC0108	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	81	
CHIC0111	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	0	2	
CHIC0113	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/04/76-06/23/77	1	7	
CHIC0114	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	81	
CHIC0116	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/30/76-06/23/77	0	12	
CHIC0117	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/22/89-06/11/90	0	8	
CHIC0121	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/29/76	0	3	
CHIC0123	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	0	2	
CHIC0124	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-12/19/76	0	4	
CHIC0126	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-10/30/76	0	2	
CHIC0128	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	81	
CHIC0131	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-09/18/76	0	6	
CHIC0133	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	1	19	
CHIC0135	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	0	2	
CHIC0138	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	0	2	
CHIC0141	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	1	19	
CHIC0143	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-09/18/76	0	6	
CHIC0144	Yes	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	6	81	
CHIC0145	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/12/77-06/13/77	0	6	
CHIC0146	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	6	81	
CHIC0148	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-09/05/76	0	3	
CHIC0149	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	1	20	
CHIC0151	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/23/76-06/23/76	0	1	
CHIC0152	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/23/76-06/23/76	0	1	
CHIC0153	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-01/21/77	0	5	
CHIC0154	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/21/76-12/19/76	0	5	
CHIC0155	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-01/21/77	0	5	
CHIC0156	No	00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/30/58-09/16/59	0	3	
CHIC0059	Yes	00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	02/22/91-08/26/91	0	3	
CHIC0066	Yes	00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	04/10/90-08/23/95	5	67	
CHIC0066	Yes	00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	5	78	
CHIC0005	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	07/28/88-07/28/88	0	1	
CHIC0043	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	08/20/92-08/20/92	0	1	
CHIC0045	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	08/20/92-08/20/92	0	1	
CHIC0047	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	07/25/88-07/25/88	0	1	
CHIC0058	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/16/76-06/23/76	0	2	
CHIC0059	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	02/22/91-08/26/91	0	3	
CHIC0062	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	04/10/90-08/23/95	5	78	
CHIC0068	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/14/76-06/23/76	0	3	
CHIC0071	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/14/76-06/14/76	0	1	
CHIC0077	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	09/05/76-09/18/76	0	2	
CHIC0084	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	09/05/76-09/05/76	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0085	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	09/05/76-09/18/76	0	2	
CHIC0093	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	10/01/63-07/02/87	23	2	
CHIC0107	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/16/76-06/23/76	0	2	
CHIC0121	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/14/76-06/29/76	0	3	
CHIC0131	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/14/76-09/18/76	0	6	
CHIC0135	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	09/05/76-09/18/76	0	2	
CHIC0143	Yes	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/14/76-09/18/76	0	6	
CHIC0148	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/16/76-09/05/76	0	3	
CHIC0151	No	00027	CODE NO FOR AGENCY COLLECTING SAMPLE-SEE APPEND.	06/23/76-06/23/76	0	1	
CHIC0005	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	10/19/77-07/28/88	10	2	
CHIC0031	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	08/31/78-08/31/78	0	1	
CHIC0043	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	08/20/92-08/20/92	0	1	
CHIC0045	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	08/20/92-08/20/92	0	1	
CHIC0047	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	07/25/88-07/25/88	0	1	
CHIC0058	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/16/76-06/23/76	0	2	
CHIC0059	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	02/22/91-08/26/91	0	3	
CHIC0062	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	04/10/90-08/23/95	5	78	
CHIC0068	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/14/76-06/23/76	0	3	
CHIC0071	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/14/76-06/14/76	0	1	
CHIC0077	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	09/05/76-09/18/76	0	2	
CHIC0084	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	09/05/76-09/18/76	0	2	
CHIC0093	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	10/01/63-07/02/87	23	2	
CHIC0107	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/16/76-06/23/76	0	2	
CHIC0121	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/14/76-06/29/76	0	3	
CHIC0131	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/14/76-09/18/76	0	6	
CHIC0135	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	09/05/76-09/18/76	0	2	
CHIC0143	Yes	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/14/76-09/18/76	0	6	
CHIC0148	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/16/76-09/05/76	0	3	
CHIC0151	No	00028	CODE NO FOR AGENCY ANALYZING SAMPLE (SEE APPEND)	06/23/76-06/23/76	0	1	
CHIC0015	Yes	00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	0	3	
CHIC0024	Yes	00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	0	3	
CHIC0051	Yes	00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	0	4	
CHIC0052	Yes	00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	0	2	
CHIC0086	Yes	00045	PRECIPITATION, TOTAL (INCHES PER DAY)	02/01/67-05/21/67	0	12	
CHIC0003	No	00058	FLOW, RATE GALLONS/MIN	12/29/77-12/29/77	0	1	
CHIC0004	No	00058	FLOW, RATE GALLONS/MIN	12/29/77-12/29/77	0	1	
CHIC0046	No	00058	FLOW, RATE GALLONS/MIN	02/22/77-02/22/77	0	1	
CHIC0045	No	00059	FLOW, RATE, INSTANTANEOUS GALLONS/MIN	08/20/92-08/20/92	0	1	
CHIC0062	Yes	00059	FLOW, RATE, INSTANTANEOUS GALLONS/MIN	08/20/92-08/20/92	0	1	
CHIC0060	Yes	00060	FLOW, STREAM, MEAN DAILY CFS	09/16/59-09/16/59	0	1	
CHIC0156	No	00060	FLOW, STREAM, MEAN DAILY CFS	10/30/58-09/16/59	0	3	
CHIC0001	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	02/15/79-02/15/79	0	1	
CHIC0002	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	09/10/51-07/11/62	10	53	
CHIC0014	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	02/24/77-02/14/79	1	3	
CHIC0031	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	08/31/78-08/31/78	0	1	
CHIC0037	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	02/22/77-09/27/77	0	2	
CHIC0038	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	08/22/77-02/14/79	1	2	
CHIC0044	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	03/05/52-12/28/55	3	3	
CHIC0045	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	08/20/92-08/20/92	0	1	
CHIC0047	No	00061	FLOW, STREAM, INSTANTANEOUS CFS	10/18/77-10/18/77	0	1	
CHIC0062	Yes	00061	FLOW, STREAM, INSTANTANEOUS CFS	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	5	78	
CHIC0086	Yes	00061	FLOW, STREAM, INSTANTANEOUS CFS	01/28/67-05/22/67	0	49	
CHIC0066	Yes	00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	5	78	
CHIC0015	Yes	00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	06/12/74-10/23/74	0	10	
CHIC0024	Yes	00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/74-10/23/74	0	17	
CHIC0051	Yes	00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/73-10/23/74	1	11	
CHIC0052	Yes	00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/74-10/23/74	0	13	
CHIC0059	Yes	00076	TURBIDITY,HACH TURBIDIMETER (FORMAZIN TURB UNIT)	02/22/91-08/26/91	0	3	
CHIC0015	Yes	00077	TRANSPARENCY, SECCHI DISC (INCHES)	06/12/74-10/23/74	0	2	
CHIC0024	Yes	00077	TRANSPARENCY, SECCHI DISC (INCHES)	03/30/74-10/23/74	0	3	
CHIC0051	Yes	00077	TRANSPARENCY, SECCHI DISC (INCHES)	06/12/74-10/23/74	0	2	
CHIC0052	Yes	00077	TRANSPARENCY, SECCHI DISC (INCHES)	03/30/74-10/23/74	0	3	
CHIC0005	No	00080	COLOR (PLATINUM-COBALT UNITS)	10/19/77-10/19/77	0	1	
CHIC0031	No	00080	COLOR (PLATINUM-COBALT UNITS)	08/31/78-08/31/78	0	1	
CHIC0047	No	00080	COLOR (PLATINUM-COBALT UNITS)	10/18/77-10/18/77	0	1	
CHIC0015	Yes	00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	06/12/74-10/23/74	0	10	
CHIC0024	Yes	00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	03/30/74-10/23/74	0	17	
CHIC0032	Yes	00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	05/09/75-08/08/75	0	28	
CHIC0051	Yes	00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM 25C)	03/30/73-10/23/74	1	11	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0052	Yes	00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	03/30/74-10/23/74	0	13	
CHIC0001	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/15/79-02/15/79	0	1	
CHIC0002	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	09/10/51-12/20/56	5	33	
CHIC0003	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	12/29/77-12/29/77	0	1	
CHIC0005	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/19/77-07/28/88	10	2	
CHIC0006	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	7	81	T,A,S
CHIC0014	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/24/77-02/14/79	1	3	
CHIC0015	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/12/74-10/23/74	0	10	
CHIC0017	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	7	85	T,A,S
CHIC0024	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/30/74-10/23/74	0	17	
CHIC0030	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	7	85	T,A,S
CHIC0031	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/31/78-08/31/78	0	1	
CHIC0034	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	05/06/69-05/06/69	0	1	
CHIC0035	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	05/06/69-05/06/69	0	1	
CHIC0036	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	12/11/70-12/11/70	0	1	
CHIC0037	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/77-09/27/77	0	2	
CHIC0038	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/22/77-02/14/79	1	2	
CHIC0039	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	7	85	T,A,S
CHIC0043	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	0	1	
CHIC0044	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/05/52-12/28/55	3	3	
CHIC0045	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	0	1	
CHIC0046	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/77-02/22/77	0	1	
CHIC0047	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/18/77-07/25/88	10	2	
CHIC0048	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	6	83	A
CHIC0051	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/12/74-10/23/74	0	7	
CHIC0052	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/30/74-10/23/74	0	13	
CHIC0056	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	6	81	
CHIC0059	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/91-08/26/91	0	3	
CHIC0060	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	09/16/59-07/20/60	0	3	
CHIC0061	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	11	
CHIC0062	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	0	1	
CHIC0063	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	12	
CHIC0065	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	12	
CHIC0066	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	5	76	
CHIC0072	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	01/28/67-01/28/67	0	3	
CHIC0074	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/22/89-10/21/93	4	10	
CHIC0076	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	01/28/67-01/28/67	0	3	
CHIC0080	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	81	
CHIC0086	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	01/28/67-01/28/67	0	3	
CHIC0087	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	12	
CHIC0088	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	6	81	
CHIC0091	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	50	
CHIC0092	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	01/28/67-01/28/67	0	3	
CHIC0094	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	50	
CHIC0095	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	50	
CHIC0096	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	50	
CHIC0097	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	4	46	
CHIC0103	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	81	
CHIC0108	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	81	
CHIC0114	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	81	
CHIC0117	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/22/89-10/21/93	4	11	
CHIC0118	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	01/28/67-01/28/67	0	3	
CHIC0128	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	82	
CHIC0130	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/03/72-08/03/72	0	1	
CHIC0144	Yes	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	6	81	
CHIC0146	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	6	81	
CHIC0156	No	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/30/58-08/23/60	1	5	
CHIC0018	No	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	02/27/77-06/13/77	0	6	
CHIC0075	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-06/13/77	0	11	
CHIC0083	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/30/76-07/17/77	0	29	
CHIC0089	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/30/76-12/12/76	0	3	
CHIC0113	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-07/17/77	0	18	
CHIC0116	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/30/76-06/23/77	0	12	
CHIC0124	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	12/19/76-01/21/77	0	2	
CHIC0126	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/30/76-11/14/76	0	2	
CHIC0133	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-06/23/77	0	12	
CHIC0142	Yes	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-06/23/77	0	12	
CHIC0145	No	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	02/27/77-05/05/77	0	4	
CHIC0149	No	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-06/23/77	0	11	
CHIC0153	No	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-12/19/76	0	5	
CHIC0155	No	00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	10/16/76-12/19/76	0	5	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0008	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0009	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0012	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0016	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0020	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0022	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0023	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0026	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	0	5	
CHIC0032	Yes	00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	05/09/75-08/08/75	0	28	
CHIC0006	No	00300	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	7	80	T,A,S
CHIC0015	Yes	00300	OXYGEN, DISSOLVED MG/L	06/12/74-10/23/74	0	10	
CHIC0017	No	00300	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	7	84	T,A,S
CHIC0018	No	00300	OXYGEN, DISSOLVED MG/L	02/12/77-06/13/77	0	7	
CHIC0024	Yes	00300	OXYGEN, DISSOLVED MG/L	03/30/74-10/23/74	0	15	
CHIC0030	No	00300	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	7	84	T,A,S
CHIC0039	No	00300	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	7	84	T,A,S
CHIC0048	No	00300	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	6	82	A
CHIC0051	Yes	00300	OXYGEN, DISSOLVED MG/L	03/30/73-10/23/74	1	10	
CHIC0052	Yes	00300	OXYGEN, DISSOLVED MG/L	03/30/74-10/23/74	0	12	
CHIC0056	Yes	00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	6	79	
CHIC0058	Yes	00300	OXYGEN, DISSOLVED MG/L	06/16/76-06/23/76	0	2	
CHIC0066	Yes	00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	5	78	
CHIC0067	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/76	0	3	
CHIC0068	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/76	0	3	
CHIC0070	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/14/76	0	1	
CHIC0071	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/14/76	0	1	
CHIC0072	Yes	00300	OXYGEN, DISSOLVED MG/L	01/28/67-01/28/67	0	3	
CHIC0075	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-06/23/77	0	16	
CHIC0076	Yes	00300	OXYGEN, DISSOLVED MG/L	01/28/67-01/28/67	0	3	
CHIC0077	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	0	2	
CHIC0080	No	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	80	
CHIC0083	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-01/21/77	0	7	
CHIC0084	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	0	2	
CHIC0086	Yes	00300	OXYGEN, DISSOLVED MG/L	01/28/67-01/28/67	0	3	
CHIC0088	Yes	00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	6	79	
CHIC0089	Yes	00300	OXYGEN, DISSOLVED MG/L	10/16/76-12/12/76	0	4	
CHIC0092	Yes	00300	OXYGEN, DISSOLVED MG/L	01/28/67-01/28/67	0	3	
CHIC0103	Yes	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	80	
CHIC0107	Yes	00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	0	1	
CHIC0108	Yes	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	80	
CHIC0109	Yes	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	80	
CHIC0111	Yes	00300	OXYGEN, DISSOLVED MG/L	06/16/76-06/23/76	0	2	
CHIC0113	Yes	00300	OXYGEN, DISSOLVED MG/L	06/04/76-06/23/77	1	7	
CHIC0114	Yes	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	79	
CHIC0116	Yes	00300	OXYGEN, DISSOLVED MG/L	10/30/76-06/23/77	0	13	
CHIC0118	Yes	00300	OXYGEN, DISSOLVED MG/L	01/28/67-01/28/67	0	3	
CHIC0121	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/29/76	0	3	
CHIC0123	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	0	2	
CHIC0124	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/29/76	0	3	
CHIC0126	Yes	00300	OXYGEN, DISSOLVED MG/L	10/16/76-11/14/76	0	3	
CHIC0128	Yes	00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	80	
CHIC0131	No	00300	OXYGEN, DISSOLVED MG/L	06/14/76-09/18/76	0	6	
CHIC0133	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	1	20	
CHIC0135	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	0	2	
CHIC0138	Yes	00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	0	2	
CHIC0141	Yes	00300	OXYGEN, DISSOLVED MG/L	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	1	20	
CHIC0143	Yes	00300	OXYGEN, DISSOLVED MG/L	06/14/76-09/18/76	0	6	
CHIC0144	Yes	00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	6	80	
CHIC0145	No	00300	OXYGEN, DISSOLVED MG/L	02/12/77-06/13/77	0	6	
CHIC0146	No	00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	6	80	
CHIC0148	No	00300	OXYGEN, DISSOLVED MG/L	06/16/76-09/05/76	0	3	
CHIC0149	No	00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	1	21	
CHIC0151	No	00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	0	1	
CHIC0152	No	00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	0	1	
CHIC0153	No	00300	OXYGEN, DISSOLVED MG/L	10/16/76-01/21/77	0	6	
CHIC0154	No	00300	OXYGEN, DISSOLVED MG/L	10/16/76-12/19/76	0	4	
CHIC0155	No	00300	OXYGEN, DISSOLVED MG/L	10/16/76-01/21/77	0	6	
CHIC0007	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	07/04/77-07/04/77	0	2	
CHIC0013	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	1	12	
CHIC0018	No	00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-07/01/77	0	8	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0025	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-02/12/77	0	1	
CHIC0028	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	1	54	
CHIC0029	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	03/09/77-07/04/77	0	4	
CHIC0034	No	00310	BOD, 5 DAY, 20 DEG C MG/L	05/06/69-05/06/69	0	1	
CHIC0035	No	00310	BOD, 5 DAY, 20 DEG C MG/L	05/06/69-05/06/69	0	1	
CHIC0049	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	1	12	
CHIC0050	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	1	12	
CHIC0053	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	07/04/77-07/04/77	0	2	
CHIC0055	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	03/09/77-07/04/77	0	3	
CHIC0067	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-09/18/76	0	1	
CHIC0072	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	01/28/67-01/28/67	0	3	
CHIC0075	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	0	16	
CHIC0076	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	01/28/67-01/28/67	0	3	
CHIC0077	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0083	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-01/21/77	0	6	
CHIC0084	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0086	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	01/28/67-01/28/67	0	3	
CHIC0089	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-12/12/76	0	3	
CHIC0092	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	01/28/67-01/28/67	0	3	
CHIC0113	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-06/23/77	0	3	
CHIC0116	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-07/01/77	0	14	
CHIC0118	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	01/28/67-01/28/67	0	3	
CHIC0123	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0124	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-01/21/77	0	2	
CHIC0126	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-11/14/76	0	2	
CHIC0131	No	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0133	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	0	17	
CHIC0135	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0136	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-09/18/76	0	1	
CHIC0138	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0142	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	0	17	
CHIC0143	Yes	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	0	2	
CHIC0145	No	00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-07/01/77	0	7	
CHIC0148	No	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/05/76	0	1	
CHIC0149	No	00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	0	18	
CHIC0153	No	00310	BOD, 5 DAY, 20 DEG C MG/L	10/16/76-01/21/77	0	6	
CHIC0155	No	00310	BOD, 5 DAY, 20 DEG C MG/L	10/16/76-01/21/77	0	6	
CHIC0058	Yes	00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	0	1	
CHIC0068	Yes	00335	COD, .025N K2CR2O7 MG/L	06/14/76-06/23/76	0	3	
CHIC0071	Yes	00335	COD, .025N K2CR2O7 MG/L	06/14/76-06/14/76	0	1	
CHIC0077	Yes	00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/18/76	0	2	
CHIC0084	Yes	00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/05/76	0	1	
CHIC0107	Yes	00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	0	1	
CHIC0121	Yes	00335	COD, .025N K2CR2O7 MG/L	06/18/76-06/29/76	0	2	
CHIC0131	No	00335	COD, .025N K2CR2O7 MG/L	06/14/76-09/18/76	0	5	
CHIC0135	Yes	00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/18/76	0	2	
CHIC0143	Yes	00335	COD, .025N K2CR2O7 MG/L	06/14/76-09/18/76	0	5	
CHIC0148	No	00335	COD, .025N K2CR2O7 MG/L	06/23/76-09/05/76	0	2	
CHIC0151	No	00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	0	1	
CHIC0007	Yes	00340	COD, .25N K2CR2O7 MG/L	07/04/77-07/04/77	0	2	
CHIC0013	Yes	00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	1	11	
CHIC0018	No	00340	COD, .25N K2CR2O7 MG/L	02/12/77-07/01/77	0	8	
CHIC0025	Yes	00340	COD, .25N K2CR2O7 MG/L	02/12/77-02/12/77	0	1	
CHIC0028	Yes	00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	1	51	
CHIC0029	Yes	00340	COD, .25N K2CR2O7 MG/L	03/09/77-07/04/77	0	4	
CHIC0034	No	00340	COD, .25N K2CR2O7 MG/L	05/06/69-05/06/69	0	1	
CHIC0035	No	00340	COD, .25N K2CR2O7 MG/L	05/06/69-05/06/69	0	1	
CHIC0036	No	00340	COD, .25N K2CR2O7 MG/L	12/11/70-12/11/70	0	1	
CHIC0049	Yes	00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	1	11	
CHIC0050	Yes	00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	1	11	
CHIC0053	Yes	00340	COD, .25N K2CR2O7 MG/L	07/04/77-07/04/77	0	2	
CHIC0055	Yes	00340	COD, .25N K2CR2O7 MG/L	03/09/77-07/04/77	0	3	
CHIC0064	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0067	Yes	00340	COD, .25N K2CR2O7 MG/L	06/14/76-09/18/76	0	4	
CHIC0069	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0070	Yes	00340	COD, .25N K2CR2O7 MG/L	06/14/76-06/14/76	0	1	
CHIC0072	Yes	00340	COD, .25N K2CR2O7 MG/L	01/28/67-01/28/67	0	3	
CHIC0075	Yes	00340	COD, .25N K2CR2O7 MG/L	09/05/76-07/01/77	0	17	
CHIC0076	Yes	00340	COD, .25N K2CR2O7 MG/L	01/28/67-01/28/67	0	3	
CHIC0078	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0082	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0083	Yes	00340	COD, .25N K2CR2O7 MG/L	09/05/76-01/21/77	0	4	
CHIC0086	Yes	00340	COD, .25N K2CR2O7 MG/L	01/28/67-01/28/67	0	3	
CHIC0089	Yes	00340	COD, .25N K2CR2O7 MG/L	10/30/76-10/30/76	0	1	
CHIC0092	Yes	00340	COD, .25N K2CR2O7 MG/L	01/28/67-01/28/67	0	3	
CHIC0099	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0100	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0101	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0102	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0105	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0106	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0110	Yes	00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	0	2	
CHIC0111	Yes	00340	COD, .25N K2CR2O7 MG/L	06/16/76-06/23/76	0	2	
CHIC0112	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-10/28/75	0	1	
CHIC0113	Yes	00340	COD, .25N K2CR2O7 MG/L	06/04/76-06/23/77	1	5	
CHIC0115	Yes	00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	0	2	
CHIC0116	Yes	00340	COD, .25N K2CR2O7 MG/L	10/30/76-07/01/77	0	12	
CHIC0118	Yes	00340	COD, .25N K2CR2O7 MG/L	01/28/67-01/28/67	0	3	
CHIC0119	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-01/09/76	0	4	
CHIC0120	Yes	00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	0	2	
CHIC0122	Yes	00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	0	2	
CHIC0123	Yes	00340	COD, .25N K2CR2O7 MG/L	09/05/76-09/05/76	0	1	
CHIC0124	Yes	00340	COD, .25N K2CR2O7 MG/L	06/18/76-01/21/77	0	4	
CHIC0126	Yes	00340	COD, .25N K2CR2O7 MG/L	10/30/76-11/14/76	0	2	
CHIC0127	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	0	1	
CHIC0133	Yes	00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	1	19	
CHIC0136	Yes	00340	COD, .25N K2CR2O7 MG/L	09/18/76-09/18/76	0	1	
CHIC0137	Yes	00340	COD, .25N K2CR2O7 MG/L	10/18/75-01/09/76	0	3	
CHIC0138	Yes	00340	COD, .25N K2CR2O7 MG/L	09/05/76-09/18/76	0	2	
CHIC0139	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0140	Yes	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0141	Yes	00340	COD, .25N K2CR2O7 MG/L	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	1	20	
CHIC0145	No	00340	COD, .25N K2CR2O7 MG/L	02/12/77-07/01/77	0	7	
CHIC0149	No	00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	1	20	
CHIC0150	No	00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	0	3	
CHIC0152	No	00340	COD, .25N K2CR2O7 MG/L	06/23/76-06/23/76	0	1	
CHIC0153	No	00340	COD, .25N K2CR2O7 MG/L	10/30/76-01/21/77	0	5	
CHIC0154	No	00340	COD, .25N K2CR2O7 MG/L	01/21/76-12/19/76	0	6	
CHIC0155	No	00340	COD, .25N K2CR2O7 MG/L	10/16/76-01/21/77	0	6	
CHIC0001	No	00400	PH (STANDARD UNITS)	02/15/79-02/15/79	0	1	
CHIC0002	No	00400	PH (STANDARD UNITS)	09/10/51-12/20/56	5	33	
CHIC0003	No	00400	PH (STANDARD UNITS)	12/29/77-12/29/77	0	1	
CHIC0005	No	00400	PH (STANDARD UNITS)	10/19/77-07/28/88	10	2	
CHIC0014	No	00400	PH (STANDARD UNITS)	02/24/77-02/14/79	1	3	
CHIC0015	Yes	00400	PH (STANDARD UNITS)	06/12/74-10/23/74	0	10	
CHIC0024	Yes	00400	PH (STANDARD UNITS)	03/30/74-10/23/74	0	17	
CHIC0031	No	00400	PH (STANDARD UNITS)	08/31/78-08/31/78	0	1	
CHIC0034	No	00400	PH (STANDARD UNITS)	05/06/69-05/06/69	0	1	
CHIC0035	No	00400	PH (STANDARD UNITS)	05/06/69-05/06/69	0	1	
CHIC0036	No	00400	PH (STANDARD UNITS)	12/11/70-12/11/70	0	1	
CHIC0037	No	00400	PH (STANDARD UNITS)	02/22/77-09/27/77	0	2	
CHIC0038	No	00400	PH (STANDARD UNITS)	08/22/77-02/14/79	1	2	
CHIC0043	No	00400	PH (STANDARD UNITS)	08/20/92-08/20/92	0	1	
CHIC0044	No	00400	PH (STANDARD UNITS)	03/05/52-12/28/55	3	3	
CHIC0045	No	00400	PH (STANDARD UNITS)	08/20/92-08/20/92	0	1	
CHIC0046	No	00400	PH (STANDARD UNITS)	02/22/77-02/22/77	0	1	
CHIC0047	No	00400	PH (STANDARD UNITS)	10/18/77-07/25/88	10	2	
CHIC0051	Yes	00400	PH (STANDARD UNITS)	03/30/73-10/23/74	1	11	
CHIC0052	Yes	00400	PH (STANDARD UNITS)	03/30/74-10/23/74	0	13	
CHIC0058	Yes	00400	PH (STANDARD UNITS)	06/16/76-06/23/76	0	2	
CHIC0060	Yes	00400	PH (STANDARD UNITS)	09/16/59-07/20/60	0	3	
CHIC0062	Yes	00400	PH (STANDARD UNITS)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00400	PH (STANDARD UNITS)	05/15/90-08/23/95	5	77	
CHIC0068	Yes	00400	PH (STANDARD UNITS)	06/14/76-06/23/76	0	3	
CHIC0071	Yes	00400	PH (STANDARD UNITS)	06/14/76-06/14/76	0	1	
CHIC0072	Yes	00400	PH (STANDARD UNITS)	01/28/67-01/28/67	0	3	
CHIC0076	Yes	00400	PH (STANDARD UNITS)	01/28/67-01/28/67	0	3	
CHIC0077	Yes	00400	PH (STANDARD UNITS)	09/05/76-09/18/76	0	2	
CHIC0084	Yes	00400	PH (STANDARD UNITS)	09/05/76-09/05/76	0	1	
CHIC0085	Yes	00400	PH (STANDARD UNITS)	09/05/76-09/18/76	0	2	
CHIC0086	Yes	00400	PH (STANDARD UNITS)	01/28/67-01/28/67	0	3	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0092	Yes	00400	PH (STANDARD UNITS)	01/28/67-01/28/67	0	3	
CHIC0107	Yes	00400	PH (STANDARD UNITS)	06/23/76-06/23/76	0	1	
CHIC0118	Yes	00400	PH (STANDARD UNITS)	01/28/67-01/28/67	0	3	
CHIC0121	Yes	00400	PH (STANDARD UNITS)	06/14/76-06/29/76	0	3	
CHIC0130	Yes	00400	PH (STANDARD UNITS)	08/03/72-08/03/72	0	1	
CHIC0131	No	00400	PH (STANDARD UNITS)	06/14/76-09/18/76	0	6	
CHIC0135	Yes	00400	PH (STANDARD UNITS)	09/05/76-09/18/76	0	2	
CHIC0143	Yes	00400	PH (STANDARD UNITS)	06/14/76-09/18/76	0	6	
CHIC0148	No	00400	PH (STANDARD UNITS)	06/16/76-09/05/76	0	3	
CHIC0151	No	00400	PH (STANDARD UNITS)	06/23/76-06/23/76	0	1	
CHIC0156	No	00400	PH (STANDARD UNITS)	10/30/58-08/23/60	1	5	
CHIC0006	No	00403	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	7	81	T,A,S
CHIC0007	Yes	00403	PH, LAB, STANDARD UNITS SU	07/04/77-07/04/77	0	2	
CHIC0017	No	00403	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	7	85	T,A,S
CHIC0018	No	00403	PH, LAB, STANDARD UNITS SU	02/12/77-07/01/77	0	6	
CHIC0025	Yes	00403	PH, LAB, STANDARD UNITS SU	02/12/77-02/12/77	0	1	
CHIC0029	Yes	00403	PH, LAB, STANDARD UNITS SU	03/09/77-07/04/77	0	4	
CHIC0030	No	00403	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	7	85	T,A,S
CHIC0039	No	00403	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	7	85	T,A,S
CHIC0043	No	00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	0	1	
CHIC0045	No	00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	0	1	
CHIC0048	No	00403	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	6	83	A
CHIC0053	Yes	00403	PH, LAB, STANDARD UNITS SU	07/04/77-07/04/77	0	2	
CHIC0055	Yes	00403	PH, LAB, STANDARD UNITS SU	03/09/77-07/04/77	0	4	
CHIC0056	Yes	00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	6	81	
CHIC0061	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	9	
CHIC0062	Yes	00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	0	1	
CHIC0063	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	10	
CHIC0065	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	10	
CHIC0066	Yes	00403	PH, LAB, STANDARD UNITS SU	04/10/90-02/22/95	4	23	
CHIC0067	Yes	00403	PH, LAB, STANDARD UNITS SU	06/14/76-09/18/76	0	4	
CHIC0070	Yes	00403	PH, LAB, STANDARD UNITS SU	06/14/76-06/14/76	0	1	
CHIC0074	Yes	00403	PH, LAB, STANDARD UNITS SU	07/03/89-10/21/93	4	9	
CHIC0075	Yes	00403	PH, LAB, STANDARD UNITS SU	09/05/76-07/01/77	0	14	
CHIC0080	No	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	81	
CHIC0083	Yes	00403	PH, LAB, STANDARD UNITS SU	09/05/76-01/21/77	0	7	
CHIC0087	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	10	
CHIC0088	Yes	00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	6	81	
CHIC0089	Yes	00403	PH, LAB, STANDARD UNITS SU	10/16/76-12/12/76	0	4	
CHIC0091	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	48	
CHIC0094	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	48	
CHIC0095	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	48	
CHIC0096	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	48	
CHIC0097	Yes	00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	4	44	
CHIC0103	Yes	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	81	
CHIC0108	Yes	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	81	
CHIC0111	Yes	00403	PH, LAB, STANDARD UNITS SU	06/16/76-06/23/76	0	2	
CHIC0113	Yes	00403	PH, LAB, STANDARD UNITS SU	06/04/76-06/23/77	1	7	
CHIC0114	Yes	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	81	
CHIC0116	Yes	00403	PH, LAB, STANDARD UNITS SU	10/30/76-07/01/77	0	12	
CHIC0117	Yes	00403	PH, LAB, STANDARD UNITS SU	07/03/89-10/21/93	4	10	
CHIC0123	Yes	00403	PH, LAB, STANDARD UNITS SU	09/05/76-09/18/76	0	2	
CHIC0124	Yes	00403	PH, LAB, STANDARD UNITS SU	06/14/76-01/21/77	0	6	
CHIC0126	Yes	00403	PH, LAB, STANDARD UNITS SU	10/16/76-11/14/76	0	3	
CHIC0128	Yes	00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	82	
CHIC0133	Yes	00403	PH, LAB, STANDARD UNITS SU	06/14/76-06/23/77	1	18	
CHIC0136	Yes	00403	PH, LAB, STANDARD UNITS SU	09/18/76-09/18/76	0	1	
CHIC0138	Yes	00403	PH, LAB, STANDARD UNITS SU	09/05/76-09/18/76	0	2	
CHIC0141	Yes	00403	PH, LAB, STANDARD UNITS SU	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00403	PH, LAB, STANDARD UNITS SU	06/14/76-07/01/77	1	19	
CHIC0144	Yes	00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	6	81	
CHIC0145	No	00403	PH, LAB, STANDARD UNITS SU	02/12/77-07/01/77	0	5	
CHIC0146	No	00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	6	81	
CHIC0149	No	00403	PH, LAB, STANDARD UNITS SU	06/14/76-07/01/77	1	20	
CHIC0152	No	00403	PH, LAB, STANDARD UNITS SU	06/23/76-06/23/76	0	1	
CHIC0153	No	00403	PH, LAB, STANDARD UNITS SU	10/16/76-01/21/77	0	6	
CHIC0154	No	00403	PH, LAB, STANDARD UNITS SU	01/21/76-12/12/76	0	4	
CHIC0155	No	00403	PH, LAB, STANDARD UNITS SU	10/16/76-01/21/77	0	6	
CHIC0002	No	00405	CARBON DIOXIDE (MG/L AS CO2)	09/10/51-12/20/56	5	33	
CHIC0005	No	00405	CARBON DIOXIDE (MG/L AS CO2)	10/19/77-10/19/77	0	1	
CHIC0031	No	00405	CARBON DIOXIDE (MG/L AS CO2)	08/31/78-08/31/78	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0044	No	00405	CARBON DIOXIDE (MG/L AS CO2)	03/05/52-12/28/55	3	3	
CHIC0047	No	00405	CARBON DIOXIDE (MG/L AS CO2)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00405	CARBON DIOXIDE (MG/L AS CO2)	09/16/59-07/20/60	0	3	
CHIC0130	Yes	00405	CARBON DIOXIDE (MG/L AS CO2)	08/03/72-08/03/72	0	1	
CHIC0156	No	00405	CARBON DIOXIDE (MG/L AS CO2)	10/30/58-08/23/60	1	5	
CHIC0032	Yes	00406	PH, FIELD, STANDARD UNITS SU	05/09/75-08/08/75	0	28	
CHIC0002	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	09/10/51-12/20/56	5	33	
CHIC0005	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	0	1	
CHIC0006	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	81	T,A,S
CHIC0007	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	0	4	
CHIC0015	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/12/74-10/23/74	0	10	
CHIC0017	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0024	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	0	17	
CHIC0025	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	0	1	
CHIC0029	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	0	4	
CHIC0030	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0031	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	0	1	
CHIC0039	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0044	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/05/52-12/28/55	3	3	
CHIC0047	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	0	1	
CHIC0048	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	6	83	A
CHIC0051	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	0	11	
CHIC0052	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	0	13	
CHIC0053	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	0	3	
CHIC0055	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	0	4	
CHIC0056	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	81	
CHIC0058	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	2	
CHIC0060	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	09/16/59-07/20/60	0	3	
CHIC0061	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	9	
CHIC0063	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0065	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0067	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	2	
CHIC0068	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	2	
CHIC0074	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/03/89-07/07/92	3	8	
CHIC0075	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	0	2	
CHIC0080	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	81	
CHIC0083	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/77-01/21/77	0	1	
CHIC0087	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0088	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	6	81	
CHIC0091	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0094	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0095	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0096	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0097	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	14	
CHIC0103	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	81	
CHIC0107	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	0	1	
CHIC0108	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	81	
CHIC0111	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	2	
CHIC0113	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-10/16/76	0	2	
CHIC0114	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	81	
CHIC0116	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/77-01/21/77	0	1	
CHIC0117	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	3	9	
CHIC0121	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-06/29/76	0	2	
CHIC0124	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-01/21/77	0	3	
CHIC0128	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	81	
CHIC0130	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	08/03/72-08/03/72	0	1	
CHIC0131	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/29/76	0	3	
CHIC0133	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	0	5	
CHIC0141	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	0	5	
CHIC0143	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	3	
CHIC0144	Yes	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	6	81	
CHIC0146	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	81	
CHIC0148	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	0	2	
CHIC0149	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	0	5	
CHIC0151	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	0	1	
CHIC0152	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	0	1	
CHIC0153	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	0	2	
CHIC0154	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/76-01/21/76	0	1	
CHIC0155	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	0	2	
CHIC0156	No	00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/30/58-08/23/60	1	5	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0013	Yes	00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	1	28	
CHIC0028	Yes	00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	1	150	
CHIC0049	Yes	00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	1	28	
CHIC0050	Yes	00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	1	28	
CHIC0005	No	00435	ACIDITY, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	0	1	
CHIC0031	No	00435	ACIDITY, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	0	1	
CHIC0047	No	00435	ACIDITY, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	0	1	
CHIC0002	No	00440	BICARBONATE ION (MG/L AS HCO3)	09/10/51-12/20/56	5	33	
CHIC0005	No	00440	BICARBONATE ION (MG/L AS HCO3)	10/19/77-10/19/77	0	1	
CHIC0031	No	00440	BICARBONATE ION (MG/L AS HCO3)	08/31/78-08/31/78	0	1	
CHIC0044	No	00440	BICARBONATE ION (MG/L AS HCO3)	03/05/52-12/28/55	3	3	
CHIC0047	No	00440	BICARBONATE ION (MG/L AS HCO3)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	09/16/59-07/20/60	0	3	
CHIC0061	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	0	1	
CHIC0130	Yes	00440	BICARBONATE ION (MG/L AS HCO3)	08/03/72-08/03/72	0	1	
CHIC0156	No	00440	BICARBONATE ION (MG/L AS HCO3)	10/30/58-08/23/60	1	5	
CHIC0002	No	00445	CARBONATE ION (MG/L AS CO3)	09/10/51-12/20/56	5	33	
CHIC0005	No	00445	CARBONATE ION (MG/L AS CO3)	10/19/77-10/19/77	0	1	
CHIC0031	No	00445	CARBONATE ION (MG/L AS CO3)	08/31/78-08/31/78	0	1	
CHIC0044	No	00445	CARBONATE ION (MG/L AS CO3)	03/05/52-12/28/55	3	3	
CHIC0047	No	00445	CARBONATE ION (MG/L AS CO3)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00445	CARBONATE ION (MG/L AS CO3)	09/16/59-07/20/60	0	3	
CHIC0130	Yes	00445	CARBONATE ION (MG/L AS CO3)	08/03/72-08/03/72	0	1	
CHIC0156	No	00445	CARBONATE ION (MG/L AS CO3)	10/30/58-08/23/60	1	5	
CHIC0043	No	00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	0	1	
CHIC0045	No	00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	0	1	
CHIC0062	Yes	00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	05/15/90-08/23/95	5	24	
CHIC0043	No	00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0045	No	00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0062	Yes	00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	05/15/90-08/23/95	5	24	
CHIC0036	No	00500	RESIDUE, TOTAL (MG/L)	12/11/70-12/11/70	0	1	
CHIC0072	Yes	00500	RESIDUE, TOTAL (MG/L)	01/28/67-01/28/67	0	3	
CHIC0076	Yes	00500	RESIDUE, TOTAL (MG/L)	01/28/67-01/28/67	0	3	
CHIC0086	Yes	00500	RESIDUE, TOTAL (MG/L)	01/28/67-01/28/67	0	3	
CHIC0092	Yes	00500	RESIDUE, TOTAL (MG/L)	01/28/67-01/28/67	0	2	
CHIC0118	Yes	00500	RESIDUE, TOTAL (MG/L)	01/28/67-01/28/67	0	3	
CHIC0034	No	00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C),MG/L	05/06/69-05/06/69	0	1	
CHIC0035	No	00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C),MG/L	05/06/69-05/06/69	0	1	
CHIC0007	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	0	4	
CHIC0018	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	04/01/77-04/01/77	0	1	
CHIC0025	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	0	1	
CHIC0029	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	0	4	
CHIC0053	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	0	3	
CHIC0055	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	0	3	
CHIC0058	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	0	1	
CHIC0067	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	0	2	
CHIC0068	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	0	2	
CHIC0070	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/14/76	0	1	
CHIC0071	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/14/76	0	1	
CHIC0072	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/28/67-01/28/67	0	2	
CHIC0075	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-04/01/77	0	4	
CHIC0076	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/28/67-01/28/67	0	3	
CHIC0083	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/21/77-01/21/77	0	1	
CHIC0086	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/28/67-01/28/67	0	2	
CHIC0089	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	11/14/76-11/14/76	0	1	
CHIC0092	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/28/67-01/28/67	0	2	
CHIC0111	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	0	1	
CHIC0113	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/04/76-10/16/76	0	3	
CHIC0116	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	11/14/76-04/01/77	0	3	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0118	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/28/67-01/28/67	0	2	
CHIC0121	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/29/76	0	3	
CHIC0124	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-01/21/77	0	4	
CHIC0131	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	0	2	
CHIC0133	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-04/01/77	0	6	
CHIC0141	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-01/21/77	0	5	
CHIC0143	Yes	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/18/76	0	3	
CHIC0145	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	04/01/77-04/01/77	0	1	
CHIC0148	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	0	1	
CHIC0149	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-04/01/77	0	7	
CHIC0151	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	0	1	
CHIC0152	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	0	1	
CHIC0153	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-01/21/77	0	3	
CHIC0154	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/21/76-11/14/76	0	2	
CHIC0155	No	00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-01/21/77	0	3	
CHIC0034	No	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	05/06/69-05/06/69	0	1	
CHIC0035	No	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	05/06/69-05/06/69	0	1	
CHIC0072	Yes	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0076	Yes	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	3	
CHIC0086	Yes	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0092	Yes	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0118	Yes	00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0066	Yes	00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	05/05/93-08/23/95	2	10	
CHIC0006	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	80	T,A,S
CHIC0015	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	06/12/74-10/23/74	0	10	
CHIC0017	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	84	T,A,S
CHIC0018	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-07/01/77	0	3	
CHIC0019	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0021	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0024	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	0	17	
CHIC0029	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0030	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	84	T,A,S
CHIC0039	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	85	T,A,S
CHIC0048	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	6	83	A
CHIC0051	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	0	10	
CHIC0052	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	0	13	
CHIC0055	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0056	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	80	
CHIC0057	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0059	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/22/91-08/26/91	0	3	
CHIC0061	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0063	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0065	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0066	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	04/10/90-12/01/92	2	12	
CHIC0072	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0074	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0075	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	0	5	
CHIC0076	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0080	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	80	
CHIC0083	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0086	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0087	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0088	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	6	80	
CHIC0089	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0091	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	8	
CHIC0092	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0094	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	8	
CHIC0095	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	8	
CHIC0096	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	8	
CHIC0097	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	8	
CHIC0103	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	80	
CHIC0108	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	80	
CHIC0109	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	80	
CHIC0114	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	80	
CHIC0116	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	0	5	
CHIC0117	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	6	
CHIC0118	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0126	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0128	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	81	
CHIC0133	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	0	4	
CHIC0142	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	0	4	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0144	Yes	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	6	80	
CHIC0145	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	04/01/77-07/01/77	0	2	
CHIC0146	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	80	
CHIC0147	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0149	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	0	6	
CHIC0153	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0154	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/21/76-01/21/76	0	1	
CHIC0155	No	00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0066	Yes	00613	NITRITE NITROGEN, DISSOLVED (MG/L AS N)	05/05/93-08/23/95	2	10	
CHIC0006	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	59	
CHIC0013	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	1	28	
CHIC0017	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	63	
CHIC0028	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	1	150	
CHIC0030	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	63	
CHIC0039	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	63	
CHIC0048	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	5	61	
CHIC0049	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	1	28	
CHIC0050	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	1	28	
CHIC0056	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	4	59	
CHIC0059	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/22/91-08/26/91	0	3	
CHIC0061	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0063	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0065	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0066	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	11/16/90-12/01/92	2	7	
CHIC0072	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0074	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0076	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0080	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	4	59	
CHIC0086	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0087	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0088	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	4	59	
CHIC0091	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0092	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0094	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0095	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0096	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0097	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0103	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	4	59	
CHIC0108	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	4	59	
CHIC0109	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	4	59	
CHIC0114	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	4	59	
CHIC0117	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	3	5	
CHIC0118	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0128	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	6	60	
CHIC0144	Yes	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	4	59	
CHIC0146	No	00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	4	59	
CHIC0060	Yes	00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	09/16/59-07/20/60	0	3	
CHIC0130	Yes	00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	08/03/72-08/03/72	0	1	
CHIC0156	No	00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	07/20/60-08/23/60	0	2	
CHIC0006	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	81	T,A,S
CHIC0017	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	85	T,A,S
CHIC0018	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-04/01/77	0	3	
CHIC0021	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/25/74-11/25/74	0	1	
CHIC0025	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-02/12/77	0	1	
CHIC0029	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0030	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	85	T,A,S
CHIC0034	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	05/06/69-05/06/69	0	1	
CHIC0035	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	05/06/69-05/06/69	0	1	
CHIC0039	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	7	85	T,A,S
CHIC0048	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	6	83	A
CHIC0055	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0056	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	81	
CHIC0057	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/25/74-11/25/74	0	1	
CHIC0061	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	10	
CHIC0063	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	11	
CHIC0065	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	11	
CHIC0072	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	3	
CHIC0074	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/22/89-10/21/93	4	10	
CHIC0075	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-04/01/77	0	4	
CHIC0076	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0080	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	81	
CHIC0083	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0086	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0087	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	11	
CHIC0088	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	6	81	
CHIC0089	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0091	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	13	
CHIC0092	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0094	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	13	
CHIC0095	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	13	
CHIC0096	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	13	
CHIC0097	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	4	13	
CHIC0103	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	81	
CHIC0108	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	81	
CHIC0114	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	81	
CHIC0116	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	0	3	
CHIC0117	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/22/89-10/21/93	4	10	
CHIC0118	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/28/67-01/28/67	0	2	
CHIC0126	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0128	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	82	
CHIC0133	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	0	3	
CHIC0142	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	0	3	
CHIC0144	Yes	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	6	81	
CHIC0145	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-04/01/77	0	2	
CHIC0146	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	81	
CHIC0149	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	0	4	
CHIC0153	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0154	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/21/76-01/21/76	0	1	
CHIC0155	No	00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0015	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	06/12/74-10/23/74	0	10	
CHIC0018	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-07/01/77	0	3	
CHIC0019	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0021	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0024	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	0	17	
CHIC0029	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0051	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	0	11	
CHIC0052	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	0	13	
CHIC0055	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-03/09/77	0	2	
CHIC0057	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0059	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	02/22/91-08/26/91	0	3	
CHIC0066	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	04/10/90-08/23/95	5	22	
CHIC0075	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	0	6	
CHIC0083	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0089	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0116	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-07/01/77	0	5	
CHIC0126	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-11/14/76	0	1	
CHIC0133	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	0	5	
CHIC0142	Yes	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	0	5	
CHIC0145	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	04/01/77-07/01/77	0	2	
CHIC0147	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0149	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	0	7	
CHIC0153	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-01/21/77	0	2	
CHIC0154	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	01/21/76-10/16/76	0	2	
CHIC0155	No	00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-01/21/77	0	3	
CHIC0015	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	06/12/74-10/23/74	0	10	
CHIC0019	No	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0021	No	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0024	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	0	17	
CHIC0043	No	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	08/20/92-08/20/92	0	1	
CHIC0045	No	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	08/20/92-08/20/92	0	1	
CHIC0051	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	0	11	
CHIC0052	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	0	13	
CHIC0057	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	0	12	
CHIC0059	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	02/22/91-08/26/91	0	3	
CHIC0066	Yes	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	04/10/90-12/01/92	2	12	
CHIC0147	No	00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	0	13	
CHIC0043	No	00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	08/20/92-08/20/92	0	1	
CHIC0045	No	00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	05/05/93-08/23/95	2	10	
CHIC0034	No	00650	PHOSPHATE, TOTAL (MG/L AS PO4)	05/06/69-05/06/69	0	1	
CHIC0035	No	00650	PHOSPHATE, TOTAL (MG/L AS PO4)	05/06/69-05/06/69	0	1	
CHIC0007	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-06/29/76	0	1	
CHIC0015	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/12/74-10/23/74	0	10	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0018	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/09/77-07/01/77	0	2	
CHIC0019	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	0	11	
CHIC0021	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	0	11	
CHIC0024	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	0	17	
CHIC0029	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-03/09/77	0	4	
CHIC0031	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	08/31/78-08/31/78	0	1	
CHIC0051	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	0	11	
CHIC0052	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	0	13	
CHIC0053	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-06/29/76	0	2	
CHIC0055	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-03/09/77	0	2	
CHIC0057	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	0	12	
CHIC0059	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	02/22/91-08/26/91	0	3	
CHIC0061	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	04/10/90-08/23/95	5	22	
CHIC0074	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	0	4	
CHIC0083	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	0	1	
CHIC0087	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0089	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	0	1	
CHIC0091	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	0	4	
CHIC0117	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0126	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	0	1	
CHIC0128	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	0	5	
CHIC0142	Yes	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	0	5	
CHIC0145	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	04/01/77-07/01/77	0	2	
CHIC0147	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	0	13	
CHIC0149	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	0	5	
CHIC0153	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-01/21/77	0	2	
CHIC0154	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	01/21/76-01/21/76	0	1	
CHIC0155	No	00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-01/21/77	0	2	
CHIC0006	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	59	
CHIC0017	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	63	
CHIC0030	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	63	
CHIC0039	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	63	
CHIC0048	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	5	61	
CHIC0056	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	4	58	
CHIC0061	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0063	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0065	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0074	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0080	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	4	58	
CHIC0087	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0088	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	4	58	
CHIC0091	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0094	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0095	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0096	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0097	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0103	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	4	58	
CHIC0108	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	4	59	
CHIC0109	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	4	59	
CHIC0114	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	4	58	
CHIC0117	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	0	4	
CHIC0128	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	4	59	
CHIC0144	Yes	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	4	58	
CHIC0146	No	00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	4	58	
CHIC0015	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	06/12/74-10/23/74	0	10	
CHIC0019	No	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	0	12	
CHIC0021	No	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	0	13	
CHIC0024	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	0	17	
CHIC0051	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	0	11	
CHIC0052	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	0	13	
CHIC0057	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-09/08/75	0	11	
CHIC0066	Yes	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	05/05/93-08/23/95	2	10	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0147	No	00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	0	13	
CHIC0072	Yes	00741	SULFITE, AS S IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0076	Yes	00741	SULFITE, AS S IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0092	Yes	00741	SULFITE, AS S IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0118	Yes	00741	SULFITE, AS S IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0072	Yes	00745	SULFIDE, TOTAL (MG/L AS S)	01/28/67-01/28/67	0	3	
CHIC0076	Yes	00745	SULFIDE, TOTAL (MG/L AS S)	01/28/67-01/28/67	0	3	
CHIC0086	Yes	00745	SULFIDE, TOTAL (MG/L AS S)	01/28/67-01/28/67	0	3	
CHIC0092	Yes	00745	SULFIDE, TOTAL (MG/L AS S)	01/28/67-01/28/67	0	3	
CHIC0118	Yes	00745	SULFIDE, TOTAL (MG/L AS S)	01/28/67-01/28/67	0	3	
CHIC0002	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	09/10/51-12/20/56	5	33	
CHIC0005	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	0	1	
CHIC0006	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	6	80	
CHIC0017	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0030	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0031	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	0	1	
CHIC0039	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	7	85	T,A,S
CHIC0044	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/05/52-12/28/55	3	3	
CHIC0047	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	0	1	
CHIC0048	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	6	83	A
CHIC0056	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	81	
CHIC0060	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	09/16/59-07/20/60	0	3	
CHIC0061	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	9	
CHIC0063	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0065	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0072	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	01/28/67-01/28/67	0	3	
CHIC0074	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	3	9	
CHIC0076	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	01/28/67-01/28/67	0	3	
CHIC0080	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	80	
CHIC0086	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	01/28/67-01/28/67	0	3	
CHIC0087	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	10	
CHIC0088	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	6	81	
CHIC0091	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0092	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	01/28/67-01/28/67	0	3	
CHIC0094	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0095	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0096	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	18	
CHIC0097	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	3	14	
CHIC0103	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	80	
CHIC0108	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	81	
CHIC0109	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	80	
CHIC0114	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	80	
CHIC0117	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	3	9	
CHIC0118	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	01/28/67-01/28/67	0	3	
CHIC0128	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	81	
CHIC0130	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	08/03/72-08/03/72	0	1	
CHIC0144	Yes	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	6	80	
CHIC0146	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	81	
CHIC0156	No	00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/30/58-08/23/60	1	5	
CHIC0002	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	09/10/51-12/20/56	5	33	
CHIC0005	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/19/77-10/19/77	0	1	
CHIC0031	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	08/31/78-08/31/78	0	1	
CHIC0044	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	03/05/52-12/28/55	3	3	
CHIC0047	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	09/16/59-07/20/60	0	3	
CHIC0130	Yes	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	08/03/72-08/03/72	0	1	
CHIC0156	No	00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/30/58-08/23/60	1	5	
CHIC0002	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	09/10/51-12/20/56	5	33	
CHIC0005	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/19/77-10/19/77	0	1	
CHIC0031	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/31/78-08/31/78	0	1	
CHIC0043	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	0	1	
CHIC0044	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	03/05/52-12/28/55	3	3	
CHIC0045	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	0	1	
CHIC0047	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00915	CALCIUM, DISSOLVED (MG/L AS CA)	09/16/59-07/20/60	0	3	
CHIC0062	Yes	00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00915	CALCIUM, DISSOLVED (MG/L AS CA)	04/10/90-08/23/95	5	24	
CHIC0130	Yes	00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/03/72-08/03/72	0	1	
CHIC0156	No	00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/30/58-08/23/60	1	5	
CHIC0061	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0074	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	0	1	
CHIC0002	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	09/10/51-12/20/56	5	33	
CHIC0005	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/19/77-10/19/77	0	1	
CHIC0031	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/31/78-08/31/78	0	1	
CHIC0043	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	0	1	
CHIC0044	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	03/05/52-12/28/55	3	3	
CHIC0045	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	0	1	
CHIC0047	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	09/16/59-07/20/60	0	3	
CHIC0062	Yes	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	04/10/90-08/23/95	5	24	
CHIC0130	Yes	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/03/72-08/03/72	0	1	
CHIC0156	No	00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/30/58-08/23/60	1	5	
CHIC0061	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	0	1	
CHIC0002	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	01/16/52-12/20/56	4	30	
CHIC0005	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	10/19/77-10/19/77	0	1	
CHIC0031	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	08/31/78-08/31/78	0	1	
CHIC0036	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	12/11/70-12/11/70	0	1	
CHIC0043	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	0	1	
CHIC0044	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	03/05/52-12/28/55	3	3	
CHIC0045	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	0	1	
CHIC0047	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00930	SODIUM, DISSOLVED (MG/L AS NA)	09/16/59-07/20/60	0	3	
CHIC0062	Yes	00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00930	SODIUM, DISSOLVED (MG/L AS NA)	04/10/90-08/23/95	5	24	
CHIC0156	No	00930	SODIUM, DISSOLVED (MG/L AS NA)	10/30/58-08/23/60	1	5	
CHIC0002	No	00931	SODIUM ADSORPTION RATIO	01/16/52-12/20/56	4	30	
CHIC0005	No	00931	SODIUM ADSORPTION RATIO	10/19/77-10/19/77	0	1	
CHIC0031	No	00931	SODIUM ADSORPTION RATIO	08/31/78-08/31/78	0	1	
CHIC0044	No	00931	SODIUM ADSORPTION RATIO	03/05/52-12/28/55	3	3	
CHIC0047	No	00931	SODIUM ADSORPTION RATIO	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00931	SODIUM ADSORPTION RATIO	09/16/59-07/20/60	0	3	
CHIC0156	No	00931	SODIUM ADSORPTION RATIO	10/30/58-08/23/60	1	5	
CHIC0002	No	00932	SODIUM, PERCENT	01/16/52-12/20/56	4	30	
CHIC0005	No	00932	SODIUM, PERCENT	10/19/77-10/19/77	0	1	
CHIC0031	No	00932	SODIUM, PERCENT	08/31/78-08/31/78	0	1	
CHIC0044	No	00932	SODIUM, PERCENT	03/05/52-12/28/55	3	3	
CHIC0047	No	00932	SODIUM, PERCENT	10/18/77-10/18/77	0	1	
CHIC0060	Yes	00932	SODIUM, PERCENT	09/16/59-09/16/59	0	1	
CHIC0156	No	00932	SODIUM, PERCENT	10/30/58-09/16/59	0	3	
CHIC0130	Yes	00933	SODIUM,PLUS POTASSIUM (MG/L)	08/03/72-08/03/72	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0005	No	00935	POTASSIUM, DISSOLVED (MG/L AS K)	10/19/77-10/19/77	0	1	
CHIC0031	No	00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/31/78-08/31/78	0	1	
CHIC0043	No	00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	0	1	
CHIC0045	No	00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	0	1	
CHIC0047	No	00935	POTASSIUM, DISSOLVED (MG/L AS K)	10/18/77-10/18/77	0	1	
CHIC0062	Yes	00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00935	POTASSIUM, DISSOLVED (MG/L AS K)	04/10/90-08/23/95	5	24	
CHIC0061	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	0	1	
CHIC0002	No	00940	CHLORIDE,TOTAL IN WATER MG/L	09/10/51-12/20/56	5	33	
CHIC0005	No	00940	CHLORIDE,TOTAL IN WATER MG/L	10/19/77-10/19/77	0	1	
CHIC0007	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-06/29/76	0	4	
CHIC0018	No	00940	CHLORIDE,TOTAL IN WATER MG/L	02/12/77-03/09/77	0	2	
CHIC0025	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-02/12/77	0	2	
CHIC0029	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-03/09/77	0	5	
CHIC0031	No	00940	CHLORIDE,TOTAL IN WATER MG/L	08/31/78-08/31/78	0	1	
CHIC0034	No	00940	CHLORIDE,TOTAL IN WATER MG/L	05/06/69-05/06/69	0	1	
CHIC0035	No	00940	CHLORIDE,TOTAL IN WATER MG/L	05/06/69-05/06/69	0	1	
CHIC0036	No	00940	CHLORIDE,TOTAL IN WATER MG/L	12/11/70-12/11/70	0	1	
CHIC0043	No	00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	0	1	
CHIC0044	No	00940	CHLORIDE,TOTAL IN WATER MG/L	03/05/52-12/28/55	3	3	
CHIC0045	No	00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	0	1	
CHIC0047	No	00940	CHLORIDE,TOTAL IN WATER MG/L	10/18/77-10/18/77	0	1	
CHIC0053	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-06/29/76	0	3	
CHIC0055	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-03/09/77	0	5	
CHIC0058	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	0	2	
CHIC0060	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	09/16/59-07/20/60	0	3	
CHIC0061	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0062	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	0	1	
CHIC0063	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0065	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0066	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	04/10/90-08/23/95	5	25	
CHIC0067	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	0	3	
CHIC0068	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	0	3	
CHIC0070	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/14/76	0	1	
CHIC0071	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/14/76	0	1	
CHIC0072	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0074	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0075	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-03/09/77	0	5	
CHIC0076	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0083	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-01/21/77	0	2	
CHIC0086	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0087	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0089	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-10/30/76	0	1	
CHIC0091	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0092	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0094	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0095	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0096	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0097	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0107	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	0	1	
CHIC0111	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	0	2	
CHIC0113	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/04/76-10/16/76	0	4	
CHIC0116	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-03/09/77	0	4	
CHIC0117	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0118	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	01/28/67-01/28/67	0	3	
CHIC0121	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/29/76	0	3	
CHIC0124	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-01/21/77	0	4	
CHIC0126	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-10/30/76	0	1	
CHIC0128	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	0	1	
CHIC0130	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	08/03/72-08/03/72	0	1	
CHIC0131	No	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/29/76	0	4	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0133	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	0	9	
CHIC0141	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/18/76-06/18/76	0	1	
CHIC0142	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	0	8	
CHIC0143	Yes	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	0	3	
CHIC0145	No	00940	CHLORIDE,TOTAL IN WATER MG/L	02/12/77-02/12/77	0	1	
CHIC0148	No	00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	0	2	
CHIC0149	No	00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	0	10	
CHIC0151	No	00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	0	1	
CHIC0152	No	00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	0	1	
CHIC0153	No	00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-01/21/77	0	3	
CHIC0154	No	00940	CHLORIDE,TOTAL IN WATER MG/L	01/21/76-10/30/76	0	2	
CHIC0155	No	00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-01/21/77	0	3	
CHIC0156	No	00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/58-08/23/60	1	5	
CHIC0005	No	00945	SULFATE, TOTAL (MG/L AS SO4)	10/19/77-10/19/77	0	1	
CHIC0006	No	00945	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	7	80	T,A,S
CHIC0017	No	00945	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	7	83	T,A,S
CHIC0030	No	00945	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	7	83	T,A,S
CHIC0031	No	00945	SULFATE, TOTAL (MG/L AS SO4)	08/31/78-08/31/78	0	1	
CHIC0034	No	00945	SULFATE, TOTAL (MG/L AS SO4)	05/06/69-05/06/69	0	1	
CHIC0035	No	00945	SULFATE, TOTAL (MG/L AS SO4)	05/06/69-05/06/69	0	1	
CHIC0039	No	00945	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	7	83	T,A,S
CHIC0043	No	00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	0	1	
CHIC0045	No	00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	0	1	
CHIC0047	No	00945	SULFATE, TOTAL (MG/L AS SO4)	10/18/77-10/18/77	0	1	
CHIC0048	No	00945	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	6	81	A
CHIC0056	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	6	79	
CHIC0060	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	04/14/60-07/20/60	0	2	
CHIC0061	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	8	
CHIC0062	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	0	1	
CHIC0063	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	9	
CHIC0065	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	9	
CHIC0066	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	04/10/90-08/23/95	5	25	
CHIC0072	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	01/28/67-01/28/67	0	3	
CHIC0074	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/22/89-10/21/93	4	8	
CHIC0076	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	01/28/67-01/28/67	0	3	
CHIC0080	No	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	79	
CHIC0086	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	01/28/67-01/28/67	0	3	
CHIC0087	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	10	
CHIC0088	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	6	79	
CHIC0091	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	18	
CHIC0092	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	01/28/67-01/28/67	0	3	
CHIC0094	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	18	
CHIC0095	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	18	
CHIC0096	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	18	
CHIC0097	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	4	14	
CHIC0103	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	79	
CHIC0108	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	79	
CHIC0109	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	79	
CHIC0114	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	79	
CHIC0117	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	06/22/89-10/21/93	4	8	
CHIC0118	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	01/28/67-01/28/67	0	3	
CHIC0128	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	80	
CHIC0130	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	08/03/72-08/03/72	0	1	
CHIC0144	Yes	00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	6	79	
CHIC0146	No	00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	6	79	
CHIC0156	No	00945	SULFATE, TOTAL (MG/L AS SO4)	07/20/60-08/23/60	0	2	
CHIC0005	No	00950	FLUORIDE, DISSOLVED (MG/L AS F)	10/19/77-10/19/77	0	1	
CHIC0031	No	00950	FLUORIDE, DISSOLVED (MG/L AS F)	08/31/78-08/31/78	0	1	
CHIC0034	No	00950	FLUORIDE, DISSOLVED (MG/L AS F)	05/06/69-05/06/69	0	1	
CHIC0035	No	00950	FLUORIDE, DISSOLVED (MG/L AS F)	05/06/69-05/06/69	0	1	
CHIC0047	No	00950	FLUORIDE, DISSOLVED (MG/L AS F)	10/18/77-10/18/77	0	1	
CHIC0066	Yes	00950	FLUORIDE, DISSOLVED (MG/L AS F)	04/10/90-08/23/95	5	25	
CHIC0072	Yes	00951	FLUORIDE, TOTAL (MG/L AS F)	01/28/67-01/28/67	0	3	
CHIC0076	Yes	00951	FLUORIDE, TOTAL (MG/L AS F)	01/28/67-01/28/67	0	3	
CHIC0086	Yes	00951	FLUORIDE, TOTAL (MG/L AS F)	01/28/67-01/28/67	0	3	
CHIC0092	Yes	00951	FLUORIDE, TOTAL (MG/L AS F)	01/28/67-01/28/67	0	3	
CHIC0118	Yes	00951	FLUORIDE, TOTAL (MG/L AS F)	01/28/67-01/28/67	0	3	
CHIC0005	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	10/19/77-10/19/77	0	1	
CHIC0031	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	08/31/78-08/31/78	0	1	
CHIC0034	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	05/06/69-05/06/69	0	1	
CHIC0035	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	05/06/69-05/06/69	0	1	
CHIC0043	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0045	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	0	1	
CHIC0047	No	00955	SILICA, DISSOLVED (MG/L AS SI02)	10/18/77-10/18/77	0	1	
CHIC0062	Yes	00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	0	1	
CHIC0066	Yes	00955	SILICA, DISSOLVED (MG/L AS SI02)	04/10/90-08/23/95	5	25	
CHIC0005	No	01000	ARSENIC, DISSOLVED (UG/L AS AS)	10/19/77-10/19/77	0	1	
CHIC0031	No	01000	ARSENIC, DISSOLVED (UG/L AS AS)	08/31/78-08/31/78	0	1	
CHIC0047	No	01000	ARSENIC, DISSOLVED (UG/L AS AS)	10/18/77-10/18/77	0	1	
CHIC0061	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	04/10/90-08/23/95	5	23	
CHIC0074	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01020	BORON, DISSOLVED (UG/L AS B)	04/10/90-08/23/95	5	24	
CHIC0061	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	0	1	
CHIC0005	No	01025	CADMIUM, DISSOLVED (UG/L AS CD)	10/19/77-10/19/77	0	1	
CHIC0010	Yes	01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	0	1	
CHIC0031	No	01025	CADMIUM, DISSOLVED (UG/L AS CD)	08/31/78-08/31/78	0	1	
CHIC0042	Yes	01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	0	1	
CHIC0047	No	01025	CADMIUM, DISSOLVED (UG/L AS CD)	10/18/77-10/18/77	0	1	
CHIC0054	Yes	01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	0	1	
CHIC0018	No	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0061	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/10/90-08/23/95	5	25	
CHIC0074	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0083	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0087	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0091	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0117	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0142	Yes	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0145	No	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0149	No	01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	0	1	
CHIC0005	No	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	10/19/77-10/19/77	0	1	
CHIC0010	Yes	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	0	1	
CHIC0031	No	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	08/31/78-08/31/78	0	1	
CHIC0042	Yes	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	0	1	
CHIC0047	No	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	10/18/77-10/18/77	0	1	
CHIC0054	Yes	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	0	1	
CHIC0066	Yes	01030	CHROMIUM, DISSOLVED (UG/L AS CR)	11/02/93-05/16/94	0	2	
CHIC0034	No	01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	05/06/69-05/06/69	0	1	
CHIC0035	No	01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	05/06/69-05/06/69	0	1	
CHIC0018	No	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0061	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/10/90-08/23/95	5	23	
CHIC0074	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0083	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0087	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0117	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0142	Yes	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0145	No	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0149	No	01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	0	1	
CHIC0061	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	0	1	
CHIC0011	Yes	01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	0	9	
CHIC0033	Yes	01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	0	6	
CHIC0040	Yes	01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	0	9	
CHIC0041	Yes	01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	0	10	
CHIC0005	No	01040	COPPER, DISSOLVED (UG/L AS CU)	10/19/77-10/19/77	0	1	
CHIC0010	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	0	1	
CHIC0011	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	0	9	
CHIC0031	No	01040	COPPER, DISSOLVED (UG/L AS CU)	08/31/78-08/31/78	0	1	
CHIC0033	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	0	5	
CHIC0034	No	01040	COPPER, DISSOLVED (UG/L AS CU)	05/06/69-05/06/69	0	1	
CHIC0035	No	01040	COPPER, DISSOLVED (UG/L AS CU)	05/06/69-05/06/69	0	1	
CHIC0040	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	0	9	
CHIC0041	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	0	8	
CHIC0042	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	0	1	
CHIC0047	No	01040	COPPER, DISSOLVED (UG/L AS CU)	10/18/77-10/18/77	0	1	
CHIC0054	Yes	01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	0	1	
CHIC0011	Yes	01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	0	9	
CHIC0018	No	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0033	Yes	01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	0	5	
CHIC0040	Yes	01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	0	9	
CHIC0041	Yes	01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	0	9	
CHIC0061	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/10/90-08/23/95	5	24	
CHIC0074	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0083	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0087	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0117	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0142	Yes	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0145	No	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0149	No	01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	0	1	
CHIC0011	Yes	01045	IRON, TOTAL (UG/L AS FE)	05/16/77-11/24/78	1	15	
CHIC0027	Yes	01045	IRON, TOTAL (UG/L AS FE)	03/15/78-11/24/78	0	8	
CHIC0033	Yes	01045	IRON, TOTAL (UG/L AS FE)	05/16/77-11/24/78	1	12	
CHIC0034	No	01045	IRON, TOTAL (UG/L AS FE)	05/06/69-05/06/69	0	1	
CHIC0035	No	01045	IRON, TOTAL (UG/L AS FE)	05/06/69-05/06/69	0	1	
CHIC0040	Yes	01045	IRON, TOTAL (UG/L AS FE)	05/16/77-08/18/77	0	7	
CHIC0041	Yes	01045	IRON, TOTAL (UG/L AS FE)	05/16/77-08/18/77	0	6	
CHIC0066	Yes	01045	IRON, TOTAL (UG/L AS FE)	11/02/93-05/16/94	0	2	
CHIC0005	No	01046	IRON, DISSOLVED (UG/L AS FE)	10/19/77-10/19/77	0	1	
CHIC0011	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	06/14/77-11/24/78	1	16	
CHIC0027	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	03/15/78-10/22/78	0	7	
CHIC0031	No	01046	IRON, DISSOLVED (UG/L AS FE)	08/31/78-08/31/78	0	1	
CHIC0033	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-11/24/78	1	13	
CHIC0040	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-10/20/77	0	9	
CHIC0041	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-10/20/77	0	8	
CHIC0047	No	01046	IRON, DISSOLVED (UG/L AS FE)	10/18/77-10/18/77	0	1	
CHIC0066	Yes	01046	IRON, DISSOLVED (UG/L AS FE)	04/10/90-08/23/95	5	24	
CHIC0005	No	01049	LEAD, DISSOLVED (UG/L AS PB)	10/19/77-10/19/77	0	1	
CHIC0010	Yes	01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	0	1	
CHIC0031	No	01049	LEAD, DISSOLVED (UG/L AS PB)	08/31/78-08/31/78	0	1	
CHIC0034	No	01049	LEAD, DISSOLVED (UG/L AS PB)	05/06/69-05/06/69	0	1	
CHIC0035	No	01049	LEAD, DISSOLVED (UG/L AS PB)	05/06/69-05/06/69	0	1	
CHIC0042	Yes	01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	0	1	
CHIC0047	No	01049	LEAD, DISSOLVED (UG/L AS PB)	10/18/77-10/18/77	0	1	
CHIC0054	Yes	01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	0	1	
CHIC0018	No	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0061	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/10/90-08/23/95	5	25	
CHIC0074	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0083	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0087	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0117	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0142	Yes	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0145	No	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0149	No	01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	0	1	
CHIC0011	Yes	01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-11/24/78	1	19	
CHIC0027	Yes	01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	03/15/78-11/24/78	0	8	
CHIC0033	Yes	01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-11/24/78	1	14	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0040	Yes	01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-12/30/77	0	10	
CHIC0041	Yes	01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-12/30/77	0	10	
CHIC0011	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-11/24/78	1	17	
CHIC0013	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	1	13	
CHIC0027	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	03/15/78-11/24/78	0	8	
CHIC0028	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	1	78	
CHIC0033	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-11/24/78	1	13	
CHIC0034	No	01055	MANGANESE, TOTAL (UG/L AS MN)	05/06/69-05/06/69	0	1	
CHIC0035	No	01055	MANGANESE, TOTAL (UG/L AS MN)	05/06/69-05/06/69	0	1	
CHIC0040	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-10/20/77	0	9	
CHIC0041	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-10/20/77	0	8	
CHIC0049	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	1	13	
CHIC0050	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	1	13	
CHIC0061	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	0	1	
CHIC0005	No	01056	MANGANESE, DISSOLVED (UG/L AS MN)	10/19/77-10/19/77	0	1	
CHIC0011	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	06/14/77-11/24/78	1	16	
CHIC0027	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	03/15/78-11/24/78	0	8	
CHIC0031	No	01056	MANGANESE, DISSOLVED (UG/L AS MN)	08/31/78-08/31/78	0	1	
CHIC0033	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-11/24/78	1	13	
CHIC0040	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-10/20/77	0	9	
CHIC0041	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-10/20/77	0	8	
CHIC0047	No	01056	MANGANESE, DISSOLVED (UG/L AS MN)	10/18/77-10/18/77	0	1	
CHIC0066	Yes	01056	MANGANESE, DISSOLVED (UG/L AS MN)	04/10/90-08/23/95	5	24	
CHIC0061	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	0	1	
CHIC0010	Yes	01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	0	1	
CHIC0042	Yes	01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0054	Yes	01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	0	1	
CHIC0061	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01075	SILVER, DISSOLVED (UG/L AS AG)	11/02/93-05/16/94	0	2	
CHIC0061	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	0	1	
CHIC0005	No	01090	ZINC, DISSOLVED (UG/L AS ZN)	10/19/77-10/19/77	0	1	
CHIC0011	Yes	01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0027	Yes	01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0031	No	01090	ZINC, DISSOLVED (UG/L AS ZN)	08/31/78-08/31/78	0	1	
CHIC0033	Yes	01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0034	No	01090	ZINC, DISSOLVED (UG/L AS ZN)	05/06/69-05/06/69	0	1	
CHIC0035	No	01090	ZINC, DISSOLVED (UG/L AS ZN)	05/06/69-05/06/69	0	1	
CHIC0047	No	01090	ZINC, DISSOLVED (UG/L AS ZN)	10/18/77-10/18/77	0	1	
CHIC0011	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0018	No	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0027	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0033	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	0	8	
CHIC0061	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/10/90-08/23/95	5	25	
CHIC0074	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0075	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0083	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0087	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0095	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0116	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0117	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	0	1	
CHIC0133	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0142	Yes	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0145	No	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0149	No	01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	0	1	
CHIC0061	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	0	1	
CHIC0005	No	01106	ALUMINUM, DISSOLVED (UG/L AS AL)	10/19/77-10/19/77	0	1	
CHIC0031	No	01106	ALUMINUM, DISSOLVED (UG/L AS AL)	08/31/78-08/31/78	0	1	
CHIC0047	No	01106	ALUMINUM, DISSOLVED (UG/L AS AL)	10/18/77-10/18/77	0	1	
CHIC0061	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	04/10/90-08/23/95	5	23	
CHIC0074	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0117	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	0	1	
CHIC0011	Yes	01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	0	8	
CHIC0027	Yes	01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	0	8	
CHIC0033	Yes	01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	0	8	
CHIC0011	Yes	01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-11/24/78	1	19	
CHIC0027	Yes	01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	03/15/78-11/24/78	0	8	
CHIC0033	Yes	01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-11/24/78	1	14	
CHIC0040	Yes	01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-12/30/77	0	10	
CHIC0041	Yes	01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-12/30/77	0	10	
CHIC0013	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	1	27	
CHIC0028	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	1	69	
CHIC0049	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	1	27	
CHIC0050	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	1	27	
CHIC0067	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	0	1	
CHIC0072	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	0	36	
CHIC0075	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	0	6	
CHIC0076	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	0	35	
CHIC0083	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	06/19/76-12/19/76	0	23	
CHIC0086	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	01/30/67-05/22/67	0	47	
CHIC0089	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/12/76	0	4	
CHIC0092	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	0	37	
CHIC0113	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	06/19/76-10/16/76	0	12	
CHIC0116	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/30/76-12/19/76	0	4	
CHIC0118	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	0	37	
CHIC0123	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	0	1	
CHIC0124	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	0	1	
CHIC0126	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-11/14/76	0	3	
CHIC0133	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	0	6	
CHIC0136	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	0	1	
CHIC0138	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	0	1	
CHIC0142	Yes	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	0	6	
CHIC0149	No	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	0	6	
CHIC0153	No	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/19/76	0	5	
CHIC0155	No	31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/19/76	0	5	
CHIC0064	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0069	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0073	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/05/75-08/05/75	0	1	
CHIC0078	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0081	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/20/75-08/20/75	0	1	
CHIC0082	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0090	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-09/02/75	0	4	
CHIC0098	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	07/22/75-07/22/75	0	1	
CHIC0099	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0100	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0101	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0102	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0104	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-08/05/75	0	3	
CHIC0105	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0106	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0110	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	0	2	
CHIC0112	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-10/28/75	0	1	
CHIC0115	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	0	2	
CHIC0119	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-01/09/76	0	4	
CHIC0120	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	0	2	
CHIC0122	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	0	2	
CHIC0125	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/05/75-08/05/75	0	1	
CHIC0127	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	0	1	
CHIC0132	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-08/20/75	0	2	
CHIC0137	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-01/09/76	0	4	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0139	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0140	Yes	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0150	No	31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	0	3	
CHIC0073	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-05/28/75	0	1	
CHIC0081	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/24/75-06/24/75	0	1	
CHIC0090	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/11/75-06/11/75	0	1	
CHIC0098	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-09/21/75	0	4	
CHIC0104	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-05/13/75	0	2	
CHIC0129	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	09/12/75-09/14/75	0	2	
CHIC0132	Yes	31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-06/11/75	0	3	
CHIC0072	Yes	31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	0	36	
CHIC0076	Yes	31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	0	37	
CHIC0086	Yes	31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	01/30/67-05/22/67	0	47	
CHIC0092	Yes	31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	0	37	
CHIC0118	Yes	31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	0	37	
CHIC0079	Yes	31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	0	1	
CHIC0098	Yes	31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	0	1	
CHIC0129	Yes	31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	0	1	
CHIC0134	Yes	31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	0	1	
CHIC0013	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	1	27	
CHIC0018	No	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	0	6	
CHIC0028	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	1	69	
CHIC0049	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	1	27	
CHIC0050	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	1	27	
CHIC0067	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	0	1	
CHIC0075	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	0	14	
CHIC0083	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	0	44	
CHIC0089	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-12/12/76	0	4	
CHIC0113	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	0	30	
CHIC0116	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/30/76-06/23/77	0	12	
CHIC0123	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	0	1	
CHIC0124	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-01/21/77	0	3	
CHIC0126	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-11/14/76	0	3	
CHIC0133	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	0	14	
CHIC0136	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	0	1	
CHIC0138	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	0	1	
CHIC0142	Yes	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	0	14	
CHIC0145	No	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	0	5	
CHIC0149	No	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	0	13	
CHIC0153	No	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	0	6	
CHIC0155	No	31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	0	6	
CHIC0013	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	1	27	
CHIC0018	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	0	6	
CHIC0028	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	1	69	
CHIC0049	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	1	27	
CHIC0050	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	1	27	
CHIC0064	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0069	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0072	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	0	36	
CHIC0075	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	0	13	
CHIC0076	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	0	37	
CHIC0078	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0082	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0083	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-07/17/77	0	37	
CHIC0086	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	01/30/67-05/22/67	0	47	
CHIC0089	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-12/12/76	0	4	
CHIC0092	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	0	37	
CHIC0099	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0100	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0102	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0105	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0106	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0110	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	0	2	
CHIC0112	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-10/28/75	0	1	
CHIC0113	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-07/17/77	0	21	
CHIC0115	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	0	2	
CHIC0116	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-06/23/77	0	12	
CHIC0118	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	0	37	
CHIC0119	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	0	4	
CHIC0120	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	0	2	
CHIC0122	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	0	2	
CHIC0124	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/19/76-01/21/77	0	2	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0126	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-11/14/76	0	3	
CHIC0127	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	0	1	
CHIC0133	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	0	13	
CHIC0137	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	0	4	
CHIC0139	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0140	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0142	Yes	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	0	12	
CHIC0145	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	0	5	
CHIC0149	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	0	11	
CHIC0150	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	0	3	
CHIC0153	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	0	6	
CHIC0155	No	31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	0	6	
CHIC0013	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	1	27	
CHIC0028	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	1	69	
CHIC0049	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	1	27	
CHIC0050	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	1	27	
CHIC0072	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	0	23	
CHIC0076	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	0	23	
CHIC0086	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	0	23	
CHIC0092	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	0	23	
CHIC0118	Yes	31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	0	23	
CHIC0013	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	1	27	
CHIC0028	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	1	69	
CHIC0049	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	1	27	
CHIC0050	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	1	27	
CHIC0072	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	0	25	
CHIC0076	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	0	25	
CHIC0086	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	0	25	
CHIC0092	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	0	25	
CHIC0118	Yes	31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	0	25	
CHIC0059	Yes	32211	CHLOROPHYLL-A UG/L SPECTROPHOTOMETRIC ACID. METH.	08/26/91-08/26/91	0	1	
CHIC0015	Yes	32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	06/12/74-10/23/74	0	2	
CHIC0024	Yes	32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/74-10/23/74	0	3	
CHIC0051	Yes	32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/73-10/23/74	1	3	
CHIC0052	Yes	32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/74-10/23/74	0	3	
CHIC0061	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0063	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0065	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0074	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0087	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0094	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0095	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0096	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0097	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0117	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0128	Yes	34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	0	1	
CHIC0043	No	39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0045	No	39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0062	Yes	39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	0	1	
CHIC0066	Yes	39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	05/15/90-08/23/95	5	24	
CHIC0006	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	6	80	
CHIC0017	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0030	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0039	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0048	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	6	83	A
CHIC0056	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	81	
CHIC0061	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	9	
CHIC0063	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0065	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0074	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	3	9	
CHIC0080	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	
CHIC0087	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0088	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	6	81	
CHIC0091	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0094	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0095	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0096	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0097	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	14	
CHIC0103	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	
CHIC0108	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	81	
CHIC0109	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	80	
CHIC0114	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0117	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	3	9	
CHIC0128	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	81	
CHIC0144	Yes	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	6	80	
CHIC0146	No	45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	81	
CHIC0006	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	6	80	
CHIC0017	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0030	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0039	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	7	85	T,A,S
CHIC0048	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	6	83	A
CHIC0056	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	81	
CHIC0061	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	9	
CHIC0063	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0065	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0074	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	3	9	
CHIC0080	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	
CHIC0087	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	10	
CHIC0088	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	6	81	
CHIC0091	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0094	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0095	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0096	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	18	
CHIC0097	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	3	14	
CHIC0103	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	
CHIC0108	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	81	
CHIC0109	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	80	
CHIC0114	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	80	
CHIC0117	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	3	9	
CHIC0128	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	81	
CHIC0144	Yes	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	6	80	
CHIC0146	No	45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	81	
CHIC0072	Yes	46000	PHENOLS MG/L	01/28/67-01/28/67	0	3	
CHIC0076	Yes	46000	PHENOLS MG/L	01/28/67-01/28/67	0	3	
CHIC0086	Yes	46000	PHENOLS MG/L	01/28/67-01/28/67	0	3	
CHIC0092	Yes	46000	PHENOLS MG/L	01/28/67-01/28/67	0	3	
CHIC0118	Yes	46000	PHENOLS MG/L	01/28/67-01/28/67	0	3	
CHIC0005	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/19/77-10/19/77	0	1	
CHIC0007	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/04/77-07/04/77	0	2	
CHIC0018	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-06/13/77	0	7	
CHIC0025	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-02/12/77	0	1	
CHIC0029	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	03/09/77-07/04/77	0	4	
CHIC0031	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/31/78-08/31/78	0	1	
CHIC0043	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	0	1	
CHIC0045	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	0	1	
CHIC0047	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/18/77-10/18/77	0	1	
CHIC0053	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/04/77-07/04/77	0	2	
CHIC0055	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	03/09/77-07/04/77	0	3	
CHIC0058	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-06/23/76	0	2	
CHIC0060	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	04/14/60-07/20/60	0	2	
CHIC0062	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	0	1	
CHIC0066	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	04/10/90-08/23/95	5	24	
CHIC0067	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/76	0	3	
CHIC0068	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/76	0	3	
CHIC0070	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	0	1	
CHIC0071	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	0	1	
CHIC0075	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-06/23/77	0	16	
CHIC0077	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	0	2	
CHIC0083	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-01/21/77	0	7	
CHIC0084	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/05/76	0	1	
CHIC0085	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	0	2	
CHIC0089	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-12/12/76	0	4	
CHIC0107	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	0	1	
CHIC0111	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-06/23/76	0	2	
CHIC0113	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/04/76-06/23/77	1	7	
CHIC0116	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/30/76-06/23/77	0	13	
CHIC0121	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	0	1	
CHIC0123	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	0	2	
CHIC0124	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-12/19/76	0	3	
CHIC0126	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-11/14/76	0	3	
CHIC0130	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/03/72-08/03/72	0	1	
CHIC0131	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-09/18/76	0	6	
CHIC0133	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	1	20	
CHIC0135	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	0	2	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0138	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	0	2	
CHIC0141	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/18/76-06/18/76	0	1	
CHIC0142	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	1	20	
CHIC0143	Yes	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-09/18/76	0	6	
CHIC0145	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-06/13/77	0	6	
CHIC0148	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-09/05/76	0	3	
CHIC0149	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	1	21	
CHIC0151	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	0	1	
CHIC0152	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	0	1	
CHIC0153	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-01/21/77	0	6	
CHIC0154	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	01/21/76-12/19/76	0	6	
CHIC0155	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-01/21/77	0	6	
CHIC0156	No	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/20/60-08/23/60	0	2	
CHIC0005	No	70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	10/19/77-10/19/77	0	1	
CHIC0031	No	70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	08/31/78-08/31/78	0	1	
CHIC0047	No	70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	10/18/77-10/18/77	0	1	
CHIC0031	No	70302	SOLIDS, DISSOLVED-TONS PER DAY	08/31/78-08/31/78	0	1	
CHIC0047	No	70302	SOLIDS, DISSOLVED-TONS PER DAY	10/18/77-10/18/77	0	1	
CHIC0005	No	70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	10/19/77-10/19/77	0	1	
CHIC0031	No	70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	08/31/78-08/31/78	0	1	
CHIC0047	No	70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	10/18/77-10/18/77	0	1	
CHIC0060	Yes	70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	04/14/60-07/20/60	0	2	
CHIC0156	No	70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	07/20/60-08/23/60	0	2	
CHIC0008	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0009	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0012	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0016	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0020	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0022	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0023	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0026	Yes	70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	0	5	
CHIC0002	No	70331	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .062MM	04/26/57-06/12/62	5	7	
CHIC0066	Yes	70331	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .062MM	04/10/90-11/16/90	0	6	
CHIC0002	No	70332	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .125MM	04/26/57-06/12/62	5	6	
CHIC0002	No	70333	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .250MM	04/26/57-06/12/62	5	5	
CHIC0002	No	70334	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .500MM	04/26/57-10/18/60	3	3	
CHIC0002	No	70337	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .002MM	04/26/57-06/12/62	5	7	
CHIC0002	No	70338	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .004MM	04/26/57-06/12/62	5	7	
CHIC0002	No	70339	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .008MM	04/26/57-06/12/62	5	7	
CHIC0002	No	70340	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .016MM	04/26/57-06/12/62	5	7	
CHIC0002	No	70341	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .031MM	04/26/57-06/12/62	5	4	
CHIC0072	Yes	70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	01/28/67-01/28/67	0	2	
CHIC0076	Yes	70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	01/28/67-01/28/67	0	2	
CHIC0086	Yes	70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	01/28/67-01/28/67	0	2	
CHIC0092	Yes	70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	01/28/67-01/28/67	0	2	
CHIC0118	Yes	70505	PHOSPHATE,TOTAL,COLORIMETRIC METHOD (MG/L AS P)	01/28/67-01/28/67	0	3	
CHIC0006	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	5	61	
CHIC0017	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	5	63	
CHIC0018	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	03/09/77-07/01/77	0	2	
CHIC0030	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	5	63	
CHIC0039	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	5	63	
CHIC0048	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	5	62	
CHIC0056	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	63	
CHIC0059	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/22/91-08/26/91	0	3	
CHIC0061	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	10	
CHIC0063	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	11	
CHIC0065	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	11	
CHIC0066	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/16/90-12/01/92	2	7	
CHIC0074	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/22/89-10/21/93	4	10	
CHIC0075	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	0	4	
CHIC0080	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	5	63	
CHIC0083	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	0	2	
CHIC0087	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	11	
CHIC0088	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	62	
CHIC0089	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-11/14/76	0	1	
CHIC0091	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	13	
CHIC0094	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	13	
CHIC0095	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	13	
CHIC0096	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	13	
CHIC0097	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	4	13	
CHIC0103	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	5	63	
CHIC0108	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	63	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0109	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	63	
CHIC0114	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	5	63	
CHIC0116	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	0	3	
CHIC0117	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/22/89-10/21/93	4	10	
CHIC0126	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-11/14/76	0	1	
CHIC0128	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	64	
CHIC0133	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	0	4	
CHIC0142	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	0	4	
CHIC0144	Yes	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	5	63	
CHIC0145	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	07/01/77-07/01/77	0	1	
CHIC0146	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	5	63	
CHIC0149	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	0	5	
CHIC0153	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	0	2	
CHIC0154	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/21/76-01/21/76	0	1	
CHIC0155	No	70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	0	2	
CHIC0005	No	71825	ACIDITY, TOTAL (MG/L AS H)	10/19/77-10/19/77	0	1	
CHIC0031	No	71825	ACIDITY, TOTAL (MG/L AS H)	08/31/78-08/31/78	0	1	
CHIC0047	No	71825	ACIDITY, TOTAL (MG/L AS H)	10/18/77-10/18/77	0	1	
CHIC0060	Yes	71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	09/16/59-07/20/60	0	3	
CHIC0130	Yes	71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	08/03/72-08/03/72	0	1	
CHIC0156	No	71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	07/20/60-08/23/60	0	2	
CHIC0061	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0072	Yes	71870	BROMIDE (MG/L AS BR)	01/28/67-01/28/67	0	3	
CHIC0074	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0076	Yes	71870	BROMIDE (MG/L AS BR)	01/28/67-01/28/67	0	3	
CHIC0086	Yes	71870	BROMIDE (MG/L AS BR)	01/28/67-01/28/67	0	3	
CHIC0087	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0092	Yes	71870	BROMIDE (MG/L AS BR)	01/28/67-01/28/67	0	3	
CHIC0094	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0118	Yes	71870	BROMIDE (MG/L AS BR)	01/28/67-01/28/67	0	3	
CHIC0128	Yes	71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	0	1	
CHIC0061	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	9	
CHIC0063	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	10	
CHIC0065	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-06/11/90	1	9	
CHIC0074	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/22/89-10/21/93	4	7	
CHIC0087	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	10	
CHIC0091	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	31	
CHIC0094	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	30	
CHIC0095	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	28	
CHIC0096	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	31	
CHIC0097	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	4	31	
CHIC0117	Yes	71875	HYDROGEN SULFIDE (MG/L)	06/22/89-10/21/93	4	8	
CHIC0128	Yes	71875	HYDROGEN SULFIDE (MG/L)	10/21/93-10/21/93	0	1	
CHIC0005	No	71890	MERCURY, DISSOLVED (UG/L AS HG)	10/19/77-10/19/77	0	1	
CHIC0031	No	71890	MERCURY, DISSOLVED (UG/L AS HG)	08/31/78-08/31/78	0	1	
CHIC0047	No	71890	MERCURY, DISSOLVED (UG/L AS HG)	10/18/77-10/18/77	0	1	
CHIC0061	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0066	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	04/10/90-08/23/95	5	22	
CHIC0074	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	0	1	
CHIC0015	Yes	72025	DEPTH OF POND OR RESERVOIR IN FEET	06/12/74-10/23/74	0	2	
CHIC0024	Yes	72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/74-10/23/74	0	3	
CHIC0051	Yes	72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/73-10/23/74	1	3	
CHIC0052	Yes	72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/74-10/23/74	0	3	
CHIC0066	Yes	72103	SAMPLE LOCATION,RIGHT BANK(LOOKING DOWNSTREAM)(FT)	06/29/94-06/29/94	0	8	
CHIC0013	Yes	74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	1	13	

[1]T=Times Series Plot, A=Annual Plot, and S=Seasonal Plot

Station/Parameter Period of Record Tabulation
From 09/10/51 To 08/23/95

Station	In Park	Code	Name	Start - End	Years	Obs	Plots[1]
CHIC0028	Yes	74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	1	78	
CHIC0049	Yes	74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	1	13	
CHIC0050	Yes	74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	1	13	
CHIC0061	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0063	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0065	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0074	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0087	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0091	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0094	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0095	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0096	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0097	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0117	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0128	Yes	74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	0	1	
CHIC0010	Yes	78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0042	Yes	78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0054	Yes	78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0010	Yes	78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0042	Yes	78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0054	Yes	78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0010	Yes	78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0042	Yes	78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0054	Yes	78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0010	Yes	78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0042	Yes	78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0054	Yes	78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0010	Yes	78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0042	Yes	78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0054	Yes	78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	0	1	
CHIC0002	No	80154	SUSP. SEDIMENT CONCENTRATION-EVAP. AT 110C (MG/L)	04/26/57-07/11/62	5	19	
CHIC0066	Yes	80154	SUSP. SEDIMENT CONCENTRATION-EVAP. AT 110C (MG/L)	04/10/90-11/16/90	0	6	
CHIC0002	No	80155	SUSPENDED SEDIMENT DISCHARGE (TONS/DAY)	10/18/60-07/11/62	1	16	
CHIC0002	No	80164	BED MATERIAL SIEVE DIAMETER,% FINER THAN .062MM	04/26/57-10/18/60	3	8	
CHIC0002	No	80165	BED MATERIAL SIEVE DIAMETER,% FINER THAN .125MM	04/26/57-03/04/63	5	14	
CHIC0002	No	80166	BED MATERIAL SIEVE DIAMETER,% FINER THAN .250MM	04/26/57-03/04/63	5	18	
CHIC0002	No	80167	BED MATERIAL SIEVE DIAMETER,% FINER THAN .500MM	04/26/57-03/04/63	5	18	
CHIC0002	No	80168	BED MATERIAL SIEVE DIAMETER,% FINER THAN 1.00MM	04/26/57-03/04/63	5	18	
CHIC0002	No	80169	BED MATERIAL SIEVE DIAMETER,% FINER THAN 2.00MM	04/26/57-03/04/63	5	18	
CHIC0002	No	80170	BED MATERIAL SIEVE DIAMETER,% FINER THAN 4.00MM	04/26/57-03/04/63	5	15	
CHIC0002	No	80171	BED MATERIAL SIEVE DIAMETER,% FINER THAN 8.00MM	04/26/57-03/04/63	5	14	
CHIC0002	No	80172	BED MATERIAL SIEVE DIAMETER,% FINER THAN 16.0MM	06/09/60-06/09/60	0	3	
CHIC0002	No	80173	BED MATERIAL SIEVE DIAMETER,% FINER THAN 32.0MM	06/09/60-10/18/60	0	2	
CHIC0014	No	81024	DRAINAGE AREA IN SQUARE MILES (SQ. MI.)	02/24/77-02/14/79	1	3	
CHIC0037	No	81024	DRAINAGE AREA IN SQUARE MILES (SQ. MI.)	02/22/77-09/27/77	0	2	
CHIC0066	Yes	81903	DEPTH OF BOTTOM OF WATER BODY @ SAMPLE SITE, FEET	06/29/94-08/23/95	1	28	
CHIC0006	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	7	81	T,A,S
CHIC0017	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	7	85	T,A,S
CHIC0030	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	7	85	T,A,S
CHIC0039	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	7	85	A,S
CHIC0048	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	6	83	A
CHIC0056	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	6	81	
CHIC0080	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	81	
CHIC0088	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	6	81	
CHIC0103	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	81	
CHIC0108	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	81	
CHIC0109	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	81	
CHIC0114	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	81	
CHIC0128	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	81	
CHIC0144	Yes	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	6	81	
CHIC0146	No	82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	6	81	
CHIC0059	Yes	82398	SAMPLING METHOD (CODES)	02/22/91-08/26/91	0	3	
CHIC0066	Yes	82398	SAMPLING METHOD (CODES)	12/01/92-08/23/95	2	12	
CHIC0005	No	84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)	10/19/77-10/19/77	0	1	
CHIC0047	No	84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)	10/18/77-10/18/77	0	1	
CHIC0059	Yes	84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)	08/26/91-08/26/91	0	1	
CHIC0130	Yes	84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)	08/03/72-08/03/72	0	1	
CHIC0005	No	84001	AQUIFER NAME CODE (SEE USGS CATALOG)	10/19/77-10/19/77	0	1	
CHIC0047	No	84001	AQUIFER NAME CODE (SEE USGS CATALOG)	10/18/77-10/18/77	0	1	
CHIC0059	Yes	84001	AQUIFER NAME CODE (SEE USGS CATALOG)	08/26/91-08/26/91	0	1	
CHIC0130	Yes	84001	AQUIFER NAME CODE (SEE USGS CATALOG)	08/03/72-08/03/72	0	1	

[1]T=Time Series Plot, A=Annual Plot, S=Seasonal Plot

Station-By-Station Results

Station Inventory for Station: CHIC0001

NPS Station ID: CHIC0001 LAT/LON: 34.396920/ -97.067671 Agency: 11NPSWRD Date Created: 09/20/97
Location: DEEL CK.200 FT UPSTREAM OF WASHITA R. CONFLUENCE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OGS_DEEL /2S-2E-11 CAB
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 750 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON DEEL CREEK APPROXIMATELY 200 FEET UPSTREAM FROM THE DEEL CREEK - WASHITA RIVER CONFLUENCE. SAMPLES FOR THE SITE WERE COLLECTED FEBRUARY 15 1979 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0001

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/15/79-02/15/79	1	13.5	13.5	13.5	13.5	0.	0.	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	02/15/79-02/15/79	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/15/79-02/15/79	1	495.	495.	495.	495.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	02/15/79-02/15/79	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	02/15/79-02/15/79	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/15/79-02/15/79	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0001

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400 PH	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
	Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0002

NPS Station ID: CHIC0002
LAT/LON: 34.397226/ -97.036115
Agency: 112WRD
Date Created: 09/26/78
Location: ROCK CREEK AT DOUGHERTY, OK
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 07329900
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130303088803.69
RF3 Mile Point: 5.92
Distance from RF3: 0.21
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0002

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/10/51-06/12/62	51	20.	20.114	30.6	6.1	54.434	7.378	7.9	15.	27.2	29.
00061	FLOW, STREAM, INSTANTANEOUS CFS	09/10/51-07/11/62	53	15.	120.472	1480.	0.4	81386.813	285.284	2.4	6.	47.	438.8
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	09/10/51-12/20/56	33	1500.	1502.697	3040.	299.	356473.593	597.054	567.8	1065.	1890.	2212.
00400	PH (STANDARD UNITS)	09/10/51-12/20/56	33	8.	7.97	8.7	7.	0.132	0.363	7.48	7.75	8.2	8.36
00400	CONVERTED PH (STANDARD UNITS)	09/10/51-12/20/56	33	8.	7.79	8.7	7.	0.165	0.406	7.48	7.75	8.2	8.36
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/10/51-12/20/56	33	0.01	0.016	0.1	0.002	0.	0.021	0.004	0.006	0.018	0.034
00405	CARBON DIOXIDE (MG/L AS CO2)	09/10/51-12/20/56	33	3.4	6.291	40.	1.	61.95	7.871	1.62	2.55	6.45	13.4
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	09/10/51-12/20/56	33	205.	208.182	279.	115.	1633.778	40.42	148.2	184.5	244.	256.6
00440	BICARBONATE ION (MG/L AS HCO3)	09/10/51-12/20/56	33	250.	251.424	340.	140.	2314.627	48.111	180.4	221.5	285.5	313.2
00445	CARBONATE ION (MG/L AS CO3)	09/10/51-12/20/56	33	0.	1.182	18.	0.	13.091	3.618	0.	0.	0.	4.
00900	HARDNESS, TOTAL (MG/L AS CACO3)	09/10/51-12/20/56	33	302.	303.	430.	114.	4886.688	69.905	213.2	264.	350.5	396.
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	09/10/51-12/20/56	33	84.	95.242	204.	0.	2211.689	47.029	42.6	63.	126.5	168.4
00915	CALCIUM, DISSOLVED (MG/L AS CA)	09/10/51-12/20/56	33	71.	72.879	108.	22.	325.235	18.034	52.2	62.5	86.	99.6
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	09/10/51-12/20/56	33	31.	29.303	54.	8.	104.843	10.239	13.4	23.	38.	40.6
00930	SODIUM, DISSOLVED (MG/L AS NA)	01/16/52-12/20/56	30	192.	197.7	479.	13.	11314.355	106.369	36.4	117.5	268.5	338.8
00931	SODIUM ADSORPTION RATIO	01/16/52-12/20/56	30	4.5	4.75	10.	0.5	5.391	2.322	1.22	3.225	6.2	8.12
00932	SODIUM, PERCENT	01/16/52-12/20/56	30	55.5	53.967	72.	18.	184.999	13.601	32.1	51.	63.25	70.6
00940	CHLORIDE,TOTAL IN WATER MG/L	09/10/51-12/20/56	33	310.	321.485	800.	10.	29222.008	170.944	70.	205.	435.	534.8
70331	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .062MM	04/26/57-06/12/62	7	98.	91.	100.	79.	96.667	9.832	**	**	**	**
70332	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .125MM	04/26/57-06/12/62	6	97.	95.667	100.	89.	18.667	4.32	**	**	**	**
70333	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .250MM	04/26/57-06/12/62	5	99.	99.4	100.	99.	0.3	0.548	**	**	**	**
70334	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .500MM	04/26/57-10/18/60	3	100.	100.	100.	100.	0.	0.	**	**	**	**
70337	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .002MM	04/26/57-06/12/62	7	61.	62.857	92.	39.	297.476	17.247	**	**	**	**
70338	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .004MM	04/26/57-06/12/62	7	68.	70.143	95.	47.	240.476	15.507	**	**	**	**
70339	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .008MM	04/26/57-06/12/62	7	78.	75.143	96.	50.	219.81	14.826	**	**	**	**
70340	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .016MM	04/26/57-06/12/62	7	85.	81.143	96.	60.	177.476	13.322	**	**	**	**
70341	SUS SED FALL DIA(DISTLD WATER)%FINER THAN .031MM	04/26/57-06/12/62	4	80.	80.25	97.	64.	294.25	17.154	**	**	**	**
80154	SUSP. SEDIMENT CONCENTRATION-EVAP. AT 110C (MG/L)	04/26/57-07/11/62	19	332.	1550.579	7660.	10.	5861847.924	2421.125	15.	27.	1920.	7660.
80155	SUSPENDED SEDIMENT DISCHARGE (TONS/DAY)	10/18/60-07/11/62	16	124.5	3006.896	13600.	0.73	25141360.632	5014.116	0.856	5.35	6110.	12270.
80164	BED MATERIAL SIEVE DIAMETER,% FINER THAN .062MM	04/26/57-10/18/60	8	22.	31.	82.	1.	1091.429	33.037	**	**	**	**
80165	BED MATERIAL SIEVE DIAMETER,% FINER THAN .125MM	04/26/57-03/04/63	14	4.	21.286	86.	1.	926.374	30.436	1.	1.75	47.5	78.
80166	BED MATERIAL SIEVE DIAMETER,% FINER THAN .250MM	04/26/57-03/04/63	18	13.5	29.889	91.	1.	1001.869	31.652	1.	5.	60.75	84.7
80167	BED MATERIAL SIEVE DIAMETER,% FINER THAN .500MM	04/26/57-03/04/63	18	23.5	39.722	93.	5.	1036.448	32.194	7.7	12.5	77.	90.3
80168	BED MATERIAL SIEVE DIAMETER,% FINER THAN 1.00MM	04/26/57-03/04/63	18	38.5	49.444	98.	13.	939.673	30.654	18.4	24.5	86.5	97.1
80169	BED MATERIAL SIEVE DIAMETER,% FINER THAN 2.00MM	04/26/57-03/04/63	18	55.5	63.056	100.	28.	593.467	24.361	31.6	42.5	92.25	100.
80170	BED MATERIAL SIEVE DIAMETER,% FINER THAN 4.00MM	04/26/57-03/04/63	15	79.	75.333	97.	38.	263.81	16.242	44.6	68.	86.	96.4
80171	BED MATERIAL SIEVE DIAMETER,% FINER THAN 8.00MM	04/26/57-03/04/63	14	95.	89.	100.	49.	206.923	14.385	59.5	82.	98.25	99.5
80172	BED MATERIAL SIEVE DIAMETER,% FINER THAN 16.0MM	06/09/60-06/09/60	3	100.	97.667	100.	93.	16.333	4.041	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0002

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
80173	BED MATERIAL SIEVE DIAMETER,% FINER THAN 32.0MM	06/09/60-10/18/60	2	100.	100.	100.	100.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0002

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	33	0	0.00	12	0	0.00	14	0	0.00	7	0	0.00			
		Other-Lo Lim.	6.5	33	0	0.00	12	0	0.00	14	0	0.00	7	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	33	0	0.00	12	0	0.00	14	0	0.00	7	0	0.00			
		Drinking Water	250.	33	22	0.67	12	10	0.83	14	8	0.57	7	4	0.57			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0002

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/10/51-06/12/62	18	15.	14.789	27.2	6.1	42.415	6.513	6.64	8.175	20.	22.25

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0002

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/10/51-06/12/62	26	21.1	21.927	30.6	7.8	41.76	6.462	11.1	17.95	28.475	29.12

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0002

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/10/51-06/12/62	7	27.8	27.071	28.9	23.9	3.649	1.91	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0003

NPS Station ID: CHIC0003 LAT/LON: 34.398059/ -97.082588 Agency: 11NPSWRD Date Created: 09/20/97
Location: UNNAMED SPRING 1.5 MILES WEST OF DOUGHERTY FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_OGS_UNN_52/2S-2E-10BDD1
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 900 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT AN UNNAMED SPRING ALONG DEEL CREEK APPROXIMATELY 1 MILE WEST OF THE WASHITA RIVER AND 1.5 MILES WEST OF DOUGHERTY. THE SPRING IS DESCRIBED AS A "FRACTURE" TYPE. SAMPLES FOR THE SITE WERE COLLECTED DECEMBER 29 1977 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0003

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/29/77-12/29/77	1	17.	17.	17.	17.	0.	0.	**	**	**	**
00058	FLOW, RATE GALLONS/MIN	12/29/77-12/29/77	1	120.	120.	120.	120.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	12/29/77-12/29/77	1	570.	570.	570.	570.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	12/29/77-12/29/77	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	12/29/77-12/29/77	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	12/29/77-12/29/77	1	0.032	0.032	0.032	0.032	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0003

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
		Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0004

NPS Station ID: CHIC0004 LAT/LON: 34.399004/ -97.082392 Agency: 11NPSWRD Date Created: 09/20/97
Location: UNNAMED SPRING 1.5 MILES WEST OF DOUGHERTY FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_OGS_UNN_53/2S-2E-10BDD2
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 900 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT AN UNNAMED SPRING ALONG DEEL CREEK APPROXIMATELY 1.5 MILES WEST OF DOUGHERTY AND 100 FEET NORTH OF CHIC_OGS_UNN_52. THE SPRING IS DESCRIBED AS A "FRACTURE" SPRING. SAMPLES FOR THE SITE WERE COLLECTED DECEMBER 29 1977 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0004

Parameter	Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010 TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/29/77-12/29/77	1	17.	17.	17.	17.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

********** No EPA Water Quality Criteria exist to compare against the data at this station. **********

Station Inventory for Station: CHIC0005

NPS Station ID: CHIC0005
Location: 02S-03E-09 AAB 1
Station Type: /TYPA/AMBNT/STREAM
RMI-Indexes:
RMI-Miles:
HUC: 11130304
Major Basin:
Minor Basin:
RF1 Index: 11130304
RF3 Index: 11130303089203.80
Description:

LAT/LON: 34.404727/ -96.989726

Depth of Water: 0
Elevation: 0

RF1 Mile Point: 0.000
RF3 Mile Point: 4.85

Agency: 112WRD
FIPS State/County: 40099 OKLAHOMA/MURRAY
STORET Station ID(s): 342417096592301
Within Park Boundary: No

Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 14.10
Distance from RF3: 0.54

Date Created: 04/14/78

On/Off RF1:
On/Off RF3:

Parameter Inventory for Station: CHIC0005

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/19/77-07/28/88	2	19.25	19.25	19.5	19.	0.125	0.354	**	**	**	**
00080	COLOR (PLATINUM-COBALT UNITS)	10/19/77-10/19/77	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/19/77-07/28/88	2	567.5	567.5	575.	560.	112.5	10.607	**	**	**	**
00400	PH (STANDARD UNITS)	10/19/77-07/28/88	2	7.55	7.55	7.6	7.5	0.005	0.071	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	10/19/77-07/28/88	2	7.547	7.547	7.6	7.5	0.005	0.071	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/19/77-07/28/88	2	0.028	0.028	0.032	0.025	0.	0.005	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	10/19/77-10/19/77	1	12.	12.	12.	12.	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	1	250.	250.	250.	250.	0.	0.	**	**	**	**
00435	ACIDITY, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	10/19/77-10/19/77	1	310.	310.	310.	310.	0.	0.	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	10/19/77-10/19/77	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/19/77-10/19/77	1	170.	170.	170.	170.	0.	0.	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/19/77-10/19/77	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/19/77-10/19/77	1	39.	39.	39.	39.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/19/77-10/19/77	1	18.	18.	18.	18.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	10/19/77-10/19/77	1	66.	66.	66.	66.	0.	0.	**	**	**	**
00931	SODIUM ADSORPTION RATIO	10/19/77-10/19/77	1	2.2	2.2	2.2	2.2	0.	0.	**	**	**	**
00932	SODIUM, PERCENT	10/19/77-10/19/77	1	45.	45.	45.	45.	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	10/19/77-10/19/77	1	4.7	4.7	4.7	4.7	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/19/77-10/19/77	1	9.	9.	9.	9.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	10/19/77-10/19/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
00950	FLUORIDE, DISSOLVED (MG/L AS F)	10/19/77-10/19/77	1	0.3	0.3	0.3	0.3	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	10/19/77-10/19/77	1	9.3	9.3	9.3	9.3	0.	0.	**	**	**	**
01000	ARSENIC, DISSOLVED (UG/L AS AS)	10/19/77-10/19/77	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01025	CADMIUM, DISSOLVED (UG/L AS CD)	10/19/77-10/19/77	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	10/19/77-10/19/77	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	10/19/77-10/19/77	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	10/19/77-10/19/77	1	350.	350.	350.	350.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	10/19/77-10/19/77	1	24.	24.	24.	24.	0.	0.	**	**	**	**
01056	MANGANESE, DISSOLVED (UG/L AS MN)	10/19/77-10/19/77	1	8.	8.	8.	8.	0.	0.	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	10/19/77-10/19/77	1	160.	160.	160.	160.	0.	0.	**	**	**	**
01106	ALUMINUM, DISSOLVED (UG/L AS AL)	10/19/77-10/19/77	1	30.	30.	30.	30.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/19/77-10/19/77	1	314.	314.	314.	314.	0.	0.	**	**	**	**
70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	10/19/77-10/19/77	1	306.	306.	306.	306.	0.	0.	**	**	**	**
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	10/19/77-10/19/77	1	0.43	0.43	0.43	0.43	0.	0.	**	**	**	**
71825	ACIDITY, TOTAL (MG/L AS H)	10/19/77-10/19/77	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**
71890	MERCURY, DISSOLVED (UG/L AS HG)	10/19/77-10/19/77	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0005

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00	1	0	0.00									
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	1	0	0.00	1	0	0.00									
01000	ARSENIC, DISSOLVED	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	1	0	0.00	1	0	0.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00	1	0	0.00									
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	1	1.00	1	1	1.00									
01090	ZINC, DISSOLVED	Fresh Acute	120.	1	1	1.00	1	1	1.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
71890	MERCURY, DISSOLVED	Fresh Acute	2.4	1	0	0.00	1	0	0.00									
		Drinking Water	2.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0006

NPS Station ID: CHIC0006
LAT/LON: 34.414226/ -96.967809
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Buckhorn Creek 3.3m Below Catfish Farm
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_BUCK5
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 890
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T2S/R3E/2. Station is known as Buckhorn Creek Site 5 and is located on Buckhorn Creek 3.3 miles below the catfish farm; 6.7 miles below Lowrance Springs; approximately 0.4 miles before entry to Buckhorn Arm of Lake of the Arbuckles. Samples were taken from the center of low water bridge - upstream side. The station is located on private property. This is the last accessible Buckhorn Creek site before Lake of the Arbuckles. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	81	14.2	14.969	27.4	4.2	58.839	7.671	5.42	6.85	22.4	25.52
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	81	532.	516.469	614.	270.	5137.627	71.677	451.	505.	555.	590.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	80	8.4	8.223	10.8	3.8	2.665	1.632	5.92	7.1	9.575	10.3
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	81	8.3	8.26	8.8	7.2	0.069	0.263	7.8	8.2	8.4	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	81	8.3	8.149	8.8	7.2	0.082	0.285	7.8	8.2	8.4	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	81	0.005	0.007	0.063	0.002	0.	0.008	0.003	0.004	0.006	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	81	284.	277.605	304.	142.	494.592	22.239	254.	265.5	291.	298.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	80	0.07	0.094	0.5	0.03	0.005	0.071	0.04	0.05	0.11	0.18
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	59	0.002	0.003	0.029	0.	0.	0.004	0.001	0.002	0.003	0.005
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	81	0.32	0.317	0.69	0.13	0.008	0.091	0.21	0.25	0.375	0.428
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	59	0.1	0.127	0.6	0.	0.009	0.097	0.03	0.08	0.15	0.22
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	80	297.5	292.925	342.	139.	741.564	27.232	262.3	285.	309.75	315.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	80	17.	19.163	37.	10.	33.834	5.817	14.	15.	22.	29.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	80	268.5	269.05	332.	139.	1377.567	37.116	223.1	250.25	300.75	309.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	80	9.	23.875	145.	0.	952.035	30.855	0.	0.	40.5	71.9
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	61	0.12	0.14	0.44	0.04	0.008	0.091	0.05	0.08	0.175	0.31
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	81	4.2	5.065	14.2	0.7	8.251	2.872	2.54	3.2	5.75	9.8

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

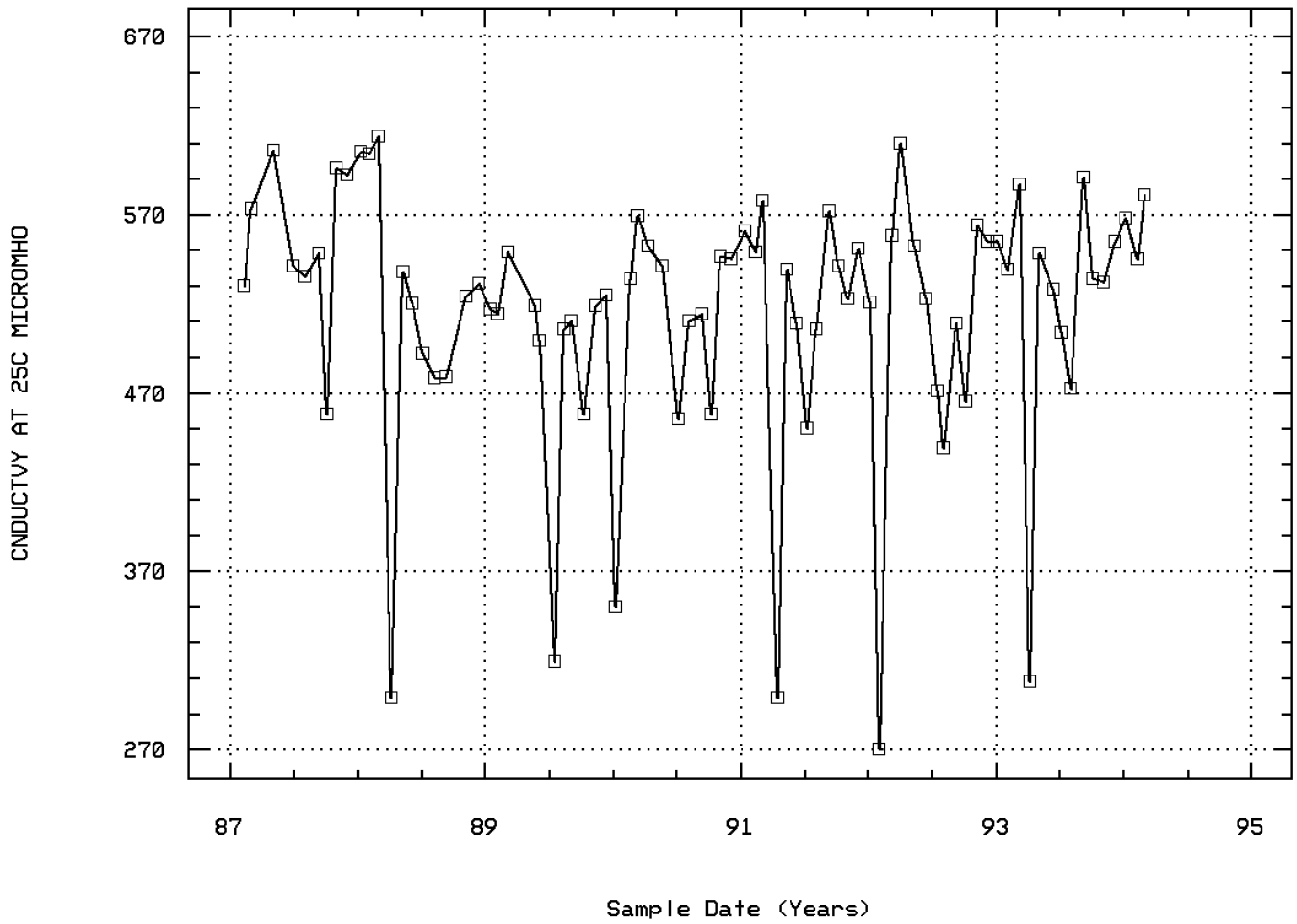
EPA Water Quality Criteria Analysis for Station: CHIC0006

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	1	0.01	35	0	0.00	25	0	0.00	20	1	0.05			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	35	0	0.00	25	0	0.00	21	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	35	0	0.00	25	0	0.00	21	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	25	0	0.00	19	0	0.00	15	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	35	0	0.00	25	0	0.00	21	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	80	0	0.00	35	0	0.00	25	0	0.00	20	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	35	0	0.00	25	0	0.00	21	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station: CHIC0006 Parameter Code: 00095

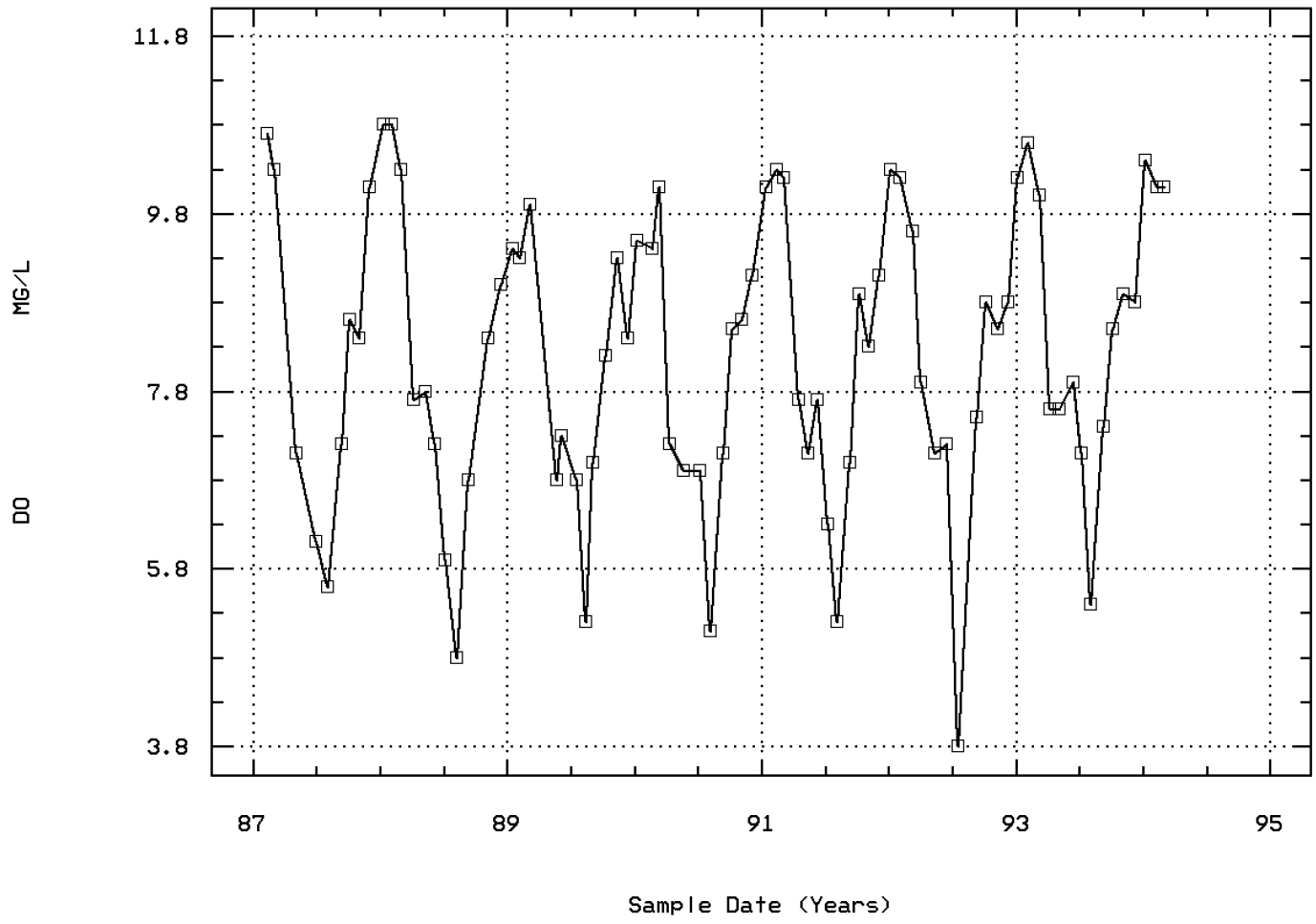
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00300

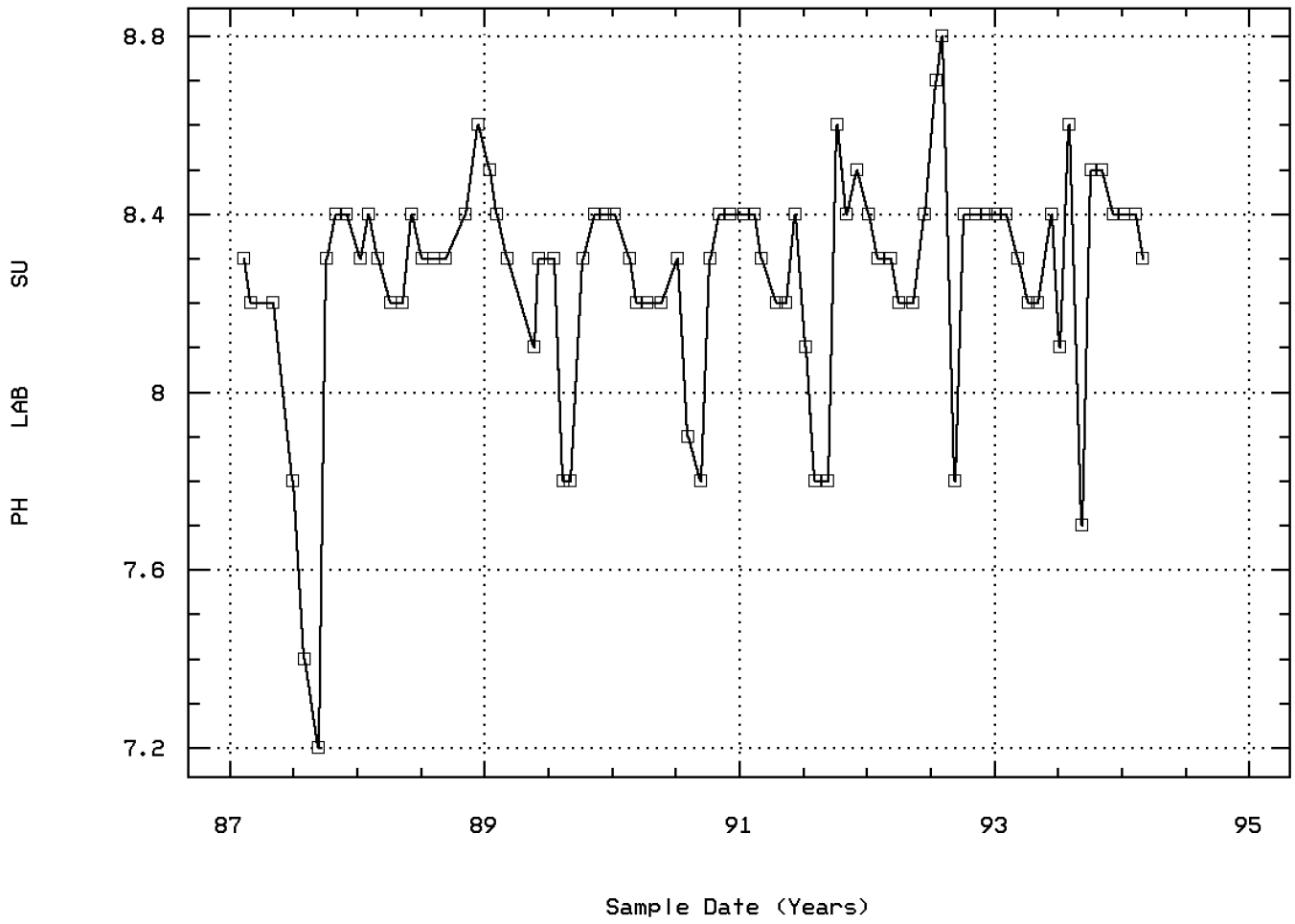
OXYGEN, DISSOLVED



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00403

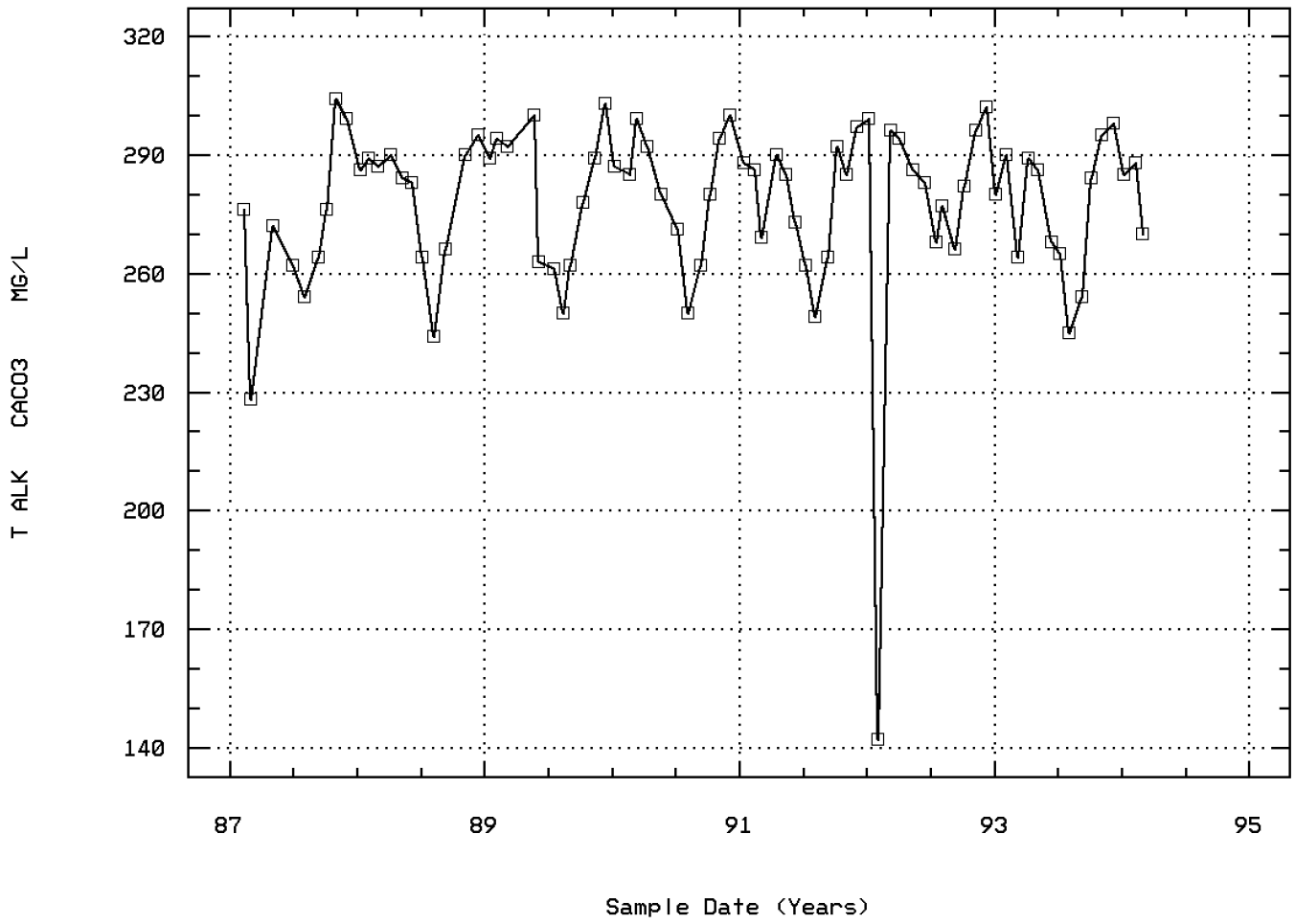
PH, LAB, STANDARD UNITS



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00410

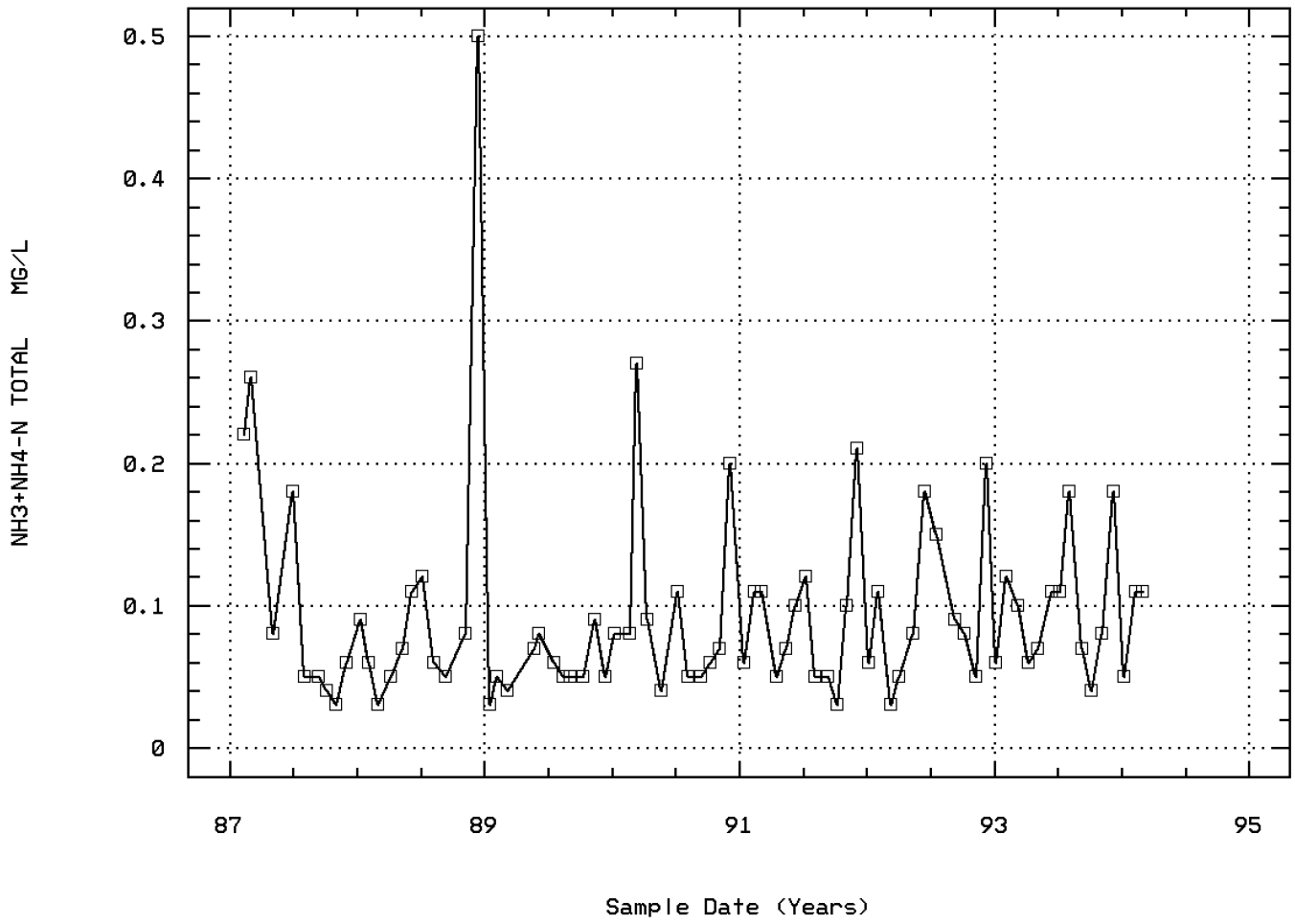
ALKALINITY, TOTAL (MG/L AS CACO3)



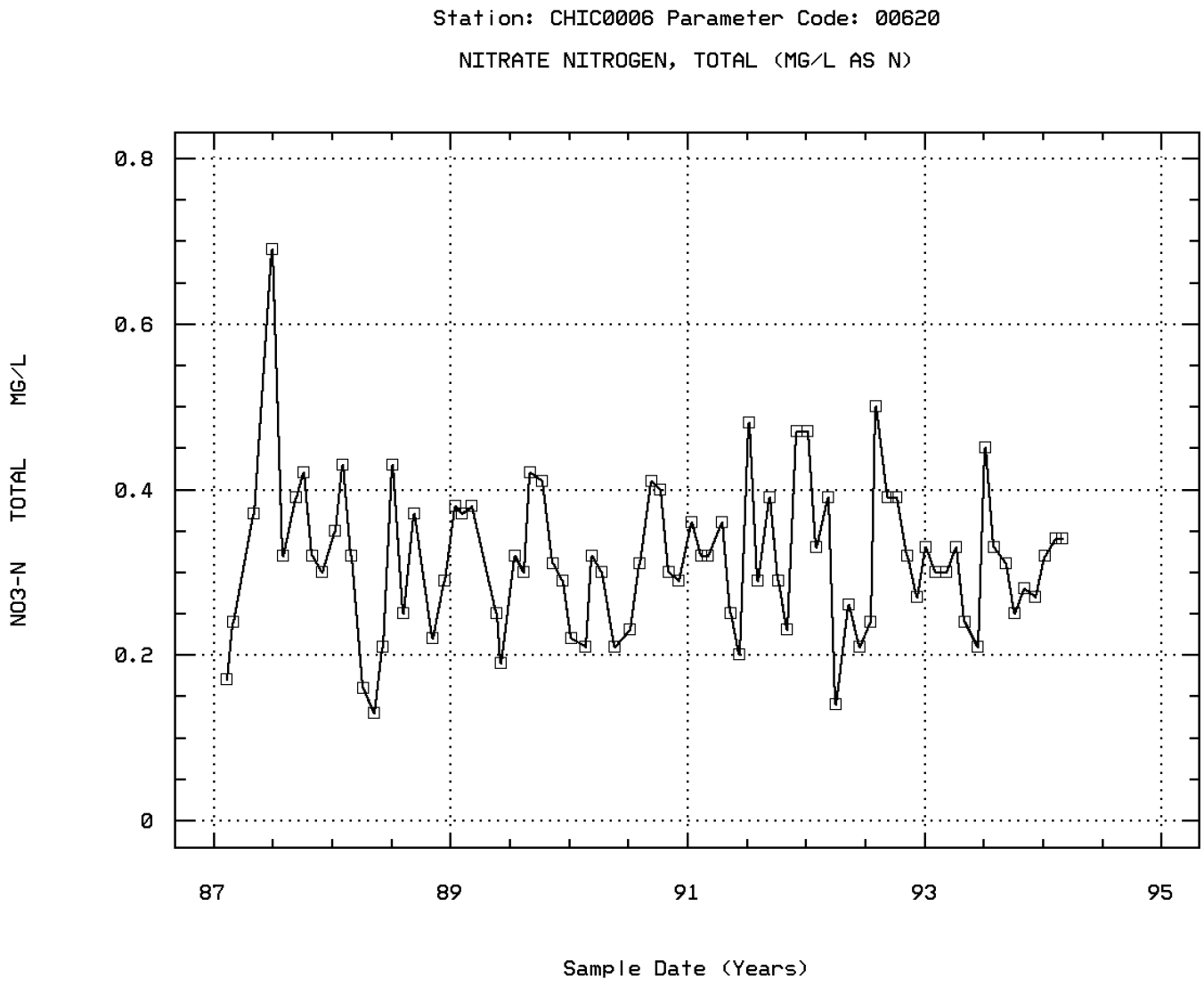
Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00610

NITROGEN, AMMONIA, TOTAL (MG/L AS N)



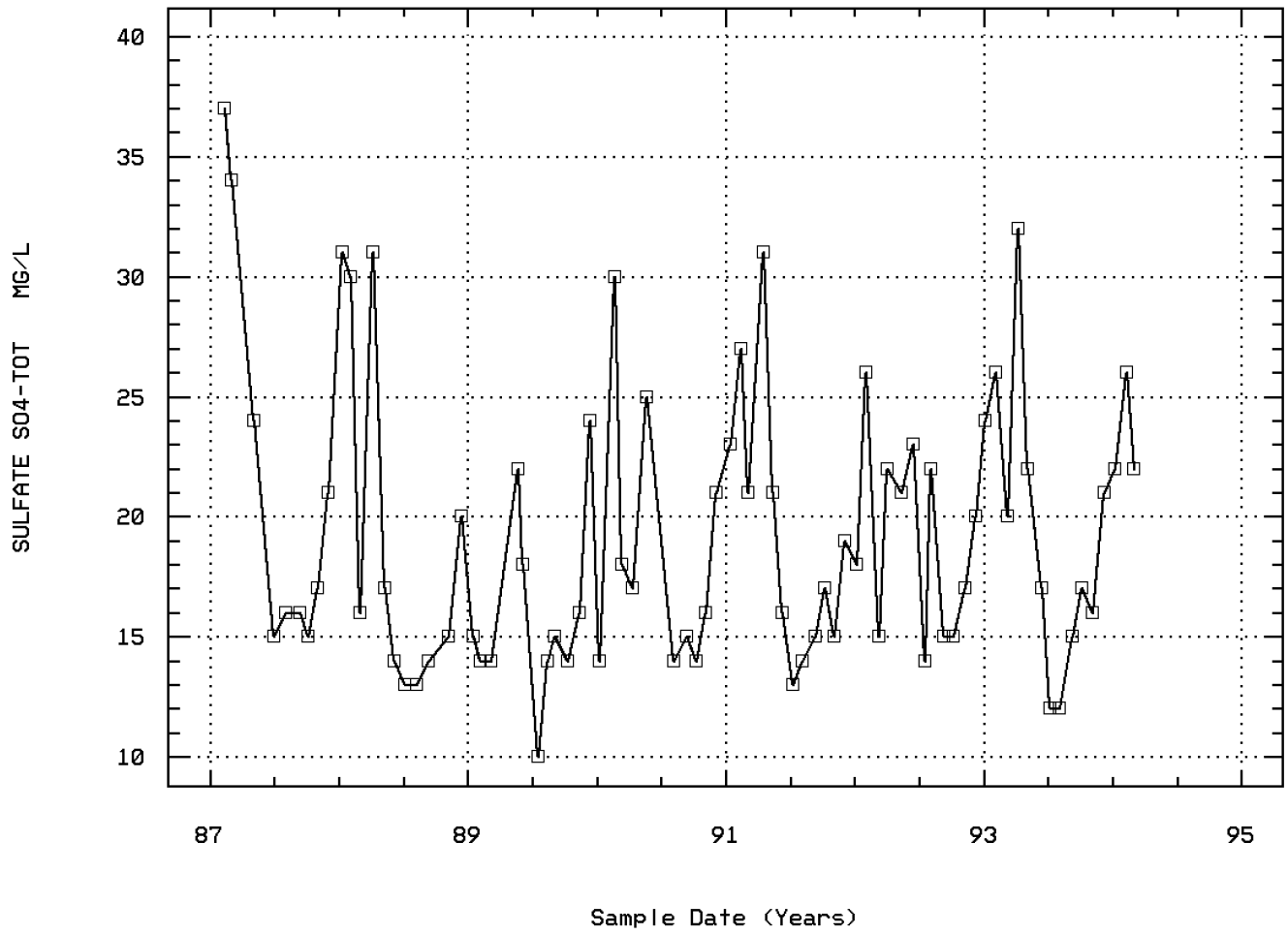
Buckhorn Creek 3.3m Below Catfish Farm



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00945

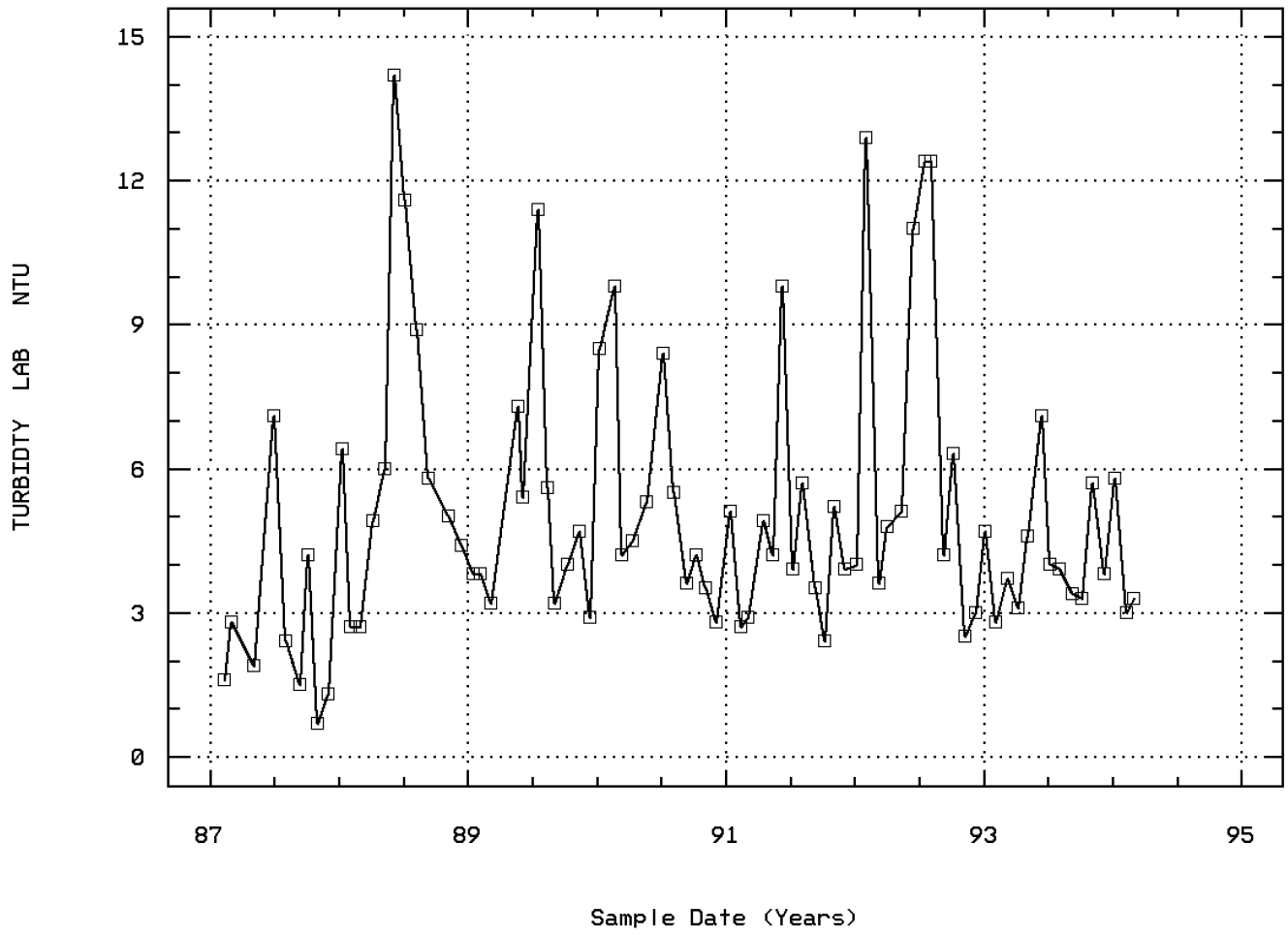
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 3.3m Below Catfish Farm

Annual Analysis for 1987 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	9	14.3	15.644	26.7	6.6	61.978	7.873	6.6	7.55	23.2	26.7
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	9	548.	553.222	606.	458.	2078.194	45.587	458.	532.5	594.	606.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	9	8.4	8.233	10.7	5.6	3.48	1.865	5.6	6.6	10.2	10.7
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	9	8.2	8.022	8.4	7.2	0.202	0.449	7.2	7.6	8.35	8.4
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	9	8.2	7.78	8.4	7.2	0.268	0.518	7.2	7.6	8.35	8.4
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	9	0.006	0.017	0.063	0.004	0.	0.021	0.004	0.004	0.028	0.063
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	9	272.	270.556	304.	228.	523.778	22.886	228.	258.	287.5	304.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	9	0.06	0.108	0.26	0.03	0.008	0.088	0.03	0.045	0.2	0.26
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	9	0.002	0.005	0.029	0.	0.	0.009	0.	0.001	0.004	0.029
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	9	0.32	0.358	0.69	0.17	0.021	0.146	0.17	0.27	0.405	0.69
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	9	0.11	0.154	0.6	0.	0.031	0.176	0.	0.06	0.165	0.6
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	8	292.5	286.75	318.	235.	693.643	26.337	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	9	17.	21.667	37.	15.	71.	8.426	15.	15.5	29.	37.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	8	242.	243.125	318.	150.	3706.696	60.883	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	8	13.	43.625	145.	0.	3168.554	56.29	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	9	1.9	2.611	7.1	0.7	3.861	1.965	0.7	1.4	3.5	7.1

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	11	13.4	15.118	27.4	5.	65.234	8.077	5.08	5.5	22.2	27.04
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	11	524.	516.727	614.	299.	7653.018	87.482	334.8	479.	604.	612.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	7.8	8.136	10.8	4.8	3.879	1.969	5.02	6.8	10.3	10.8
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	11	8.3	8.336	8.6	8.2	0.013	0.112	8.2	8.3	8.4	8.56
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	11	8.3	8.324	8.6	8.2	0.013	0.113	8.2	8.3	8.4	8.56
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	11	0.005	0.005	0.006	0.003	0.	0.001	0.003	0.004	0.005	0.006
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	11	286.	279.818	295.	244.	236.364	15.374	248.	266.	290.	294.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.07	0.111	0.5	0.03	0.017	0.132	0.034	0.05	0.11	0.424
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	11	0.002	0.003	0.008	0.001	0.	0.002	0.001	0.001	0.004	0.007
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.29	0.287	0.43	0.13	0.011	0.103	0.136	0.21	0.37	0.43
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	11	0.08	0.082	0.2	0.02	0.003	0.058	0.022	0.03	0.1	0.194
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	11	303.	297.727	329.	250.	695.218	26.367	251.	284.	317.	328.8
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	11	16.	19.455	31.	13.	55.873	7.475	13.	14.	30.	31.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	255.	267.455	317.	225.	984.673	31.379	227.2	250.	303.	316.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	0.	30.273	76.	0.	1242.018	35.242	0.	0.	71.	75.2
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	11	5.8	6.6	14.2	2.7	12.98	3.603	2.7	4.4	8.9	13.68

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	11	14.3	14.945	27.	4.2	82.183	9.065	4.44	5.7	22.9	26.64
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	11	514.	494.091	549.	319.	3851.091	62.057	346.8	499.	519.	544.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	8.2	7.964	9.9	5.2	2.135	1.461	5.52	6.8	9.3	9.8
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	11	8.3	8.236	8.5	7.8	0.057	0.238	7.8	8.1	8.4	8.48
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	11	8.3	8.168	8.5	7.8	0.062	0.249	7.8	8.1	8.4	8.48
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	11	0.005	0.007	0.016	0.003	0.	0.005	0.003	0.004	0.008	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	11	289.	280.091	303.	250.	330.891	18.19	252.2	262.	294.	302.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.05	0.056	0.09	0.03	0.	0.017	0.032	0.05	0.07	0.088
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	11	0.002	0.003	0.008	0.002	0.	0.002	0.002	0.002	0.003	0.007
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.32	0.329	0.42	0.19	0.005	0.071	0.202	0.29	0.38	0.418
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	11	0.09	0.105	0.39	0.03	0.01	0.1	0.03	0.04	0.1	0.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	11	292.	289.091	326.	240.	573.291	23.943	245.2	271.	307.	323.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	11	15.	16.	24.	10.	15.8	3.975	10.8	14.	18.	23.6
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	292.	282.091	309.	230.	560.891	23.683	236.4	263.	298.	308.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	4.	7.	22.	0.	62.	7.874	0.	0.	15.	21.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	11	0.09	0.138	0.36	0.05	0.011	0.105	0.05	0.07	0.17	0.35
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	11	4.	5.027	11.4	2.9	6.162	2.482	2.96	3.2	5.6	10.58

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	11	14.3	15.664	27.1	6.3	59.337	7.703	6.32	8.7	22.8	26.86
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	11	534.	506.727	569.	350.	4053.018	63.663	371.	458.	546.	565.6
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	8.5	8.036	10.1	5.1	2.271	1.507	5.46	6.9	9.4	9.98
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	11	8.3	8.218	8.4	7.8	0.04	0.199	7.82	8.2	8.4	8.4
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	11	8.3	8.17	8.4	7.8	0.042	0.205	7.82	8.2	8.4	8.4
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	11	0.005	0.007	0.016	0.004	0.	0.004	0.004	0.004	0.006	0.015
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	11	285.	281.818	300.	250.	244.364	15.632	252.4	271.	294.	299.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.08	0.1	0.27	0.04	0.005	0.071	0.042	0.05	0.11	0.256
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	11	0.002	0.002	0.005	0.001	0.	0.001	0.001	0.002	0.003	0.005
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.3	0.291	0.41	0.21	0.005	0.07	0.21	0.22	0.32	0.408
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	11	0.1	0.132	0.31	0.06	0.005	0.069	0.066	0.1	0.17	0.282
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	11	297.	302.455	342.	265.	422.073	20.544	268.8	290.	314.	337.6
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	16.5	18.4	30.	14.	29.156	5.4	14.	14.	22.	29.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	287.	289.364	332.	258.	457.455	21.388	258.6	280.	308.	327.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	13.	13.091	33.	0.	113.691	10.663	0.	4.	22.	31.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	11	0.09	0.122	0.27	0.04	0.007	0.081	0.04	0.05	0.19	0.264
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	11	4.5	5.482	9.8	2.8	5.522	2.35	2.94	3.6	8.4	9.54

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	14.2	15.558	27.	4.9	60.532	7.78	5.14	7.95	22.7	26.25
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	540.	514.833	578.	299.	5827.242	76.336	344.3	506.75	558.5	576.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.	8.158	10.3	5.2	2.643	1.626	5.53	7.025	9.85	10.27
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.35	8.258	8.6	7.8	0.064	0.254	7.8	8.125	8.4	8.57
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.347	8.182	8.6	7.8	0.071	0.266	7.8	8.125	8.4	8.57
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.007	0.016	0.003	0.	0.005	0.003	0.004	0.008	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	285.	278.333	297.	249.	214.606	14.649	252.9	265.25	289.5	295.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.085	0.088	0.21	0.03	0.002	0.049	0.036	0.05	0.11	0.183
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.002	0.001	0.	0.	0.001	0.002	0.002	0.002
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.32	0.33	0.48	0.2	0.008	0.087	0.209	0.26	0.383	0.477
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.13	0.16	0.33	0.09	0.006	0.076	0.09	0.093	0.213	0.306
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	301.	292.667	314.	242.	441.515	21.012	249.2	280.25	305.75	311.9
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	18.	19.333	31.	13.	30.606	5.532	13.3	15.	22.5	29.8
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	260.	261.75	306.	223.	875.295	29.585	223.6	235.5	293.	305.7
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	28.5	30.917	80.	0.	804.811	28.369	0.	4.5	55.25	77.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.135	0.158	0.36	0.06	0.009	0.096	0.063	0.083	0.208	0.345
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.05	4.517	9.8	2.4	3.869	1.967	2.49	3.05	5.175	8.57

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.9	14.775	22.8	5.1	54.135	7.358	5.43	6.8	22.175	22.74
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	522.	503.083	610.	270.	7719.356	87.86	320.7	466.5	557.25	596.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	8.5	8.155	10.3	3.8	3.331	1.825	4.46	7.2	9.6	10.28
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.4	8.358	8.8	7.8	0.063	0.25	7.92	8.225	8.4	8.77
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.4	8.287	8.8	7.8	0.068	0.261	7.92	8.225	8.4	8.77
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.005	0.016	0.002	0.	0.004	0.002	0.004	0.006	0.013
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	284.5	274.25	302.	142.	1872.568	43.273	179.2	270.25	296.	301.1
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.08	0.098	0.2	0.03	0.003	0.056	0.034	0.05	0.15	0.196
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.325	0.326	0.5	0.14	0.011	0.107	0.161	0.245	0.39	0.491
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	0.12	0.13	0.21	0.09	0.002	0.049	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	298.	283.833	314.	139.	2239.606	47.324	177.1	287.25	304.5	313.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	19.	19.	26.	14.	15.091	3.885	14.3	15.	22.	25.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	292.5	271.	312.	139.	2416.364	49.157	166.3	250.	304.5	310.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	0.	12.833	70.	0.	555.242	23.564	0.	0.	17.	64.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.12	0.153	0.44	0.05	0.011	0.105	0.059	0.09	0.195	0.377
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.95	6.85	12.9	2.5	16.586	4.073	2.65	3.7	12.05	12.75

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	14.05	15.3	25.7	4.8	60.165	7.757	5.04	7.15	22.875	25.25
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	536.5	521.083	591.	308.	5547.174	74.479	357.2	510.	555.	589.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.2	8.333	10.6	5.4	2.202	1.484	5.91	7.45	9.725	10.48
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.4	8.308	8.6	7.7	0.057	0.239	7.82	8.2	8.475	8.57
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.4	8.232	8.6	7.7	0.064	0.252	7.82	8.2	8.475	8.57
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.006	0.02	0.003	0.	0.005	0.003	0.003	0.006	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	282.	276.5	298.	245.	287.364	16.952	247.7	264.25	289.75	297.1
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.09	0.098	0.18	0.04	0.002	0.045	0.046	0.063	0.118	0.18
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.3	0.3	0.45	0.21	0.004	0.061	0.219	0.255	0.33	0.414
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	295.	292.5	315.	258.	337.182	18.363	259.2	282.5	307.5	315.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	18.5	19.5	32.	12.	35.	5.916	12.	15.25	23.5	30.2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	258.	263.667	315.	219.	909.697	30.161	220.2	249.	292.5	312.3
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	28.	28.833	78.	0.	791.061	28.126	0.	1.	51.75	75.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.12	0.143	0.32	0.06	0.008	0.087	0.063	0.08	0.17	0.317
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	3.85	4.175	7.1	2.8	1.475	1.214	2.89	3.325	4.675	6.68

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	3	5.6	7.033	10.3	5.2	8.043	2.836	**	**	**	**
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	3	568.	564.667	581.	545.	332.333	18.23	**	**	**	**
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	3	10.1	10.2	10.4	10.1	0.03	0.173	**	**	**	**
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	3	8.4	8.367	8.4	8.3	0.003	0.058	**	**	**	**
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	3	8.4	8.364	8.4	8.3	0.003	0.058	**	**	**	**
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	3	0.004	0.004	0.005	0.004	0.	0.001	**	**	**	**
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	285.	281.	288.	270.	93.	9.644	**	**	**	**
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.11	0.09	0.11	0.05	0.001	0.035	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.34	0.333	0.34	0.32	0.	0.012	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	3	310.	310.	314.	306.	16.	4.	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	3	22.	23.333	26.	22.	5.333	2.309	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

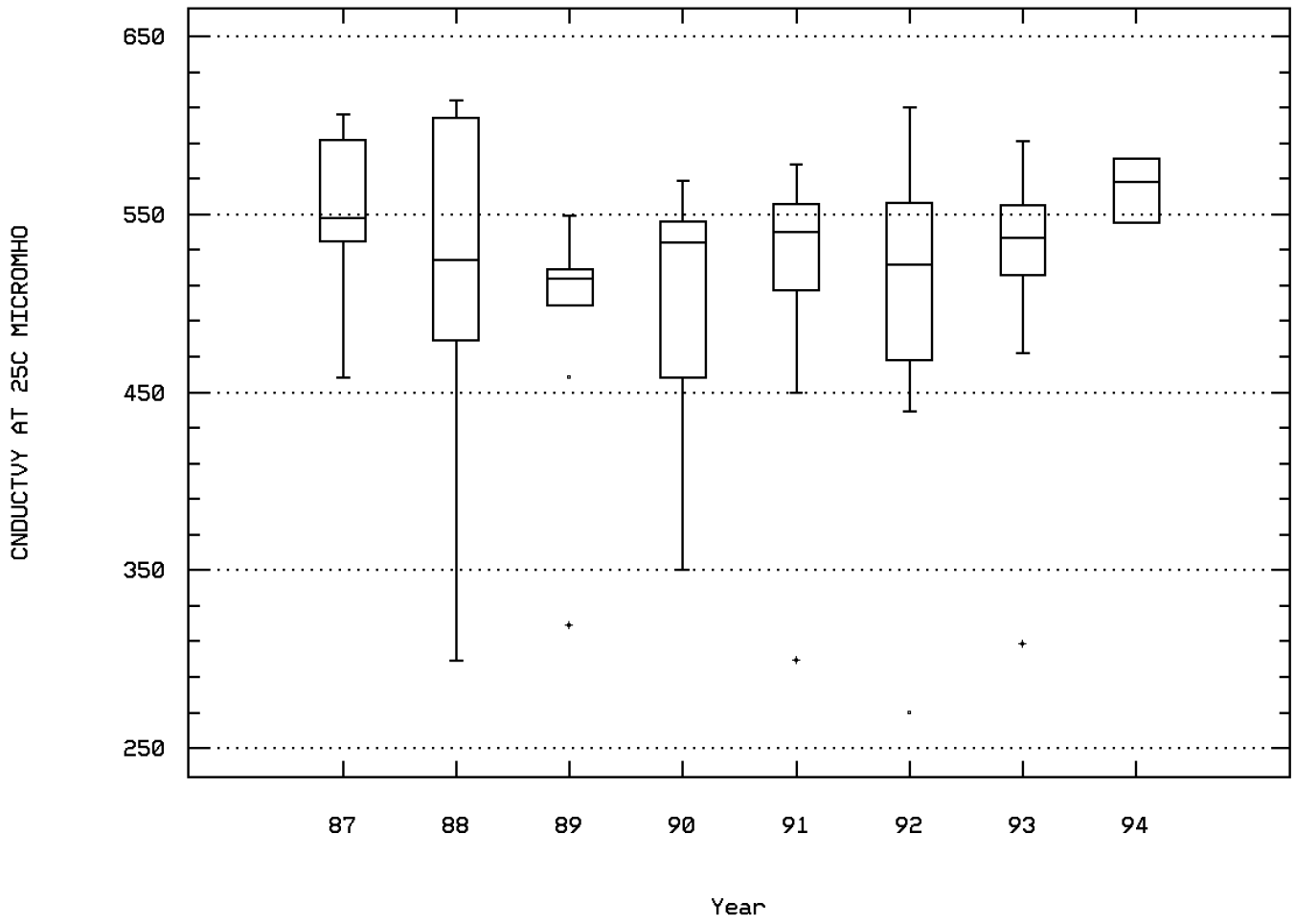
Annual Analysis for 1994 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	3	260.	264.667	310.	224.	1865.333	43.19	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	3	54.	45.333	82.	0.	1737.333	41.681	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	3	0.1	0.09	0.12	0.05	0.001	0.036	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	3	3.3	4.033	5.8	3.	2.363	1.537	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0006 Parameter Code: 00095

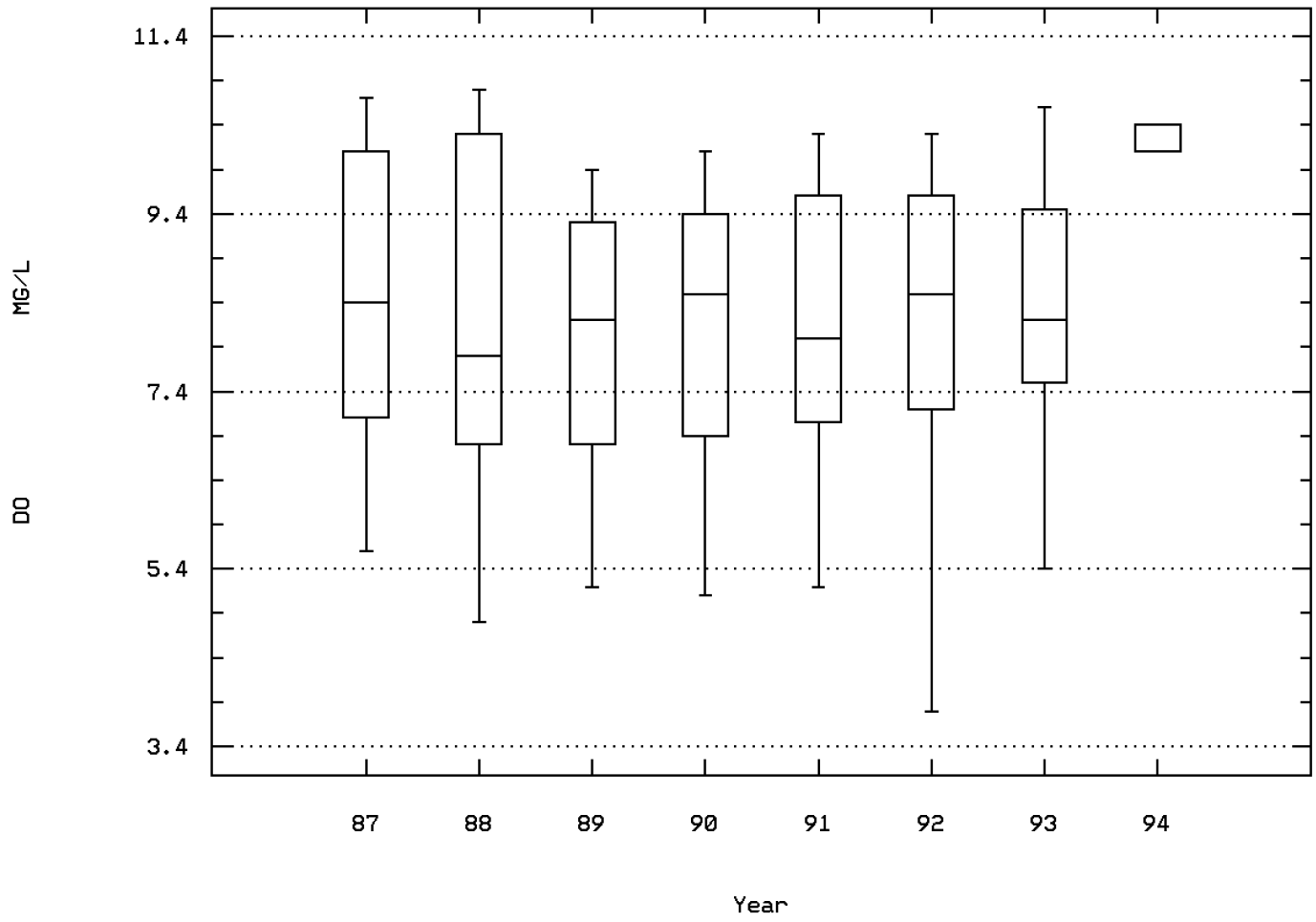
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



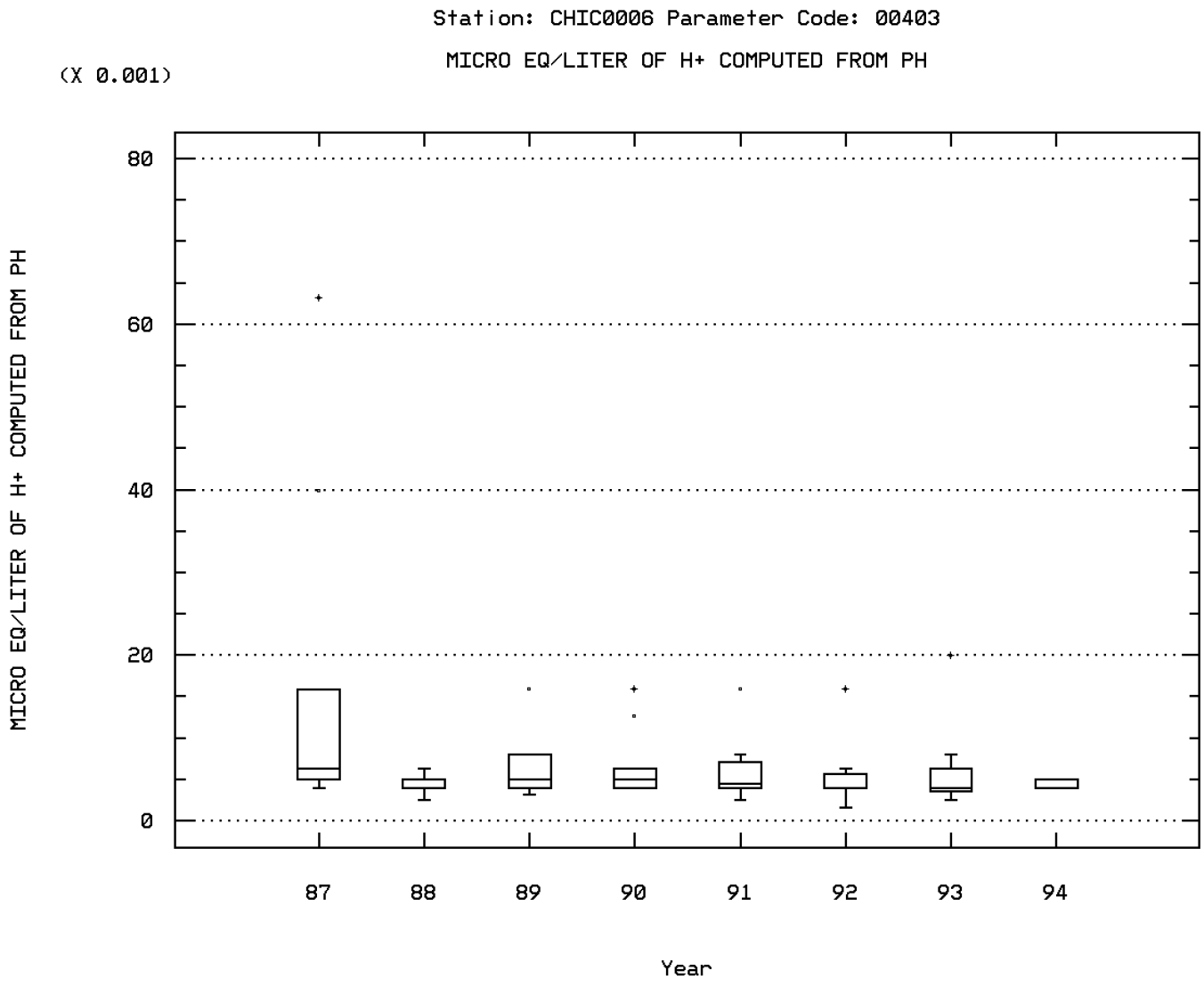
Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00300

OXYGEN, DISSOLVED



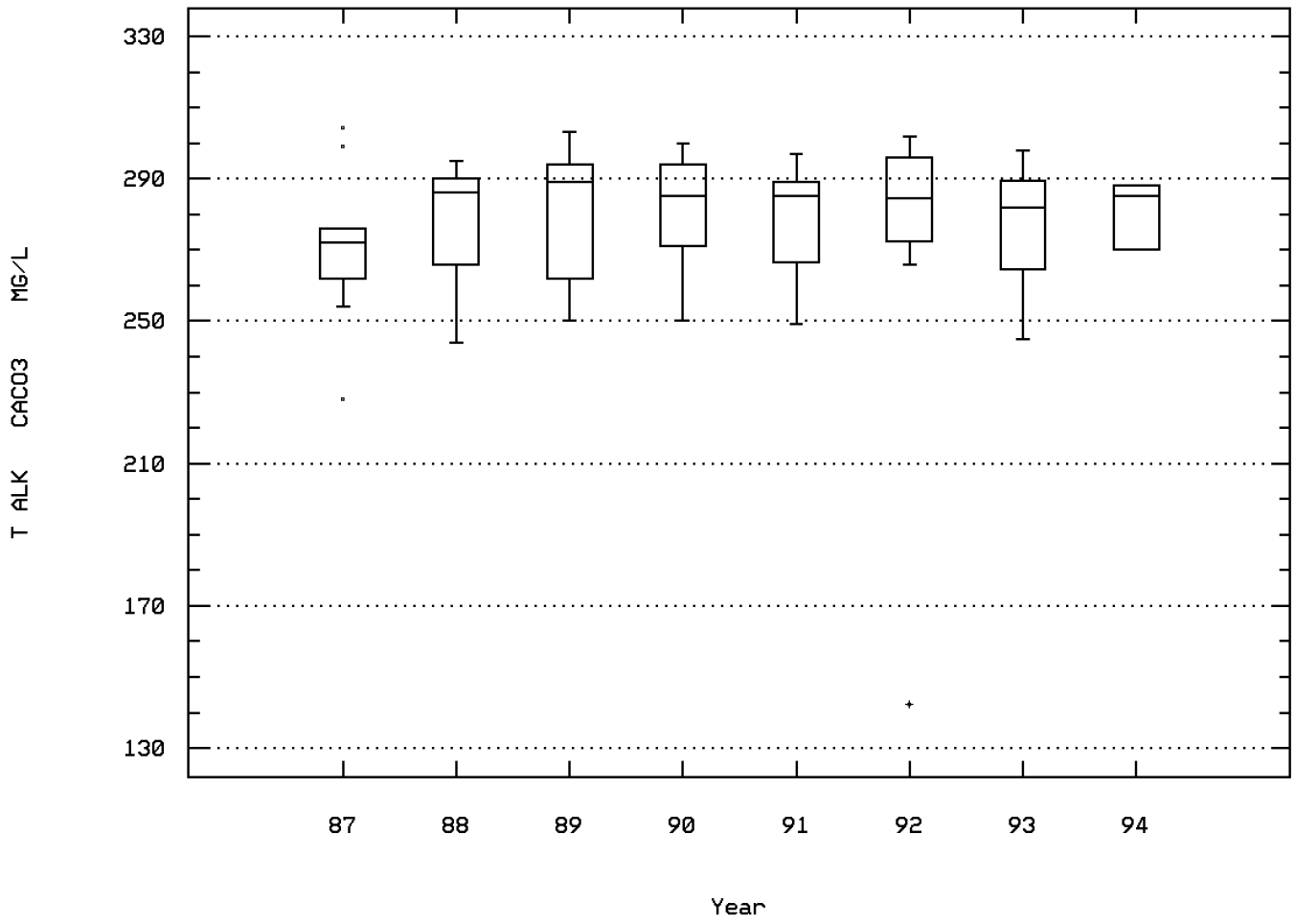
Buckhorn Creek 3.3m Below Catfish Farm



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00410

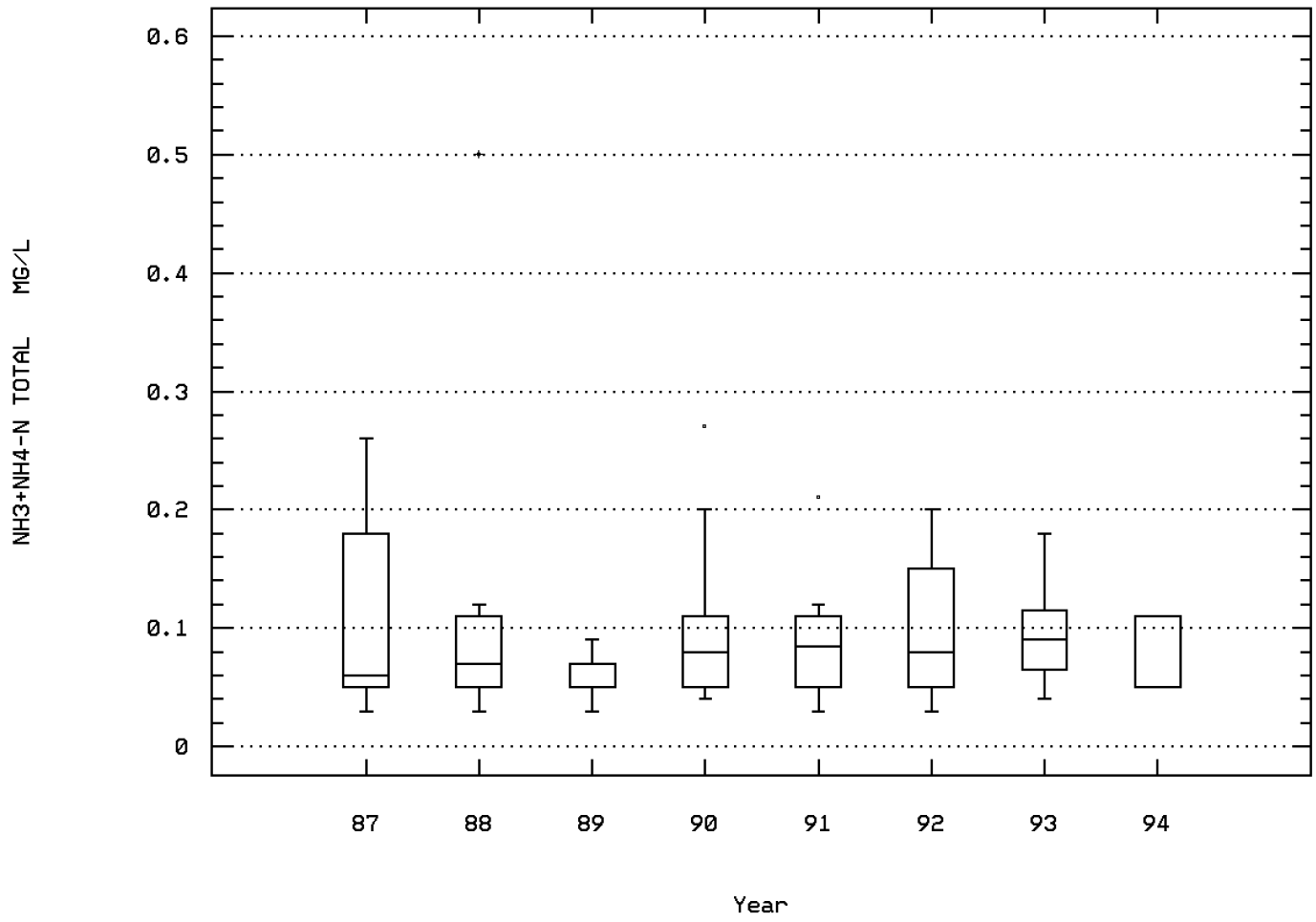
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00610

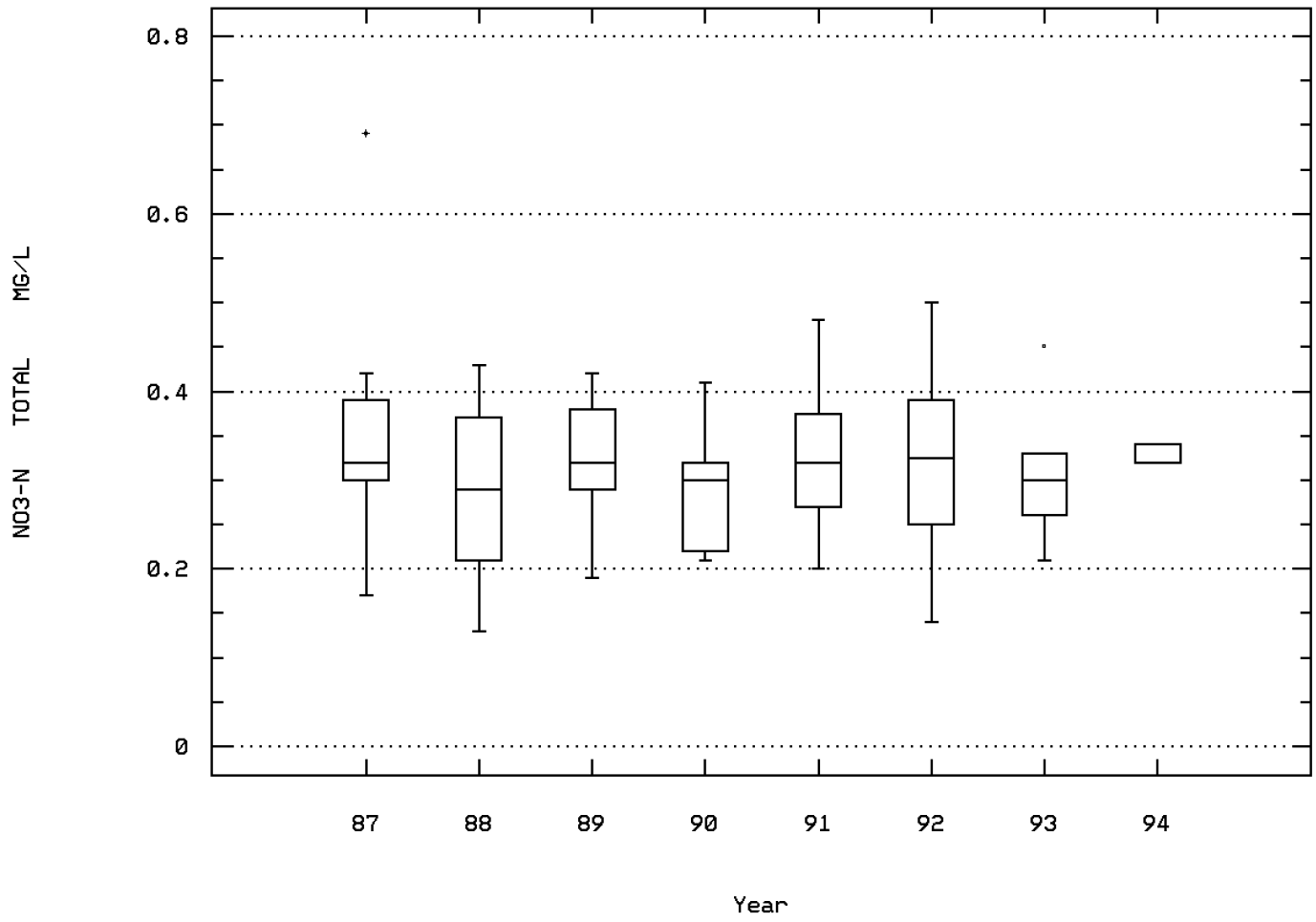
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00620

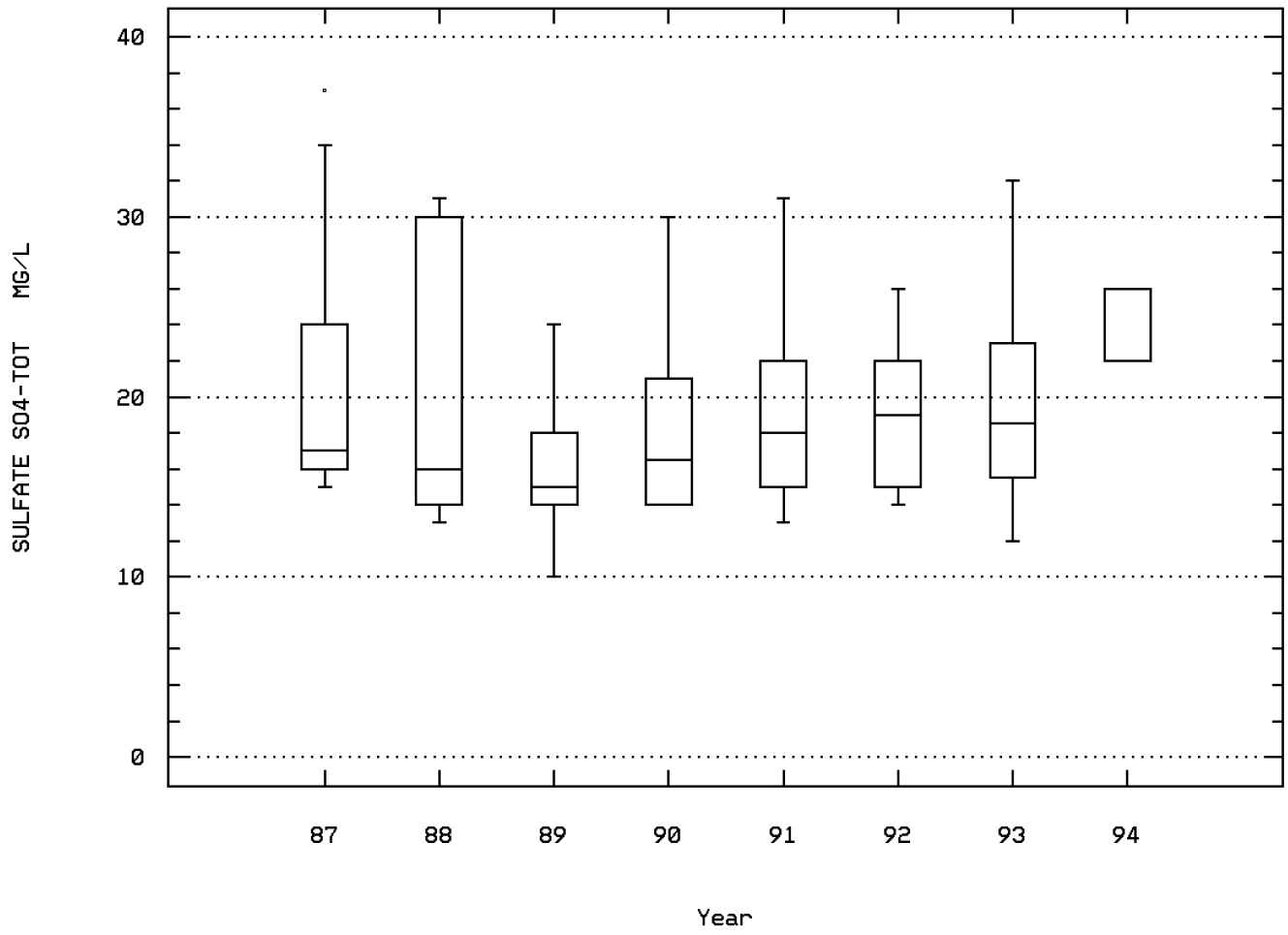
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00945

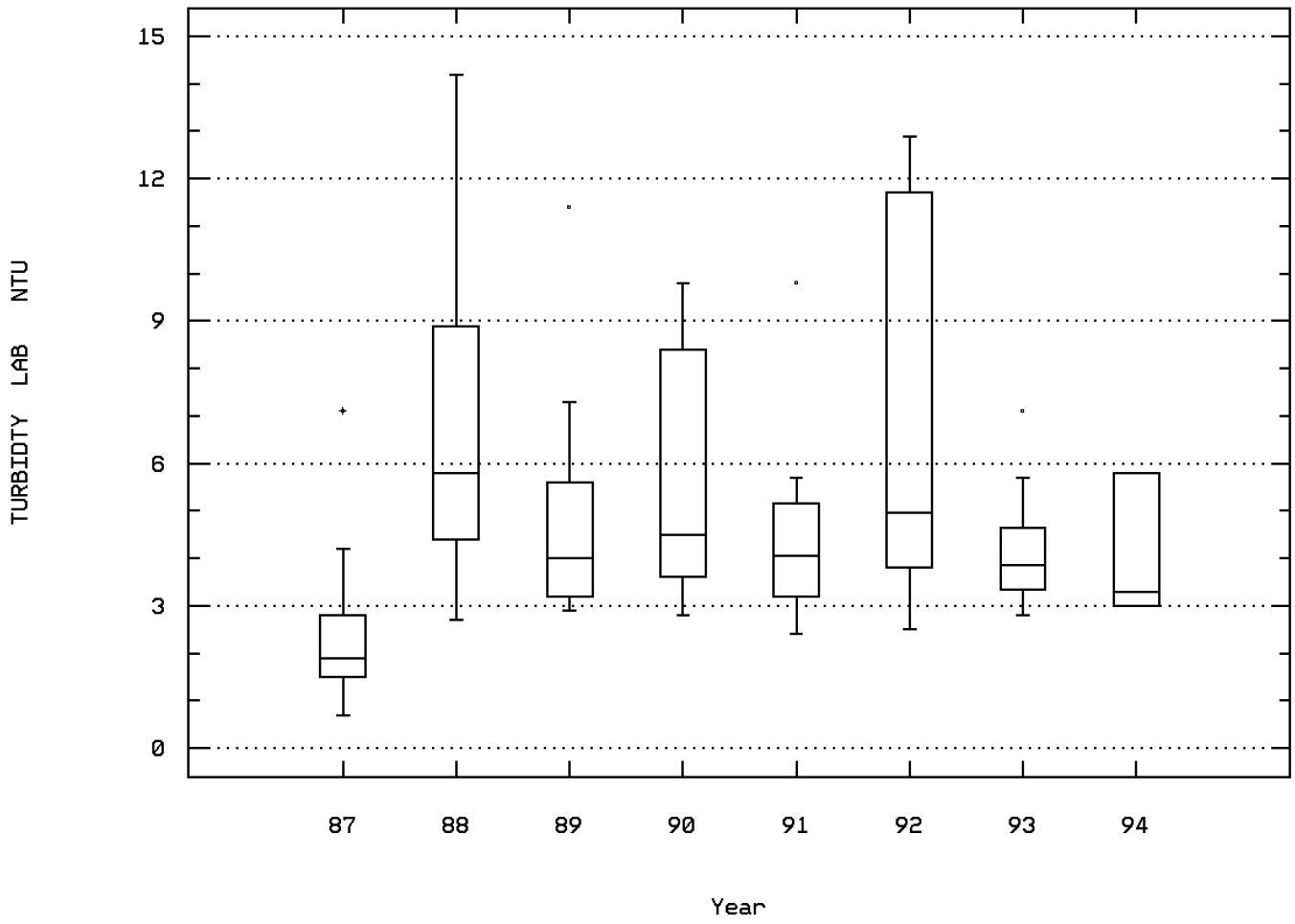
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 3.3m Below Catfish Farm

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	35	6.4	8.171	15.	4.2	12.735	3.569	4.96	5.5	12.1	14.3
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	35	534.	523.829	605.	270.	4284.264	65.454	458.	519.	555.	593.6
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	35	9.1	9.351	10.8	8.2	0.696	0.834	8.4	8.6	10.2	10.64
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	35	8.4	8.403	8.6	8.3	0.006	0.075	8.3	8.4	8.4	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	35	8.4	8.397	8.6	8.3	0.006	0.075	8.3	8.4	8.4	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	35	0.004	0.004	0.005	0.003	0.	0.001	0.003	0.004	0.004	0.005
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	35	289.	285.8	304.	142.	683.988	26.153	277.2	285.	296.	300.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	35	0.08	0.1	0.5	0.03	0.008	0.088	0.036	0.05	0.11	0.204
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	35	0.32	0.321	0.47	0.17	0.005	0.072	0.22	0.28	0.37	0.424
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	34	307.	301.912	328.	139.	924.75	30.41	291.	296.5	314.	317.5
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	35	19.	20.371	37.	14.	34.358	5.862	14.	15.	24.	30.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	34	302.	290.324	318.	139.	1077.68	32.828	257.	282.75	308.25	313.5
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	34	0.	11.588	76.	0.	417.28	20.427	0.	0.	14.25	54.5
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	35	3.9	4.326	12.9	0.7	5.604	2.367	2.08	2.8	5.1	7.24

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	25	19.4	16.532	22.5	8.3	26.621	5.16	9.5	11.3	21.4	22.24
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	25	548.	523.96	614.	299.	7926.207	89.029	304.4	519.5	575.5	607.6
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	25	7.7	8.252	10.3	6.8	1.707	1.306	7.02	7.2	9.95	10.24
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	25	8.2	8.256	8.4	8.1	0.007	0.082	8.2	8.2	8.3	8.4
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	25	8.2	8.249	8.4	8.1	0.007	0.082	8.2	8.2	8.3	8.4
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	25	0.006	0.006	0.008	0.004	0.	0.001	0.004	0.005	0.006	0.006
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	25	285.	280.92	300.	228.	236.16	15.367	263.6	271.	291.	297.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	25	0.08	0.092	0.27	0.03	0.004	0.062	0.036	0.05	0.11	0.212
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	25	0.25	0.265	0.39	0.13	0.006	0.076	0.152	0.21	0.325	0.374
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	25	298.	299.76	329.	285.	107.44	10.365	285.6	294.	305.	316.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	25	21.	21.32	34.	14.	32.143	5.67	14.6	17.	23.5	31.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	25	248.	248.68	305.	150.	1163.977	34.117	214.6	224.5	275.	293.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	25	53.	51.08	145.	0.	1154.077	33.972	4.8	22.	71.5	88.
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	25	4.6	5.22	14.2	1.9	8.03	2.834	2.76	3.25	5.7	10.28

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

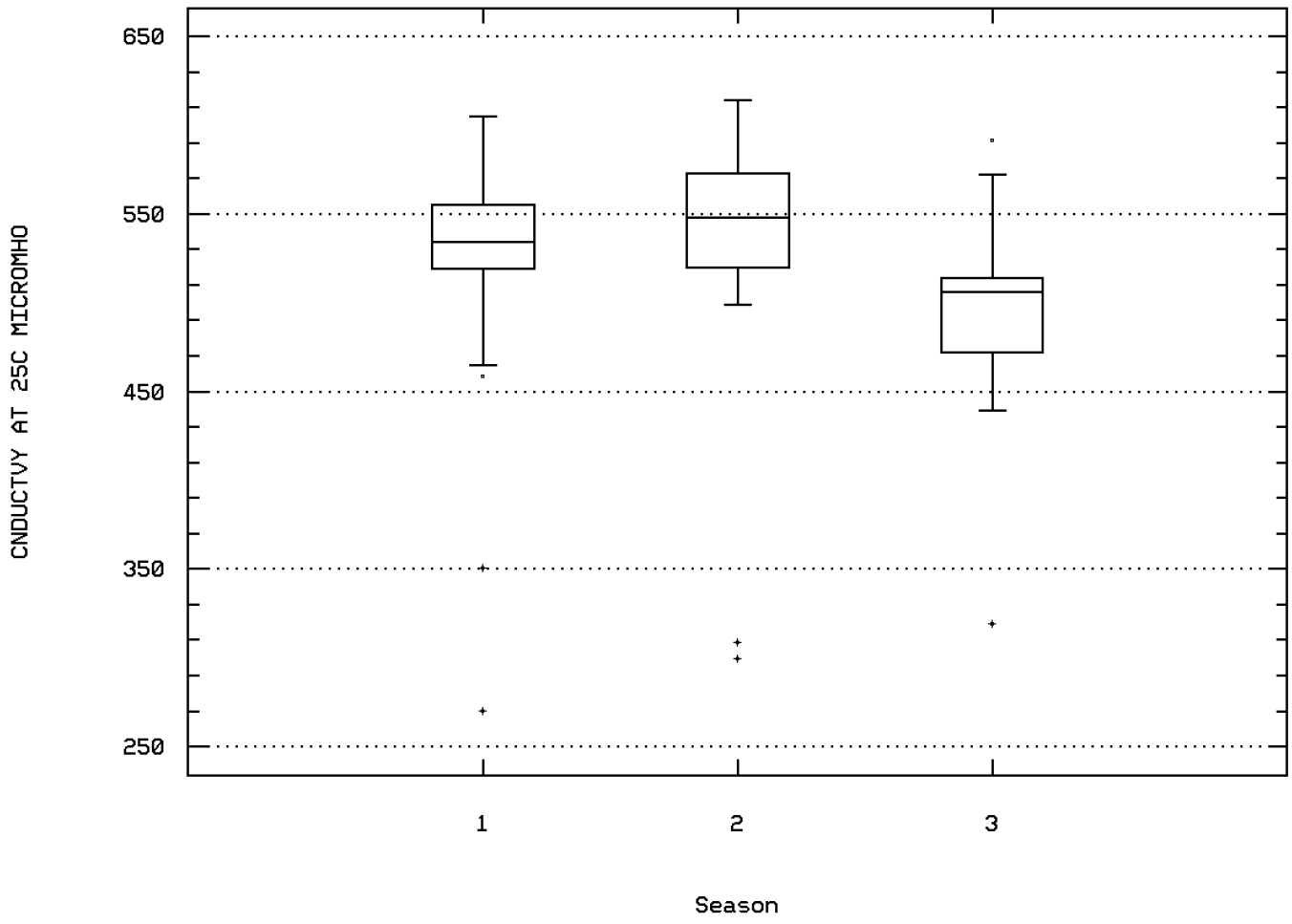
Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0006

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	21	24.2	24.438	27.4	21.2	3.698	1.923	22.28	22.8	26.3	27.08
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	21	506.	495.286	591.	319.	3119.714	55.854	441.2	471.5	524.5	567.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	20	6.55	6.21	7.5	3.8	1.067	1.033	4.83	5.25	7.075	7.38
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	21	7.9	8.029	8.8	7.2	0.166	0.408	7.46	7.8	8.3	8.68
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	21	7.9	7.855	8.8	7.2	0.198	0.445	7.46	7.8	8.3	8.68
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	21	0.013	0.014	0.063	0.002	0.	0.014	0.002	0.005	0.016	0.036
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	262.	260.	277.	244.	75.5	8.689	245.8	252.	265.5	270.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	20	0.06	0.085	0.18	0.05	0.002	0.045	0.05	0.05	0.118	0.177
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	21	0.37	0.372	0.69	0.23	0.011	0.105	0.242	0.305	0.425	0.496
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	21	266.	270.238	342.	235.	538.29	23.201	240.4	256.5	282.	296.6
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	20	14.	14.35	22.	10.	5.397	2.323	12.	13.	15.	16.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	21	261.	258.857	332.	189.	869.329	29.484	218.8	249.	269.5	296.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	21	4.	11.381	81.	0.	341.448	18.478	0.	0.	14.5	27.8
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	21	5.5	6.114	12.4	1.5	11.698	3.42	2.56	3.55	8.65	12.24

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0006 Parameter Code: 00095

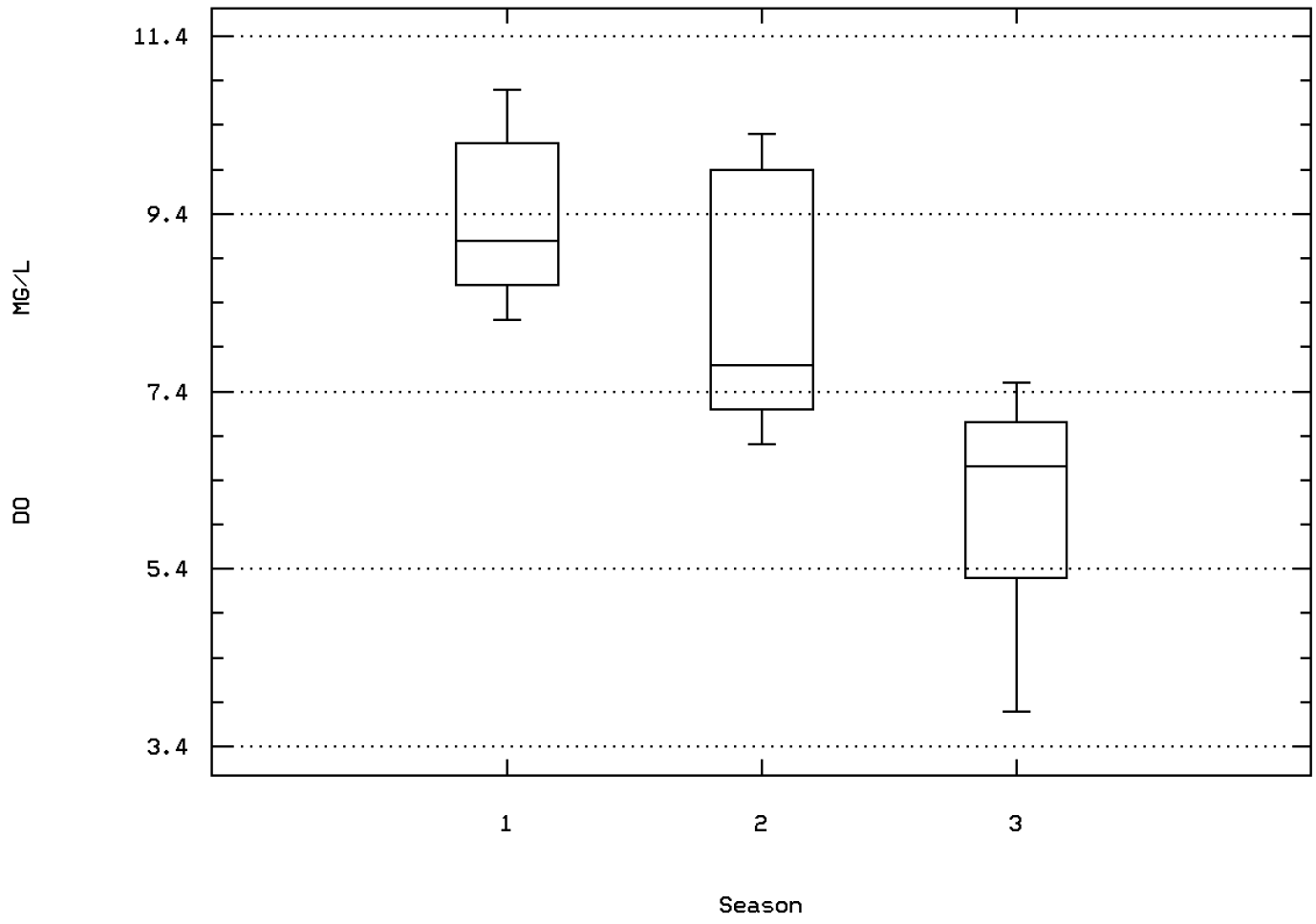
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00300

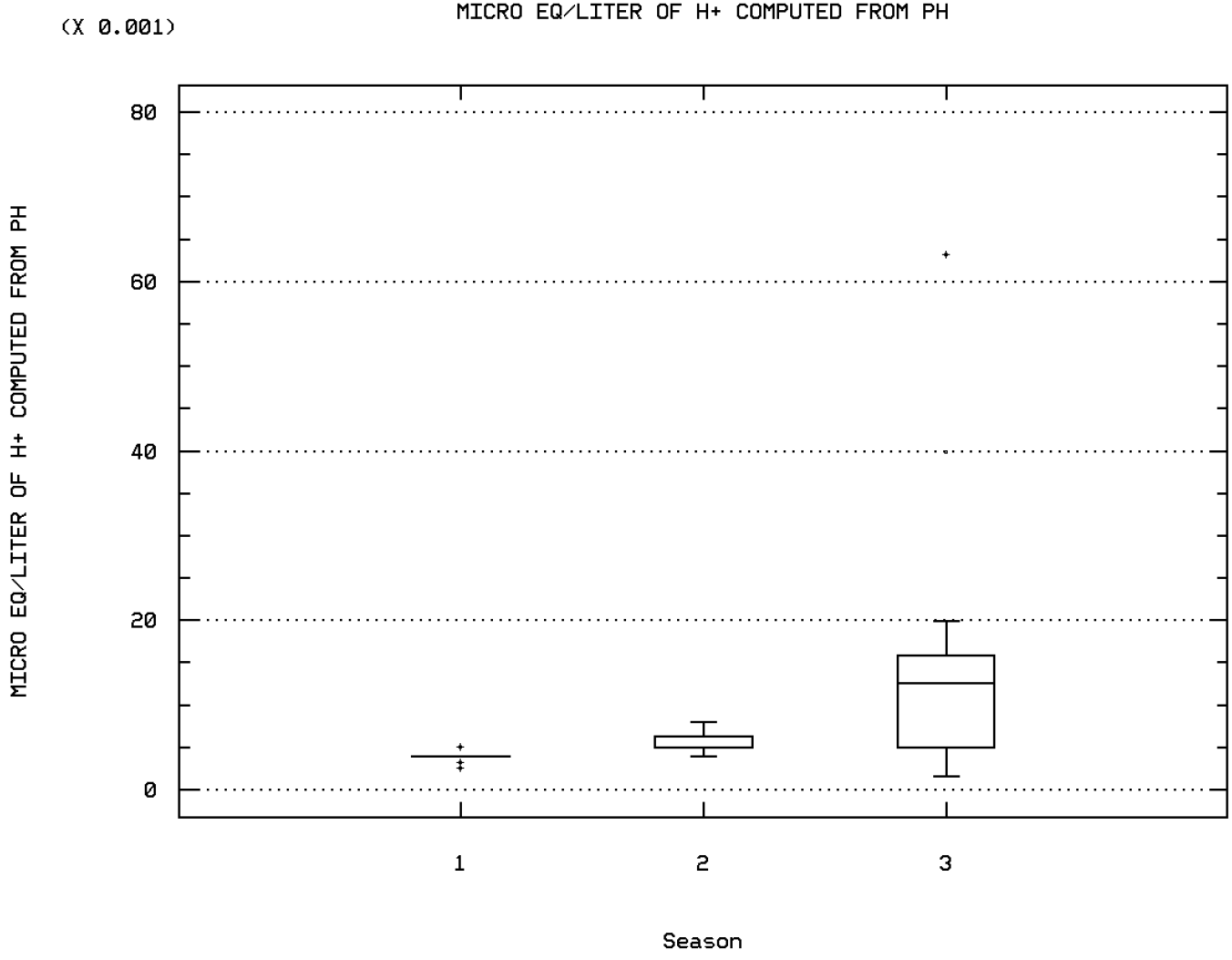
OXYGEN, DISSOLVED



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00403

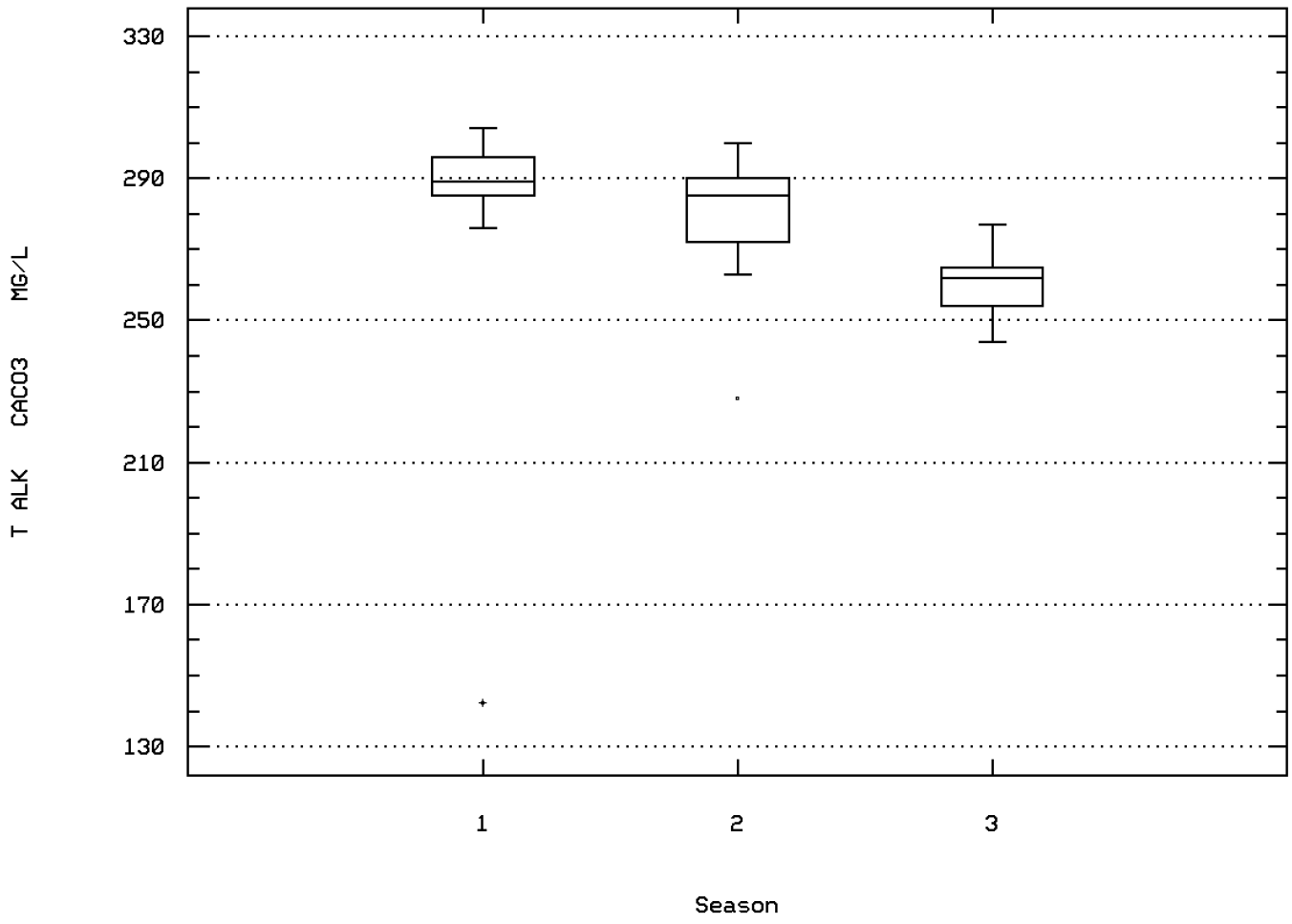
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00410

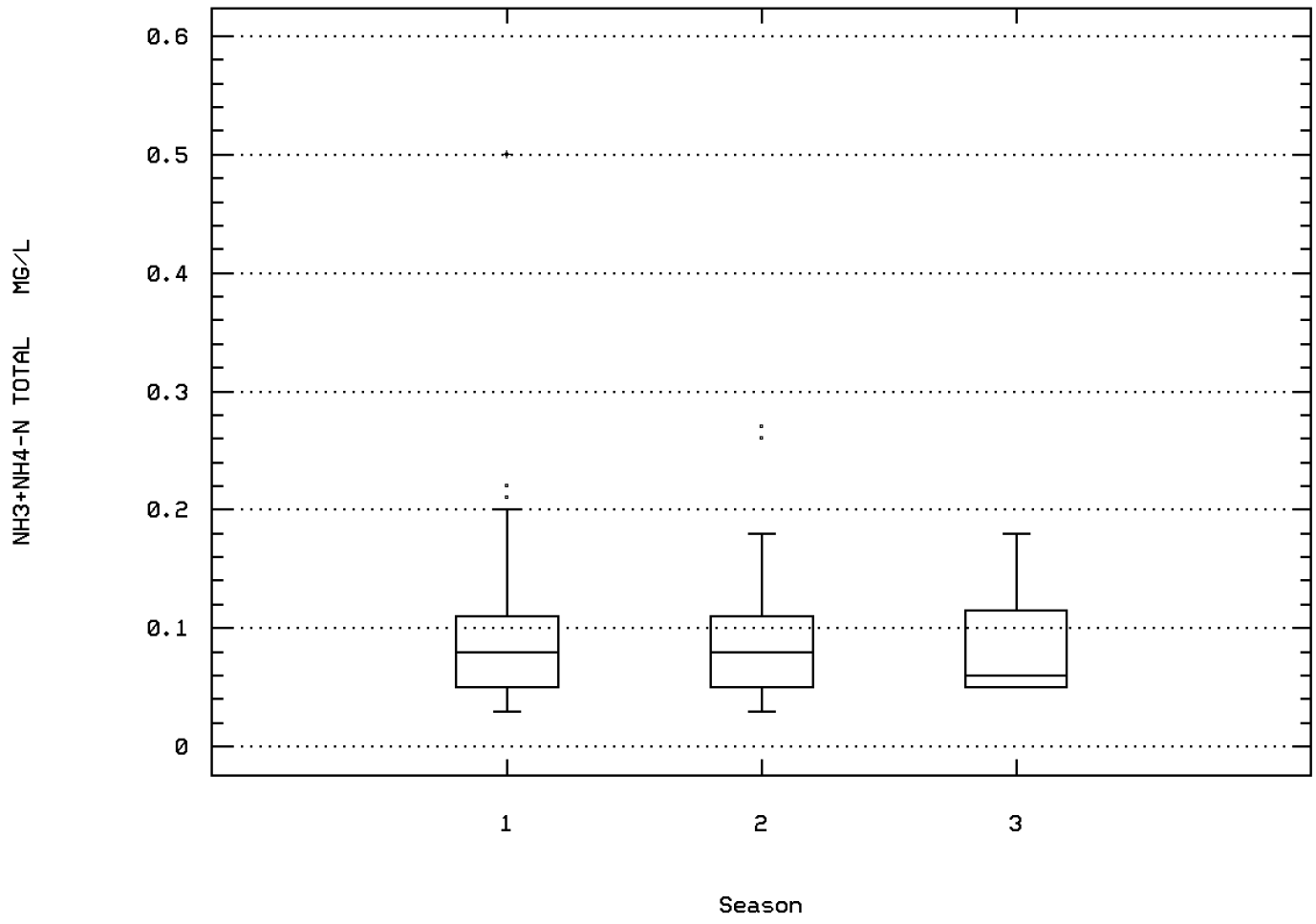
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00610

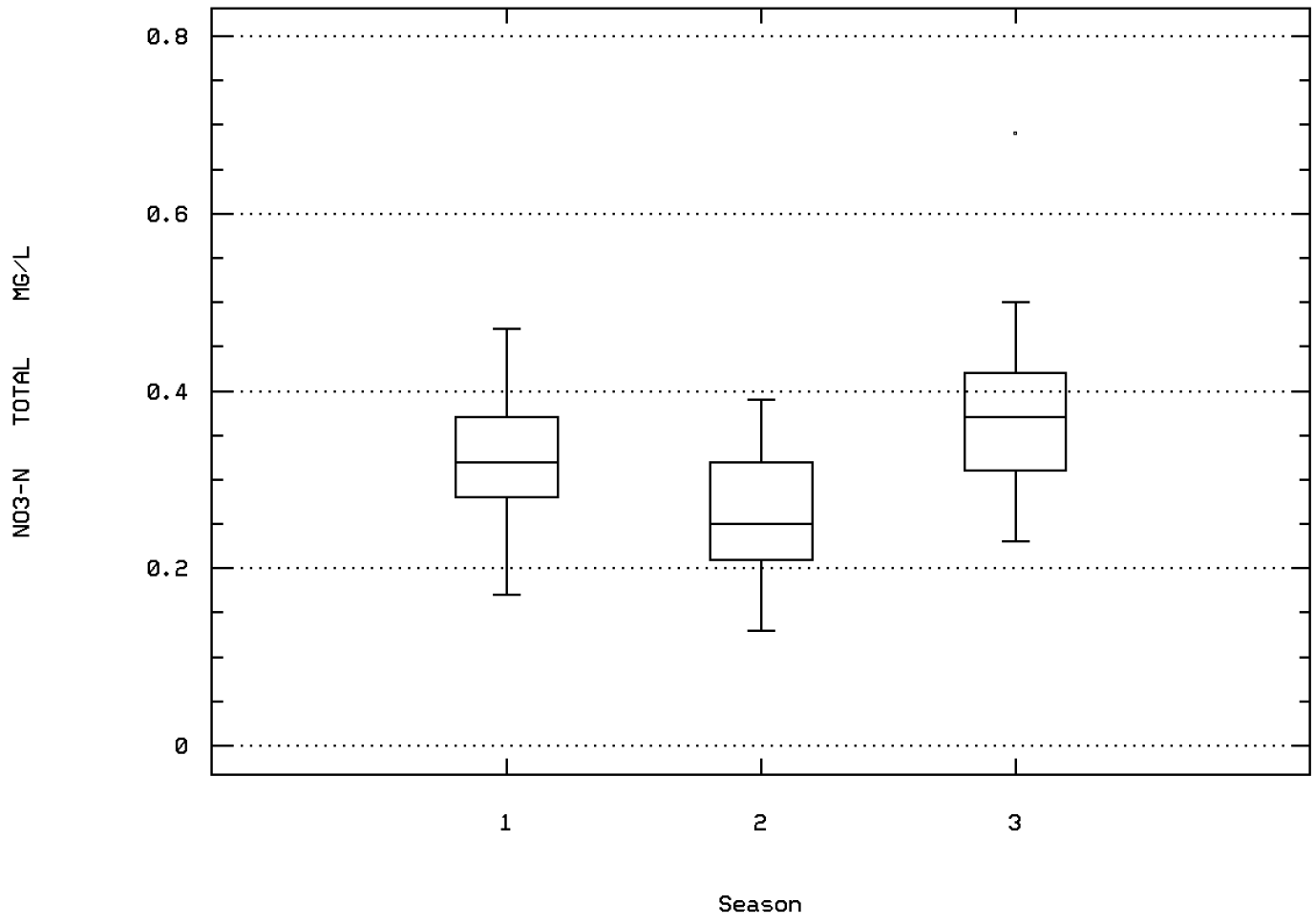
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00620

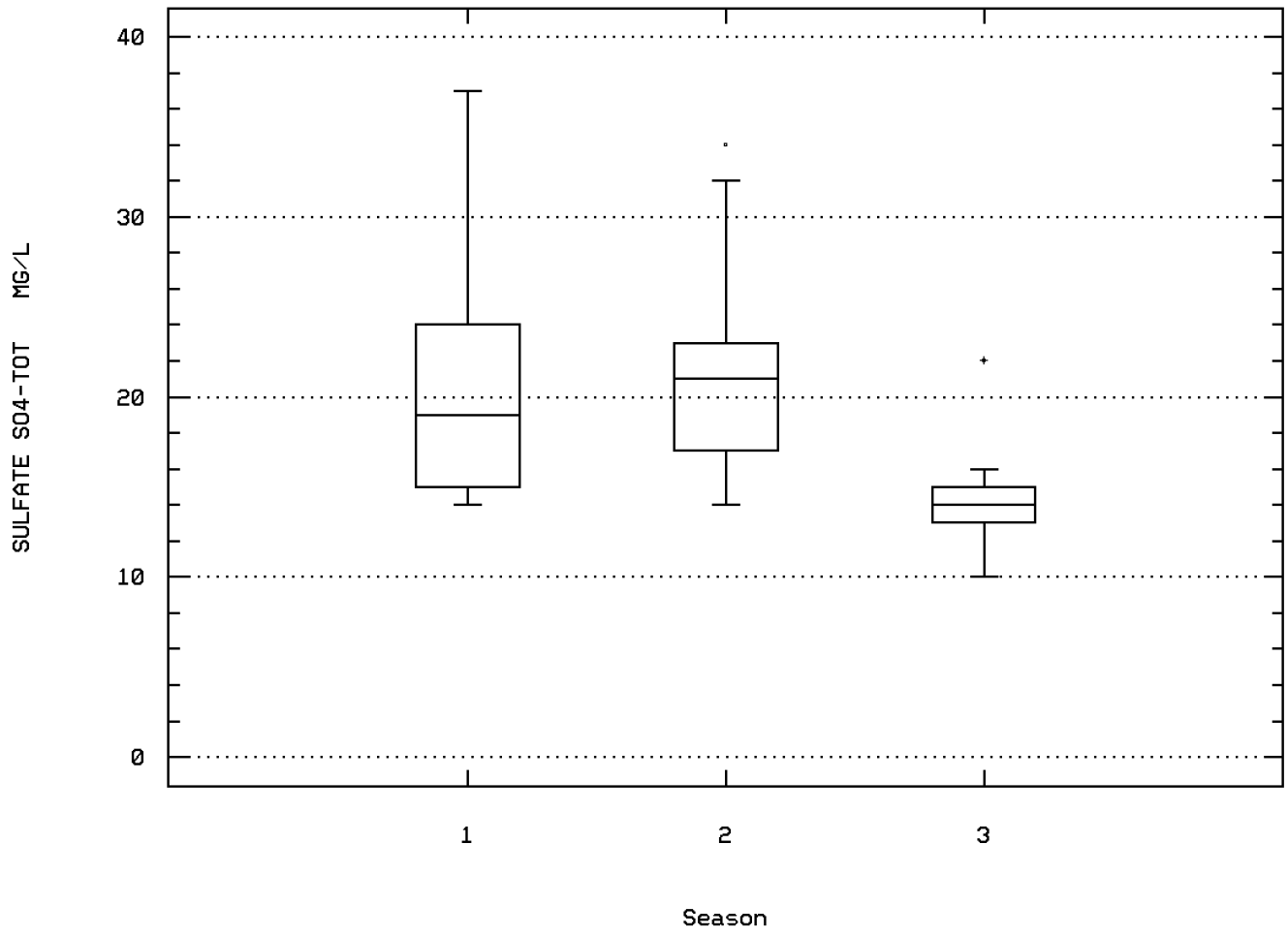
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 00945

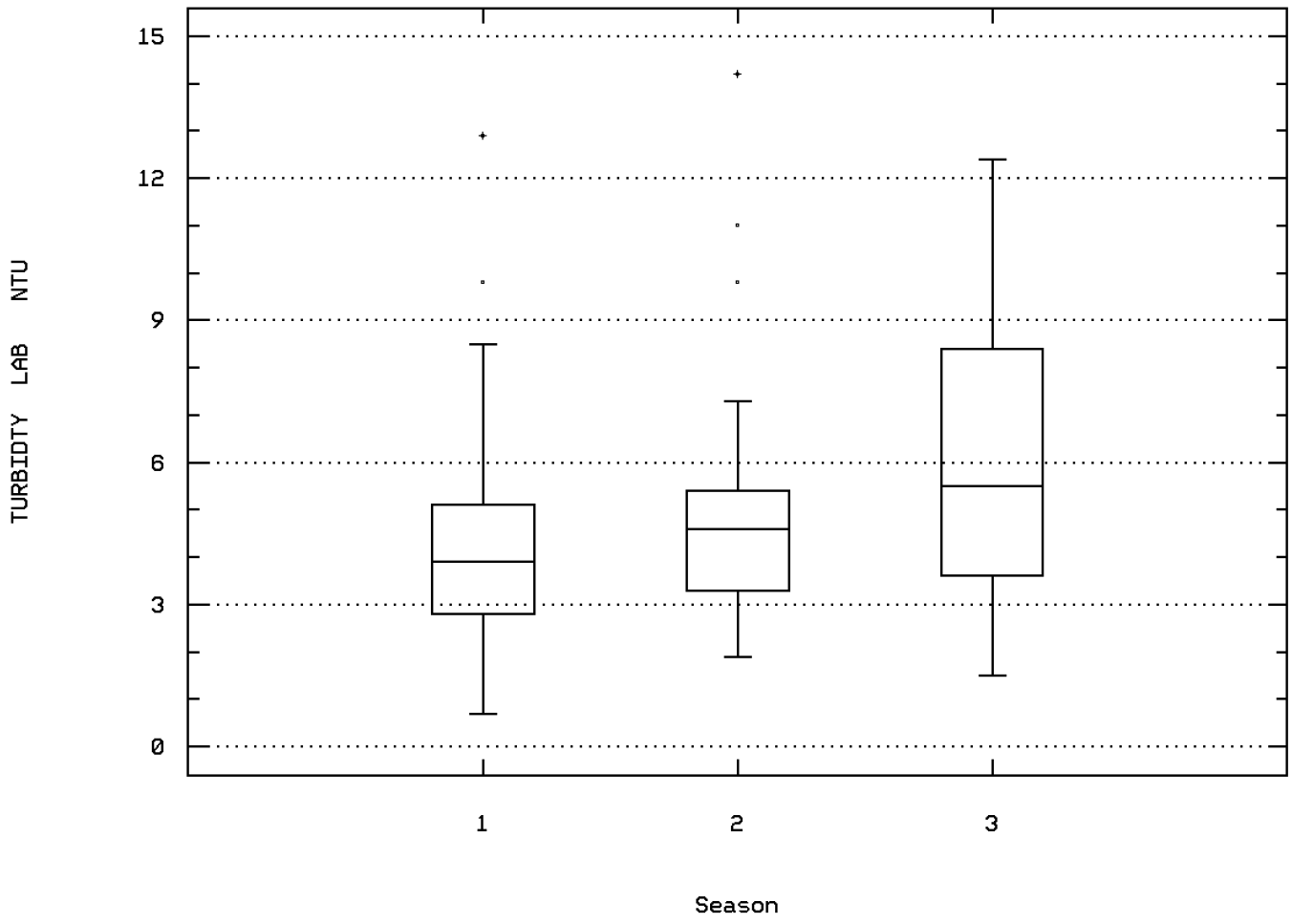
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 3.3m Below Catfish Farm

Station: CHIC0006 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 3.3m Below Catfish Farm

Station Inventory for Station: CHIC0007

NPS Station ID: CHIC0007 LAT/LON: 34.416837/ -96.976587 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_HARP_26
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY A QUARTER MILE WEST OF WHERE BUCKHORN CREEK ENTERS THE RESERVOIR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0007

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	07/04/77-07/04/77	2	1.9	1.9	2.4	1.4	0.5	0.707	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	07/04/77-07/04/77	2	19.5	19.5	24.	15.	40.5	6.364	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/04/77-07/04/77	2	8.35	8.35	8.4	8.3	0.005	0.071	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/04/77-07/04/77	2	8.347	8.347	8.4	8.3	0.005	0.071	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/04/77-07/04/77	2	0.004	0.004	0.005	0.004	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	4	184.5	180.75	188.	166.	107.583	10.372	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	4	45.	71.75	184.	13.	5827.583	76.339	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-06/29/76	1	0.02	0.02	0.02	0.02	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-06/29/76	4	39.5	39.75	41.	39.	0.917	0.957	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/04/77-07/04/77	2	400.	400.	400.	400.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0007

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403 PH, LAB	Other-Hi Lim.	9.	2	0	0.00							2	0	0.00			
	Other-Lo Lim.	6.5	2	0	0.00							2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0007

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	4	0	0.00				4	0	0.00						
	Drinking Water	250.	4	0	0.00				4	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0008

NPS Station ID: CHIC0008 LAT/LON: 34.421282/ -96.984504 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 1M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE1
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 1 METER. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL(405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0008

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	23.	21.9	30.2	7.7	75.02	8.661	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	7.9	8.96	13.2	6.9	6.838	2.615	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.2	7.16	7.6	6.7	0.113	0.336	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.2	7.058	7.6	6.7	0.126	0.355	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.063	0.088	0.2	0.025	0.005	0.068	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0008

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	0	0.00	1	0	0.00	3	0	0.00	1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0009

NPS Station ID: CHIC0009 LAT/LON: 34.422726/ -96.989170 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 2M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 2 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0009

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	23.	21.38	29.3	7.	73.842	8.593	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	6.5	7.38	13.	5.1	10.427	3.229	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.1	7.16	7.4	6.9	0.038	0.195	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.1	7.125	7.4	6.9	0.04	0.199	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.079	0.075	0.126	0.04	0.001	0.033	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0009

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	0	0.00	1	0	0.00	3	0	0.00	1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0010

NPS Station ID: CHIC0010 LAT/LON: 34.423449/ -96.989253 Agency: 11NPSWRD Date Created: 10/04/97
Location: BUCKHORN CREEK ARM OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OST_C
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 872 Aquifer:
Major Basin: SOUTH CENTRAL MISS R Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK ARM OF ARBUCKLE RESERVOIR IN CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE ON MARCH 27 1993. WATER AND SEDIMENT SAMPLES WERE ANALYZED FOR CONCENTRATIONS OF FIVE METALS. THE VALUES ARE THE MEAN CONCENTRATIONS FROM THREE SAMPLES. THE RESULTS WERE PUBLISHED IN ENVIRONMENTAL TOXICOLOGY AND CHEMISTRY 1995; VOL. 14; NO. 10; PP. 1781-1787. THE ARTICLE IS "FURTHER INVESTIGATIONS OF THE ETIOLOGY OF SUBCUTANEOUS NEOPLASMS IN NATIVE GIZZARD SHAD (DOROSOMA CEPEDIANUM)" BY JACOBS AND OSTRANDER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OKLAHOMA 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY AT NPS-WRD 1201 OAK RIDGE DRIVE SUITE 250 FORT COLLINS CO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0010

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	1 ##	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	13.6	13.6	13.6	13.6	0.	0.	**	**	**	**
78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	1	7.01	7.01	7.01	7.01	0.	0.	**	**	**	**
78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	1	4.19	4.19	4.19	4.19	0.	0.	**	**	**	**
78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	1	7.06	7.06	7.06	7.06	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0010

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0010

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00				1	0	0.00						
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01065	NICKEL, DISSOLVED	Fresh Acute	1400.	1	0	0.00				1	0	0.00						
		Drinking Water	100.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0011

NPS Station ID: CHIC0011 LAT/LON: 34.423976/ -96.994671 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_GARTON_5
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY HALFWAY BETWEEN THE DAM AND WHERE BUCKHORN CREEK ENTERS THE RESERVOIR. SAMPLES FOR THIS SITE WERE TAKEN FROM 2 AND 15-FOOT DEPTHS AND WERE ANALYZED FOR SEVERAL CONSTITUENTS. ONLY METALS DATA WERE UPLOADED FOR THIS STUDY BECAUSE ALL OTHER PARAMETERS WERE AVERAGES OF SAMPLES TAKEN FROM SEVERAL DIFFERENT. STATIONS. THE STUDY WAS CONDUCTED BY THE U.S. DEPARTMENT OF INTERIOR-OFFICE OF WATER RESEARCH AND TECHNOLOGY. THE RESULTS ARE IN A 1979 REPORT "LOW ENERGY MECHANICAL DESTRATIFICATION AND REAERATION OF RESERVOIRS" BY JAMES E. GARTON; JERRY WILHM; AND DEBORAH BARKER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0011

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	9	17.2	18.144	24.2	11.	20.315	4.507	11.	15.3	23.2	24.2
01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	9	3200.	4422.222	9300.	700.	9614444.444	3100.717	700.	1600.	7150.	9300.
01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	9	6200.	6666.667	16700.	2200.	17255000.	4153.914	2200.	3950.	7400.	16700.
01045	IRON, TOTAL (UG/L AS FE)	05/16/77-11/24/78	15	500.	498.	940.	110.	49731.429	223.005	164.	340.	660.	814.
01046	IRON, DISSOLVED (UG/L AS FE)	06/14/77-11/24/78	16	40.	65.	320.	10.	5880.	76.681	10.	30.	67.5	208.
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-11/24/78	19	159.	153.	326.	52.	5939.333	77.067	54.	69.	206.	269.
01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-11/24/78	17	80.	204.706	860.	10.	69863.971	264.318	18.	45.	335.	716.
01056	MANGANESE, DISSOLVED (UG/L AS MN)	06/14/77-11/24/78	16	20.	140.75	660.	2.	42489.	206.129	7.6	10.	197.5	576.
01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	8	14.	14.25	24.	7.	38.214	6.182	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	8	13.	13.625	23.	5.	39.696	6.301	**	**	**	**
01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	8	0.96	0.953	1.58	0.54	0.12	0.346	**	**	**	**
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-11/24/78	19	0.42	0.941	10.13	0.	5.089	2.256	0.	0.	0.68	1.13

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0011

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01040	COPPER, DISSOLVED	Fresh Acute	18.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
		Drinking Water	1300.	9	7	0.78	2	0	0.00	3	3	1.00	4	4	1.00			
01042	COPPER, TOTAL	Fresh Acute	18.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
		Drinking Water	1300.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
01090	ZINC, DISSOLVED	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
01092	ZINC, TOTAL	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0012

NPS Station ID: CHIC0012 LAT/LON: 34.424670/ -96.995059 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 4M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE4
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 4 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0012

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	21.8	20.46	27.9	6.3	70.343	8.387	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	6.4	6.	12.4	0.1	19.865	4.457	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.1	7.04	7.1	6.9	0.008	0.089	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.1	7.032	7.1	6.9	0.008	0.09	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.079	0.093	0.126	0.079	0.	0.021	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0012

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	1	0.20	1	0	0.00	3	0	0.00	1	1	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0013

NPS Station ID: CHIC0013 LAT/LON: 34.425309/ -96.999003 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_EPA_6
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPO.) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY HALFWAY BETWEEN THE DAM AND WHERE BUCKHORN CREEK ENTERS THE RESERVOIR. THIS SITE WAS USED TO SHOW THE INFLUENCE OF AN INFLUENT STREAM AT THE ONE-FOOT DEPTH. DATA FOR THIS SITE WERE COLLECTED BI-WEEKLY FROM DECEMBER 1965 TO DECEMBER 1967 AND AT FOUR-WEEK INTERVALS FROM JANUARY 1968 TO APRIL 1970. THE SAMPLING WAS DONE BY THE U.S. ENVIRONMENTAL PROTECTION AGENCY TO ASSESS CHANGES IN WATER QUALITY RESULTING FROM THE CONSTRUCTION OF ARBUCKLE DAM. THE RESULTS WERE PUBLISHED IN THE 1971 REPORT "CHANGES IN WATER QUALITY RESULTING FROM IMPOUNDMENT" BY WILLIAM R. DUFFER AND CURTIS C. HARLIN. FOR INFORMATION ON THE ARBUCKLE AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0013

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	12	2.	1.833	3.	1.	0.333	0.577	1.	1.25	2.	2.7
00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	11	16.	20.273	43.	11.	87.418	9.35	11.4	13.	26.	39.6
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	28 ##	0.	2.571	24.	0.	47.661	6.904	0.	0.	0.	16.8
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	28 ##	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	13	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	27	160.	350.519	1900.	6.	182191.259	426.839	10.	40.	590.	828.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	04/02/68-04/01/70	27	2.204	2.16	3.279	0.778	0.484	0.696	1.	1.602	2.771	2.917
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			144.548								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	2.	17.556	226.	0.5	2169.929	46.583	0.5	0.5	10.	57.6
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	0.301	0.421	2.354	-0.301	0.63	0.794	-0.301	-0.301	1.	1.738
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			2.633								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	3.	21.519	277.	0.5	3082.932	55.524	0.5	0.5	13.	64.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	0.477	0.525	2.442	-0.301	0.703	0.838	-0.301	-0.301	1.114	1.792
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			3.346								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	430.	1388.407	10200.	40.	6418020.328	2533.381	98.4	190.	1380.	5360.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	2.633	2.699	4.009	1.602	0.357	0.598	1.993	2.279	3.14	3.711
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			499.911								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	180.	311.926	1600.	33.	167522.148	409.295	39.4	80.	270.	1270.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	2.255	2.25	3.204	1.519	0.2	0.447	1.595	1.903	2.431	3.104

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0013

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			177.966								
74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	13	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0013

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	28	0	0.00	11	0	0.00	13	0	0.00	4	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	27	1	0.04	11	0	0.00	12	0	0.00	4	1	0.25			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	27	1	0.04	11	1	0.09	12	0	0.00	4	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0014

NPS Station ID: CHIC0014
LAT/LON: 34.425365/ -97.106476
Agency: 11NPSWRD
Date Created: 09/20/97
Location: FALLS CREEK ABOVE PRICE FALLS
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_OGS_FALLS /1S-2E-33 CBB
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 910
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON FALLS CREEK APPROXIMATELY 1/4 MILE SOUTH OF THE WASHITA RIVER ABOVE PRICE FALLS AND ON THE EASTERN EDGE OF FALLS CREEK ASSEMBLY. SAMPLES FOR THE SITE WERE COLLECTED FEBRUARY 24 1977 THROUGH FEBRUARY 14 1979 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0014

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/24/77-02/14/79	3	17.5	18.5	24.	14.	25.75	5.074	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	02/24/77-02/14/79	3	4.	4.	7.	1.	9.	3.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/24/77-02/14/79	3	540.	526.667	540.	500.	533.333	23.094	**	**	**	**
00400	PH (STANDARD UNITS)	02/24/77-02/14/79	3	8.	8.	8.2	7.8	0.04	0.2	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	02/24/77-02/14/79	3	8.	7.97	8.2	7.8	0.041	0.203	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/24/77-02/14/79	3	0.01	0.011	0.016	0.006	0.	0.005	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0014

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400 PH	Other-Hi Lim.	9.	3	0	0.00	3	0	0.00									
	Other-Lo Lim.	6.5	3	0	0.00	3	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0015

NPS Station ID: CHIC0015
LAT/LON: 34.425837/ -96.999171
Agency: 11EPALES
Date Created: / /
Location: ARBUCKLE LAKE
FIPS State/County: 40000 OKLAHOMA/
Station Type: /TYPA/AMBNT/LAKE
STORET Station ID(s): 400204
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 53
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303005
RF1 Mile Point: 1.600
Distance from RF1: 14.60
On/Off RF1: ON
RF3 Index: 11130303088802.16
RF3 Mile Point: 2.60
Distance from RF3: 0.00
On/Off RF3:
Description:
BUCKHORN CREEK ARM; 200 DEGREES FR CAMPGROUND ON N SHORE; 20 YDS FR S SHORE; 140 DEGREES FR POINT SEPARATING BUCKHORN ARM AND ROCK CREEK ARM.
COMMENTS: NOT SAMPLED FIRST RND. 6-12 ULE 14, NO AQUATIC VEGE; STEEP BANKS; HARDWOODS ALONG BOTH SHORES; NO PERMANENT DWELLINGS, CAMPGROUND ON N SHORE. 10-23 ULE 14; LIMESTONE ALONG S SHORE; BOAT MARINA ON S SHORE W/BOAT RENTALS; DEPTH 40 FT.
MAP: DOUGHERTY QUAD

Parameter Inventory for Station: CHIC0015

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/12/74-10/23/74	10	18.8	21.56	27.	18.1	15.412	3.926	18.11	18.575	25.85	26.96
00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	3	1.	17.333	50.	1.	800.333	28.29	**	**	**	**
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	06/12/74-10/23/74	10	89.1	90.92	95.	86.	10.564	3.25	86.27	89.	94.5	94.98
00077	TRANSPARENCY, SECCHI DISC (INCHES)	06/12/74-10/23/74	2	65.	65.	70.	60.	50.	7.071	**	**	**	**
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	06/12/74-10/23/74	10	399.5	397.6	428.	371.	632.933	25.158	371.	371.	421.25	427.7
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/12/74-10/23/74	10	418.5	423.7	469.	409.	363.122	19.056	409.	411.25	426.5	466.7
00300	OXYGEN, DISSOLVED MG/L	06/12/74-10/23/74	10	7.1	6.56	8.4	0.8	4.807	2.193	1.26	6.45	7.65	8.4
00400	PH (STANDARD UNITS)	06/12/74-10/23/74	10	8.14	8.292	8.8	7.93	0.141	0.375	7.934	7.97	8.725	8.8
00400	CONVERTED PH (STANDARD UNITS)	06/12/74-10/23/74	10	8.111	8.169	8.8	7.93	0.157	0.397	7.934	7.97	8.725	8.8
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/12/74-10/23/74	10	0.008	0.007	0.012	0.002	0.	0.004	0.002	0.002	0.011	0.012
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/12/74-10/23/74	10	158.	159.2	179.	151.	73.289	8.561	151.1	152.75	163.25	177.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	06/12/74-10/23/74	10	0.03	0.039	0.1	0.03	0.	0.022	0.03	0.03	0.04	0.094
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	06/12/74-10/23/74	10	0.4	0.41	0.6	0.2	0.014	0.12	0.21	0.3	0.5	0.59
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	06/12/74-10/23/74	10	0.04	0.049	0.14	0.02	0.001	0.033	0.021	0.03	0.05	0.131
00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/12/74-10/23/74	10	0.018	0.02	0.029	0.015	0.	0.005	0.015	0.017	0.023	0.029
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	06/12/74-10/23/74	10	0.005	0.006	0.01	0.004	0.	0.002	0.004	0.004	0.007	0.01
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	06/12/74-10/23/74	2	4.35	4.35	6.2	2.5	6.845	2.616	**	**	**	**
72025	DEPTH OF POND OR RESERVOIR IN FEET	06/12/74-10/23/74	2	46.5	46.5	53.	40.	84.5	9.192	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0015

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	10	1	0.10	5	0	0.00	5	1	0.20						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0015

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	10	0	0.00	5	0	0.00	5	0	0.00						
		Other-Lo Lim.	6.5	10	0	0.00	5	0	0.00	5	0	0.00						
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	10	0	0.00	5	0	0.00	5	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0016

NPS Station ID: CHIC0016 LAT/LON: 34.426142/ -96.999892 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 7M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE7
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 7 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0016

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	21.1	19.46	26.1	6.1	64.043	8.003	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	4.7	5.38	12.2	0.1	19.257	4.388	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.3	7.22	7.4	6.9	0.047	0.217	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.3	7.174	7.4	6.9	0.05	0.223	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.05	0.067	0.126	0.04	0.001	0.037	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0016

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	2	0.40	1	0	0.00	3	1	0.33	1	1	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0017

NPS Station ID: CHIC0017
LAT/LON: 34.426170/ -96.950503
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Buckhorn Creek 0.9m Below Catfish Farm
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_BUCK4
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/36. Station is known as Buckhorn Creek Site 4 and is located on Buckhorn Creek 3.4 miles below Lowrance Springs and 0.9 miles below the catfish farm at the upstream-center side of the bridge tunnel. This station was intended to monitor any pollution dilution from the catfish farm. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	85	14.5	15.322	27.1	6.2	41.529	6.444	7.38	8.45	21.55	23.86
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	85	559.	546.6	624.	298.	2785.814	52.781	474.	537.5	570.	595.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	84	8.95	8.855	12.1	4.1	2.351	1.533	6.8	7.85	9.8	10.9
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	85	8.4	8.208	8.9	2.5	0.493	0.702	7.8	8.2	8.45	8.54
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	85	8.4	4.429	8.9	2.5	14.944	3.866	7.8	8.2	8.45	8.54
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	85	0.004	37.211	3162.278	0.001	117646.459	342.996	0.003	0.004	0.006	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	300.	295.518	335.	137.	542.253	23.286	278.2	287.5	306.5	315.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	84	0.09	0.111	0.5	0.02	0.006	0.076	0.05	0.07	0.128	0.2
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	63	0.002	0.003	0.03	0.	0.	0.005	0.001	0.002	0.003	0.006
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	85	0.43	0.426	0.63	0.21	0.01	0.099	0.272	0.37	0.48	0.568
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	63	0.12	0.147	0.98	0.03	0.017	0.131	0.05	0.08	0.17	0.236
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	312.	307.612	352.	171.	474.312	21.779	288.	293.5	320.	330.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	83	16.	17.265	33.	10.	19.88	4.459	13.	14.	20.	24.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	280.	278.576	341.	171.	1338.866	36.591	237.2	256.	305.5	326.
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	22.	29.035	118.	0.	991.939	31.495	0.	0.	54.5	67.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	63	0.11	0.148	0.51	0.06	0.013	0.114	0.064	0.08	0.17	0.382
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	85	4.7	6.461	21.6	0.8	16.303	4.038	2.9	3.55	9.6	12.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

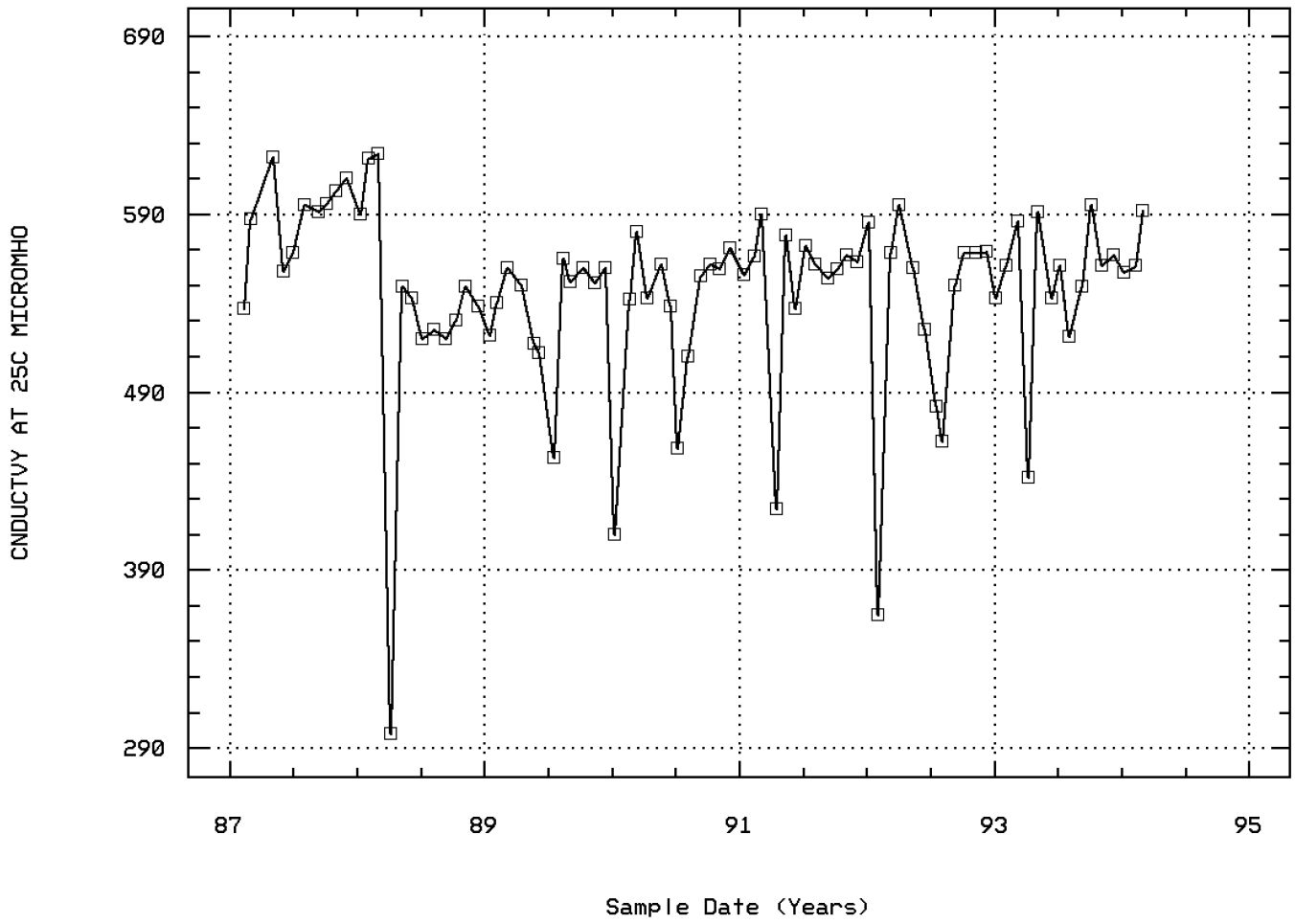
EPA Water Quality Criteria Analysis for Station: CHIC0017

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	84	0	0.00	36	0	0.00	28	0	0.00	20	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
		Other-Lo Lim.	6.5	85	1	0.01	36	1	0.03	28	0	0.00	21	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	63	0	0.00	26	0	0.00	22	0	0.00	15	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	83	0	0.00	36	0	0.00	27	0	0.00	20	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station: CHIC0017 Parameter Code: 00095

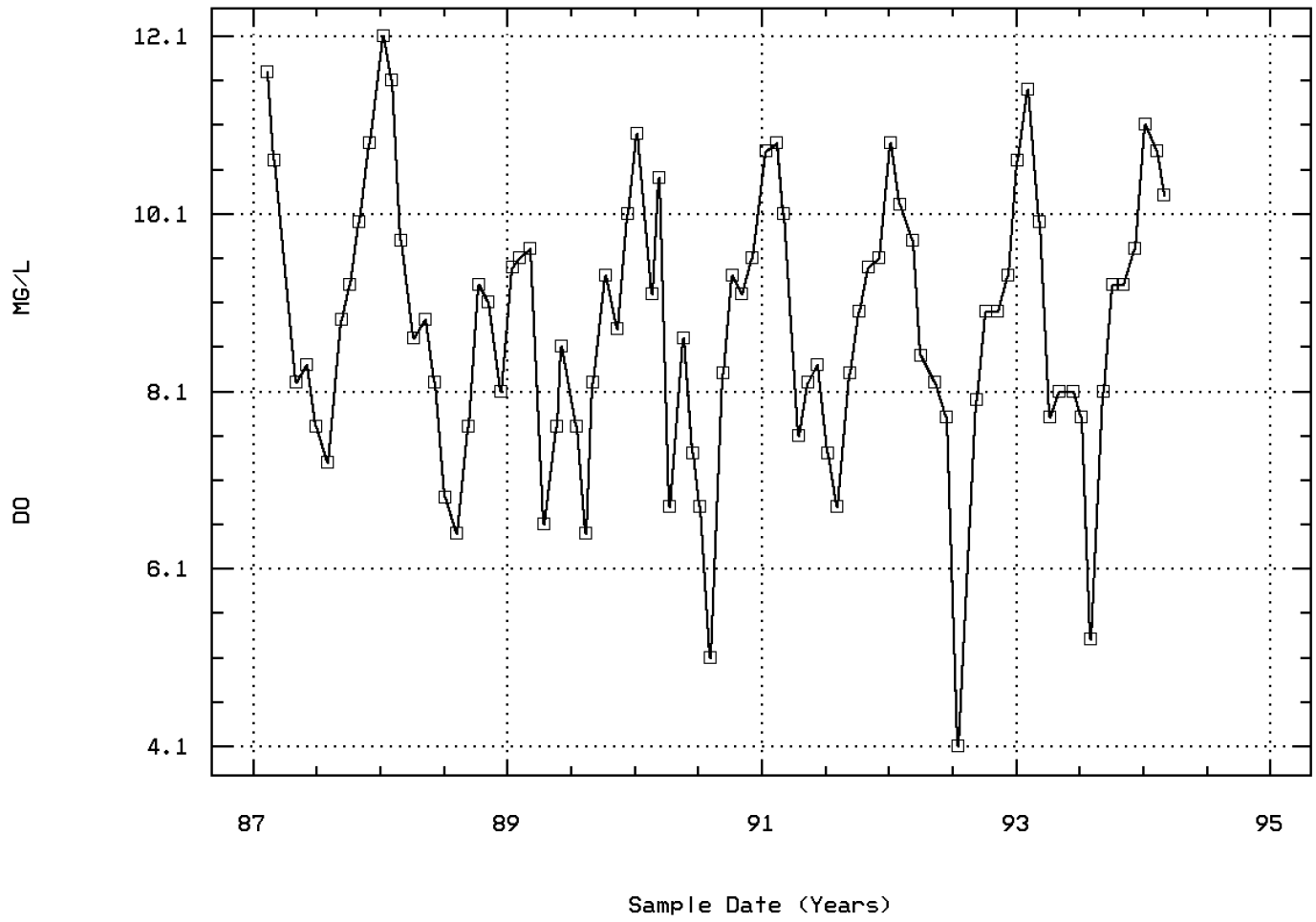
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00300

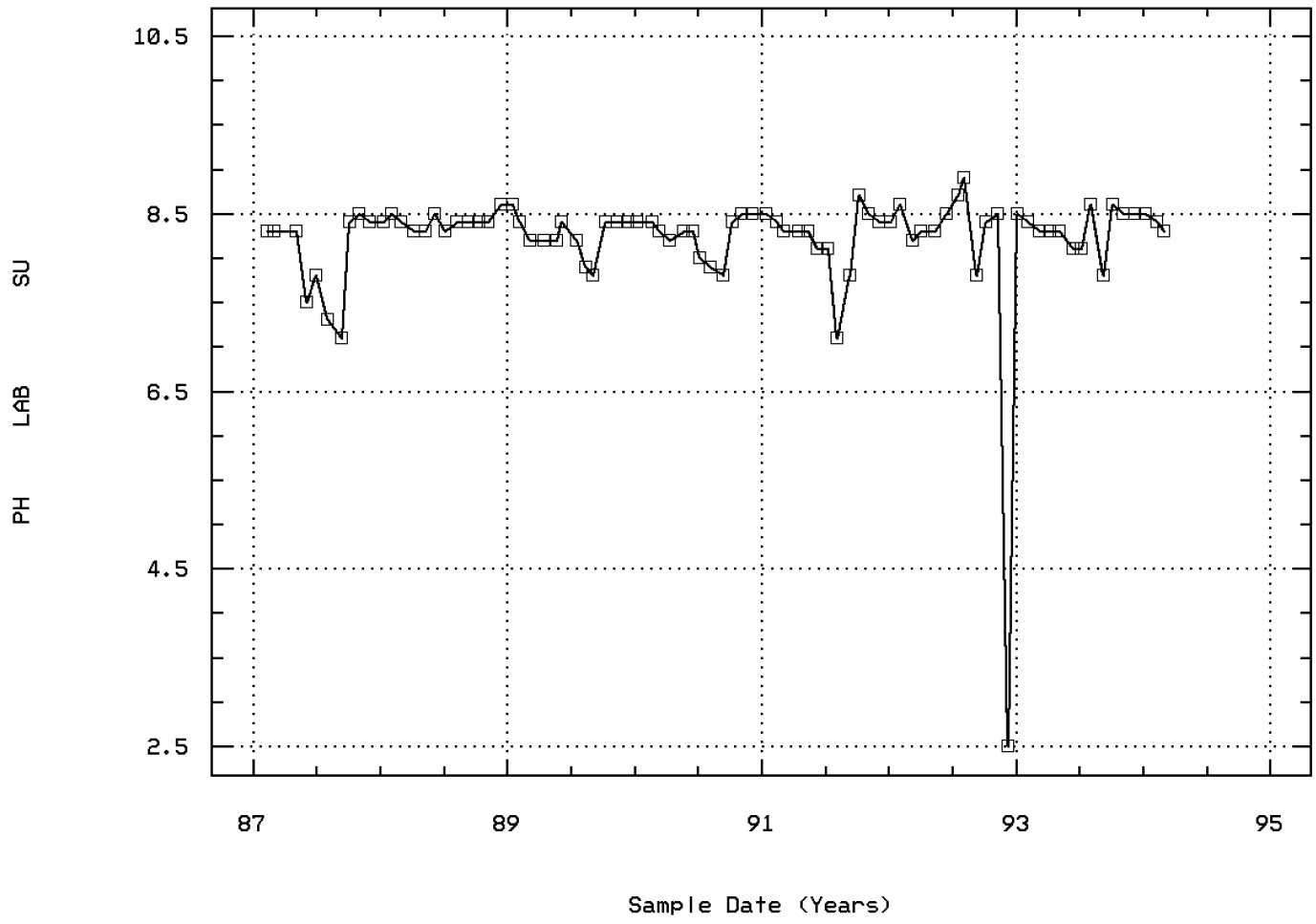
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00403

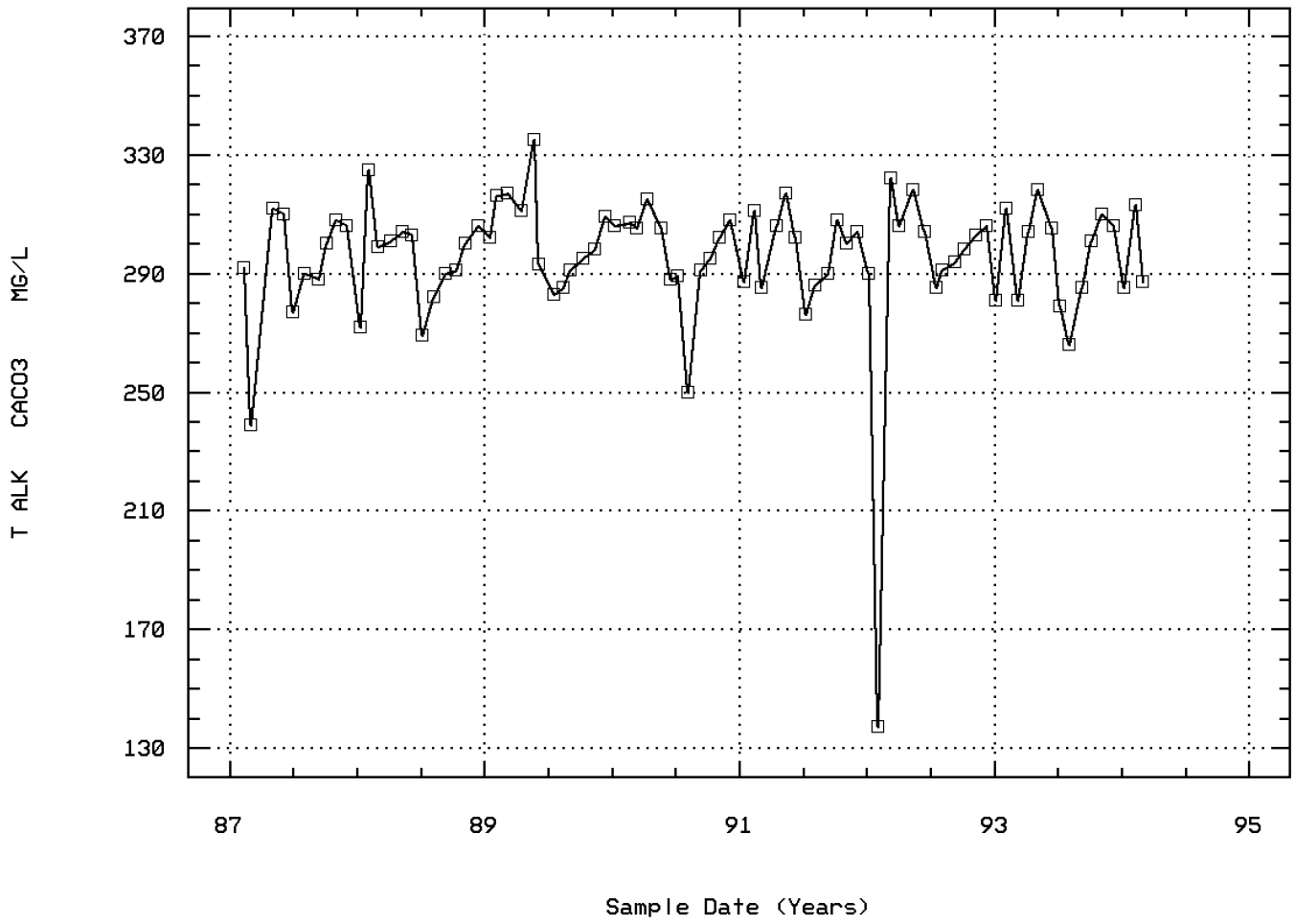
PH, LAB, STANDARD UNITS



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00410

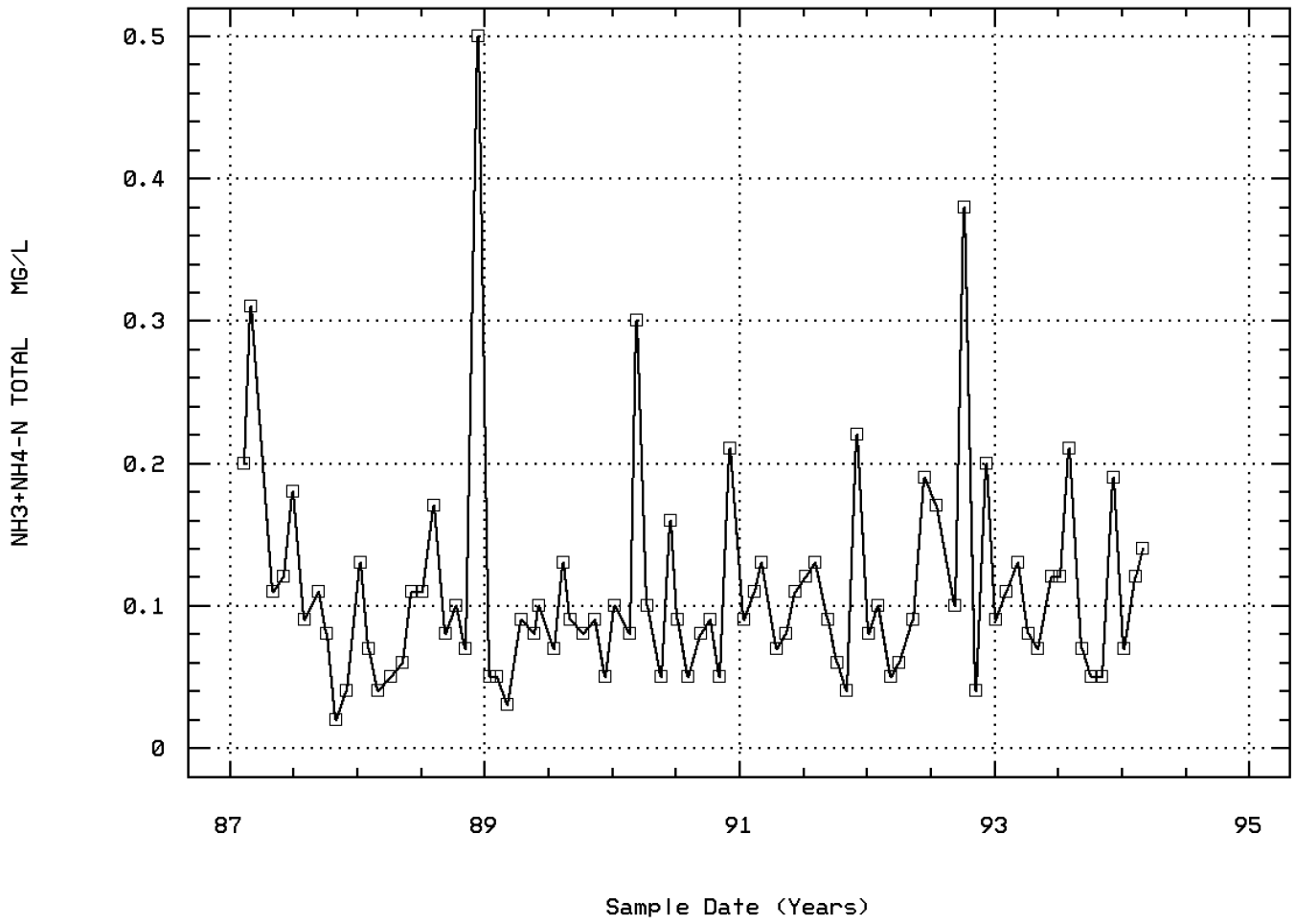
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00610

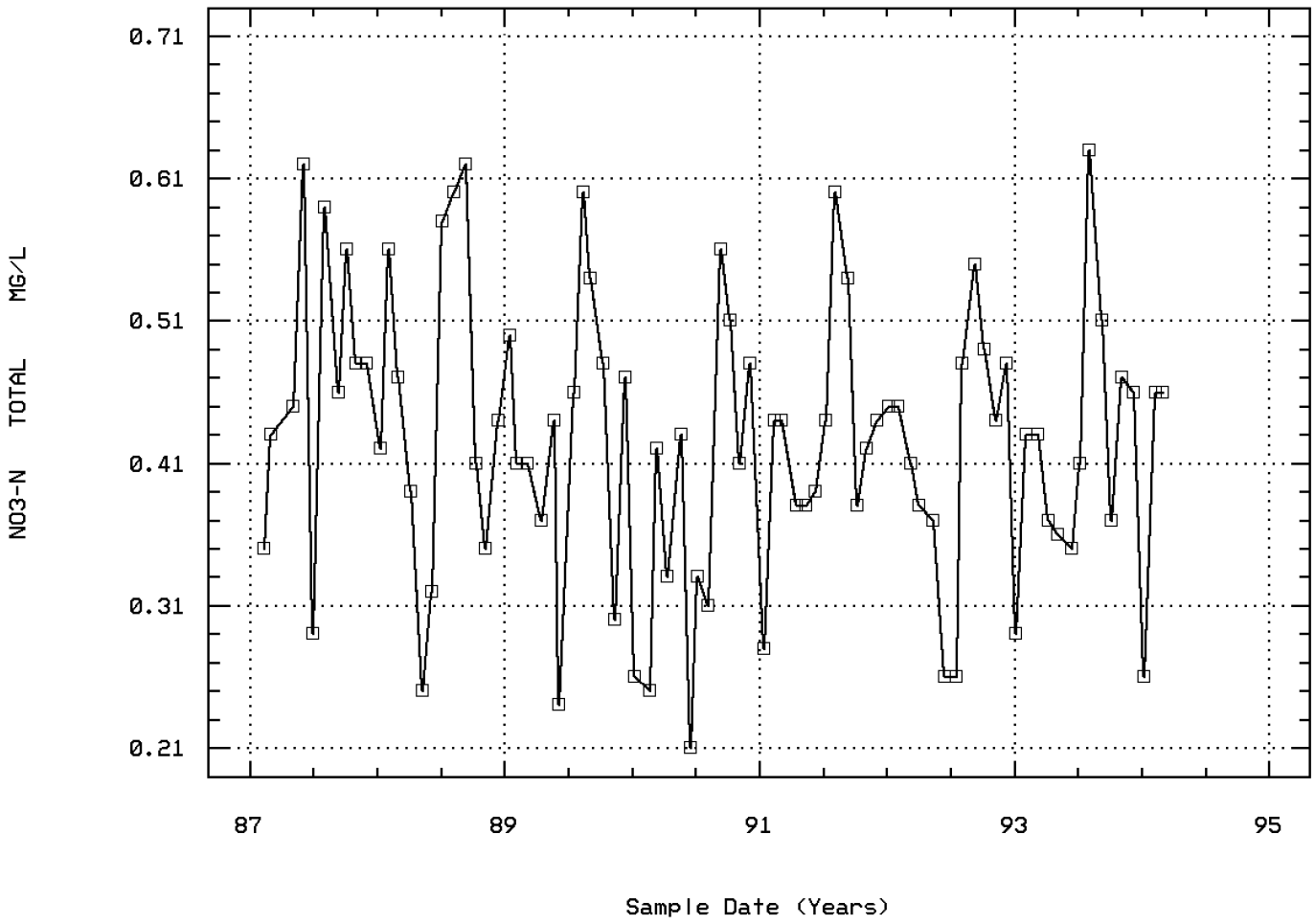
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00620

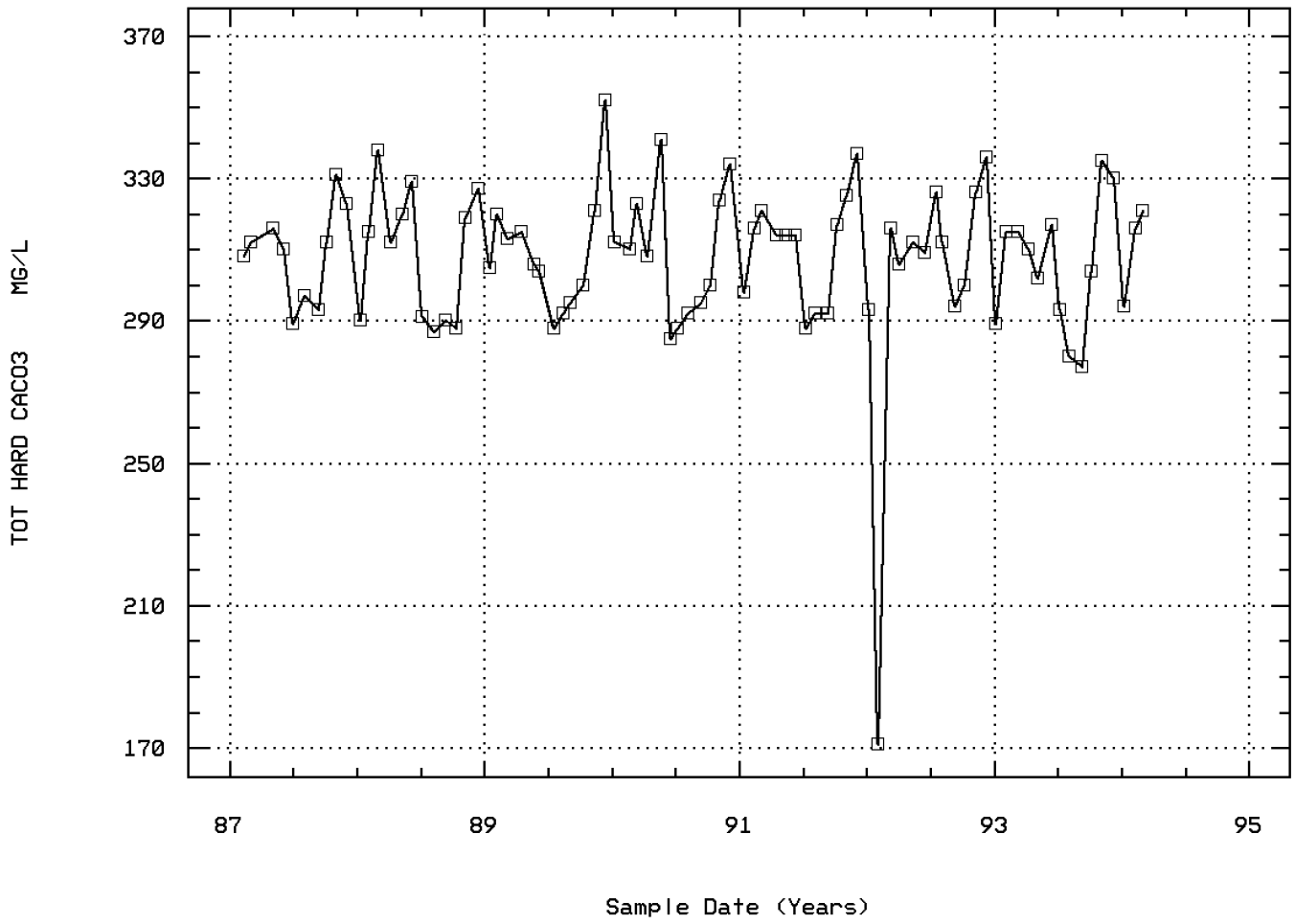
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00900

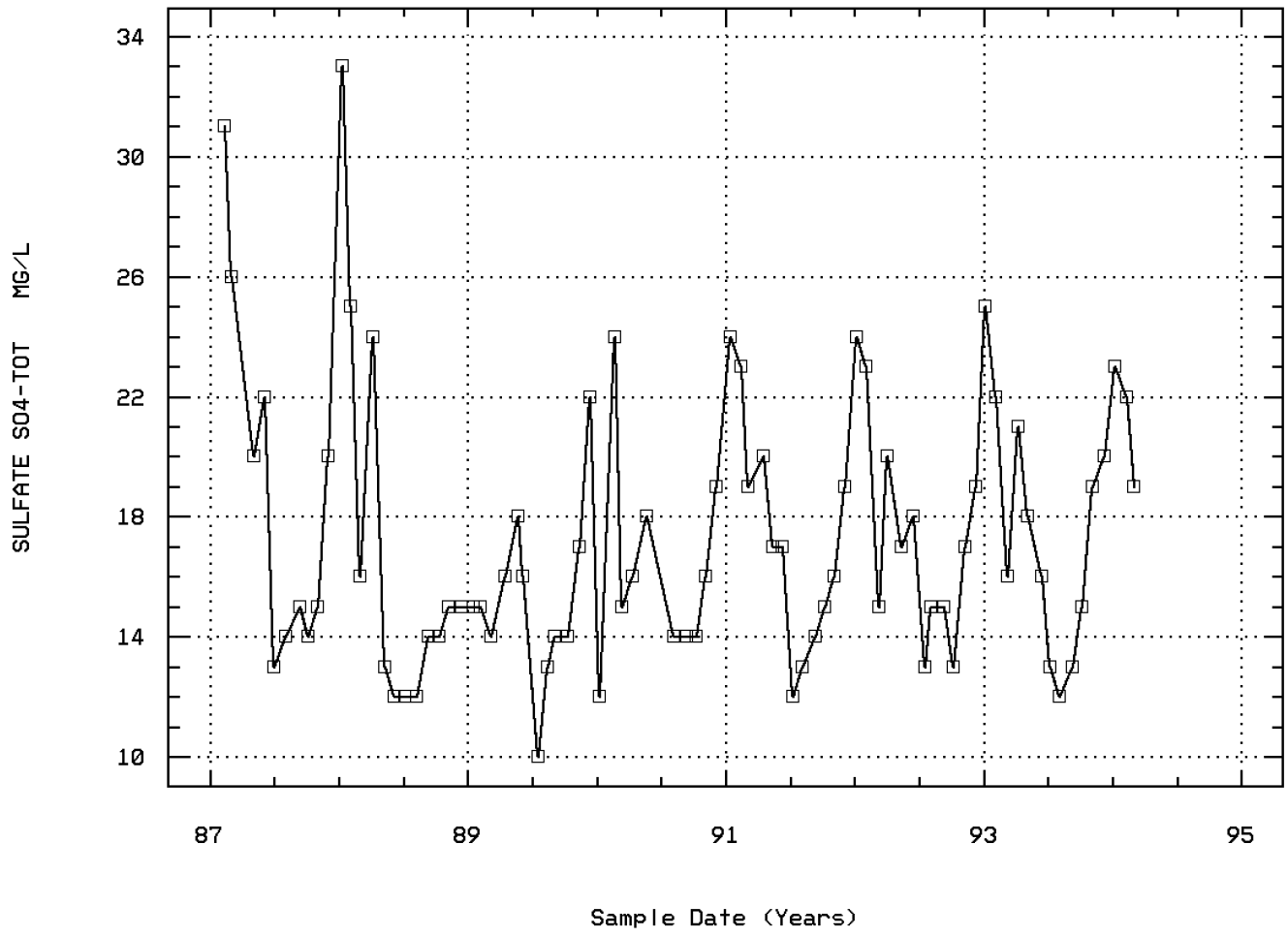
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00945

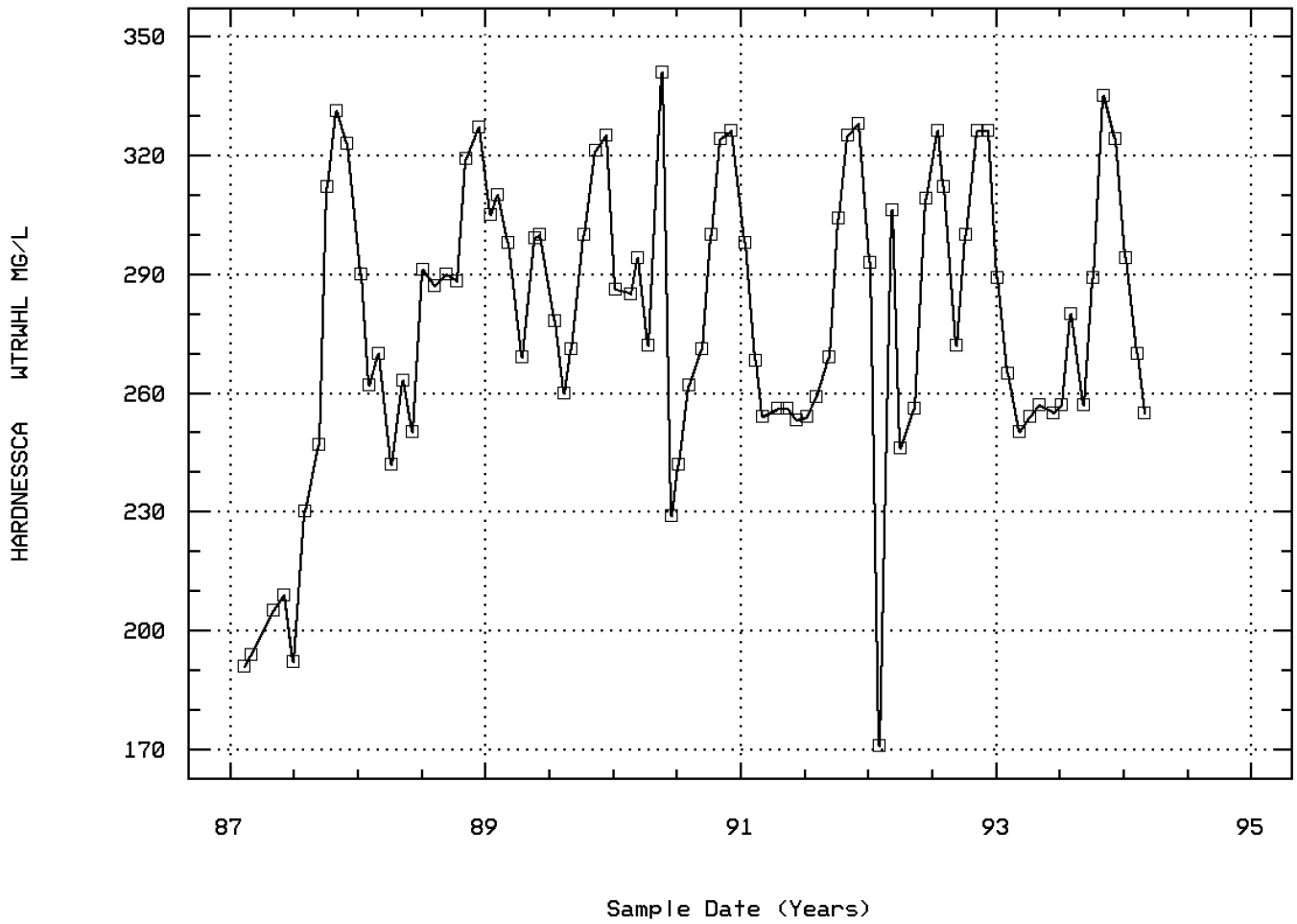
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45634

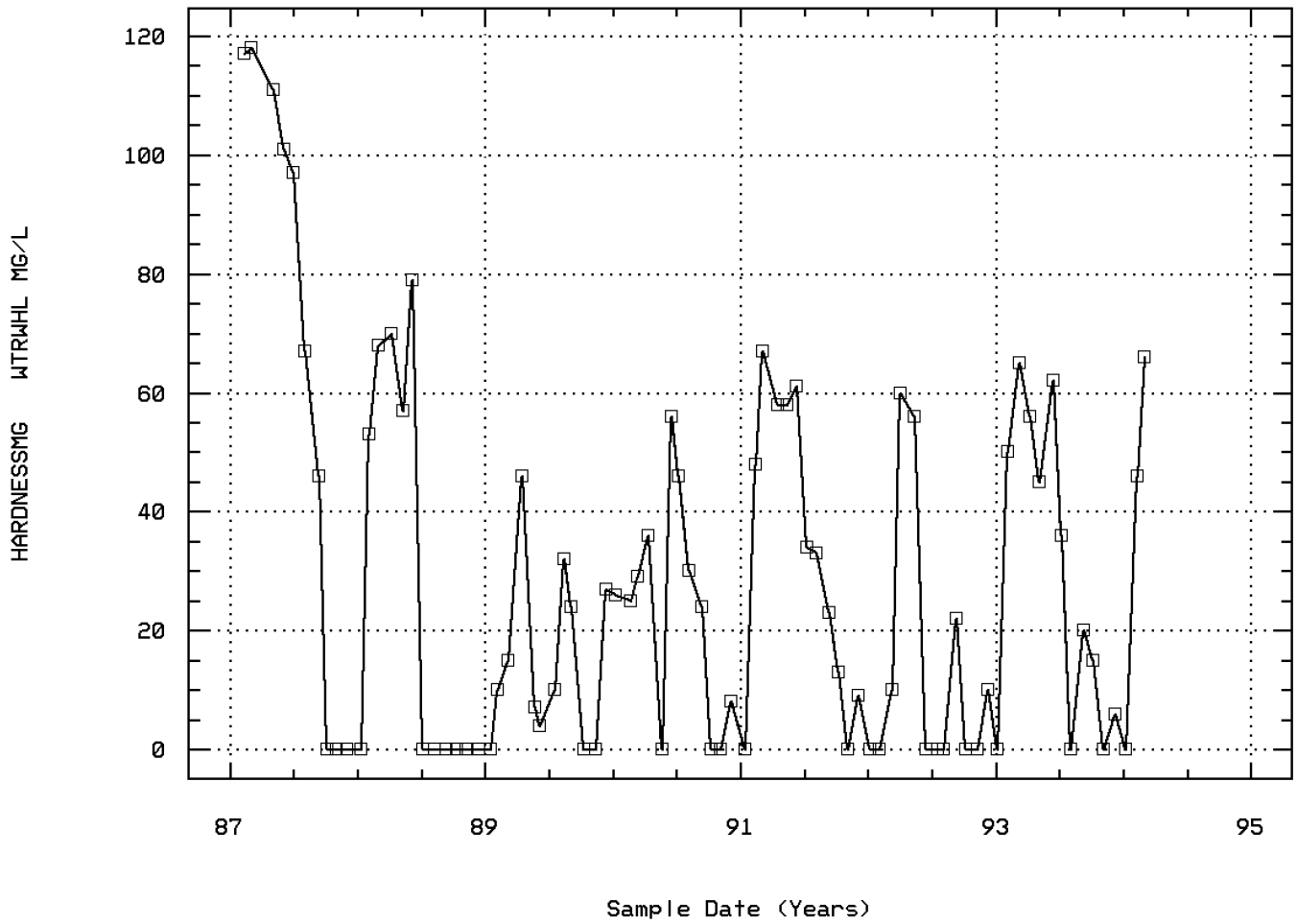
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45635

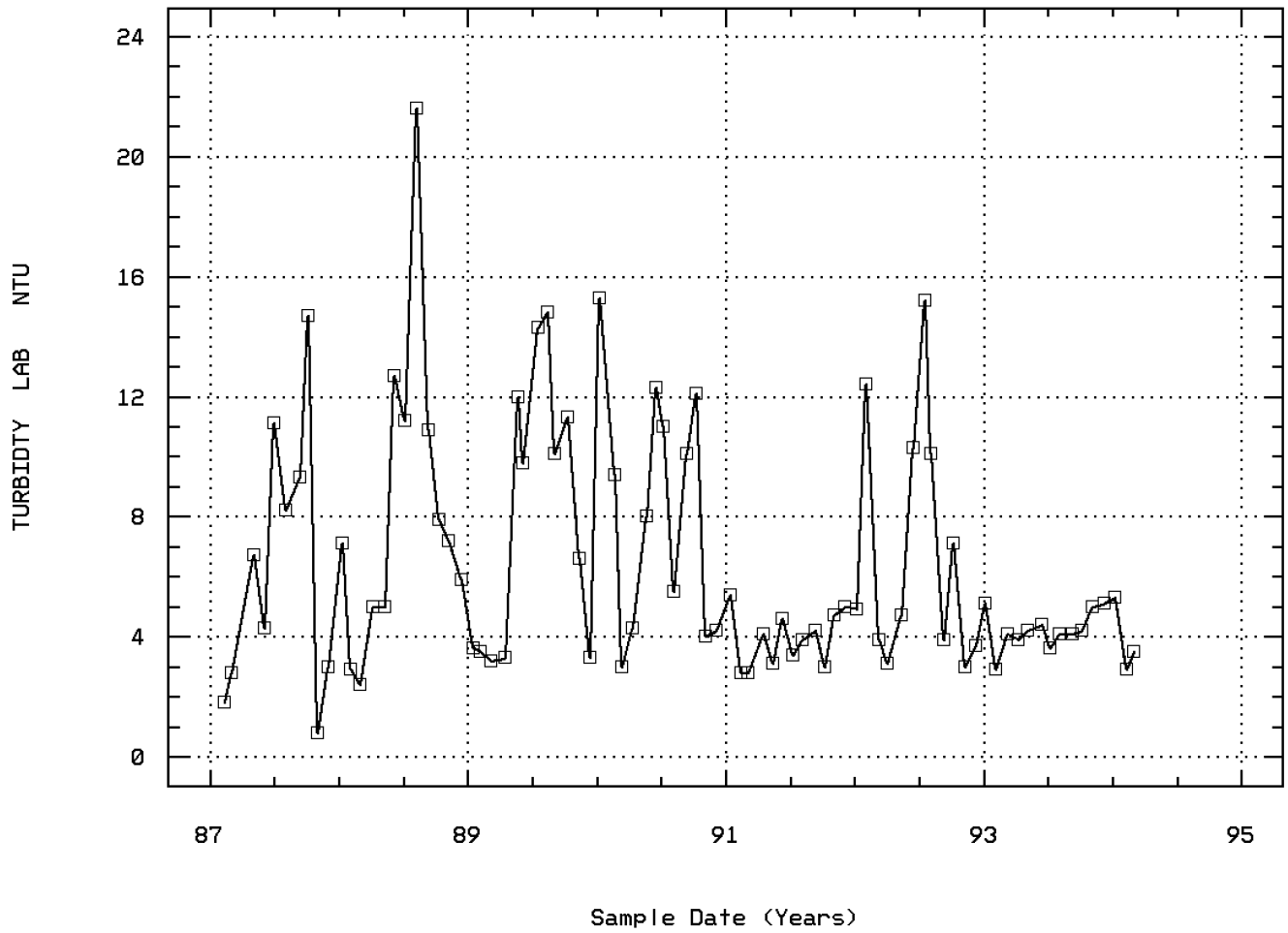
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Catfish Farm

Annual Analysis for 1987 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	10	17.1	15.88	23.7	7.7	40.717	6.381	7.76	8.375	21.75	23.58
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	10	593.	586.7	622.	537.	652.456	25.543	539.1	565.5	604.75	620.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	10	9.1	9.31	11.7	7.3	2.168	1.472	7.34	8.075	10.75	11.62
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	10	8.3	7.99	8.5	7.1	0.27	0.52	7.12	7.45	8.4	8.49
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	10	8.3	7.692	8.5	7.1	0.368	0.607	7.12	7.45	8.4	8.49
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	10	0.005	0.02	0.079	0.003	0.001	0.026	0.003	0.004	0.036	0.077
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	296.	292.2	312.	239.	477.067	21.842	242.8	285.25	308.5	311.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.11	0.126	0.31	0.02	0.007	0.085	0.022	0.07	0.185	0.299
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	10	0.003	0.005	0.025	0.	0.	0.007	0.	0.001	0.005	0.023
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.47	0.471	0.62	0.29	0.01	0.102	0.296	0.41	0.568	0.617
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	10	0.18	0.238	0.98	0.06	0.072	0.268	0.062	0.095	0.215	0.908
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	311.	309.1	331.	289.	172.1	13.119	289.4	296.	317.75	330.2
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	17.5	19.	31.	13.	35.778	5.981	13.1	14.	23.	30.5
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	219.5	243.4	331.	191.	3266.044	57.149	191.1	193.5	314.75	330.2
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	82.	65.7	118.	0.	2553.789	50.535	0.	0.	112.5	117.9
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	10	5.5	6.27	14.7	0.8	20.445	4.522	0.9	2.55	9.75	14.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	13.25	15.05	25.2	6.2	42.701	6.535	6.5	8.85	20.825	24.96
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	540.5	533.917	624.	298.	6866.992	82.867	364.6	521.25	579.75	623.1
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.8	8.908	12.1	6.5	2.81	1.676	6.62	7.8	9.675	11.95
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.4	8.408	8.6	8.3	0.008	0.09	8.3	8.325	8.475	8.57
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.4	8.4	8.6	8.3	0.008	0.09	8.3	8.325	8.475	8.57
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.004	0.005	0.003	0.	0.001	0.003	0.003	0.005	0.005
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	299.5	295.167	325.	269.	241.606	15.544	269.9	284.	303.75	319.3
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.09	0.124	0.5	0.04	0.015	0.124	0.043	0.063	0.125	0.401
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.003	0.003	0.006	0.001	0.	0.001	0.001	0.002	0.003	0.005
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.43	0.451	0.62	0.25	0.014	0.118	0.271	0.36	0.575	0.614
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.115	0.113	0.27	0.03	0.004	0.065	0.033	0.055	0.14	0.237
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	313.5	308.833	338.	287.	345.606	18.59	287.3	290.	325.25	335.3
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	14.5	17.083	33.	12.	44.265	6.653	12.	12.25	22.	30.6
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	287.5	281.583	327.	242.	653.72	25.568	244.4	262.25	290.75	324.6
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	27.25	79.	0.	1173.841	34.261	0.	0.	65.25	76.3
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	7.15	8.317	21.6	2.4	27.794	5.272	2.55	5.	11.125	18.93

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.5	15.608	24.1	7.1	51.199	7.155	7.28	8.2	21.9	24.1
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	550.5	536.833	565.	453.	1025.061	32.017	470.7	518.25	560.	563.5
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.533	10.1	6.5	1.462	1.209	6.53	7.7	9.575	9.98
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.258	8.6	7.8	0.052	0.227	7.83	8.2	8.4	8.54
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.289	8.198	8.6	7.8	0.056	0.236	7.83	8.2	8.4	8.54
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.006	0.016	0.003	0.	0.004	0.003	0.004	0.006	0.015
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	300.	302.917	335.	283.	231.538	15.216	283.6	291.5	314.75	329.6
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.08	0.076	0.13	0.03	0.001	0.027	0.036	0.05	0.09	0.121
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.003	0.004	0.009	0.002	0.	0.002	0.002	0.002	0.005	0.008
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.45	0.435	0.6	0.24	0.01	0.099	0.258	0.38	0.495	0.582
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.09	0.097	0.19	0.04	0.002	0.05	0.04	0.053	0.133	0.184

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	305.5	309.25	352.	288.	292.932	17.115	289.2	296.25	318.75	342.7
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	15.	15.333	22.	10.	8.606	2.934	10.9	14.	16.75	20.8
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	299.5	294.667	325.	260.	430.97	20.76	262.7	272.75	308.75	323.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	10.	14.583	46.	0.	216.629	14.718	0.	1.	26.25	41.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.11	0.168	0.46	0.06	0.02	0.141	0.066	0.083	0.178	0.46
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	8.2	7.983	14.8	3.2	20.842	4.565	3.23	3.35	11.825	14.65

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.25	16.642	27.1	8.1	45.128	6.718	8.55	10.025	23.525	26.32
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	549.	532.5	580.	410.	2543.727	50.435	424.4	517.	562.	577.3
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.95	8.5	11.	5.1	2.898	1.702	5.61	6.95	9.55	10.85
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.25	8.5	7.8	0.054	0.232	7.83	8.05	8.4	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.3	8.187	8.5	7.8	0.058	0.241	7.83	8.05	8.4	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.007	0.016	0.003	0.	0.004	0.003	0.004	0.009	0.015
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	303.5	296.75	315.	250.	288.386	16.982	261.4	289.5	306.75	312.9
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.09	0.113	0.3	0.05	0.006	0.075	0.05	0.058	0.145	0.273
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.002	0.002	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.37	0.375	0.56	0.21	0.012	0.11	0.222	0.273	0.468	0.545
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.15	0.174	0.44	0.05	0.012	0.109	0.053	0.095	0.195	0.401
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	309.	309.333	341.	285.	332.97	18.247	285.9	292.75	323.75	338.9
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	15.5	16.2	24.	12.	11.733	3.425	12.2	14.	18.25	23.5
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	285.5	286.	341.	229.	1137.455	33.726	232.9	264.25	318.	336.5
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	25.5	23.333	56.	0.	336.061	18.332	0.	2.	34.5	53.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.12	0.152	0.51	0.06	0.016	0.127	0.06	0.063	0.188	0.432
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	8.7	8.267	15.3	3.	16.226	4.028	3.3	4.225	11.825	14.4

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.2	15.608	24.1	6.7	44.223	6.65	6.97	8.55	21.65	23.95
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	562.5	552.333	590.	424.	1803.515	42.468	457.9	554.5	570.75	586.4
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.883	10.9	6.8	1.76	1.327	6.98	7.75	9.975	10.87
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.208	8.7	7.1	0.175	0.419	7.31	8.1	8.475	8.64
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.3	7.925	8.7	7.1	0.263	0.513	7.31	8.1	8.475	8.64
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.012	0.079	0.002	0.	0.022	0.002	0.003	0.008	0.06
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	301.	297.667	317.	276.	157.333	12.543	278.7	286.25	307.5	315.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.1	0.104	0.22	0.04	0.002	0.046	0.046	0.073	0.128	0.193
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.005	0.03	0.002	0.	0.008	0.002	0.002	0.003	0.022
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.43	0.427	0.6	0.28	0.007	0.081	0.31	0.38	0.44	0.582
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.115	0.138	0.37	0.06	0.007	0.082	0.06	0.093	0.16	0.31
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	314.	310.667	337.	288.	225.333	15.011	289.2	293.5	320.	333.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	17.	17.417	24.	12.	14.083	3.753	12.3	14.25	19.75	23.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	263.5	277.	328.	253.	823.636	28.699	253.3	254.5	302.5	327.1
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	33.5	33.667	67.	0.	605.879	24.615	0.	10.	58.	65.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.095	0.163	0.46	0.06	0.021	0.143	0.066	0.08	0.178	0.46
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.	3.917	5.4	2.8	0.803	0.896	2.8	3.025	4.675	5.28

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.6	14.825	22.1	6.4	41.597	6.45	6.49	8.3	20.9	21.95
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	564.	533.083	595.	365.	4406.083	66.378	394.1	492.75	568.75	592.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	9.	8.627	10.9	4.1	3.166	1.779	4.84	8.	9.8	10.76
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.4	7.925	8.9	2.5	2.993	1.73	4.09	8.225	8.575	8.84
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.4	3.579	8.9	2.5	23.596	4.858	4.09	8.225	8.575	8.84
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	263.527	3162.278	0.001	833330.831	912.87	0.001	0.003	0.006	2213.599
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	300.5	287.833	322.	137.	2376.697	48.751	181.4	290.25	306.	320.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.1	0.133	0.38	0.04	0.01	0.099	0.042	0.06	0.19	0.344
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	0.002	0.002	0.003	0.002	0.	0.	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.445	0.418	0.55	0.26	0.008	0.089	0.26	0.373	0.48	0.532
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	0.12	0.122	0.16	0.1	0.001	0.025	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	310.5	300.083	336.	171.	1821.356	42.677	207.6	295.5	323.5	333.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	17.	17.417	24.	13.	12.811	3.579	13.	15.	19.75	23.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	303.	286.917	326.	171.	2050.992	45.288	193.5	260.	322.5	326.
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	13.167	60.	0.	485.424	22.032	0.	0.	19.	58.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.12	0.127	0.21	0.06	0.002	0.047	0.063	0.093	0.155	0.207
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.8	6.858	15.2	3.	17.063	4.131	3.03	3.75	10.25	14.36

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	15.85	15.425	23.4	6.6	42.682	6.533	6.87	8.65	21.525	23.4
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	561.	551.667	595.	442.	1656.788	40.704	465.7	543.	581.25	593.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.808	11.5	5.3	2.67	1.634	6.05	7.875	9.925	11.26
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.35	8.333	8.6	7.8	0.057	0.239	7.89	8.15	8.5	8.6
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.347	8.265	8.6	7.8	0.062	0.249	7.89	8.15	8.5	8.6
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.005	0.016	0.003	0.	0.004	0.003	0.003	0.007	0.013
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	302.5	295.667	318.	266.	269.515	16.417	269.9	281.	309.	316.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.1	0.108	0.21	0.05	0.003	0.051	0.05	0.07	0.128	0.204
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.42	0.423	0.63	0.29	0.008	0.089	0.308	0.363	0.468	0.594
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	307.	305.583	335.	277.	337.174	18.362	277.9	290.	316.5	333.5
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	17.	17.5	25.	12.	16.273	4.034	12.3	13.5	20.75	24.1
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	261.	276.	335.	250.	813.091	28.515	251.2	255.5	289.	331.7
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	28.	29.583	65.	0.	653.174	25.557	0.	1.5	54.5	64.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.1	0.148	0.43	0.08	0.012	0.111	0.08	0.083	0.165	0.394
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.15	4.225	5.1	2.9	0.406	0.637	3.11	3.95	4.85	5.1

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	3	7.5	8.567	11.4	6.8	6.143	2.479	**	**	**	**
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	3	561.	570.	592.	557.	367.	19.157	**	**	**	**
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	3	10.8	10.733	11.1	10.3	0.163	0.404	**	**	**	**
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	3	8.4	8.4	8.5	8.3	0.01	0.1	**	**	**	**
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	3	8.4	8.392	8.5	8.3	0.01	0.1	**	**	**	**
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	3	0.004	0.004	0.005	0.003	0.	0.001	**	**	**	**
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	287.	295.	313.	285.	244.	15.62	**	**	**	**
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.12	0.11	0.14	0.07	0.001	0.036	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.46	0.393	0.46	0.26	0.013	0.115	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	316.	310.333	321.	294.	206.333	14.364	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	3	22.	21.333	23.	19.	4.333	2.082	**	**	**	**

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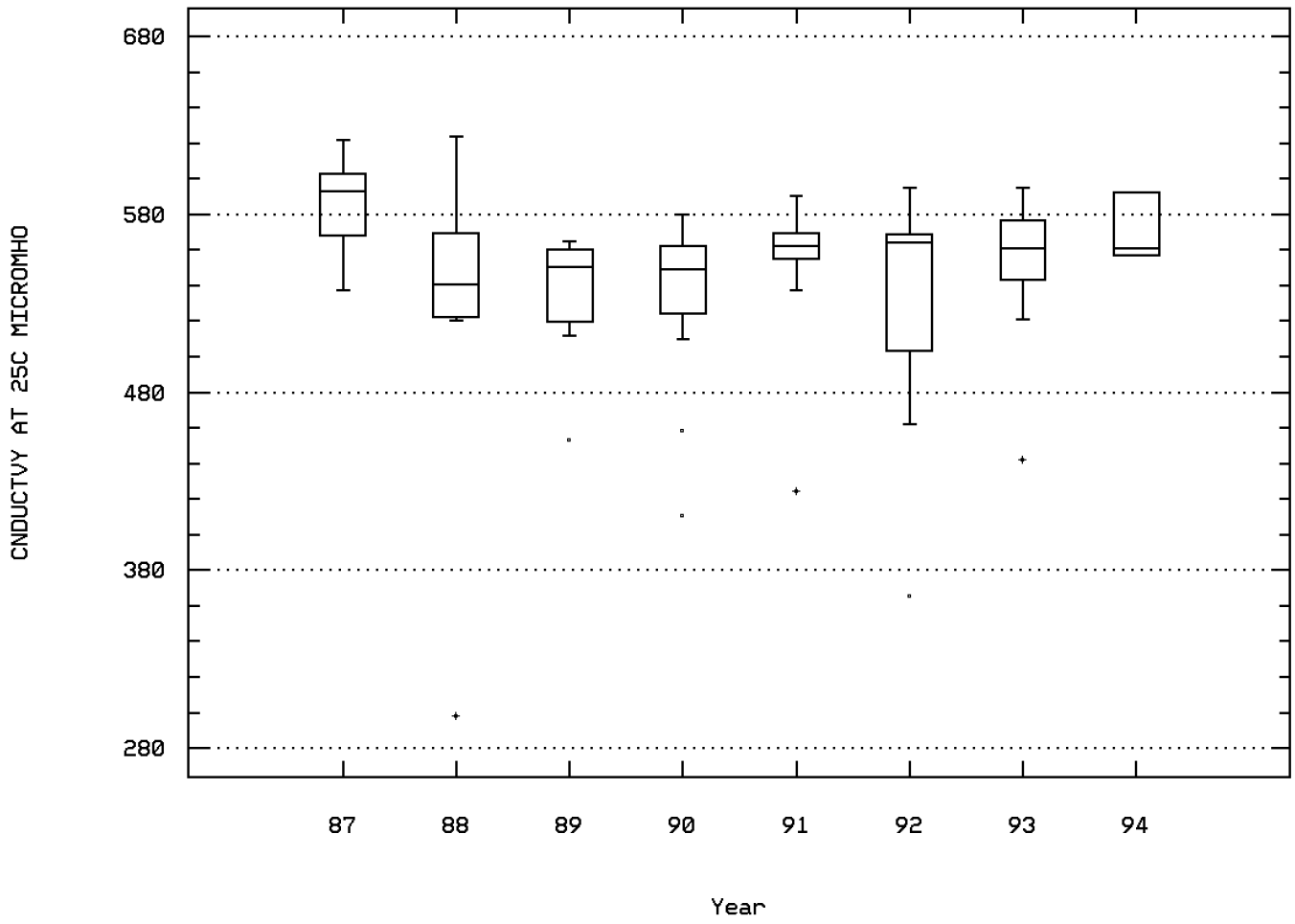
Annual Analysis for 1994 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	270.	273.	294.	255.	387.	19.672	**	**	**	**
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	46.	37.333	66.	0.	1145.333	33.843	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	3	0.09	0.09	0.1	0.08	0.	0.01	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	3	3.5	3.9	5.3	2.9	1.56	1.249	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0017 Parameter Code: 00095

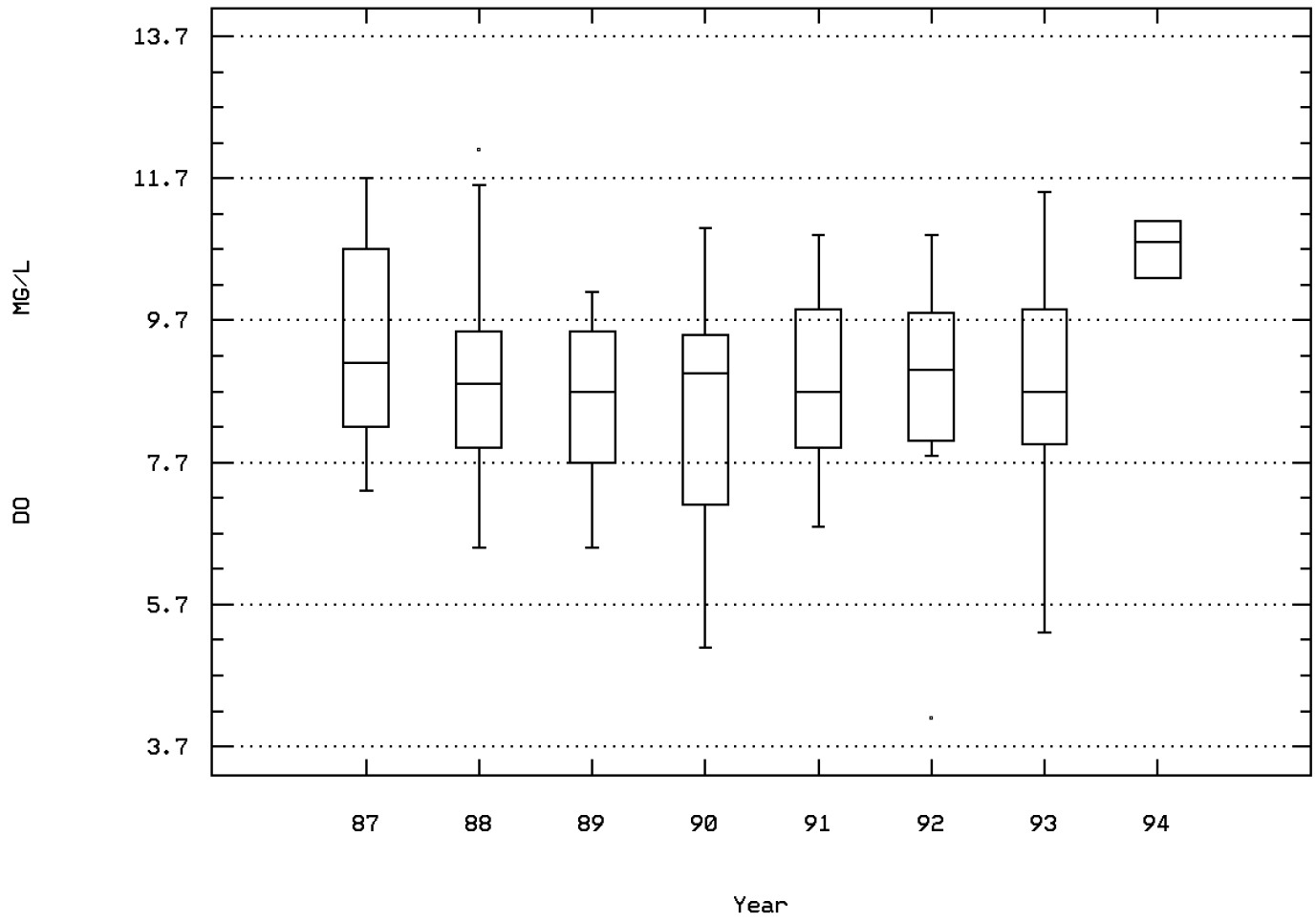
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00300

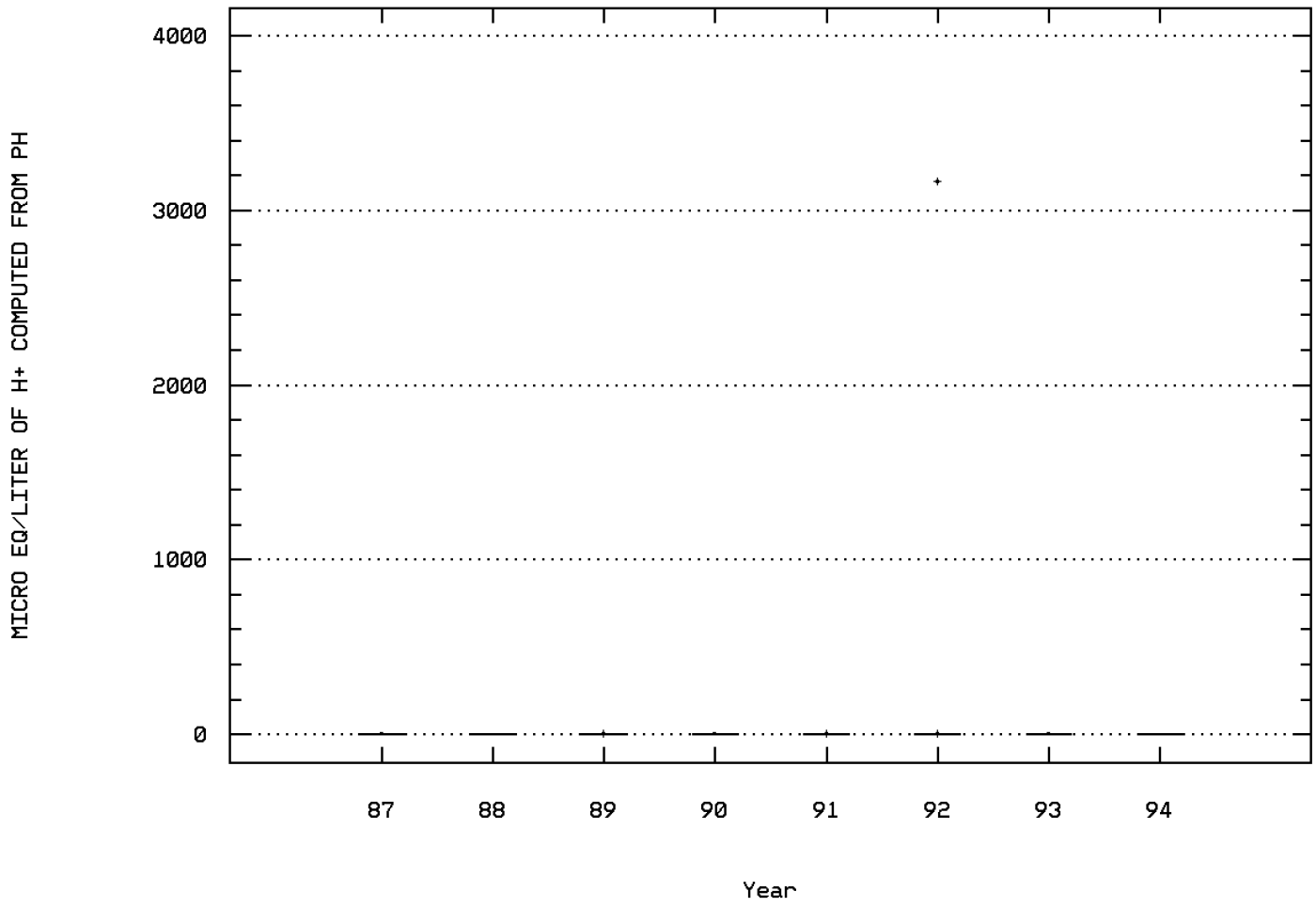
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00403

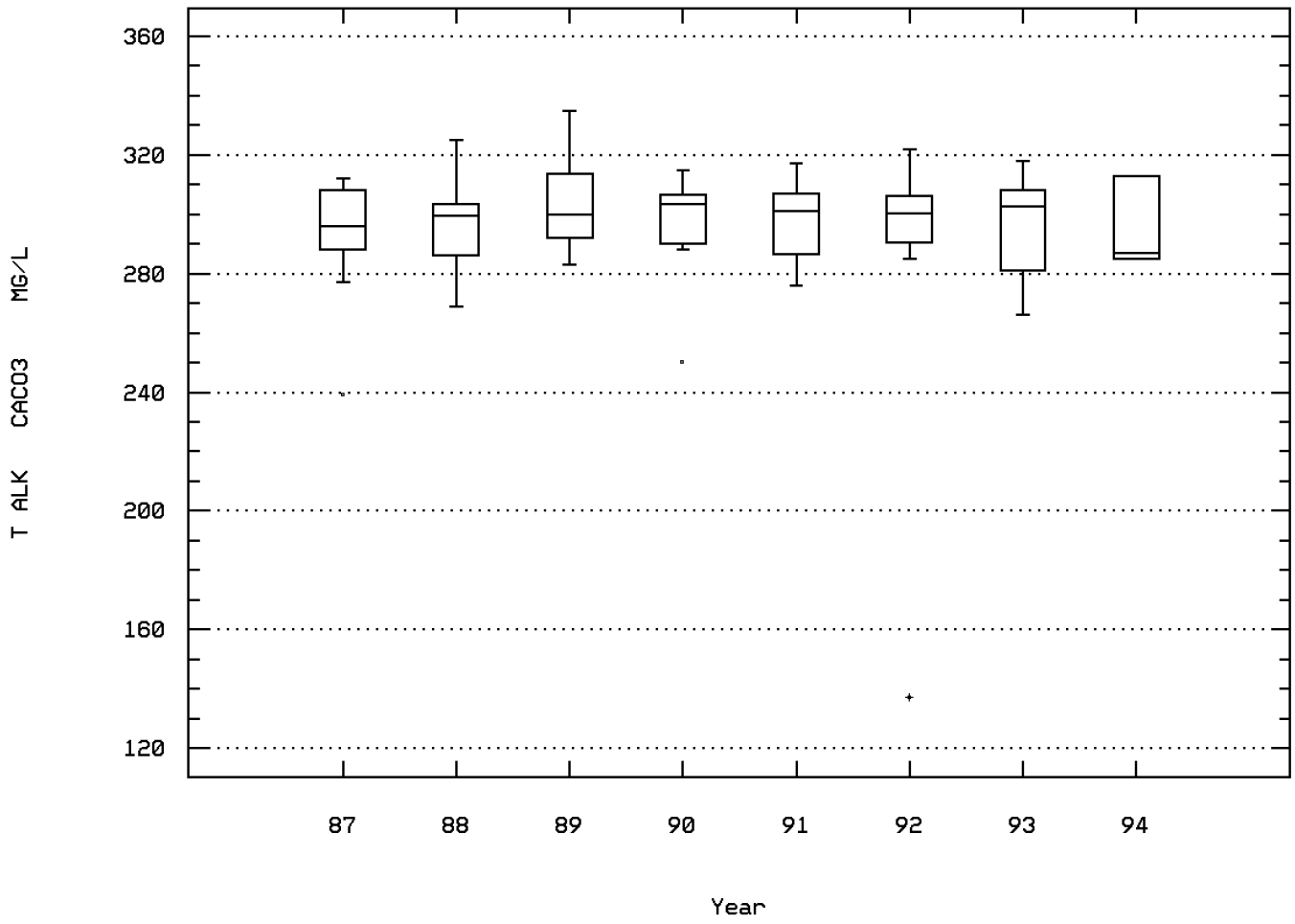
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00410

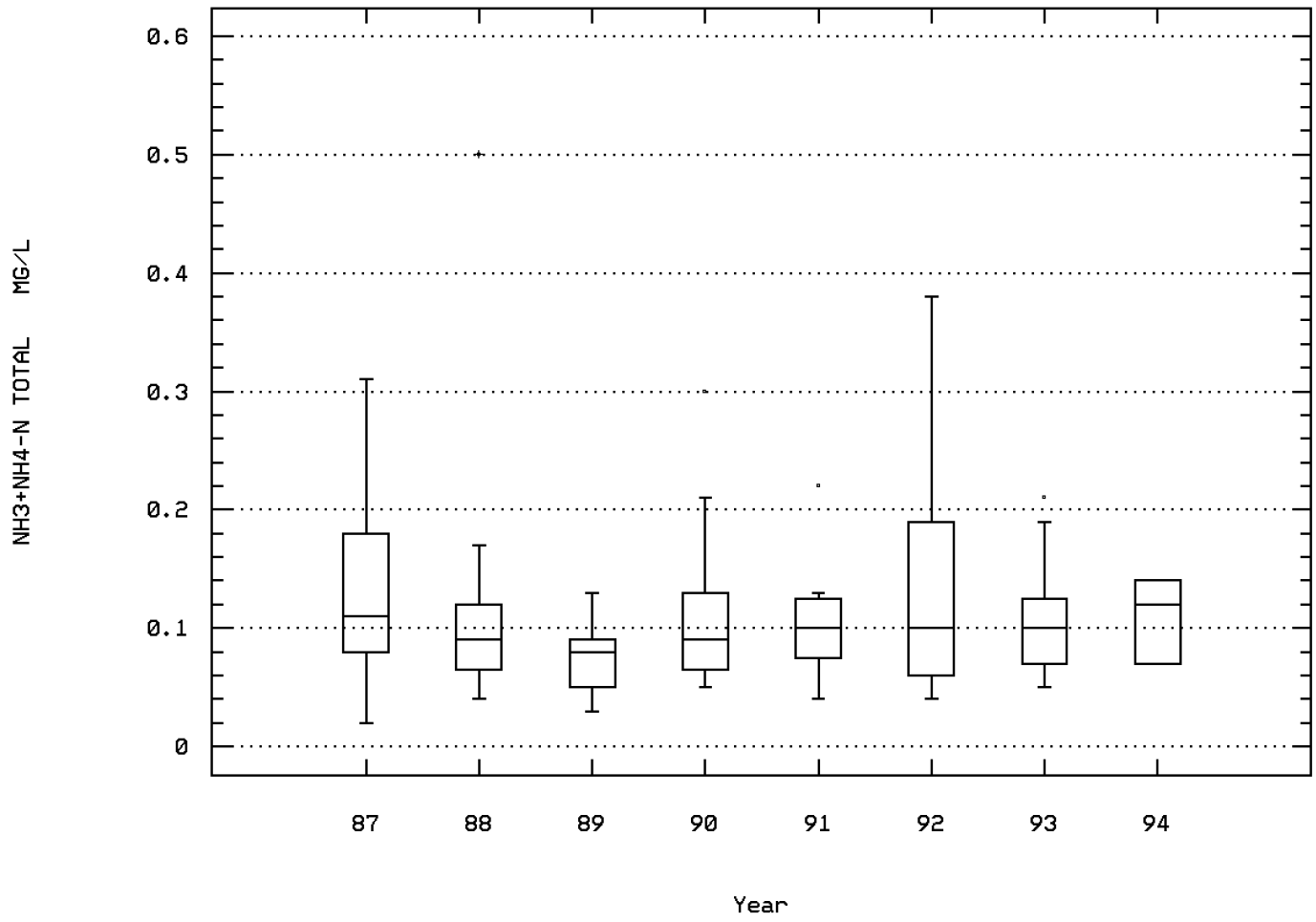
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00610

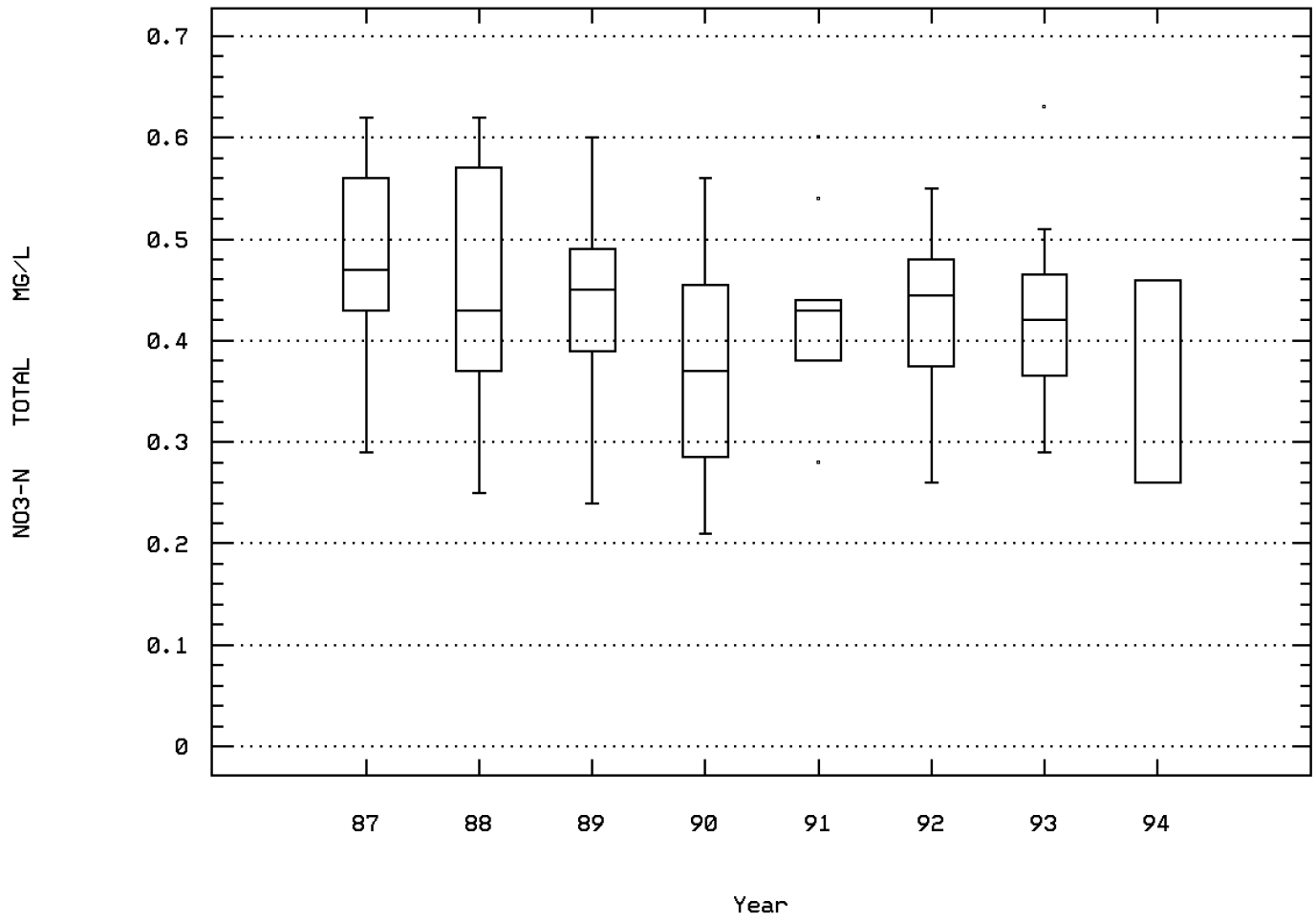
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00620

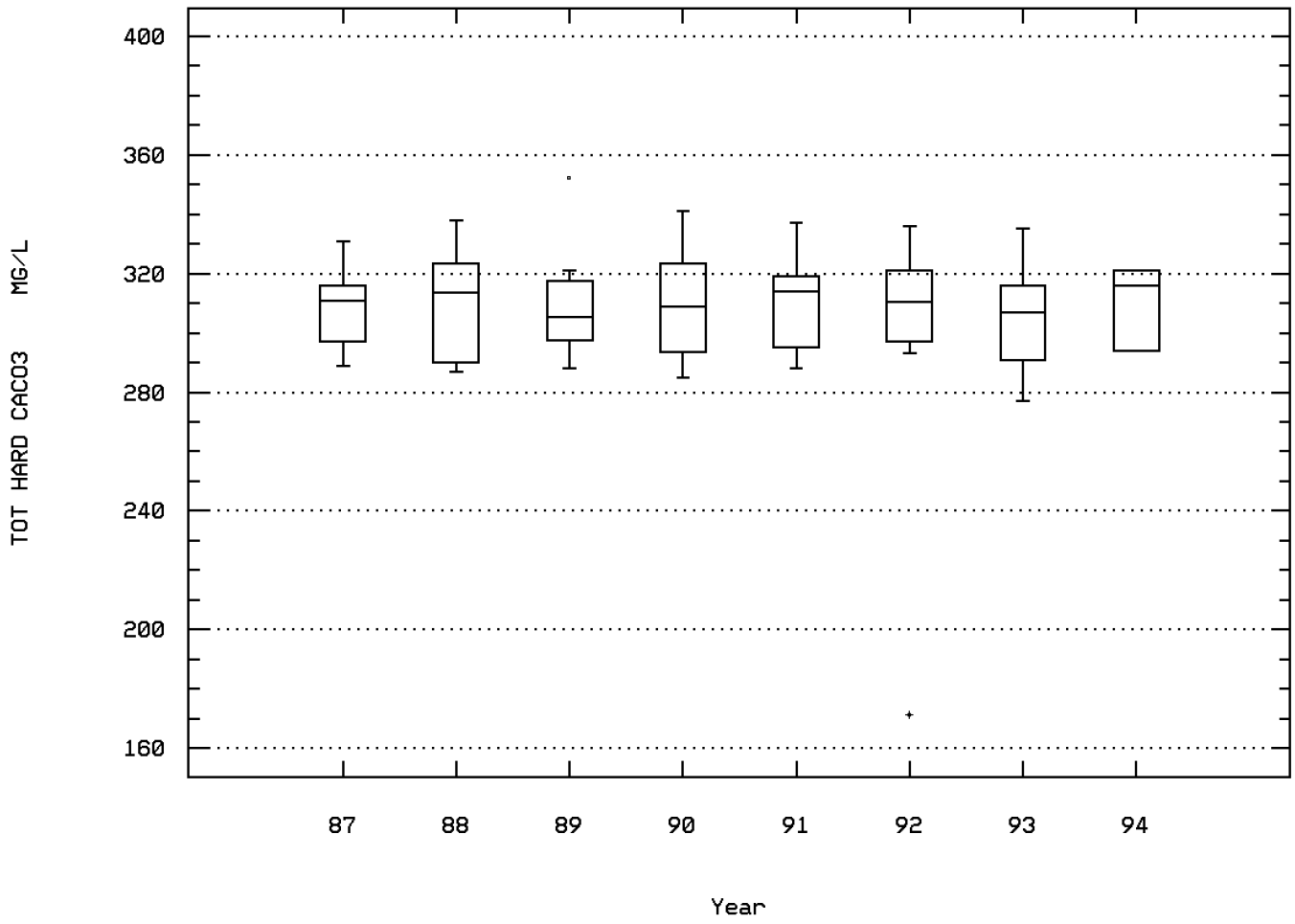
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00900

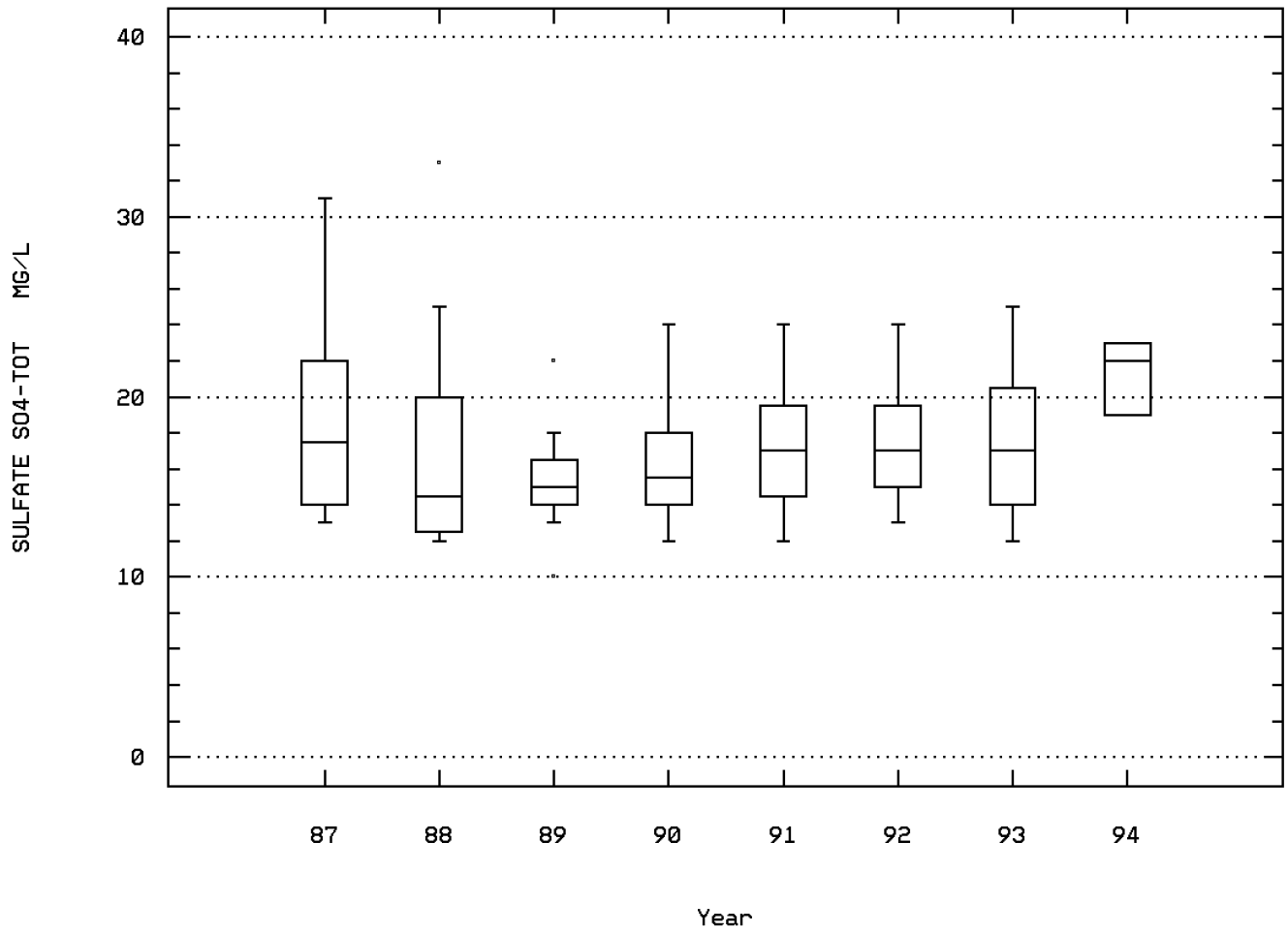
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00945

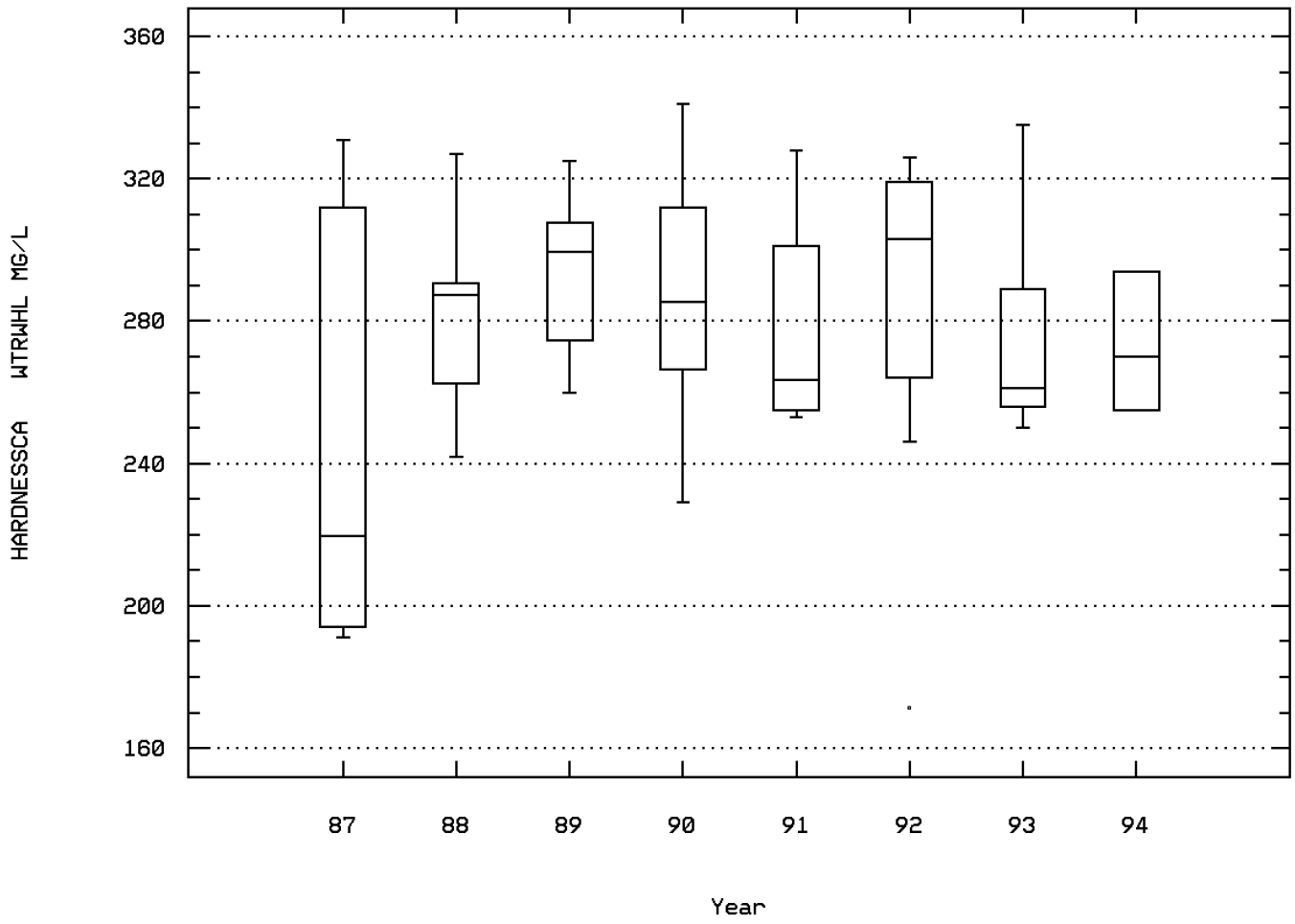
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45634

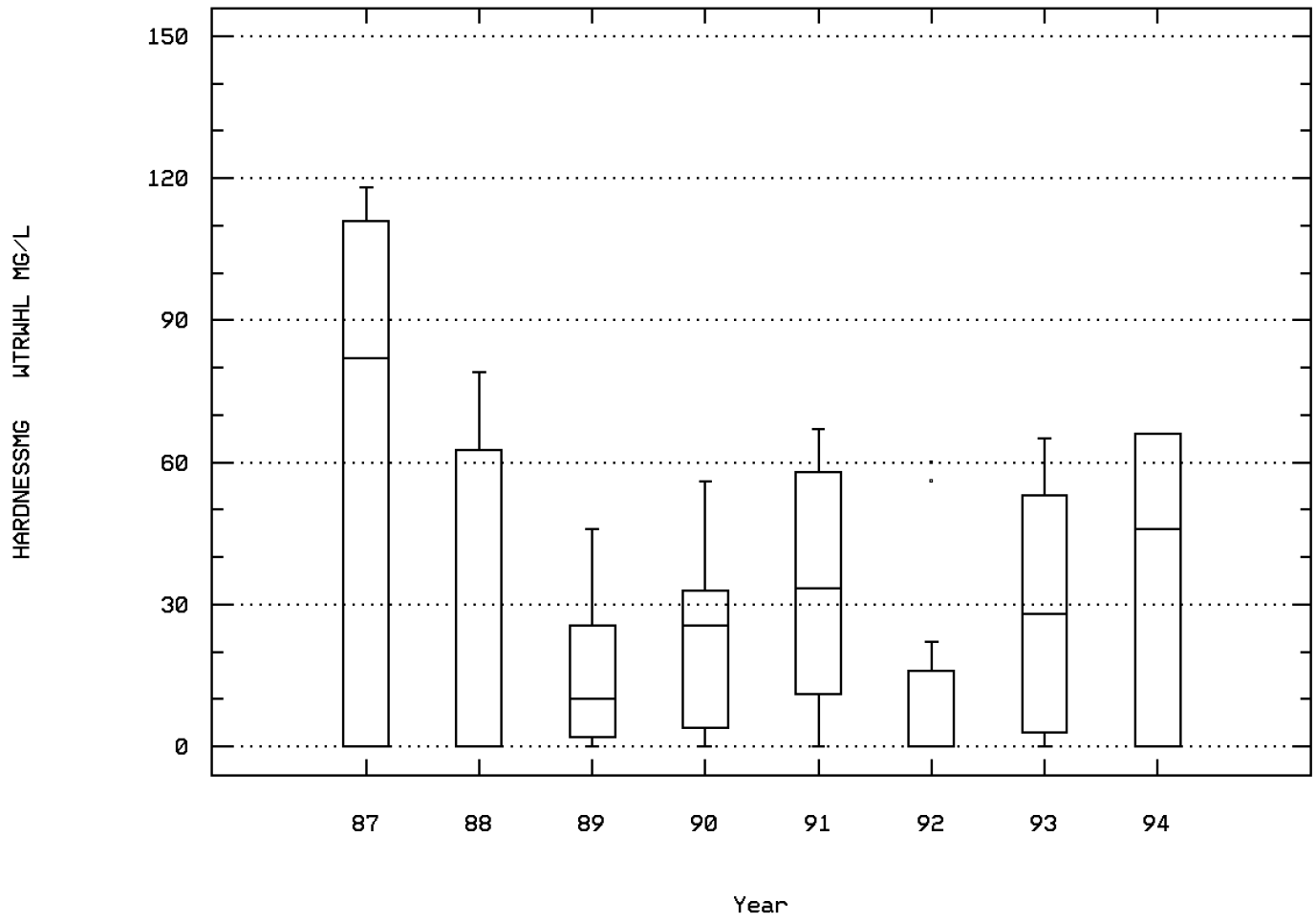
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45635

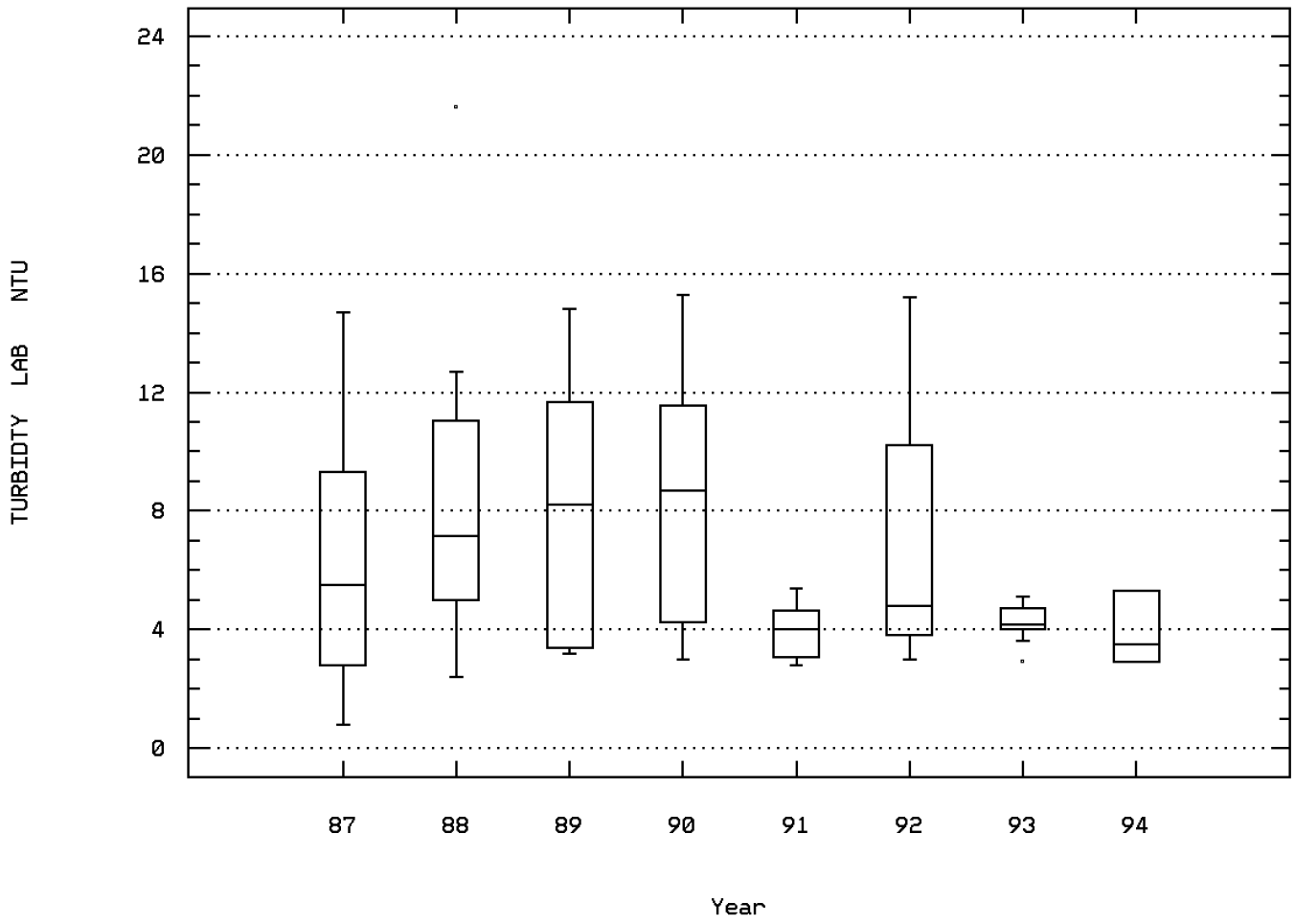
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Catfish Farm

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	36	8.25	9.361	15.9	6.2	7.884	2.808	6.67	7.5	10.675	14.08
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	36	561.	554.5	621.	365.	2189.457	46.792	527.6	544.5	568.75	598.1
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	36	9.6	9.961	12.1	8.1	0.936	0.968	9.	9.3	10.875	11.53
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	36	8.4	8.294	8.7	2.5	0.994	0.997	8.4	8.4	8.5	8.6
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	36	8.4	4.056	8.7	2.5	19.469	4.412	8.4	8.4	8.5	8.6
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	36	0.004	87.844	3162.278	0.002	277777.158	527.046	0.003	0.003	0.004	0.004
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	302.5	296.944	325.	137.	857.883	29.29	283.8	295.	308.	312.3
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.085	0.113	0.5	0.02	0.009	0.097	0.04	0.05	0.118	0.213
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.44	0.42	0.56	0.25	0.007	0.082	0.274	0.373	0.48	0.503
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	315.5	310.917	352.	171.	814.193	28.534	289.7	300.	325.75	335.3
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	36	19.	19.139	33.	12.	25.323	5.032	14.	15.	23.	25.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	302.	298.056	335.	171.	1249.14	35.343	264.1	288.25	324.75	327.3
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	0.	12.861	117.	0.	579.094	24.064	0.	0.	14.5	48.6
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	36	4.95	5.753	15.3	0.8	12.538	3.541	2.87	3.075	7.1	12.19

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	28	19.25	17.25	24.5	9.1	20.236	4.498	10.91	12.3	20.725	21.92
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	28	559.	545.5	624.	298.	4329.889	65.802	440.2	537.25	586.75	597.7
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	28	8.4	8.636	10.7	6.6	1.196	1.093	7.34	7.875	9.775	10.32
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	28	8.3	8.261	8.5	7.5	0.031	0.175	8.1	8.2	8.3	8.41
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	28	8.3	8.208	8.5	7.5	0.034	0.183	8.1	8.2	8.3	8.41
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	28	0.005	0.006	0.032	0.003	0.	0.005	0.004	0.005	0.006	0.008
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	305.	303.286	335.	239.	300.063	17.322	284.6	299.5	314.25	318.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.095	0.108	0.31	0.03	0.004	0.067	0.049	0.063	0.128	0.201
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.385	0.384	0.62	0.21	0.007	0.082	0.249	0.353	0.43	0.461
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	314.	314.393	341.	285.	114.025	10.678	303.8	309.25	319.25	329.9
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	27	17.	17.741	26.	12.	9.969	3.157	13.8	16.	20.	22.4
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	256.	262.214	341.	194.	1069.878	32.709	208.6	250.	288.5	306.3
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	57.5	52.179	118.	0.	972.819	31.19	3.6	30.75	66.75	102.
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	28	4.25	5.411	12.7	2.4	9.711	3.116	2.8	3.225	6.275	12.03

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

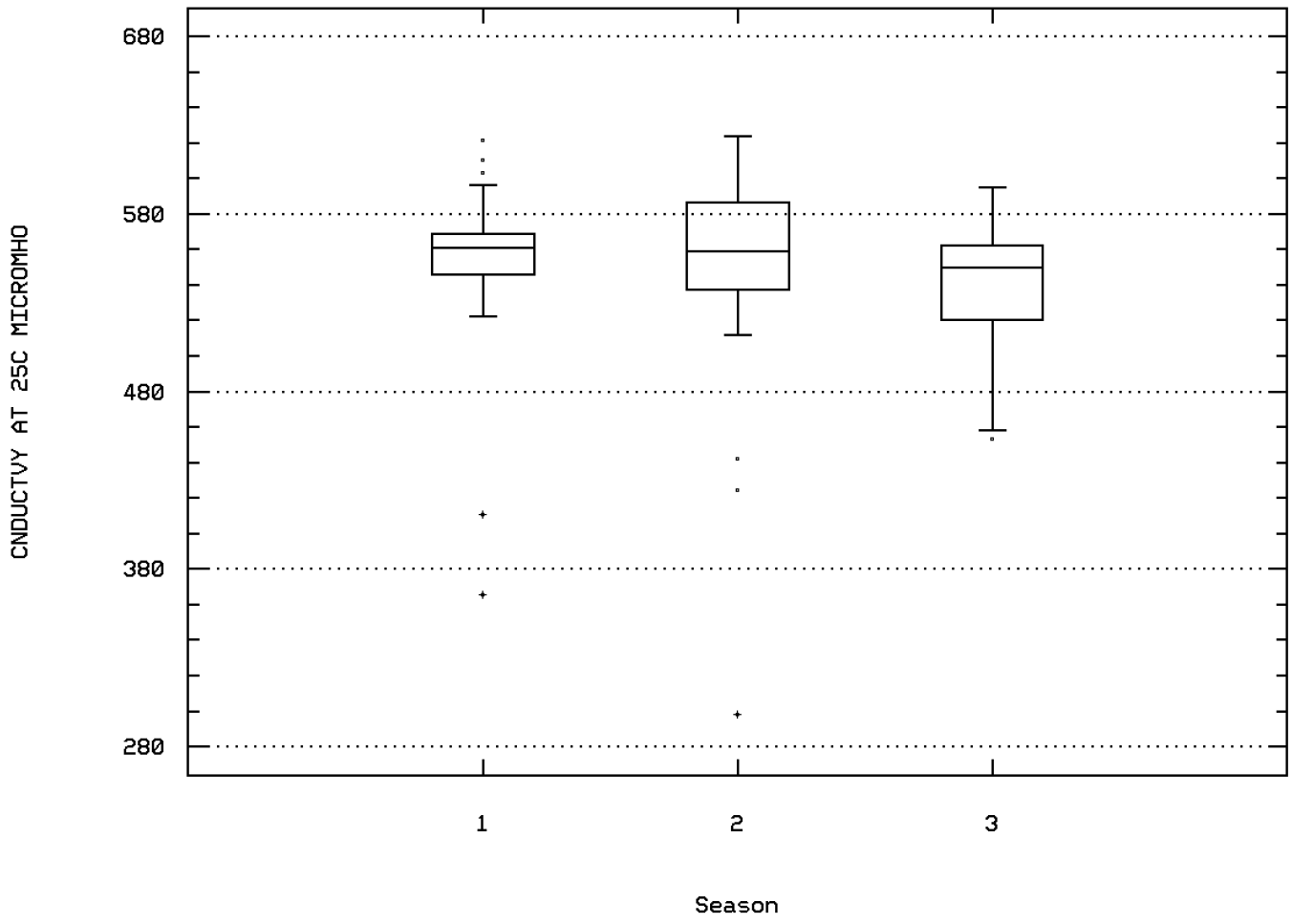
Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0017

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	21	23.4	22.971	27.1	20.6	2.705	1.645	21.	21.6	24.1	25.04
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	21	550.	534.524	595.	453.	1756.362	41.909	458.8	515.	563.5	587.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	20	7.55	7.17	8.9	4.1	1.47	1.212	5.12	6.575	8.075	8.3
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	21	7.9	7.99	8.9	7.1	0.225	0.474	7.14	7.8	8.35	8.68
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	21	7.9	7.742	8.9	7.1	0.29	0.538	7.14	7.8	8.35	8.68
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	21	0.013	0.018	0.079	0.001	0.001	0.023	0.002	0.004	0.016	0.074
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	285.	282.714	294.	250.	110.814	10.527	266.6	278.	290.	291.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	20	0.105	0.113	0.21	0.05	0.002	0.042	0.07	0.083	0.13	0.179
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	21	0.54	0.493	0.63	0.26	0.013	0.115	0.294	0.425	0.595	0.616
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	292.	292.905	326.	277.	102.19	10.109	281.4	288.	294.5	309.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	20	13.	13.25	15.	10.	1.566	1.251	12.	12.25	14.	15.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	269.	267.	326.	192.	794.4	28.185	232.4	255.5	283.5	307.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	24.	25.905	97.	0.	608.39	24.666	0.	0.	35.	62.8
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	21	10.1	9.076	21.6	3.4	23.794	4.878	3.66	4.1	11.15	15.12

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0017 Parameter Code: 00095

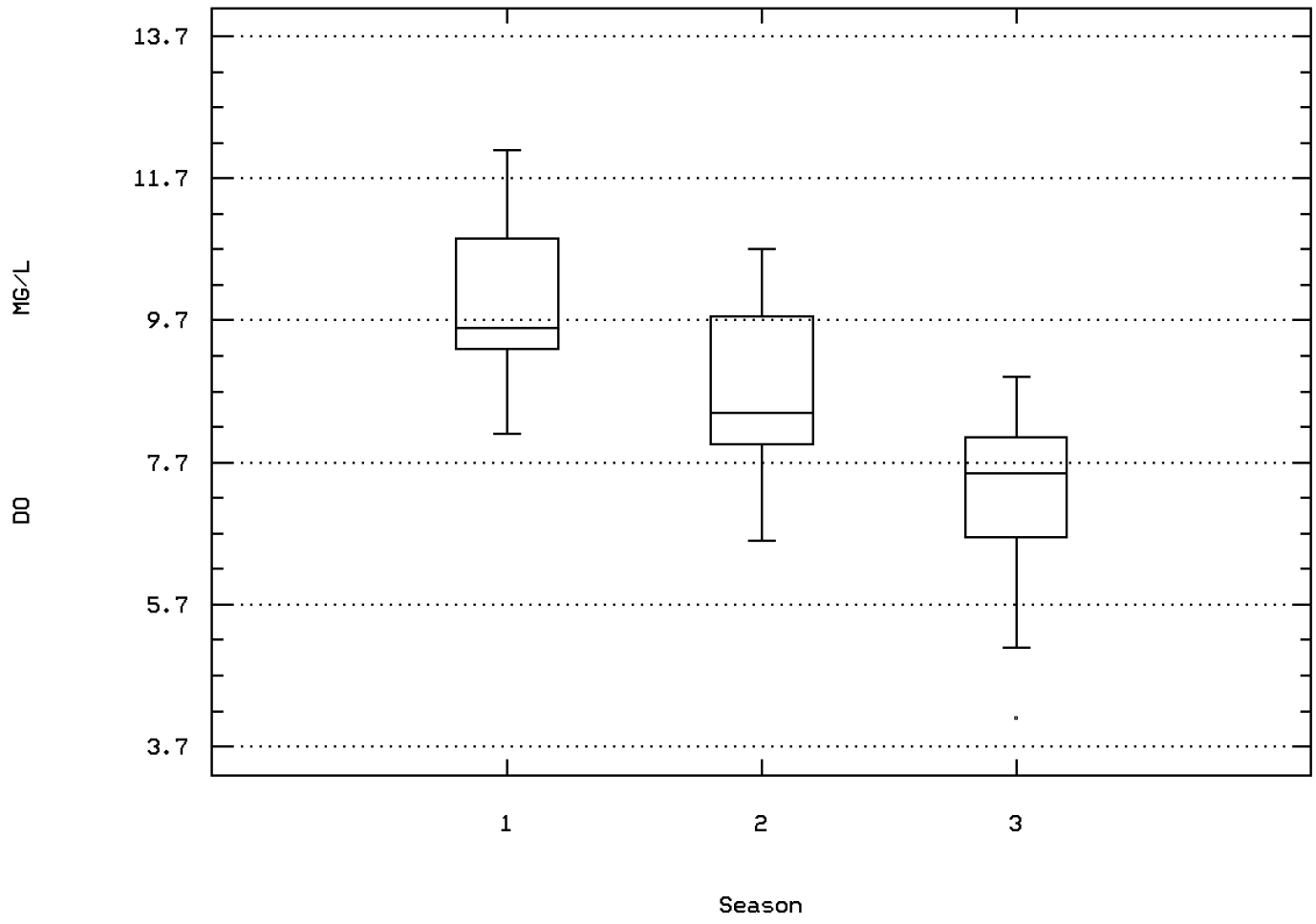
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00300

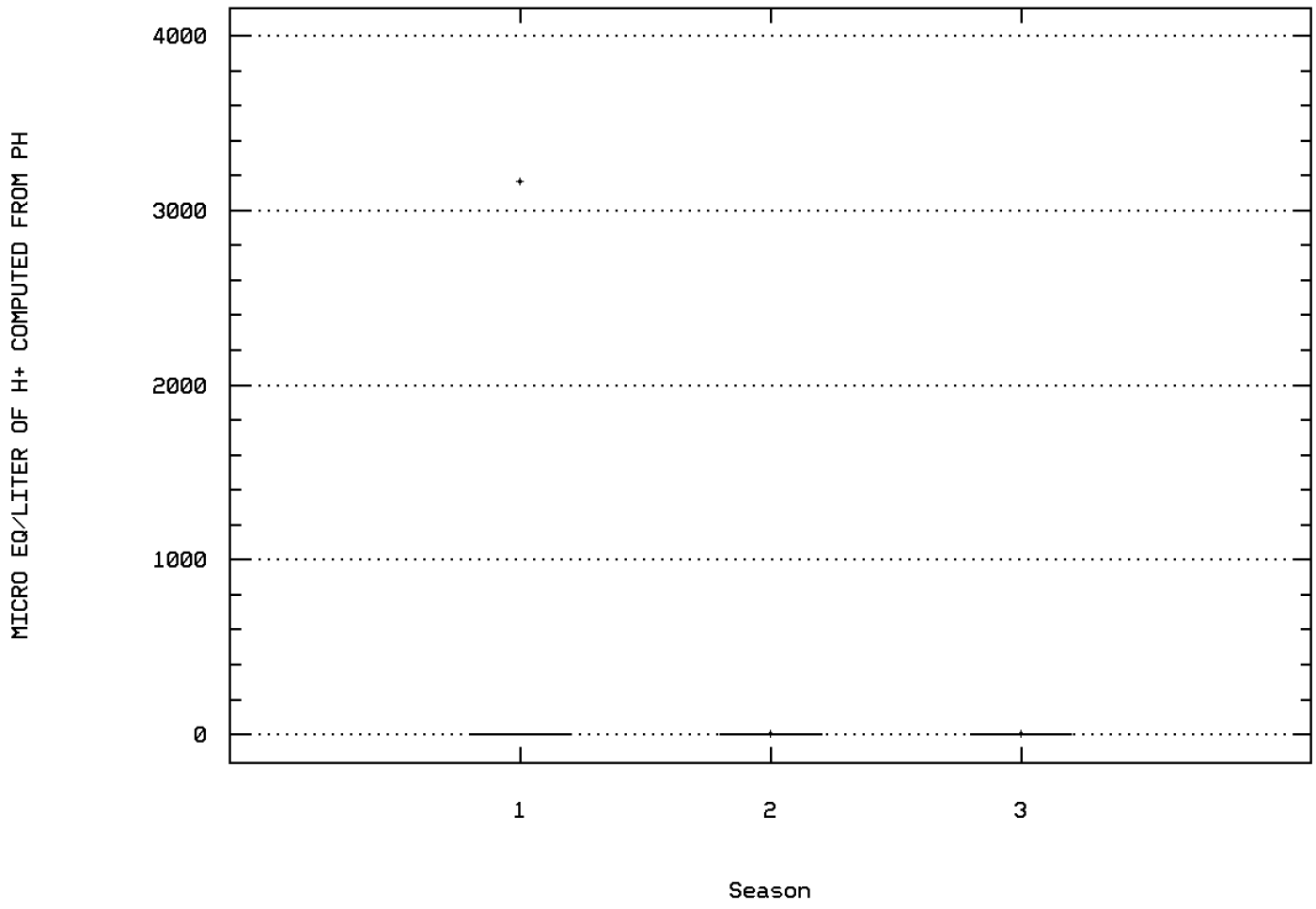
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00403

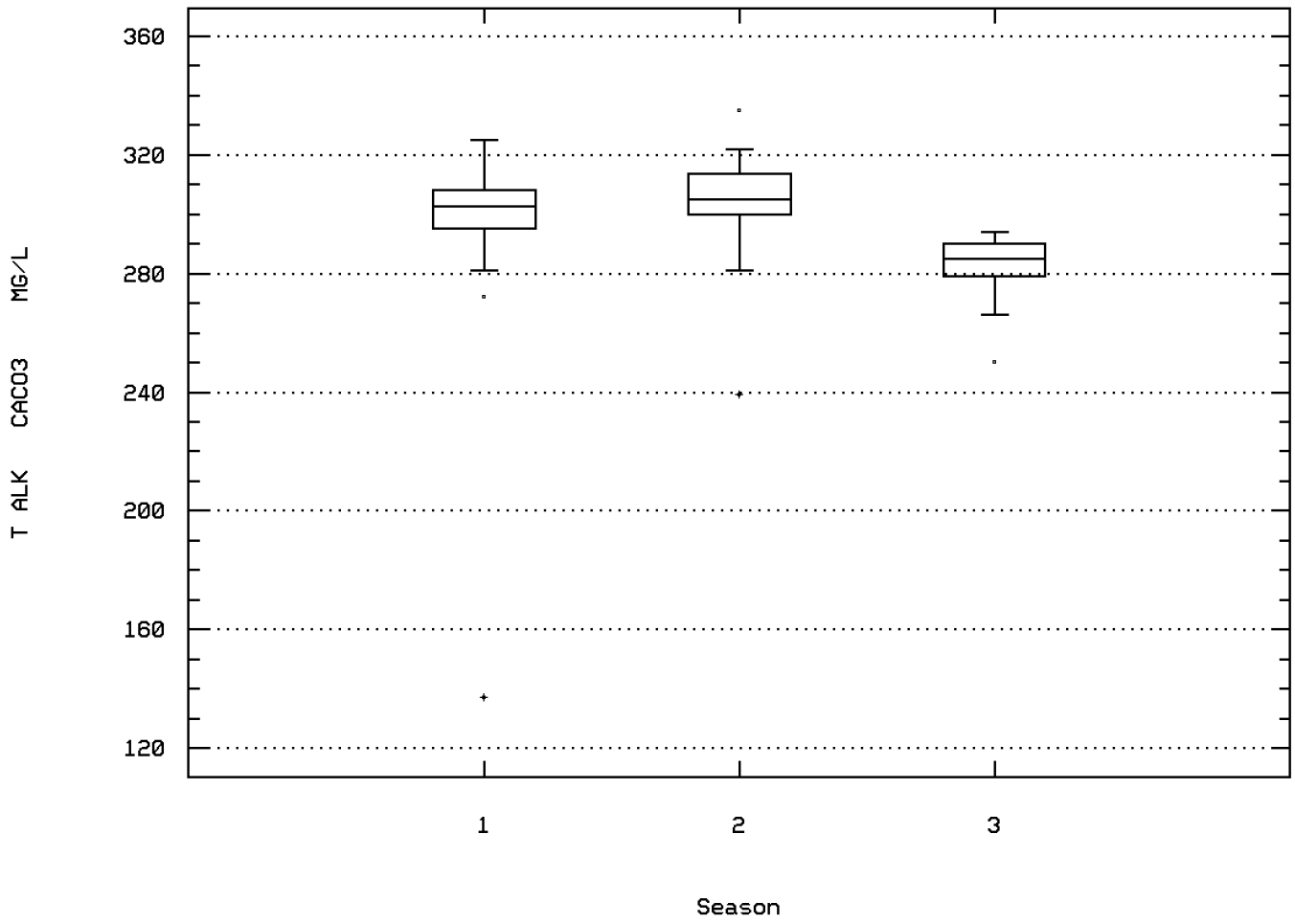
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00410

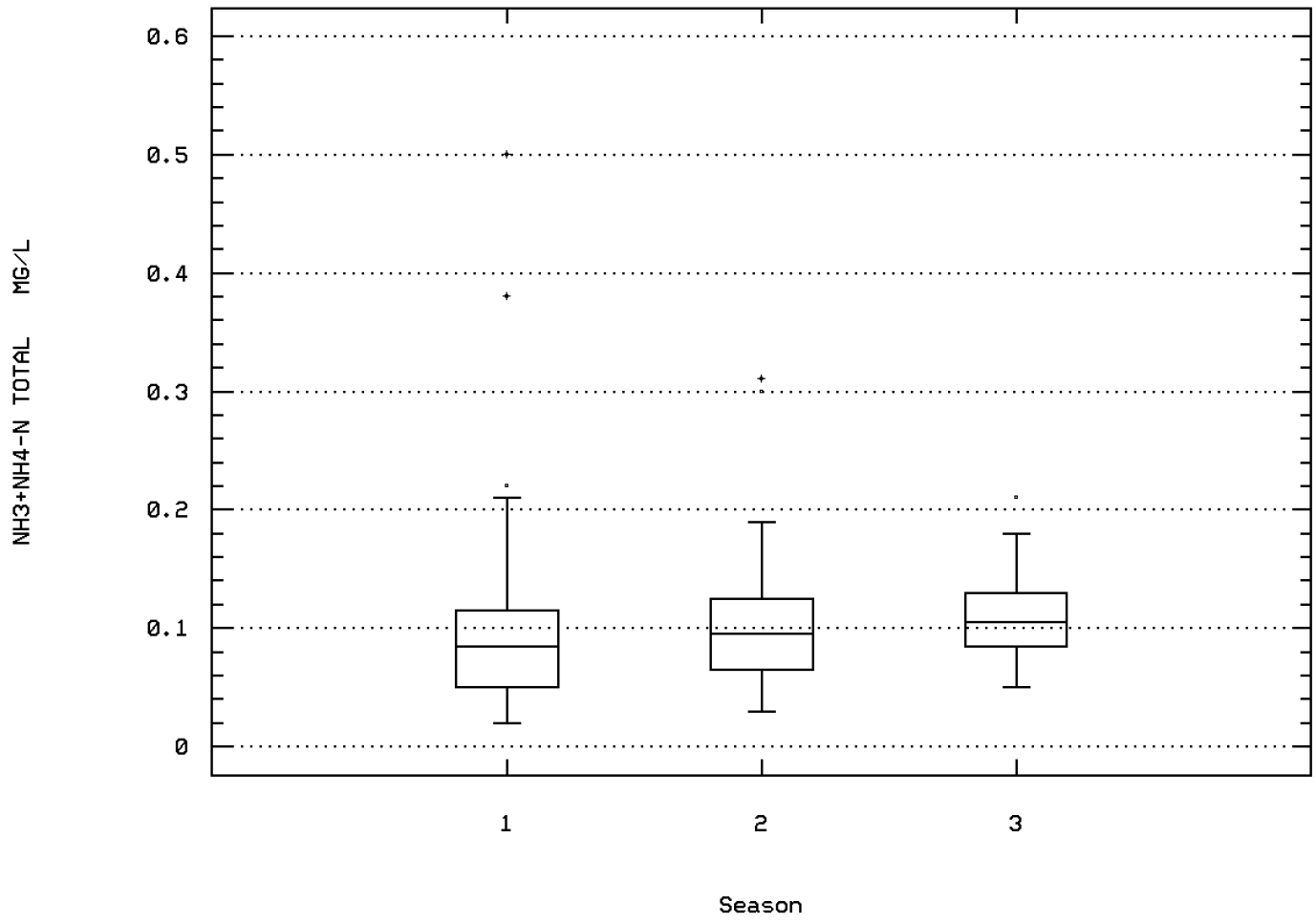
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00610

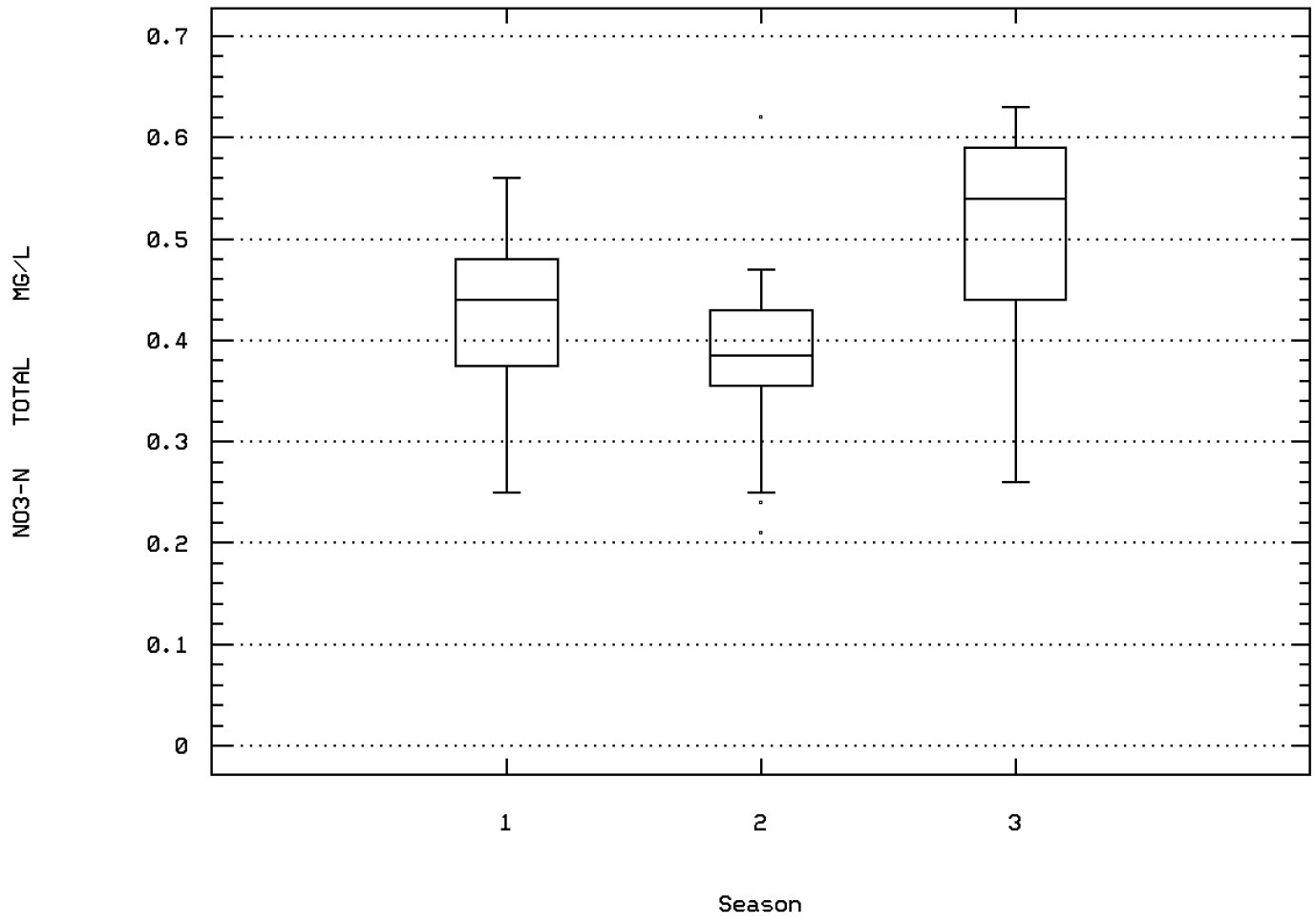
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00620

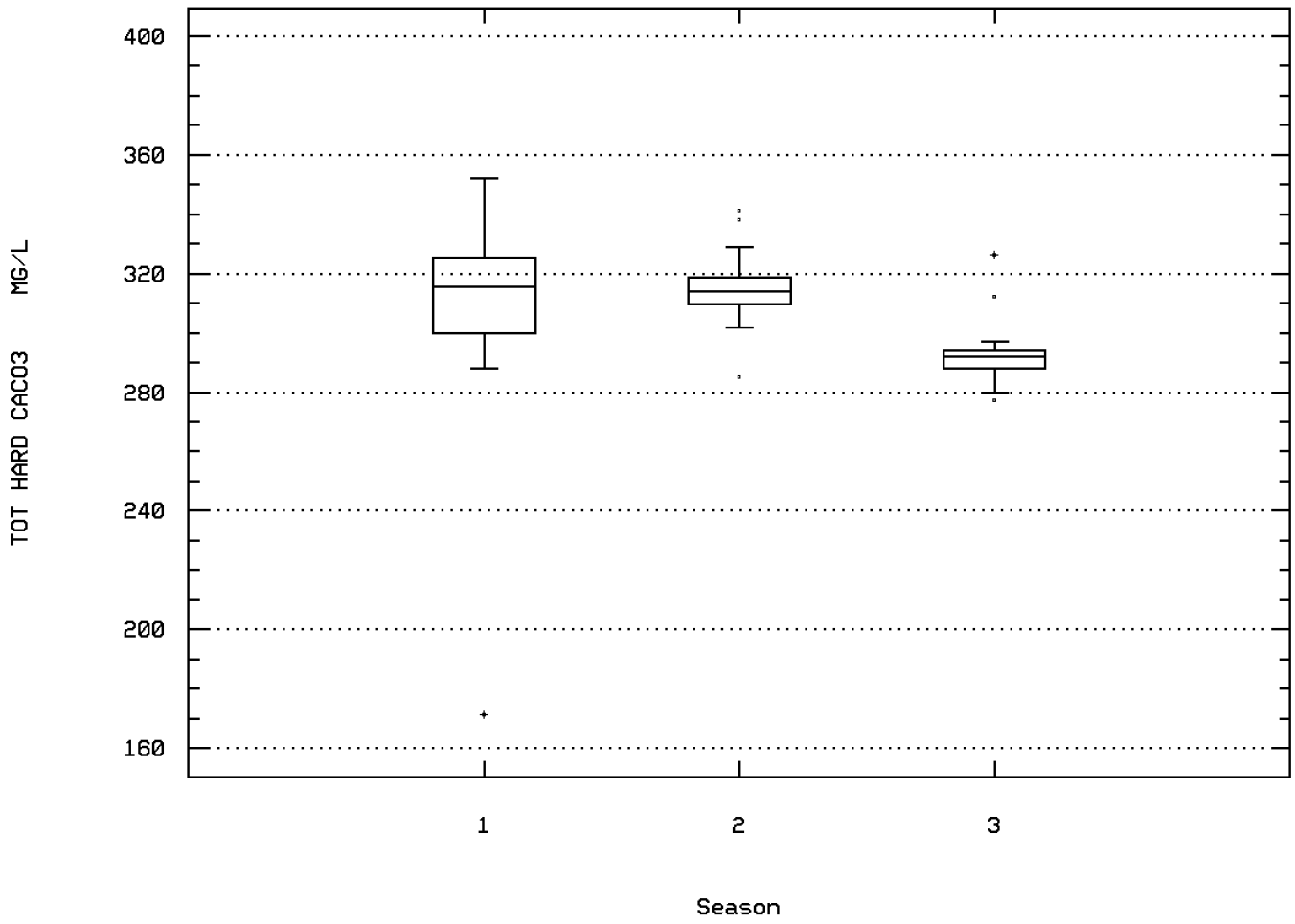
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00900

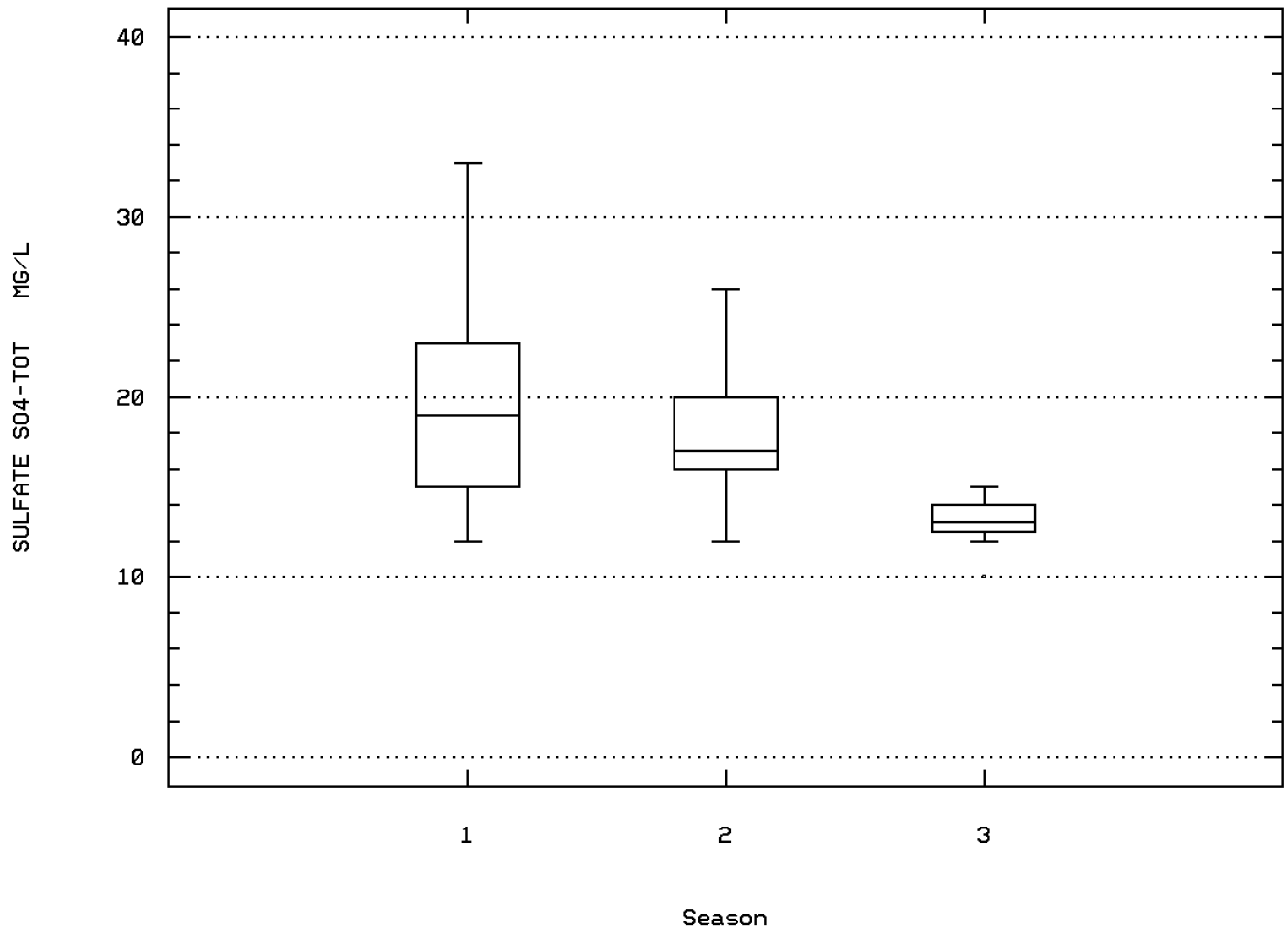
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 00945

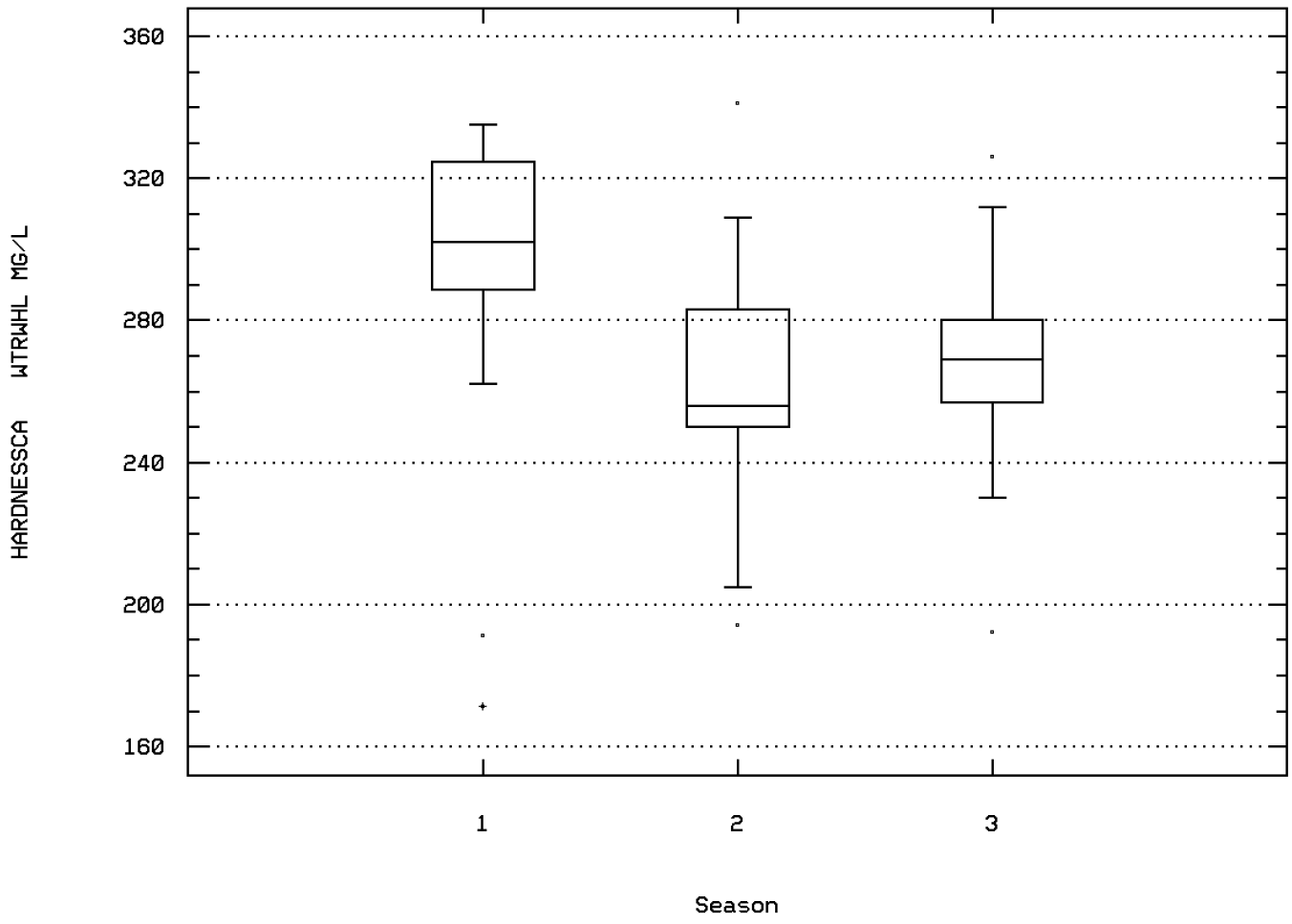
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45634

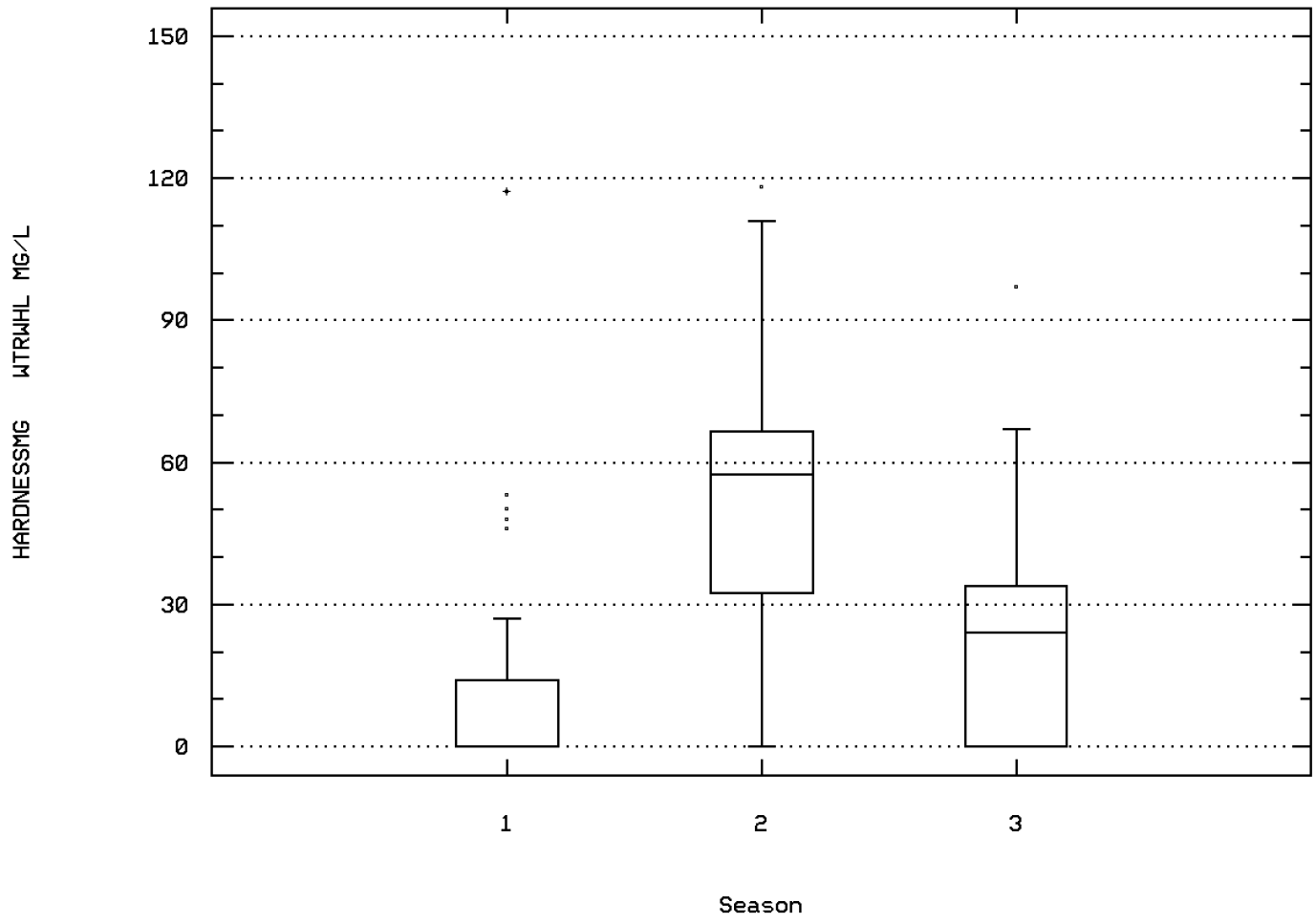
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 45635

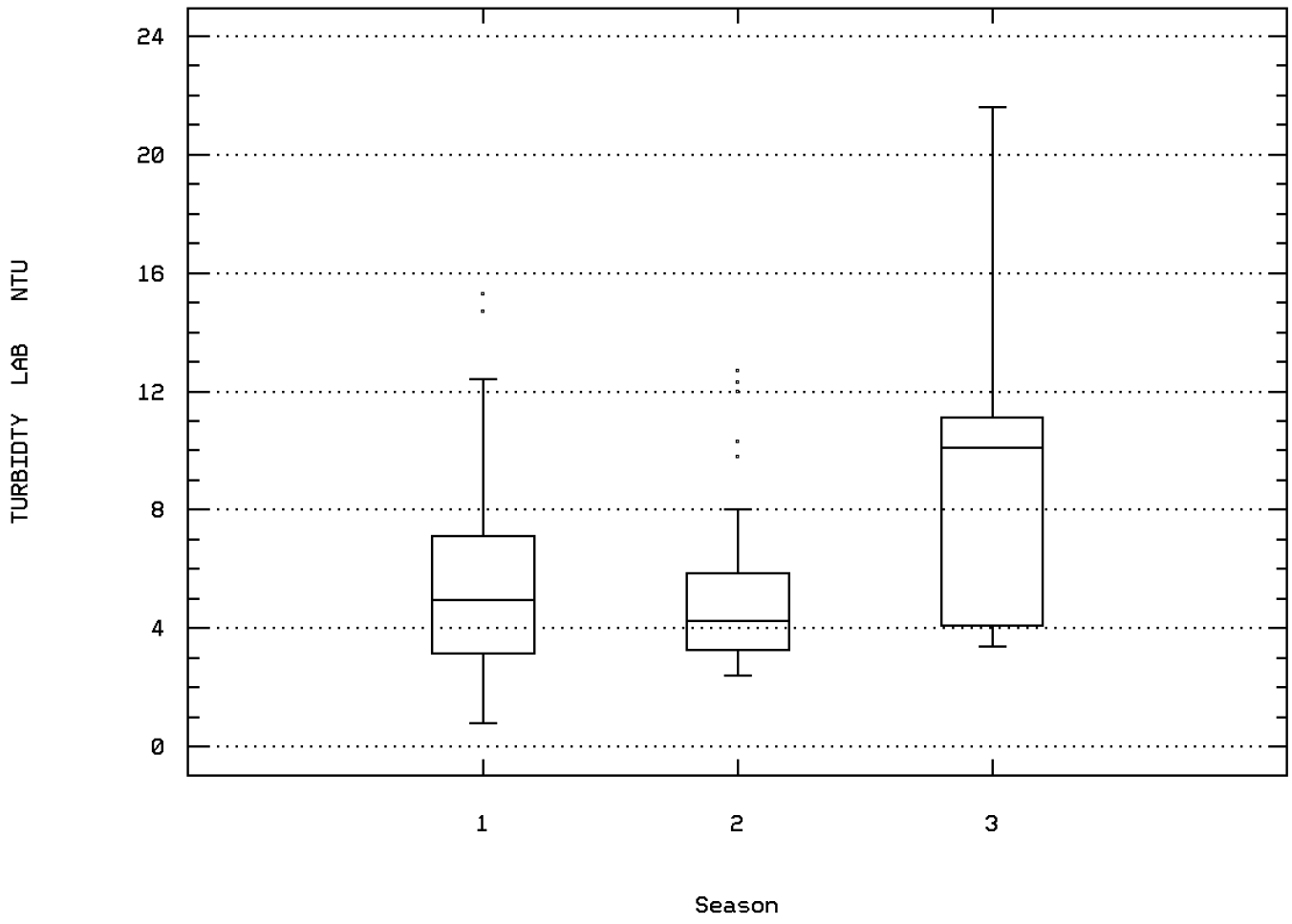
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Catfish Farm

Station: CHIC0017 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Catfish Farm

Station Inventory for Station: CHIC0018

NPS Station ID: CHIC0018
LAT/LON: 34.426170/ -96.950531
Agency: 11NPSWRD
Date Created: 09/20/97
Location: BUCKHORN CREEK AT HIGHWAY 177
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_22
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON BUCKHORN CREEK AT HIGHWAY 177 APPROXIMATELY 1 1/2 MILES EAST OF ARBUCKLE RESERVOIR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE. THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0018

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/12/77-06/13/77	7	15.	16.	27.	8.	44.583	6.677	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	02/12/77-06/13/77	7	10.	10.514	13.2	9.2	2.238	1.496	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-07/01/77	8	0.7	1.038	2.9	0.4	0.703	0.838	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	02/12/77-07/01/77	8	14.5	13.625	31.	3.	89.125	9.441	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	02/12/77-07/01/77	6	8.25	8.35	9.	8.1	0.115	0.339	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	02/12/77-07/01/77	6	8.247	8.27	9.	8.1	0.123	0.35	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/12/77-07/01/77	6	0.006	0.005	0.008	0.001	0.	0.003	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	04/01/77-04/01/77	1	15.	15.	15.	15.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-07/01/77	3	0.27	0.303	0.468	0.17	0.023	0.152	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-04/01/77	3	0.556	0.485	0.62	0.28	0.033	0.181	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-07/01/77	3	0.79	0.773	1.429	0.1	0.442	0.665	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/09/77-07/01/77	2	0.04	0.04	0.045	0.035	0.	0.007	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	02/12/77-03/09/77	2	15.5	15.5	16.	15.	0.5	0.707	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	7.	7.	7.	7.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	8.	8.	8.	8.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	6	540.	620.	1300.	360.	120800.	347.563	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	6	2.731	2.748	3.114	2.556	0.041	0.201	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			560.312								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	6	455.	560.	1000.	250.	83160.	288.375	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0018

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	6	2.656	2.701	3.	2.398	0.05	0.223	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			501.821								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-06/13/77	7	520.	489.286	550.	350.	5236.905	72.366	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	03/09/77-07/01/77	2 ##	0.003	0.003	0.005	0.	0.	0.004	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0018

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	7	0	0.00	2	0	0.00	5	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	6	1	0.17	2	0	0.00	3	1	0.33	1	0	0.00			
		Other-Lo Lim.	6.5	6	0	0.00	2	0	0.00	3	0	0.00	1	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	3	0	0.00	1	0	0.00	2	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00	1	0	0.00	1	0	0.00						
		Drinking Water	250.	2	0	0.00	1	0	0.00	1	0	0.00						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	6	6	1.00	1	1	1.00	5	5	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0019

NPS Station ID: CHIC0019
Location: BUCKHORNE CREEK
Station Type: /TYPA/AMBNT/STREAM
RMI-Indexes:
RMI-Miles:
HUC: 11130303
Major Basin: T/ARBUCKLE RESERVOIR
Minor Basin: OK HWY 18 BRDG 6 MI S OF SULPHUR
RF1 Index: 11130303
RF3 Index: 11130303084000.00
Description:
OK HWY 18 BRDG 6 MI S OF SULPHUR FROM CONFLUENCE WITH N FORK RED RIVER L U

LAT/LON: 34.426392/ -96.950838
Depth of Water: 0
Elevation: 0
RF1 Mile Point: 0.000
RF3 Mile Point: 2.94

Agency: 11EPALES
FIPS State/County: 40000 OKLAHOMA/
STORET Station ID(s): 4002C1
Within Park Boundary: No
Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 0.00
Distance from RF3: 0.17

Date Created: / /
On/Off RF1:
On/Off RF3:

Parameter Inventory for Station: CHIC0019

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	12	0.025	0.029	0.08	0.004	0.	0.02	0.006	0.016	0.038	0.07
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	12	0.963	1.015	2.4	0.15	0.294	0.542	0.255	0.8	1.163	2.1
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	12	0.375	0.389	0.53	0.19	0.009	0.094	0.229	0.34	0.45	0.527
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	11	0.023	0.088	0.48	0.005	0.021	0.143	0.005	0.02	0.1	0.426
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	12	0.01	0.015	0.045	0.003	0.	0.014	0.003	0.003	0.025	0.041

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0019

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00630 NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	12	0	0.00	5	0	0.00	5	0	0.00	2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0020

NPS Station ID: CHIC0020 LAT/LON: 34.428059/ -97.005838 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 11M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE11
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 11 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0020

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	18.7	18.42	25.2	6.4	54.912	7.41	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	3.1	4.66	12.3	0.1	21.968	4.687	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.2	7.26	7.7	7.	0.088	0.297	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.2	7.19	7.7	7.	0.094	0.307	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.063	0.065	0.1	0.02	0.001	0.036	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0020

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	3	0.60	1	0	0.00	3	2	0.67	1	1	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0021

NPS Station ID: CHIC0021 LAT/LON: 34.428615/ -97.036670 Agency: 11EPALES Date Created: / /
Location: ROCK CREEK FIPS State/County: 40000 OKLAHOMA/
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): 4002A1
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: O/ARBUCKLE RESERVOIR Elevation: 0 Water Body Id:
Minor Basin: 2NDRY RD BRDG 0.5 MI SW OF ARBUCKLE DAM ECO Region:
RF1 Index: 11130303003 RF1 Mile Point: 3.430 Distance from RF1: 0.00 On/Off RF1: ON
RF3 Index: RF3 Mile Point: 0.00 Distance from RF3: 0.00 On/Off RF3:
Description:
SECONDARY RD BRDG 0.5 MI SW OF ARBUCKLE DAM SEC 31 T1S R3E U S G S GAGE 07303000 IS LOCATED 2,000 FT UPSTREAM

Parameter Inventory for Station: CHIC0021

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	13	0.02	0.031	0.095	0.003	0.001	0.029	0.004	0.01	0.042	0.091
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/25/74-11/25/74	1	0.04	0.04	0.04	0.04	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	13	0.8	0.9	1.9	0.05	0.204	0.452	0.25	0.625	1.05	1.74
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	13	0.06	0.069	0.21	0.005	0.003	0.058	0.005	0.025	0.09	0.186
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	11	0.03	0.032	0.06	0.01	0.	0.015	0.012	0.02	0.04	0.058
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	13	0.006	0.008	0.02	0.003	0.	0.005	0.003	0.005	0.011	0.018

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0021

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	13	0	0.00	5	0	0.00	5	0	0.00	3	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0022

NPS Station ID: CHIC0022 LAT/LON: 34.429421/ -97.009892 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 15M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE15
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPO.) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 15 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0022

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	16.6	17.44	25.1	6.	55.513	7.451	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	4.4	4.6	12.3	0.1	23.44	4.841	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.	7.04	7.3	6.7	0.053	0.23	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.	6.989	7.3	6.7	0.056	0.237	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.1	0.103	0.2	0.05	0.003	0.059	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0022

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	5	2	0.40	1	0	0.00	3	1	0.33	1	1	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0023

NPS Station ID: CHIC0023 LAT/LON: 34.430670/ -97.013642 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 19M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE19
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPO.) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 19 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0023

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	16.2	16.18	23.6	6.3	43.717	6.612	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	3.5	3.79	11.7	0.05	22.573	4.751	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.	7.	7.2	6.8	0.025	0.158	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	7.	6.977	7.2	6.8	0.026	0.16	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.1	0.105	0.158	0.063	0.001	0.038	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0023

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	4 &	3	0.75	1	0	0.00	3	3	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0024

NPS Station ID: CHIC0024 | LAT/LON: 34.431115/ -97.026115 | Agency: 11EPALES | Date Created: / /
Location: ARBUCKLE LAKE | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/LAKE | STORET Station ID(s): 400201
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 88 | Aquifer:
Major Basin: | Elevation: 0 | Water Body Id:
Minor Basin: | ECO Region:
RF1 Index: 11130303006 | RF1 Mile Point: 11.130 | Distance from RF1: 2.40 | On/Off RF1: ON
RF3 Index: 11130303000700.00 | RF3 Mile Point: 0.51 | Distance from RF3: 0.04 | On/Off RF3:
Description:
DAM SITE; 100 YDS, 020 DEGREES SE CORNER OF DAM; IN OLD CHANNEL; 150 DEGREES FR INTAKE AT NW END OF DAM.
COMMENTS: 3-30 ULE 12, NO AQUATIC VEGE OR PHYTOPLANKTON; NO PERMANENT DEVELOPMENT, POPULAR RECREATION AREA; MIXED OAK AND EVERGREEN.
6-12 ULE 12, NO AQUATIC VEGE OR PHYTOPLANKTON; DEPTH 86 FT. 10-23 ULE 14, NO VISIBLE AQUATICS; FEW FISHERMEN; INTEG 15 FT; DEPTH 82 FT. MAP: DOUGHERTY QUAD

Parameter Inventory for Station: CHIC0024

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/74-10/23/74	17	19.	18.006	26.1	9.8	26.596	5.157	11.64	12.55	20.85	26.1
00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	3	1.	17.333	50.	1.	800.333	28.29	**	**	**	**
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/74-10/23/74	17	89.1	90.324	94.3	85.	7.227	2.688	87.4	88.7	93.1	94.3
00077	TRANSPARENCY, SECCHI DISC (INCHES)	03/30/74-10/23/74	3	76.	74.	84.	62.	124.	11.136	**	**	**	**
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	03/30/74-10/23/74	17	375.	372.353	422.	320.	1488.368	38.579	320.8	323.	415.	421.2
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/30/74-10/23/74	17	421.	427.059	476.	409.	352.684	18.78	409.	416.5	434.5	463.2
00300	OXYGEN, DISSOLVED MG/L	03/30/74-10/23/74	15	7.4	6.213	10.	0.4	10.9	3.301	0.64	1.8	8.	10.
00400	PH (STANDARD UNITS)	03/30/74-10/23/74	17	8.1	8.141	8.55	7.51	0.057	0.239	7.894	8.02	8.3	8.51
00400	CONVERTED PH (STANDARD UNITS)	03/30/74-10/23/74	17	8.1	8.071	8.55	7.51	0.062	0.25	7.894	8.02	8.3	8.51
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/30/74-10/23/74	17	0.008	0.008	0.031	0.003	0.	0.006	0.003	0.005	0.01	0.014
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	17	157.	161.118	186.	151.	106.86	10.337	151.8	153.5	169.5	178.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	17	0.04	0.106	0.88	0.02	0.044	0.209	0.028	0.03	0.06	0.4
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	17	0.5	0.547	1.3	0.3	0.091	0.302	0.3	0.4	0.55	1.3
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	17	0.04	0.056	0.21	0.01	0.003	0.053	0.018	0.03	0.06	0.178
00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	17	0.02	0.022	0.078	0.012	0.	0.015	0.013	0.014	0.024	0.039
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	17	0.008	0.01	0.022	0.004	0.	0.004	0.005	0.007	0.012	0.016
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/74-10/23/74	3	7.7	6.767	10.2	2.4	15.863	3.983	**	**	**	**
72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/74-10/23/74	3	86.	85.333	88.	82.	9.333	3.055	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0024

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300 OXYGEN, DISSOLVED	Other-Lo Lim.	4.	15	4	0.27	6	1	0.17	9	3	0.33						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0024

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	17	0	0.00	6	0	0.00	11	0	0.00						
		Other-Lo Lim.	6.5	17	0	0.00	6	0	0.00	11	0	0.00						
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	17	0	0.00	6	0	0.00	11	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0025

NPS Station ID: CHIC0025 LAT/LON: 34.432087/ -97.030920 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE DAM SPILLWAY FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /CANAL/TYPA/AMBNT STORET Station ID(s): CHIC_HARP_28
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 780 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS THE ARBUCKLE DAM SPILLWAY. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0025

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-02/12/77	1	1.3	1.3	1.3	1.3	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	02/12/77-02/12/77	1	13.	13.	13.	13.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	02/12/77-02/12/77	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	02/12/77-02/12/77	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/12/77-02/12/77	1	0.008	0.008	0.008	0.008	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	1	192.	192.	192.	192.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	1	63.	63.	63.	63.	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-02/12/77	1	0.18	0.18	0.18	0.18	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-02/12/77	2	31.	31.	37.	25.	72.	8.485	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-02/12/77	1	500.	500.	500.	500.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0025

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
		Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00	1	0	0.00	1	0	0.00						
		Drinking Water	250.	2	0	0.00	1	0	0.00	1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0026

NPS Station ID: CHIC0026 LAT/LON: 34.432170/ -97.017448 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR BUCKHORN CK. BRANCH 24M DEPTH FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_WILHM_AE24
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE BUCKHORN CREEK BRANCH OF ARBUCKLE RESERVOIR. THE STUDY SHOWED STATION AE AS A TRANSECT IN THE BUCKHORN CREEK BRANCH WITH SAMPLES TAKEN AT 8 DIFFERENT DEPTHS ALONG THE TRANSECT. THIS TRANSECT WAS DIVIDED INTO 8 DIFFERENT STATIONS BY DRAWING A LINE ALONG THE BUCKHORN CREEK BRANCH AND ESTIMATING WHERE EACH STATION WOULD BE. THIS STATION IS AT A DEPTH OF 24 METERS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE U.S. DEPARTMENT OF THE INTERIOR. THE RESULTS ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0026

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/25/75-08/08/75	5	13.	14.68	23.	6.5	40.987	6.402	**	**	**	**
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	01/25/75-08/08/75	5	1.5	2.85	10.7	0.05	19.938	4.465	**	**	**	**
70310	PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	6.8	6.76	7.2	6.2	0.133	0.365	**	**	**	**
70310	CONVERTED PH, STANDARD UNITS, BOTTOM MUDS	01/25/75-08/08/75	5	6.8	6.628	7.2	6.2	0.155	0.393	**	**	**	**
70310	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/25/75-08/08/75	5	0.158	0.236	0.631	0.063	0.051	0.227	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0026

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	4 &	3	0.75	1	0	0.00	3	3	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0027

NPS Station ID: CHIC0027
LAT/LON: 34.432476/ -97.023531
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR IN CENTRAL POOL
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT
STORET Station ID(s): CHIC_GARTON_1
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 872
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ARBUCKLE RESERVOIR IN THE CENTRAL POOL NEAR THE DAM. SAMPLES FOR THIS SITE WERE TAKEN FROM A DEPTH OF 24 FEET AND WERE ANALYZED FOR SEVERAL CONSTITUENTS. ONLY METALS DATA WERE UPLOADED FOR THIS STUDY BECAUSE ALL OTHER PARAMETERS WERE AVERAGES OF SAMPLES TAKEN FROM SEVERAL DIFFERENT STATIONS. THE STUDY WAS CONDUCTED BY THE U.S. DEPARTMENT OF INTERIOR- OFFICE OF WATER RESEARCH AND TECHNOLOGY. THE RESULTS ARE IN A 1979 REPORT "LOW ENERGY MECHANICAL DESTRATIFICATION AND REAERATION OF RESERVOIRS" BY JAMES E. GARTON; JERRY WILHM; AND DEBORAH BARKER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0027

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01045	IRON, TOTAL (UG/L AS FE)	03/15/78-11/24/78	8	315.	326.25	560.	200.	10969.643	104.736	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	03/15/78-10/22/78	7	60.	58.571	130.	20.	1447.619	38.048	**	**	**	**
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	03/15/78-11/24/78	8	377.	372.125	420.	315.	1167.554	34.169	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	03/15/78-11/24/78	8	280.	812.5	2360.	20.	880078.571	938.125	**	**	**	**
01056	MANGANESE, DISSOLVED (UG/L AS MN)	03/15/78-11/24/78	8	220.	680.	1750.	20.	633600.	795.99	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	8	13.5	14.	26.	3.	66.857	8.177	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	8	15.5	14.625	29.	1.	92.268	9.606	**	**	**	**
01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	8	0.955	1.08	1.94	0.5	0.238	0.488	**	**	**	**
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	03/15/78-11/24/78	8	1.3	3.309	17.89	0.48	35.003	5.916	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0027

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
01090	ZINC, DISSOLVED	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
01092	ZINC, TOTAL	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0028

NPS Station ID: CHIC0028 LAT/LON: 34.432587/ -97.026588 Agency: 11NPSWRD Date Created: 09/20/97
Location: CENTRAL POOL NEAR DAM ON ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_EPA_7
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ARBUCKLE RESERVOIR IN THE CENTRAL POOL NEAR ARBUCKLE DAM. THIS SITE IS RELATIVELY FREE OF INFLUENT EFFECTS. WATER QUALITY WAS MONITORED AT 1; 15; 30; 45; 60; AND 75-FOOT DEPTHS. DATA FOR THIS SITE WERE COLLECTED BI-WEEKLY FROM DECEMBER 1965 THROUGH DECEMBER 1967 AND AT FOUR-WEEK INTERVALS FROM JANUARY 1968 THROUGH APRIL 1970. THE SAMPLING WAS DONE BY THE U.S. ENVIRONMENTAL PROTECTION AGENCY (EPA) TO ASSESS CHANGES IN WATER QUALITY RESULTING FROM THE CONSTRUCTION OF ARBUCKLE DAM. THE RESULTS WERE PUBLISHED IN THE 1971 REPORT "CHANGES IN WATER QUALITY RESULTING FROM IMPOUNDMENT" BY WILLIAM R. DUFFER AND CURTIS C. HARLIN. FOR INFORMATION ON THE ARBUCKLE AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0028

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	54	2.	1.926	3.	1.	0.598	0.773	1.	1.	3.	3.
00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	51	16.	17.725	46.	0.	71.683	8.467	7.	13.	22.	26.
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	150 ##	0.	1.867	32.	0.	37.083	6.09	0.	0.	0.	8.
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	150 ##	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	78	0.	0.333	5.	0.	0.848	0.921	0.	0.	0.	1.
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	69	220.	485.	2000.	4.	329620.853	574.126	11.	60.	682.5	1400.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	04/02/68-04/01/70	69	2.342	2.252	3.301	0.602	0.553	0.744	1.041	1.778	2.834	3.146
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			178.828								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	69	1.	9.949	149.	0.5	589.891	24.288	0.5	0.5	9.	22.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	69	0.	0.381	2.173	-0.301	0.474	0.689	-0.301	-0.301	0.952	1.342
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			2.406								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	69	2.	11.13	232.	0.5	961.674	31.011	0.5	1.	8.5	23.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	69	0.301	0.422	2.365	-0.301	0.447	0.668	-0.301	0.	0.929	1.362
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			2.642								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	69	410.	652.971	7200.	51.	1078268.234	1038.397	99.	160.	780.	1170.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	69	2.613	2.562	3.857	1.708	0.199	0.446	1.996	2.204	2.892	3.068
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			364.681								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	69	160.	213.551	1800.	9.	61437.986	247.867	34.	78.5	265.	370.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	69	2.204	2.142	3.255	0.954	0.176	0.42	1.531	1.895	2.423	2.568

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0028

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			138.573								
74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	78	0.	0.128	3.	0.	0.191	0.437	0.	0.	0.	1.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0028

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	150	0	0.00	67	0	0.00	59	0	0.00	24	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	69	14	0.20	31	7	0.23	29	5	0.17	9	2	0.22			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	69	0	0.00	31	0	0.00	29	0	0.00	9	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0029

NPS Station ID: CHIC0029 LAT/LON: 34.433503/ -97.026865 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR NEXT TO ARBUCKLE DAM FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_HARP_27
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ARBUCKLE RESERVOIR NEXT TO THE DAM. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0029

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	03/09/77-07/04/77	4	1.25	1.575	3.1	0.7	1.103	1.05	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	03/09/77-07/04/77	4	17.	16.5	21.	11.	19.667	4.435	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	03/09/77-07/04/77	4	8.2	8.2	8.5	7.9	0.06	0.245	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	03/09/77-07/04/77	4	8.2	8.149	8.5	7.9	0.063	0.252	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/09/77-07/04/77	4	0.006	0.007	0.013	0.003	0.	0.004	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	4	202.	201.	228.	172.	876.667	29.609	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	4	30.	30.5	57.	5.	451.667	21.252	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-03/09/77	2	0.49	0.49	0.86	0.12	0.274	0.523	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/09/77-03/09/77	2	0.245	0.245	0.33	0.16	0.014	0.12	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-03/09/77	2	0.275	0.275	0.52	0.03	0.12	0.346	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-03/09/77	4	0.025	0.029	0.05	0.015	0.	0.015	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-03/09/77	5	41.	42.2	53.	38.	38.7	6.221	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	03/09/77-07/04/77	4	462.5	450.	485.	390.	2050.	45.277	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0029

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	4	0	0.00				2	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	4	0	0.00				2	0	0.00	2	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00				2	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	5	0	0.00				5	0	0.00						
		Drinking Water	250.	5	0	0.00				5	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0030

NPS Station ID: CHIC0030
LAT/LON: 34.433838/ -96.943892
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Buckhorn Creek Just Below Catfish Farm
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_BUCK3
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 965
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/25. Station is known as Buckhorn Creek Site 3 and is located on Buckhorn Creek just below the catfish farm on the left bank - just upstream of the bridge. This station was established to monitor water quality impacts from the catfish farm after pollution problems were identified in Buckhorn Creek in the fall of 1986. In fact; this issue (the catfish farm was exonerated) was the impetus for Chickasaw National Recreation Area to monitor water quality Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; NPS-WRD; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516).

Parameter Inventory for Station: CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	85	14.7	15.328	22.5	7.8	24.833	4.983	9.2	9.75	20.45	21.94
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	85	567.	554.682	639.	298.	3767.386	61.379	486.4	542.	589.5	607.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	84	8.8	8.632	10.4	4.4	1.213	1.101	7.3	7.925	9.5	9.9
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	85	8.3	8.207	8.8	7.1	0.087	0.296	7.7	8.2	8.4	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	85	8.3	8.069	8.8	7.1	0.107	0.327	7.7	8.2	8.4	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	85	0.005	0.009	0.079	0.002	0.	0.011	0.003	0.004	0.006	0.02
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	318.	313.365	364.	207.	309.187	17.584	299.6	304.	322.	327.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	84	0.1	0.112	0.5	0.03	0.005	0.071	0.045	0.063	0.13	0.185
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	63	0.002	0.003	0.021	0.	0.	0.003	0.001	0.002	0.003	0.004
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	85	0.5	0.511	0.68	0.22	0.01	0.101	0.386	0.455	0.59	0.64
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	63	0.12	0.159	0.72	0.	0.019	0.139	0.054	0.09	0.17	0.302
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	321.	319.565	353.	216.	237.939	15.425	306.	313.	329.5	334.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	83	14.	14.494	19.	9.	2.716	1.648	13.	14.	15.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	302.	295.141	335.	200.	1000.551	31.631	247.6	276.	321.	330.
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	20.	24.424	119.	0.	769.747	27.744	0.	0.	40.	59.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	63	0.12	0.156	0.63	0.	0.012	0.111	0.068	0.1	0.17	0.338
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	85	4.7	6.439	22.6	0.9	19.847	4.455	2.68	3.2	9.4	12.94

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

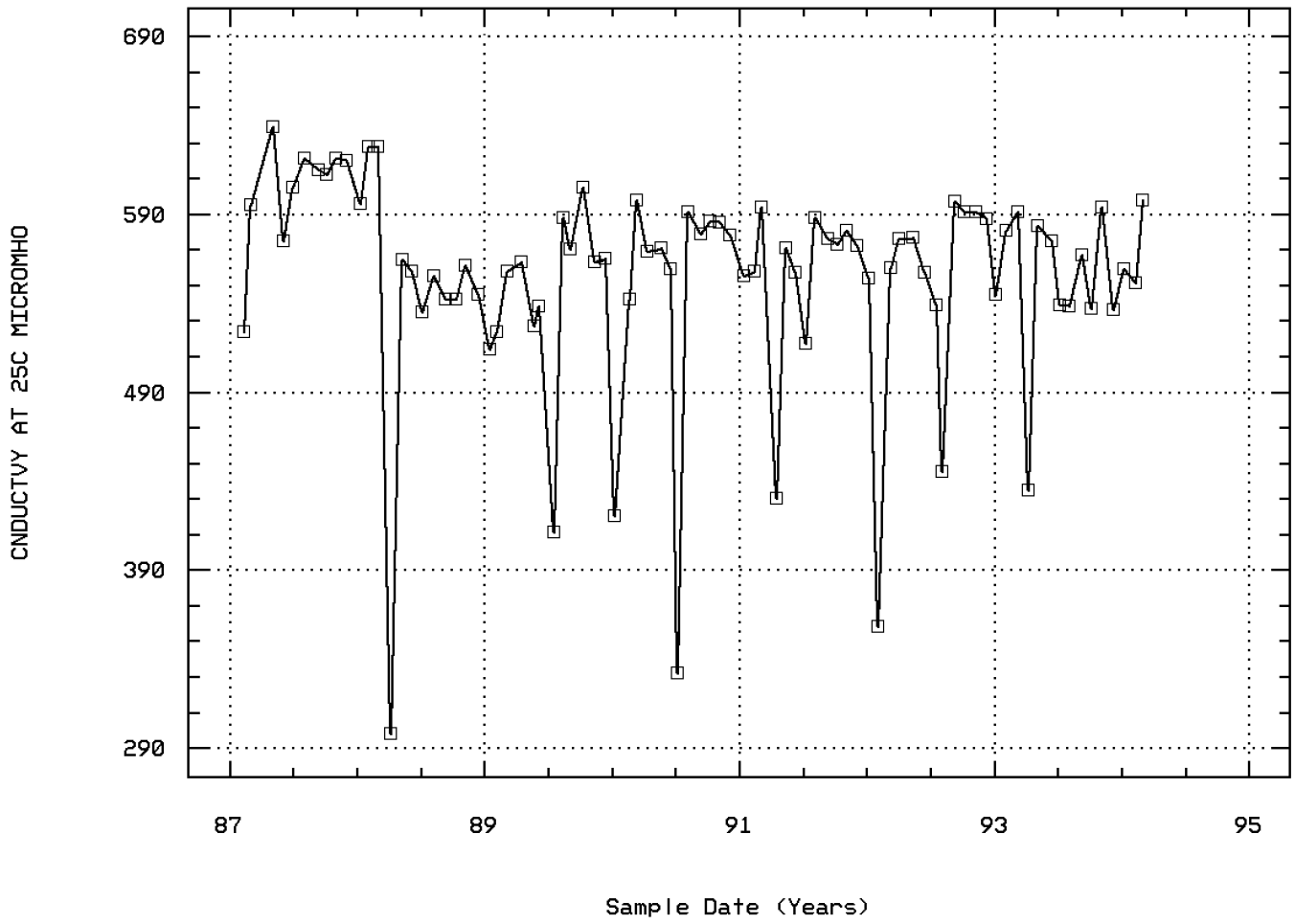
EPA Water Quality Criteria Analysis for Station: CHIC0030

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	84	0	0.00	36	0	0.00	28	0	0.00	20	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
		Other-Lo Lim.	6.5	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	63	0	0.00	26	0	0.00	22	0	0.00	15	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	83	0	0.00	36	0	0.00	27	0	0.00	20	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station: CHIC0030 Parameter Code: 00095

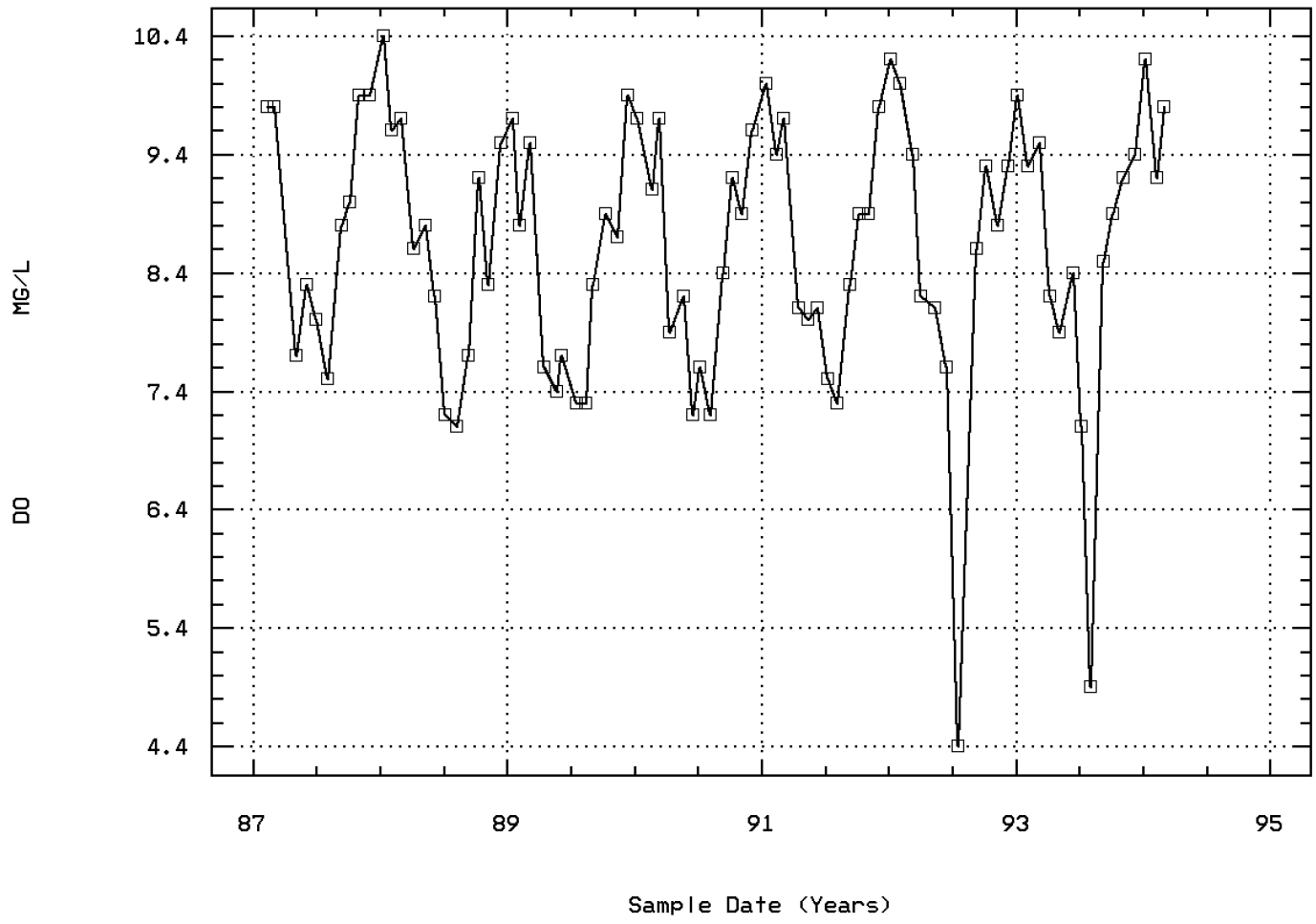
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00300

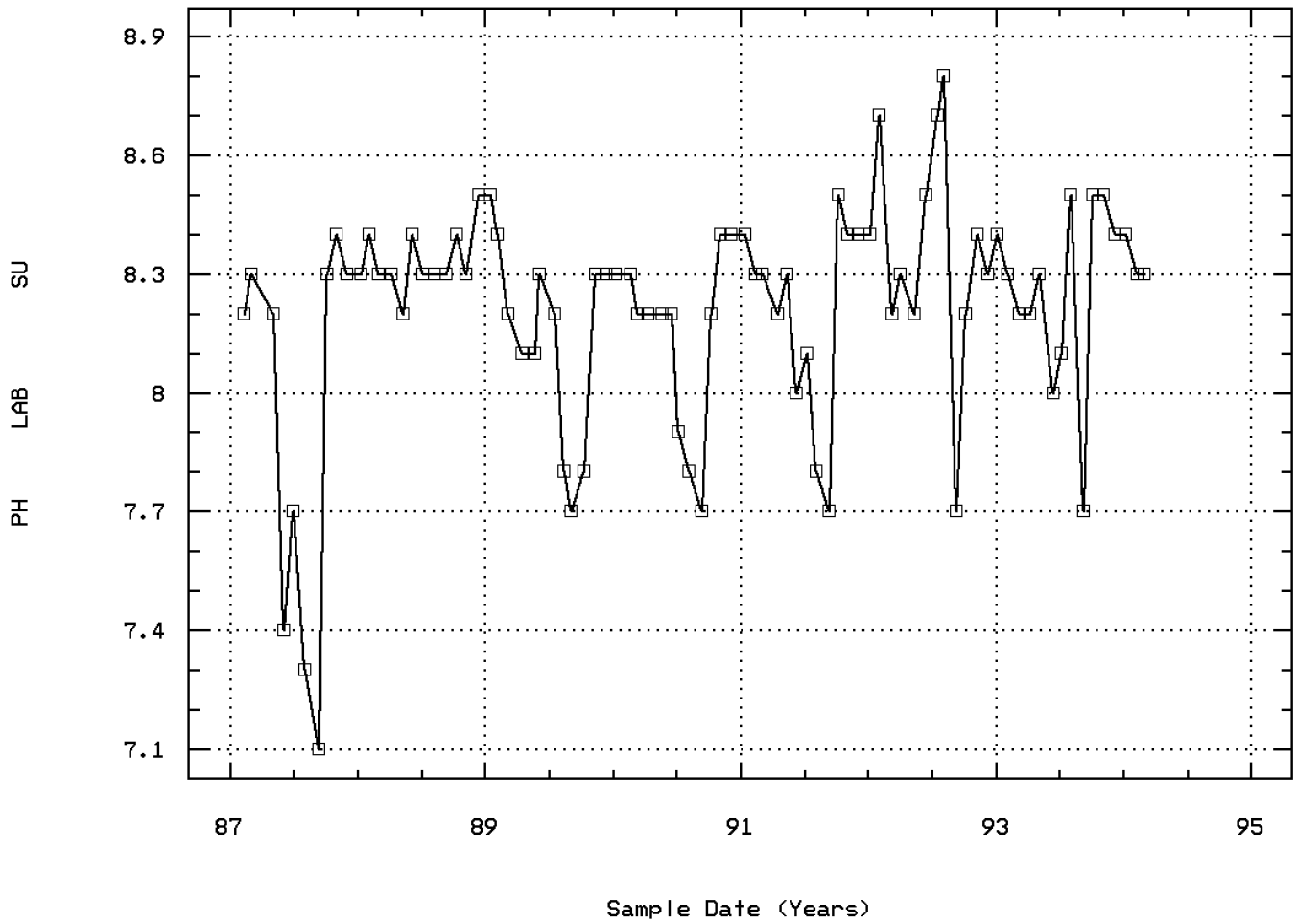
OXYGEN, DISSOLVED



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00403

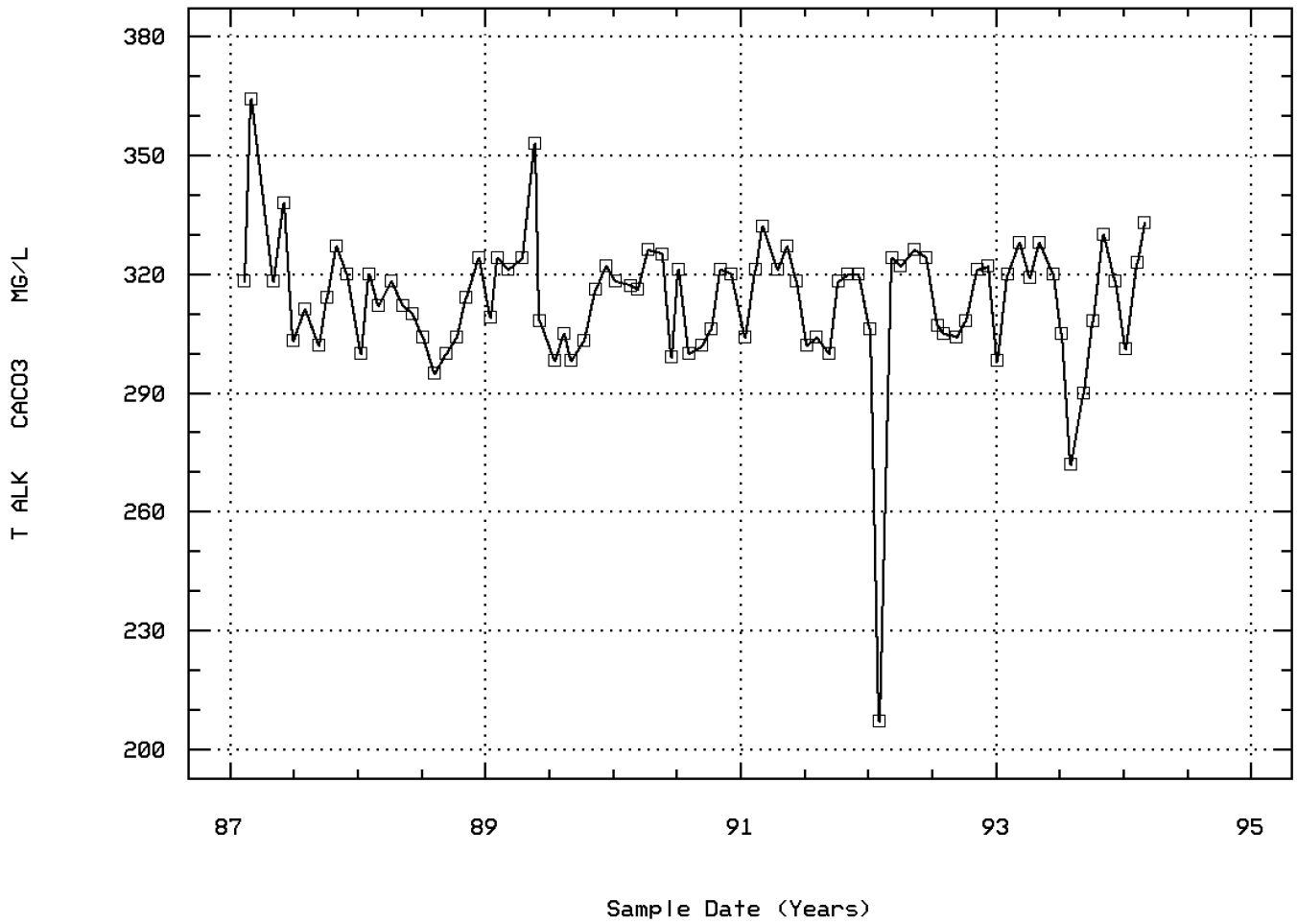
PH, LAB, STANDARD UNITS



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00410

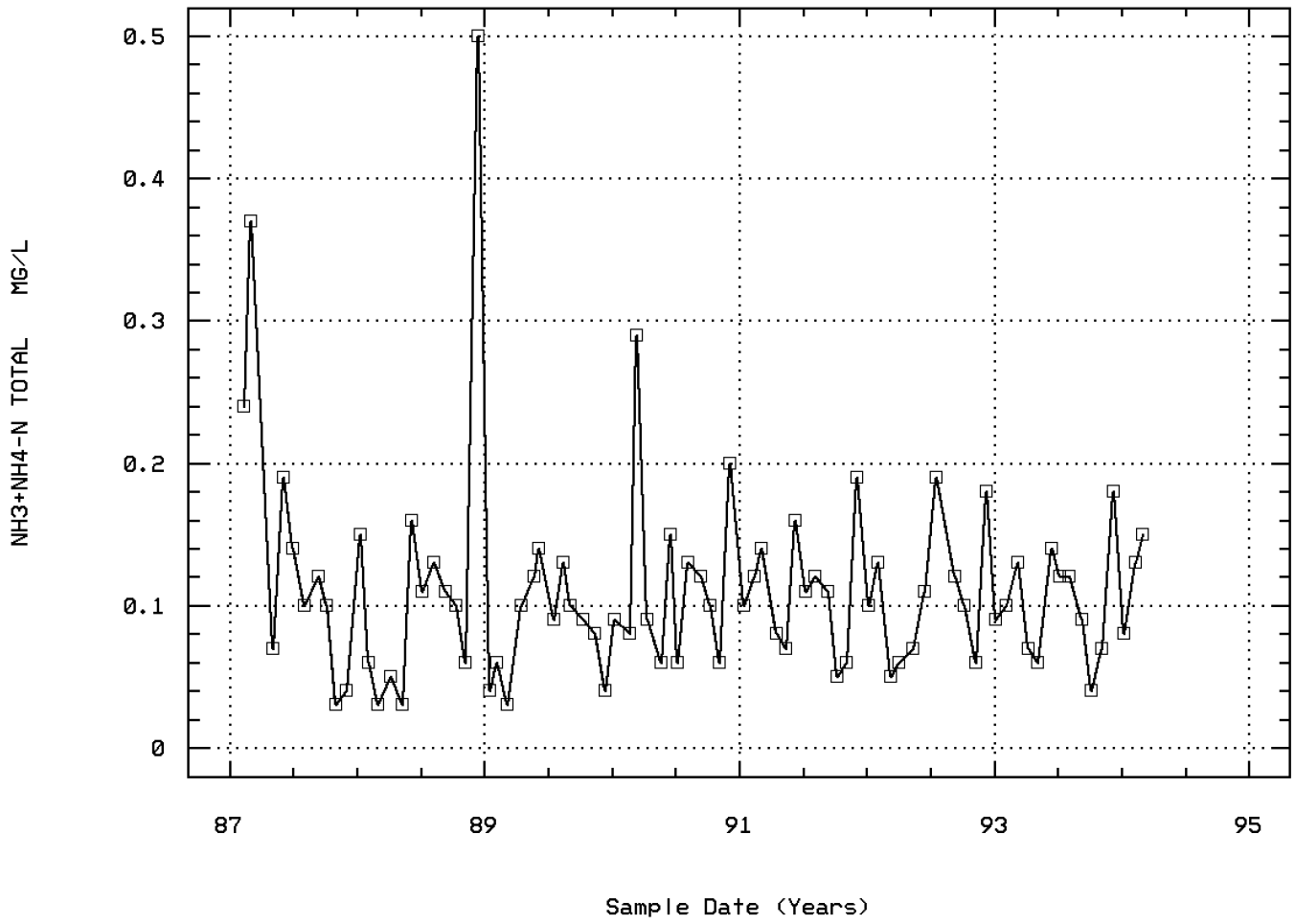
ALKALINITY, TOTAL (MG/L AS CACO3)



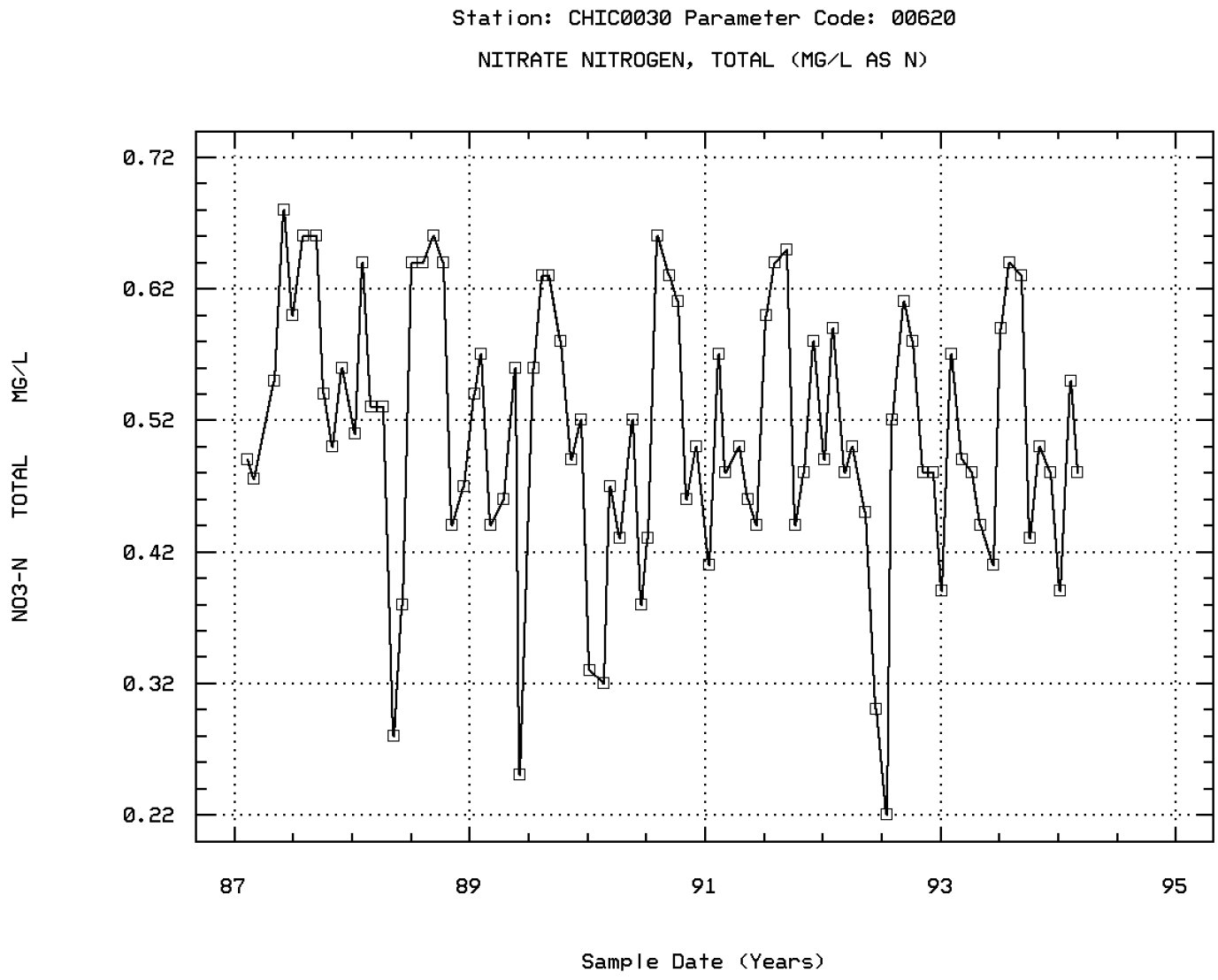
Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00610

NITROGEN, AMMONIA, TOTAL (MG/L AS N)



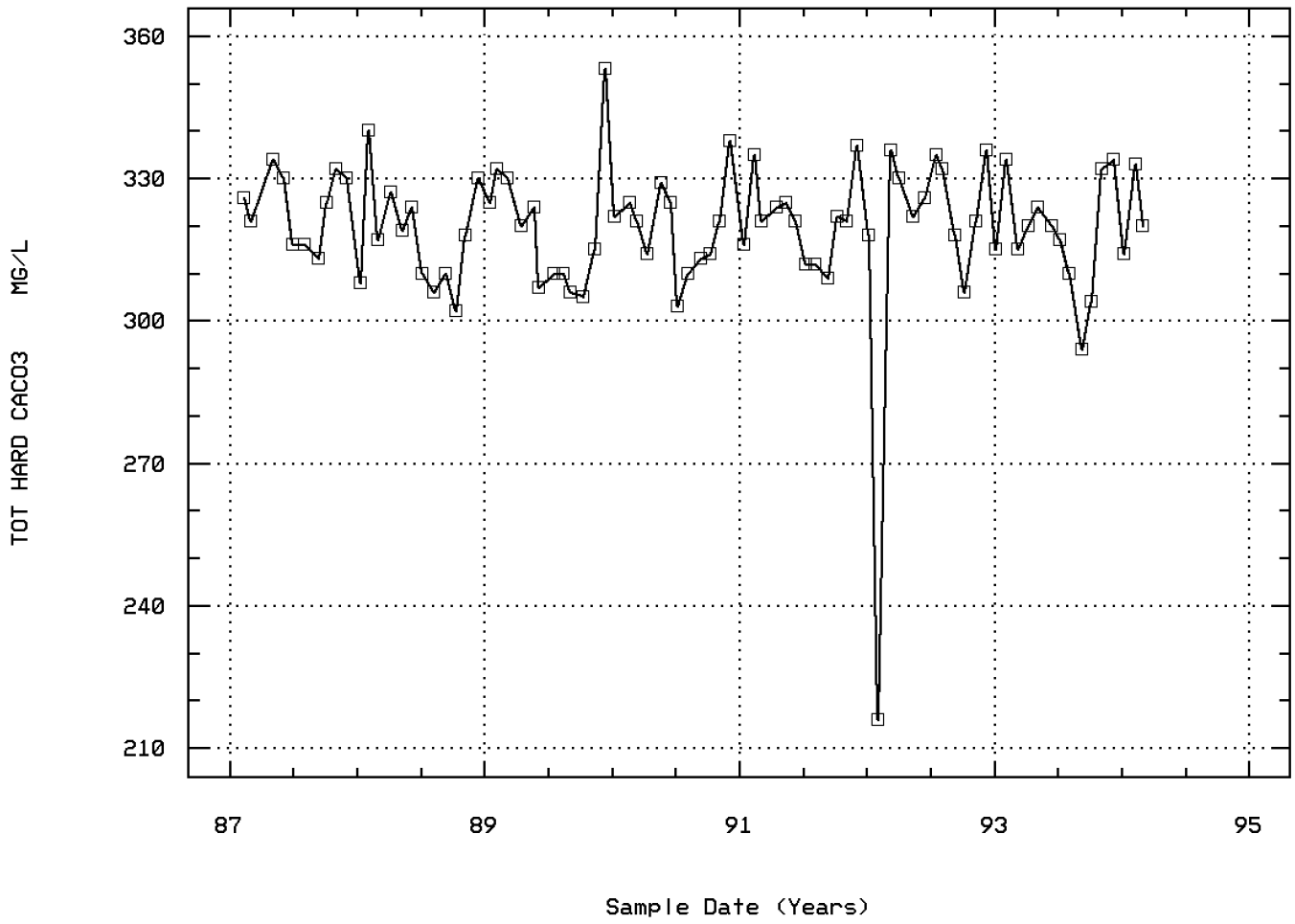
Buckhorn Creek Just Below Catfish Farm



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00900

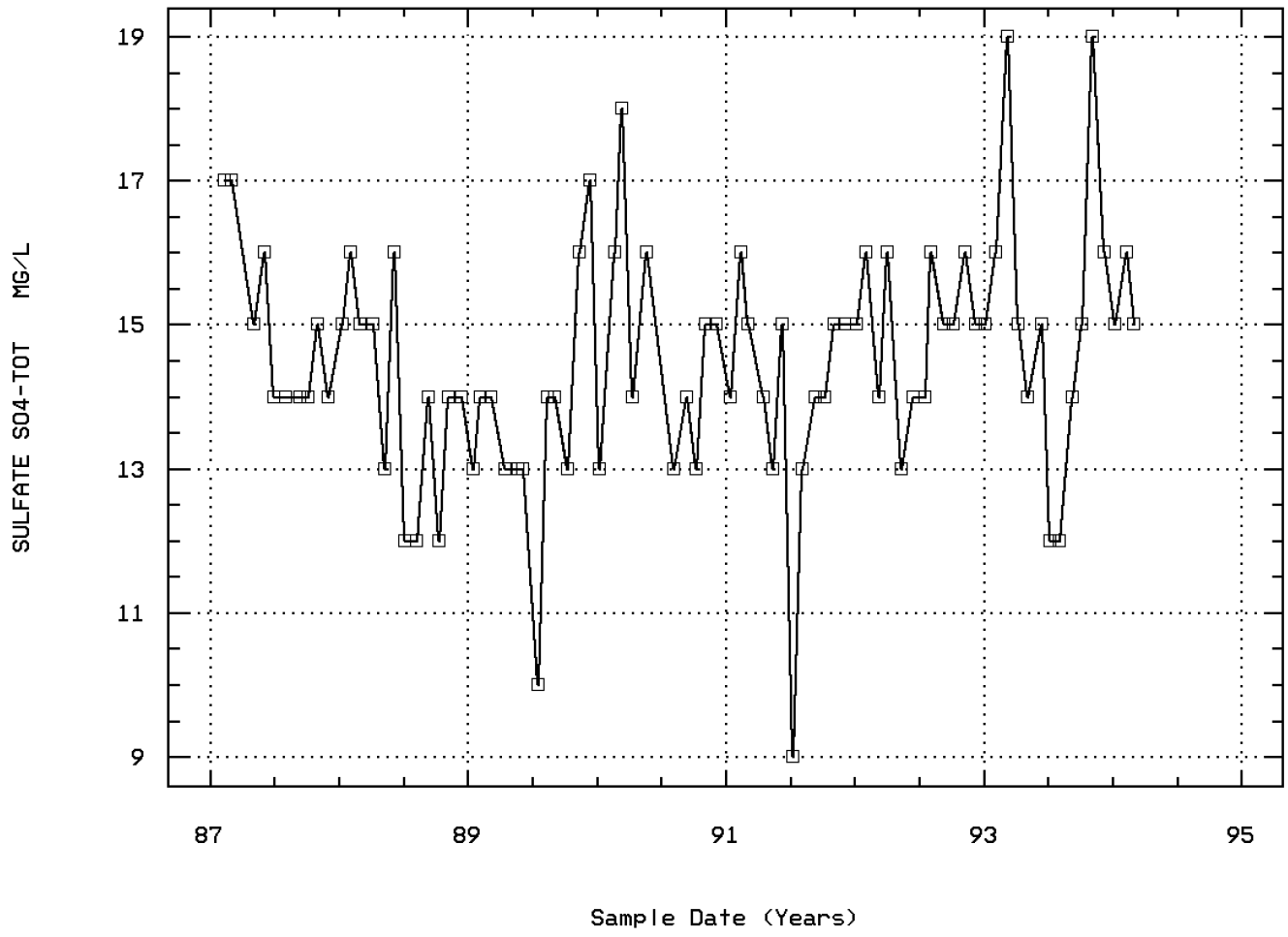
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00945

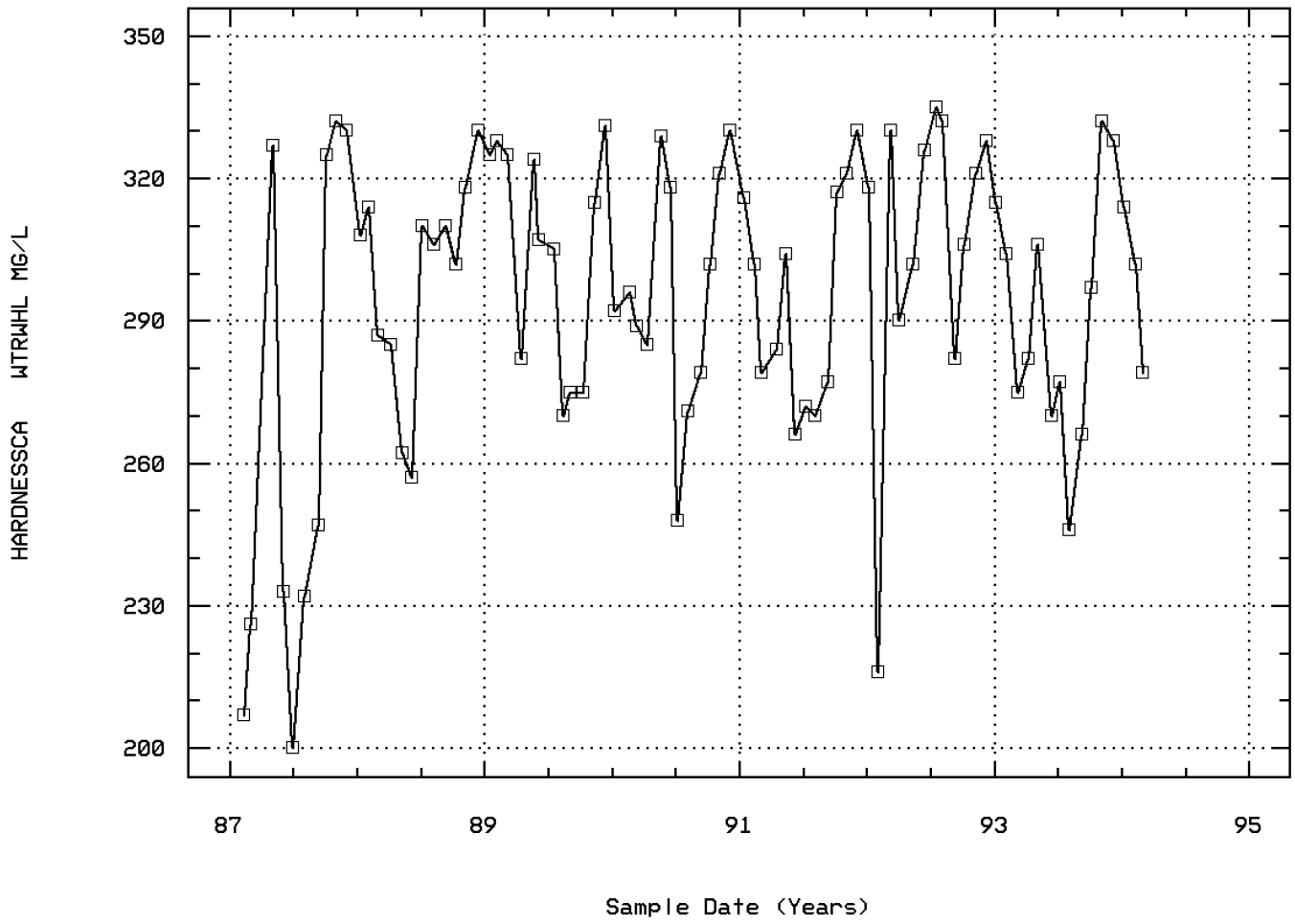
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45634

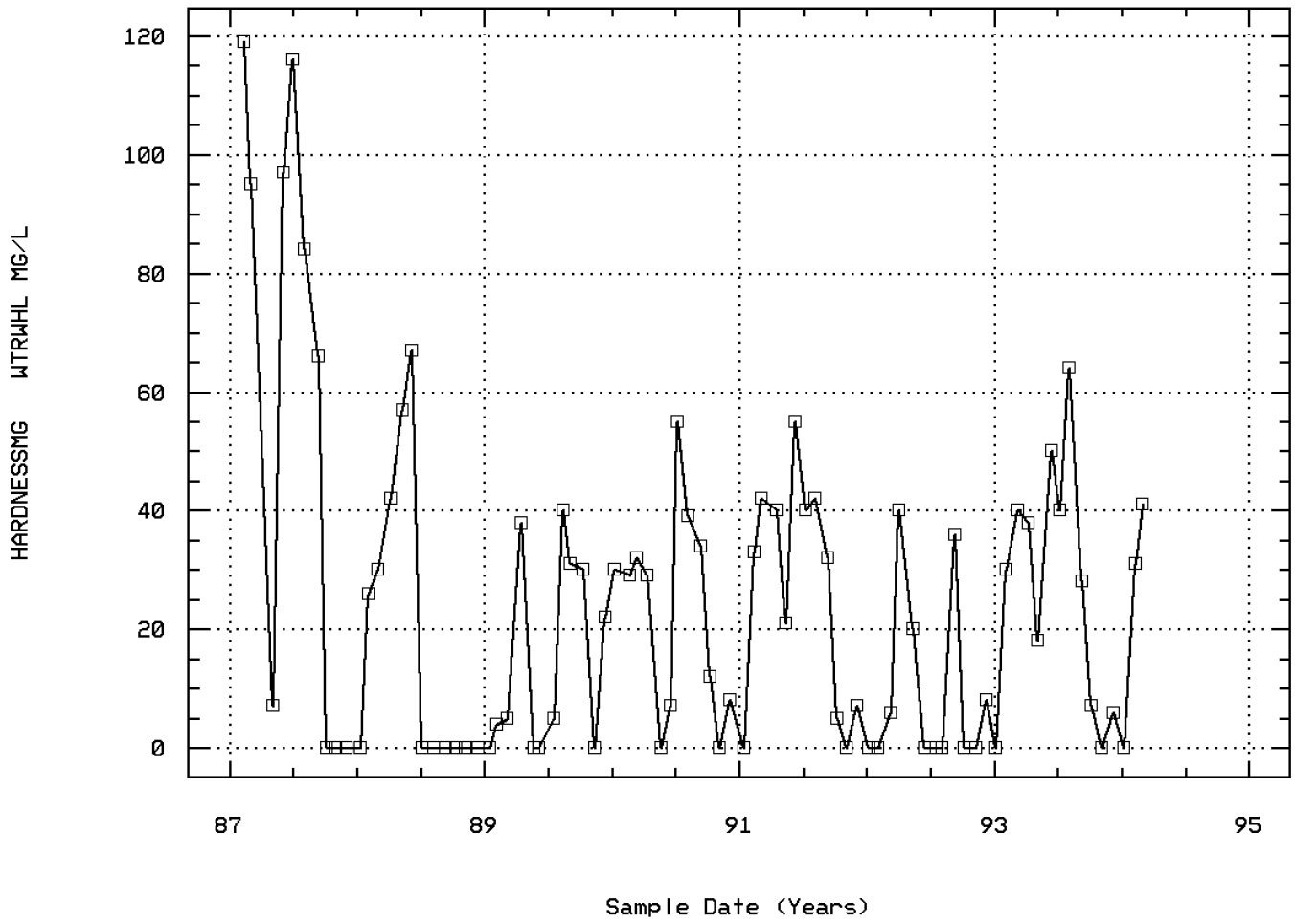
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45635

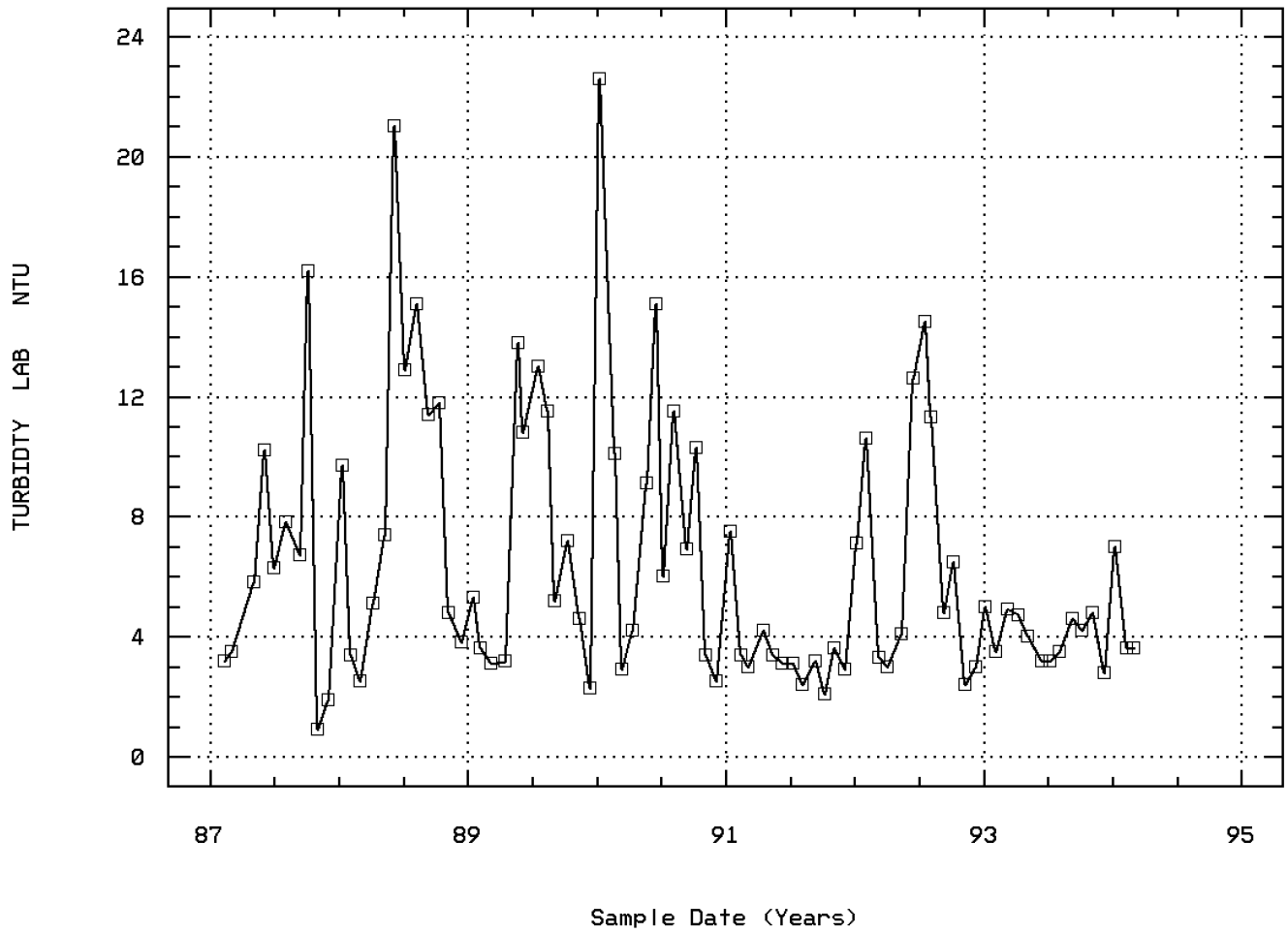
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek Just Below Catfish Farm

Annual Analysis for 1987 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	10	16.5	15.79	21.9	9.5	24.701	4.97	9.52	9.7	20.275	21.82
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	10	613.5	602.7	639.	524.	1061.122	32.575	529.1	590.	621.	637.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	10	8.9	8.87	9.9	7.5	0.911	0.955	7.52	7.925	9.825	9.9
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	10	8.2	7.92	8.4	7.1	0.244	0.494	7.12	7.375	8.3	8.39
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	10	8.2	7.656	8.4	7.1	0.322	0.567	7.12	7.375	8.3	8.39
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	10	0.006	0.022	0.079	0.004	0.001	0.026	0.004	0.005	0.042	0.077
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	318.	321.5	364.	302.	336.056	18.332	302.1	309.	329.75	361.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.11	0.14	0.37	0.03	0.011	0.103	0.031	0.063	0.203	0.357
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	10	0.002	0.004	0.021	0.	0.	0.006	0.	0.001	0.004	0.02
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.555	0.572	0.68	0.475	0.006	0.075	0.477	0.498	0.66	0.678
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	10	0.13	0.143	0.26	0.05	0.006	0.076	0.05	0.088	0.215	0.26
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	325.5	324.3	334.	313.	55.344	7.439	313.3	316.	330.5	333.8
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	14.5	15.	17.	14.	1.556	1.247	14.	14.	16.25	17.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	240.	265.9	332.	200.	3077.433	55.475	200.7	221.25	327.75	331.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	75.	58.4	119.	0.	2600.711	50.997	0.	0.	101.75	118.7
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	10	6.05	6.25	16.2	0.9	20.203	4.495	1.	2.875	8.4	15.6

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	13.85	15.242	22.5	8.9	22.897	4.785	9.11	10.675	19.95	22.35
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	556.5	546.	628.	298.	7125.455	84.412	369.1	542.	588.	628.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.692	10.4	7.1	1.075	1.037	7.13	7.825	9.575	10.19
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.333	8.5	8.2	0.006	0.078	8.23	8.3	8.4	8.47
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.3	8.327	8.5	8.2	0.006	0.078	8.23	8.3	8.4	8.47
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.005	0.006	0.003	0.	0.001	0.003	0.004	0.005	0.006
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	311.	309.417	324.	295.	79.72	8.929	296.5	301.	317.	322.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.105	0.124	0.5	0.03	0.016	0.126	0.03	0.053	0.145	0.398
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.003	0.014	0.001	0.	0.004	0.001	0.002	0.004	0.011
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.53	0.53	0.66	0.28	0.015	0.122	0.31	0.448	0.64	0.654
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.13	0.173	0.71	0.	0.034	0.184	0.018	0.083	0.185	0.584
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	317.5	317.583	340.	302.	124.811	11.172	303.2	308.5	326.25	337.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	14.	14.	16.	12.	2.182	1.477	12.	12.25	15.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	307.	299.083	330.	257.	490.992	22.158	258.5	285.5	313.	326.4
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	18.5	67.	0.	633.727	25.174	0.	0.	39.	64.
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	8.55	9.075	21.	2.5	31.5	5.613	2.77	4.05	12.625	19.23

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.2	15.433	22.1	8.6	33.11	5.754	8.75	9.3	20.675	22.1
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	560.5	543.833	605.	411.	2455.061	49.549	441.9	524.75	568.75	599.9
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.5	8.425	9.9	7.3	0.928	0.963	7.3	7.45	9.35	9.84
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.2	8.142	8.5	7.7	0.064	0.254	7.73	7.875	8.3	8.47
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.2	8.069	8.5	7.7	0.07	0.265	7.73	7.875	8.3	8.47
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.006	0.009	0.02	0.003	0.	0.006	0.003	0.005	0.014	0.019
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	312.5	315.083	353.	298.	236.265	15.371	298.	303.5	323.5	344.3
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.09	0.085	0.14	0.03	0.001	0.036	0.033	0.045	0.115	0.137
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.003	0.003	0.008	0.001	0.	0.002	0.001	0.002	0.003	0.007
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.55	0.519	0.63	0.25	0.011	0.103	0.307	0.468	0.577	0.63
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.105	0.168	0.72	0.04	0.037	0.192	0.043	0.055	0.165	0.606

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	317.5	319.75	353.	305.	198.932	14.104	305.3	307.75	328.75	346.7
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	13.5	13.667	17.	10.	2.97	1.723	10.9	13.	14.	16.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	311.	305.167	331.	270.	547.606	23.401	271.5	276.75	325.	330.1
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	5.	14.583	40.	0.	263.902	16.245	0.	0.	30.75	39.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.125	0.153	0.44	0.	0.013	0.114	0.018	0.1	0.178	0.395
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	5.25	6.967	13.8	2.3	17.468	4.179	2.54	3.3	11.325	13.56

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.	16.008	22.2	9.3	24.172	4.916	9.78	10.925	21.1	22.2
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	574.5	542.5	598.	332.	6620.636	81.367	358.4	546.25	585.75	595.9
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.65	8.558	9.7	7.2	0.883	0.939	7.2	7.675	9.5	9.7
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.2	8.15	8.4	7.7	0.052	0.228	7.73	7.975	8.3	8.4
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.2	8.088	8.4	7.7	0.056	0.237	7.73	7.975	8.3	8.4
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.006	0.008	0.02	0.004	0.	0.005	0.004	0.005	0.011	0.019
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	317.5	314.25	326.	299.	96.023	9.799	299.3	303.	321.	325.7
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.095	0.119	0.29	0.06	0.005	0.068	0.06	0.065	0.145	0.263
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.003	0.	0.	0.001	0.	0.001	0.002	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.465	0.478	0.66	0.32	0.012	0.112	0.323	0.393	0.588	0.651
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.11	0.159	0.63	0.06	0.024	0.155	0.06	0.09	0.173	0.501
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	321.	319.583	338.	303.	88.083	9.385	305.1	313.25	325.	335.3
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	14.5	14.7	18.	13.	2.678	1.636	13.	13.	16.	17.8
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	294.	296.667	330.	248.	617.152	24.843	254.9	280.5	320.25	329.7
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	29.	22.917	55.	0.	296.629	17.223	0.	7.25	33.5	50.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.13	0.152	0.37	0.06	0.007	0.084	0.066	0.098	0.18	0.331
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	8.	8.717	22.6	2.5	34.331	5.859	2.62	3.6	11.2	20.35

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.05	15.625	22.2	9.2	26.237	5.122	9.26	9.85	20.475	21.96
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	571.5	556.	594.	430.	1969.636	44.381	456.1	555.5	579.75	592.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.6	8.667	10.	7.3	0.839	0.916	7.36	8.025	9.625	9.94
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.2	8.5	7.7	0.064	0.252	7.73	8.025	8.4	8.47
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.3	8.124	8.5	7.7	0.07	0.264	7.73	8.025	8.4	8.47
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.008	0.02	0.003	0.	0.005	0.003	0.004	0.009	0.019
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	319.	315.583	332.	300.	109.538	10.466	300.6	304.	321.	330.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.11	0.109	0.19	0.05	0.002	0.041	0.053	0.073	0.135	0.181
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.003	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.49	0.521	0.65	0.41	0.007	0.083	0.419	0.445	0.595	0.647
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.135	0.168	0.38	0.08	0.009	0.093	0.083	0.095	0.208	0.359
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	321.	321.25	337.	309.	73.477	8.572	309.9	313.	324.75	336.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	14.	13.917	16.	9.	3.174	1.782	10.2	13.25	15.	15.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	293.	294.833	330.	266.	513.788	22.667	267.2	273.25	316.75	327.3
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	32.5	26.417	55.	0.	364.265	19.086	0.	5.5	41.5	51.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.125	0.155	0.44	0.05	0.012	0.11	0.053	0.1	0.178	0.395
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	3.15	3.492	7.5	2.1	1.883	1.372	2.19	2.925	3.55	6.51

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.25	15.008	20.8	7.8	27.437	5.238	8.19	9.55	20.3	20.74
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	568.	544.333	597.	358.	5103.152	71.436	384.1	542.75	590.	595.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	8.8	8.536	10.2	4.4	2.519	1.587	5.04	8.1	9.4	10.16
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.35	8.367	8.8	7.7	0.088	0.296	7.85	8.2	8.65	8.77
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.347	8.262	8.8	7.7	0.1	0.316	7.85	8.2	8.65	8.77
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.004	0.005	0.02	0.002	0.	0.005	0.002	0.002	0.006	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	314.5	306.333	326.	207.	1054.061	32.466	236.1	305.25	323.5	325.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	11	0.1	0.106	0.19	0.05	0.002	0.047	0.052	0.06	0.13	0.188
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	0.002	0.002	0.002	0.001	0.	0.	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.485	0.475	0.61	0.22	0.013	0.113	0.244	0.458	0.565	0.604
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	0.11	0.118	0.16	0.09	0.001	0.028	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	324.	316.333	336.	216.	1080.061	32.864	243.	318.	334.25	336.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	15.	14.917	16.	13.	0.992	0.996	13.3	14.	16.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	319.5	307.167	335.	216.	1116.152	33.409	235.8	293.	329.5	334.1
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	9.167	40.	0.	217.061	14.733	0.	0.	17.	38.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.125	0.187	0.63	0.08	0.026	0.162	0.08	0.1	0.193	0.555
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	5.65	6.933	14.5	2.4	18.124	4.257	2.58	3.075	11.125	13.93

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	15.7	15.525	22.5	9.1	27.217	5.217	9.1	9.75	20.575	22.14
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	556.	551.75	594.	435.	1856.75	43.09	465.3	537.25	582.5	593.1
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.433	9.9	4.9	1.853	1.361	5.56	7.975	9.375	9.78
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.3	8.258	8.5	7.7	0.057	0.239	7.79	8.125	8.475	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.3	8.187	8.5	7.7	0.063	0.25	7.79	8.125	8.475	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.005	0.006	0.02	0.003	0.	0.005	0.003	0.003	0.008	0.017
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	318.5	311.333	330.	272.	308.061	17.552	277.4	299.75	326.	329.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.095	0.101	0.18	0.04	0.002	0.039	0.046	0.07	0.128	0.168
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.485	0.504	0.64	0.39	0.007	0.085	0.396	0.433	0.585	0.637
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	318.5	318.25	334.	294.	146.023	12.084	297.	311.25	330.	334.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	15.	15.167	19.	12.	4.879	2.209	12.	14.	16.	19.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	289.5	291.5	332.	246.	697.909	26.418	252.	271.25	312.75	330.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	29.	26.75	64.	0.	431.477	20.772	0.	6.25	40.	59.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.11	0.148	0.41	0.05	0.009	0.097	0.062	0.1	0.188	0.359
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	4.1	4.033	5.	2.8	0.595	0.771	2.92	3.275	4.775	4.97

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	3	9.4	10.3	12.2	9.3	2.71	1.646	**	**	**	**
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	3	559.	569.333	598.	551.	632.333	25.146	**	**	**	**
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	3	9.8	9.733	10.2	9.2	0.253	0.503	**	**	**	**
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	3	8.3	8.333	8.4	8.3	0.003	0.058	**	**	**	**
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	3	8.3	8.331	8.4	8.3	0.003	0.058	**	**	**	**
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	3	0.005	0.005	0.005	0.004	0.	0.001	**	**	**	**
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	323.	319.	333.	301.	268.	16.371	**	**	**	**
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.13	0.12	0.15	0.08	0.001	0.036	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.48	0.473	0.55	0.39	0.006	0.08	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	320.	322.333	333.	314.	94.333	9.713	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	3	15.	15.333	16.	15.	0.333	0.577	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

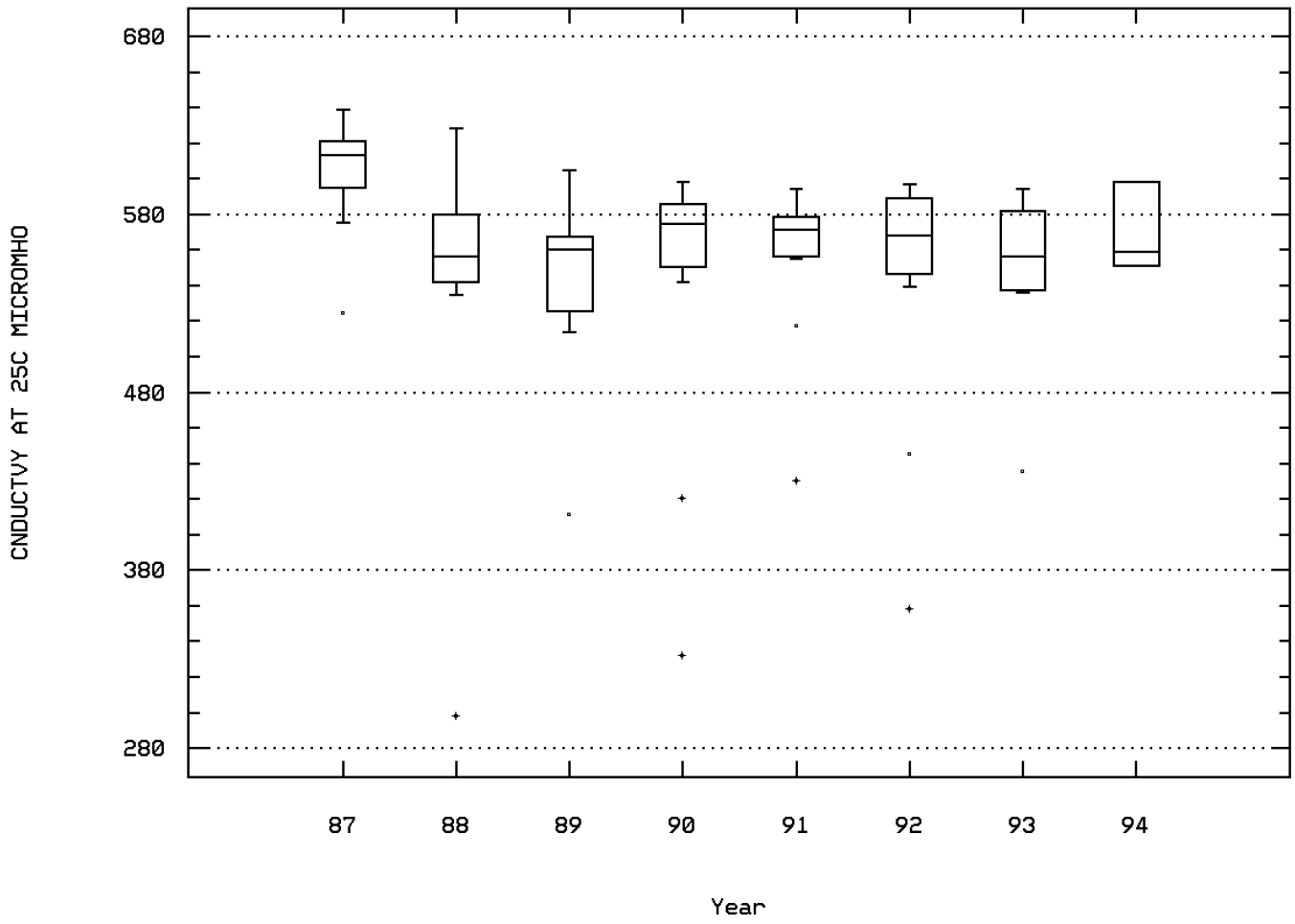
Annual Analysis for 1994 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	302.	298.333	314.	279.	316.333	17.786	**	**	**	**
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	31.	24.	41.	0.	457.	21.378	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	3	0.08	0.103	0.15	0.08	0.002	0.04	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	3	3.6	4.733	7.	3.6	3.853	1.963	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0030 Parameter Code: 00095

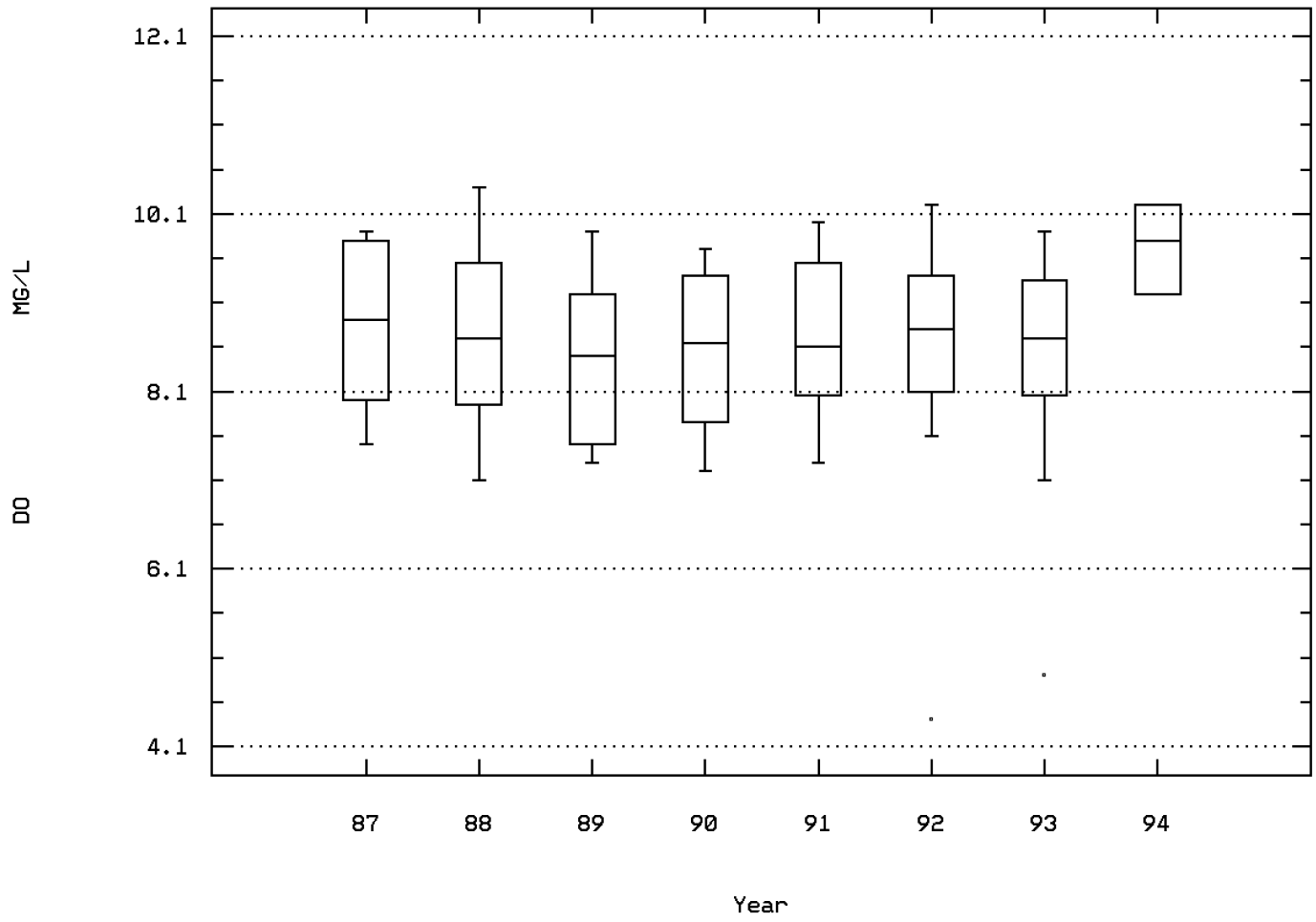
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



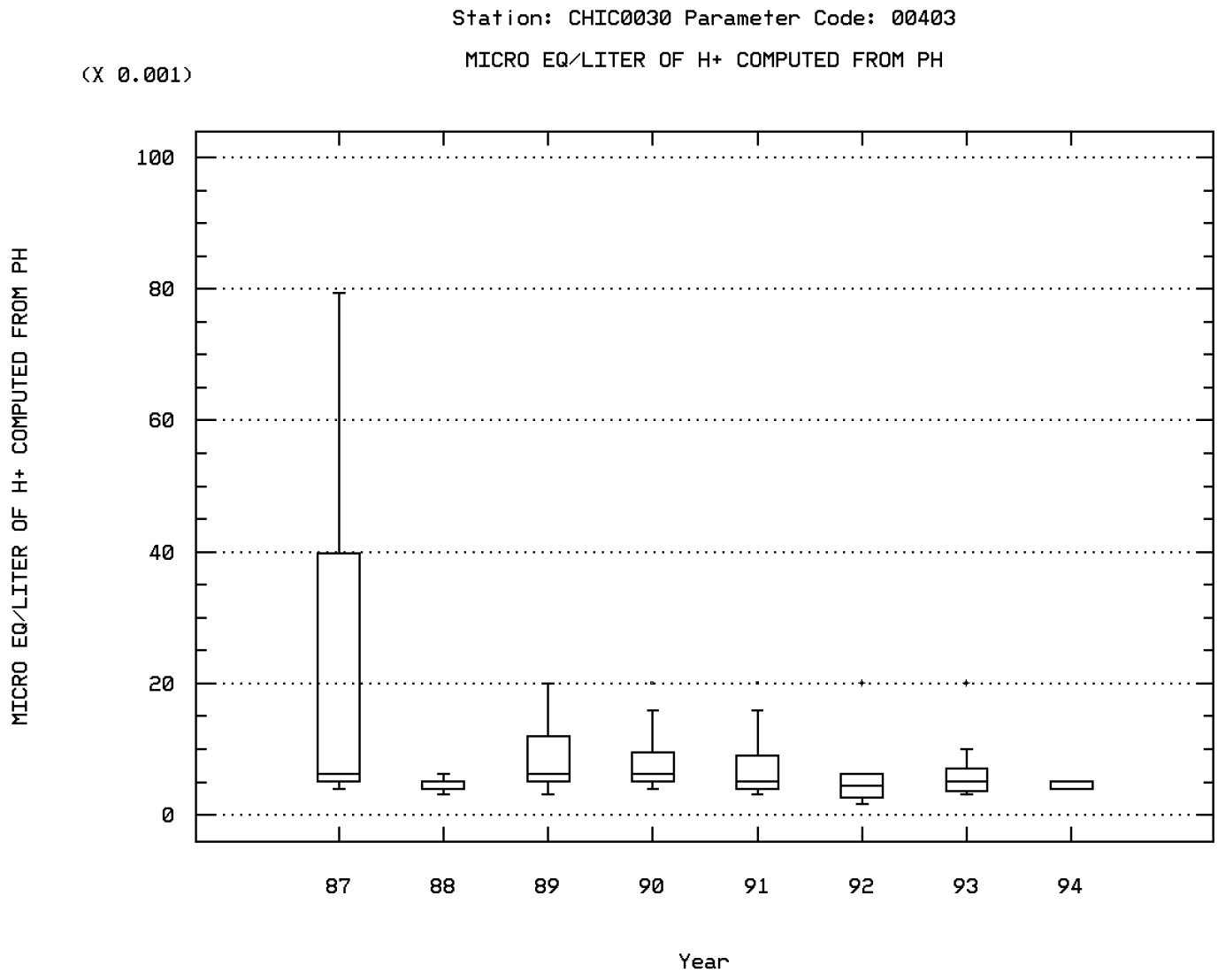
Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00300

OXYGEN, DISSOLVED



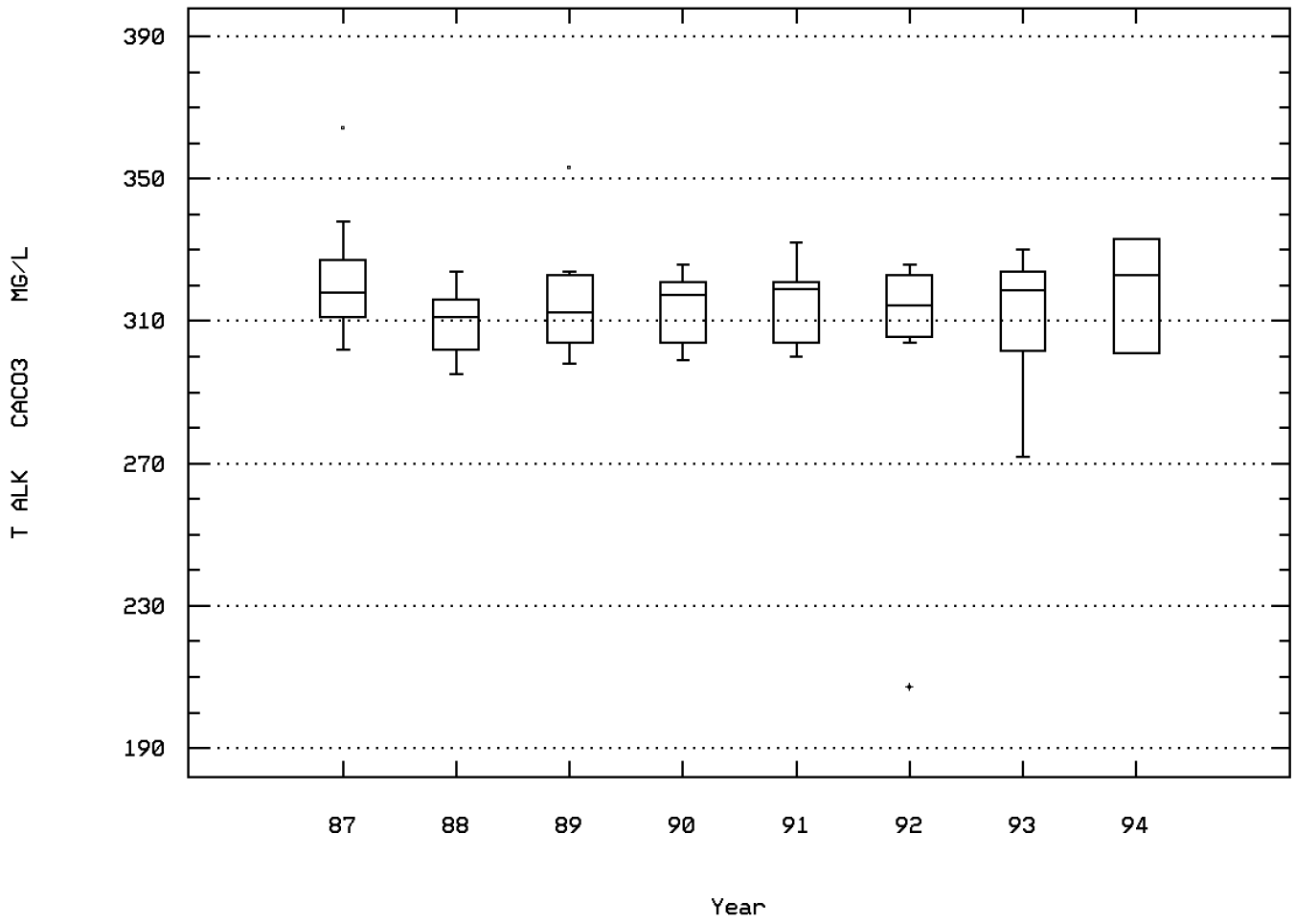
Buckhorn Creek Just Below Catfish Farm



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00410

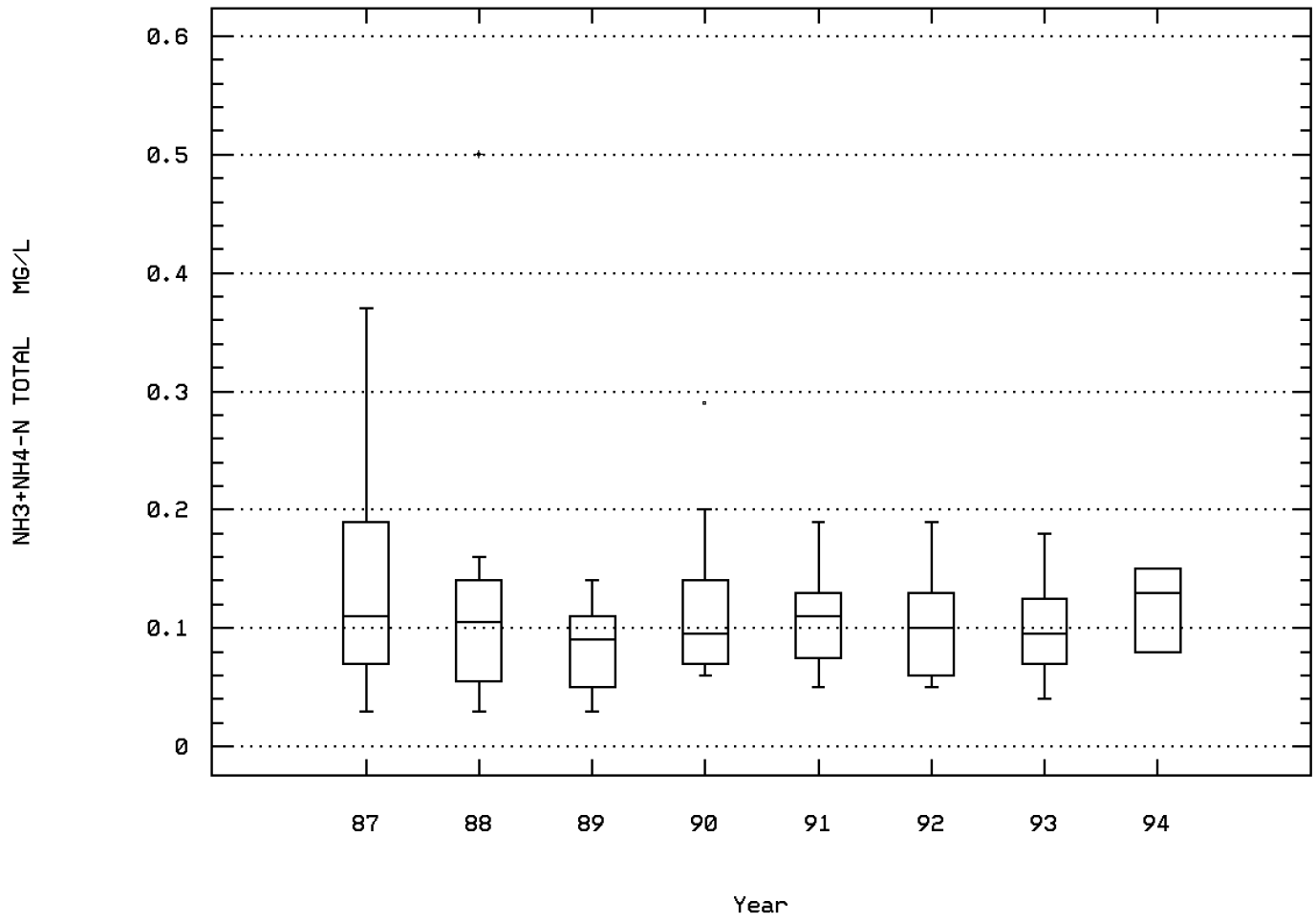
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00610

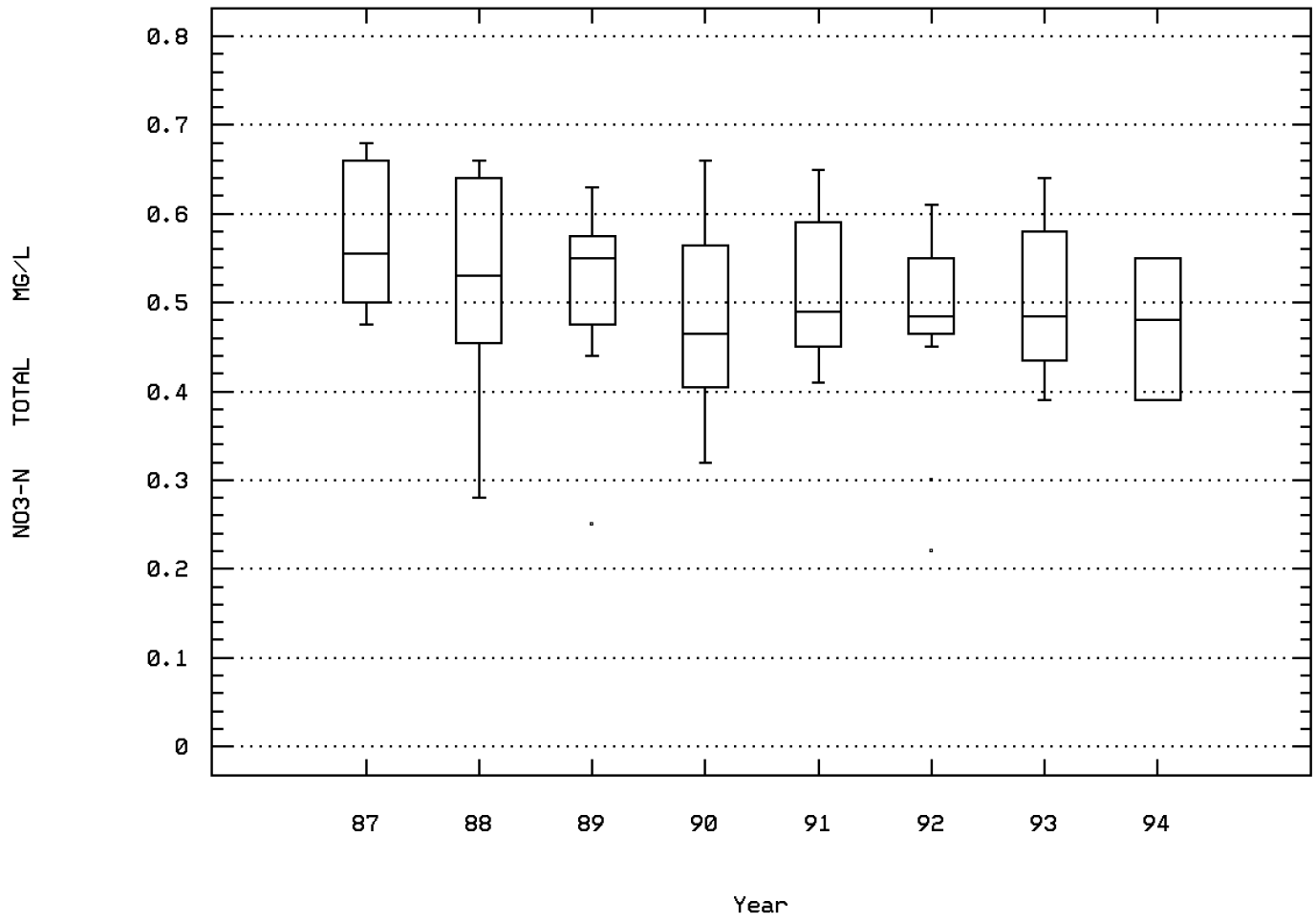
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00620

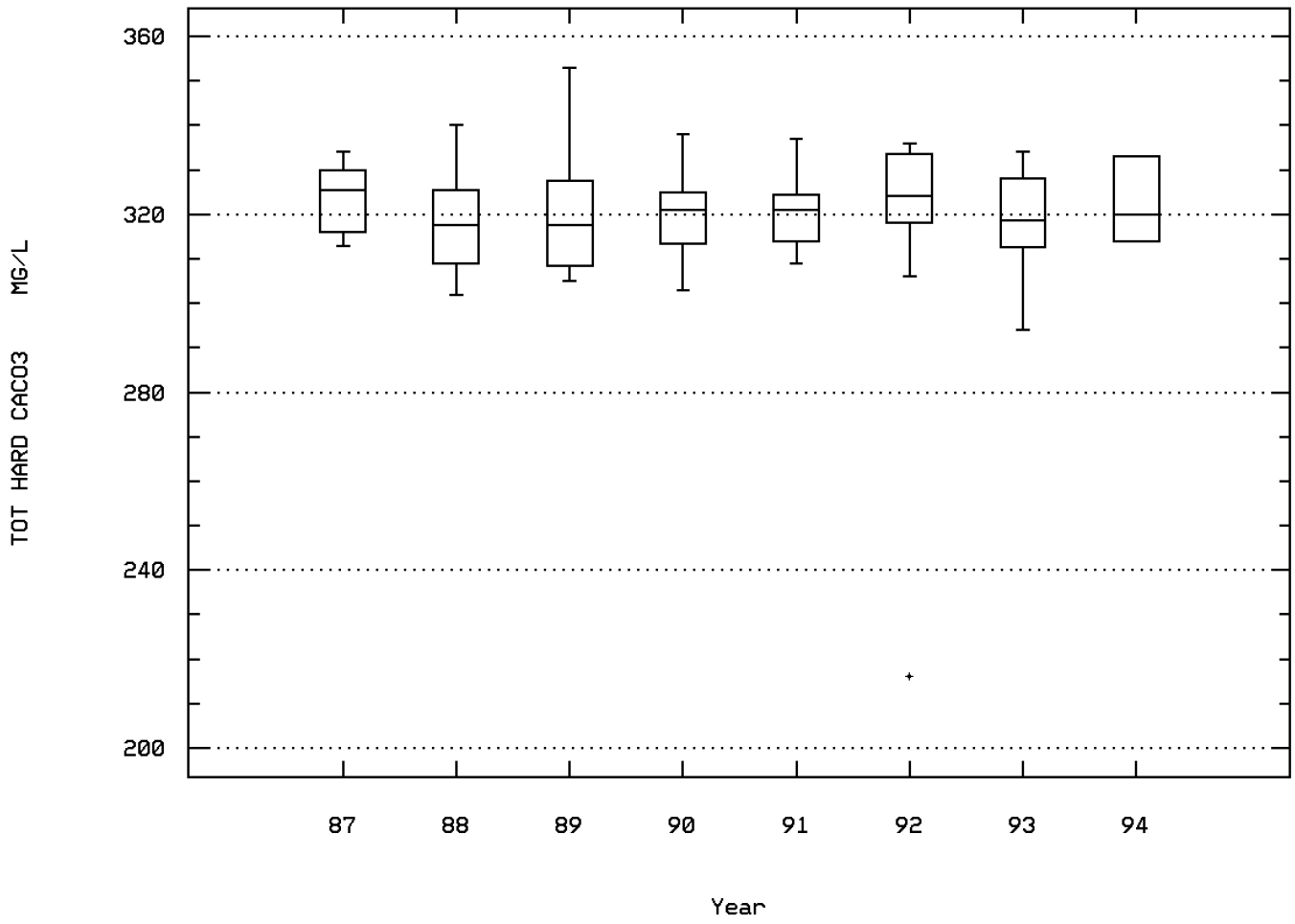
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00900

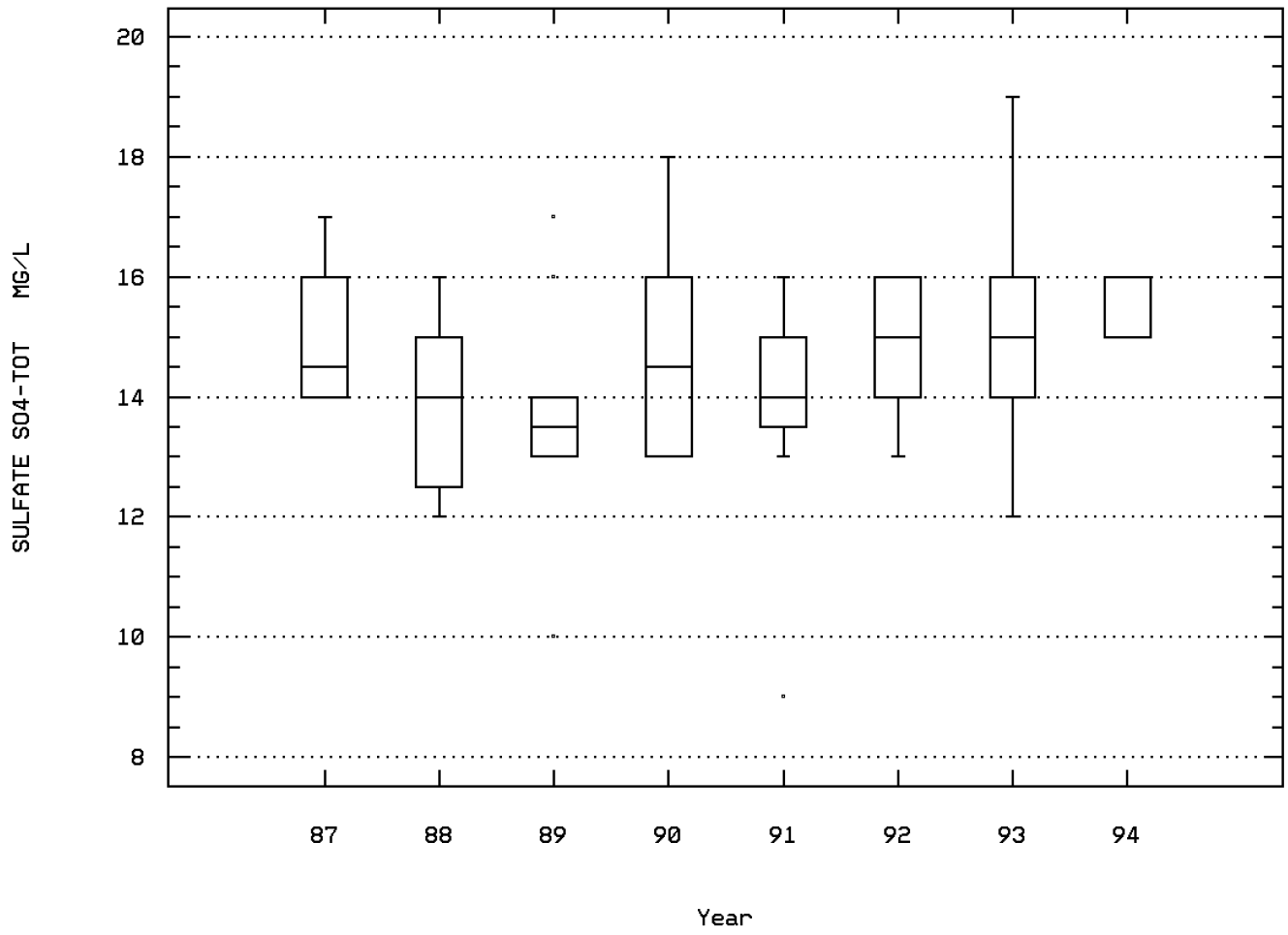
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00945

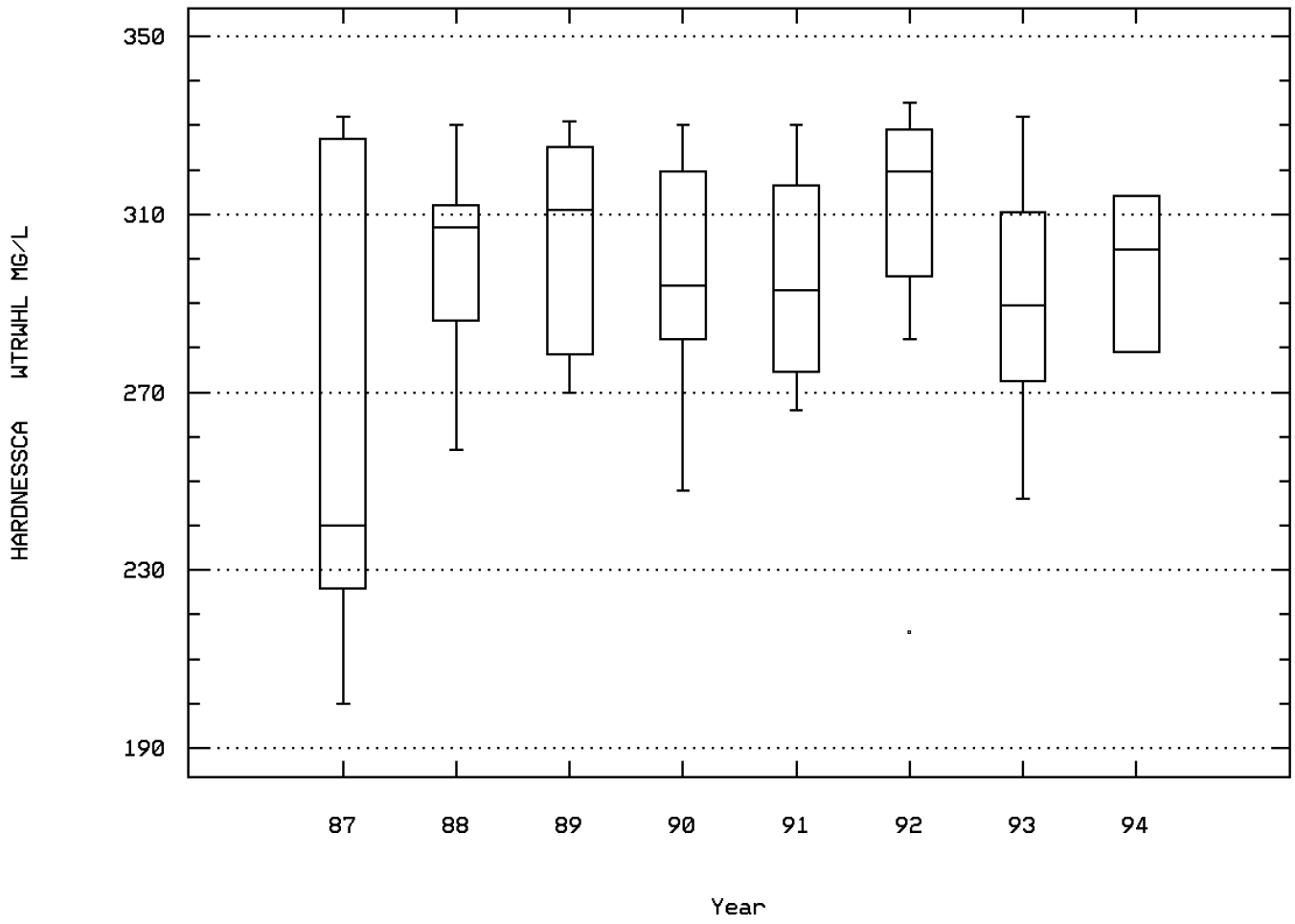
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45634

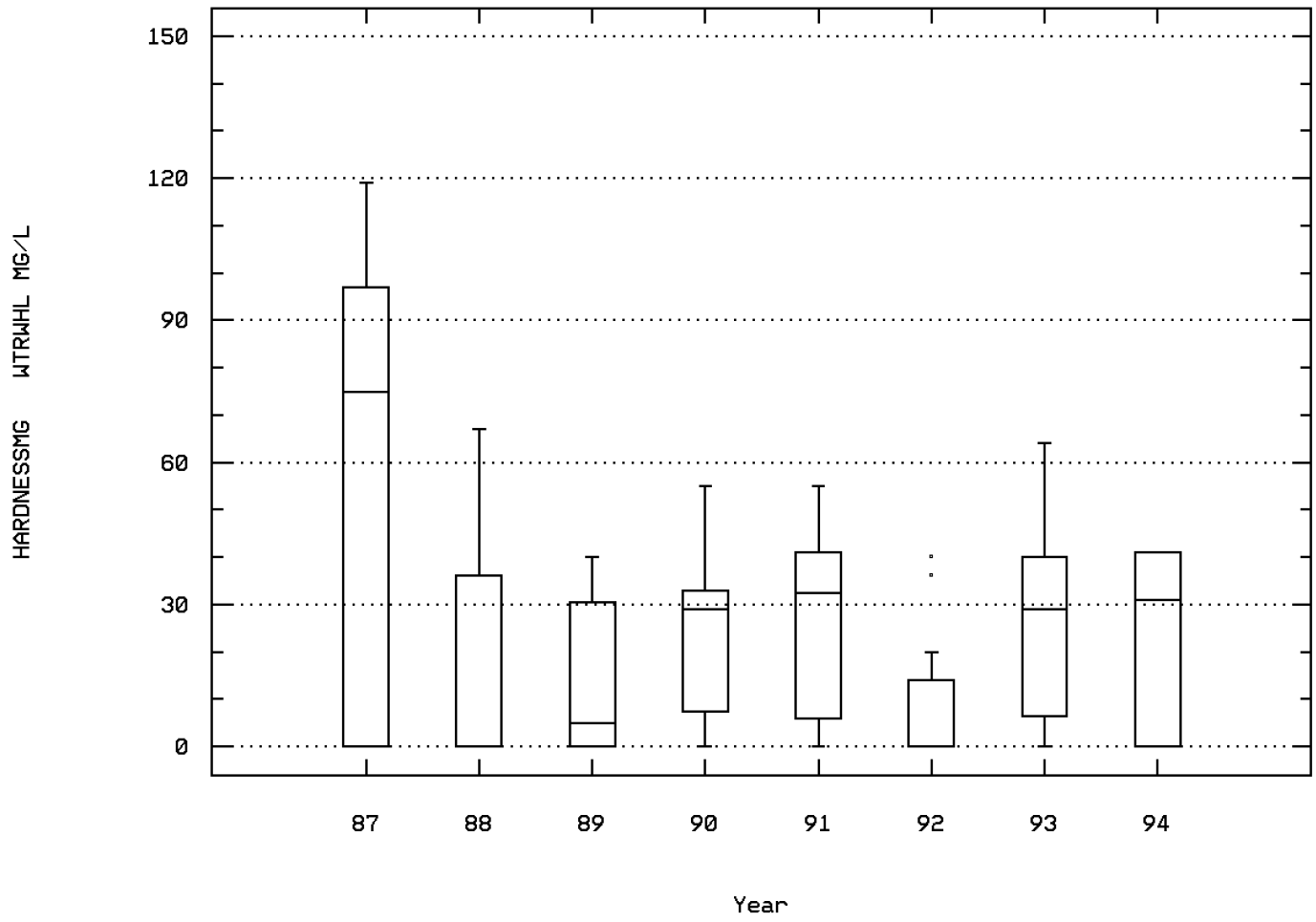
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45635

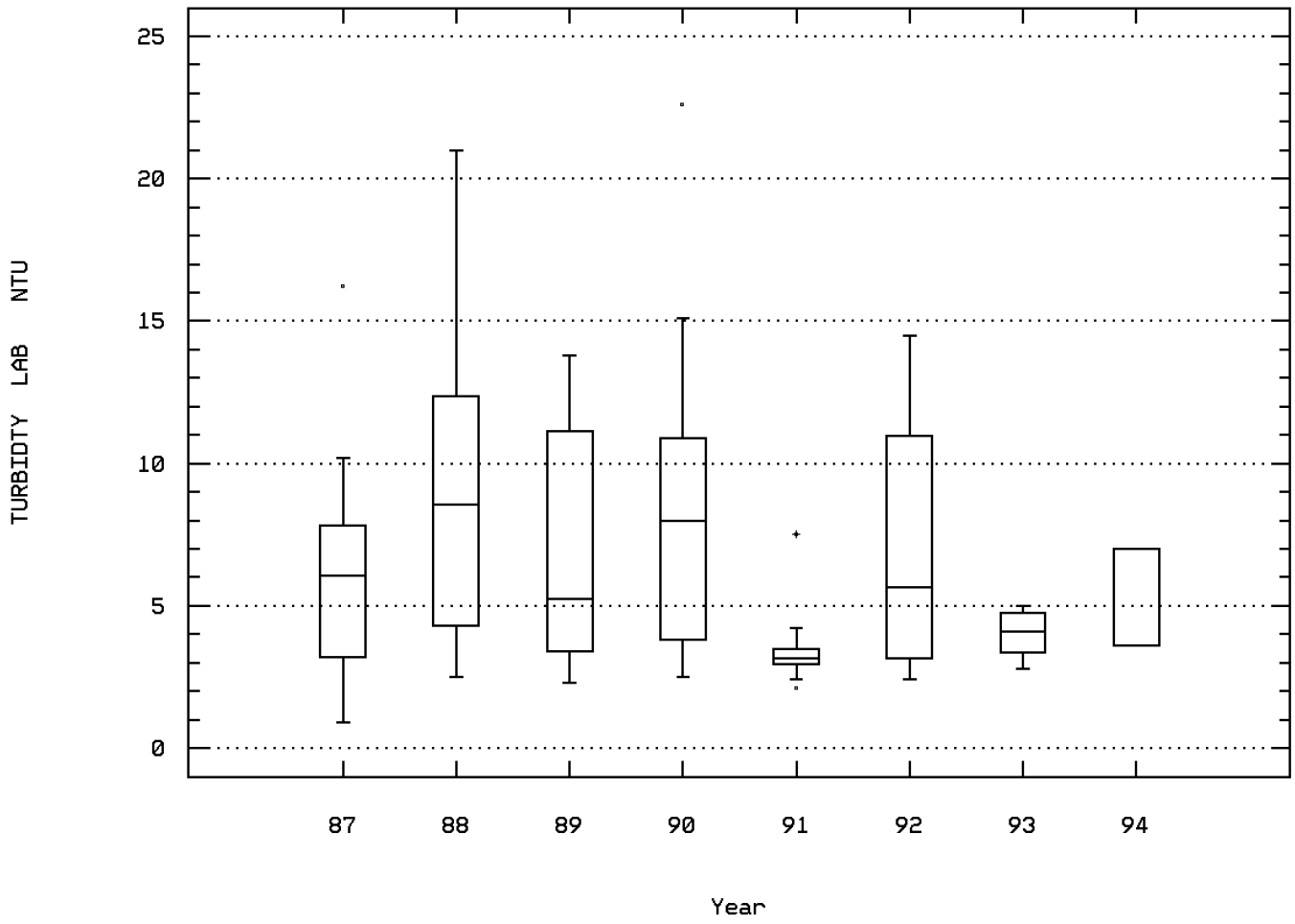
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek Just Below Catfish Farm

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	36	9.6	10.697	16.1	7.8	4.927	2.22	9.04	9.225	10.975	14.35
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	36	564.	559.833	628.	358.	2631.229	51.296	521.	542.75	590.	614.4
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	36	9.35	9.411	10.4	8.3	0.248	0.498	8.8	8.925	9.875	10.06
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	36	8.4	8.356	8.7	7.8	0.019	0.138	8.2	8.3	8.4	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	36	8.4	8.33	8.7	7.8	0.02	0.141	8.2	8.3	8.4	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	36	0.004	0.005	0.016	0.002	0.	0.002	0.003	0.004	0.005	0.006
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	318.	312.278	330.	207.	393.806	19.845	300.7	306.5	321.	324.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.09	0.108	0.5	0.03	0.007	0.084	0.04	0.06	0.128	0.193
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.5	0.503	0.64	0.32	0.006	0.078	0.39	0.463	0.57	0.596
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	323.5	320.972	353.	216.	456.313	21.361	304.7	315.	332.75	337.3
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	36	15.	14.972	19.	12.	1.856	1.362	13.	14.	16.	16.3
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	316.5	309.667	332.	207.	764.457	27.649	286.9	302.	328.	330.3
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	0.	11.306	119.	0.	478.79	21.881	0.	0.	19.5	30.3
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	36	4.	5.767	22.6	0.9	19.412	4.406	2.24	3.05	7.175	10.96

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	28	18.25	16.846	22.2	10.3	12.137	3.484	12.01	13.525	19.65	20.71
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	28	570.	555.143	639.	298.	4484.275	66.965	434.5	557.25	589.	601.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	28	8.2	8.475	9.8	7.2	0.676	0.822	7.58	7.9	9.475	9.71
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	28	8.2	8.2	8.5	7.4	0.036	0.189	8.	8.2	8.3	8.31
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	28	8.2	8.138	8.5	7.4	0.04	0.199	8.	8.2	8.3	8.31
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	28	0.006	0.007	0.04	0.003	0.	0.007	0.005	0.005	0.006	0.01
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	323.	323.786	364.	299.	164.101	12.81	309.8	318.	327.75	339.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.095	0.113	0.37	0.03	0.006	0.077	0.03	0.06	0.148	0.2
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.473	0.459	0.68	0.25	0.008	0.087	0.298	0.433	0.5	0.551
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	323.	323.071	336.	307.	37.624	6.134	314.9	320.	326.75	330.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	27	15.	14.815	19.	13.	2.387	1.545	13.	14.	16.	17.2
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	286.	290.321	330.	226.	767.337	27.701	254.6	276.	315.25	327.2
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	35.	32.75	97.	0.	690.787	26.283	0.	7.	42.	69.8
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	28	4.15	6.243	21.	2.5	21.447	4.631	2.99	3.2	8.675	13.93

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

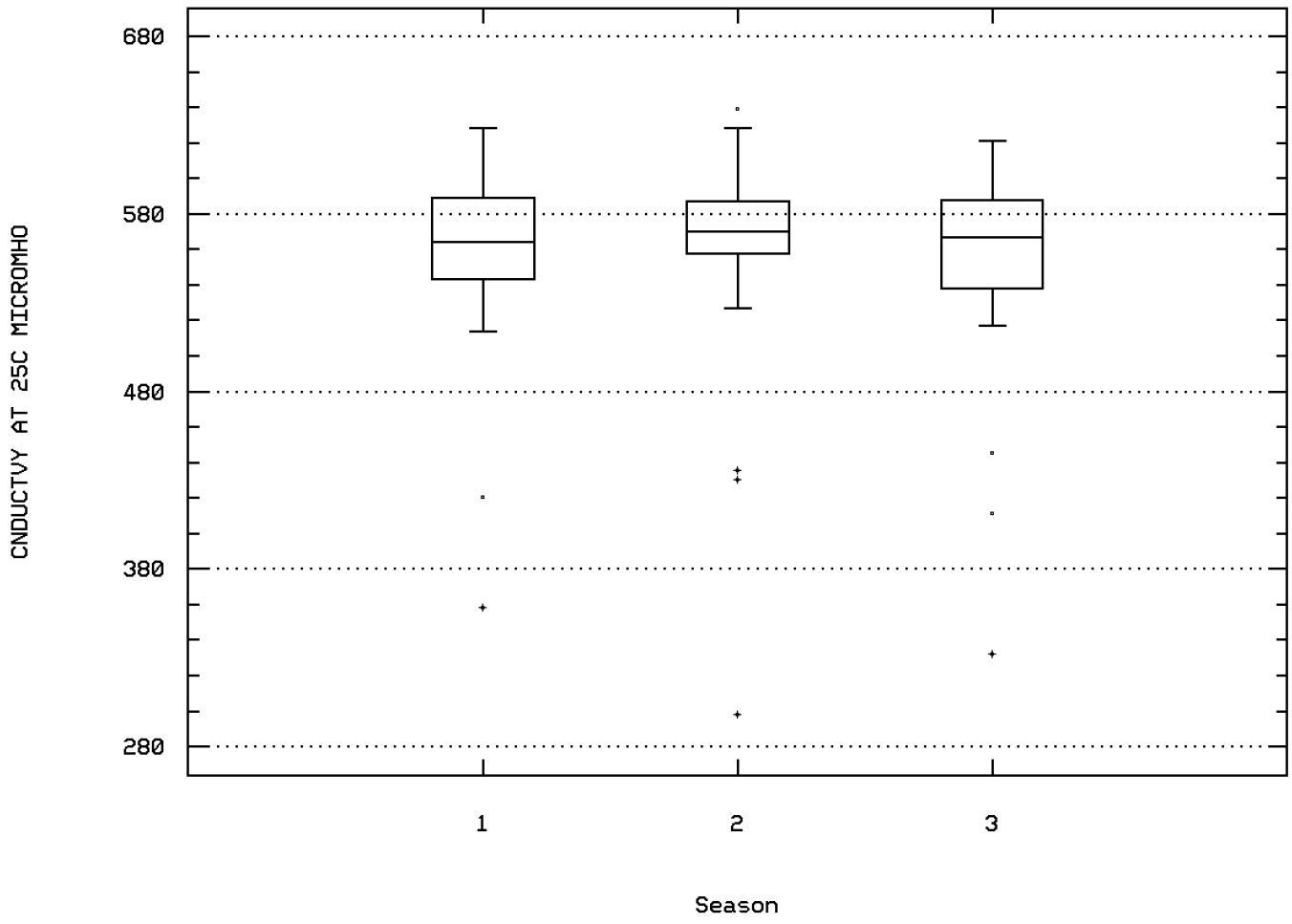
Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0030

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	21	21.3	21.243	22.5	20.	0.732	0.855	20.04	20.5	22.1	22.44
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	21	567.	545.238	621.	332.	5022.89	70.872	417.8	536.5	589.5	613.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	20	7.5	7.45	8.8	4.4	1.223	1.106	5.12	7.2	8.3	8.59
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	21	7.8	7.962	8.8	7.1	0.182	0.427	7.38	7.7	8.3	8.66
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	21	7.8	7.774	8.8	7.1	0.22	0.469	7.38	7.7	8.3	8.66
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	21	0.016	0.017	0.079	0.002	0.	0.018	0.002	0.005	0.02	0.044
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	302.	301.333	321.	272.	81.733	9.041	291.	299.	305.	310.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	20	0.12	0.116	0.19	0.06	0.001	0.025	0.09	0.103	0.128	0.139
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	21	0.63	0.595	0.66	0.22	0.01	0.102	0.448	0.595	0.645	0.66
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	310.	312.476	335.	294.	76.462	8.744	303.6	309.5	316.	329.2
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	20	14.	13.2	16.	9.	2.695	1.642	10.2	12.	14.	14.9
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	275.	276.667	335.	200.	1057.933	32.526	234.8	257.	305.5	327.6
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	36.	35.81	116.	0.	919.562	30.324	0.	2.5	48.5	80.4
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	21	6.7	7.852	15.1	2.4	17.467	4.179	3.12	4.05	11.5	14.2

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0030 Parameter Code: 00095

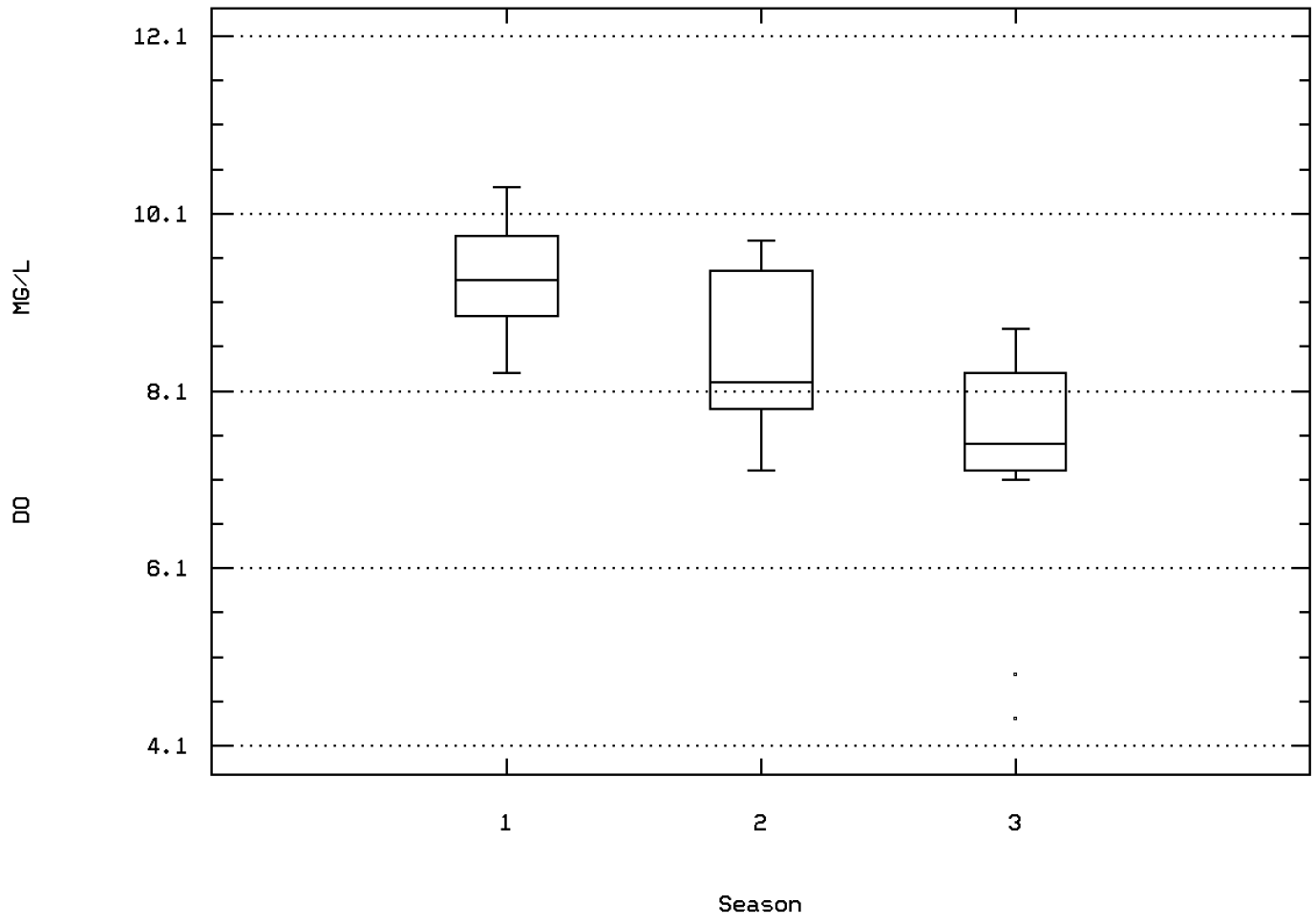
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00300

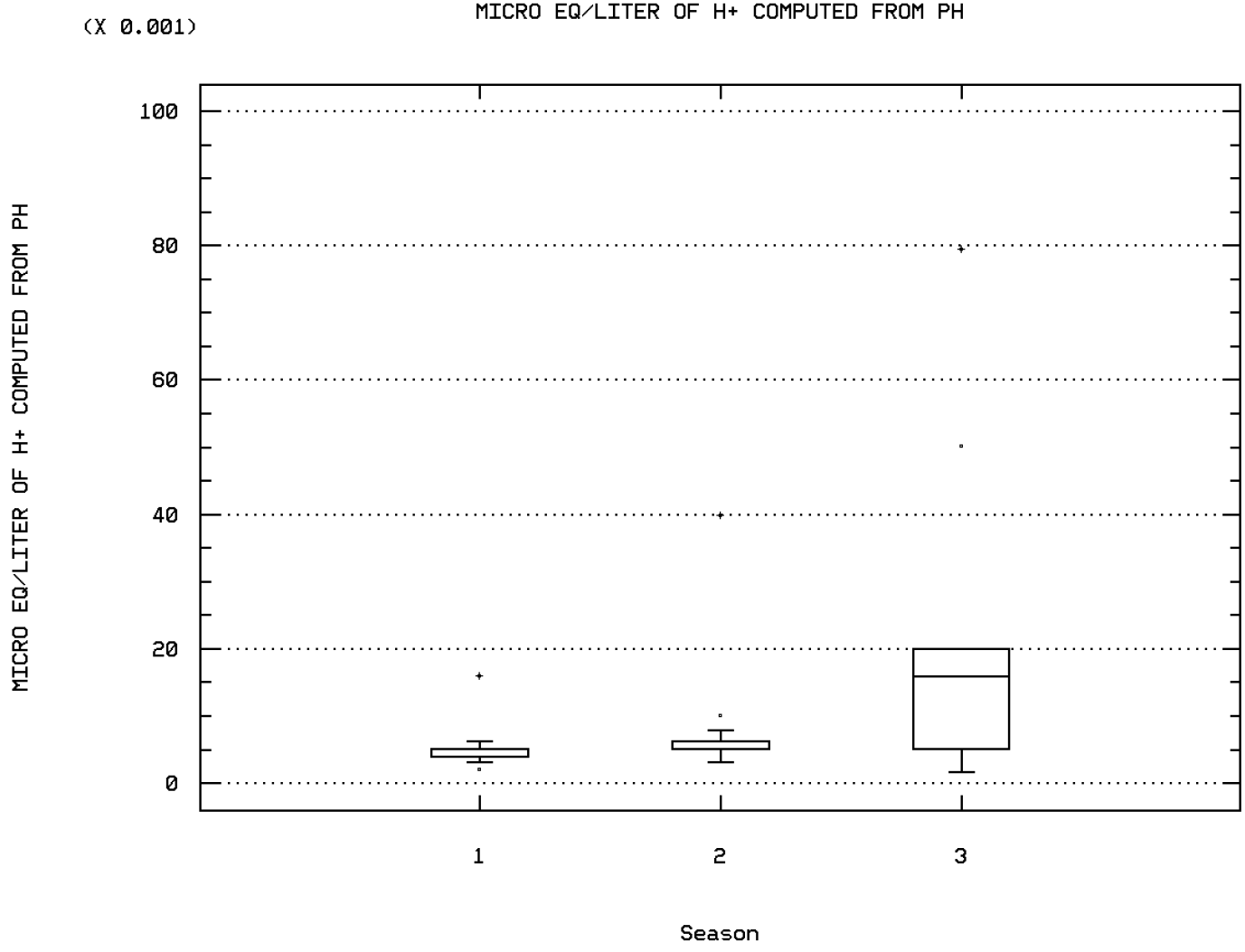
OXYGEN, DISSOLVED



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00403

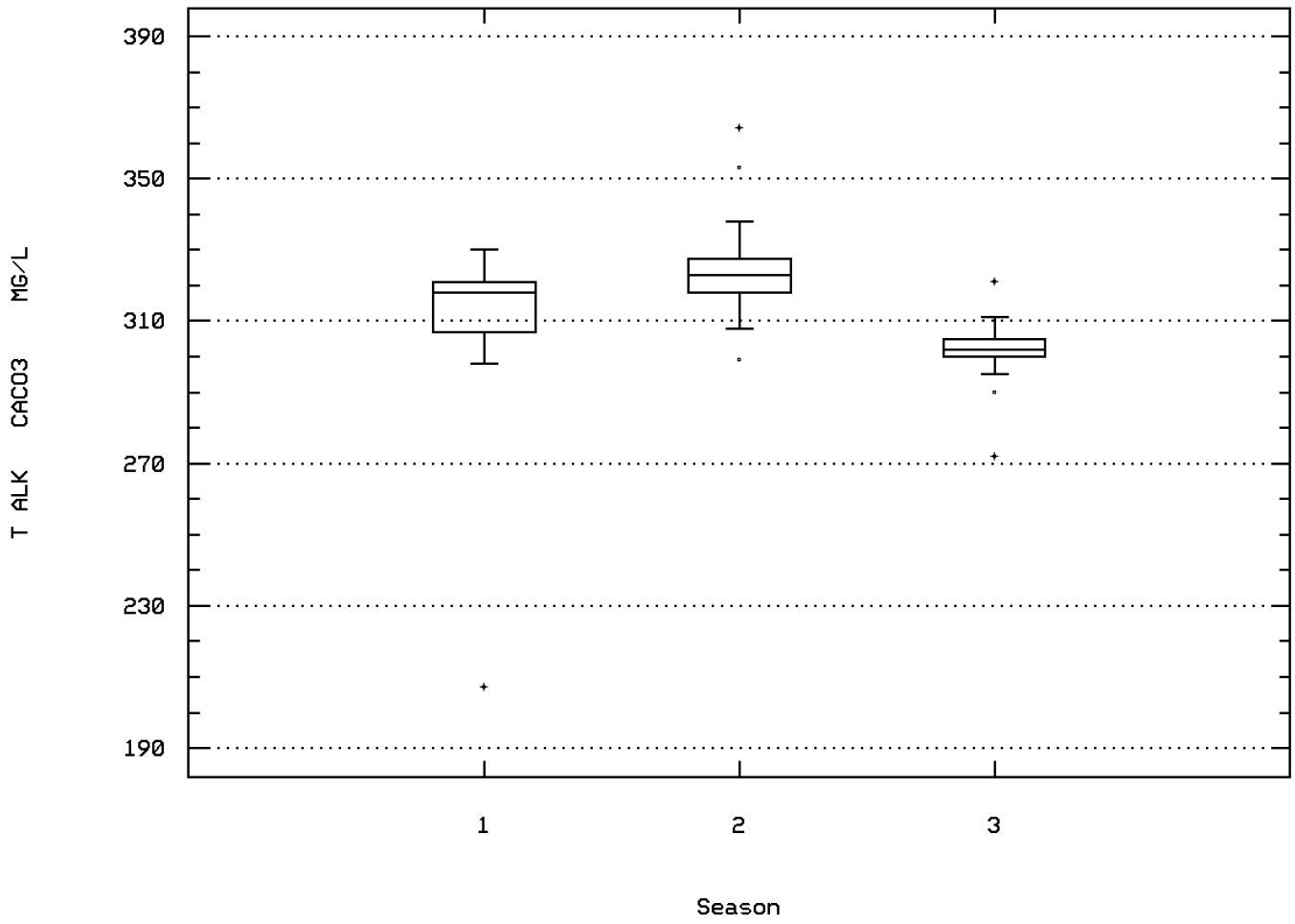
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00410

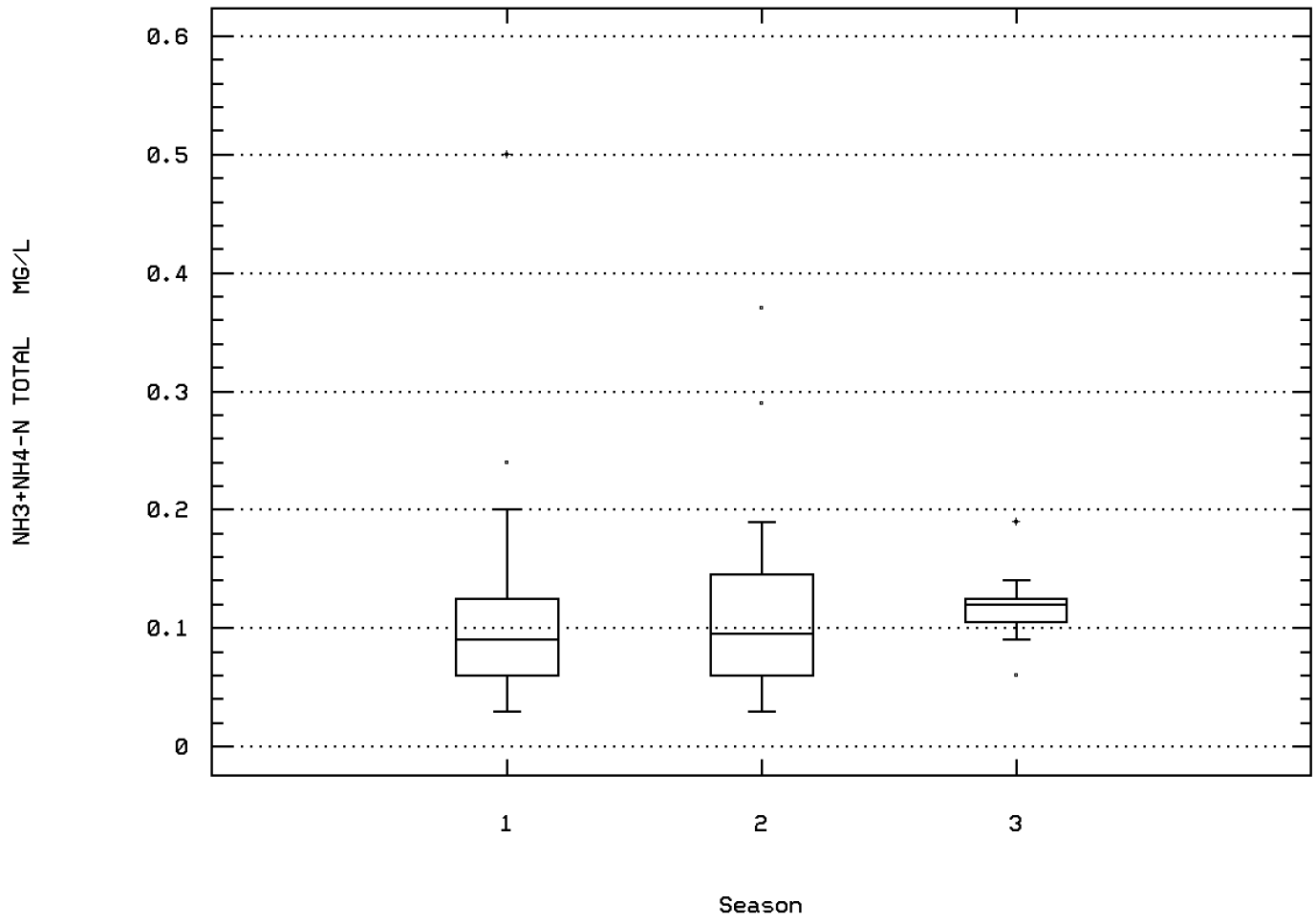
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00610

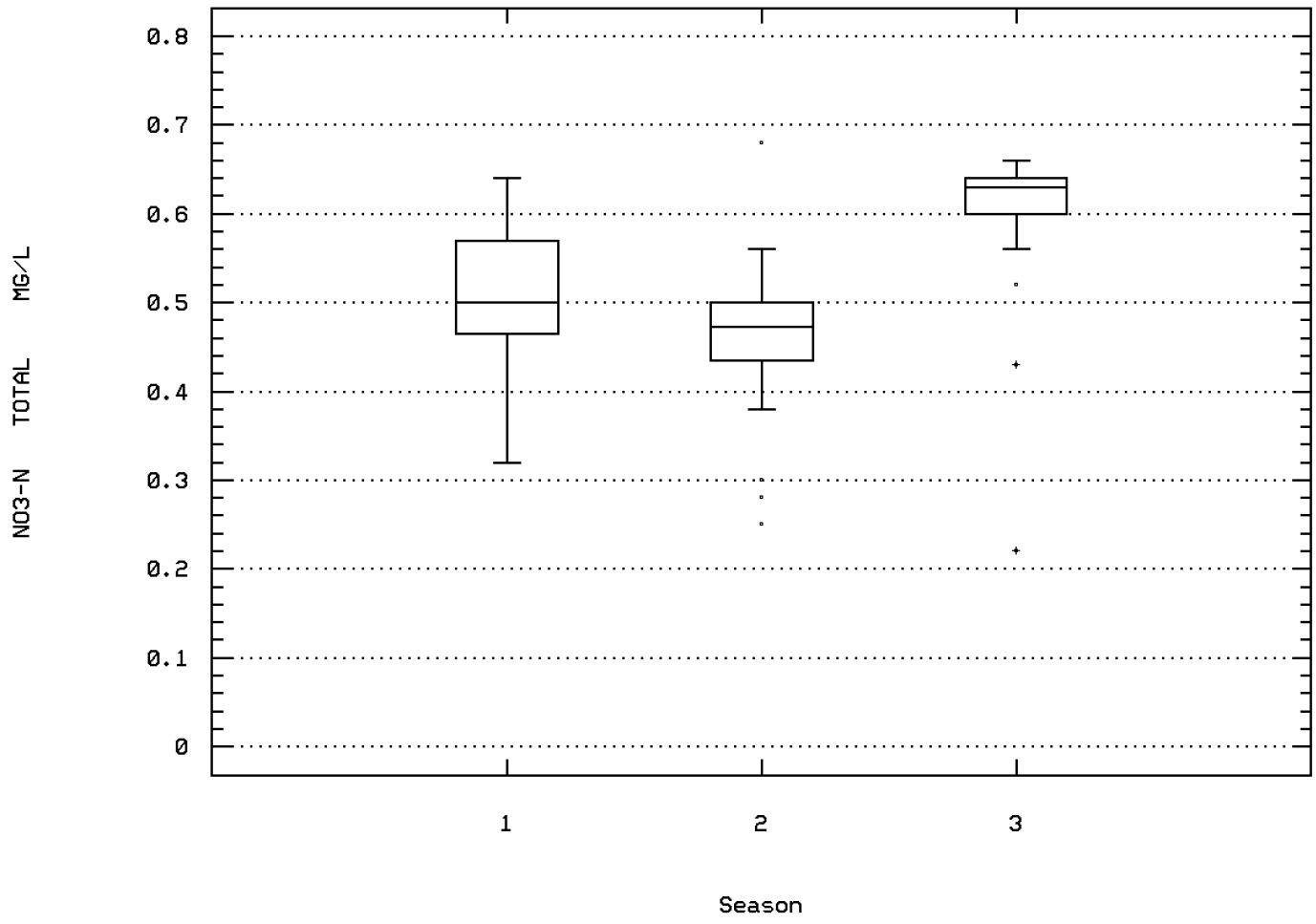
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00620

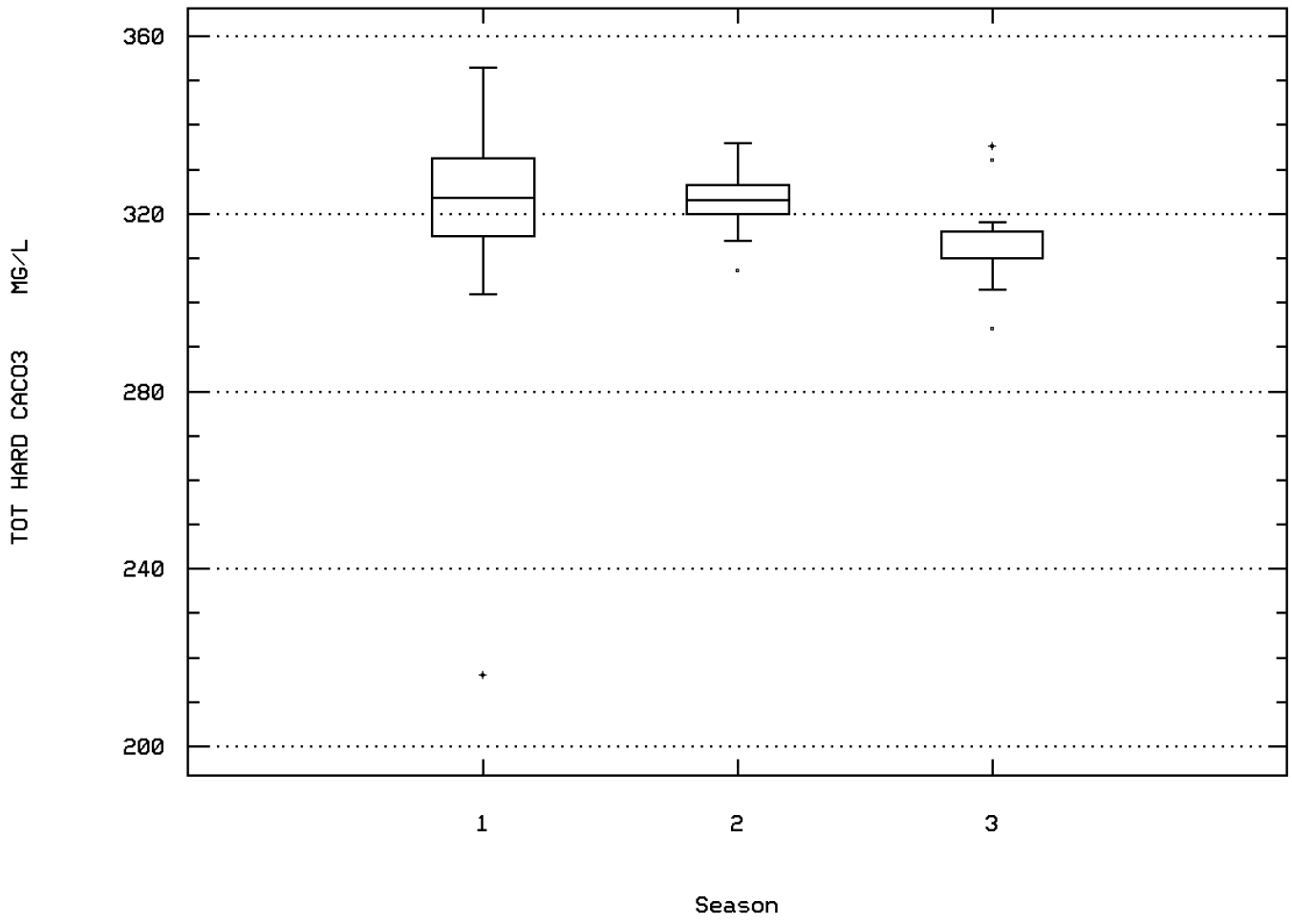
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00900

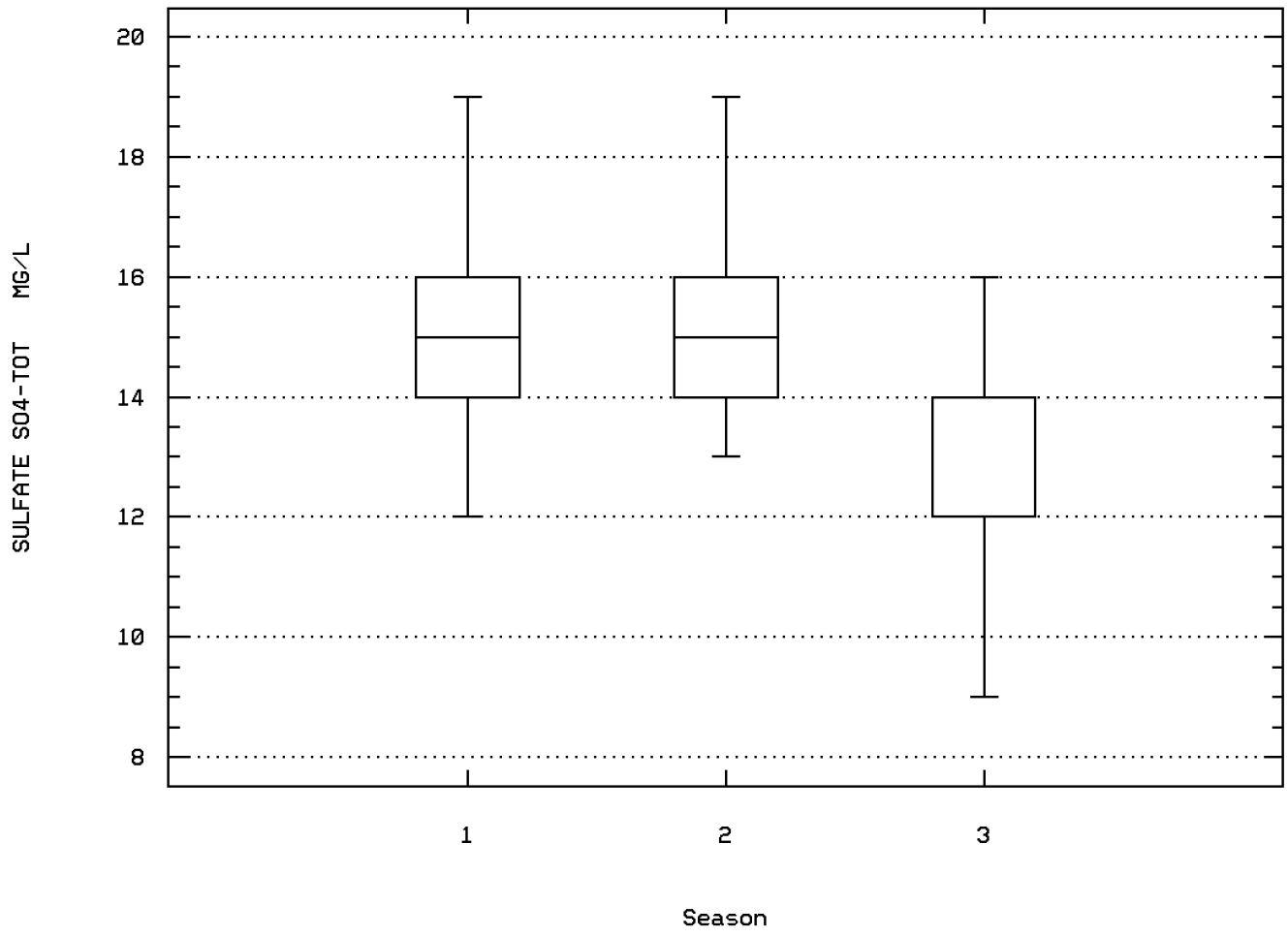
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 00945

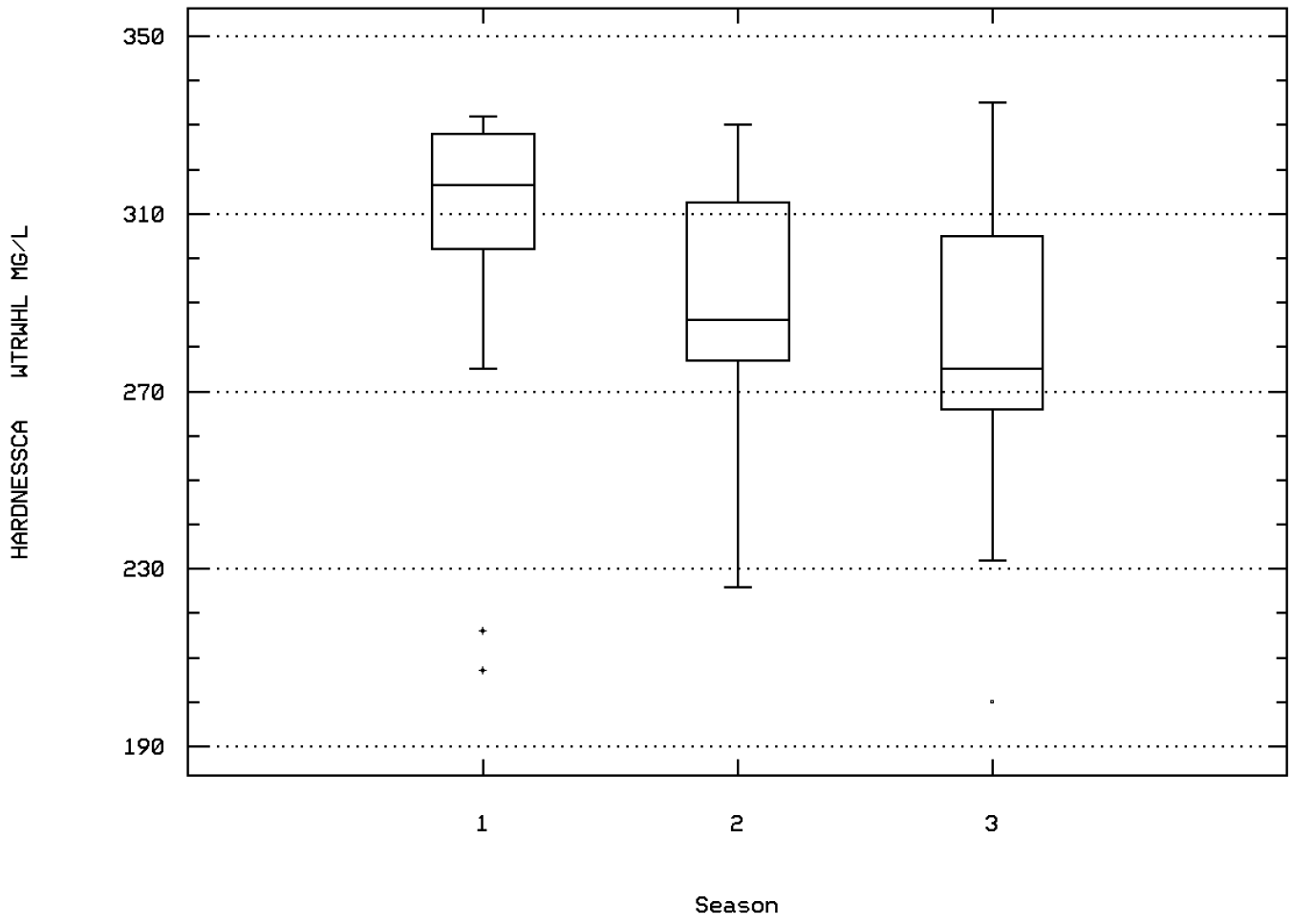
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45634

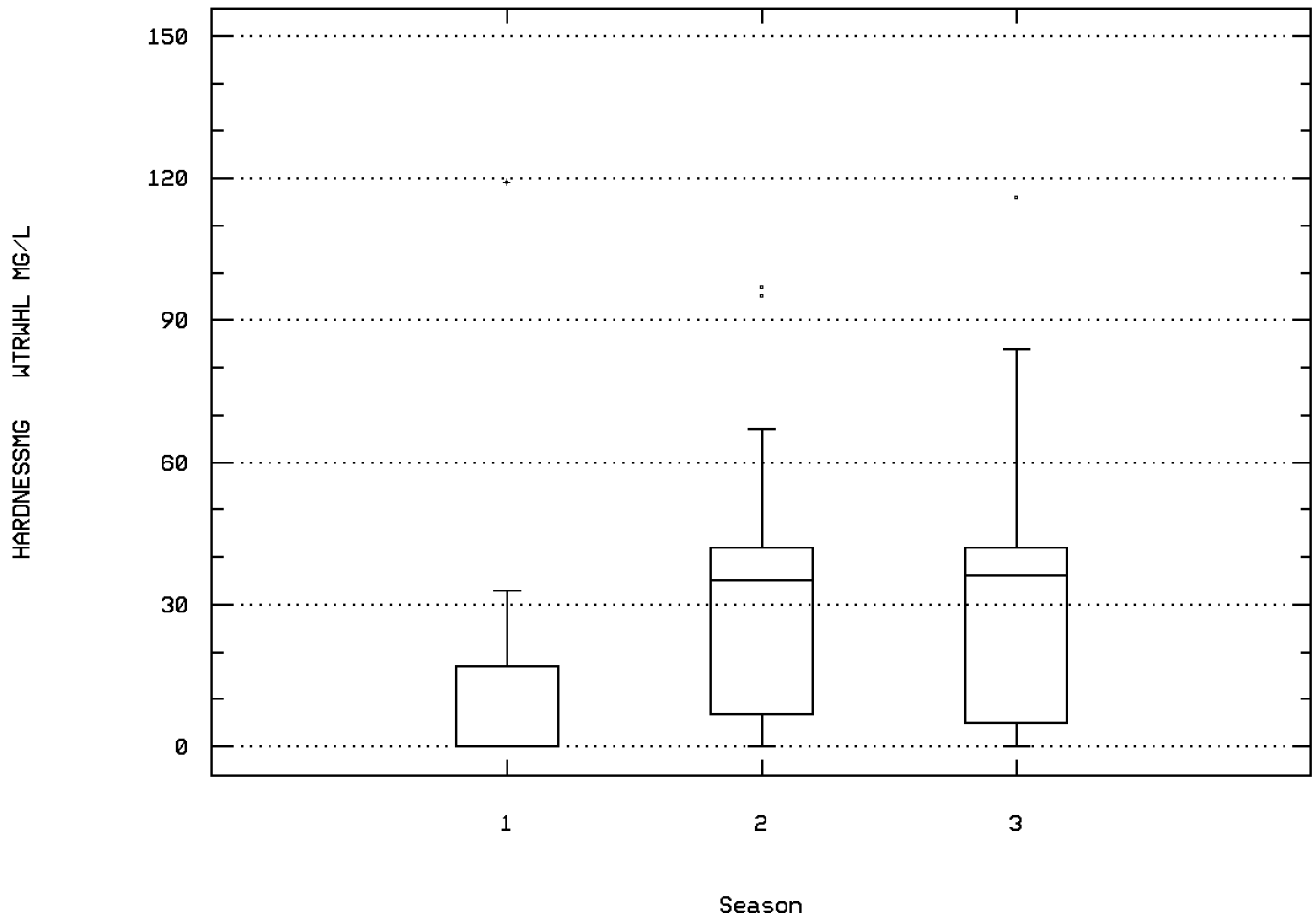
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 45635

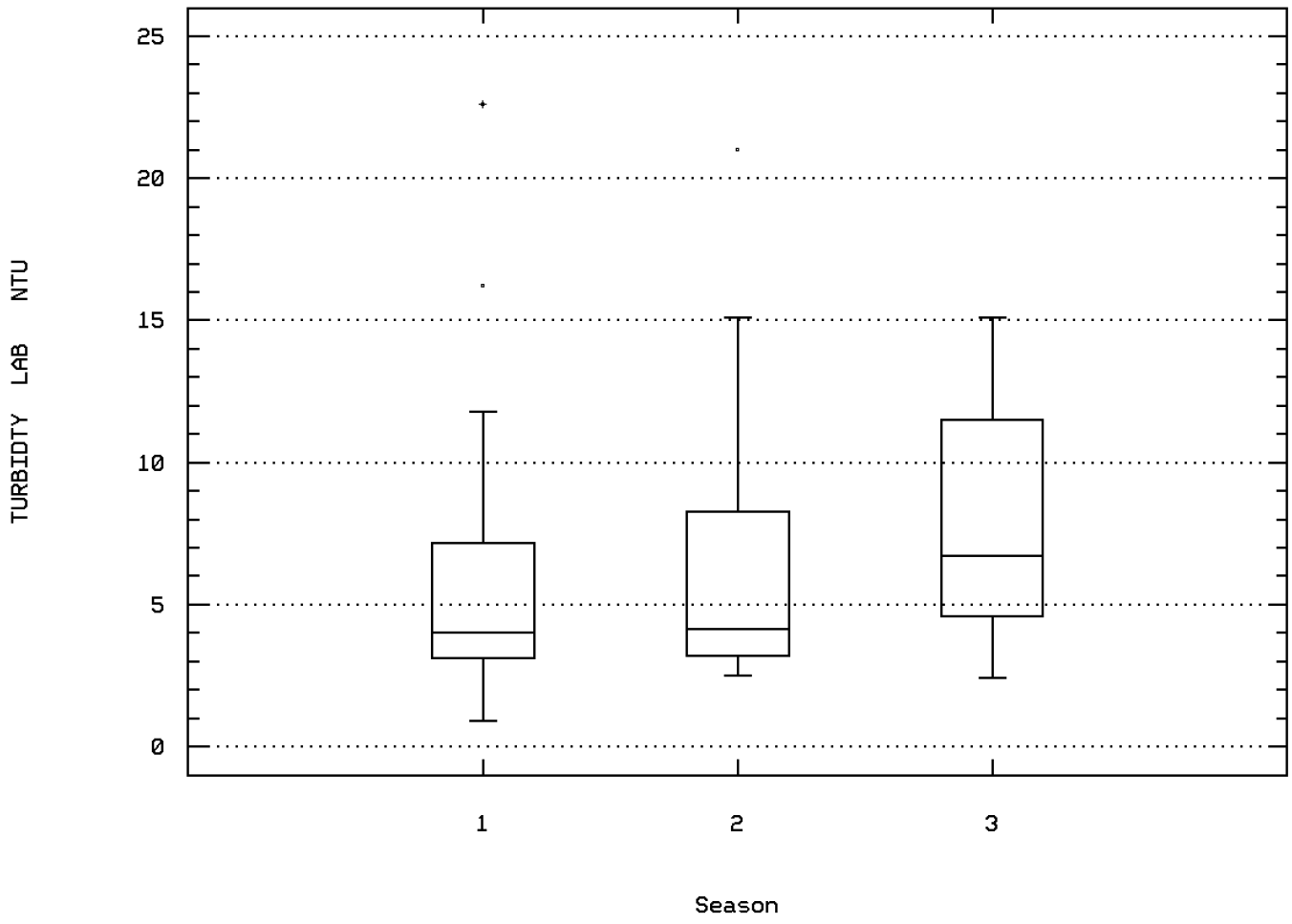
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek Just Below Catfish Farm

Station: CHIC0030 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek Just Below Catfish Farm

Station Inventory for Station: CHIC0031

NPS Station ID: CHIC0031
LAT/LON: 34.434448/ -97.106393
Agency: 112WRD
Date Created: 01/16/79
Location: 02S-02E-33 CBB 1
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 342604097062301
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130303007206.44
RF3 Mile Point: 6.44
Distance from RF3: 0.02
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0031

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/31/78-08/31/78	1	24.	24.	24.	24.	0.	0.	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	08/31/78-08/31/78	1	2.	2.	2.	2.	0.	0.	**	**	**	**
00080	COLOR (PLATINUM-COBALT UNITS)	08/31/78-08/31/78	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/31/78-08/31/78	1	470.	470.	470.	470.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	08/31/78-08/31/78	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/31/78-08/31/78	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/31/78-08/31/78	1	0.008	0.008	0.008	0.008	0.	0.	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	08/31/78-08/31/78	1	3.6	3.6	3.6	3.6	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	1	230.	230.	230.	230.	0.	0.	**	**	**	**
00435	ACIDITY, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	08/31/78-08/31/78	1	280.	280.	280.	280.	0.	0.	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	08/31/78-08/31/78	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	08/31/78-08/31/78	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	08/31/78-08/31/78	1	280.	280.	280.	280.	0.	0.	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	08/31/78-08/31/78	1	47.	47.	47.	47.	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/31/78-08/31/78	1	78.	78.	78.	78.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/31/78-08/31/78	1	20.	20.	20.	20.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	08/31/78-08/31/78	1	3.4	3.4	3.4	3.4	0.	0.	**	**	**	**
00931	SODIUM ADSORPTION RATIO	08/31/78-08/31/78	1	0.1	0.1	0.1	0.1	0.	0.	**	**	**	**
00932	SODIUM, PERCENT	08/31/78-08/31/78	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/31/78-08/31/78	1	0.8	0.8	0.8	0.8	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	08/31/78-08/31/78	1	6.	6.	6.	6.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	08/31/78-08/31/78	1	16.	16.	16.	16.	0.	0.	**	**	**	**
00950	FLUORIDE, DISSOLVED (MG/L AS F)	08/31/78-08/31/78	1	0.1	0.1	0.1	0.1	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	08/31/78-08/31/78	1	8.7	8.7	8.7	8.7	0.	0.	**	**	**	**
01000	ARSENIC, DISSOLVED (UG/L AS AS)	08/31/78-08/31/78	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01025	CADMIUM, DISSOLVED (UG/L AS CD)	08/31/78-08/31/78	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	08/31/78-08/31/78	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	08/31/78-08/31/78	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	08/31/78-08/31/78	1	20.	20.	20.	20.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	08/31/78-08/31/78	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
01056	MANGANESE, DISSOLVED (UG/L AS MN)	08/31/78-08/31/78	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	08/31/78-08/31/78	1	30.	30.	30.	30.	0.	0.	**	**	**	**
01106	ALUMINUM, DISSOLVED (UG/L AS AL)	08/31/78-08/31/78	1	10.	10.	10.	10.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/31/78-08/31/78	1	250.	250.	250.	250.	0.	0.	**	**	**	**
70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	08/31/78-08/31/78	1	271.	271.	271.	271.	0.	0.	**	**	**	**
70302	SOLIDS, DISSOLVED-TONS PER DAY	08/31/78-08/31/78	1	1.05	1.05	1.05	1.05	0.	0.	**	**	**	**
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	08/31/78-08/31/78	1	0.34	0.34	0.34	0.34	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0031

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
71825	ACIDITY, TOTAL (MG/L AS H)	08/31/78-08/31/78	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**
71890	MERCURY, DISSOLVED (UG/L AS HG)	08/31/78-08/31/78	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0031

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00							1	0	0.00			
		Drinking Water	250.	1	0	0.00							1	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00							1	0	0.00			
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	1	0	0.00							1	0	0.00			
01000	ARSENIC, DISSOLVED	Fresh Acute	360.	1	0	0.00							1	0	0.00			
		Drinking Water	50.	1	0	0.00							1	0	0.00			
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	1	0	0.00							1	0	0.00			
		Drinking Water	5.	1	0	0.00							1	0	0.00			
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00							1	0	0.00			
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00							1	0	0.00			
		Drinking Water	1300.	1	0	0.00							1	0	0.00			
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00							1	0	0.00			
		Drinking Water	15.	1	0	0.00							1	0	0.00			
01090	ZINC, DISSOLVED	Fresh Acute	120.	1	0	0.00							1	0	0.00			
		Drinking Water	5000.	1	0	0.00							1	0	0.00			
71890	MERCURY, DISSOLVED	Fresh Acute	2.4	1	0	0.00							1	0	0.00			
		Drinking Water	2.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0032

NPS Station ID: CHIC0032 | LAT/LON: 34.435670/ -97.025726 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: CENTRAL POOL OF ARBUCKLE RESERVOIR | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT | STORET Station ID(s): CHIC_WILHM_A
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 872 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ARBUCKLE RESERVOIR IN THE CENTRAL POOL NEAR THE PUMP WHICH IS BY THE DAM. SAMPLING FOR THIS SITE WAS FROM MAY 1977 THROUGH AUGUST 1977 AND ALL VALUES ARE MEANS OF THREE MEASUREMENTS. FUNDING FOR THIS STUDY WAS PROVIDED BY THE UNITED STATES DEPARTMENT OF THE INTERIOR AND SUPPLEMENTED BY FUNDS FROM THE BUREAU OF RECLAMATION. THE RESULTS OF THE STUDY ARE IN THE 1975 REPORT "EFFECTS OF ARTIFICIAL DESTRATIFICATION ON POPULATIONS OF BENTHIC MACROINVERTEBRATES AND ZOOPLANKTON IN HAM'S LAKE AND ARBUCKLE RESERVOIR" BY JERRY WILHM. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0032

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/09/75-08/08/75	28	21.8	20.929	30.1	12.	22.697	4.764	13.	17.025	24.4	26.11
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	05/09/75-08/08/75	28	389.	378.571	450.	285.	1098.476	33.143	330.9	352.	399.	410.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE MG/L	05/09/75-08/08/75	28	1.75	2.995	8.2	0.05	8.072	2.841	0.05	0.125	5.175	8.
00406	PH, FIELD, STANDARD UNITS SU	05/09/75-08/08/75	28	8.	8.057	8.5	7.4	0.094	0.306	7.59	7.9	8.4	8.5
00406	CONVERTED PH, FIELD, STANDARD UNITS	05/09/75-08/08/75	28	8.	7.951	8.5	7.4	0.105	0.325	7.59	7.9	8.4	8.5
00406	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/09/75-08/08/75	28	0.01	0.011	0.04	0.003	0.	0.009	0.003	0.004	0.013	0.026

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0032

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	23 &	15	0.65				21	15	0.71	2	0	0.00			
00406	PH, FIELD	Other-Hi Lim.	9.	28	0	0.00				21	0	0.00	7	0	0.00			
		Other-Lo Lim.	6.5	28	0	0.00				21	0	0.00	7	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0033

NPS Station ID: CHIC0033 LAT/LON: 34.436615/ -97.026616 Agency: 11NPSWRD Date Created: 09/20/97
Location: ARBUCKLE RESERVOIR NEAR CENTRAL POOL FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_GARTON_2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ARBUCKLE RESERVOIR NEAR THE NORTH EDGE OF THE DAM NEXT TO THE PUMPS THAT WERE USED FOR THE STUDY. SAMPLES WERE TAKEN FROM A DEPTH OF 20 FEET AT THIS STATION. ONLY METALS DATA WERE UPLOADED FOR THIS STUDY BECAUSE ALL OTHER PARAMETERS WERE AVERAGES OF SAMPLES TAKEN FROM SEVERAL DIFFERENT. STATIONS. THE STUDY WAS CONDUCTED BY THE U.S. DEPARTMENT OF INTERIOR- OFFICE OF WATER RESEARCH AND TECHNOLOGY. THE RESULTS ARE IN A 1979 REPORT "LOW ENERGY MECHANICAL DESTRATIFICATION AND REAERATION OF RESERVOIRS" BY JAMES E. GARTON; JERRY WILHM; AND DEBORAH BARKER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0033

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	6	26.2	27.217	33.1	23.1	12.762	3.572	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	5	3800.	3700.4	6500.	2.	6181300.8	2486.222	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	5	6000.	4740.	6400.	1000.	5118000.	2262.3	**	**	**	**
01045	IRON, TOTAL (UG/L AS FE)	05/16/77-11/24/78	12	375.	390.833	660.	200.	24390.152	156.173	206.	262.5	552.5	636.
01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-11/24/78	13	70.	77.692	180.	20.	2269.231	47.636	24.	30.	115.	156.
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-11/24/78	14	446.5	447.143	591.	317.	6317.67	79.484	330.5	378.75	514.75	563.
01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-11/24/78	13	170.	513.846	1880.	20.	354292.308	595.225	28.	65.	1095.	1592.
01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-11/24/78	13	130.	435.385	1320.	10.	274460.256	523.89	14.	35.	1055.	1284.
01090	ZINC, DISSOLVED (UG/L AS ZN)	03/15/78-11/24/78	8	13.5	14.	30.	2.	85.714	9.258	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	03/15/78-11/24/78	8	20.	17.75	32.	3.	115.071	10.727	**	**	**	**
01157	ZINC, TOTAL IN BOTTOM DEPOSITS (MG/KG AS ZN)	03/15/78-11/24/78	8	0.77	0.826	1.28	0.51	0.069	0.263	**	**	**	**
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-11/24/78	14	1.	2.203	11.	0.31	10.626	3.26	0.32	0.515	1.575	9.66

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0033

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01040	COPPER, DISSOLVED	Fresh Acute	18.	5	4	0.80	1	1	1.00	2	1	0.50	2	2	1.00			
		Drinking Water	1300.	5	4	0.80	1	1	1.00	2	1	0.50	2	2	1.00			
01042	COPPER, TOTAL	Fresh Acute	18.	5	5	1.00	1	1	1.00	2	2	1.00	2	2	1.00			
		Drinking Water	1300.	5	4	0.80	1	0	0.00	2	2	1.00	2	2	1.00			
01090	ZINC, DISSOLVED	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
01092	ZINC, TOTAL	Fresh Acute	120.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			
		Drinking Water	5000.	8	0	0.00	3	0	0.00	3	0	0.00	2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0034

NPS Station ID: CHIC0034
LAT/LON: 34.522837/ -96.968032
Agency: 21OK13II
Date Created: / /
Location:
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /AMBNT/STREAM
STORET Station ID(s): 400205
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: LOWER MISSISSIPPI
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
O.G.&E. ARBUCKLE PLANT NEAR DAVIS, OKLA, MURRAY CO. GENERAL DRAINAGE WAT ER FROM PLANT AT DRAIN PIPE BEFORE ENTERING RIVER ABOUT 100 FT. SOUTH OF MAIN GATE.

Parameter Inventory for Station: CHIC0034

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/06/69-05/06/69	1	26.	26.	26.	26.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	05/06/69-05/06/69	1	8100.	8100.	8100.	8100.	0.	0.	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	05/06/69-05/06/69	1	1.3	1.3	1.3	1.3	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	05/06/69-05/06/69	1	9.	9.	9.	9.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	05/06/69-05/06/69	1	8.7	8.7	8.7	8.7	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	05/06/69-05/06/69	1	8.7	8.7	8.7	8.7	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/06/69-05/06/69	1	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C),MG/L	05/06/69-05/06/69	1	5760.	5760.	5760.	5760.	0.	0.	**	**	**	**
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	05/06/69-05/06/69	1	0.8	0.8	0.8	0.8	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	05/06/69-05/06/69	1	0.7	0.7	0.7	0.7	0.	0.	**	**	**	**
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	05/06/69-05/06/69	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	05/06/69-05/06/69	1	2150.	2150.	2150.	2150.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	05/06/69-05/06/69	1	1120.	1120.	1120.	1120.	0.	0.	**	**	**	**
00950	FLUORIDE, DISSOLVED (MG/L AS F)	05/06/69-05/06/69	1	6.8	6.8	6.8	6.8	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	05/06/69-05/06/69	1	24.	24.	24.	24.	0.	0.	**	**	**	**
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	05/06/69-05/06/69	1	0.	0.	0.	0.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	05/06/69-05/06/69	1	20.	20.	20.	20.	0.	0.	**	**	**	**
01045	IRON, TOTAL (UG/L AS FE)	05/06/69-05/06/69	1	180.	180.	180.	180.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	05/06/69-05/06/69	1	0.	0.	0.	0.	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	05/06/69-05/06/69	1	20.	20.	20.	20.	0.	0.	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	05/06/69-05/06/69	1	1.	1.	1.	1.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0034

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0034

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00				1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	1	1.00				1	1	1.00						
		Drinking Water	250.	1	1	1.00				1	1	1.00						
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	1	1.00				1	1	1.00						
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	1	1	1.00				1	1	1.00						
01032	CHROMIUM, HEXAVALENT	Fresh Acute	16.	1	0	0.00				1	0	0.00						
		Drinking Water	100.	1	0	0.00				1	0	0.00						
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	1	1.00				1	1	1.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01090	ZINC, DISSOLVED	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0035

NPS Station ID: CHIC0035
LAT/LON: 34.522837/ -96.968032
Agency: 21OK13II
Date Created: / /
Location:
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /AMBNT/STREAM
STORET Station ID(s): 400206
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: LOWER MISSISSIPPI
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.00
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
O.G.&E. ARBUCKLE PLANT NEAR DAVIS, OKLA, MURRAY CO. END OF DRAINAGE PIPE 50 FT. NORTH OF BRIDGE AT MAIN GATE.

Parameter Inventory for Station: CHIC0035

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	05/06/69-05/06/69	1	22.	22.	22.	22.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	05/06/69-05/06/69	1	8530.	8530.	8530.	8530.	0.	0.	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	05/06/69-05/06/69	1	1.7	1.7	1.7	1.7	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	05/06/69-05/06/69	1	10.	10.	10.	10.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	05/06/69-05/06/69	1	8.5	8.5	8.5	8.5	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	05/06/69-05/06/69	1	8.5	8.5	8.5	8.5	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/06/69-05/06/69	1	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**
00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C),MG/L	05/06/69-05/06/69	1	6140.	6140.	6140.	6140.	0.	0.	**	**	**	**
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	05/06/69-05/06/69	1	0.7	0.7	0.7	0.7	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	05/06/69-05/06/69	1	1.6	1.6	1.6	1.6	0.	0.	**	**	**	**
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	05/06/69-05/06/69	1	0.17	0.17	0.17	0.17	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	05/06/69-05/06/69	1	2300.	2300.	2300.	2300.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	05/06/69-05/06/69	1	1210.	1210.	1210.	1210.	0.	0.	**	**	**	**
00950	FLUORIDE, DISSOLVED (MG/L AS F)	05/06/69-05/06/69	1	3.7	3.7	3.7	3.7	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	05/06/69-05/06/69	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	05/06/69-05/06/69	1	20.	20.	20.	20.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	05/06/69-05/06/69	1	30.	30.	30.	30.	0.	0.	**	**	**	**
01045	IRON, TOTAL (UG/L AS FE)	05/06/69-05/06/69	1	160.	160.	160.	160.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	05/06/69-05/06/69	1	0.	0.	0.	0.	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	05/06/69-05/06/69	1	20.	20.	20.	20.	0.	0.	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	05/06/69-05/06/69	1	1200.	1200.	1200.	1200.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0035

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00				1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	1	1.00				1	1	1.00						
		Drinking Water	250.	1	1	1.00				1	1	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0035

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	1	1.00				1	1	1.00						
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	1	0	0.00				1	0	0.00						
01032	CHROMIUM, HEXAVALENT	Fresh Acute	16.	1	1	1.00				1	1	1.00						
		Drinking Water	100.	1	0	0.00				1	0	0.00						
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	1	1.00				1	1	1.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01090	ZINC, DISSOLVED	Fresh Acute	120.	1	1	1.00				1	1	1.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0036

NPS Station ID: CHIC0036
LAT/LON: 34.437505/ -97.083338
Agency: 21OK13II
Date Created: / /
Location:
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /AMBNT/STREAM
STORET Station ID(s): 400228
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: LOWER MISSISSIPPI
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303008
RF1 Mile Point: 4.760
Distance from RF1: 0.00
On/Off RF1: ON
RF3 Index: 11130303043600.00
RF3 Mile Point: 0.00
Distance from RF3: 0.87
On/Off RF3:
Description:
SEQUOYAH MILLS, DAVIS, OKLA., MURRAY CO. COLLECTED AT POND BELOW STORM SEWER FROM SEQUOYAH MILLS.

Parameter Inventory for Station: CHIC0036

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	12/11/70-12/11/70	1	18.	18.	18.	18.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	12/11/70-12/11/70	1	855.	855.	855.	855.	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	12/11/70-12/11/70	1	16000.	16000.	16000.	16000.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	12/11/70-12/11/70	1	6.9	6.9	6.9	6.9	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	12/11/70-12/11/70	1	6.9	6.9	6.9	6.9	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	12/11/70-12/11/70	1	0.126	0.126	0.126	0.126	0.	0.	**	**	**	**
00500	RESIDUE, TOTAL (MG/L)	12/11/70-12/11/70	1	19200.	19200.	19200.	19200.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	12/11/70-12/11/70	1	100.	100.	100.	100.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	12/11/70-12/11/70	1	69.	69.	69.	69.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0036

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400 PH	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
	Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
	Drinking Water	250.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0037

NPS Station ID: CHIC0037 LAT/LON: 34.445699/ -96.942671 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUCKHORN CREEK 1 MILE SOUTH OF LOWRANCE SPRINGS FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OGS_BUCK_2/1S-3E-24 CDD
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1000 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON BUCKHORN CREEK APPROXIMATELY 3/4 MILE SOUTHEAST OF LOWRANCE LAKE; 1 MILE SOUTH OF LORANCE SPRINGS; AND 1/2 MILE NORTH OF A FISH HATCHERY. SAMPLES FOR THE SITE WERE COLLECTED FEBRUARY 22 1977 AND SEPTEMBER 27 1977 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0037

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/77-09/27/77	2	19.5	19.5	20.	19.	0.5	0.707	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	02/22/77-09/27/77	2	3.5	3.5	5.	2.	4.5	2.121	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/77-09/27/77	2	600.	600.	600.	600.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	02/22/77-09/27/77	2	8.2	8.2	8.3	8.1	0.02	0.141	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	02/22/77-09/27/77	2	8.189	8.189	8.3	8.1	0.02	0.142	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/22/77-09/27/77	2	0.006	0.006	0.008	0.005	0.	0.002	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0037

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	2	0	0.00	2	0	0.00									
		Other-Lo Lim.	6.5	2	0	0.00	2	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0038

NPS Station ID: CHIC0038 LAT/LON: 34.449142/ -96.943115 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUCKHORN CREEK 3/4 MI. SOUTH OF LOWRANCE SPRINGS FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OGS_BUCK_1/1S-3E-25 BAD
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1010 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON BUCKHORN CREEK APPROXIMATELY 1/2 MILE SOUTHEAST OF LOWRANCE LAKE AND 3/4 MILE NORTH OF A FISH HATCHERY. SAMPLES FOR THE SITE WERE COLLECTED AUGUST 22 1977 THROUGH FEBRUARY 14 1979 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0038

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/22/77-02/14/79	2	19.	19.	21.	17.	8.	2.828	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	08/22/77-02/14/79	2	3.	3.	3.	3.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/22/77-02/14/79	2	592.5	592.5	600.	585.	112.5	10.607	**	**	**	**
00400	PH (STANDARD UNITS)	08/22/77-02/14/79	2	8.2	8.2	8.4	8.	0.08	0.283	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/22/77-02/14/79	2	8.155	8.155	8.4	8.	0.084	0.29	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/22/77-02/14/79	2	0.007	0.007	0.01	0.004	0.	0.004	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0038

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400 PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
	Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0039

NPS Station ID: CHIC0039
LAT/LON: 34.449170/ -96.943142
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Buckhorn Creek 0.9m Below Lowrance Springs
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_BUCK2
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 1005
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/24. Station is known as Buckhorn Creek Site 2 and is located on Buckhorn Creek at 0.9 miles below Lowrance Springs (CHIC_BUCK1) on the upstream side of the bridge. This station is about 1 mile above a catfish farm and thus free from impacts from the farm. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	85	15.2	15.706	20.3	9.3	9.677	3.111	11.8	12.6	18.95	19.4
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	85	583.	577.529	661.	296.	3197.943	56.55	516.8	566.5	610.5	635.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	84	8.6	8.462	10.7	4.2	0.866	0.931	7.6	7.9	9.	9.45
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	85	8.2	8.086	8.7	7.1	0.104	0.322	7.62	8.	8.2	8.4
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	85	8.2	7.925	8.7	7.1	0.13	0.361	7.62	8.	8.2	8.4
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	85	0.006	0.012	0.079	0.002	0.	0.015	0.004	0.006	0.01	0.025
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	327.	330.047	490.	239.	593.783	24.368	316.	322.	334.	345.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	85	0.08	0.114	0.7	0.02	0.011	0.107	0.04	0.05	0.13	0.27
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	63	0.002	0.002	0.022	0.	0.	0.003	0.	0.002	0.002	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	85	0.56	0.581	0.86	0.24	0.017	0.131	0.44	0.5	0.68	0.768
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	63	0.17	0.187	0.69	0.04	0.016	0.127	0.054	0.1	0.22	0.34
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	85	336.	331.612	361.	223.	548.026	23.41	316.8	332.	343.	349.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	83	14.	14.94	29.	11.	5.691	2.386	13.	14.	16.	18.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	328.	309.471	361.	201.	1246.466	35.305	259.2	282.	334.	340.
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	85	10.	22.141	123.	0.	862.67	29.371	0.	0.	35.5	71.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	63	0.14	0.254	6.11	0.05	0.572	0.756	0.06	0.1	0.19	0.352
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	85	4.1	5.485	14.8	1.	10.132	3.183	2.3	3.25	7.8	9.9

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

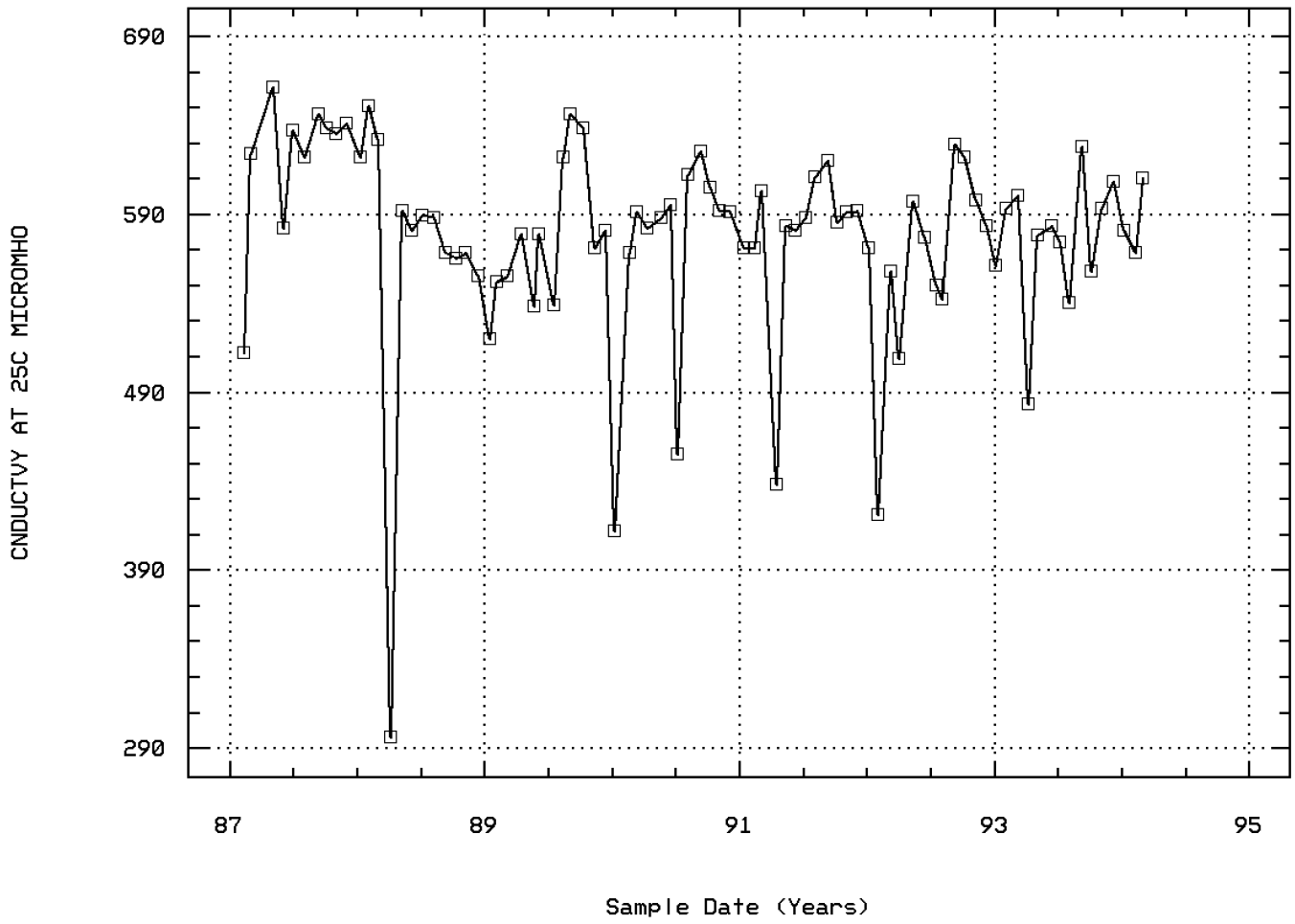
EPA Water Quality Criteria Analysis for Station: CHIC0039

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	84	0	0.00	36	0	0.00	28	0	0.00	20	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
		Other-Lo Lim.	6.5	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	63	0	0.00	26	0	0.00	22	0	0.00	15	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	83	0	0.00	36	0	0.00	27	0	0.00	20	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	85	0	0.00	36	0	0.00	28	0	0.00	21	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station: CHIC0039 Parameter Code: 00095

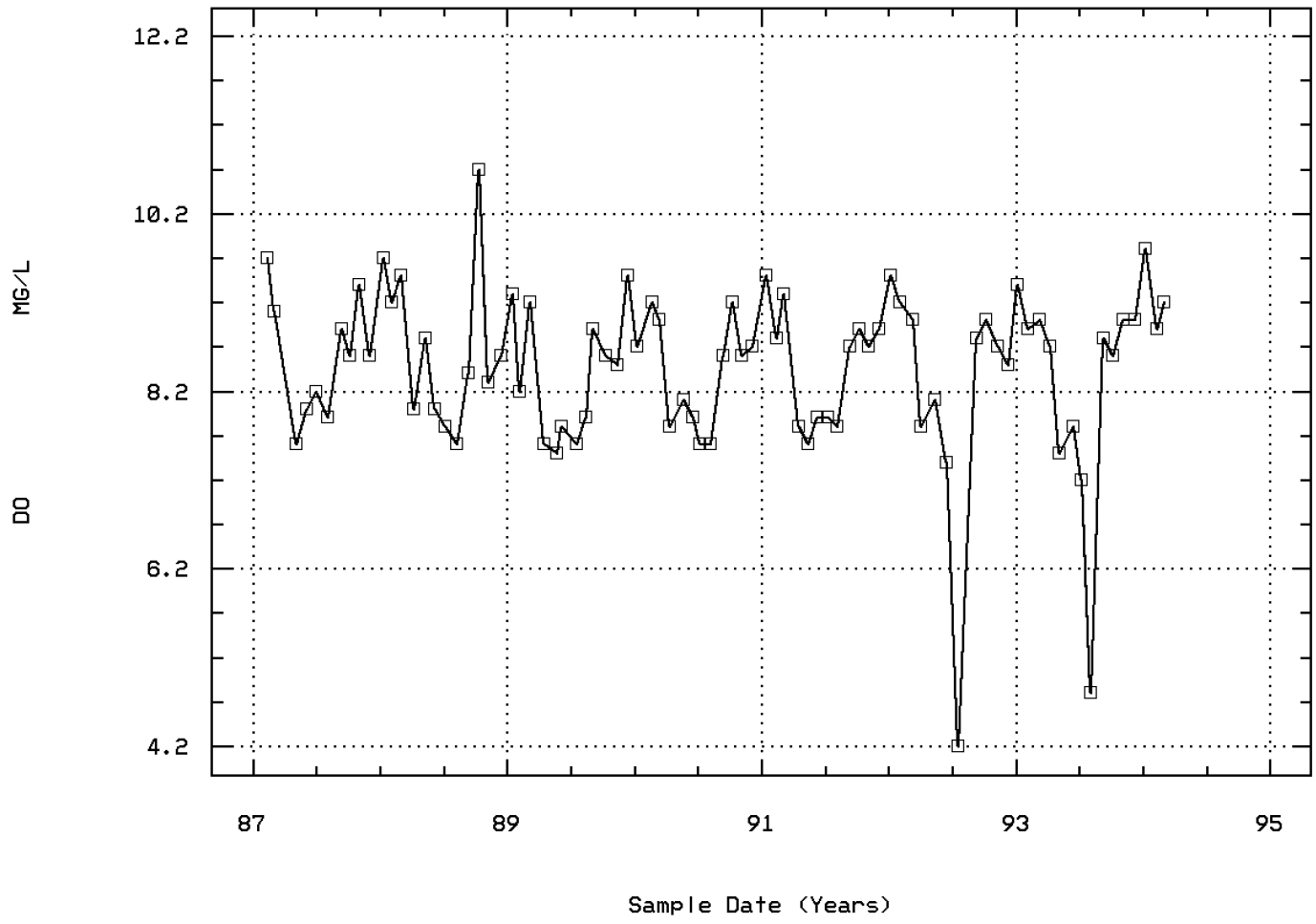
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00300

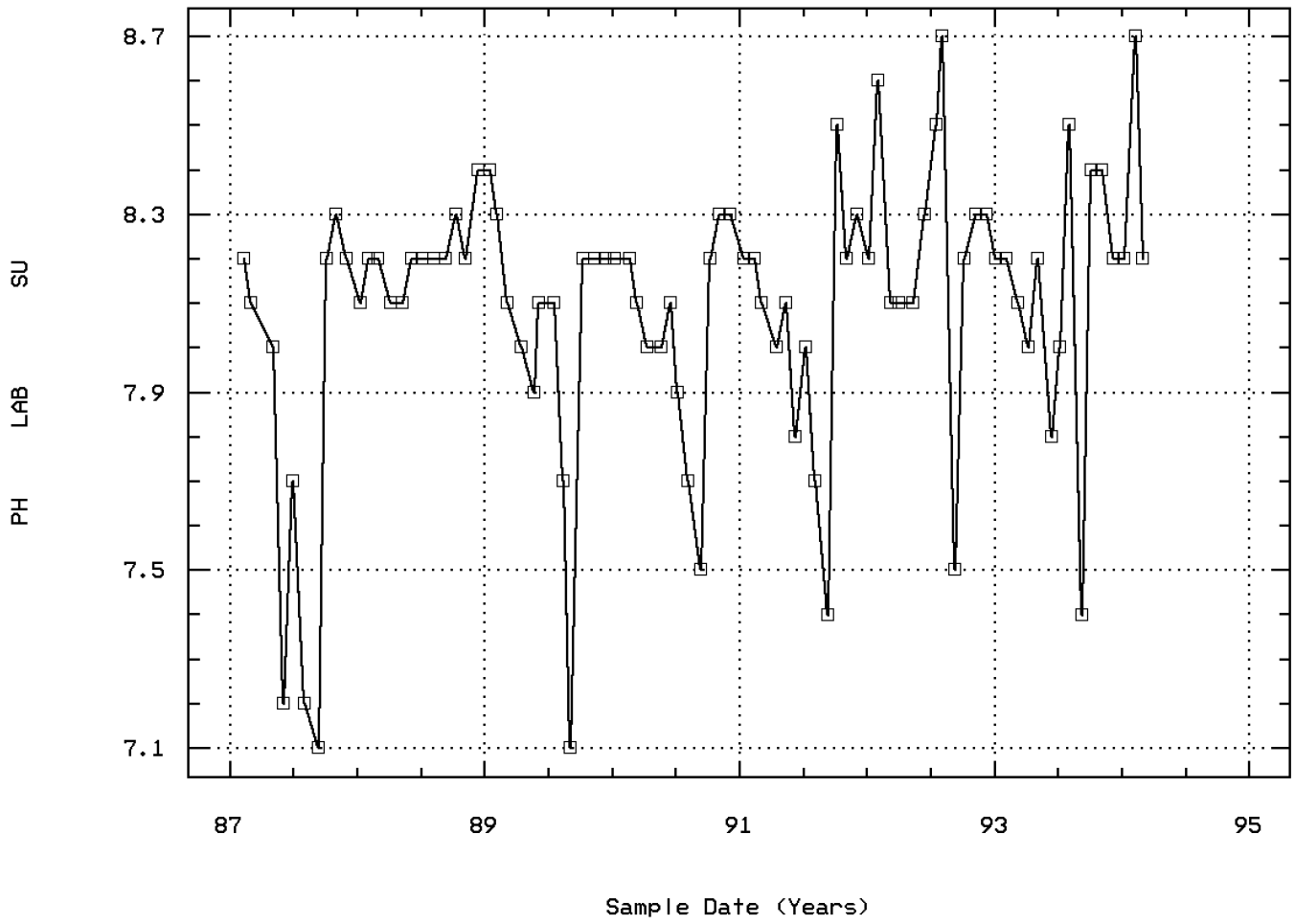
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00403

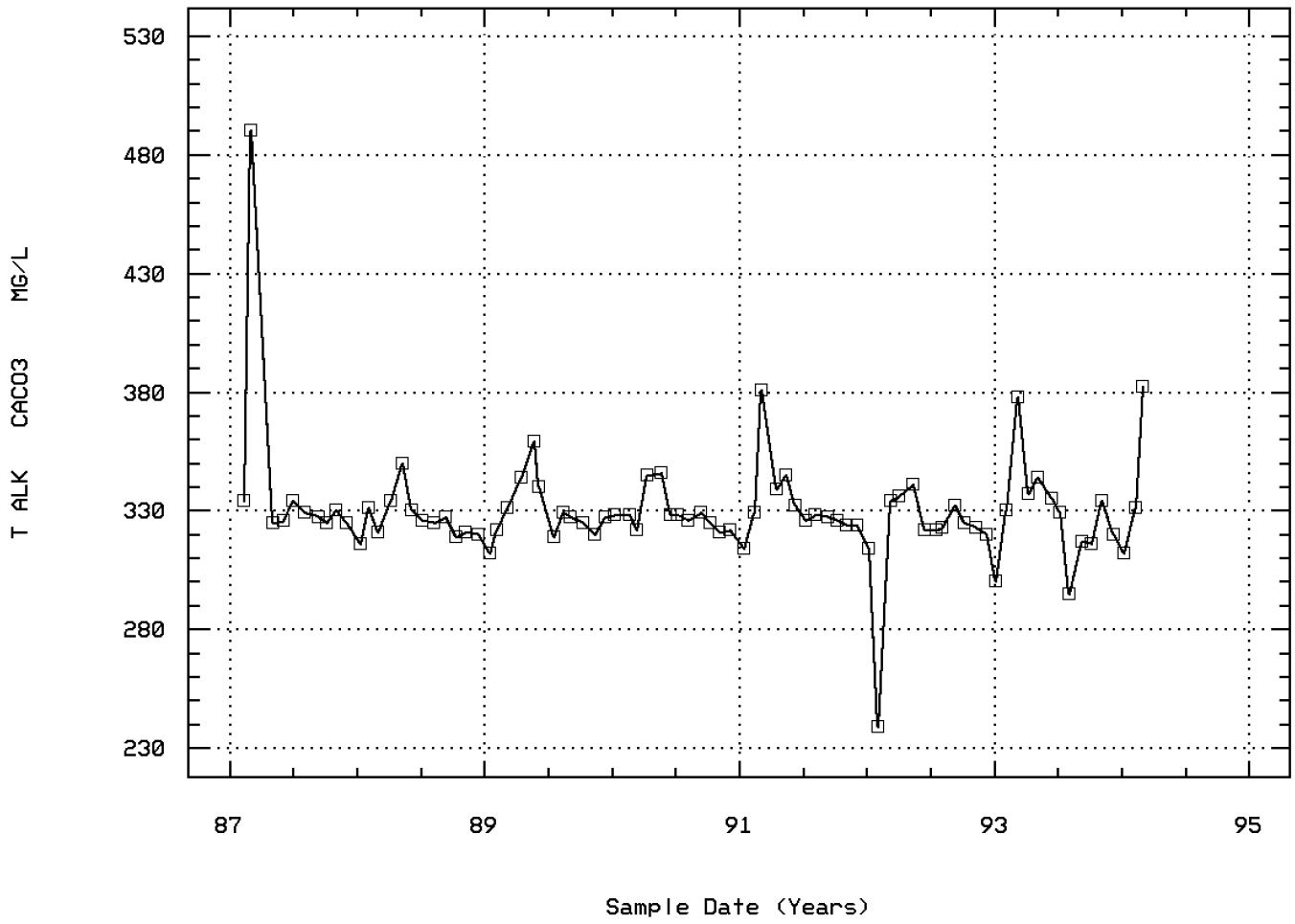
PH, LAB, STANDARD UNITS



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00410

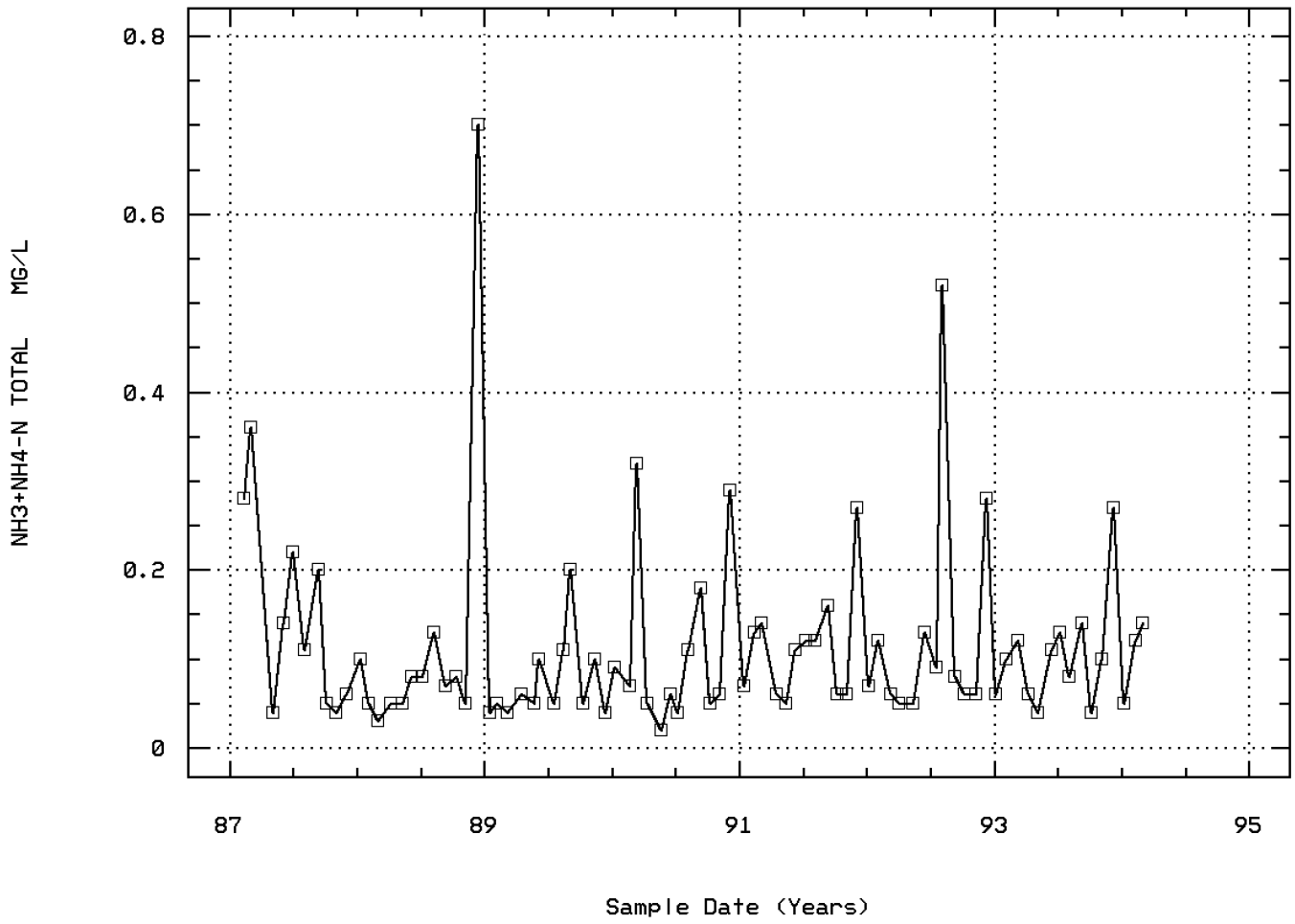
ALKALINITY, TOTAL (MG/L AS CACO3)



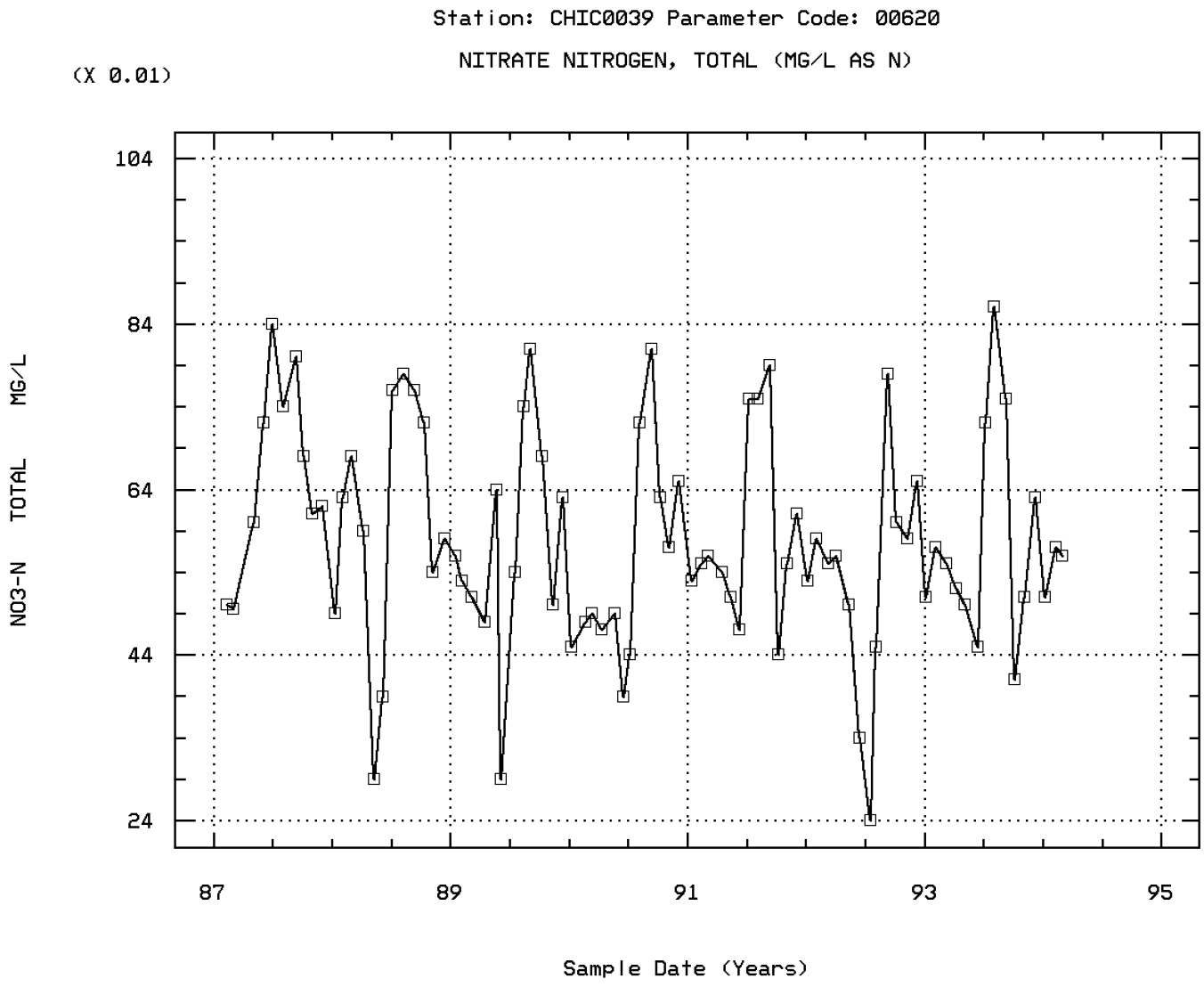
Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00610

NITROGEN, AMMONIA, TOTAL (MG/L AS N)



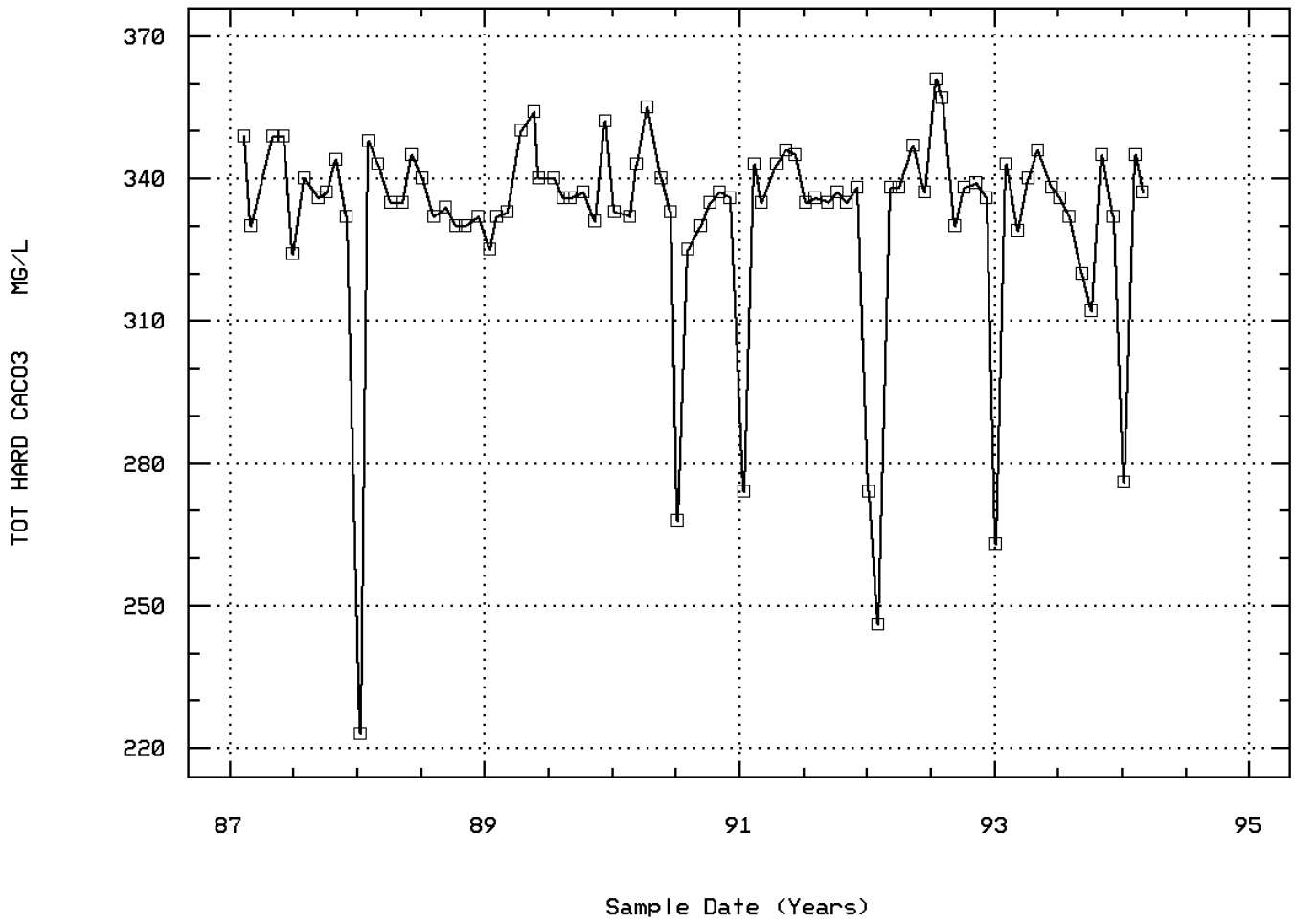
Buckhorn Creek 0.9m Below Lowrance Spri



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00900

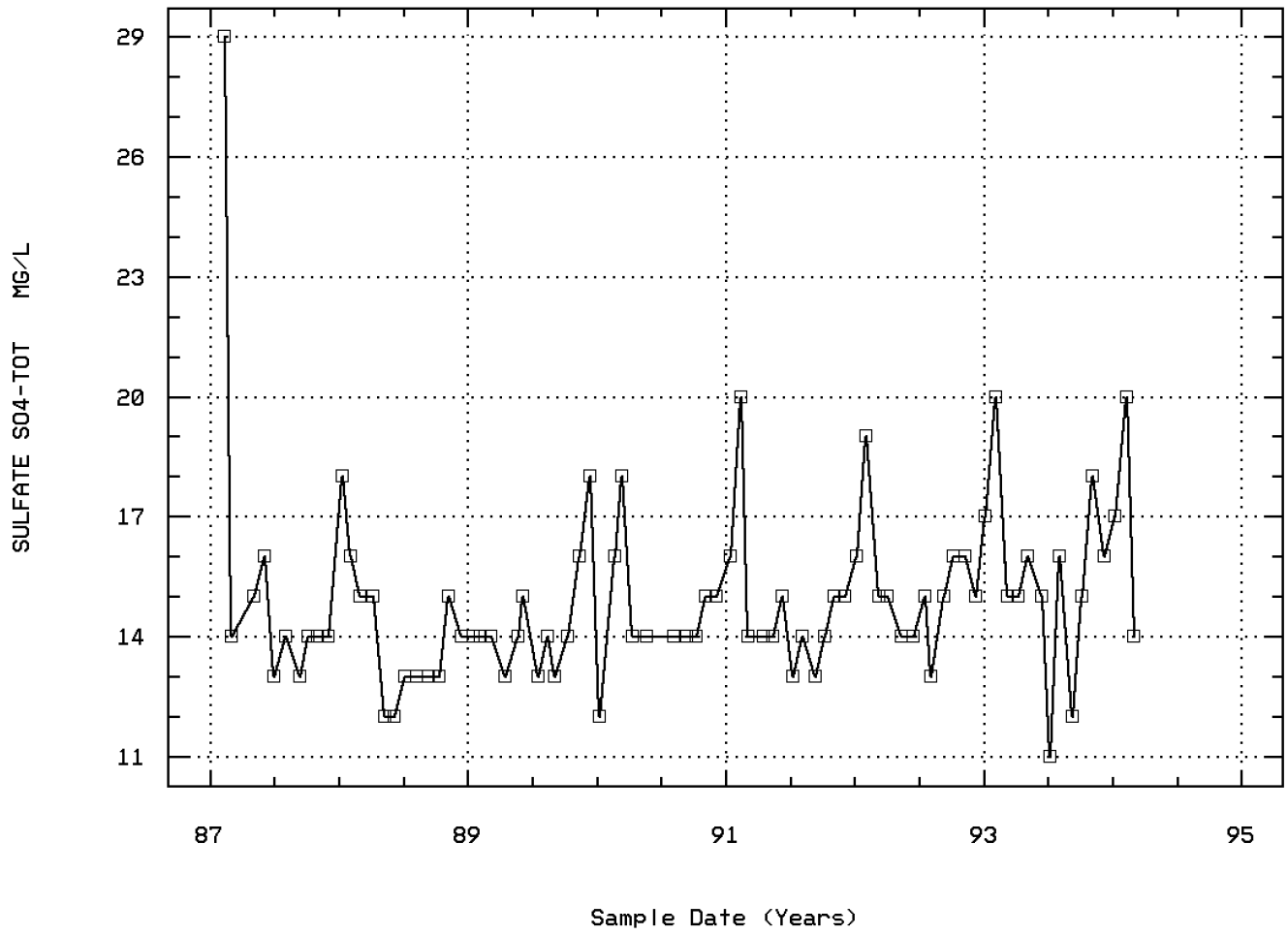
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00945

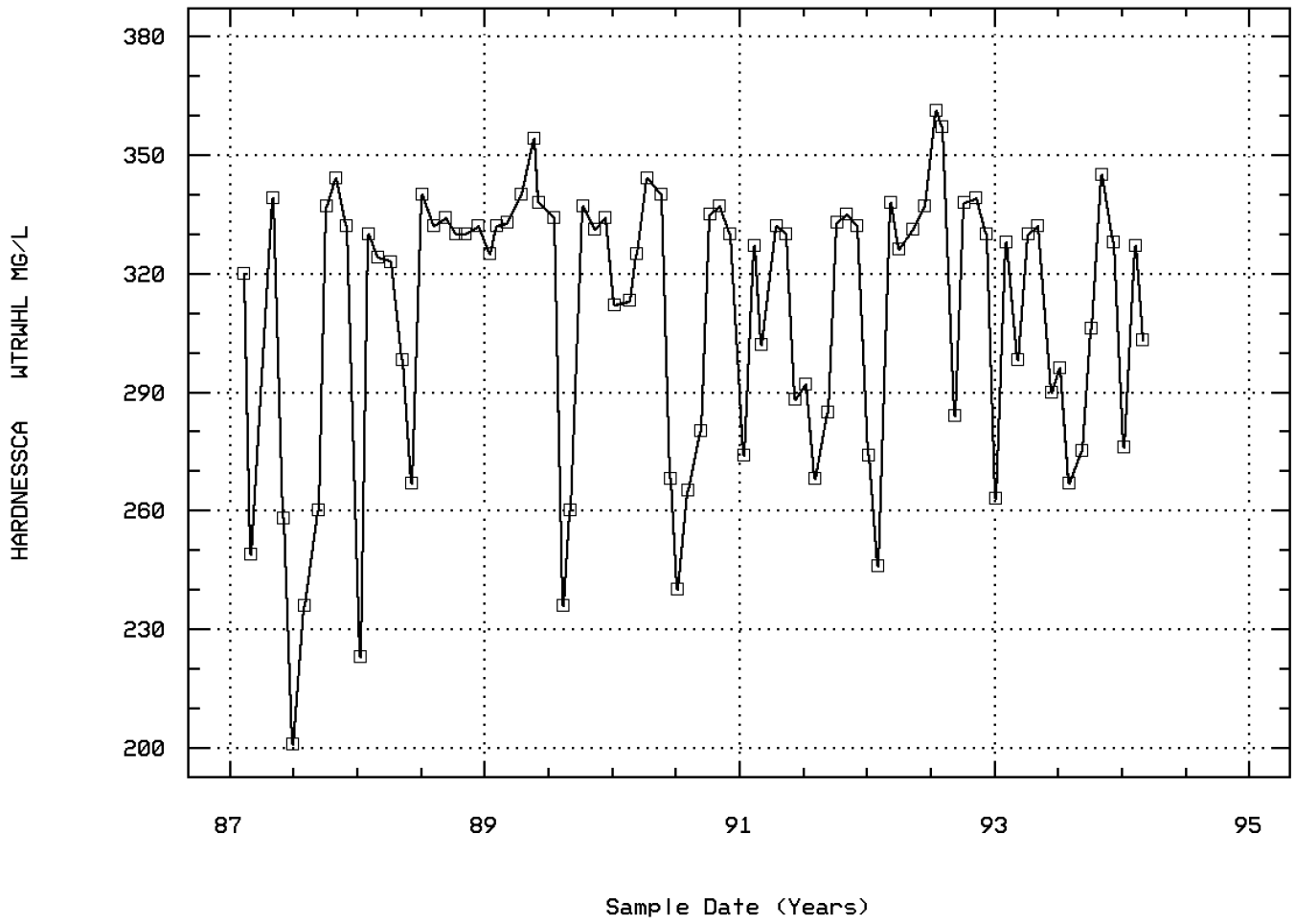
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45634

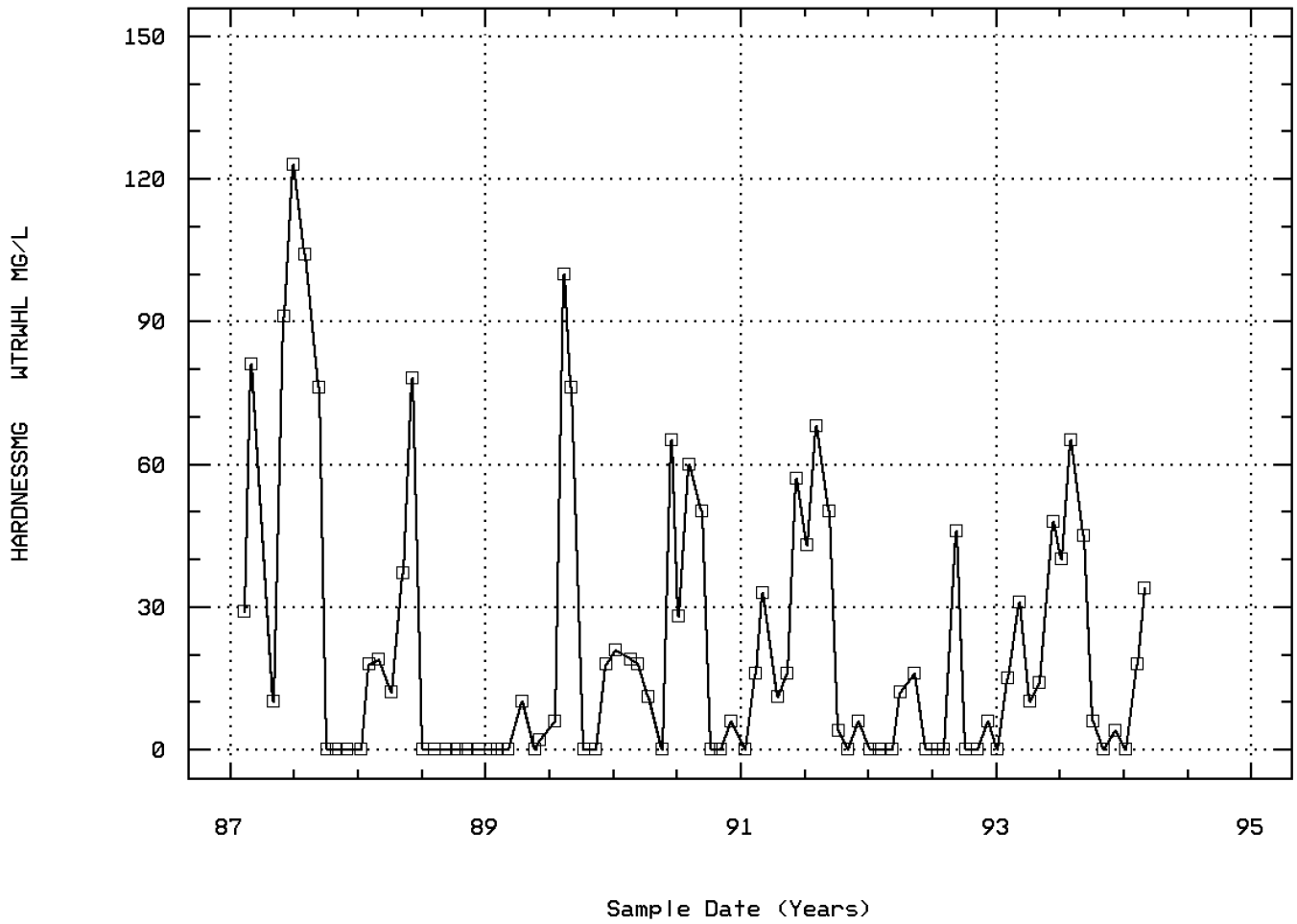
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45635

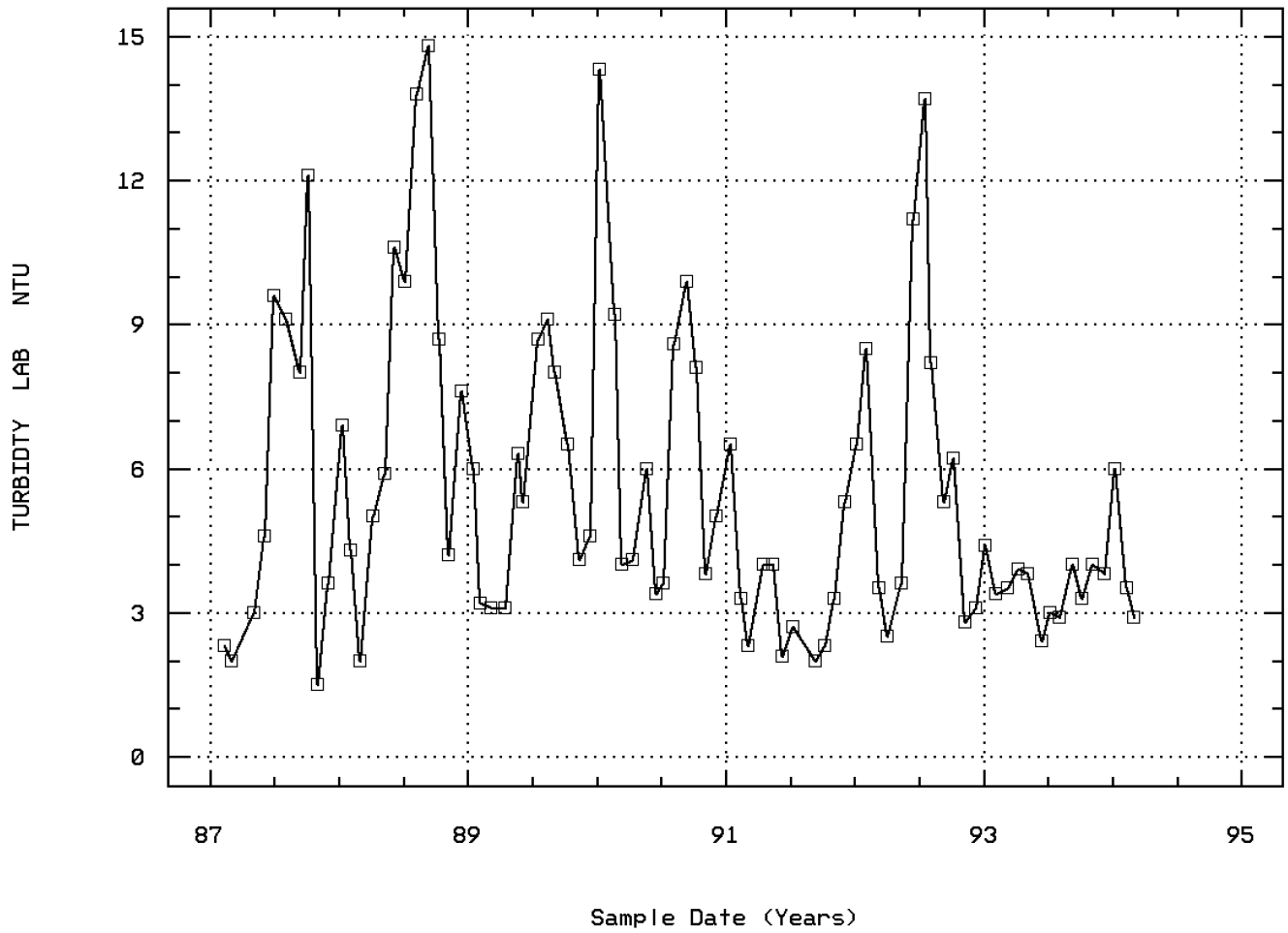
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Lowrance Spri

Annual Analysis for 1987 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	10	16.55	15.99	19.5	11.4	10.359	3.219	11.46	12.3	18.9	19.47
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	10	636.	619.8	661.	512.	1862.622	43.158	519.	612.	642.25	659.5
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	10	8.6	8.6	9.7	7.6	0.467	0.683	7.63	7.975	9.175	9.67
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	10	8.05	7.82	8.3	7.1	0.231	0.48	7.11	7.2	8.2	8.29
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	10	8.047	7.573	8.3	7.1	0.299	0.546	7.11	7.2	8.2	8.29
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	10	0.009	0.027	0.079	0.005	0.001	0.029	0.005	0.006	0.063	0.078
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	328.	344.5	490.	325.	2625.611	51.241	325.	325.	334.	474.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.125	0.15	0.36	0.04	0.012	0.112	0.04	0.048	0.235	0.352
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	10	0.002	0.003	0.022	0.	0.	0.007	0.	0.	0.002	0.02
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	10	0.65	0.661	0.84	0.495	0.014	0.117	0.496	0.575	0.755	0.836
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	10	0.205	0.23	0.46	0.09	0.013	0.115	0.093	0.143	0.318	0.451
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	10	338.5	339.	349.	324.	77.111	8.781	324.6	331.5	349.	349.
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	14.	15.6	29.	13.	22.933	4.789	13.	13.75	15.25	27.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	290.	287.6	344.	201.	2730.489	52.254	204.5	245.75	337.5	343.5
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	10	52.5	51.4	123.	0.	2342.711	48.402	0.	0.	94.25	121.1
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	10	4.1	5.58	12.1	1.5	14.297	3.781	1.55	2.225	9.225	11.85

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	14.7	15.442	19.5	11.5	7.606	2.758	11.71	13.15	18.3	19.41
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	584.5	567.25	651.	296.	8149.295	90.273	373.7	565.75	614.5	645.3
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.5	8.717	10.7	7.6	0.832	0.912	7.66	8.	9.425	10.4
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.2	8.2	8.4	8.1	0.007	0.085	8.1	8.125	8.2	8.37
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.2	8.193	8.4	8.1	0.007	0.086	8.1	8.125	8.2	8.37
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.006	0.006	0.008	0.004	0.	0.001	0.004	0.006	0.008	0.008
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	325.5	326.667	350.	316.	82.97	9.109	316.9	320.25	330.75	345.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.075	0.123	0.7	0.03	0.034	0.184	0.036	0.05	0.095	0.529
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.004	0.001	0.	0.001	0.001	0.002	0.003	0.004
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.61	0.601	0.78	0.29	0.024	0.154	0.32	0.502	0.75	0.774
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.14	0.179	0.51	0.04	0.018	0.134	0.049	0.085	0.223	0.465
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	334.5	327.25	348.	223.	1113.659	33.372	255.1	330.5	342.25	347.1
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	13.5	14.083	18.	12.	3.174	1.782	12.	13.	15.	17.4
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	330.	313.583	340.	223.	1219.72	34.924	236.2	304.25	332.	338.2
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	13.667	78.	0.	549.152	23.434	0.	0.	18.75	65.7
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	7.25	7.808	14.8	2.	15.383	3.922	2.66	4.475	10.425	14.5

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.5	16.025	20.3	10.8	12.862	3.586	11.19	12.525	19.475	20.06
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	575.	576.667	646.	520.	1626.242	40.327	525.4	542.25	611.75	643.6
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.35	8.383	9.5	7.5	0.518	0.72	7.53	7.65	9.125	9.44
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.1	8.025	8.4	7.1	0.118	0.344	7.28	7.925	8.2	8.37
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.1	7.839	8.4	7.1	0.156	0.395	7.28	7.925	8.2	8.37
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.008	0.014	0.079	0.004	0.	0.021	0.004	0.006	0.012	0.062
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	327.	329.583	359.	312.	162.629	12.753	314.1	320.5	337.75	354.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.05	0.074	0.2	0.04	0.002	0.047	0.04	0.043	0.1	0.173
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.005	0.002	0.	0.001	0.002	0.002	0.003	0.004
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.55	0.576	0.81	0.29	0.019	0.136	0.347	0.502	0.67	0.789
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.09	0.156	0.69	0.04	0.032	0.179	0.04	0.053	0.195	0.549

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Annual Analysis for 1989 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	336.5	338.833	354.	325.	80.333	8.963	326.8	332.25	347.5	353.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	14.	14.333	18.	13.	2.061	1.435	13.	13.25	14.75	17.4
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	333.5	321.167	354.	236.	1241.788	35.239	243.2	326.5	337.75	349.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	1.	17.667	100.	0.	1135.879	33.703	0.	0.	16.	92.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.125	0.168	0.42	0.05	0.014	0.118	0.05	0.1	0.195	0.408
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	5.65	5.667	9.1	3.1	4.602	2.145	3.1	3.425	7.625	8.98

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Annual Analysis for 1990 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.25	16.192	19.4	12.3	7.886	2.808	12.42	13.55	19.175	19.4
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	591.	568.	625.	412.	4238.	65.1	424.9	571.5	602.5	621.1
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.6	8.417	9.2	7.6	0.352	0.594	7.6	7.825	8.925	9.2
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.1	8.042	8.3	7.5	0.059	0.243	7.56	7.925	8.2	8.3
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.1	7.969	8.3	7.5	0.065	0.255	7.56	7.925	8.2	8.3
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.008	0.011	0.032	0.005	0.	0.008	0.005	0.006	0.012	0.028
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	328.	329.	346.	321.	66.909	8.18	321.3	322.75	328.75	345.7
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.065	0.112	0.32	0.02	0.01	0.099	0.026	0.05	0.163	0.311
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.003	0.	0.	0.001	0.	0.001	0.003	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.49	0.549	0.81	0.39	0.016	0.128	0.405	0.455	0.645	0.783
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.19	0.217	0.58	0.07	0.018	0.134	0.079	0.125	0.265	0.49
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	334.	330.583	355.	268.	444.629	21.086	285.1	330.5	339.25	351.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	10	14.	14.6	18.	12.	2.489	1.578	12.2	14.	15.25	17.8
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	319.	307.417	344.	240.	1232.447	35.106	247.5	271.	336.5	342.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	18.5	23.167	65.	0.	541.061	23.261	0.	1.5	44.5	63.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.13	0.139	0.31	0.05	0.006	0.078	0.053	0.073	0.178	0.286
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	5.5	6.667	14.3	3.4	11.468	3.386	3.46	3.85	9.05	12.98

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.45	15.917	19.4	11.1	10.205	3.195	11.49	12.5	19.05	19.37
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	586.5	577.833	620.	438.	2156.697	46.44	477.9	573.5	600.25	617.3
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.7	8.483	9.5	7.6	0.422	0.649	7.66	7.825	8.9	9.44
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.1	8.042	8.5	7.4	0.086	0.294	7.49	7.85	8.2	8.44
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.1	7.937	8.5	7.4	0.098	0.313	7.49	7.85	8.2	8.44
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.008	0.012	0.04	0.003	0.	0.01	0.004	0.006	0.014	0.034
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	327.5	332.917	381.	314.	289.356	17.01	317.	324.5	337.25	370.2
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.115	0.113	0.27	0.05	0.004	0.062	0.053	0.06	0.138	0.237
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	12	0.002	0.002	0.002	0.001	0.	0.001	0.001	0.001	0.002	0.002
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.55	0.588	0.79	0.44	0.013	0.115	0.449	0.515	0.715	0.778
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	12	0.18	0.185	0.31	0.05	0.005	0.074	0.068	0.125	0.243	0.301
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	336.5	333.5	346.	274.	368.818	19.205	292.3	335.	343.	345.7
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	14.	14.75	20.	13.	3.477	1.865	13.	14.	15.	18.8
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	314.5	308.167	335.	268.	666.152	25.81	269.8	285.75	332.	334.4
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	16.	25.333	68.	0.	572.242	23.922	0.	4.5	48.25	64.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.155	0.669	6.11	0.05	2.949	1.717	0.053	0.103	0.335	4.403
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	3.	3.233	6.5	1.	2.359	1.536	1.3	2.15	4.	6.14

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.35	15.5	19.6	9.3	13.105	3.62	9.87	12.525	18.9	19.57
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	574.	563.083	629.	421.	3144.811	56.079	447.4	544.	597.75	626.9
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	11	8.7	8.2	9.5	4.2	2.148	1.466	4.84	7.8	9.	9.44
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.25	8.242	8.7	7.5	0.094	0.306	7.68	8.1	8.45	8.67
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.247	8.121	8.7	7.5	0.109	0.331	7.68	8.1	8.45	8.67
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.006	0.008	0.032	0.002	0.	0.008	0.002	0.004	0.008	0.025
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	323.	319.25	341.	239.	698.023	26.42	261.5	320.5	333.5	339.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.075	0.131	0.52	0.05	0.019	0.138	0.05	0.06	0.128	0.448
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/10/87-05/12/92	5	0.002	0.002	0.003	0.002	0.	0.	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.555	0.53	0.78	0.24	0.02	0.14	0.27	0.463	0.595	0.741
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	02/10/87-05/12/92	5	0.12	0.13	0.19	0.05	0.003	0.054	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	338.	328.417	361.	246.	1136.265	33.709	254.4	331.5	345.	359.8
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	15.	15.25	19.	13.	2.205	1.485	13.3	14.25	16.	18.1
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	334.	321.75	361.	246.	1223.295	34.976	254.4	294.5	338.75	359.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	0.	6.667	46.	0.	183.515	13.547	0.	0.	10.5	37.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.115	0.172	0.51	0.05	0.016	0.127	0.062	0.1	0.215	0.447
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	5.75	6.258	13.7	2.5	12.755	3.571	2.59	3.2	8.425	12.95

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	12	16.05	15.717	19.2	10.9	10.111	3.18	11.26	12.4	18.875	19.14
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	12	580.5	574.917	628.	483.	1401.72	37.44	500.1	558.75	598.25	622.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	12	8.75	8.225	9.4	4.8	1.62	1.273	5.52	7.575	9.	9.28
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	12	8.2	8.117	8.5	7.4	0.089	0.298	7.52	8.	8.35	8.47
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	12	8.2	8.	8.5	7.4	0.104	0.322	7.52	8.	8.35	8.47
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	12	0.006	0.01	0.04	0.003	0.	0.01	0.003	0.005	0.01	0.033
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	329.5	327.917	378.	295.	466.265	21.593	296.5	316.25	336.5	367.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.1	0.104	0.27	0.04	0.004	0.062	0.04	0.06	0.128	0.231
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	12	0.535	0.582	0.86	0.41	0.018	0.133	0.422	0.502	0.698	0.827
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	12	334.	328.	346.	263.	520.364	22.811	277.7	322.25	342.25	345.7
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	12	15.5	15.5	20.	11.	5.727	2.393	11.3	15.	16.75	19.4
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	302.	304.833	345.	263.	770.515	27.758	264.2	278.75	329.5	341.1
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	12	14.5	23.167	65.	0.	477.061	21.842	0.	4.5	43.75	59.9
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	12	0.145	0.158	0.3	0.08	0.005	0.073	0.083	0.1	0.188	0.297
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	12	3.65	3.533	4.4	2.4	0.319	0.565	2.55	3.075	3.975	4.28

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	3	12.3	12.533	13.9	11.4	1.603	1.266	**	**	**	**
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	3	581.	586.333	610.	568.	462.333	21.502	**	**	**	**
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	3	9.2	9.3	9.8	8.9	0.21	0.458	**	**	**	**
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	3	8.2	8.367	8.7	8.2	0.083	0.289	**	**	**	**
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	3	8.2	8.312	8.7	8.2	0.088	0.296	**	**	**	**
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	3	0.006	0.005	0.006	0.002	0.	0.002	**	**	**	**
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	331.	341.667	382.	312.	1310.333	36.199	**	**	**	**
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.12	0.103	0.14	0.05	0.002	0.047	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	3	0.56	0.547	0.57	0.51	0.001	0.032	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	3	337.	319.333	345.	276.	1424.333	37.74	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	3	17.	17.	20.	14.	9.	3.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

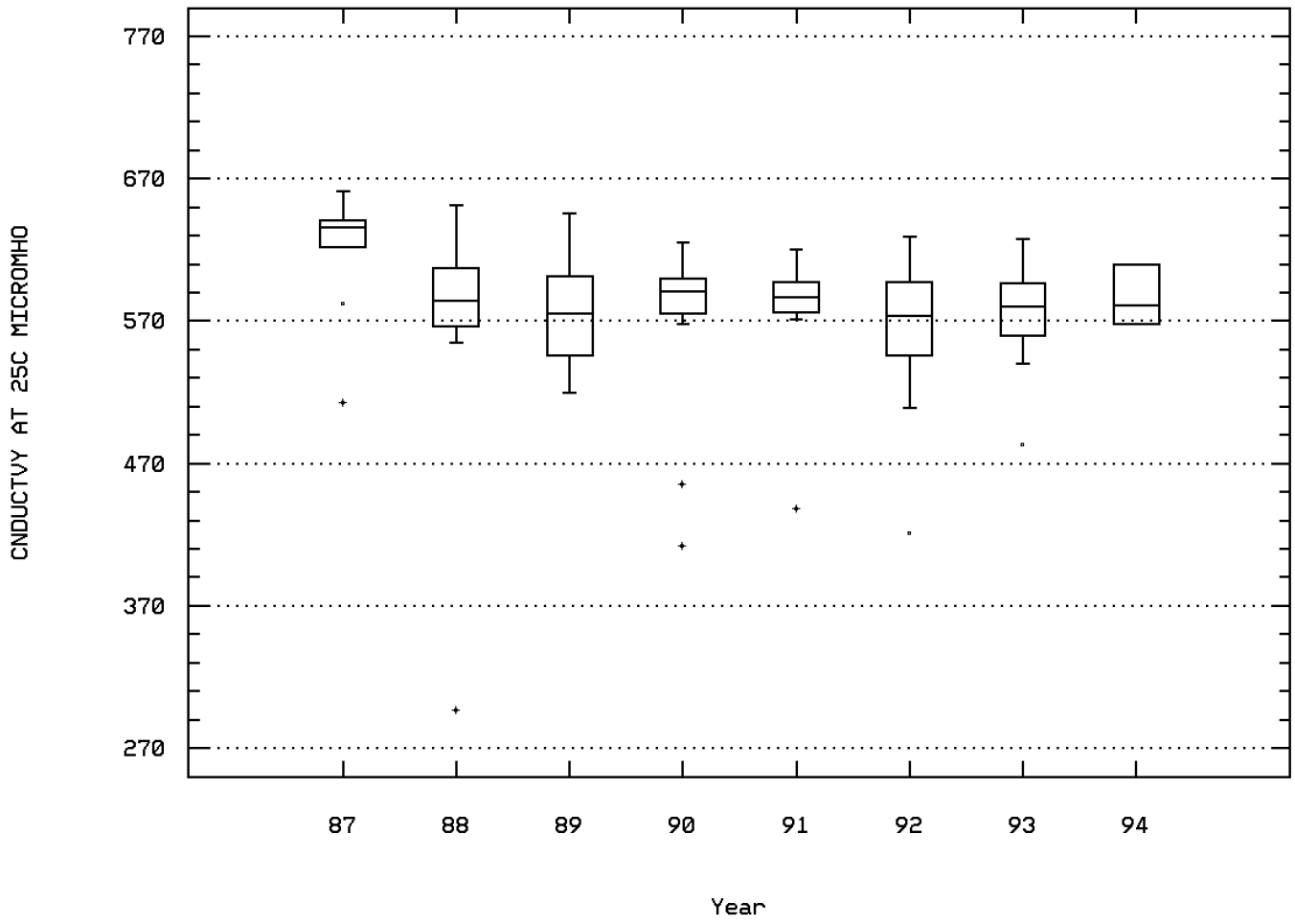
Annual Analysis for 1994 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	303.	302.	327.	276.	651.	25.515	**	**	**	**
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	3	18.	17.333	34.	0.	289.333	17.01	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/17/89-03/02/94	3	0.12	0.123	0.16	0.09	0.001	0.035	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	3	3.5	4.133	6.	2.9	2.703	1.644	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0039 Parameter Code: 00095

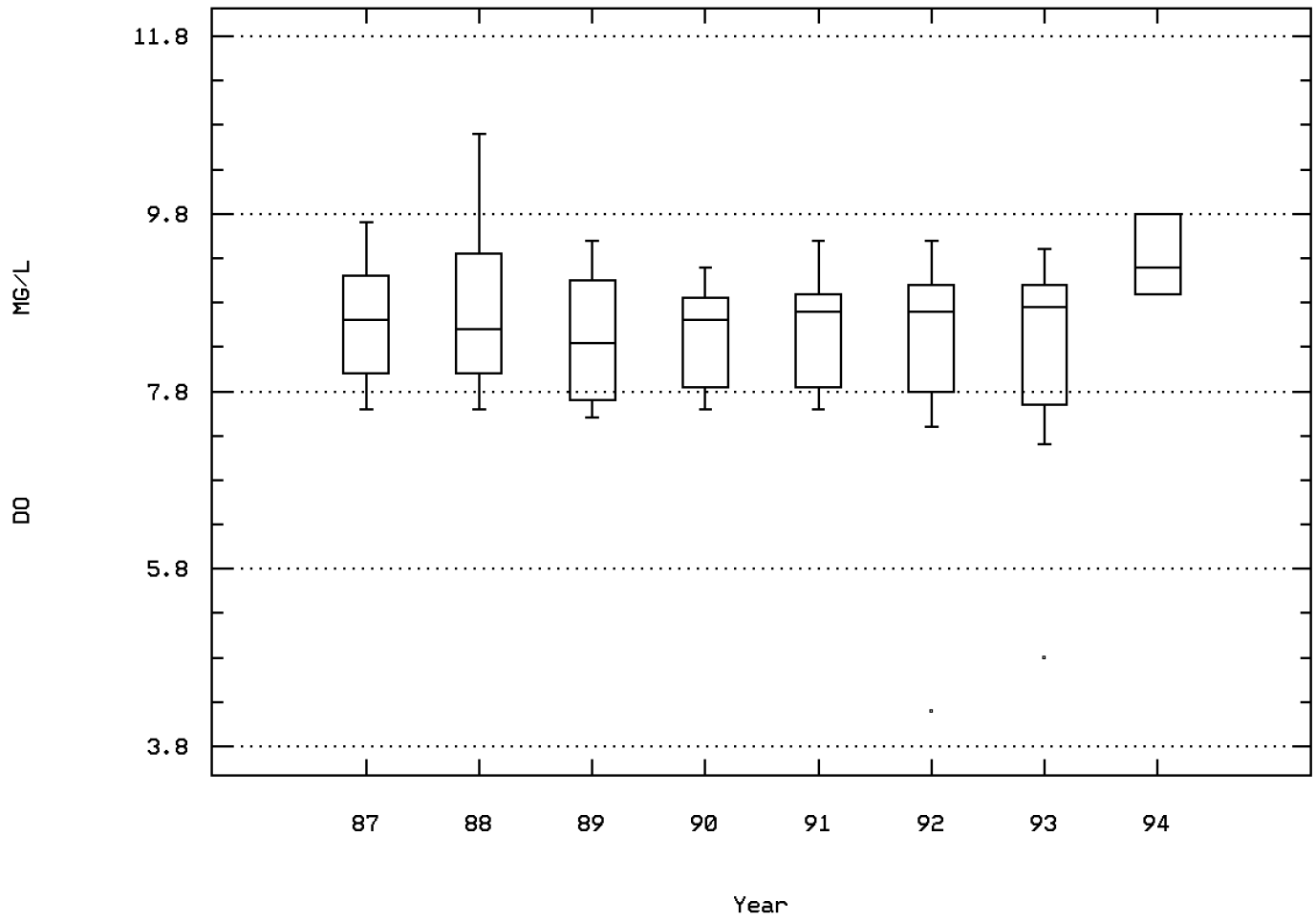
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00300

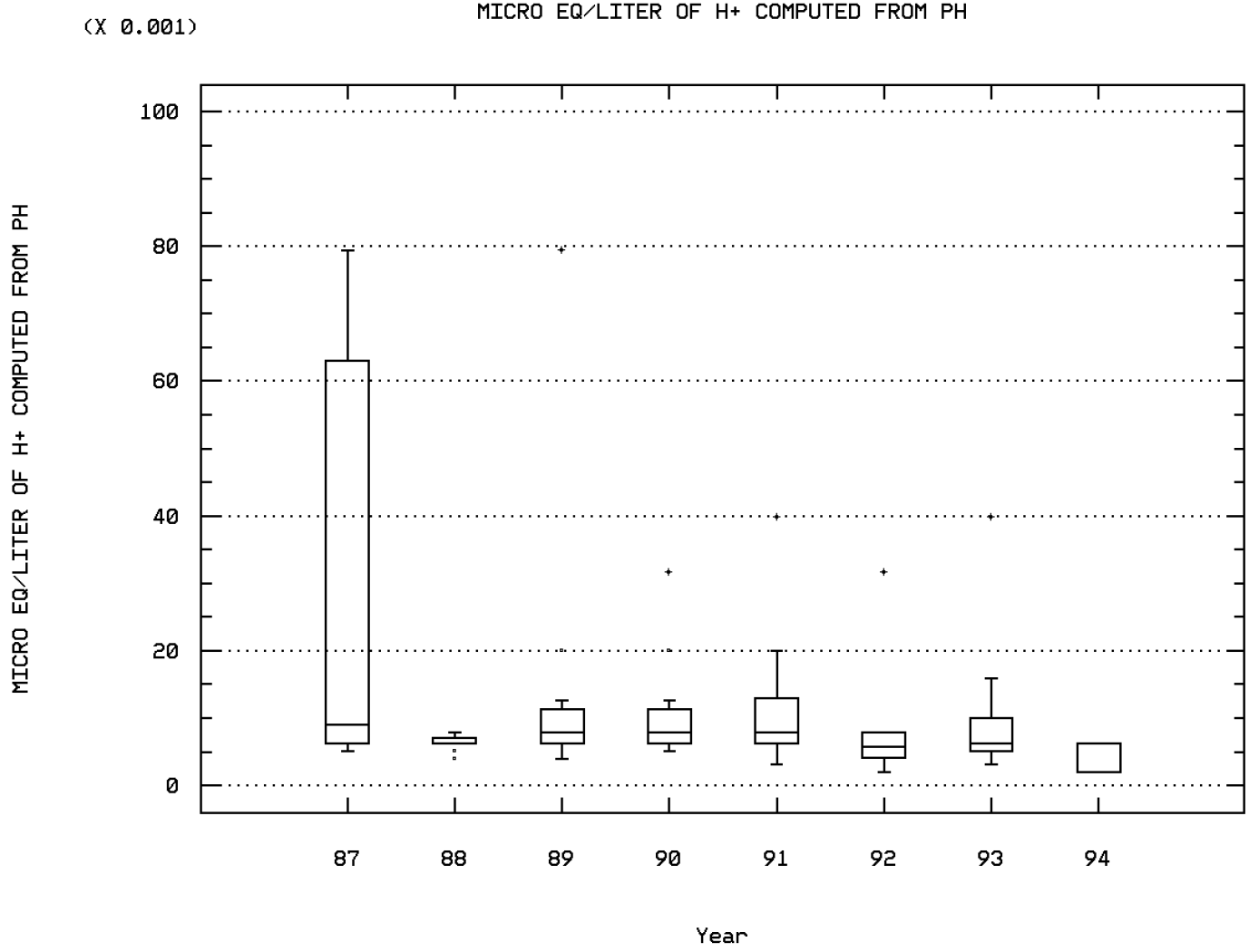
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00403

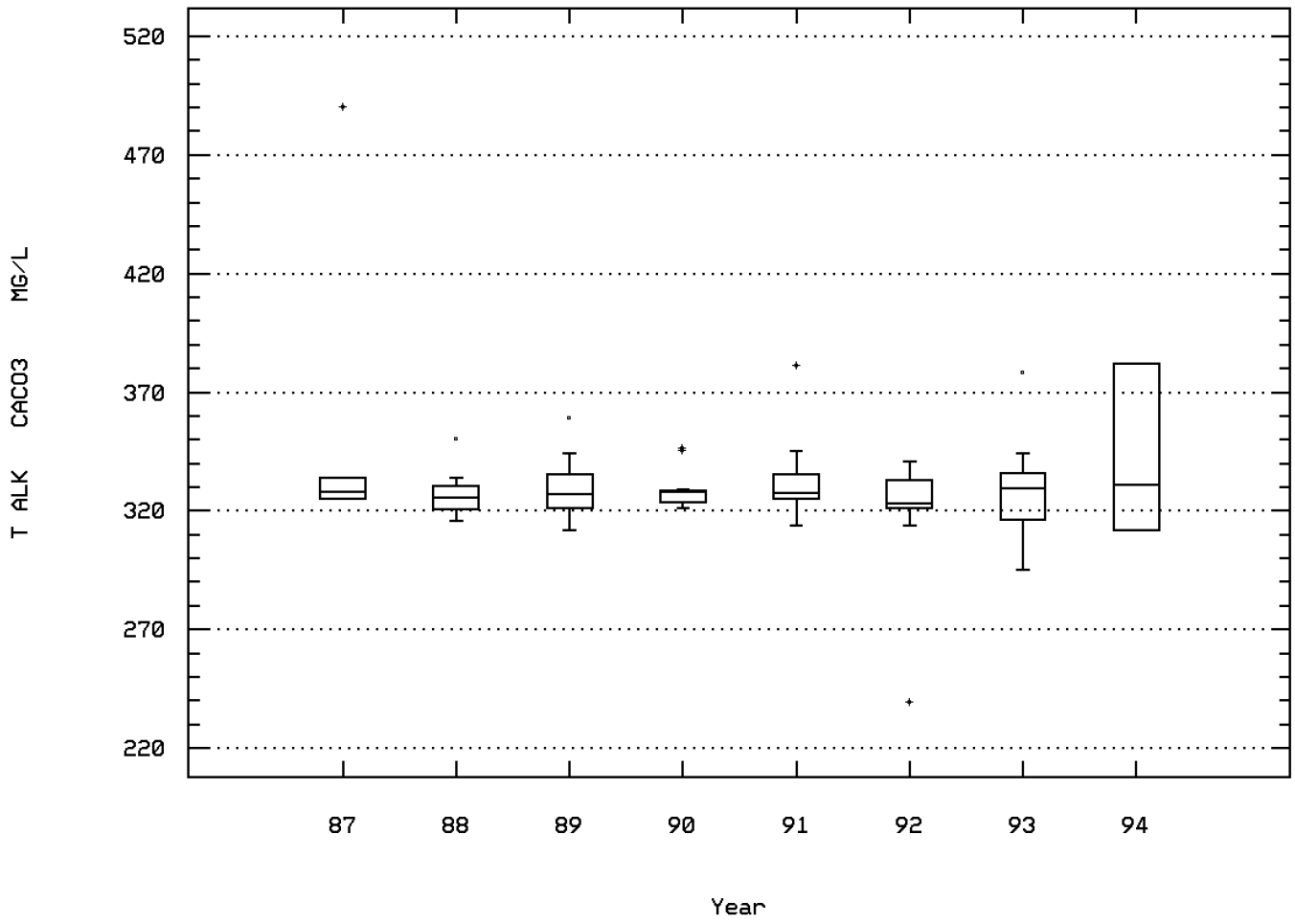
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00410

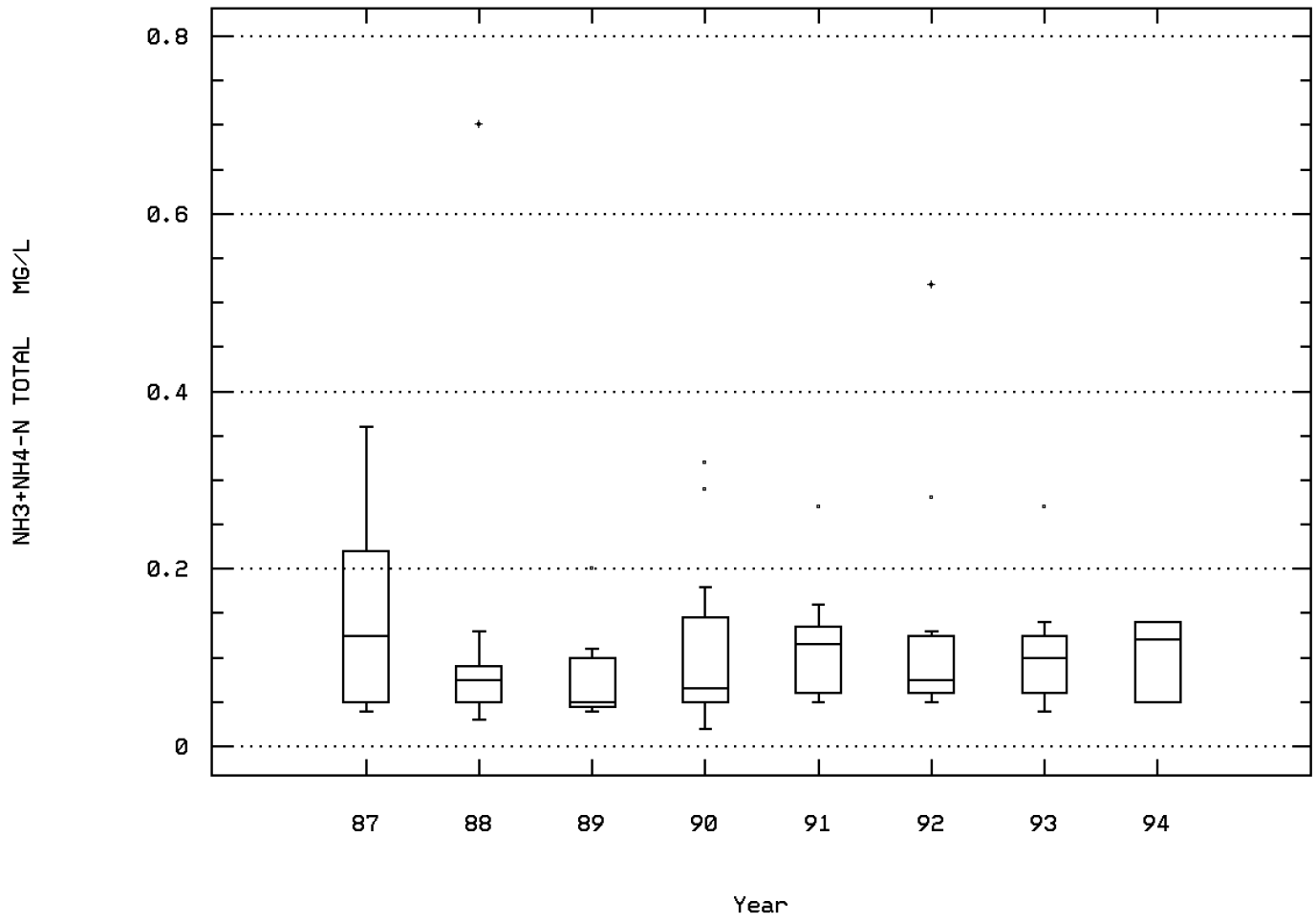
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00610

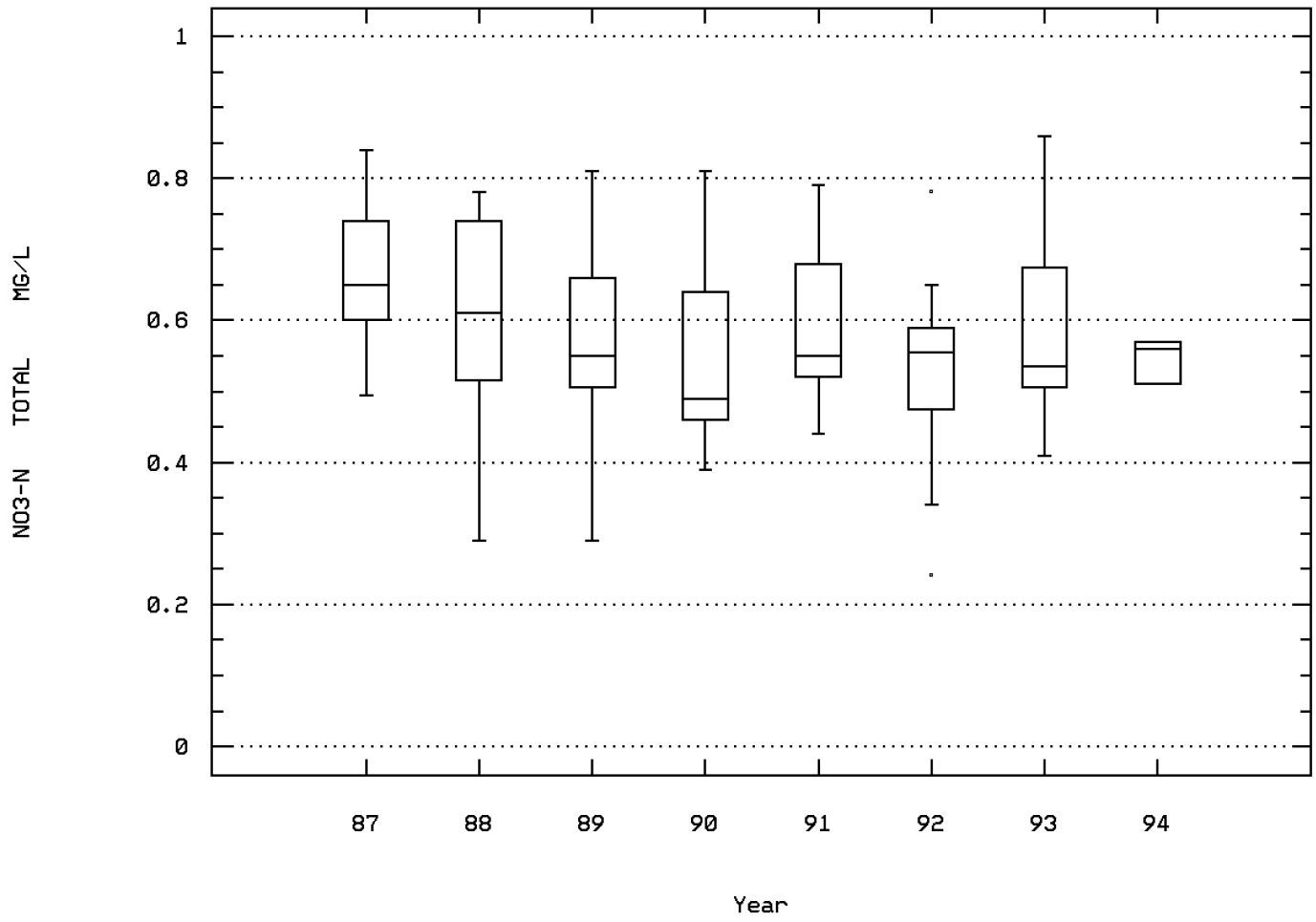
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00620

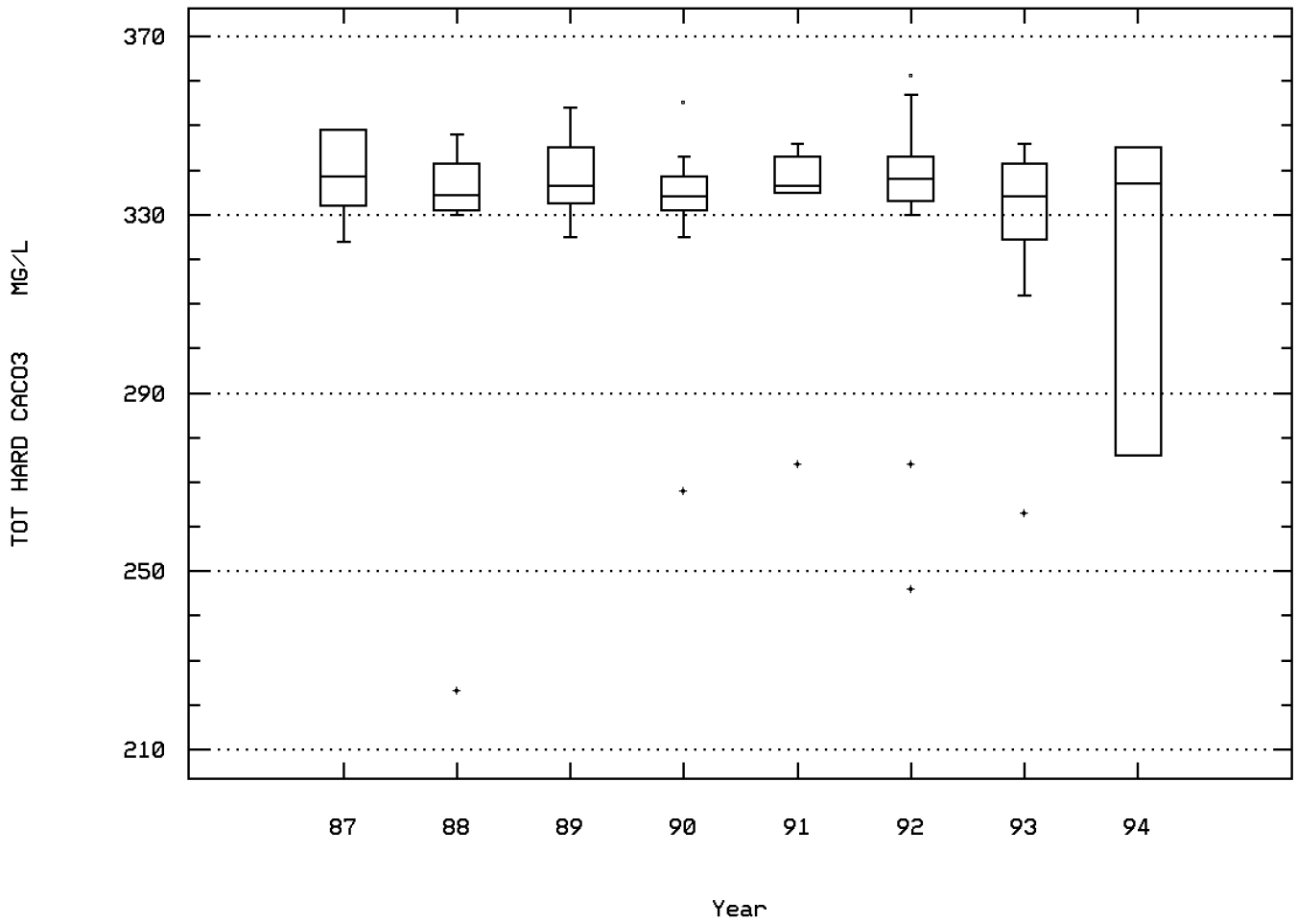
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00900

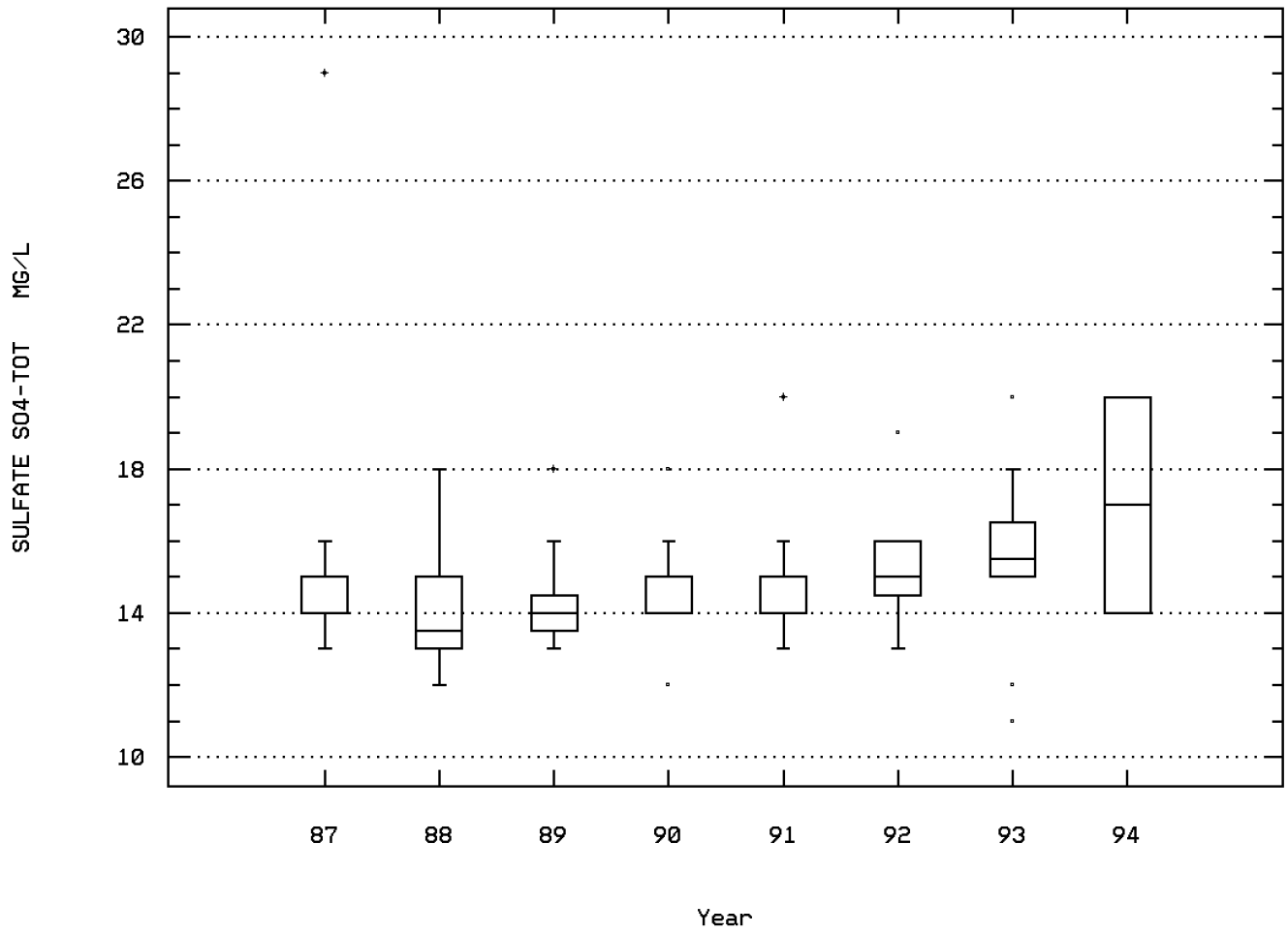
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00945

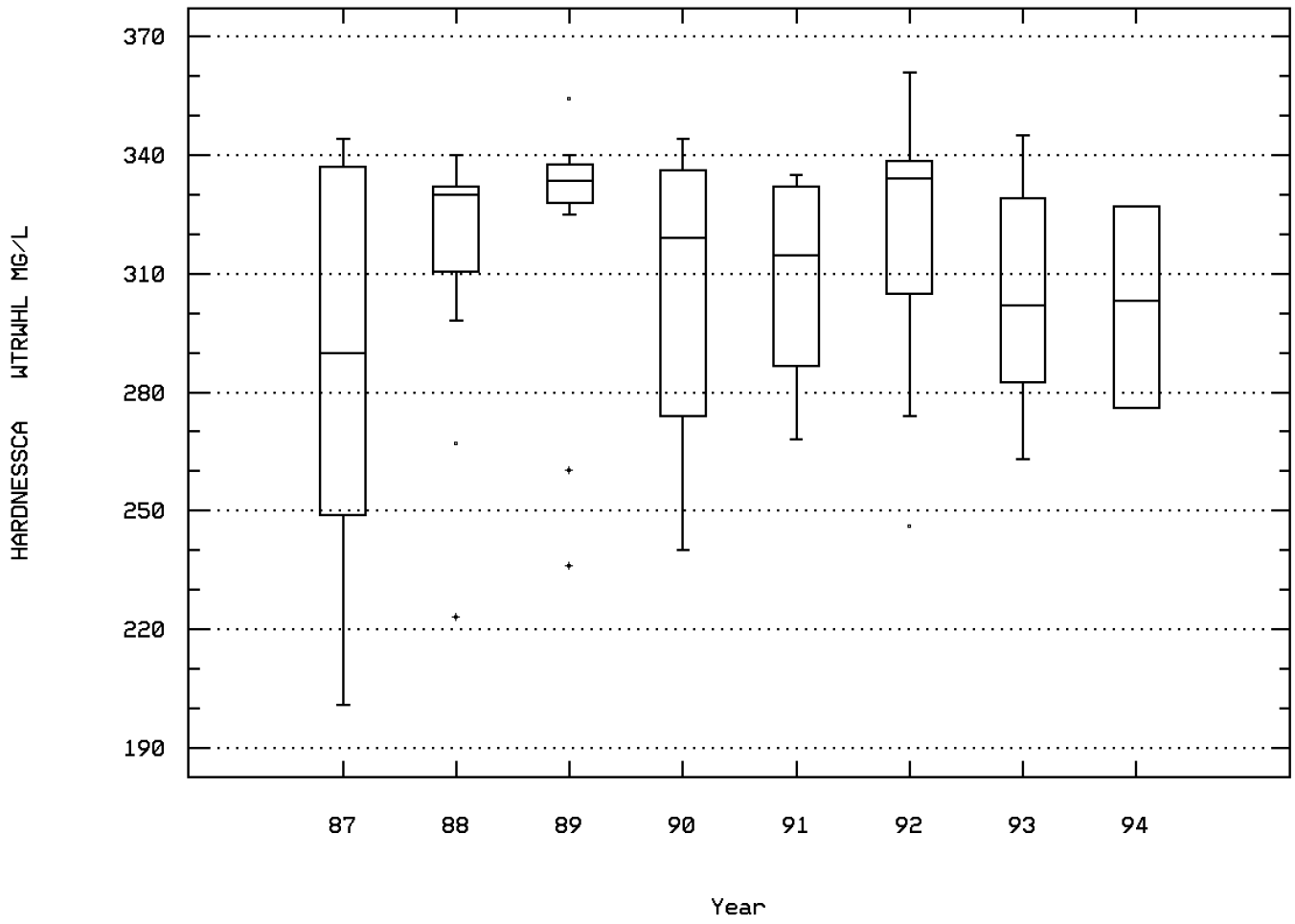
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45634

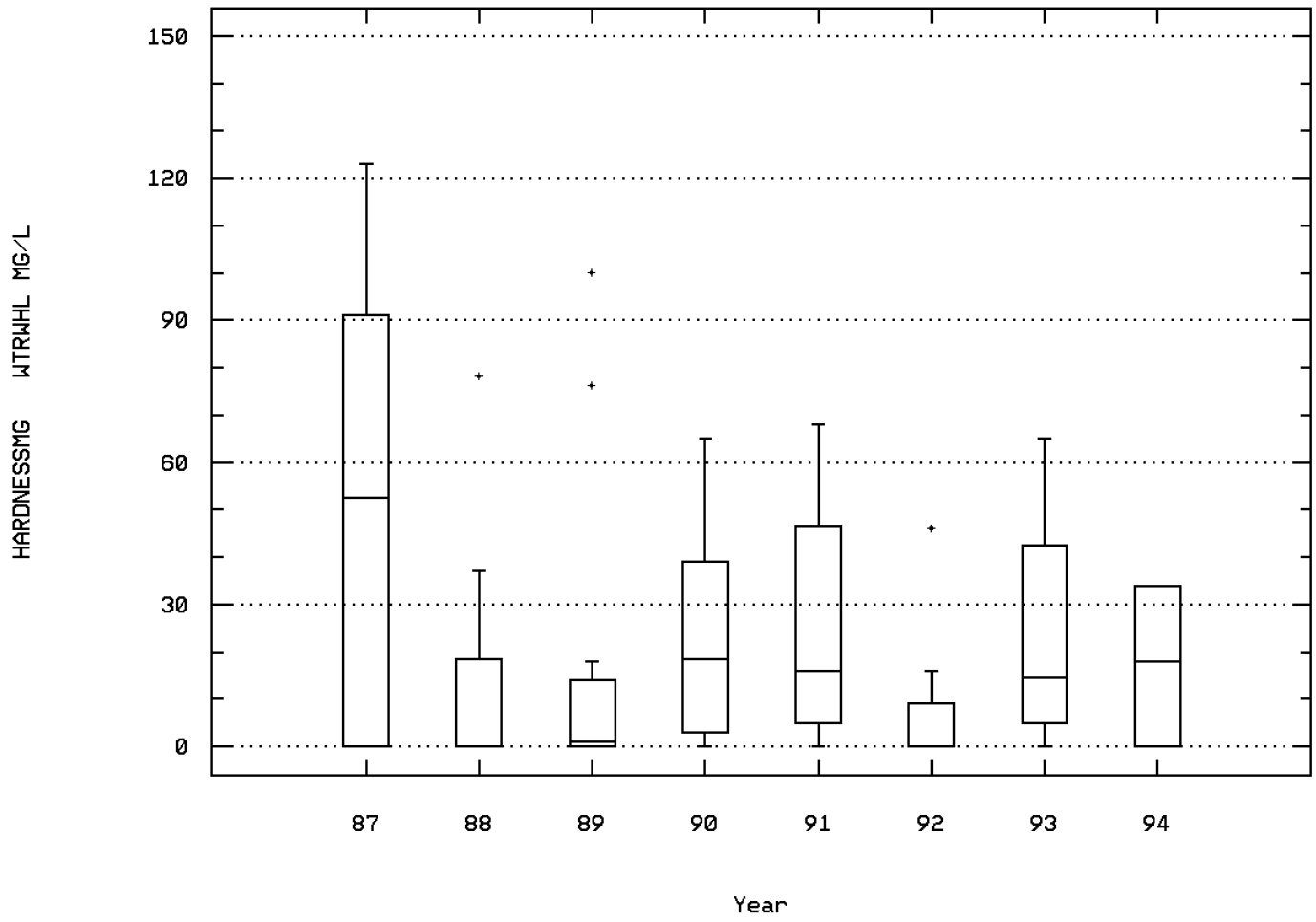
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45635

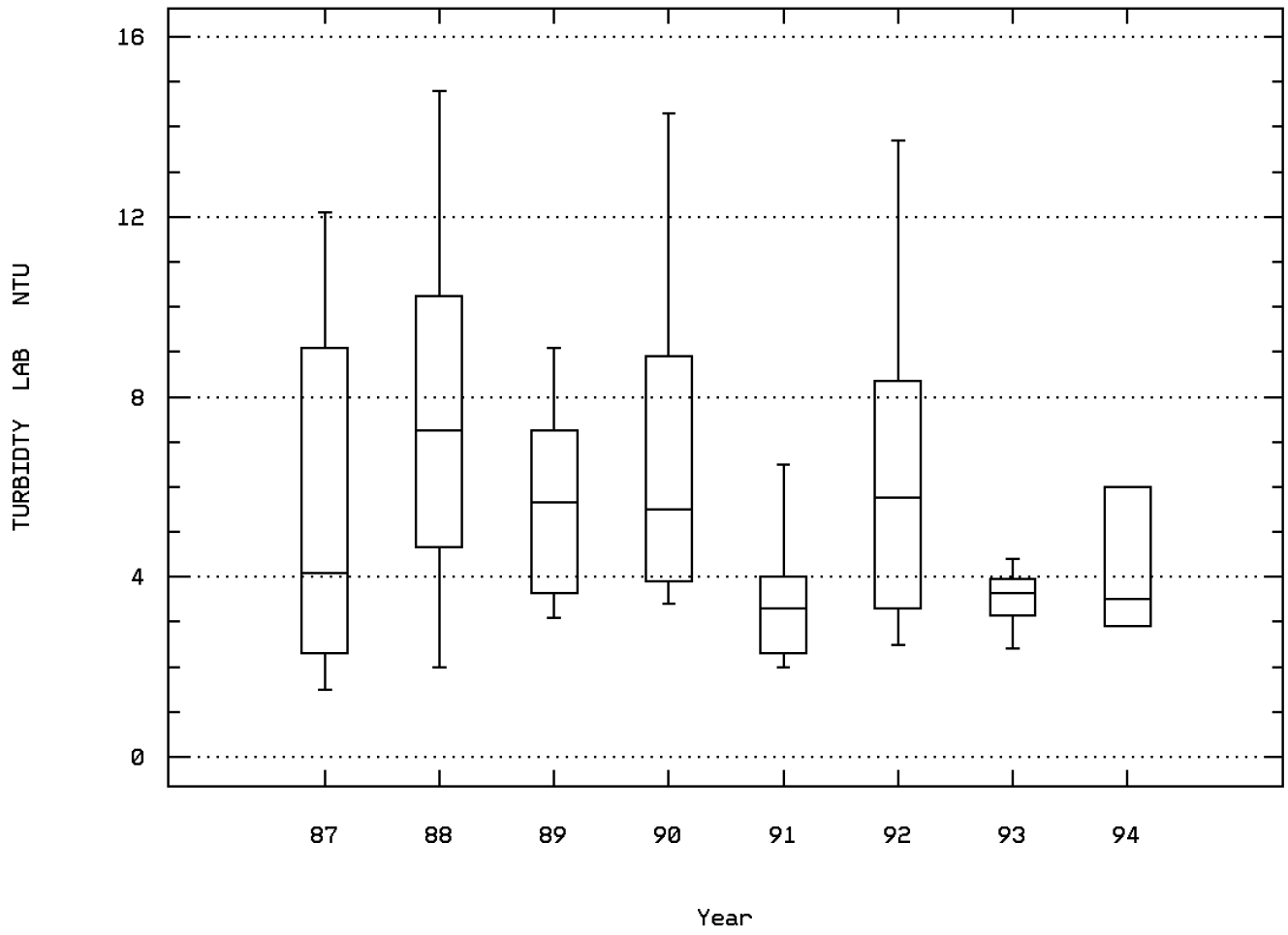
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Lowrance Spri

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	36	12.45	12.783	16.5	9.3	2.416	1.554	11.04	12.025	13.65	15.13
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	36	582.	577.333	651.	412.	2553.943	50.537	517.6	565.75	603.25	638.
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	36	8.9	9.017	10.7	8.2	0.253	0.503	8.5	8.6	9.375	9.7
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	36	8.2	8.275	8.7	8.1	0.016	0.125	8.2	8.2	8.3	8.43
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	36	8.2	8.26	8.7	8.1	0.016	0.126	8.2	8.2	8.3	8.43
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	36	0.006	0.005	0.008	0.002	0.	0.001	0.004	0.005	0.006	0.006
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	323.5	320.333	334.	239.	242.686	15.578	312.	319.25	327.75	331.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.065	0.116	0.7	0.04	0.016	0.126	0.04	0.05	0.115	0.28
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	36	0.57	0.566	0.72	0.41	0.005	0.071	0.471	0.51	0.627	0.659
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	36	335.	323.639	352.	223.	965.266	31.069	270.7	330.	338.75	345.9
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	36	15.5	16.111	29.	12.	8.787	2.964	14.	14.	17.	20.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	330.	318.472	345.	223.	844.085	29.053	270.7	314.75	334.75	338.3
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	36	0.	5.167	29.	0.	66.029	8.126	0.	0.	6.	18.3
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	36	4.35	5.339	14.3	1.5	7.626	2.761	2.65	3.325	6.5	8.85

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	28	17.65	16.843	19.6	13.2	4.642	2.154	13.58	14.9	18.675	19.5
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	28	582.	566.964	661.	296.	4714.851	68.665	478.5	562.75	596.5	624.8
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	28	8.	8.25	9.5	7.4	0.444	0.666	7.5	7.8	9.	9.21
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	28	8.1	8.039	8.3	7.2	0.04	0.199	7.8	8.	8.1	8.2
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	28	8.1	7.969	8.3	7.2	0.045	0.211	7.8	8.	8.1	8.2
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	28	0.008	0.011	0.063	0.005	0.	0.011	0.006	0.008	0.01	0.016
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	338.	346.321	490.	321.	1066.374	32.655	322.	330.25	345.75	381.1
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.06	0.092	0.36	0.02	0.006	0.079	0.039	0.05	0.118	0.158
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	28	0.505	0.505	0.72	0.29	0.01	0.102	0.335	0.47	0.56	0.644
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	28	340.	341.179	355.	329.	46.893	6.848	332.7	335.5	346.	350.4
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	27	14.	14.481	18.	12.	1.413	1.189	12.8	14.	15.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	328.	315.607	354.	249.	816.914	28.582	266.1	298.	337.75	340.4
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	28	15.	25.571	91.	0.	710.995	26.664	0.	10.	36.25	78.3
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	28	3.7	4.218	11.2	2.	4.972	2.23	2.09	2.925	4.9	6.73

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

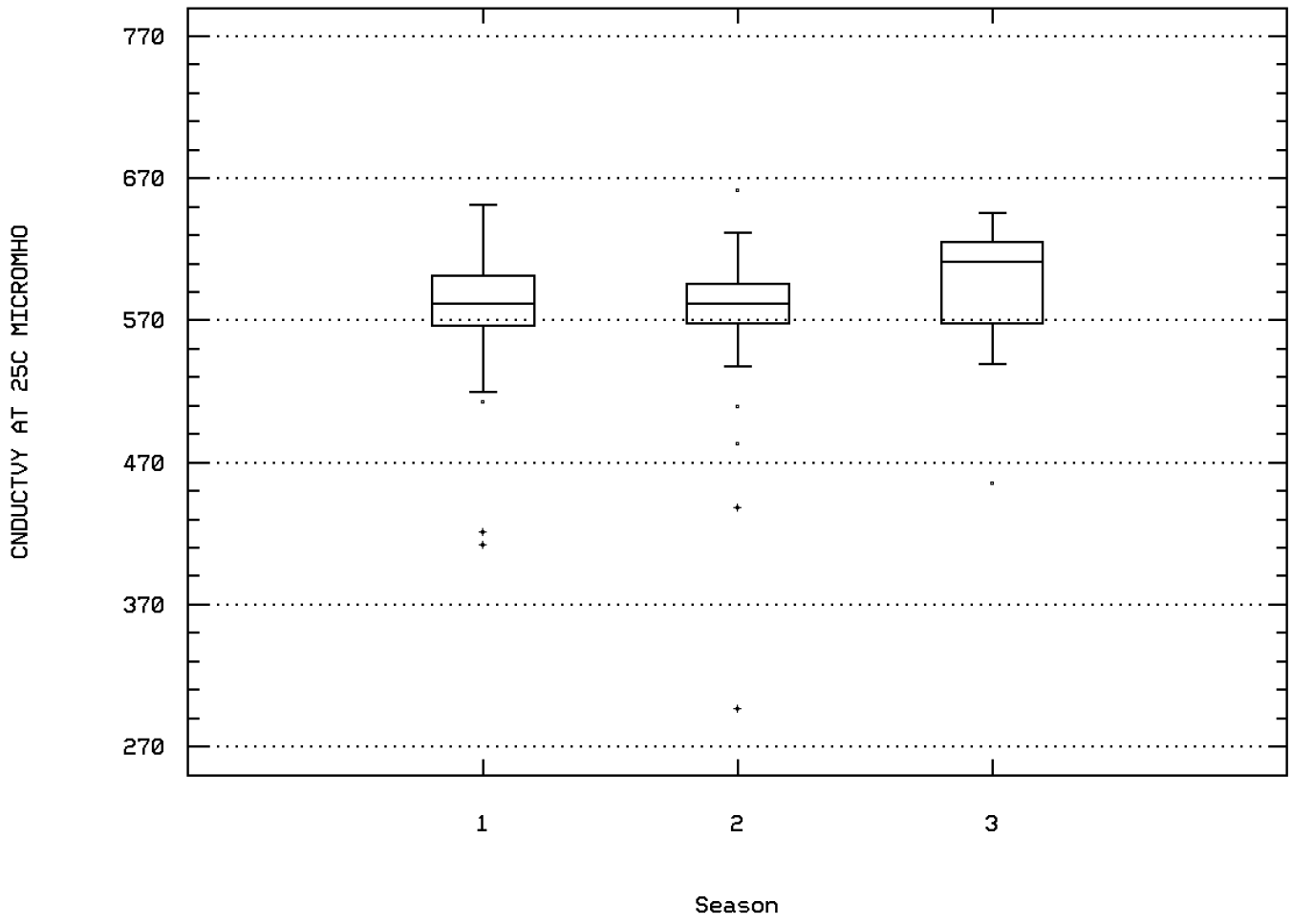
Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0039

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/10/87-03/02/94	21	19.2	19.2	20.3	18.4	0.148	0.385	18.64	19.	19.4	19.5
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/10/87-03/02/94	21	611.	591.952	646.	455.	2222.148	47.14	539.2	559.	626.5	644.2
00300p	OXYGEN, DISSOLVED MG/L	02/10/87-03/02/94	20	7.9	7.76	8.9	4.2	1.519	1.233	5.04	7.6	8.675	8.89
00403p	PH, LAB, STANDARD UNITS SU	02/10/87-03/02/94	21	7.7	7.824	8.7	7.1	0.216	0.465	7.12	7.45	8.2	8.5
00403p	CONVERTED PH, LAB, STANDARD UNITS	02/10/87-03/02/94	21	7.7	7.613	8.7	7.1	0.263	0.513	7.12	7.45	8.2	8.5
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/10/87-03/02/94	21	0.02	0.024	0.079	0.002	0.001	0.024	0.003	0.006	0.036	0.076
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	327.	325.	334.	295.	62.2	7.887	317.4	324.	329.	331.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/10/87-03/02/94	21	0.12	0.14	0.52	0.04	0.01	0.1	0.054	0.08	0.17	0.216
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/10/87-03/02/94	21	0.75	0.706	0.86	0.24	0.024	0.156	0.442	0.72	0.795	0.834
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	02/10/87-03/02/94	21	335.	332.524	361.	268.	305.762	17.486	320.8	330.	338.	353.6
00945p	SULFATE, TOTAL (MG/L AS SO4)	02/10/87-03/02/94	20	13.	13.45	16.	11.	1.208	1.099	12.1	13.	14.	15.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	280.	285.857	361.	201.	1871.129	43.257	236.	260.	333.	353.6
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	02/10/87-03/02/94	21	46.	46.667	123.	0.	1381.133	37.164	0.	3.	72.	103.2
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	02/10/87-03/02/94	21	8.2	7.424	14.8	1.	16.262	4.033	2.14	3.3	9.75	13.78

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0039 Parameter Code: 00095

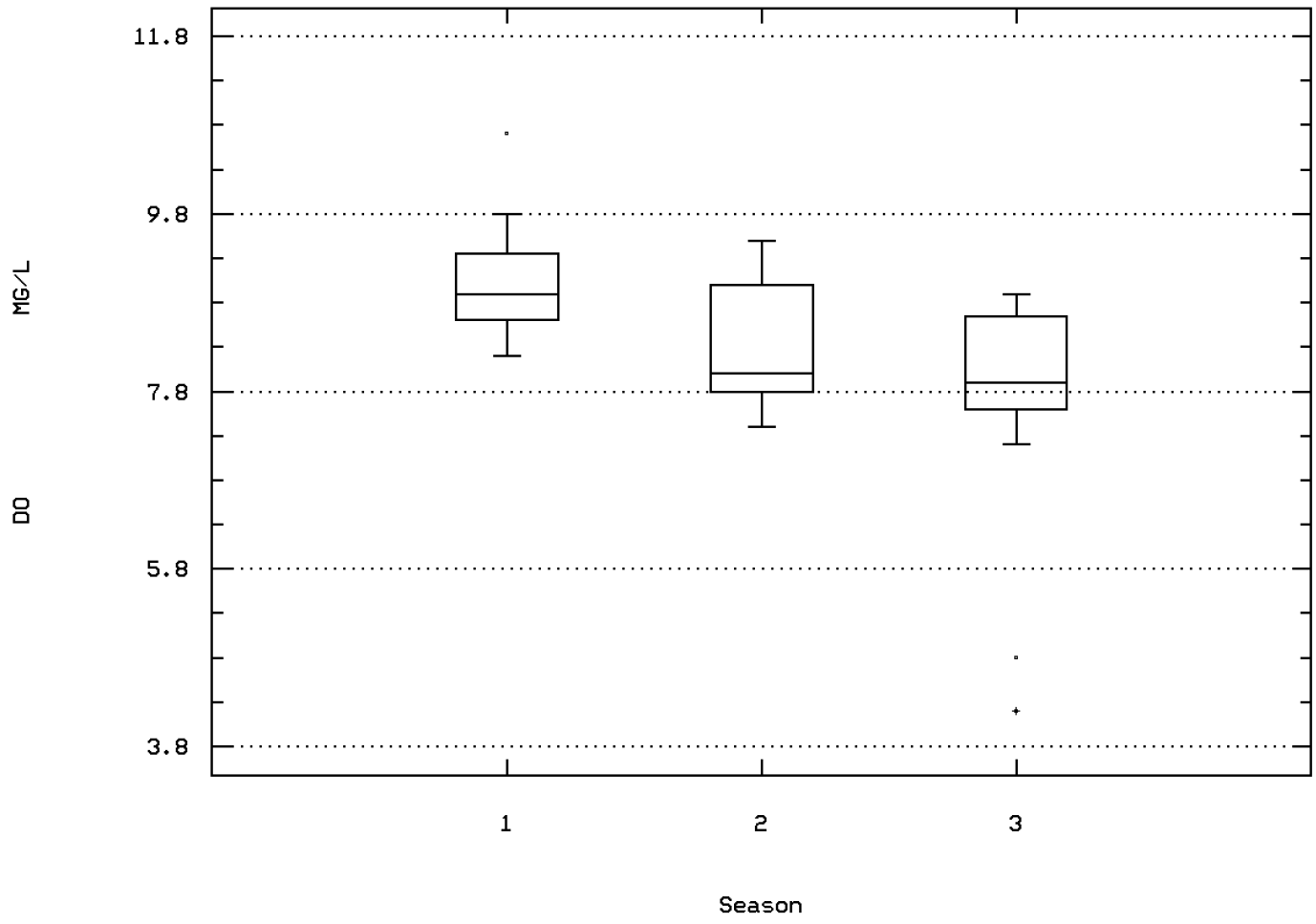
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00300

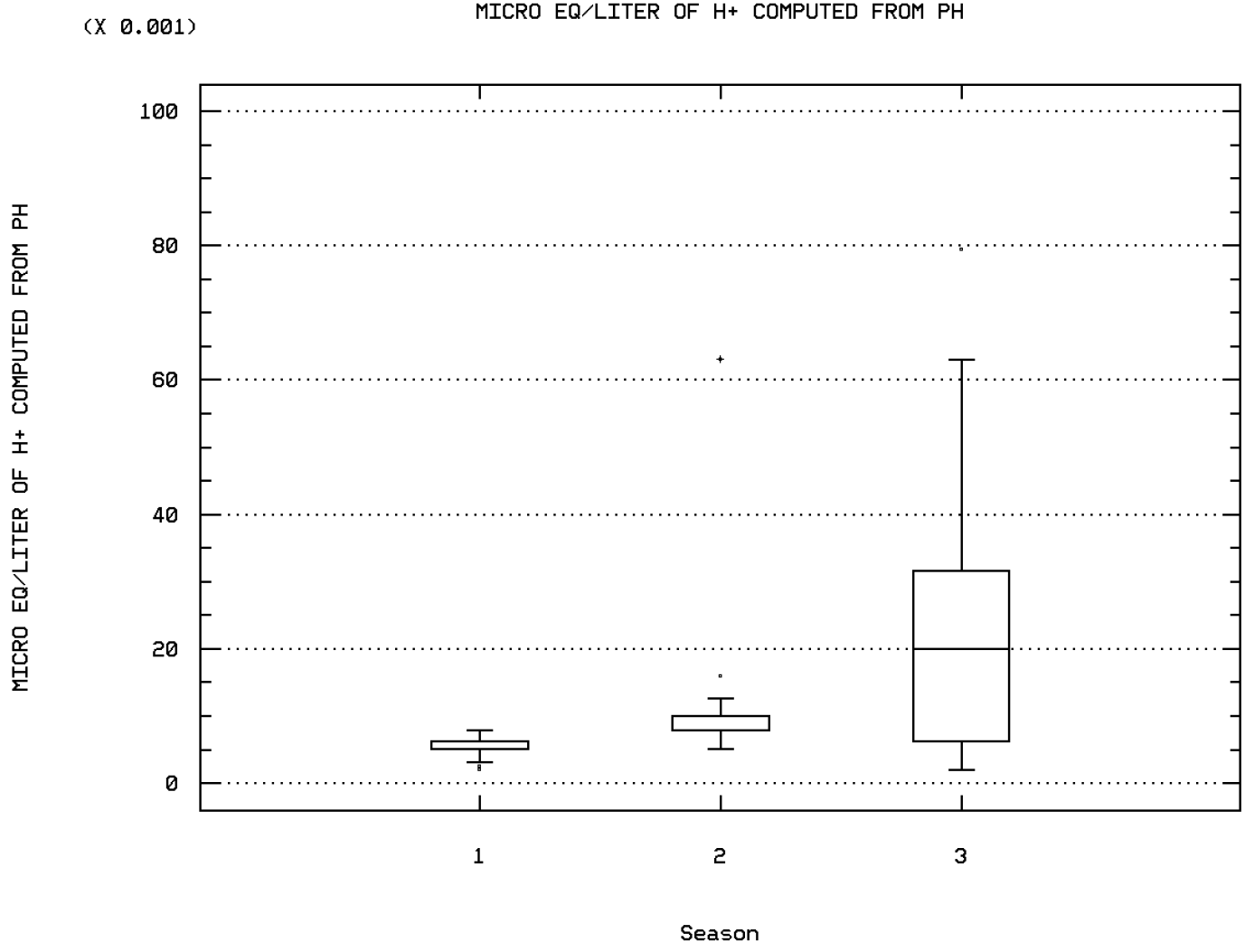
OXYGEN, DISSOLVED



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00403

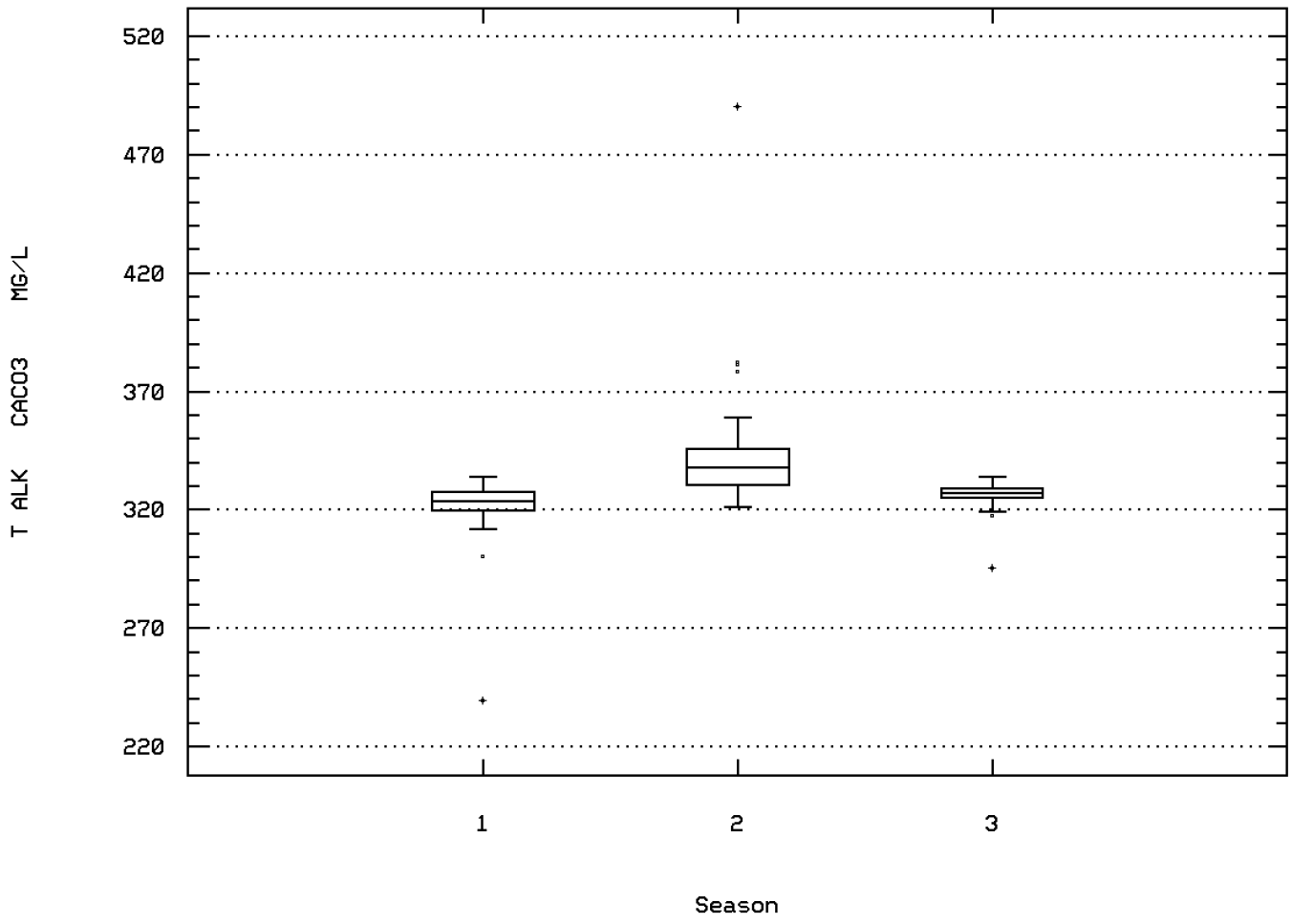
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00410

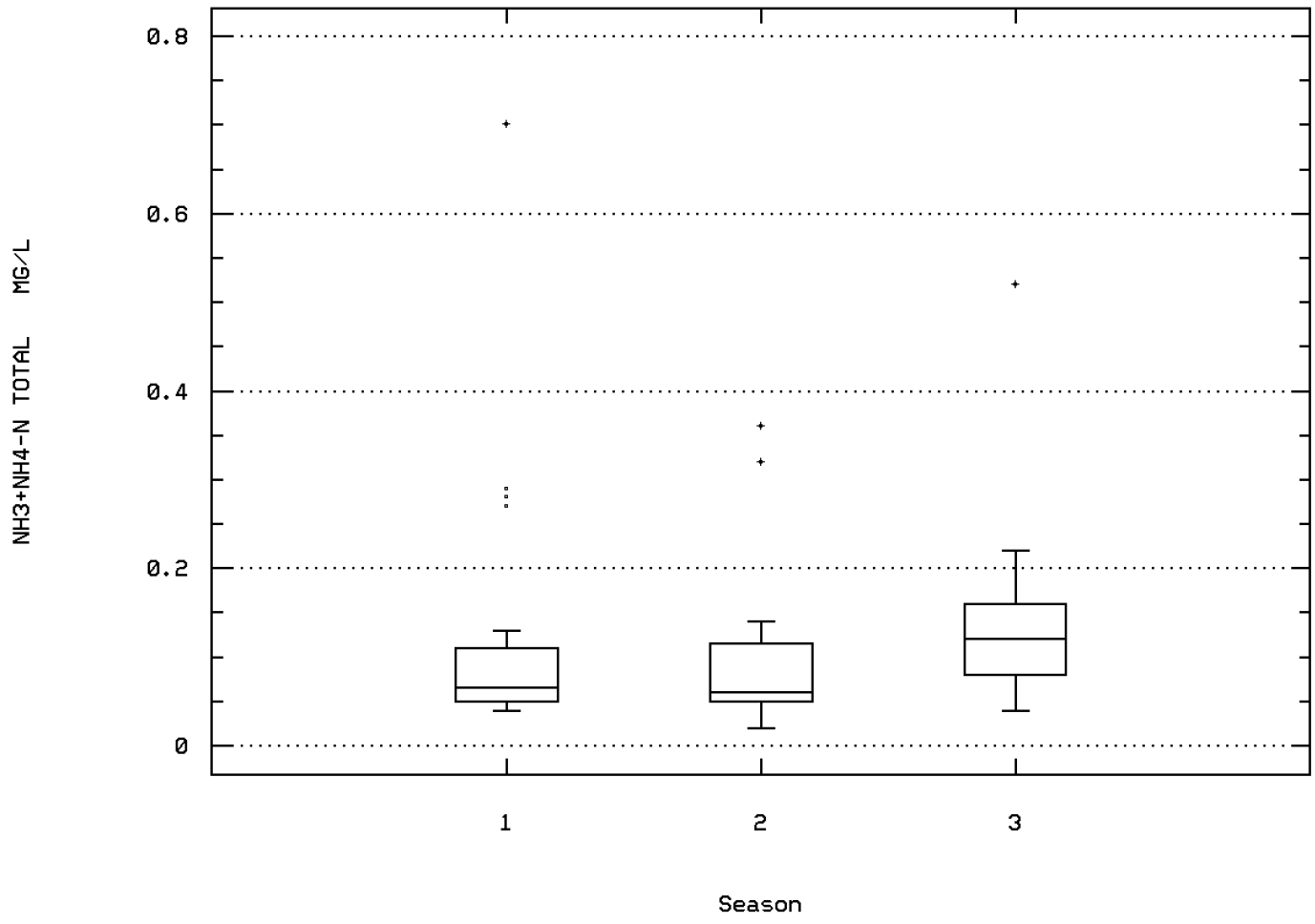
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00610

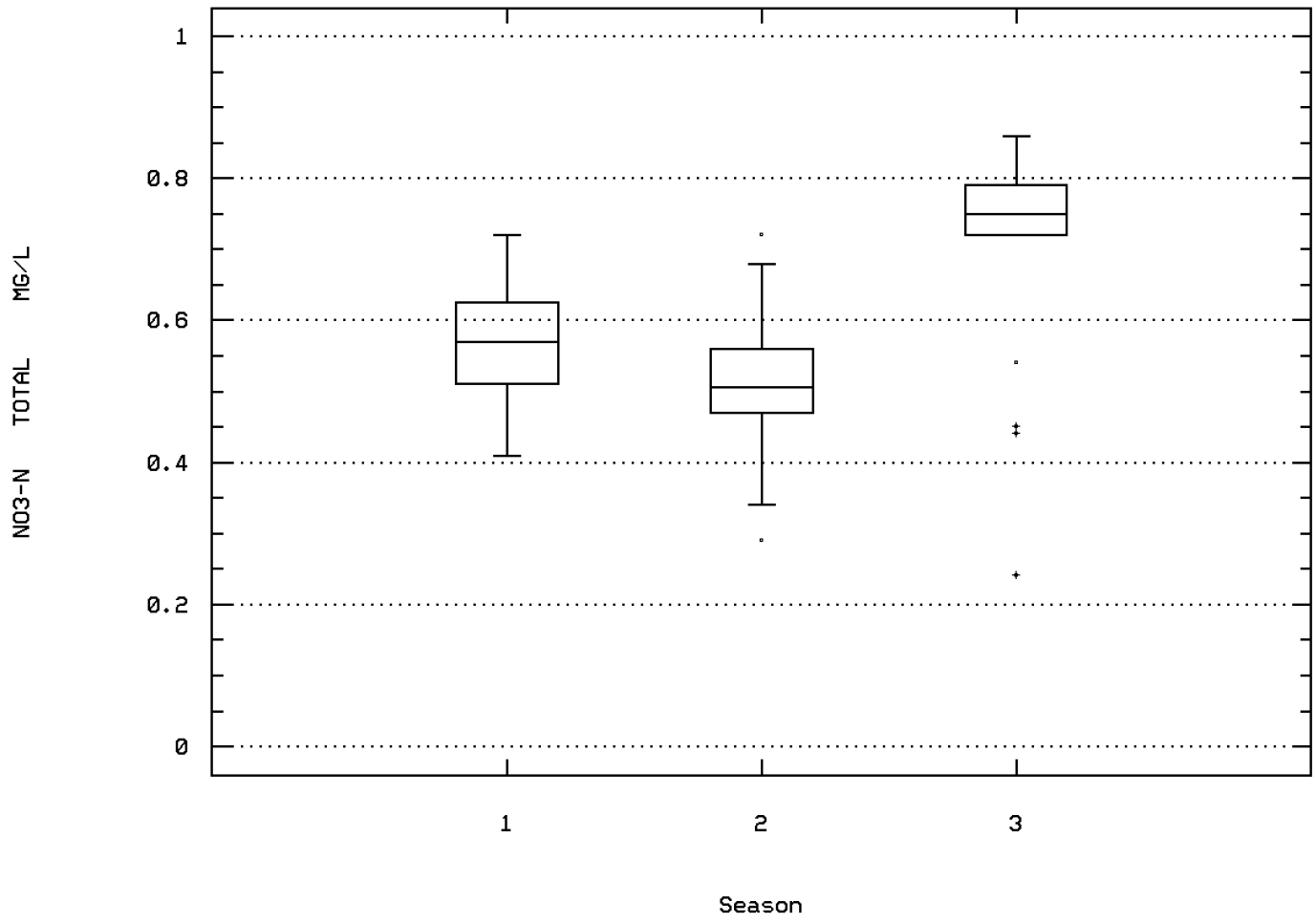
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00620

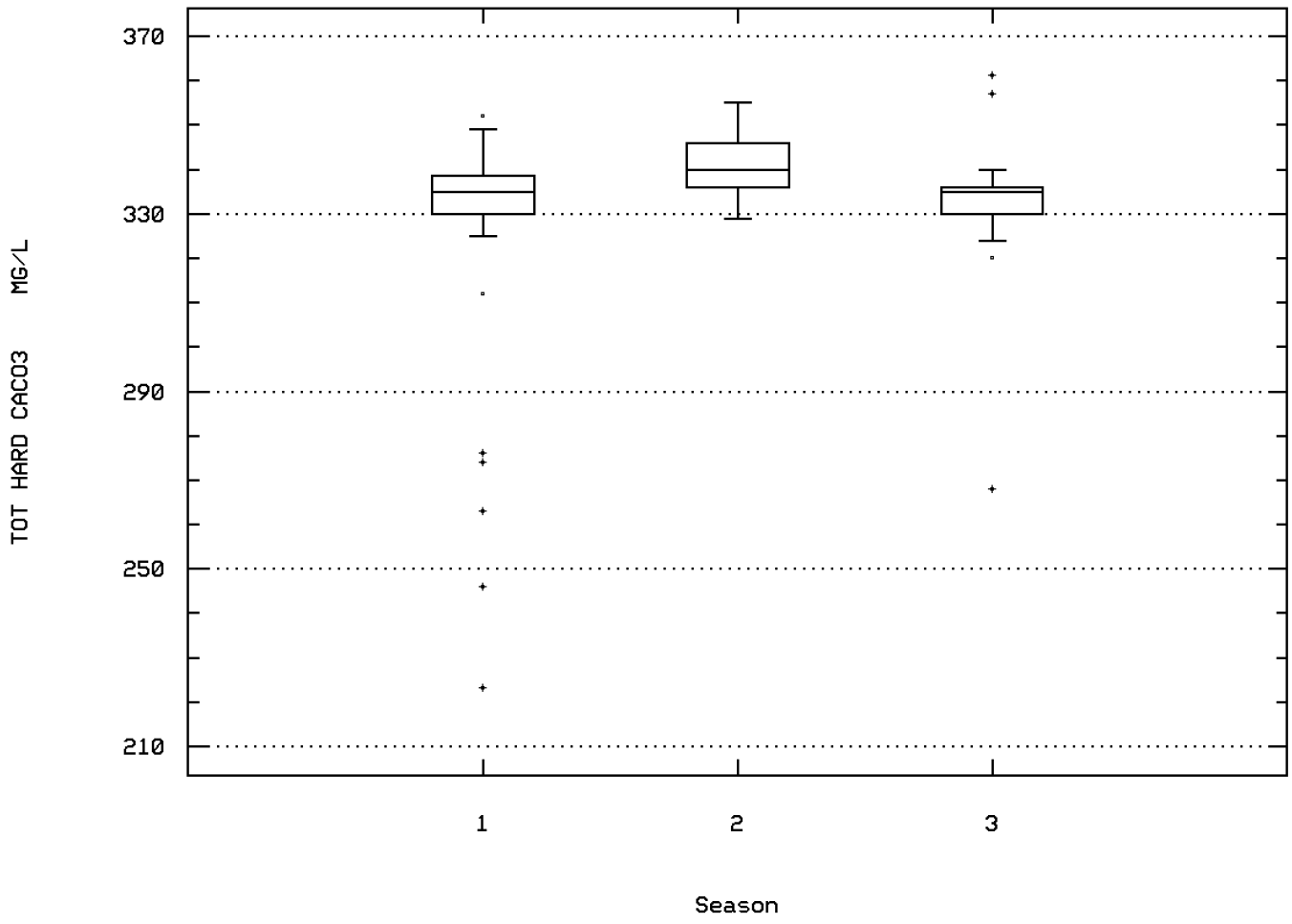
NITRATE NITROGEN, TOTAL (MG/L AS N)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00900

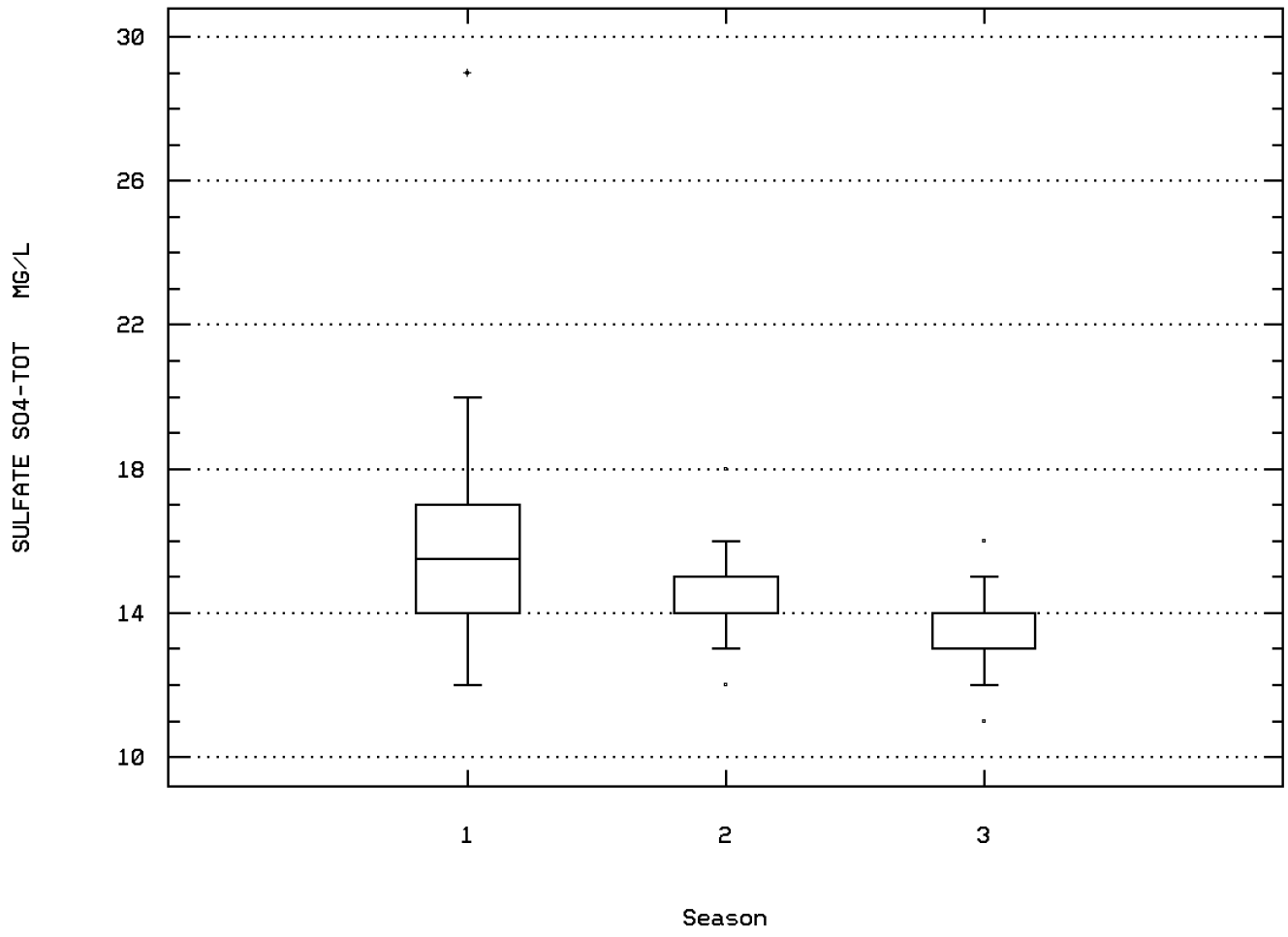
HARDNESS, TOTAL (MG/L AS CACO3)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 00945

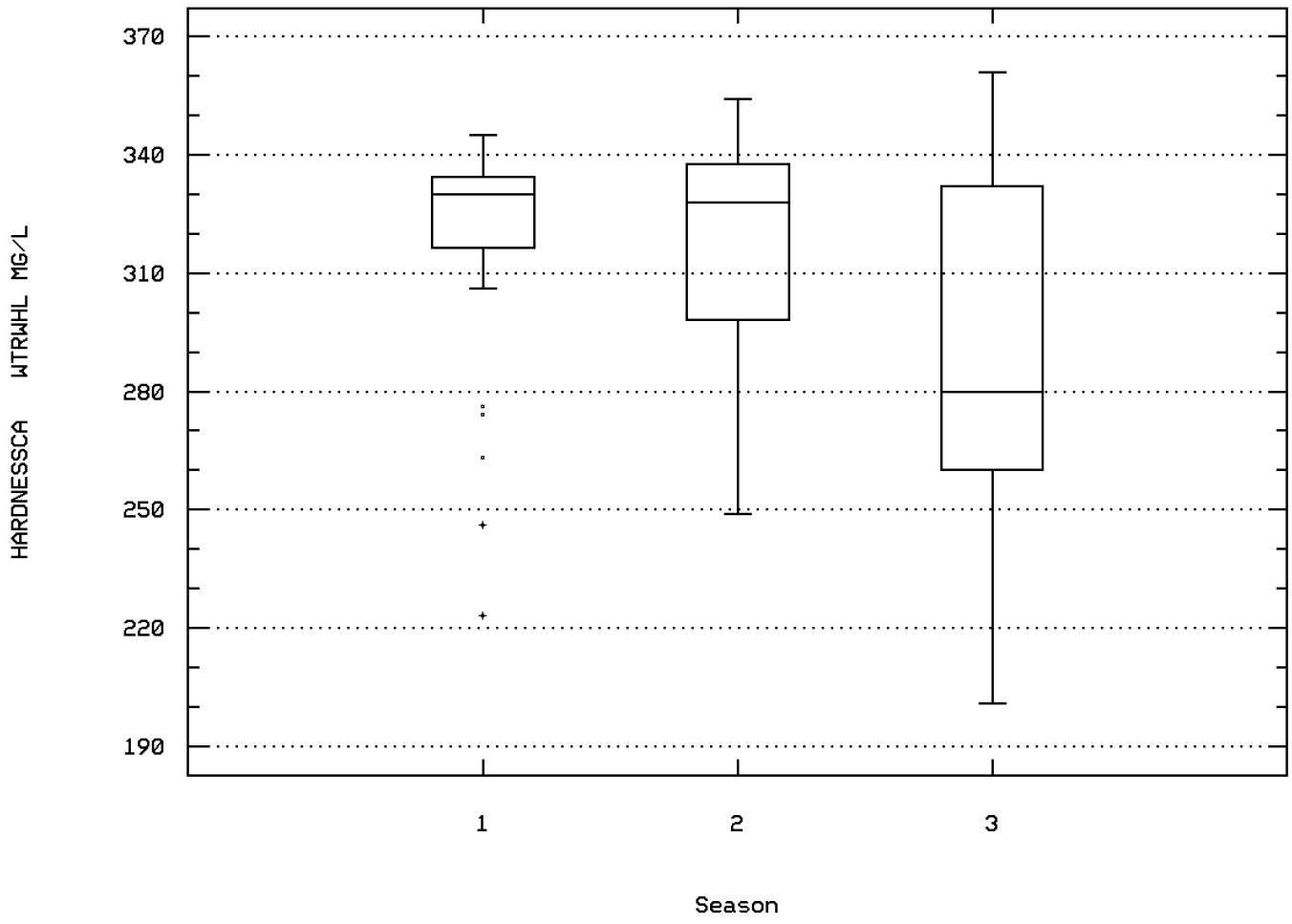
SULFATE, TOTAL (MG/L AS SO4)



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45634

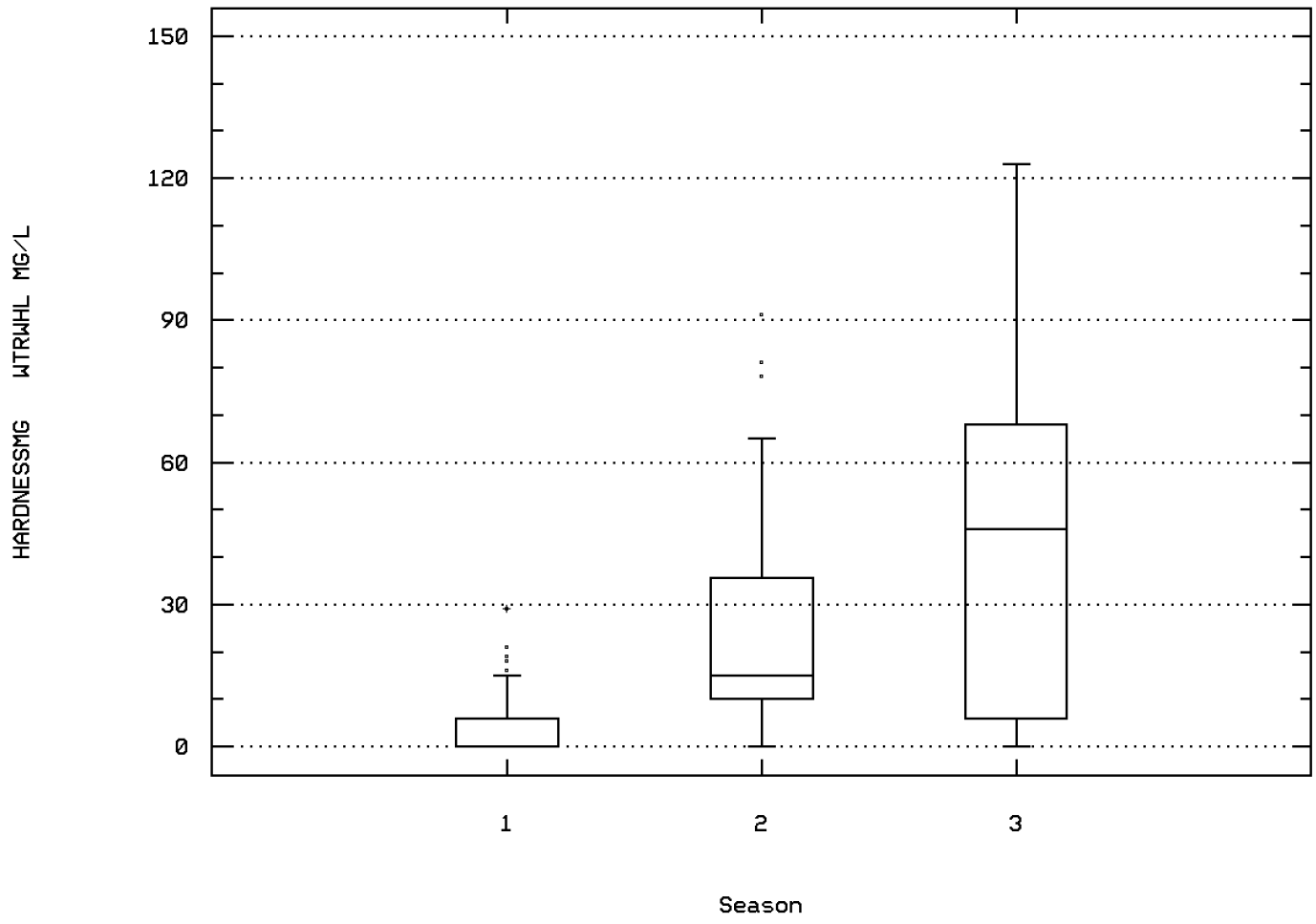
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 45635

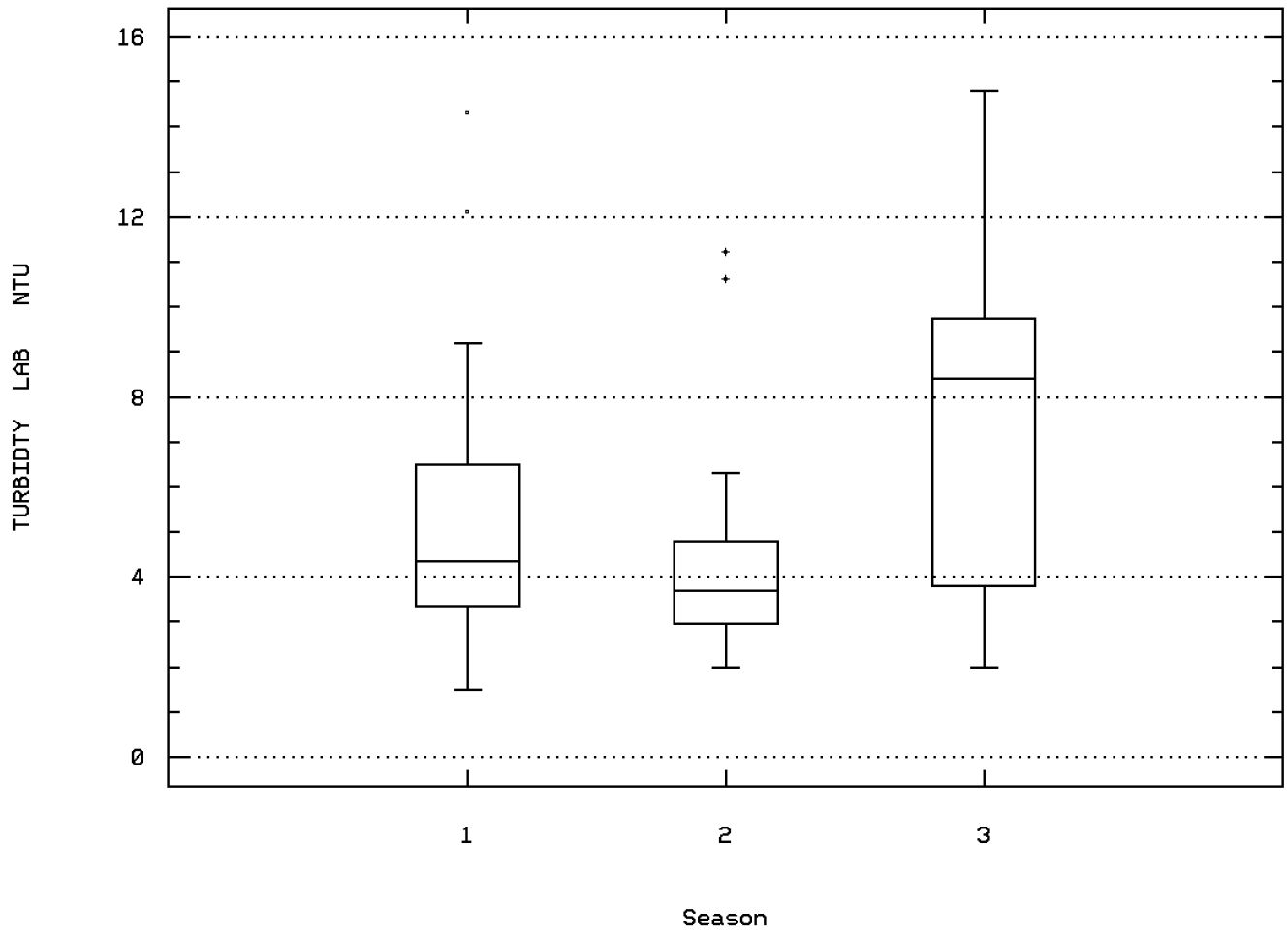
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek 0.9m Below Lowrance Spri

Station: CHIC0039 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek 0.9m Below Lowrance Spri

Station Inventory for Station: CHIC0040

NPS Station ID: CHIC0040 LAT/LON: 34.449366/ -97.010087 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_GARTON_4
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY HALFWAY BETWEEN THE DAM AND WHERE ROCK CREEK ENTERS THE RESERVOIR. SAMPLES FOR THIS SITE WERE TAKEN FROM 2 AND 15-FOOT DEPTHS AND WERE ANALYZED FOR SEVERAL CONSTITUENTS. ONLY METALS DATA WERE UPLOADED FOR THIS STUDY BECAUSE ALL OTHER PARAMETERS WERE AVERAGES OF SAMPLES TAKEN FROM SEVERAL DIFFERENT. STATIONS. THE STUDY WAS CONDUCTED BY THE U.S. DEPARTMENT OF INTERIOR-OFFICE OF WATER RESEARCH AND TECHNOLOGY. THE RESULTS ARE IN A 1979 REPORT "LOW ENERGY MECHANICAL DESTRATIFICATION AND REAERATION OF RESERVOIRS" BY JAMES E. GARTON; JERRY WILHM; AND DEBORAH BARKER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0040

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	9	22.4	24.056	39.7	16.1	43.333	6.583	16.1	20.7	25.9	39.7
01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	9	5200.	5644.444	11600.	1000.	11142777.778	3338.08	1000.	3450.	8450.	11600.
01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	9	6400.	6811.111	9300.	4800.	2923611.111	1709.857	4800.	5250.	8600.	9300.
01045	IRON, TOTAL (UG/L AS FE)	05/16/77-08/18/77	7	600.	638.571	950.	450.	35447.619	188.275	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-10/20/77	9	60.	83.333	260.	10.	6525.	80.777	10.	30.	125.	260.
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-12/30/77	10	200.5	223.8	437.	84.	14391.511	119.965	87.6	120.75	306.75	432.3
01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-10/20/77	9	140.	297.778	730.	20.	86294.444	293.759	20.	80.	660.	730.
01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-10/20/77	9	30.	207.	620.	3.	70746.	265.981	3.	10.	525.	620.
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-12/30/77	10	0.34	0.486	1.68	0.	0.248	0.498	0.	0.098	0.683	1.587

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0040

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01040	COPPER, DISSOLVED	Fresh Acute	18.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
		Drinking Water	1300.	9	8	0.89	2	1	0.50	3	3	1.00	4	4	1.00			
01042	COPPER, TOTAL	Fresh Acute	18.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
		Drinking Water	1300.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0041

NPS Station ID: CHIC0041 LAT/LON: 34.451531/ -97.040781 Agency: 11NPSWRD Date Created: 09/20/97
Location: GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_GARTON_3
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY HALFWAY BETWEEN THE DAM AND WHERE GUY SANDY CREEK ENTERS THE RESERVOIR. SAMPLES FOR THIS SITE WERE TAKEN FROM 2 AND 15-FOOT DEPTHS AND WERE ANALYZED FOR SEVERAL CONSTITUENTS. ONLY METALS DATA WERE UPLOADED FOR THIS STUDY BECAUSE ALL OTHER PARAMETERS WERE AVERAGES OF SAMPLES TAKEN FROM SEVERAL DIFFERENT. STATIONS. THE STUDY WAS CONDUCTED BY THE U.S. DEPARTMENT OF INTERIOR-OFFICE OF WATER RESEARCH AND TECHNOLOGY. THE RESULTS ARE IN A 1979 REPORT "LOW ENERGY MECHANICAL DESTRATIFICATION AND REAERATION OF RESERVOIRS" BY JAMES E. GARTON; JERRY WILHM; AND DEBORAH BARKER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS CO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0041

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01039	COPPER, TOTAL IN BOTTOM DEPOSITS (MG/KG,WT WGT)	05/16/77-12/30/77	10	23.7	25.88	55.3	12.3	164.544	12.827	12.7	16.3	30.5	53.75
01040	COPPER, DISSOLVED (UG/L AS CU)	05/16/77-10/20/77	8	5000.	4837.5	8200.	600.	5771250.	2402.343	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	05/16/77-10/20/77	9	5400.	5511.111	7500.	3800.	1586111.111	1259.409	3800.	4450.	6600.	7500.
01045	IRON, TOTAL (UG/L AS FE)	05/16/77-08/18/77	6	660.	606.667	750.	260.	30746.667	175.347	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	05/16/77-10/20/77	8	80.	110.	300.	20.	8314.286	91.183	**	**	**	**
01053	MANGANESE IN BOTTOM DEPOSITS (MG/KG AS MN DRY WGT)	05/16/77-12/30/77	10	214.5	219.9	428.	39.	15012.544	122.526	44.8	109.75	335.75	419.9
01055	MANGANESE, TOTAL (UG/L AS MN)	05/16/77-10/20/77	8	105.	236.25	770.	30.	74455.357	272.865	**	**	**	**
01056	MANGANESE, DISSOLVED (UG/L AS MN)	05/16/77-10/20/77	8	15.	198.125	680.	5.	75485.268	274.746	**	**	**	**
01170	IRON IN BOTTOM DEPOSITS (MG/KG AS FE DRY WGT)	05/16/77-12/30/77	10	0.21	0.351	1.18	0.	0.175	0.418	0.	0.	0.618	1.147

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0041

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01040	COPPER, DISSOLVED	Fresh Acute	18.	8	8	1.00	2	2	1.00	2	2	1.00	4	4	1.00			
		Drinking Water	1300.	8	7	0.88	2	1	0.50	2	2	1.00	4	4	1.00			
01042	COPPER, TOTAL	Fresh Acute	18.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			
		Drinking Water	1300.	9	9	1.00	2	2	1.00	3	3	1.00	4	4	1.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0042

NPS Station ID: CHIC0042 LAT/LON: 34.452059/ -97.016476 Agency: 11NPSWRD Date Created: 10/04/97
Location: ROCK CREEK ARM OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OST_B
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 872 Aquifer:
Major Basin: SOUTH CENTRAL MISS R Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE ROCK CREEK ARM OF ARBUCKLE RESERVOIR IN CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE ON MARCH 27 1993. WATER AND SEDIMENT SAMPLES WERE ANALYZED FOR CONCENTRATIONS OF FIVE METALS. THE VALUES ARE THE MEAN CONCENTRATIONS FROM THREE SAMPLES. THE RESULTS WERE PUBLISHED IN ENVIRONMENTAL TOXICOLOGY AND CHEMISTRY 1995; VOL. 14; NO. 10; PP. 1781-1787. THE ARTICLE IS "FURTHER INVESTIGATIONS OF THE ETIOLOGY OF SUBCUTANEOUS NEOPLASMS IN NATIVE GIZZARD SHAD (DOROSOMA CEPEDIANUM)" BY JACOBS AND OSTRANDER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OKLAHOMA 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY AT NPS-WRD 1201 OAK RIDGE DRIVE SUITE 250 FORT COLLINS CO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0042

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	1 ##	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	0.16	0.16	0.16	0.16	0.	0.	**	**	**	**
78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	10.4	10.4	10.4	10.4	0.	0.	**	**	**	**
78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	1	5.96	5.96	5.96	5.96	0.	0.	**	**	**	**
78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	1	6.13	6.13	6.13	6.13	0.	0.	**	**	**	**
78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	1	7.07	7.07	7.07	7.07	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0042

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0042

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00				1	0	0.00						
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01065	NICKEL, DISSOLVED	Fresh Acute	1400.	1	0	0.00				1	0	0.00						
		Drinking Water	100.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0043

NPS Station ID: CHIC0043
LAT/LON: 34.458059/ -96.942505
Agency: 112WRD
Date Created: 09/04/93
Location: 01S-03E-24 BDA 2 LOWRANCE SPRINGS 1
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): 342729096563301
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0043

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	1	18.6	18.6	18.6	18.6	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	1	643.	643.	643.	643.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.29	7.29	7.29	7.29	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.29	7.29	7.29	7.29	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.051	0.051	0.051	0.051	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	08/20/92-08/20/92	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.032	0.032	0.032	0.032	0.	0.	**	**	**	**
00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	1	409.	409.	409.	409.	0.	0.	**	**	**	**
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	08/20/92-08/20/92	1	0.7	0.7	0.7	0.7	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	1	72.	72.	72.	72.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	1	35.	35.	35.	35.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	1	8.8	8.8	8.8	8.8	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	1	1.6	1.6	1.6	1.6	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	1	15.	15.	15.	15.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	1	10.	10.	10.	10.	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	1	10.	10.	10.	10.	0.	0.	**	**	**	**
39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	1	335.	335.	335.	335.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	1	388.	388.	388.	388.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0043

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	1	0	0.00							1	0	0.00			
00631	NITRITE PLUS NITRATE, DISS. 1 DET.	Drinking Water	10.	1	0	0.00							1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00							1	0	0.00			
		Drinking Water	250.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0043

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00945 SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0044

NPS Station ID: CHIC0044
LAT/LON: 34.458338/ -96.938893
Agency: 112WRD
Date Created: 09/26/78
Location: LOWRANCE SPRINGS NR DRAKE, OK
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 07329880
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304033500.00
RF3 Mile Point: 0.73
Distance from RF3: 0.20
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0044

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/05/52-12/28/55	3	17.2	16.833	17.2	16.1	0.403	0.635	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	03/05/52-12/28/55	3	3.	3.	4.	2.	1.	1.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/05/52-12/28/55	3	638.	582.	652.	456.	11956.	109.343	**	**	**	**
00400	PH (STANDARD UNITS)	03/05/52-12/28/55	3	7.8	7.733	7.9	7.5	0.043	0.208	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	03/05/52-12/28/55	3	7.8	7.699	7.9	7.5	0.045	0.212	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/05/52-12/28/55	3	0.016	0.02	0.032	0.013	0.	0.01	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	03/05/52-12/28/55	3	10.	11.867	20.	5.6	54.453	7.379	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/05/52-12/28/55	3	325.	294.333	328.	230.	3106.333	55.734	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	03/05/52-12/28/55	3	396.	358.667	400.	280.	4645.333	68.157	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	03/05/52-12/28/55	3	0.	0.	0.	0.	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/05/52-12/28/55	3	330.	308.667	352.	244.	3257.333	57.073	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	03/05/52-12/28/55	3	14.	14.667	28.	2.	169.333	13.013	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	03/05/52-12/28/55	3	77.	71.333	104.	33.	1284.333	35.838	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	03/05/52-12/28/55	3	34.	31.667	39.	22.	76.333	8.737	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	03/05/52-12/28/55	3	10.	10.367	13.	8.1	6.103	2.47	**	**	**	**
00931	SODIUM ADSORPTION RATIO	03/05/52-12/28/55	3	0.2	0.267	0.4	0.2	0.013	0.115	**	**	**	**
00932	SODIUM, PERCENT	03/05/52-12/28/55	3	6.	7.	10.	5.	7.	2.646	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	03/05/52-12/28/55	3	13.	12.667	13.	12.	0.333	0.577	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0044

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	3	0	0.00	2	0	0.00	1	0	0.00						
		Other-Lo Lim.	6.5	3	0	0.00	2	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00	2	0	0.00	1	0	0.00						
		Drinking Water	250.	3	0	0.00	2	0	0.00	1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0045

NPS Station ID: CHIC0045
LAT/LON: 34.458338/ -96.940837
Agency: 112WRD
Date Created: 09/04/93
Location: 01S-03E-24 ACB 1 LOWRANCE SPRING 2
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): 342730096562701
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0045

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	1	18.7	18.7	18.7	18.7	0.	0.	**	**	**	**
00059	FLOW, RATE, INSTANTANEOUS GALLONS/MIN	08/20/92-08/20/92	1	0.52	0.52	0.52	0.52	0.	0.	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	1	643.	643.	643.	643.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.3	7.3	7.3	7.3	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.3	7.3	7.3	7.3	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	08/20/92-08/20/92	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.032	0.032	0.032	0.032	0.	0.	**	**	**	**
00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	1	409.	409.	409.	409.	0.	0.	**	**	**	**
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	08/20/92-08/20/92	1	0.7	0.7	0.7	0.7	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	1	73.	73.	73.	73.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	1	35.	35.	35.	35.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	1	8.7	8.7	8.7	8.7	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	1	1.6	1.6	1.6	1.6	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	1	14.	14.	14.	14.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	1	10.	10.	10.	10.	0.	0.	**	**	**	**
39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	1	335.	335.	335.	335.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	1	372.	372.	372.	372.	0.	0.	**	**	**	**

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EPA Water Quality Criteria Analysis for Station: CHIC0045

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0045

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00631	NITRITE PLUS NITRATE, DISS. 1 DET.	Drinking Water	10.	1	0	0.00							1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00							1	0	0.00			
		Drinking Water	250.	1	0	0.00							1	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0046

NPS Station ID: CHIC0046 LAT/LON: 34.458531/ -96.942588 Agency: 11NPSWRD Date Created: 09/20/97
Location: UNNAMED SPRING NEXT TO LOWRANCE SPRINGS FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_OGS_UNN_37/1S-3E-24BDA1
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1050 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AN UNNAMED SPRING NEXT TO LOWRANCE SPRINGS APPROXIMATELY 1/4 MILE NORTHEAST OF LOWRANCE LAKE. SAMPLES FOR THE SITE WERE COLLECTED FEBRUARY 22 1977 DURING A STUDY CONDUCTED BY THE UNITED STATES GEOLOGICAL SURVEY (USGS) IN COOPERATION WITH THE OKLAHOMA GEOLOGICAL SURVEY (OGS). THE DATA WERE PUBLISHED IN THE 1990 REPORT "HYDROLOGY OF THE ARBUCKLE MOUNTAINS AREA; SOUTH-CENTRAL OKLAHOMA" BY ROY W. FAIRCHILD; RONALD L. HANSON; AND ROBERT E. DAVIS. THE LATITUDE AND LONGITUDE COORDINATE VALUES FOR THE SITE WERE OBTAINED BY DIGITIZING A POINT THAT MATCHED THE SITE TYPE AND THE SITE'S TOWNSHIP; RANGE; AND QUARTER-QUARTER-QUARTER SECTION LOCATION (SECSTA1) AS ILLUSTRATED IN FIGURE 2 OF THE REPORT. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0046

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/77-02/22/77	1	16.	16.	16.	16.	0.	0.	**	**	**	**
00058	FLOW, RATE GALLONS/MIN	02/22/77-02/22/77	1	1700.	1700.	1700.	1700.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/77-02/22/77	1	600.	600.	600.	600.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	02/22/77-02/22/77	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	02/22/77-02/22/77	1	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/22/77-02/22/77	1	0.032	0.032	0.032	0.032	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0046

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400 PH	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
	Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0047

NPS Station ID: CHIC0047
Location: 01S-03E-24 BDA 1
Station Type: /TYPA/AMBNT/SPRING
RMI-Indexes:
RMI-Miles:
HUC: 11130303
Major Basin:
Minor Basin:
RF1 Index: 11130303
RF3 Index: 11130303004901.87
Description:

LAT/LON: 34.458615/ -96.941670
Depth of Water: 0
Elevation: 0
RF1 Mile Point: 0.000
RF3 Mile Point: 3.78

Agency: 112WRD
FIPS State/County: 40099 OKLAHOMA/MURRAY
STORET Station ID(s): 342731096563001
Within Park Boundary: No
Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 8.70
Distance from RF3: 0.75

Date Created: 04/14/78
On/Off RF1:
On/Off RF3:

Parameter Inventory for Station: CHIC0047

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/18/77-07/25/88	2	17.75	17.75	18.5	17.	1.125	1.061	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	10/18/77-10/18/77	1	4.	4.	4.	4.	0.	0.	**	**	**	**
00080	COLOR (PLATINUM-COBALT UNITS)	10/18/77-10/18/77	1	2.	2.	2.	2.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/18/77-07/25/88	2	745.	745.	880.	610.	36450.	190.919	**	**	**	**
00400	PH (STANDARD UNITS)	10/18/77-07/25/88	2	7.25	7.25	7.4	7.1	0.045	0.212	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	10/18/77-07/25/88	2	7.225	7.225	7.4	7.1	0.046	0.215	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/18/77-07/25/88	2	0.06	0.06	0.079	0.04	0.001	0.028	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	10/18/77-10/18/77	1	25.	25.	25.	25.	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	1	330.	330.	330.	330.	0.	0.	**	**	**	**
00435	ACIDITY, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	10/18/77-10/18/77	1	400.	400.	400.	400.	0.	0.	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	10/18/77-10/18/77	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/18/77-10/18/77	1	330.	330.	330.	330.	0.	0.	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/18/77-10/18/77	1	2.	2.	2.	2.	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/18/77-10/18/77	1	73.	73.	73.	73.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/18/77-10/18/77	1	36.	36.	36.	36.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	10/18/77-10/18/77	1	8.8	8.8	8.8	8.8	0.	0.	**	**	**	**
00931	SODIUM ADSORPTION RATIO	10/18/77-10/18/77	1	0.2	0.2	0.2	0.2	0.	0.	**	**	**	**
00932	SODIUM, PERCENT	10/18/77-10/18/77	1	5.	5.	5.	5.	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	10/18/77-10/18/77	1	1.5	1.5	1.5	1.5	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/18/77-10/18/77	1	12.	12.	12.	12.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	10/18/77-10/18/77	1	9.	9.	9.	9.	0.	0.	**	**	**	**
00950	FLUORIDE, DISSOLVED (MG/L AS F)	10/18/77-10/18/77	1	0.1	0.1	0.1	0.1	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	10/18/77-10/18/77	1	11.	11.	11.	11.	0.	0.	**	**	**	**
01000	ARSENIC, DISSOLVED (UG/L AS AS)	10/18/77-10/18/77	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01025	CADMIUM, DISSOLVED (UG/L AS CD)	10/18/77-10/18/77	1 ##	10.	10.	10.	10.	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	10/18/77-10/18/77	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	10/18/77-10/18/77	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	10/18/77-10/18/77	1	70.	70.	70.	70.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	10/18/77-10/18/77	1	40.	40.	40.	40.	0.	0.	**	**	**	**
01056	MANGANESE, DISSOLVED (UG/L AS MN)	10/18/77-10/18/77	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01090	ZINC, DISSOLVED (UG/L AS ZN)	10/18/77-10/18/77	1	200.	200.	200.	200.	0.	0.	**	**	**	**
01106	ALUMINUM, DISSOLVED (UG/L AS AL)	10/18/77-10/18/77	1	30.	30.	30.	30.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/18/77-10/18/77	1	322.	322.	322.	322.	0.	0.	**	**	**	**
70301	SOLIDS, DISSOLVED-SUM OF CONSTITUENTS (MG/L)	10/18/77-10/18/77	1	349.	349.	349.	349.	0.	0.	**	**	**	**
70302	SOLIDS, DISSOLVED-TONS PER DAY	10/18/77-10/18/77	1	3.48	3.48	3.48	3.48	0.	0.	**	**	**	**
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	10/18/77-10/18/77	1	0.44	0.44	0.44	0.44	0.	0.	**	**	**	**
71825	ACIDITY, TOTAL (MG/L AS H)	10/18/77-10/18/77	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0047

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
71890	MERCURY, DISSOLVED (UG/L AS HG)	10/18/77-10/18/77	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0047

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00	1	0	0.00									
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	1	0	0.00	1	0	0.00									
01000	ARSENIC, DISSOLVED	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00	1	0	0.00									
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	1	1.00	1	1	1.00									
01090	ZINC, DISSOLVED	Fresh Acute	120.	1	1	1.00	1	1	1.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
71890	MERCURY, DISSOLVED	Fresh Acute	2.4	1	0	0.00	1	0	0.00									
		Drinking Water	2.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0048

NPS Station ID: CHIC0048
LAT/LON: 34.458837/ -96.941254
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Buckhorn Creek at Lowrance Springs
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_BUCK1
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 1047
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/24. Station is known as Buckhorn Creek Site 1 and is located on Buckhorn Creek at Lowrance Springs. Lowrance Springs are on private property and are the source of Buckhorn Creek. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	83	17.9	18.043	19.7	16.6	0.379	0.616	17.3	17.5	18.5	18.9
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	83	583.	577.94	641.	294.	2833.862	53.234	523.4	568.	610.	625.
00300	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	82	4.6	4.59	7.8	2.2	0.351	0.592	4.13	4.4	4.8	5.07
00403	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	83	7.4	7.413	8.4	6.7	0.07	0.265	7.2	7.3	7.4	7.8
00403	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	83	7.4	7.349	8.4	6.7	0.074	0.273	7.2	7.3	7.4	7.8
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	83	0.04	0.045	0.2	0.004	0.001	0.024	0.016	0.04	0.05	0.063
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	83	326.	329.699	501.	301.	559.701	23.658	315.	321.	331.	337.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	83	0.04	0.069	0.65	0.	0.009	0.094	0.01	0.02	0.08	0.14
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	61	0.002	0.002	0.008	0.	0.	0.002	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	83	0.69	0.67	0.98	0.24	0.018	0.136	0.484	0.58	0.75	0.826
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	61	0.16	0.197	0.62	0.01	0.015	0.124	0.08	0.12	0.24	0.414
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	83	338.	332.361	397.	221.	819.331	28.624	322.	332.	342.	350.2
00945	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	81	15.	14.617	19.	9.	2.939	1.714	12.2	14.	16.	16.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	83	336.	330.928	393.	221.	804.19	28.358	320.	330.	340.	349.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	83	0.	1.434	12.	0.	6.2	2.49	0.	0.	3.	5.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	62	0.15	0.217	0.8	0.03	0.026	0.162	0.08	0.12	0.303	0.43
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	83	1.1	1.525	7.3	0.2	1.488	1.22	0.3	0.7	2.	3.22

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0048

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	82	4	0.05	34	1	0.03	28	0	0.00	20	3	0.15			
00403	PH, LAB	Other-Hi Lim.	9.	83	0	0.00	34	0	0.00	28	0	0.00	21	0	0.00			
		Other-Lo Lim.	6.5	83	0	0.00	34	0	0.00	28	0	0.00	21	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	61	0	0.00	24	0	0.00	22	0	0.00	15	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	83	0	0.00	34	0	0.00	28	0	0.00	21	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	81	0	0.00	34	0	0.00	27	0	0.00	20	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	83	0	0.00	34	0	0.00	28	0	0.00	21	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	9	18.4	18.178	18.7	17.5	0.207	0.455	17.5	17.65	18.5	18.7
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	9	628.	622.778	641.	580.	352.444	18.774	580.	614.5	636.	641.
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	9	4.5	4.578	4.9	4.4	0.022	0.148	4.4	4.5	4.65	4.9
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	9	7.3	7.244	7.7	6.7	0.088	0.296	6.7	7.	7.4	7.7
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	9	7.3	7.149	7.7	6.7	0.098	0.313	6.7	7.	7.4	7.7
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	9	0.05	0.071	0.2	0.02	0.003	0.055	0.02	0.04	0.1	0.2
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	9	326.	344.	501.	315.	3481.5	59.004	315.	323.5	327.5	501.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	9	0.03	0.074	0.34	0.	0.012	0.11	0.	0.01	0.12	0.34
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	9	0.002	0.002	0.002	0.	0.	0.001	0.	0.001	0.002	0.002
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	9	0.74	0.767	0.98	0.53	0.018	0.133	0.53	0.68	0.865	0.98
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	9	0.26	0.29	0.49	0.06	0.024	0.154	0.06	0.155	0.45	0.49
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	9	341.	340.333	352.	328.	43.75	6.614	328.	336.5	343.5	352.
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	9	14.	14.778	17.	13.	1.694	1.302	13.	14.	16.	17.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	9	337.	337.333	346.	328.	38.	6.164	328.	332.	343.5	346.
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	9	4.	3.	7.	0.	8.75	2.958	0.	0.	5.5	7.
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	9	0.3	0.522	1.7	0.2	0.229	0.479	0.2	0.2	0.65	1.7

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	12	17.6	17.8	19.	16.6	0.438	0.662	16.78	17.5	18.45	18.85
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	12	590.	566.5	629.	294.	8035.	89.638	370.2	559.75	615.	627.8
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	12	4.7	4.608	5.1	4.1	0.077	0.278	4.13	4.375	4.7	5.01
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	12	7.35	7.358	7.5	7.3	0.004	0.067	7.3	7.3	7.4	7.47
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	12	7.347	7.354	7.5	7.3	0.004	0.067	7.3	7.3	7.4	7.47
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	12	0.045	0.044	0.05	0.032	0.	0.006	0.034	0.04	0.05	0.05
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	323.5	322.583	336.	302.	80.447	8.969	305.3	318.5	328.5	334.8
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.02	0.056	0.4	0.	0.012	0.11	0.	0.02	0.04	0.298
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	12	0.003	0.003	0.004	0.	0.	0.001	0.	0.002	0.004	0.004
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.73	0.699	0.88	0.39	0.021	0.147	0.408	0.665	0.775	0.877
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	12	0.135	0.154	0.28	0.08	0.004	0.065	0.083	0.103	0.205	0.271
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	333.	328.25	376.	230.	1121.477	33.488	258.8	330.	337.5	364.9
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	12	14.	13.5	16.	12.	1.727	1.314	12.	12.	14.	15.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	333.	328.25	376.	230.	1121.477	33.488	258.8	330.	337.5	364.9
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	12	0.85	0.892	1.9	0.3	0.199	0.446	0.33	0.525	1.1	1.72

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	11	18.2	18.264	19.7	17.3	0.615	0.784	17.3	17.6	18.9	19.58
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	11	570.	563.273	612.	418.	2824.818	53.149	442.8	550.	600.	611.6
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	11	4.5	4.464	5.2	3.8	0.129	0.359	3.86	4.3	4.6	5.1
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	11	7.3	7.373	8.2	7.2	0.08	0.283	7.2	7.2	7.4	8.04
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	11	7.3	7.321	8.2	7.2	0.083	0.288	7.2	7.2	7.4	8.04
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	11	0.05	0.048	0.063	0.006	0.	0.016	0.013	0.04	0.063	0.063
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	11	330.	326.818	351.	307.	138.964	11.788	308.8	318.	333.	348.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	11	0.03	0.049	0.11	0.02	0.001	0.03	0.02	0.03	0.08	0.104
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	11	0.002	0.004	0.008	0.002	0.	0.002	0.002	0.002	0.006	0.008
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	11	0.62	0.632	0.8	0.39	0.014	0.118	0.422	0.56	0.7	0.8
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	11	0.13	0.17	0.45	0.03	0.018	0.135	0.038	0.08	0.22	0.438

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	11	341.	340.727	360.	330.	69.018	8.308	330.4	335.	342.	357.8
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	11	15.	14.909	16.	14.	0.891	0.944	14.	14.	16.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	338.	339.727	360.	330.	71.418	8.451	330.4	335.	342.	357.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	11	0.	1.	4.	0.	3.	1.732	0.	0.	3.	4.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	11	0.16	0.215	0.53	0.03	0.021	0.147	0.046	0.12	0.32	0.506
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	11	1.4	1.618	3.7	0.3	0.932	0.965	0.4	0.9	2.2	3.48

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	12	18.25	18.258	19.1	17.4	0.397	0.63	17.43	17.65	18.95	19.1
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	12	580.5	572.917	610.	472.	1628.265	40.352	486.7	563.75	606.	609.7
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	12	4.55	4.617	5.4	4.1	0.14	0.374	4.13	4.4	4.85	5.31
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	12	7.4	7.367	7.6	7.2	0.013	0.115	7.2	7.3	7.4	7.57
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	12	7.4	7.353	7.6	7.2	0.014	0.116	7.2	7.3	7.4	7.57
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	12	0.04	0.044	0.063	0.025	0.	0.011	0.027	0.04	0.05	0.063
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	331.	329.	336.	314.	45.273	6.729	315.8	324.	333.75	335.4
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.03	0.068	0.28	0.01	0.006	0.078	0.013	0.023	0.093	0.241
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	12	0.002	0.003	0.008	0.	0.	0.002	0.	0.002	0.003	0.007
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.645	0.622	0.82	0.38	0.023	0.153	0.392	0.475	0.75	0.817
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	12	0.185	0.232	0.62	0.01	0.029	0.17	0.028	0.125	0.313	0.569
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	337.	336.	360.	317.	144.364	12.015	317.9	324.75	343.25	355.5
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	10	14.5	14.	18.	9.	8.444	2.906	9.	12.75	16.	17.8
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	335.5	334.5	360.	317.	133.182	11.54	317.9	324.75	339.5	355.2
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	0.	1.5	12.	0.	12.273	3.503	0.	0.	2.25	9.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	12	0.185	0.252	0.8	0.04	0.042	0.205	0.052	0.12	0.315	0.689
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	12	1.05	1.633	3.7	0.6	1.284	1.133	0.63	0.8	2.875	3.58

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	12	18.1	18.117	18.9	17.4	0.32	0.565	17.43	17.525	18.65	18.9
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	12	579.5	577.583	620.	436.	2444.265	49.44	470.8	573.5	609.75	620.
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	12	4.6	4.567	4.9	4.2	0.041	0.202	4.23	4.425	4.7	4.87
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	12	7.4	7.433	7.8	7.2	0.041	0.202	7.2	7.3	7.65	7.77
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	12	7.4	7.395	7.8	7.2	0.042	0.205	7.2	7.3	7.65	7.77
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	12	0.04	0.04	0.063	0.016	0.	0.016	0.017	0.023	0.05	0.063
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	324.	329.583	387.	315.	358.447	18.933	316.5	320.25	329.75	371.7
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.035	0.048	0.16	0.01	0.002	0.041	0.013	0.02	0.06	0.136
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.002	0.003	0.003
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.685	0.698	0.83	0.55	0.01	0.098	0.553	0.615	0.803	0.827
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	12	0.16	0.18	0.32	0.1	0.004	0.06	0.109	0.14	0.215	0.296
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	336.	329.083	349.	230.	1015.174	31.862	260.	330.25	341.75	349.
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	12	14.	14.25	16.	12.	1.114	1.055	12.3	14.	15.	15.7
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	335.5	327.25	349.	230.	994.386	31.534	257.9	327.75	341.	348.4
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	1.5	1.833	7.	0.	4.697	2.167	0.	0.	3.	6.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	12	0.155	0.206	0.53	0.03	0.021	0.144	0.051	0.113	0.29	0.494
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	12	1.	1.008	1.7	0.3	0.186	0.432	0.36	0.65	1.4	1.64

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	12	17.95	17.933	18.8	16.9	0.322	0.568	17.02	17.5	18.45	18.74
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	12	584.5	570.667	620.	481.	1691.333	41.126	492.4	539.25	593.5	618.5
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	11	4.6	4.627	7.8	2.2	1.68	1.296	2.56	4.1	4.8	7.22
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	12	7.35	7.6	8.4	7.2	0.195	0.441	7.23	7.3	8.125	8.34
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	12	7.347	7.453	8.4	7.2	0.218	0.467	7.23	7.3	8.125	8.34
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	12	0.045	0.035	0.063	0.004	0.	0.022	0.005	0.008	0.05	0.059
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	327.5	327.083	340.	315.	69.174	8.317	315.	320.5	333.	340.
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.06	0.113	0.65	0.02	0.03	0.172	0.02	0.043	0.095	0.497
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	03/03/87-05/12/92	5	0.002	0.002	0.003	0.002	0.	0.	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.67	0.607	0.78	0.24	0.025	0.159	0.279	0.558	0.708	0.771
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	03/03/87-05/12/92	5	0.16	0.152	0.21	0.1	0.002	0.041	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	339.	336.417	397.	230.	1421.902	37.708	260.9	338.	343.5	385.6
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	12	15.	14.5	16.	12.	1.364	1.168	12.3	14.	15.	16.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	338.	335.583	393.	230.	1377.174	37.11	260.9	336.	343.5	382.8
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	0.	0.833	4.	0.	2.515	1.586	0.	0.	1.5	4.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	12	0.13	0.243	0.79	0.08	0.044	0.211	0.086	0.113	0.323	0.697
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	12	1.9	2.242	7.3	0.3	4.159	2.039	0.36	0.925	2.4	6.64

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	12	17.75	17.942	18.7	17.3	0.346	0.588	17.3	17.35	18.575	18.67
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	12	581.	572.583	620.	463.	1982.629	44.527	482.2	548.75	608.25	618.5
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	12	4.8	4.642	5.2	2.2	0.634	0.796	2.89	4.65	5.075	5.17
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	12	7.4	7.458	7.8	7.2	0.046	0.215	7.2	7.3	7.675	7.8
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	12	7.4	7.414	7.8	7.2	0.048	0.22	7.2	7.3	7.675	7.8
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	12	0.04	0.039	0.063	0.016	0.	0.017	0.016	0.021	0.05	0.063
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	326.	328.083	384.	301.	404.265	20.106	304.3	318.5	330.	370.5
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.05	0.068	0.14	0.	0.002	0.05	0.003	0.033	0.123	0.14
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	12	0.695	0.693	0.92	0.52	0.013	0.115	0.538	0.59	0.76	0.899
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	12	334.	326.667	352.	221.	1210.788	34.796	251.3	323.5	345.5	351.7
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	12	16.	16.25	19.	14.	3.114	1.765	14.	15.	17.75	19.
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	334.	324.75	352.	221.	1204.75	34.71	249.5	320.5	344.75	351.4
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	12	0.	1.917	8.	0.	8.083	2.843	0.	0.	4.	7.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	12	0.145	0.19	0.43	0.04	0.014	0.117	0.058	0.12	0.285	0.409
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	12	2.15	2.233	3.9	0.9	0.892	0.944	0.93	1.35	3.05	3.72

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	3	17.6	17.5	17.6	17.3	0.03	0.173	**	**	**	**
00095p	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	3	612.	615.	628.	605.	139.	11.79	**	**	**	**
00300p	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	3	4.6	4.667	4.9	4.5	0.043	0.208	**	**	**	**
00403p	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	3	7.3	7.467	7.8	7.3	0.083	0.289	**	**	**	**
00403p	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	3	7.3	7.412	7.8	7.3	0.088	0.296	**	**	**	**
00403p	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	3	0.05	0.039	0.05	0.016	0.	0.02	**	**	**	**
00410p	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	3	328.	346.	388.	322.	1332.	36.497	**	**	**	**
00610p	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	3	0.07	0.087	0.18	0.01	0.007	0.086	**	**	**	**
00620p	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	3	0.65	0.653	0.69	0.62	0.001	0.035	**	**	**	**
00900p	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	3	332.	299.333	332.	234.	3201.333	56.58	**	**	**	**
00945p	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	3	15.	15.	16.	14.	1.	1.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

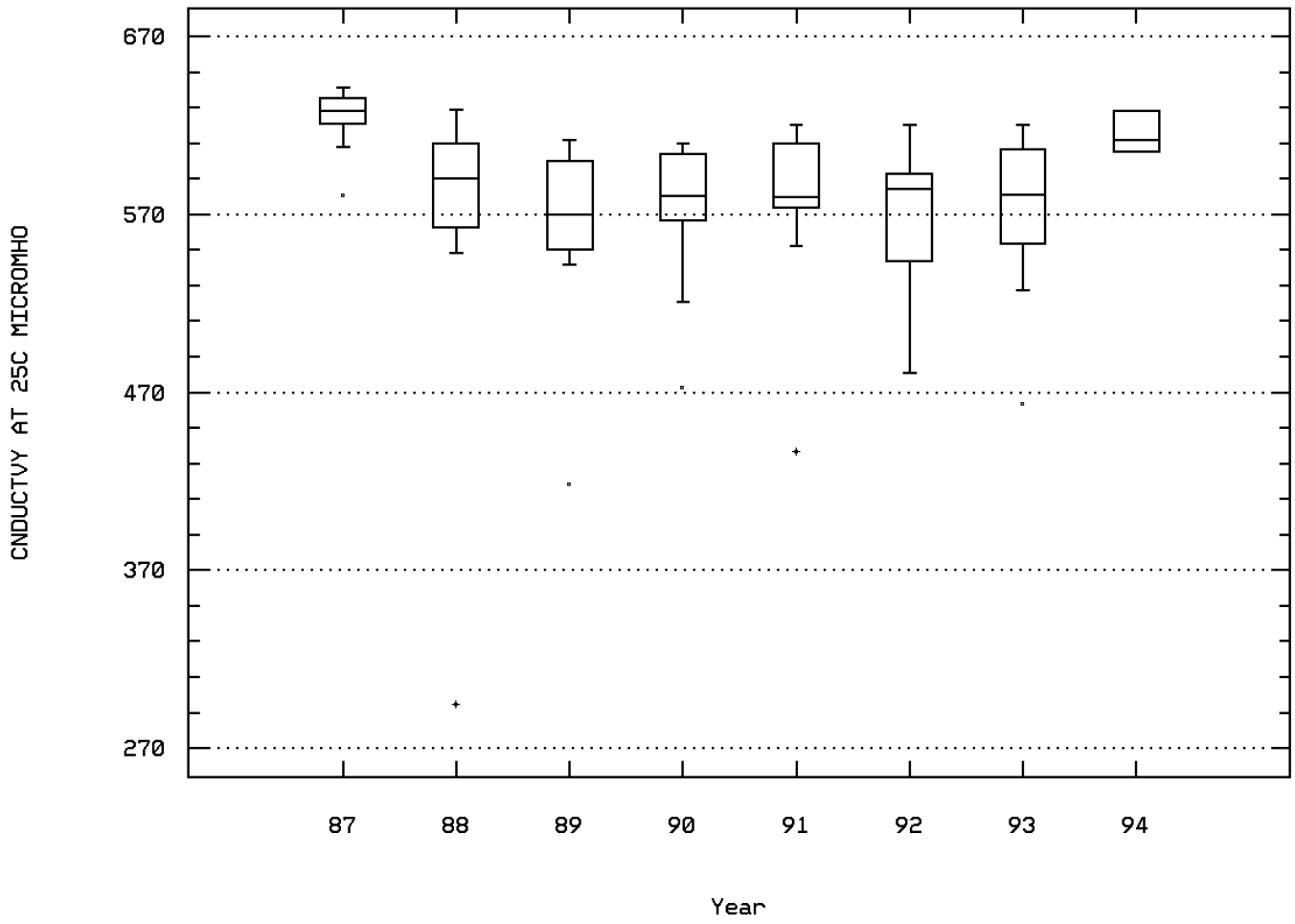
Annual Analysis for 1994 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634p	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	3	324.	296.667	332.	234.	2961.333	54.418	**	**	**	**
45635p	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	3	0.	2.667	8.	0.	21.333	4.619	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/06/89-03/02/94	3	0.14	0.127	0.16	0.08	0.002	0.042	**	**	**	**
82079p	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	3	2.	2.667	4.2	1.8	1.773	1.332	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station: CHIC0048 Parameter Code: 00095

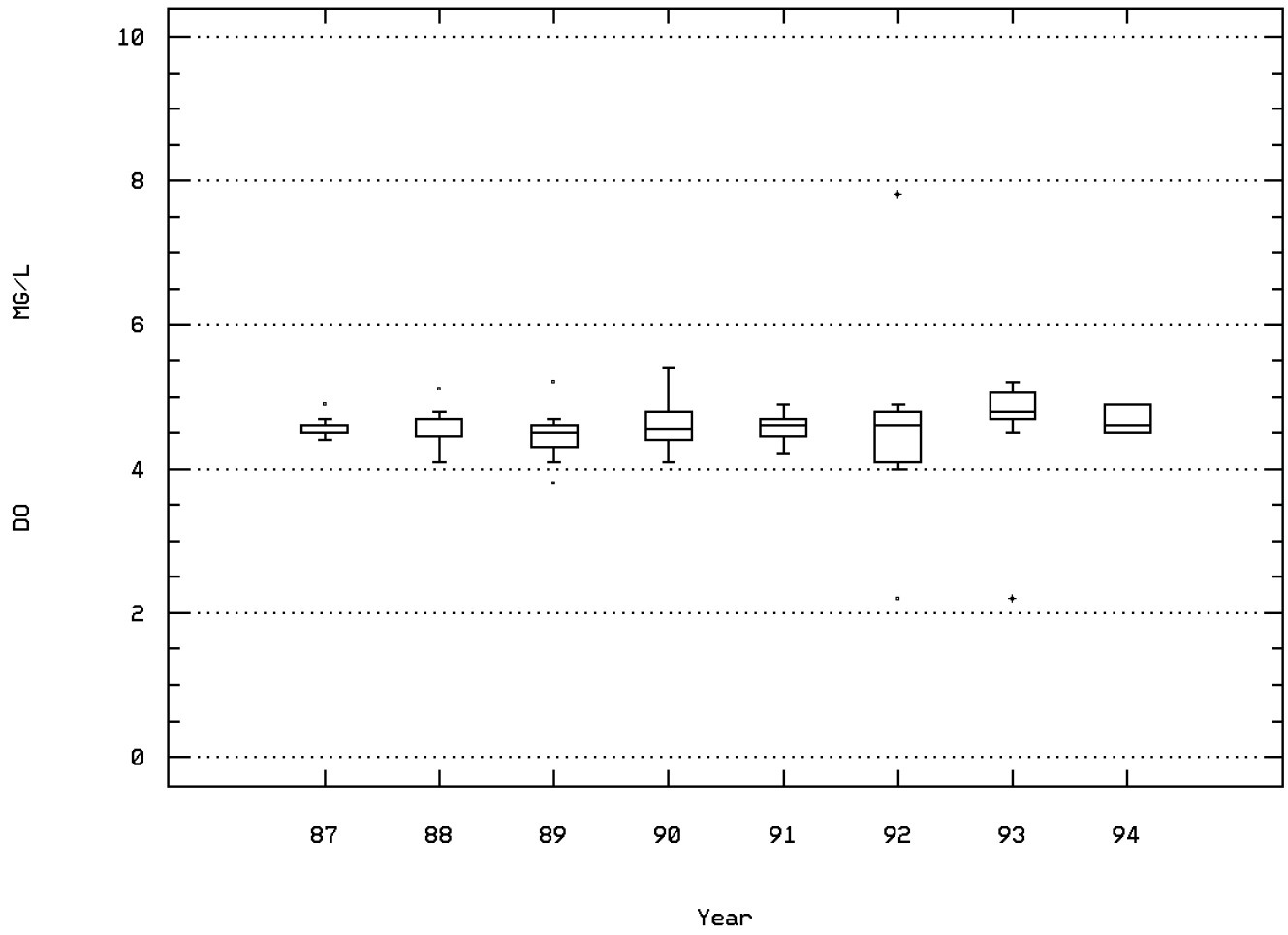
SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00300

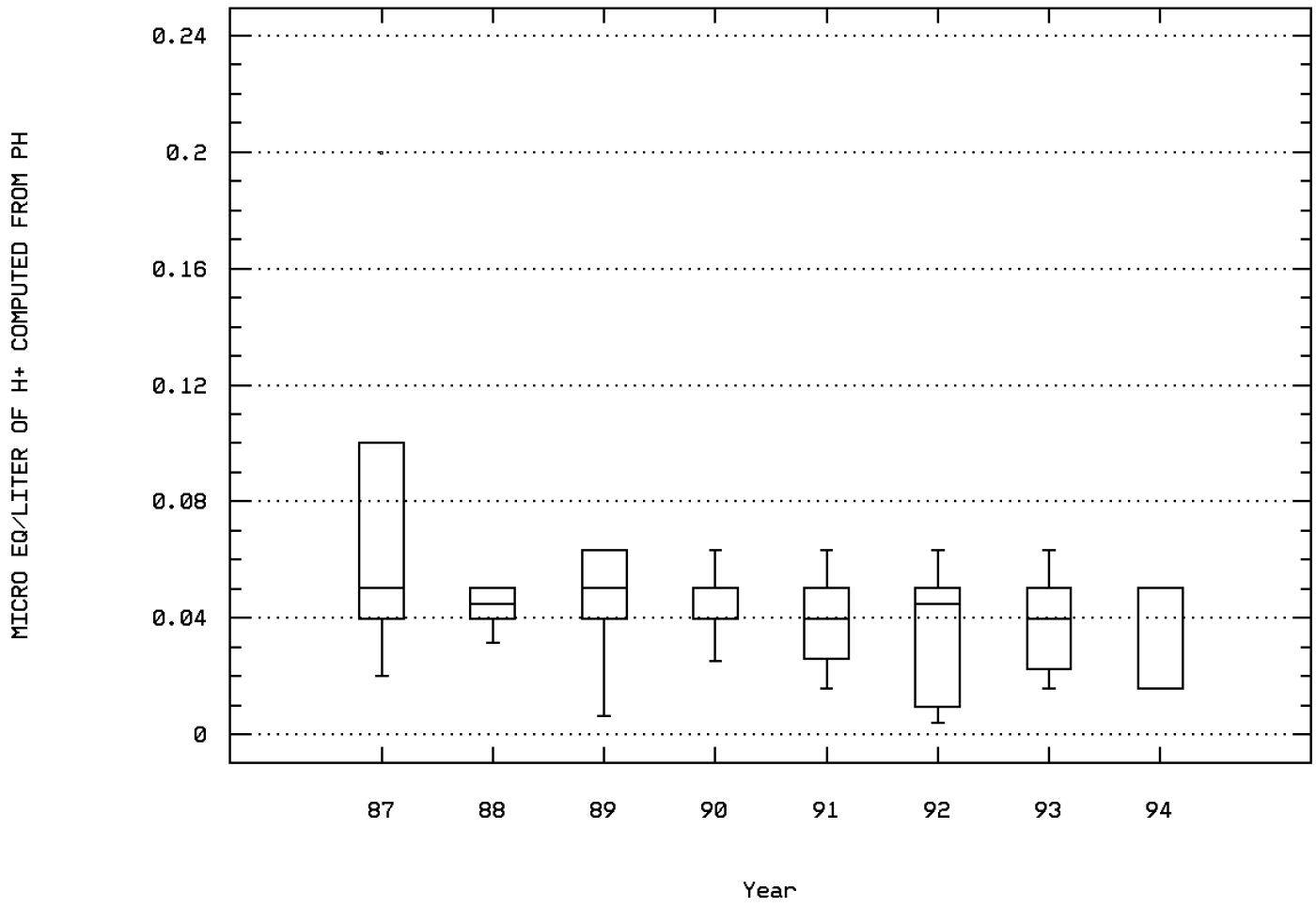
OXYGEN, DISSOLVED



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00403

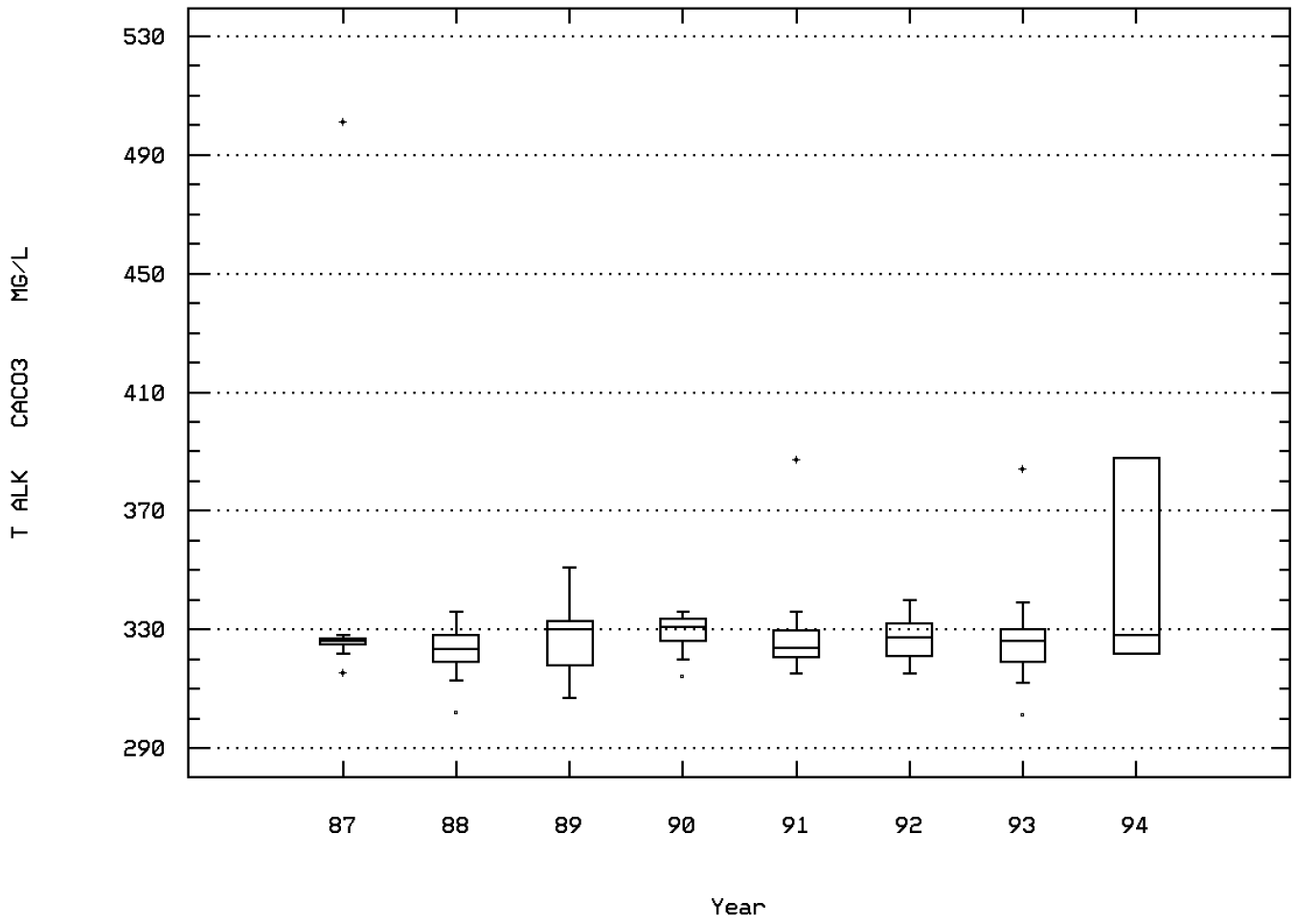
MICRO EQ/LITER OF H+ COMPUTED FROM PH



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00410

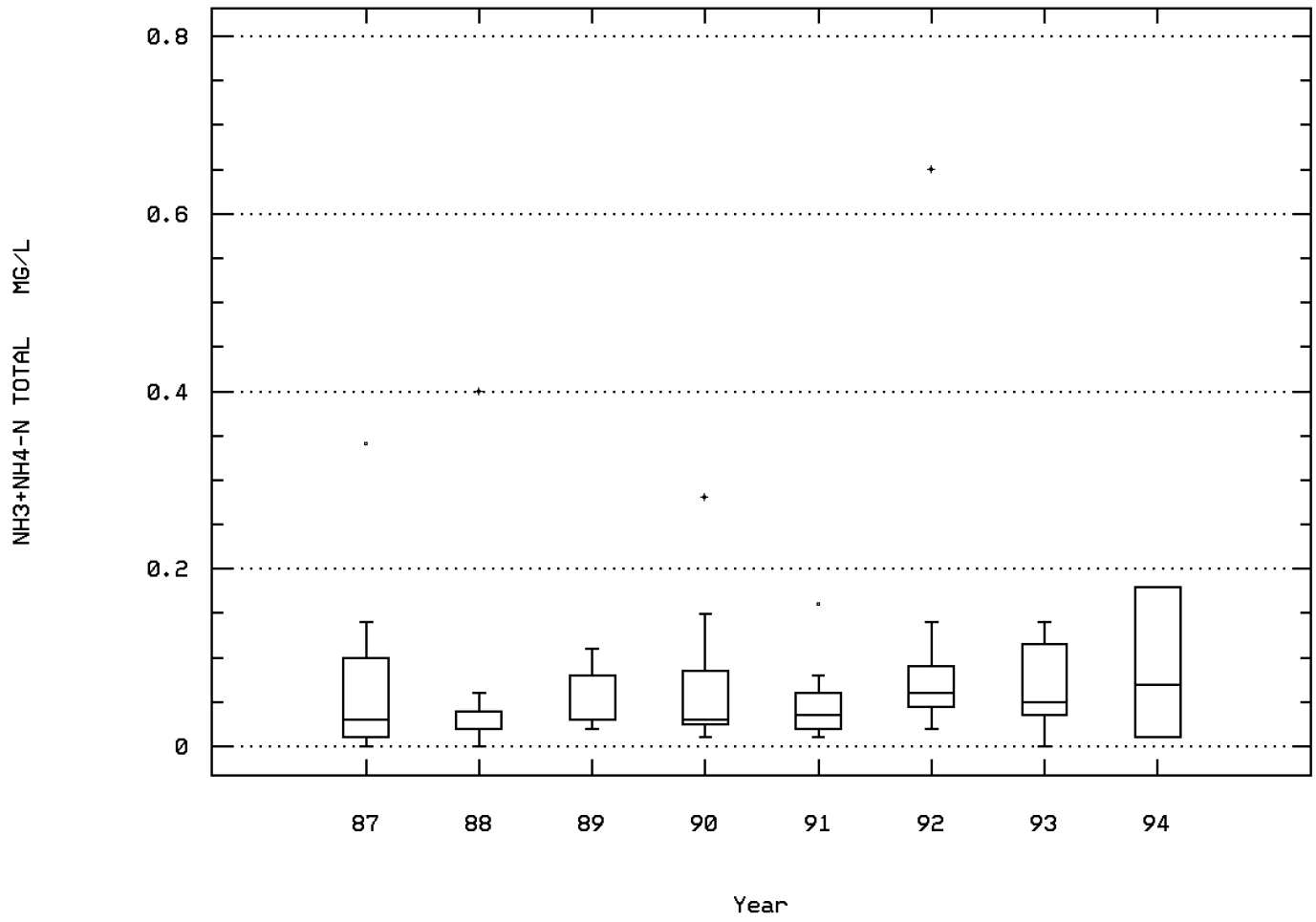
ALKALINITY, TOTAL (MG/L AS CACO3)



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00610

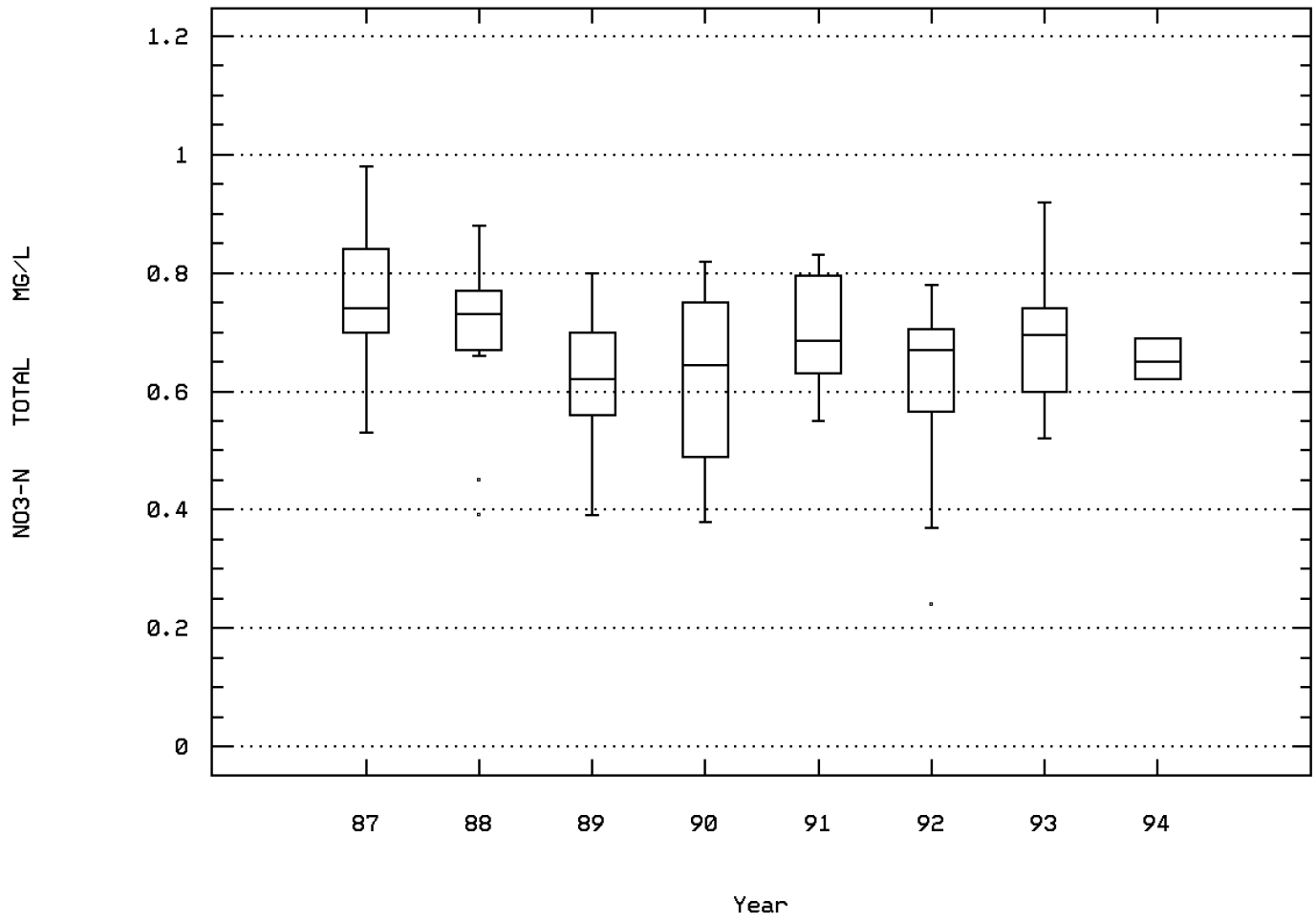
NITROGEN, AMMONIA, TOTAL (MG/L AS N)



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00620

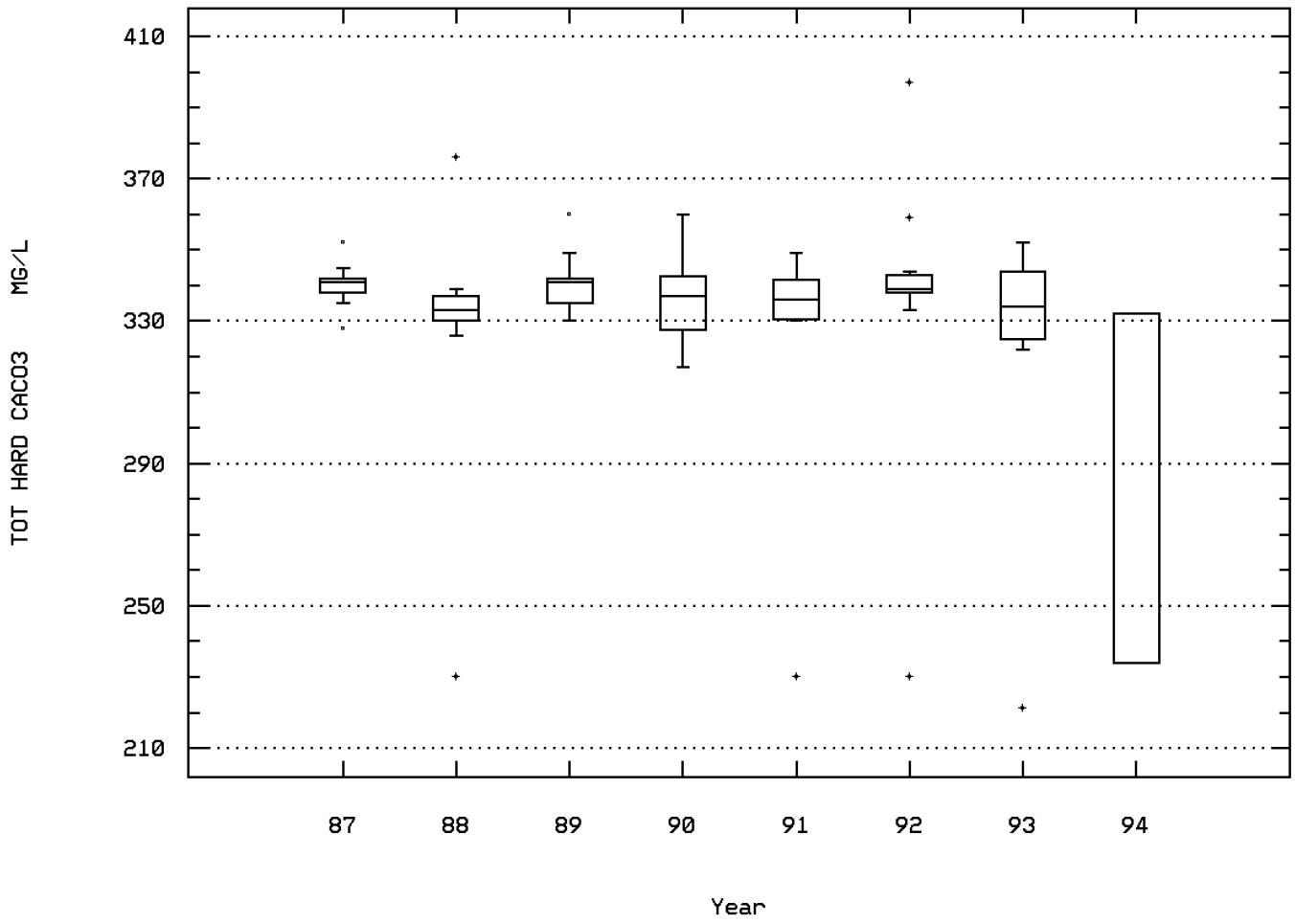
NITRATE NITROGEN, TOTAL (MG/L AS N)



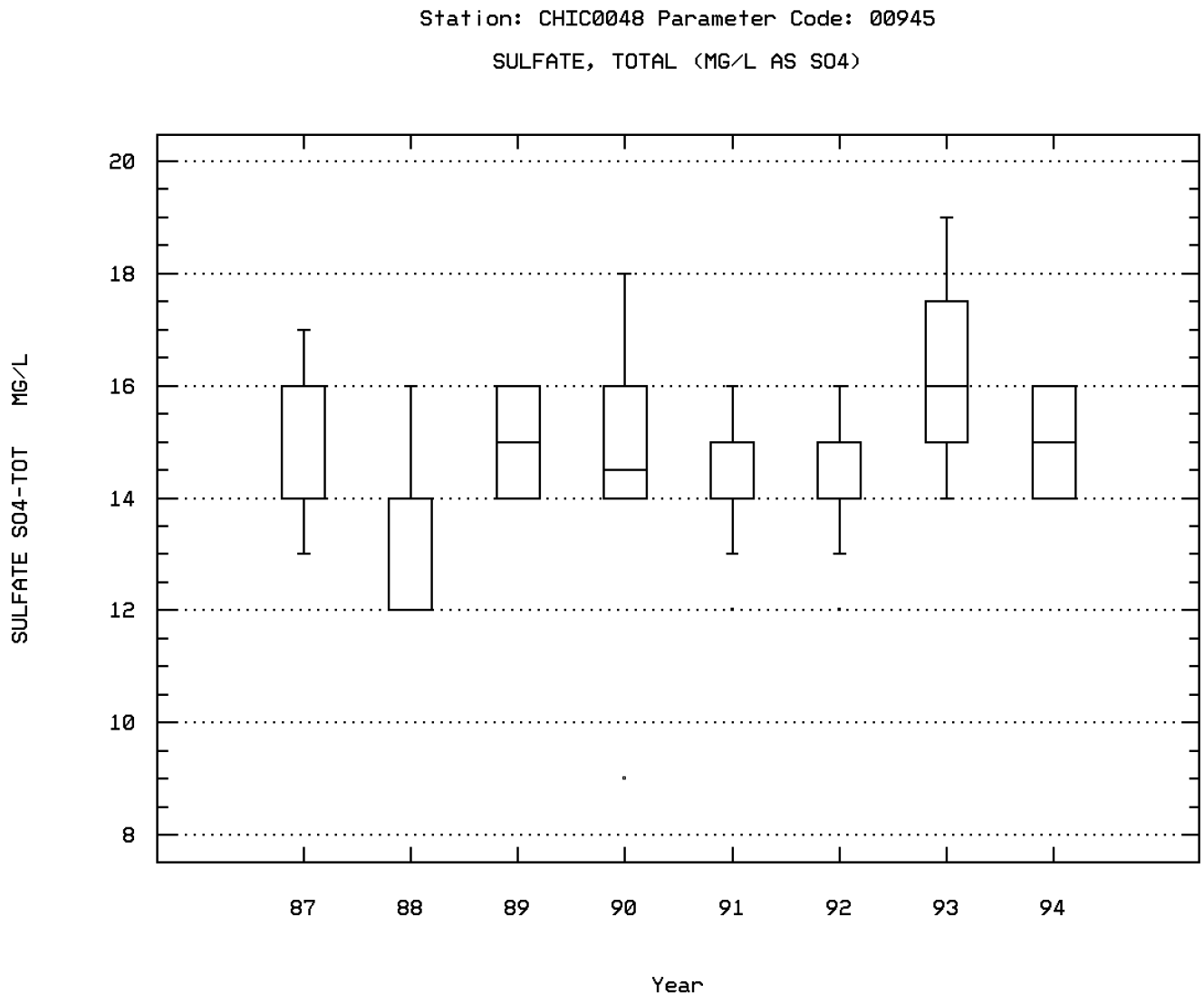
Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 00900

HARDNESS, TOTAL (MG/L AS CACO3)



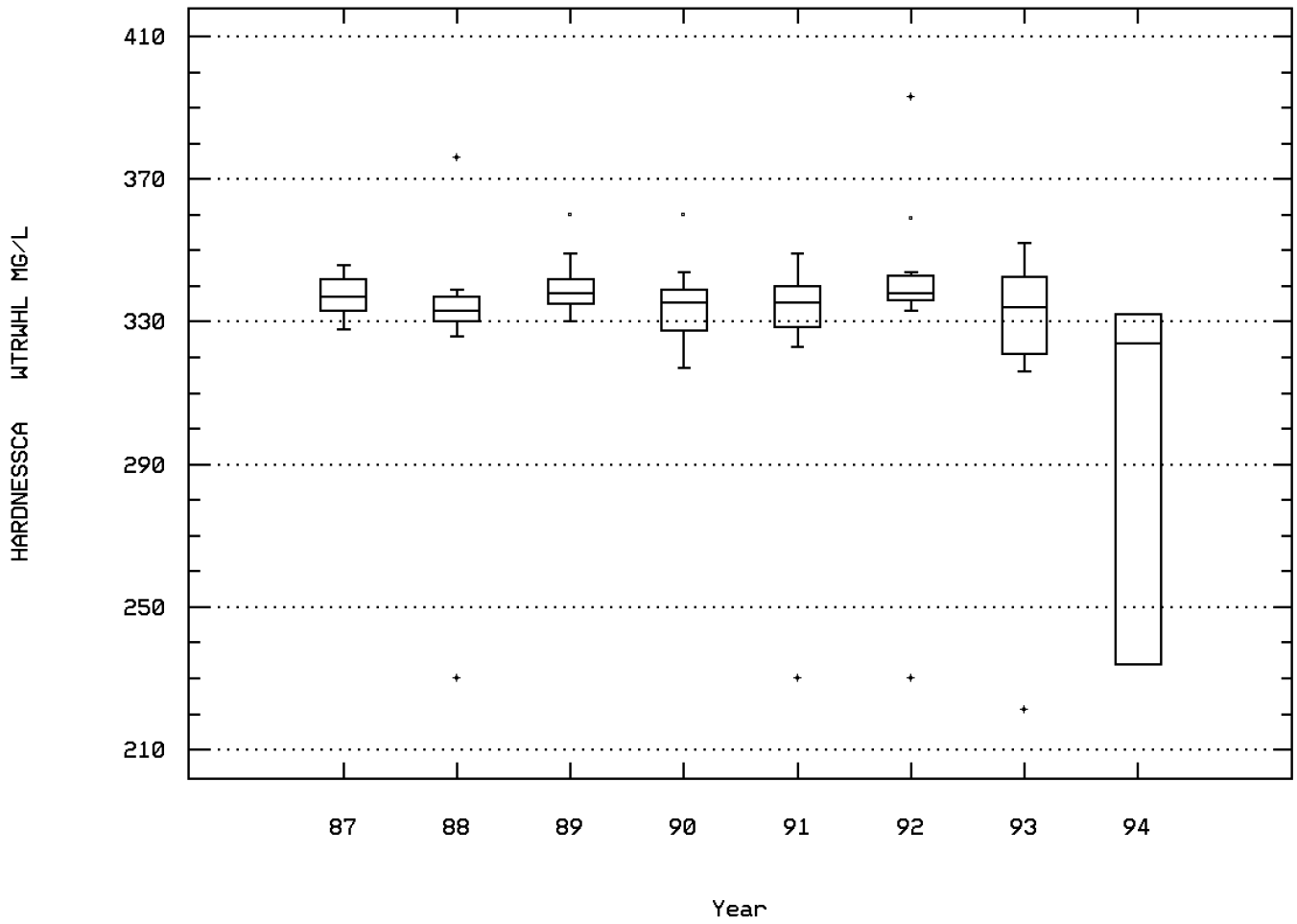
Buckhorn Creek at Lowrance Springs



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 45634

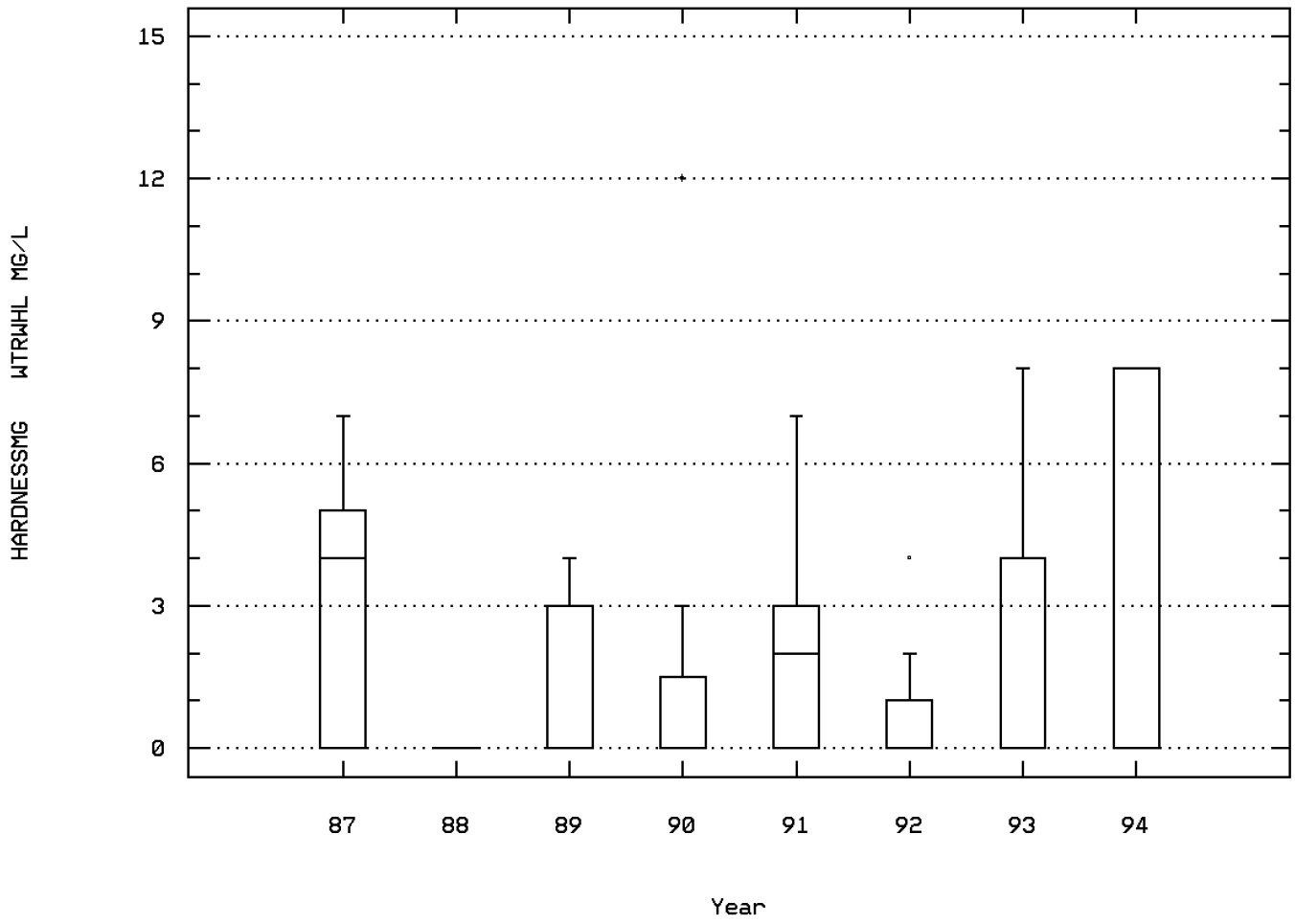
HARDNESS, CALCIUM, AS CAC03, WATER, WHO



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 45635

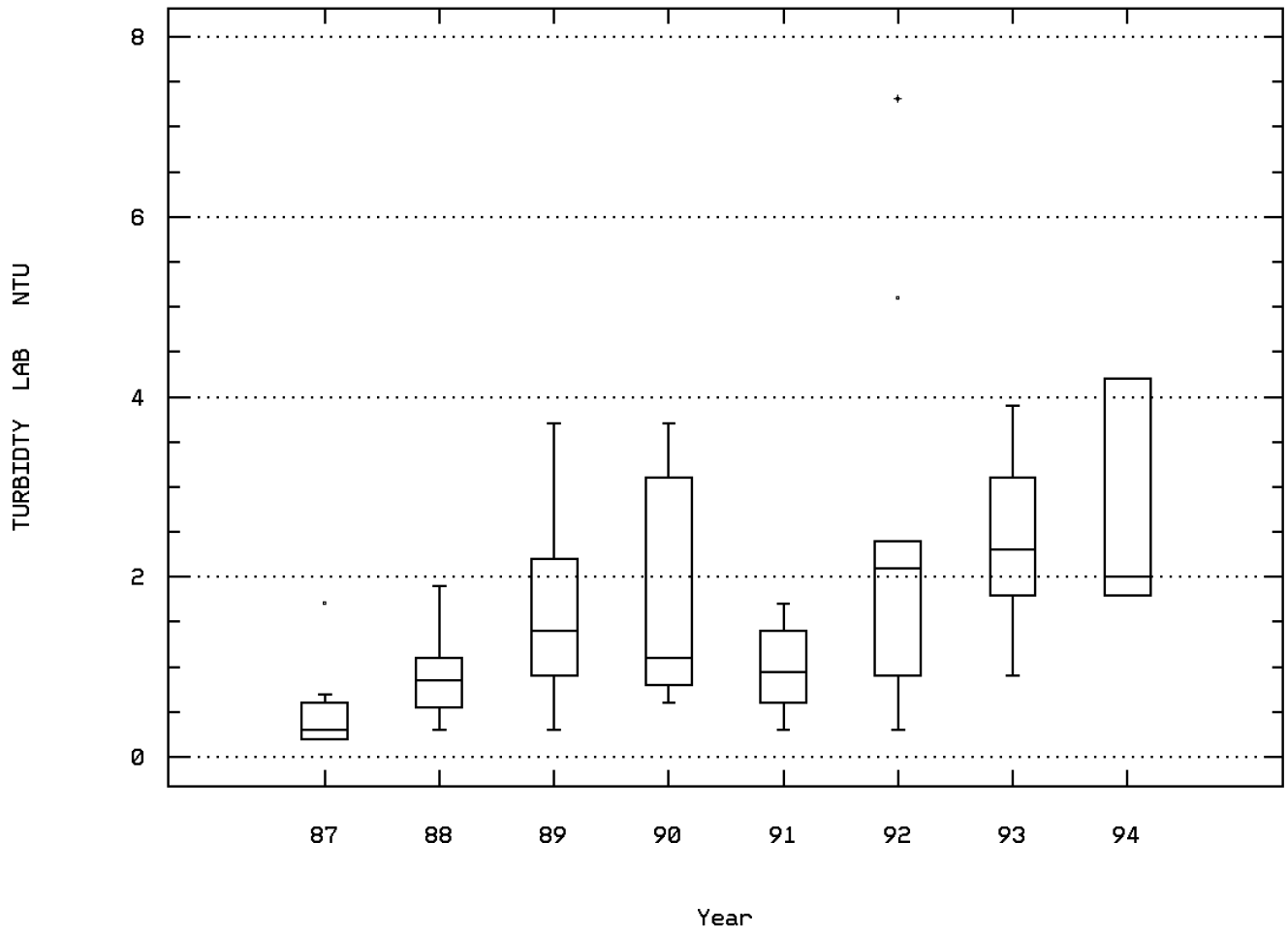
HARDNESS, MAGNESIUM, AS CAC03, WATER, W



Buckhorn Creek at Lowrance Springs

Station: CHIC0048 Parameter Code: 82079

TURBIDITY,LAB NEPHELOMETRIC TURBIDITY U



Buckhorn Creek at Lowrance Springs

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	34	17.5	17.562	19.	16.9	0.125	0.353	17.3	17.3	17.6	17.9
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	34	586.5	587.206	630.	472.	1144.047	33.824	541.5	571.5	620.	626.5
00300	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	34	4.7	4.668	5.2	4.	0.061	0.247	4.25	4.6	4.8	4.95
00403	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	34	7.4	7.476	8.2	7.2	0.059	0.244	7.3	7.3	7.525	7.8
00403	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	34	7.4	7.427	8.2	7.2	0.062	0.249	7.3	7.3	7.525	7.8
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	34	0.04	0.037	0.063	0.006	0.	0.014	0.016	0.03	0.05	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	34	322.	323.882	339.	307.	53.986	7.347	314.5	318.	329.25	334.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	34	0.045	0.067	0.4	0.	0.005	0.073	0.01	0.02	0.08	0.145
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	34	0.685	0.676	0.78	0.42	0.005	0.074	0.61	0.658	0.712	0.75
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	34	332.5	319.471	352.	221.	1501.954	38.755	230.	328.	338.	343.5
00945	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	34	14.5	14.647	19.	9.	2.963	1.721	13.	14.	16.	16.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	34	332.5	319.176	352.	221.	1499.725	38.726	230.	325.75	338.	343.5
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	34	0.	0.294	6.	0.	1.487	1.219	0.	0.	0.	0.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	34	1.	1.262	4.2	0.2	0.932	0.965	0.3	0.575	1.725	2.5

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	28	18.2	18.189	19.7	16.6	0.373	0.611	17.5	17.8	18.575	18.92
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	28	579.	562.107	635.	294.	4861.877	69.727	460.3	554.25	600.	625.4
00300	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	28	4.65	4.811	7.8	4.1	0.434	0.659	4.37	4.5	4.9	5.22
00403	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	28	7.35	7.364	7.9	6.7	0.039	0.197	7.29	7.3	7.4	7.7
00403	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	28	7.347	7.315	7.9	6.7	0.041	0.203	7.29	7.3	7.4	7.7
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	28	0.045	0.048	0.2	0.013	0.001	0.032	0.02	0.04	0.05	0.051
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	28	330.	341.286	501.	302.	1374.212	37.07	319.5	326.25	336.	387.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	28	0.055	0.072	0.34	0.	0.007	0.081	0.009	0.02	0.1	0.19
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	28	0.58	0.582	0.84	0.37	0.014	0.118	0.389	0.523	0.695	0.722
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	28	342.	342.714	376.	326.	134.063	11.579	328.	333.5	349.	360.
00945	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	27	15.	14.852	19.	9.	3.9	1.975	12.	14.	16.	17.2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	28	340.	340.75	376.	320.	162.491	12.747	323.9	332.25	347.	360.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	28	0.	1.964	12.	0.	10.776	3.283	0.	0.	3.5	8.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	28	1.6	1.632	3.7	0.2	0.782	0.884	0.38	1.	2.2	3.1

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0048

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/03/87-03/02/94	21	18.5	18.629	19.1	18.3	0.062	0.249	18.32	18.45	18.85	19.08
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/03/87-03/02/94	21	609.	584.048	641.	418.	2631.548	51.299	519.4	557.5	613.5	633.8
00300	OXYGEN, DISSOLVED MG/L	03/03/87-03/02/94	20	4.4	4.15	4.8	2.2	0.486	0.697	2.36	4.2	4.5	4.59
00403	PH, LAB, STANDARD UNITS SU	03/03/87-03/02/94	21	7.3	7.376	8.4	7.	0.126	0.355	7.04	7.2	7.4	8.12
00403	CONVERTED PH, LAB, STANDARD UNITS	03/03/87-03/02/94	21	7.3	7.286	8.4	7.	0.134	0.367	7.04	7.2	7.4	8.12
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/03/87-03/02/94	21	0.05	0.052	0.1	0.004	0.001	0.025	0.008	0.04	0.063	0.093
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	21	323.	323.667	340.	301.	66.833	8.175	312.8	320.	330.	332.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/03/87-03/02/94	21	0.03	0.068	0.65	0.	0.019	0.137	0.012	0.02	0.055	0.128
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/03/87-03/02/94	21	0.81	0.778	0.98	0.24	0.025	0.157	0.556	0.77	0.86	0.914
00900	HARDNESS, TOTAL (MG/L AS CACO3)	03/03/87-03/02/94	21	339.	339.429	397.	317.	215.057	14.665	323.6	336.	341.	341.8
00945	SULFATE, TOTAL (MG/L AS SO4)	03/03/87-03/02/94	20	14.	14.25	17.	12.	1.671	1.293	12.	14.	15.	15.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	21	336.	336.857	393.	317.	196.529	14.019	322.8	334.	338.	338.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	03/03/87-03/02/94	21	3.	2.571	7.	0.	4.457	2.111	0.	0.	4.	5.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	03/03/87-03/02/94	21	0.9	1.81	7.3	0.3	3.29	1.814	0.5	0.8	3.1	4.82

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0049

NPS Station ID: CHIC0049 LAT/LON: 34.461781/ -97.013003 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_EPA_5
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT THE ONE-FOOT DEPTH ON THE ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR APPROX. HALFWAY BETWEEN THE DAM AND WHERE ROCK CREEK ENTERS THE RESERVOIR. THIS SITE WAS USED TO SHOW THE INFLUENCE OF AN INFLUENT STREAM. DATA FOR THIS SITE WERE COLLECTED BI-WEEKLY FROM DECEMBER 1965 TO DECEMBER 1967 AND AT FOUR-WEEK INTERVALS FROM JANUARY 1968 TO APRIL 1970. THE SAMPLING WAS DONE BY THE U.S. ENVIRONMENTAL PROTECTION AGENCY TO ASSESS CHANGES IN WATER QUALITY RESULTING FROM THE CONSTRUCTION OF ARBUCKLE DAM. THE RESULTS WERE PUBLISHED IN THE 1971 REPORT "CHANGES IN WATER QUALITY RESULTING FROM IMPOUNDMENT" BY WILLIAM R. DUFFER AND CURTIS C. HARLIN. FOR INFORMATION ON THE ARBUCKLE AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0049

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	12	2.	2.333	3.	1.	0.424	0.651	1.3	2.	3.	3.
00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	11	24.	22.364	44.	9.	98.655	9.932	9.8	14.	25.	41.6
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	28 ##	0.	1.429	40.	0.	57.143	7.559	0.	0.	0.	0.
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	28 ##	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	13 ##	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	27	300.	656.852	3300.	37.	702484.439	838.143	43.6	130.	900.	2020.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	04/02/68-04/01/70	27	2.477	2.479	3.519	1.568	0.339	0.583	1.639	2.114	2.954	3.303
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			301.284								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	1.	31.019	262.	0.5	3881.202	62.299	0.5	0.5	21.	130.2
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	0.	0.574	2.418	-0.301	0.89	0.943	-0.301	-0.301	1.322	2.113
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			3.753								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	2.	24.444	226.	0.5	2617.276	51.159	0.5	1.	20.	100.4
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	0.301	0.592	2.354	-0.301	0.707	0.841	-0.301	0.	1.301	2.002
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			3.905								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	490.	1366.296	10000.	90.	4741585.678	2177.518	135.4	270.	1800.	3770.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	2.69	2.792	4.	1.954	0.281	0.53	2.131	2.431	3.255	3.56
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			619.173								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	320.	771.333	5700.	64.	1680604.462	1296.381	95.	131.	750.	2280.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	2.505	2.542	3.756	1.806	0.265	0.515	1.977	2.117	2.875	3.329

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0049

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			348.076								
74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	13	0.	0.077	1.	0.	0.077	0.277	0.	0.	0.	0.6

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0049

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	28	0	0.00	11	0	0.00	13	0	0.00	4	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	27	6	0.22	11	1	0.09	12	5	0.42	4	0	0.00			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	27	1	0.04	11	1	0.09	12	0	0.00	4	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0050

NPS Station ID: CHIC0050 LAT/LON: 34.464338/ -97.039781 Agency: 11NPSWRD Date Created: 09/20/97
Location: GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_EPA_8
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 850 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY HALFWAY FROM THE DAM TO THE NORTH EDGE OF THE RESERVOIR. DATA FOR THIS SITE WERE COLLECTED BI-WEEKLY FROM DECEMBER 1965 THROUGH DECEMBER 1967 AND AT FOUR-WEEK INTERVALS FROM JANUARY 1968 THROUGH APRIL 1970. THE SAMPLING WAS DONE BY THE U.S. ENVIRONMENTAL PROTECTION AGENCY (EPA) TO ASSESS CHANGES IN WATER QUALITY RESULTING FROM THE CONSTRUCTION OF ARBUCKLE DAM. THE RESULTS WERE PUBLISHED IN THE 1971 REPORT "CHANGES IN WATER QUALITY RESULTING FROM IMPOUNDMENT" BY WILLIAM R. DUFFER AND CURTIS C. HARLIN. FOR INFORMATION ON THE ARBUCKLE AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0050

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	04/02/68-02/07/70	12	2.	2.167	3.	2.	0.152	0.389	2.	2.	2.	3.
00340	COD, .25N K2CR2O7 MG/L	04/02/68-02/07/70	11	15.	17.273	28.	9.	31.418	5.605	9.8	13.	23.	27.2
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	04/02/68-04/01/70	28 ##	0.	2.429	32.	0.	52.55	7.249	0.	0.	0.	12.8
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	04/02/68-04/01/70	28 ##	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
01055	MANGANESE, TOTAL (UG/L AS MN)	07/24/68-04/01/70	13	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	04/02/68-04/01/70	27	280.	412.407	2400.	30.	248805.251	498.804	36.8	120.	500.	920.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	04/02/68-04/01/70	27	2.447	2.388	3.38	1.477	0.221	0.47	1.565	2.079	2.699	2.952
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			244.322								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	2.	14.204	92.	0.5	719.082	26.816	0.5	0.5	11.	76.8
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	04/02/68-04/01/70	27	0.301	0.467	1.964	-0.301	0.616	0.785	-0.301	-0.301	1.041	1.884
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			2.931								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	3.	20.389	160.	0.5	1513.795	38.908	0.5	0.5	19.	77.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	04/02/68-04/01/70	27	0.477	0.615	2.204	-0.301	0.665	0.815	-0.301	-0.301	1.279	1.872
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			4.122								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	510.	890.074	4300.	64.	1146202.302	1070.608	96.	190.	950.	2880.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	04/02/68-04/01/70	27	2.708	2.682	3.633	1.806	0.254	0.504	1.981	2.279	2.978	3.459
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			480.464								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	200.	300.222	1050.	18.	81601.487	285.66	50.	90.	370.	830.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	04/02/68-04/01/70	27	2.301	2.282	3.021	1.255	0.197	0.444	1.695	1.954	2.568	2.919
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			191.554								
74010	IRON, TOTAL (MG/L AS FE)	07/24/68-04/01/70	13	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0050

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	28	0	0.00	11	0	0.00	13	0	0.00	4	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	27	2	0.07	11	0	0.00	12	1	0.08	4	1	0.25			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	27	0	0.00	11	0	0.00	12	0	0.00	4	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0051

NPS Station ID: CHIC0051
LAT/LON: 34.464448/ -97.040559
Agency: 11EPALES
Date Created: / /
Location: ARBUCKLE LAKE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/LAKE
STORET Station ID(s): 400203
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 24
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303006
RF1 Mile Point: 7.600
Distance from RF1: 0.00
On/Off RF1: ON
RF3 Index: 11130303000402.37
RF3 Mile Point: 2.36
Distance from RF3: 0.02
On/Off RF3:
Description:
SANDY CREEK ARM; 130 DEGREES FR BROWN TWO STORY HOUSE; NEAR SM DAM ON W SHORE; 090 DEGREES FR PT ON W SHORE N OF SM INLET; 125 YDS FM W SHORE.
COMMENTS: 3-30 ULE 15, NO VEGE OR PHYTOPLANKTON; W SHORE 30% DEVELOPED; E SHORE UNDEVELOPED; CREEK CHANNEL TOO NARROW TO SET PROBE IN.
6-12 ULE 15, A FEW EMERGENT AQUATICS ALONG SHORE, NOTHING ELSE VISIBLE; HIGH TURBIDITY AT UPPER END OF ARM; DEPTH 25 FT.
10-23 ULE 14, NO VISIBLE AQUATICS; HARDWOOD FOREST ALONG SHORE; TURB READINGS IN QUESTION; INTEG 15 FT; DEPTH 22 FT.
MAP: DOUGHERTY QUAD

Parameter Inventory for Station: CHIC0051

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/73-10/23/74	11	18.9	19.191	26.8	11.5	37.497	6.123	11.58	13.1	25.5	26.8
00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	4	25.5	25.5	50.	1.	800.333	28.29	**	**	**	**
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/73-10/23/74	11	86.3	84.882	88.2	79.7	10.85	3.294	79.82	81.5	88.	88.16
00077	TRANSPARENCY, SECCHI DISC (INCHES)	06/12/74-10/23/74	2	43.	43.	50.	36.	98.	9.899	**	**	**	**
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	03/30/73-10/23/74	11	369.	370.091	421.	318.	1797.491	42.397	318.2	327.	416.	420.4
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/12/74-10/23/74	7	411.	410.	415.	401.	32.333	5.686	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	03/30/73-10/23/74	10	8.3	8.	9.8	5.4	2.124	1.458	5.44	7.15	9.25	9.76
00400	PH (STANDARD UNITS)	03/30/73-10/23/74	11	8.3	8.327	8.6	8.1	0.028	0.168	8.116	8.2	8.5	8.58
00400	CONVERTED PH (STANDARD UNITS)	03/30/73-10/23/74	11	8.3	8.299	8.6	8.1	0.029	0.171	8.116	8.2	8.5	8.58
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/30/73-10/23/74	11	0.005	0.005	0.008	0.003	0.	0.002	0.003	0.003	0.006	0.008
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	11	157.	156.455	160.	152.	9.673	3.11	152.	152.	159.	160.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	10	0.04	0.033	0.04	0.02	0.	0.009	0.02	0.02	0.04	0.04
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	11	0.4	0.445	1.	0.2	0.049	0.221	0.22	0.3	0.5	0.92
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	11	0.03	0.027	0.04	0.02	0.	0.006	0.02	0.02	0.03	0.038
00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	11	0.017	0.022	0.036	0.016	0.	0.007	0.016	0.017	0.029	0.035
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	11	0.008	0.008	0.014	0.005	0.	0.002	0.005	0.006	0.009	0.013
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/73-10/23/74	3	9.1	7.967	12.5	2.3	26.973	5.194	**	**	**	**
72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/73-10/23/74	3	24.	23.667	25.	22.	2.333	1.528	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0051

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	10	0	0.00	3	0	0.00	7	0	0.00						
00400	PH	Other-Hi Lim.	9.	11	0	0.00	3	0	0.00	8	0	0.00						
		Other-Lo Lim.	6.5	11	0	0.00	3	0	0.00	8	0	0.00						
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	11	0	0.00	3	0	0.00	8	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0052

NPS Station ID: CHIC0052
LAT/LON: 34.466115/ -97.014171
Agency: 11EPALES
Date Created: / /
Location: ARBUCKLE LAKE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/LAKE
STORET Station ID(s): 400202
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 30
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303006
RF1 Mile Point: 1.040
Distance from RF1: 0.00
On/Off RF1: ON
RF3 Index: 11130303000400.00
RF3 Mile Point: 0.00
Distance from RF3: 0.01
On/Off RF3:
Description:
ROCK CREEK ARM; 270 DEGREES FR PT ON E SHORE; OPPOSITE STEEP BANK ON W SHORE IN BEND; 10 YDS FR W SHORE.
COMMENTS: 3-30 ULE 13, NO VEGE OR PHYTOPLANKTON; NO DEVELOPMENT HERE, CAMPGROUND AND MARINA FURTHER DOWN ARM.
6-12 ULE 16, EMERGENT VEGE ON 50% OF SHORE; WEIRD CONDUCTIVITY LAYERS ON BOTTOM; DEPTH 33 FT.
10-23 ULE 15, NO VISIBLE AQUATICS; BOTTOM CLAY; INTEG 15 FT; DEPTH 30 FT MAP: DOUGHERTY QUAD

Parameter Inventory for Station: CHIC0052

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	03/30/74-10/23/74	13	19.	19.885	27.7	11.8	31.86	5.644	12.16	14.2	25.15	27.7
00031	LIGHT,INCIDENT, PERCENT REMAING AT CERTAIN DEPTH	06/12/74-10/23/74	2	1.	1.	1.	1.	0.	0.	**	**	**	**
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	03/30/74-10/23/74	13	85.	84.	89.3	70.1	34.187	5.847	71.9	82.	88.45	89.3
00077	TRANSPARENCY, SECCHI DISC (INCHES)	03/30/74-10/23/74	3	36.	42.	58.	32.	196.	14.	**	**	**	**
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	03/30/74-10/23/74	13	405.	417.	523.	330.	4840.833	69.576	330.8	355.5	492.	514.6
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	03/30/74-10/23/74	13	461.	456.692	529.	423.	1117.231	33.425	423.8	427.5	479.	515.8
00300	OXYGEN, DISSOLVED MG/L	03/30/74-10/23/74	12	8.5	7.267	9.8	1.	8.919	2.986	1.36	5.3	9.15	9.68
00400	PH (STANDARD UNITS)	03/30/74-10/23/74	13	8.25	8.323	8.7	8.1	0.031	0.177	8.14	8.2	8.45	8.66
00400	CONVERTED PH (STANDARD UNITS)	03/30/74-10/23/74	13	8.25	8.294	8.7	8.1	0.032	0.179	8.14	8.2	8.45	8.66
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/30/74-10/23/74	13	0.006	0.005	0.008	0.002	0.	0.002	0.002	0.004	0.006	0.007
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	03/30/74-10/23/74	13	166.	166.231	188.	150.	140.026	11.833	150.8	156.	173.	186.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/30/74-10/23/74	13	0.04	0.038	0.1	0.01	0.001	0.026	0.01	0.015	0.05	0.084
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/30/74-10/23/74	13	0.4	0.438	1.	0.3	0.038	0.194	0.3	0.3	0.5	0.84
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	03/30/74-10/23/74	13	0.03	0.025	0.05	0.01	0.	0.013	0.01	0.01	0.03	0.046
00665	PHOSPHORUS, TOTAL (MG/L AS P)	03/30/74-10/23/74	13	0.023	0.025	0.045	0.016	0.	0.008	0.016	0.019	0.027	0.042
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	03/30/74-10/23/74	13	0.009	0.008	0.012	0.006	0.	0.002	0.006	0.006	0.01	0.011
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	03/30/74-10/23/74	3	9.2	8.133	11.5	3.7	16.063	4.008	**	**	**	**
72025	DEPTH OF POND OR RESERVOIR IN FEET	03/30/74-10/23/74	3	30.	31.	33.	30.	3.	1.732	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0052

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	12	2	0.17	4	0	0.00	8	2	0.25						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0052

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	13	0	0.00	4	0	0.00	9	0	0.00						
		Other-Lo Lim.	6.5	13	0	0.00	4	0	0.00	9	0	0.00						
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	13	0	0.00	4	0	0.00	9	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0053

NPS Station ID: CHIC0053 LAT/LON: 34.467448/ -97.001643 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_HARP_24
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE ROCK CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY 1 MILE FROM WHERE ROCK CREEK ENTERS ARBUCKLE RESERVOIR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0053

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	07/04/77-07/04/77	2	1.75	1.75	2.3	1.2	0.605	0.778	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	07/04/77-07/04/77	2	16.	16.	17.	15.	2.	1.414	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/04/77-07/04/77	2	8.3	8.3	8.3	8.3	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/04/77-07/04/77	2	8.3	8.3	8.3	8.3	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/04/77-07/04/77	2	0.005	0.005	0.005	0.005	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	3	184.	186.667	192.	184.	21.333	4.619	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	3	17.	15.667	27.	3.	145.333	12.055	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-06/29/76	2	0.02	0.02	0.02	0.02	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-06/29/76	3	59.	59.	64.	54.	25.	5.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/04/77-07/04/77	2	400.	400.	400.	400.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0053

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403 PH, LAB	Other-Hi Lim.	9.	2	0	0.00							2	0	0.00			
	Other-Lo Lim.	6.5	2	0	0.00							2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0053

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00				3	0	0.00						
	Drinking Water	250.	3	0	0.00				3	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0054

NPS Station ID: CHIC0054 LAT/LON: 34.481892/ -97.031615 Agency: 11NPSWRD Date Created: 10/04/97
Location: GUY SANDY CREEK ARM OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_OST_A
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 872 Aquifer:
Major Basin: SOUTH CENTRAL MISS. R. Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE GUY SANDY CREEK ARM OF ARBUCKLE RESERVOIR IN CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE ON MARCH 27 1993. WATER AND SEDIMENT SAMPLES WERE ANALYZED FOR CONCENTRATIONS OF FIVE METALS. THE VALUES ARE THE MEAN CONCENTRATIONS FROM THREE SAMPLES. THE RESULTS WERE PUBLISHED IN ENVIRONMENTAL TOXICOLOGY AND CHEMISTRY 1995; VOL. 14; NO. 10; PP. 1781-1787. THE ARTICLE IS "FURTHER INVESTIGATIONS OF THE ETIOLOGY OF SUBCUTANEOUS NEOPLASMS IN NATIVE GIZZARD SHAD (DOROSOMA CEPEDIANUM)" BY JACOBS AND OSTRANDER. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NATIONAL RECREATION AREA P.O. BOX 201 SULPHUR OKLAHOMA 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY AT NPS-WRD 1201 OAK RIDGE DRIVE SUITE 250 FORT COLLINS CO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0054

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01025	CADMIUM, DISSOLVED (UG/L AS CD)	03/27/93-03/27/93	1 ##	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	03/27/93-03/27/93	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01040	COPPER, DISSOLVED (UG/L AS CU)	03/27/93-03/27/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01049	LEAD, DISSOLVED (UG/L AS PB)	03/27/93-03/27/93	1	0.7	0.7	0.7	0.7	0.	0.	**	**	**	**
01065	NICKEL, DISSOLVED (UG/L AS NI)	03/27/93-03/27/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
78412	CADMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	0.09	0.09	0.09	0.09	0.	0.	**	**	**	**
78413	CHROMIUM SEDWETWTMG/KG	03/27/93-03/27/93	1	7.57	7.57	7.57	7.57	0.	0.	**	**	**	**
78414	COPPER SEDWETWTMG/KG	03/27/93-03/27/93	1	6.15	6.15	6.15	6.15	0.	0.	**	**	**	**
78415	LEAD SEDWETWTMG/KG	03/27/93-03/27/93	1	5.66	5.66	5.66	5.66	0.	0.	**	**	**	**
78417	NICKEL SEDWETWTMG/KG	03/27/93-03/27/93	1	6.35	6.35	6.35	6.35	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0054

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0054

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	1	0	0.00				1	0	0.00						
01040	COPPER, DISSOLVED	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01049	LEAD, DISSOLVED	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01065	NICKEL, DISSOLVED	Fresh Acute	1400.	1	0	0.00				1	0	0.00						
		Drinking Water	100.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0055

NPS Station ID: CHIC0055 LAT/LON: 34.481976/ -97.032893 Agency: 11NPSWRD Date Created: 09/20/97
Location: GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /RESERV/TYPA/AMBNT STORET Station ID(s): CHIC_HARP_25
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 872 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DOUGHERTY OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON THE GUY SANDY CREEK BRANCH OF ARBUCKLE RESERVOIR APPROXIMATELY 1/2 MILE FROM WHERE GUY SANDY CREEK ENTERS THE RESERVOIR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0055

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	03/09/77-07/04/77	3	0.6	1.233	2.5	0.6	1.203	1.097	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	03/09/77-07/04/77	3	15.	14.667	20.	9.	30.333	5.508	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	03/09/77-07/04/77	4	8.15	8.15	8.5	7.8	0.123	0.351	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	03/09/77-07/04/77	4	8.082	8.051	8.5	7.8	0.136	0.369	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	03/09/77-07/04/77	4	0.008	0.009	0.016	0.003	0.	0.006	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/21/76-06/29/76	4	172.5	190.5	254.	163.	1840.333	42.899	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/21/76-06/29/76	3	17.	20.667	34.	11.	142.333	11.93	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	03/09/77-03/09/77	2	0.26	0.26	0.4	0.12	0.039	0.198	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	03/09/77-03/09/77	2	0.163	0.163	0.175	0.15	0.	0.018	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	03/09/77-03/09/77	2	0.58	0.58	0.66	0.5	0.013	0.113	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	06/29/76-03/09/77	2	0.018	0.018	0.02	0.015	0.	0.004	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/21/76-03/09/77	5	37.	39.8	50.	37.	32.7	5.718	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	03/09/77-07/04/77	3	400.	426.667	490.	390.	3033.333	55.076	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0055

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	4	0	0.00				2	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	4	0	0.00				2	0	0.00	2	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00				2	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	5	0	0.00				5	0	0.00						
		Drinking Water	250.	5	0	0.00				5	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0056

NPS Station ID: CHIC0056
LAT/LON: 34.485448/ -97.029531
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Guy Sandy Creek near Lake of the Arbuckles
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_GS2
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 875
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Dougherty Okla. 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/7. Station is known as Guy Sandy Creek Site 2 and is located at the last accessible site before the creek enters the Guy Sandy Arm of Lake of the Arbuckles. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	81	14.9	16.543	31.2	0.1	79.505	8.917	4.8	7.65	24.45	28.26
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	81	493.	491.815	640.	319.	5648.878	75.159	383.2	454.5	545.	604.4
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	79	6.4	6.728	11.6	0.5	4.58	2.14	4.1	5.2	8.2	9.8
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	81	8.	7.988	8.7	7.	0.064	0.254	7.6	7.85	8.1	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	81	8.	7.897	8.7	7.	0.073	0.269	7.6	7.85	8.1	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	81	0.01	0.013	0.1	0.002	0.	0.012	0.005	0.008	0.014	0.025
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	81	242.	229.358	320.	139.	1882.658	43.39	158.2	198.	260.5	278.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	80	0.13	0.19	0.95	0.01	0.036	0.191	0.05	0.063	0.24	0.406
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	59	0.002	0.002	0.009	0.	0.	0.001	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	81	0.11	0.106	0.26	0.006	0.003	0.056	0.03	0.06	0.14	0.188
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	58	0.18	0.218	0.71	0.04	0.015	0.123	0.098	0.14	0.283	0.35
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	81	226.	221.086	328.	146.	2024.505	44.994	162.	180.5	250.	284.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	79	18.	19.354	30.	4.	31.155	5.582	13.	16.	24.	27.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	81	216.	213.519	328.	135.	2001.753	44.741	156.4	172.	243.5	274.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	81	2.	7.568	105.	0.	235.823	15.357	0.	0.	11.	18.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	63	0.21	0.225	0.52	0.05	0.012	0.111	0.1	0.14	0.28	0.418
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	81	9.2	11.251	51.7	2.	71.763	8.471	3.44	6.65	13.2	20.74

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0056

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	79	7	0.09	35	1	0.03	25	0	0.00	19	6	0.32			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	26	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	36	0	0.00	24	0	0.00	19	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	1	0.01	36	1	0.03	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	6	20.05	19.617	31.2	6.1	86.918	9.323	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	6	469.5	483.833	571.	381.	4982.567	70.587	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	6	5.35	5.883	9.8	3.4	6.03	2.456	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	6	7.75	7.717	8.2	7.	0.198	0.445	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	6	7.725	7.514	8.2	7.	0.247	0.497	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	6	0.019	0.031	0.1	0.006	0.001	0.035	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	218.5	212.5	267.	158.	1749.9	41.832	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	0.15	0.157	0.3	0.06	0.007	0.081	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	6	0.002	0.002	0.002	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	0.055	0.072	0.14	0.02	0.003	0.053	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	6	0.155	0.225	0.5	0.1	0.024	0.156	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	209.	208.667	256.	164.	1159.467	34.051	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	6	17.5	18.	22.	15.	6.8	2.608	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	189.5	195.667	244.	164.	949.867	30.82	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	4.5	13.	57.	0.	492.	22.181	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	6	10.95	10.967	25.9	2.4	75.915	8.713	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.8	16.575	29.7	0.1	98.404	9.92	0.91	9.25	26.475	29.64
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	494.	486.333	619.	319.	9587.879	97.918	331.9	408.	585.75	618.7
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	11	5.6	6.627	11.6	3.8	8.556	2.925	3.86	4.2	10.7	11.44
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.05	8.042	8.3	7.6	0.054	0.231	7.66	7.825	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.047	7.982	8.3	7.6	0.057	0.24	7.66	7.825	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.009	0.01	0.025	0.005	0.	0.006	0.005	0.005	0.015	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	239.5	227.5	293.	139.	2994.273	54.72	142.3	166.25	278.5	290.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.16	0.311	0.95	0.02	0.128	0.358	0.026	0.06	0.7	0.929
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.005	0.001	0.	0.001	0.001	0.001	0.003	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.125	0.133	0.24	0.04	0.005	0.072	0.04	0.063	0.198	0.234
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.18	0.233	0.71	0.04	0.034	0.185	0.058	0.113	0.278	0.632
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	233.5	218.5	291.	146.	3070.091	55.408	146.3	157.	271.75	286.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	17.5	18.917	29.	10.	39.356	6.273	10.9	13.25	25.75	28.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	233.5	215.75	282.	138.	2913.841	53.98	140.7	157.	267.5	278.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	2.75	9.	0.	13.841	3.72	0.	0.	7.25	8.7
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	12.45	16.892	51.7	3.8	229.864	15.161	3.86	4.8	20.725	48.61

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	18.15	16.875	30.4	6.3	81.182	9.01	6.36	7.25	24.95	29.23
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	493.5	488.167	640.	378.	6754.515	82.186	383.7	401.	537.	626.5
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	6.4	6.633	9.5	3.9	2.642	1.626	4.17	5.925	7.425	9.47
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	7.95	7.917	8.2	7.5	0.036	0.19	7.59	7.8	8.075	8.17
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	7.947	7.876	8.2	7.5	0.038	0.195	7.59	7.8	8.075	8.17
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.011	0.013	0.032	0.006	0.	0.007	0.007	0.008	0.016	0.027
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	226.5	215.833	252.	158.	1308.152	36.168	158.3	174.	243.75	249.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.14	0.217	0.75	0.04	0.046	0.215	0.043	0.073	0.253	0.681
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.009	0.	0.	0.002	0.	0.001	0.002	0.007
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.065	0.07	0.14	0.006	0.002	0.042	0.007	0.038	0.098	0.137
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.215	0.208	0.35	0.06	0.011	0.103	0.066	0.095	0.31	0.341

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	218.	214.	285.	152.	2087.273	45.687	155.	167.5	243.5	285.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	18.	19.25	30.	10.	49.114	7.008	10.	14.25	25.5	30.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	213.	208.917	285.	152.	1849.538	43.006	153.2	167.5	234.5	280.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	5.083	20.	0.	54.811	7.403	0.	0.	12.	18.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.245	0.256	0.52	0.1	0.018	0.134	0.106	0.135	0.298	0.508
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	13.25	14.192	37.1	2.1	98.726	9.936	2.25	5.275	17.7	33.53

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	17.7	17.142	30.	4.7	87.881	9.374	5.33	7.475	26.875	29.52
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	487.5	477.25	568.	358.	4042.205	63.578	368.2	422.75	522.75	562.
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	6.8	6.425	8.6	3.7	3.3	1.817	3.91	4.575	8.2	8.48
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.	7.975	8.3	7.5	0.048	0.218	7.59	7.825	8.075	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.	7.921	8.3	7.5	0.051	0.225	7.59	7.825	8.075	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.01	0.012	0.032	0.005	0.	0.007	0.005	0.008	0.015	0.027
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	248.5	243.417	299.	156.	2141.902	46.281	157.8	225.	285.	297.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.165	0.195	0.51	0.05	0.021	0.146	0.053	0.07	0.308	0.468
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.008	0.	0.	0.002	0.001	0.002	0.002	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.09	0.096	0.17	0.03	0.002	0.04	0.036	0.063	0.128	0.161
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.19	0.238	0.52	0.08	0.016	0.128	0.092	0.143	0.328	0.469
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	200.5	201.583	249.	160.	1265.356	35.572	160.9	163.25	238.5	247.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	10	20.5	20.6	27.	14.	23.822	4.881	14.1	15.	25.25	26.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	183.5	192.083	249.	137.	1405.538	37.491	143.3	160.75	227.5	246.3
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	9.5	105.	0.	907.545	30.125	0.	0.	3.	75.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.15	0.183	0.4	0.05	0.012	0.108	0.059	0.09	0.275	0.376
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	10.55	11.508	19.2	3.6	22.29	4.721	4.65	7.65	16.325	18.48

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	17.15	17.033	30.4	3.3	87.384	9.348	3.78	7.85	26.2	29.44
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	502.5	504.917	606.	393.	4590.083	67.75	397.8	460.5	572.75	599.1
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	6.4	6.817	10.1	3.8	3.812	1.953	4.07	5.25	8.9	9.83
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.05	7.983	8.3	7.5	0.049	0.221	7.59	7.8	8.1	8.27
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.047	7.926	8.3	7.5	0.052	0.229	7.59	7.8	8.1	8.27
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.009	0.012	0.032	0.005	0.	0.007	0.005	0.008	0.016	0.027
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	247.	229.25	276.	156.	1790.023	42.309	157.5	193.25	260.75	274.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.13	0.144	0.44	0.01	0.014	0.116	0.019	0.06	0.205	0.38
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.095	0.1	0.25	0.03	0.004	0.062	0.03	0.053	0.13	0.214
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	11	0.19	0.199	0.32	0.11	0.004	0.06	0.118	0.15	0.25	0.308
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	233.	226.583	288.	159.	1561.538	39.516	160.2	195.75	257.	279.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	17.	19.667	29.	15.	26.97	5.193	15.	15.25	25.	28.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	223.5	216.667	276.	158.	1379.515	37.142	158.3	180.25	241.75	267.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	4.5	9.917	50.	0.	196.992	14.035	0.	0.5	12.	40.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.27	0.271	0.52	0.1	0.016	0.128	0.109	0.165	0.315	0.508
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	8.4	8.025	13.1	3.	11.535	3.396	3.24	4.5	10.9	12.86

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	16.5	15.717	27.5	4.8	64.596	8.037	4.89	7.475	23.025	26.6
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	473.5	471.917	612.	331.	7742.265	87.99	340.3	392.5	533.25	607.8
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	11	6.6	6.6	10.2	0.5	7.334	2.708	1.36	5.2	9.4	10.04
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.05	8.083	8.7	7.5	0.08	0.282	7.62	8.	8.25	8.58
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.047	8.	8.7	7.5	0.087	0.295	7.62	8.	8.25	8.58
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.009	0.01	0.032	0.002	0.	0.007	0.003	0.006	0.01	0.026
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	238.	237.083	320.	160.	2024.447	44.994	166.3	202.5	266.75	309.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	11	0.17	0.184	0.41	0.05	0.012	0.111	0.05	0.09	0.27	0.382
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	5	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.14	0.141	0.26	0.04	0.003	0.056	0.052	0.12	0.173	0.242
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	5	0.16	0.194	0.28	0.12	0.005	0.071	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	236.5	239.333	328.	164.	3197.515	56.547	166.4	192.75	283.	328.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	17.5	17.5	27.	4.	37.364	6.113	5.8	16.	21.5	26.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	230.	236.083	328.	164.	3094.992	55.633	166.4	192.75	275.	328.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.5	3.25	16.	0.	28.205	5.311	0.	0.	4.	14.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.18	0.193	0.28	0.11	0.003	0.055	0.119	0.143	0.253	0.274
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	9.65	11.2	22.4	2.	37.845	6.152	3.41	7.15	14.7	22.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	17.	16.817	28.9	3.4	82.738	9.096	3.82	7.875	25.975	28.27
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	508.	511.417	612.	404.	3022.811	54.98	422.6	475.5	548.25	598.5
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	7.15	7.158	9.8	4.2	3.144	1.773	4.53	5.825	9.025	9.74
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.05	8.025	8.4	7.5	0.046	0.214	7.62	7.925	8.1	8.34
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.047	7.969	8.4	7.5	0.049	0.222	7.62	7.925	8.1	8.34
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.009	0.011	0.032	0.004	0.	0.007	0.005	0.008	0.012	0.026
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	241.5	228.083	275.	148.	1598.811	39.985	158.5	188.75	258.25	272.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.095	0.117	0.31	0.03	0.008	0.09	0.03	0.053	0.13	0.301
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.11	0.108	0.19	0.04	0.002	0.04	0.046	0.075	0.128	0.178
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	227.5	223.75	287.	148.	1467.659	38.31	154.6	200.75	249.5	277.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	19.	19.5	28.	10.	27.	5.196	11.8	16.	24.	27.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	225.	212.083	275.	135.	1724.265	41.524	138.9	183.75	242.25	266.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	7.5	11.667	40.	0.	187.515	13.694	0.	0.25	18.75	38.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.215	0.238	0.45	0.1	0.011	0.105	0.112	0.168	0.25	0.444
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	7.9	7.1	9.7	3.	4.962	2.228	3.18	5.	8.575	9.55

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	3	4.7	6.8	12.1	3.6	21.37	4.623	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	3	562.	551.333	610.	482.	4181.333	64.663	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	3	9.2	8.767	10.2	6.9	2.863	1.692	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	3	8.1	8.133	8.2	8.1	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	3	8.1	8.131	8.2	8.1	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	3	0.008	0.007	0.008	0.006	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	3	262.	243.	274.	193.	1911.	43.715	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	3	0.09	0.153	0.31	0.06	0.019	0.137	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	3	0.13	0.13	0.15	0.11	0.	0.02	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	3	260.	257.	291.	220.	1267.	35.595	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	3	26.	25.667	28.	23.	6.333	2.517	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	3	248.	247.333	278.	216.	961.333	31.005	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	3	12.	9.667	13.	4.	24.333	4.933	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.1	0.16	0.28	0.1	0.011	0.104	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	3	6.6	6.167	7.9	4.	3.943	1.986	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	36	6.85	8.883	24.3	0.1	25.928	5.092	3.37	4.825	13.45	14.83
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	36	500.	507.806	640.	319.	5298.733	72.792	413.2	473.75	563.25	612.
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	35	6.6	7.146	11.6	3.7	2.969	1.723	5.16	5.9	8.2	9.54
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	36	8.	7.981	8.3	7.	0.055	0.235	7.8	7.825	8.1	8.23
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	36	8.	7.885	8.3	7.	0.065	0.254	7.8	7.825	8.1	8.23
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	36	0.01	0.013	0.1	0.005	0.	0.016	0.006	0.008	0.015	0.016
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	36	244.	239.222	294.	139.	1313.606	36.244	188.6	222.5	266.5	281.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	36	0.13	0.263	0.95	0.01	0.066	0.256	0.04	0.073	0.36	0.78
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	36	0.12	0.124	0.26	0.01	0.003	0.056	0.067	0.09	0.14	0.226
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	36	236.5	231.889	328.	146.	1912.216	43.729	164.	203.	259.75	288.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	36	20.	20.25	30.	10.	24.593	4.959	14.	16.25	22.75	28.3
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	36	227.	226.222	328.	138.	1736.006	41.665	164.	201.	248.	279.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	36	0.	5.667	50.	0.	117.714	10.85	0.	0.	8.75	13.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	36	8.65	12.706	51.7	2.4	123.577	11.116	3.44	6.75	15.05	29.26

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	25	20.7	19.376	28.4	8.	35.584	5.965	9.86	13.3	22.85	26.92
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	25	523.	520.44	619.	362.	3746.507	61.209	431.2	483.	565.	603.2
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	25	7.6	7.94	10.8	4.4	3.403	1.845	5.66	6.4	9.6	10.4
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	25	8.1	8.112	8.3	7.9	0.015	0.124	8.	8.	8.2	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	25	8.1	8.096	8.3	7.9	0.016	0.125	8.	8.	8.2	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	25	0.008	0.008	0.013	0.005	0.	0.002	0.005	0.006	0.01	0.01
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	25	250.	251.88	299.	216.	482.86	21.974	220.	236.5	261.5	283.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	25	0.06	0.101	0.26	0.02	0.004	0.066	0.036	0.05	0.16	0.206
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	25	0.09	0.1	0.2	0.006	0.003	0.057	0.036	0.06	0.135	0.194
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	25	242.	238.48	280.	179.	700.927	26.475	190.6	226.	256.5	273.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	24	24.	21.875	29.	10.	30.375	5.511	13.	18.	26.	27.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	25	230.	228.4	276.	137.	957.583	30.945	182.	217.5	247.	269.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	25	4.	10.08	105.	0.	426.91	20.662	0.	0.5	12.	17.6
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	25	7.1	7.376	22.2	2.	21.46	4.633	2.64	3.6	10.6	12.16

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0056

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	20	27.	26.79	31.2	18.3	9.798	3.13	24.22	24.425	29.65	30.4
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	20	409.5	427.25	557.	331.	3340.829	57.8	363.6	392.25	459.5	536.2
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	19	4.5	4.363	6.1	0.5	1.419	1.191	3.4	3.8	5.1	5.8
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	20	7.8	7.845	8.7	7.5	0.108	0.328	7.5	7.5	8.075	8.37
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	20	7.8	7.75	8.7	7.5	0.117	0.343	7.5	7.5	8.075	8.37
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	20	0.016	0.018	0.032	0.002	0.	0.01	0.004	0.008	0.032	0.032
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	20	161.5	183.45	320.	148.	1826.997	42.743	150.5	156.5	200.	242.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	19	0.17	0.17	0.26	0.05	0.004	0.063	0.09	0.13	0.23	0.25
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	20	0.075	0.08	0.15	0.02	0.002	0.046	0.03	0.033	0.128	0.149
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	20	163.5	179.9	328.	147.	1711.568	41.371	148.4	159.25	187.	231.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	19	15.	14.474	22.	4.	13.152	3.627	10.	13.	16.	18.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	20	161.	172.05	328.	135.	1613.629	40.17	147.1	153.	175.75	209.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	20	0.	7.85	57.	0.	221.608	14.887	0.	0.	8.25	33.6
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	20	12.65	13.475	22.4	7.9	18.437	4.294	7.9	9.85	16.575	20.37

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0057

NPS Station ID: CHIC0057
LAT/LON: 34.486115/ -96.985282
Agency: 11EPALES
Date Created: / /
Location: ROCK CREEK
FIPS State/County: 40000 OKLAHOMA/
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 4002A2
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: T/ARBUCKLE RESERVOIR
Elevation: 0
Water Body Id:
Minor Basin: BANK BELO SULPHER STP OUTFALL
ECO Region:
RF1 Index: 11130303007
RF1 Mile Point: 2.020
Distance from RF1: 0.00
On/Off RF1: ON
RF3 Index: 11130303000303.15
RF3 Mile Point: 3.45
Distance from RF3: 0.09
On/Off RF3:
Description:
BANK SAMPLE BELOW SULPHUR STP OUTFALL TAKE COMPOSITE SAMPLE IF POSSIBLE SEC 9 T1S R3E

Parameter Inventory for Station: CHIC0057

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	12	0.025	0.027	0.072	0.003	0.	0.017	0.004	0.021	0.03	0.062
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/25/74-11/25/74	1	0.096	0.096	0.096	0.096	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	12	0.65	0.844	1.8	0.2	0.266	0.516	0.26	0.481	1.35	1.74
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	12	0.09	0.103	0.34	0.03	0.007	0.083	0.03	0.06	0.11	0.286
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	12	0.05	0.095	0.425	0.01	0.014	0.117	0.01	0.023	0.145	0.349
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-09/08/75	11	0.01	0.03	0.155	0.005	0.002	0.044	0.005	0.005	0.04	0.134

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0057

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	12	0	0.00	5	0	0.00	4	0	0.00	3	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0058

NPS Station ID: CHIC0058 LAT/LON: 34.486671/ -96.996116 Agency: 112WRD Date Created: 01/30/93
Location: 01S-03E-09 BDAC 1 SULPHUR TREATMENT PLANT FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): 342912096594601
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304 Depth of Water: 0 Aquifer:
Major Basin: Elevation: 0 Water Body Id:
Minor Basin: ECO Region:
RF1 Index: 11130304 RF1 Mile Point: 0.000 Distance from RF1: 0.70 On/Off RF1:
RF3 Index: 11130303000703.96 RF3 Mile Point: 5.04 Distance from RF3: 0.02 On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0058

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	2	25.25	25.25	26.5	24.	3.125	1.768	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/16/76-06/23/76	2	8.65	8.65	8.7	8.6	0.005	0.071	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	1	11.8	11.8	11.8	11.8	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	06/16/76-06/23/76	2	8.2	8.2	8.5	7.9	0.18	0.424	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/16/76-06/23/76	2	8.104	8.104	8.5	7.9	0.199	0.446	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/16/76-06/23/76	2	0.008	0.008	0.013	0.003	0.	0.007	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	2	275.5	275.5	338.	213.	7812.5	88.388	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	1	16.	16.	16.	16.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	2	181.5	181.5	184.	179.	12.5	3.536	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-06/23/76	2	1005.	1005.	1010.	1000.	50.	7.071	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0058

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00				2	0	0.00						
00400	PH	Other-Hi Lim.	9.	2	0	0.00				2	0	0.00						
		Other-Lo Lim.	6.5	2	0	0.00				2	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00				2	0	0.00						
		Drinking Water	250.	2	0	0.00				2	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0059

NPS Station ID: CHIC0059
Location: VETERANS LAKE AT DAM
Station Type: /TYPA/AMBNT/LAKE
RMI-Indexes:
RMI-Miles:
HUC: 11130303
Major Basin:
Minor Basin:
RF1 Index: 11130303
RF3 Index: 11130303083700.00
Description:

LAT/LON: 34.490559/ -96.986115
Depth of Water: 0
Elevation: 0
RF1 Mile Point: 0.000
RF3 Mile Point: 12.36

Agency: 112WRD
FIPS State/County: 40099 OKLAHOMA/MURRAY
STORET Station ID(s): 342926096591001
Within Park Boundary: Yes
Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 0.00
Distance from RF3: 0.57

Date Created: 08/22/92
On/Off RF1:
On/Off RF3:

Parameter Inventory for Station: CHIC0059

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/22/91-08/26/91	3	27.	23.333	31.	12.	100.333	10.017	**	**	**	**
00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	02/22/91-08/26/91	3	30.	27.	33.	18.	63.	7.937	**	**	**	**
00076	TURBIDITY,HACH TURBIDIMETER (FORMAZIN TURB UNIT)	02/22/91-08/26/91	3	5.	5.	7.	3.	4.	2.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	02/22/91-08/26/91	3	350.	351.	446.	257.	8931.	94.504	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	02/22/91-08/26/91	3	0.01	0.052	0.14	0.005	0.006	0.077	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	02/22/91-08/26/91	3 ##	0.005	0.005	0.005	0.005	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	02/22/91-08/26/91	3	0.4	0.433	0.5	0.4	0.003	0.058	**	**	**	**
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	02/22/91-08/26/91	3 ##	0.025	0.083	0.2	0.025	0.01	0.101	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	02/22/91-08/26/91	3 ##	0.005	0.007	0.01	0.005	0.	0.003	**	**	**	**
32211	CHLOROPHYLL-A UG/L SPECTROPHOTOMETRIC ACID. METH.	08/26/91-08/26/91	1	3.5	3.5	3.5	3.5	0.	0.	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	02/22/91-08/26/91	3 ##	0.005	0.007	0.01	0.005	0.	0.003	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0059

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
							Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00076	TURBIDITY, HACH TURBIDIMETER	Other-Hi Lim.	50.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0060

NPS Station ID: CHIC0060 LAT/LON: 34.491670/ -96.991671 Agency: 112WRD Date Created: / /
Location: ROCK CREEK S OF PLATT NATL PK NR SULPHUR, OK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): 07329853
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: Elevation: 0 Water Body Id:
Minor Basin: ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.50 On/Off RF1:
RF3 Index: 11130303000705.53 RF3 Mile Point: 5.53 Distance from RF3: 0.02 On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0060

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/16/59-09/16/59	1	26.1	26.1	26.1	26.1	0.	0.	**	**	**	**
00060	FLOW, STREAM, MEAN DAILY CFS	09/16/59-09/16/59	1	2.	2.	2.	2.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	09/16/59-07/20/60	3	895.	1119.333	2040.	423.	691416.333	831.514	**	**	**	**
00400	PH (STANDARD UNITS)	09/16/59-07/20/60	3	8.5	8.4	8.5	8.2	0.03	0.173	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	09/16/59-07/20/60	3	8.5	8.376	8.5	8.2	0.031	0.176	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/16/59-07/20/60	3	0.003	0.004	0.006	0.003	0.	0.002	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	09/16/59-07/20/60	3	0.9	1.433	2.7	0.7	1.213	1.102	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	09/16/59-07/20/60	3	140.	157.333	217.	115.	2826.333	53.163	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	09/16/59-07/20/60	3	154.	183.333	264.	132.	5001.333	70.72	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	09/16/59-07/20/60	3	4.	4.	8.	0.	16.	4.	**	**	**	**
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	09/16/59-07/20/60	3	0.23	0.227	0.45	0.	0.051	0.225	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	09/16/59-07/20/60	3	186.	215.	325.	134.	9751.	98.747	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	09/16/59-07/20/60	3	46.	58.	108.	20.	2044.	45.211	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	09/16/59-07/20/60	3	27.	39.	66.	24.	549.	23.431	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	09/16/59-07/20/60	3	31.	28.667	39.	16.	136.333	11.676	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	09/16/59-07/20/60	3	115.	152.667	307.	36.	19424.333	139.371	**	**	**	**
00931	SODIUM ADSORPTION RATIO	09/16/59-07/20/60	3	3.7	4.167	7.4	1.4	9.163	3.027	**	**	**	**
00932	SODIUM, PERCENT	09/16/59-09/16/59	1	67.	67.	67.	67.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	09/16/59-07/20/60	3	182.	243.333	500.	48.	53897.333	232.158	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	04/14/60-07/20/60	2	33.	33.	38.	28.	50.	7.071	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	04/14/60-07/20/60	2	381.	381.	516.	246.	36450.	190.919	**	**	**	**
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	04/14/60-07/20/60	2	0.515	0.515	0.7	0.33	0.068	0.262	**	**	**	**
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	09/16/59-07/20/60	3	1.	1.	2.	0.	1.	1.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0060

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
		Other-Lo Lim.	6.5	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
00618	NITRATE NITROGEN, DISSOLVED AS N	Drinking Water	10.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
		Drinking Water	250.	3	1	0.33	1	1	1.00	1	0	0.00	1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0060

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	2	0	0.00				1	0	0.00	1	0	0.00			
71851	NITRATE NITROGEN, DISSOLVED (AS NO3)	Drinking Water	44.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0061

NPS Station ID: CHIC0061
LAT/LON: 34.494531/ -96.974004
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Sulphur Bromide Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S13 /GOULD_20 /CNR-9 /1194
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle. Station is a located at Sulphur Bromide Spring at the outlet in the side of a 6 foot square by 1 foot high concrete structure. The spring is mineralized. This is Gould's No. 20. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0061

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	8	18.1	18.988	24.3	16.2	7.656	2.767	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	11	2050.	1997.273	2520.	1550.	62741.818	250.483	1582.	1840.	2100.	2440.
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	9	7.2	7.278	7.6	7.1	0.034	0.186	7.1	7.1	7.45	7.6
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	9	7.2	7.246	7.6	7.1	0.036	0.189	7.1	7.1	7.45	7.6
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	9	0.063	0.057	0.079	0.025	0.	0.021	0.025	0.036	0.079	0.079
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	9	288.	284.	300.	246.	299.	17.292	246.	274.	298.	300.
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	316.	316.	316.	316.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	0.7	0.838	1.42	0.34	0.188	0.434	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.002	0.006	0.025	0.	0.	0.011	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	10	0.085	0.089	0.15	0.03	0.001	0.032	0.034	0.07	0.11	0.146
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.425	0.378	0.52	0.14	0.027	0.166	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	9	454.	452.	464.	443.	48.	6.928	443.	445.5	456.5	464.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	113.	113.	113.	113.	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	50.1	50.1	50.1	50.1	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	390.	390.	390.	390.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	9.9	9.9	9.9	9.9	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	603.	603.	603.	603.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	8	51.	49.75	55.	38.	31.643	5.625	**	**	**	**
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	114.	114.	114.	114.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.45	0.45	0.45	0.45	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0061

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	457.	457.	457.	457.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	21.6	21.6	21.6	21.6	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	7.	7.	7.	7.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	7330.	7330.	7330.	7330.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	17.	17.	17.	17.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	93.	93.	93.	93.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	64.	64.	64.	64.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1 ##	6.5	6.5	6.5	6.5	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	2320.	2320.	2320.	2320.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	9	442.	436.111	455.	390.	493.111	22.206	390.	423.	453.	455.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	9	6.	15.889	56.	0.	374.611	19.355	0.	3.	28.5	56.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	10	0.235	0.237	0.48	0.025	0.018	0.134	0.032	0.143	0.318	0.466
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	9	6.	5.067	6.	0.1	3.653	1.911	0.1	5.	6.	6.
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	0.11	0.11	0.11	0.11	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0061

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	9	0	0.00	1	0	0.00	6	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	9	0	0.00	1	0	0.00	6	0	0.00	2	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	10	0	0.00	1	0	0.00	7	0	0.00	2	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	1	1.00	1	1	1.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	8	0	0.00	1	0	0.00	5	0	0.00	2	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00	1	0	0.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0061

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0062

NPS Station ID: CHIC0062
LAT/LON: 34.494726/ -96.975281
Agency: 112WRD
Date Created: 09/04/93
Location: 01S-03E-03 DCB 1 RAVINE SPRING
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): 342941096583101
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0062

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	08/20/92-08/20/92	1	17.8	17.8	17.8	17.8	0.	0.	**	**	**	**
00059	FLOW, RATE, INSTANTANEOUS GALLONS/MIN	08/20/92-08/20/92	1 ##	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	08/20/92-08/20/92	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/20/92-08/20/92	1	2610.	2610.	2610.	2610.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.24	7.24	7.24	7.24	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/20/92-08/20/92	1	7.24	7.24	7.24	7.24	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.058	0.058	0.058	0.058	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	08/20/92-08/20/92	1	7.3	7.3	7.3	7.3	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	08/20/92-08/20/92	1	7.3	7.3	7.3	7.3	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/20/92-08/20/92	1	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**
00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	08/20/92-08/20/92	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	08/20/92-08/20/92	1	354.	354.	354.	354.	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/20/92-08/20/92	1	110.	110.	110.	110.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/20/92-08/20/92	1	47.	47.	47.	47.	0.	0.	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	08/20/92-08/20/92	1	360.	360.	360.	360.	0.	0.	**	**	**	**
00935	POTASSIUM, DISSOLVED (MG/L AS K)	08/20/92-08/20/92	1	9.2	9.2	9.2	9.2	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	08/20/92-08/20/92	1	640.	640.	640.	640.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	08/20/92-08/20/92	1	62.	62.	62.	62.	0.	0.	**	**	**	**
00955	SILICA, DISSOLVED (MG/L AS SI02)	08/20/92-08/20/92	1	11.	11.	11.	11.	0.	0.	**	**	**	**
39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	08/20/92-08/20/92	1	290.	290.	290.	290.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/20/92-08/20/92	1	1670.	1670.	1670.	1670.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0062

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00							1	0	0.00			
		Drinking Water	250.	1	1	1.00							1	1	1.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0063

NPS Station ID: CHIC0063
LAT/LON: 34.494921/ -96.975281
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Taff's Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S14 /GOULD_22 /CNR-10 /1195
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle. Station is a located at the outlet of Taff's Spring in a 3 foot square concrete basin surrounded by a concrete pad. The spring is presumed to have been covered by a pavilion during the early 1900s. The spring is mineralized. This is Gould's No. 22. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0063

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	9	18.2	18.778	23.9	16.2	4.959	2.227	16.2	17.55	19.75	23.9
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	12	1970.	1993.333	2670.	1500.	113296.97	336.596	1509.	1712.5	2195.	2550.
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	10	7.3	7.29	7.5	7.1	0.017	0.129	7.11	7.2	7.35	7.5
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	10	7.3	7.274	7.5	7.1	0.017	0.13	7.11	7.2	7.35	7.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	10	0.05	0.053	0.079	0.032	0.	0.015	0.032	0.045	0.063	0.078
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	293.	299.4	334.	282.	329.378	18.149	282.5	290.	305.	333.8
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	212.	212.	212.	212.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	0.61	0.592	1.21	0.17	0.135	0.368	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.001	0.006	0.025	0.	0.	0.011	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	11	0.1	0.105	0.14	0.07	0.	0.021	0.072	0.09	0.12	0.138
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.42	0.365	0.45	0.17	0.017	0.131	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	444.	447.3	507.	420.	521.122	22.828	421.1	438.5	450.	501.3
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	24.8	24.8	24.8	24.8	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	20.	20.	20.	20.	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	1228.	1228.	1228.	1228.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	8.2	8.2	8.2	8.2	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	654.	654.	654.	654.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	9	47.	46.222	53.	38.	30.444	5.518	38.	41.	51.5	53.
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	513.	513.	513.	513.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.15	0.15	0.15	0.15	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0063

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	3090.	3090.	3090.	3090.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	54.4	54.4	54.4	54.4	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	1.	1.	1.	1.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1340.	1340.	1340.	1340.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	25.	25.	25.	25.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	698.	698.	698.	698.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	22.5	22.5	22.5	22.5	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	65.	65.	65.	65.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1 ##	6.5	6.5	6.5	6.5	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1	18.	18.	18.	18.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	216.	216.	216.	216.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	415.5	420.3	497.	378.	1566.233	39.576	378.7	385.	448.	492.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	25.	27.	59.	2.	614.222	24.784	2.	2.75	53.	58.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	11	0.25	0.234	0.51	0.025	0.026	0.162	0.032	0.09	0.31	0.504
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	10	6.	5.53	6.	2.5	1.231	1.11	2.75	5.6	6.	6.
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	26.	26.	26.	26.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	7.41	7.41	7.41	7.41	0.	0.	**	**	**	**

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EPA Water Quality Criteria Analysis for Station: CHIC0063

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
		Other-Lo Lim.	6.5	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	11	0	0.00	1	0	0.00	7	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	1	1.00	1	1	1.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	9	0	0.00	1	0	0.00	5	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0063

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0064

NPS Station ID: CHIC0064 LAT/LON: 34.495142/ -96.988531 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK 200 YD SOUTH OF SIPHON AT CAMPGROUND FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_18
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 910 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/4 MILE NORTHWEST OF VETERANS LAKE AND IMMEDIATELY WEST OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THIS STUDY WERE PUBLISHED IN THE MARCH 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL(405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0064

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3 ##	0.	2.333	7.	0.	16.333	4.041	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	600.	566.667	700.	400.	23333.333	152.753	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	2.778	2.742	2.845	2.602	0.016	0.126	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			551.785								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	100.	100.	100.	100.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	2.	2.	2.	2.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			100.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0064

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	0	0.00	3	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0065

NPS Station ID: CHIC0065
LAT/LON: 34.495170/ -96.977392
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Red Flag Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S18 /CNR-11 /1196 /Red Flag
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle. Station is an Red Flag Spring - a large seep type spring of mineralized water covering about 10 square yards. Depth over seep area varies from 0 inches (wet but no standing water) to 1 inch deep. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0065

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	9	21.	21.733	26.8	17.8	11.15	3.339	17.8	18.85	25.2	26.8
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	12	2250.	2204.167	2930.	1610.	116153.788	340.813	1691.	1982.5	2405.	2777.
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	10	7.4	7.41	7.8	7.1	0.041	0.202	7.11	7.275	7.525	7.78
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	10	7.4	7.37	7.8	7.1	0.043	0.207	7.11	7.275	7.525	7.78
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	10	0.04	0.043	0.079	0.016	0.	0.019	0.017	0.03	0.053	0.078
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	284.5	287.8	315.	274.	138.622	11.774	274.6	281.5	291.25	313.6
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	321.	321.	321.	321.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	0.775	0.69	0.94	0.31	0.073	0.27	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.005	0.008	0.025	0.002	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	11	0.09	0.092	0.13	0.03	0.001	0.028	0.036	0.09	0.11	0.128
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.375	0.315	0.41	0.1	0.022	0.147	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	452.5	440.3	502.	281.	3794.011	61.596	293.8	430.75	476.	500.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	77.1	77.1	77.1	77.1	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	36.3	36.3	36.3	36.3	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	1.3	1.3	1.3	1.3	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	734.	734.	734.	734.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	9	43.	40.333	52.	14.	151.5	12.309	14.	33.	51.	52.
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	165.	165.	165.	165.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.3	0.3	0.3	0.3	0.	0.	**	**	**	**

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Parameter Inventory for Station: CHIC0065

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1	73.	73.	73.	73.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1	17.	17.	17.	17.	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	5.8	5.8	5.8	5.8	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1	41.	41.	41.	41.	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	9.	9.	9.	9.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1	7.3	7.3	7.3	7.3	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	85.	85.	85.	85.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	82.	82.	82.	82.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	60.	60.	60.	60.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1 ##	3.5	3.5	3.5	3.5	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	19.	19.	19.	19.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	794.	794.	794.	794.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	434.	402.2	492.	281.	6672.844	81.687	281.3	301.25	471.5	491.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	9.	38.1	172.	0.	4816.767	69.403	0.	0.	50.	171.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	11	0.23	0.206	0.39	0.025	0.016	0.125	0.028	0.05	0.28	0.386
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-06/11/90	9	6.	5.556	6.	5.	0.278	0.527	5.	5.	6.	6.
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1 ##	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**

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EPA Water Quality Criteria Analysis for Station: CHIC0065

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
		Other-Lo Lim.	6.5	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	11	0	0.00	1	0	0.00	7	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	1	1.00	1	1	1.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	9	0	0.00	1	0	0.00	5	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	1	1.00	1	1	1.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	1	1.00	1	1	1.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	1	1.00	1	1	1.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0065

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0066

NPS Station ID: CHIC0066
LAT/LON: 34.495281/ -96.988337
Agency: 112WRD
Date Created: 09/29/90
Location: ROCK CREEK AT SULPHUR, OK
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 07329852
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130303084400.00
RF3 Mile Point: 1.81
Distance from RF3: 0.15
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	78	20.5	20.34	27.2	7.6	25.53	5.053	13.47	15.3	25.3	27.11
00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	04/10/90-08/23/95	67	20.9	23.473	33.6	6.	65.522	8.095	14.3	15.5	33.3	33.6
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	78	742.	741.577	750.	732.	7.494	2.738	740.	740.	742.	744.1
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	78	19.5	32.987	257.	10.	1117.675	33.432	13.	14.	37.	64.
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	78	5.7	5.658	6.73	5.24	0.073	0.27	5.24	5.525	5.82	5.9
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	76	771.	721.158	959.	434.	11999.548	109.542	580.	634.	804.75	842.9
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	78	10.4	10.523	13.9	7.6	4.19	2.047	8.2	8.675	12.2	13.81
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	77	8.31	8.397	9.1	7.8	0.073	0.27	8.158	8.205	8.52	8.89
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	77	8.31	8.325	9.1	7.8	0.078	0.28	8.158	8.205	8.52	8.89
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	77	0.005	0.005	0.016	0.001	0.	0.003	0.001	0.003	0.006	0.007
00403	PH, LAB, STANDARD UNITS SU	04/10/90-02/22/95	23	7.9	7.961	8.2	7.7	0.016	0.127	7.8	7.9	8.1	8.1
00403	CONVERTED PH, LAB, STANDARD UNITS	04/10/90-02/22/95	23	7.9	7.943	8.2	7.7	0.016	0.128	7.8	7.9	8.1	8.1
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	04/10/90-02/22/95	23	0.013	0.011	0.02	0.006	0.	0.003	0.008	0.008	0.013	0.016
00452	CARBONATE,WATER,DISS,INCR TIT, FIELD, AS CO3, MG/L	05/15/90-08/23/95	24	0.	3.	15.	0.	20.	4.472	0.	0.	5.75	10.
00453	BICARBONATE,WATER,DISS,INCR TIT,FIELD,AS HCO3,MG/L	05/15/90-08/23/95	24	311.5	297.875	345.	173.	2348.375	48.46	204.	298.5	331.25	340.5
00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	05/05/93-08/23/95	10	0.02	0.02	0.03	0.008	0.	0.009	0.008	0.009	0.03	0.03
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	04/10/90-12/01/92	12	0.03	0.026	0.05	0.005	0.	0.012	0.007	0.02	0.03	0.047
00613	NITRITE NITROGEN, DISSOLVED (MG/L AS N)	05/05/93-08/23/95	10 ##	0.005	0.008	0.03	0.005	0.	0.008	0.005	0.005	0.006	0.028
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	11/16/90-12/01/92	7 ##	0.005	0.009	0.02	0.005	0.	0.006	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	04/10/90-08/23/95	22	0.2	0.268	0.7	0.1	0.034	0.184	0.1	0.1	0.325	0.6
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	04/10/90-12/01/92	12	0.095	0.102	0.3	0.025	0.005	0.07	0.033	0.055	0.1	0.255
00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	05/05/93-08/23/95	10 ##	0.038	0.054	0.1	0.025	0.001	0.035	0.025	0.025	0.1	0.1
00665	PHOSPHORUS, TOTAL (MG/L AS P)	04/10/90-08/23/95	22	0.015	0.025	0.12	0.005	0.001	0.029	0.005	0.005	0.033	0.067
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	05/05/93-08/23/95	10 ##	0.005	0.007	0.02	0.005	0.	0.005	0.005	0.005	0.005	0.019
00915	CALCIUM, DISSOLVED (MG/L AS CA)	04/10/90-08/23/95	24	66.5	64.5	75.	39.	92.087	9.596	48.	61.5	71.75	75.
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	04/10/90-08/23/95	24	24.5	24.088	35.	9.1	49.601	7.043	12.5	18.75	30.	33.5
00930	SODIUM, DISSOLVED (MG/L AS NA)	04/10/90-08/23/95	24	48.5	46.208	88.	11.	376.085	19.393	19.5	32.	59.75	72.
00935	POTASSIUM, DISSOLVED (MG/L AS K)	04/10/90-08/23/95	24	2.8	2.796	4.5	1.9	0.418	0.646	2.05	2.2	3.3	3.55
00940	CHLORIDE,TOTAL IN WATER MG/L	04/10/90-08/23/95	25	70.	72.64	140.	14.	1027.49	32.054	29.4	43.	100.	110.
00945	SULFATE, TOTAL (MG/L AS SO4)	04/10/90-08/23/95	25	18.	17.52	26.	11.	12.177	3.49	11.6	15.	20.	21.
00950	FLUORIDE, DISSOLVED (MG/L AS F)	04/10/90-08/23/95	25	0.2	0.218	0.5	0.05	0.006	0.08	0.16	0.2	0.2	0.3
00955	SILICA, DISSOLVED (MG/L AS SI02)	04/10/90-08/23/95	25	8.6	8.58	11.	6.1	2.316	1.522	6.42	7.25	9.95	11.
01002	ARSENIC, TOTAL (UG/L AS AS)	04/10/90-08/23/95	23 ##	0.5	0.522	1.	0.5	0.011	0.104	0.5	0.5	0.5	0.5
01020	BORON, DISSOLVED (UG/L AS B)	04/10/90-08/23/95	24	95.	94.167	150.	30.	990.58	31.473	45.	70.	120.	135.
01027	CADMIUM, TOTAL (UG/L AS CD)	04/10/90-08/23/95	25 ##	0.5	1.76	5.	0.5	4.253	2.062	0.5	0.5	5.	5.
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	11/02/93-05/16/94	2 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/10/90-08/23/95	23	2.	3.37	18.	0.5	21.278	4.613	0.5	0.5	4.	12.4
01042	COPPER, TOTAL (UG/L AS CU)	04/10/90-08/23/95	24 ##	1.	2.792	10.	0.5	9.563	3.092	0.5	0.5	5.	9.

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Parameter Inventory for Station: CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01045	IRON, TOTAL (UG/L AS FE)	11/02/93-05/16/94	2	55.	55.	70.	40.	450.	21.213	**	**	**	**
01046	IRON, DISSOLVED (UG/L AS FE)	04/10/90-08/23/95	24	12.	17.479	46.	1.5	203.271	14.257	1.5	8.	30.5	41.
01051	LEAD, TOTAL (UG/L AS PB)	04/10/90-08/23/95	25 ##	0.5	12.88	50.	0.5	454.464	21.318	0.5	0.5	27.5	50.
01056	MANGANESE, DISSOLVED (UG/L AS MN)	04/10/90-08/23/95	24	12.5	12.917	35.	2.	64.428	8.027	4.	6.25	16.75	26.
01075	SILVER, DISSOLVED (UG/L AS AG)	11/02/93-05/16/94	2 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/10/90-08/23/95	25 ##	5.	8.	30.	5.	45.833	6.77	5.	5.	5.	20.
01147	SELENIUM, TOTAL (UG/L AS SE)	04/10/90-08/23/95	23 ##	0.5	0.826	8.	0.5	2.446	1.564	0.5	0.5	0.5	0.5
39086	ALKALINITY,WATER,DISS,INCR TIT,FIELD,AS CACO3,MG/L	05/15/90-08/23/95	24	260.	249.125	295.	150.	1642.114	40.523	167.5	244.5	275.5	283.
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	04/10/90-08/23/95	24	387.	384.042	497.	185.	5568.389	74.622	275.	346.75	438.	479.5
70331	SUSPENDED SED SIEVE DIAMETER,% FINER THAN .062MM	04/10/90-11/16/90	6	42.5	44.	79.	9.	744.	27.276	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/16/90-12/01/92	7 ##	0.005	0.018	0.07	0.005	0.001	0.025	**	**	**	**
71900	MERCURY, TOTAL (UG/L AS HG)	04/10/90-08/23/95	22 ##	0.05	0.089	0.3	0.05	0.006	0.077	0.05	0.05	0.1	0.27
72103	SAMPLE LOCATION,RIGHT BANK(LOOKING DOWNSTREAM)(FT)	06/29/94-06/29/94	8	0.	0.	0.	0.	0.	0.	**	**	**	**
80154	SUSP. SEDIMENT CONCENTRATION-EVAP. AT 110C (MG/L)	04/10/90-11/16/90	6	34.	77.667	324.	1.	15047.467	122.668	**	**	**	**
81903	DEPTH OF BOTTOM OF WATER BODY @ SAMPLE SITE, FEET	06/29/94-08/23/95	28	0.5	0.468	1.2	0.1	0.053	0.231	0.2	0.3	0.6	0.71

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EPA Water Quality Criteria Analysis for Station: CHIC0066

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	78	0	0.00	10	0	0.00	40	0	0.00	28	0	0.00			
00400	PH	Other-Hi Lim.	9.	77	1	0.01	10	0	0.00	39	0	0.00	28	1	0.04			
		Other-Lo Lim.	6.5	77	0	0.00	10	0	0.00	39	0	0.00	28	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	23	0	0.00	10	0	0.00	8	0	0.00	5	0	0.00			
		Other-Lo Lim.	6.5	23	0	0.00	10	0	0.00	8	0	0.00	5	0	0.00			
00613	NITRITE NITROGEN, DISSOLVED AS N	Drinking Water	1.	10	0	0.00	4	0	0.00	3	0	0.00	3	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	7	0	0.00	4	0	0.00	2	0	0.00	1	0	0.00			
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	12	0	0.00	5	0	0.00	5	0	0.00	2	0	0.00			
00631	NITRITE PLUS NITRATE, DISS. 1 DET.	Drinking Water	10.	10	0	0.00	4	0	0.00	3	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
		Drinking Water	250.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	23	0	0.00	9	0	0.00	8	0	0.00	6	0	0.00			
		Drinking Water	50.	23	0	0.00	9	0	0.00	8	0	0.00	6	0	0.00			
01027	CADMIUM, TOTAL	Fresh Acute	3.9	18 &	0	0.00	8	0	0.00	5	0	0.00	5	0	0.00			
		Drinking Water	5.	18 &	0	0.00	8	0	0.00	5	0	0.00	5	0	0.00			
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	2	0	0.00	1	0	0.00	1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	23	0	0.00	9	0	0.00	8	0	0.00	6	0	0.00			
01042	COPPER, TOTAL	Fresh Acute	18.	24	0	0.00	9	0	0.00	9	0	0.00	6	0	0.00			
		Drinking Water	1300.	24	0	0.00	9	0	0.00	9	0	0.00	6	0	0.00			
01051	LEAD, TOTAL	Fresh Acute	82.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
		Drinking Water	15.	19 &	0	0.00	8	0	0.00	6	0	0.00	5	0	0.00			
01075	SILVER, DISSOLVED	Fresh Acute	4.1	2	0	0.00	1	0	0.00	1	0	0.00						
		Drinking Water	100.	2	0	0.00	1	0	0.00	1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
		Drinking Water	5000.	25	0	0.00	10	0	0.00	9	0	0.00	6	0	0.00			
01147	SELENIUM, TOTAL	Fresh Acute	20.	23	0	0.00	9	0	0.00	8	0	0.00	6	0	0.00			
		Drinking Water	50.	23	0	0.00	9	0	0.00	8	0	0.00	6	0	0.00			
71900	MERCURY, TOTAL	Fresh Acute	2.4	22	0	0.00	8	0	0.00	8	0	0.00	6	0	0.00			
		Drinking Water	2.	22	0	0.00	8	0	0.00	8	0	0.00	6	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1990 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	6	22.25	20.667	27.	14.	24.367	4.936	**	**	**	**
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	6	740.	740.833	745.	735.	14.167	3.764	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	6	32.	71.5	257.	17.	8656.3	93.039	**	**	**	**
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	6	5.505	5.777	6.73	5.27	0.357	0.598	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	4	780.5	748.75	918.	516.	28982.25	170.242	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	6	10.1	10.167	13.	8.3	2.679	1.637	**	**	**	**
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	5	8.4	8.262	8.5	7.8	0.079	0.281	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	5	8.4	8.178	8.5	7.8	0.088	0.296	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	5	0.004	0.007	0.016	0.003	0.	0.005	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	15	19.7	19.033	22.5	13.2	5.591	2.365	13.56	19.6	19.7	20.82
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	15	740.	739.333	743.	732.	6.524	2.554	733.8	740.	740.	741.2
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	15	18.	27.533	140.	18.	981.838	31.334	18.	18.	18.	74.
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	15	5.24	5.323	6.2	5.24	0.061	0.248	5.24	5.24	5.24	5.714
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	15	840.	797.867	848.	434.	12198.267	110.446	584.	839.	842.	846.8
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	15	8.3	8.533	10.5	7.6	0.624	0.79	7.66	8.2	8.4	10.14
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	15	8.17	8.188	8.5	8.	0.011	0.104	8.084	8.16	8.18	8.38
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	15	8.17	8.178	8.5	8.	0.011	0.105	8.084	8.16	8.18	8.38
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	15	0.007	0.007	0.01	0.003	0.	0.001	0.004	0.007	0.007	0.008

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	4	14.75	16.175	25.	10.2	51.256	7.159	**	**	**	**
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	4	740.	741.5	750.	736.	35.667	5.972	**	**	**	**
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	4	25.	26.25	36.	19.	66.917	8.18	**	**	**	**
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	4	5.525	5.555	5.69	5.48	0.009	0.093	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	4	763.	767.75	888.	657.	10940.25	104.596	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	4	11.1	10.875	12.2	9.1	1.836	1.355	**	**	**	**
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	4	8.4	8.425	8.6	8.3	0.022	0.15	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	4	8.389	8.406	8.6	8.3	0.023	0.152	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	4	0.004	0.004	0.005	0.003	0.	0.001	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	18	20.5	19.656	25.3	9.5	12.378	3.518	11.39	20.5	20.5	20.98
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	18	742.	742.167	748.	740.	2.382	1.543	740.9	742.	742.	742.6
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	18	37.	34.5	37.	11.	54.382	7.374	17.3	37.	37.	37.
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	18	5.82	5.791	5.82	5.53	0.007	0.085	5.584	5.82	5.82	5.82
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	18	635.	668.722	959.	632.	8329.624	91.267	632.	634.	635.	873.5
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	18	13.8	13.389	13.9	10.4	1.179	1.086	10.94	13.8	13.9	13.9
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	18	8.52	8.447	8.53	8.	0.029	0.17	8.009	8.475	8.53	8.53
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	18	8.52	8.406	8.53	8.	0.03	0.175	8.009	8.475	8.53	8.53

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	18	0.003	0.004	0.01	0.003	0.	0.002	0.003	0.003	0.003	0.01

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	12	25.25	22.175	26.1	7.6	36.213	6.018	9.13	20.15	25.45	26.01
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	12	744.	744.5	750.	742.	3.727	1.931	742.6	744.	744.	748.8
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	12	14.	15.5	29.	10.	21.727	4.661	11.2	14.	16.25	25.7
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	12	5.58	5.61	5.78	5.58	0.004	0.065	5.58	5.58	5.598	5.759
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	12	777.	745.417	830.	524.	7139.174	84.494	554.6	754.	778.75	815.
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	12	10.2	10.458	13.2	8.2	1.57	1.253	8.68	9.925	10.85	12.9
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	12	8.22	8.228	8.42	7.98	0.01	0.102	8.049	8.22	8.228	8.399
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	12	8.22	8.216	8.42	7.98	0.011	0.103	8.049	8.22	8.227	8.399
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	12	0.006	0.006	0.01	0.004	0.	0.002	0.004	0.006	0.006	0.009

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1995 - Station CHIC0066

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	04/10/90-08/23/95	23	27.1	21.409	27.2	13.5	37.838	6.151	15.3	15.3	27.2	27.2
00025	BAROMETRIC PRESSURE (MM OF HG)	04/10/90-08/23/95	23	742.	741.261	745.	740.	1.656	1.287	740.	740.	742.	742.
00061	FLOW, STREAM, INSTANTANEOUS CFS	04/10/90-08/23/95	23	13.	35.609	64.	13.	648.794	25.471	13.	13.	64.	64.
00065	STAGE, STREAM (FEET)	04/10/90-08/23/95	23	5.7	5.784	5.9	5.64	0.011	0.104	5.7	5.7	5.9	5.9
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/25/90-08/23/95	23	770.	686.609	776.	580.	9331.34	96.599	580.	580.	774.	775.6
00300	OXYGEN, DISSOLVED MG/L	04/10/90-08/23/95	23	8.8	9.643	13.	8.2	1.424	1.193	8.44	8.7	10.5	10.6
00400	PH (STANDARD UNITS)	05/15/90-08/23/95	23	8.87	8.608	9.1	8.2	0.103	0.32	8.232	8.29	8.89	8.89
00400	CONVERTED PH (STANDARD UNITS)	05/15/90-08/23/95	23	8.87	8.502	9.1	8.2	0.115	0.338	8.232	8.29	8.89	8.89
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	05/15/90-08/23/95	23	0.001	0.003	0.006	0.001	0.	0.002	0.001	0.001	0.005	0.006

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0067

NPS Station ID: CHIC0067 LAT/LON: 34.495309/ -96.988420 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BELOW INVERTED SIPHON AT CAMPGROUNDS FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_16
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 910 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK BELOW INVERTED SIPHON AT CAMPGROUNDS APPROXIMATELY A 1/4 MILE NORTHWEST OF VETERANS LAKE. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0067

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/76	3	26.	25.667	27.	24.	2.333	1.528	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/76	3	10.4	10.533	12.	9.2	1.973	1.405	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-09/18/76	1	2.4	2.4	2.4	2.4	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/14/76-09/18/76	4	15.	15.5	22.	10.	27.	5.196	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/14/76-09/18/76	4	8.5	8.5	9.	8.	0.227	0.476	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-09/18/76	4	8.404	8.326	9.	8.	0.267	0.517	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-09/18/76	4	0.004	0.005	0.01	0.001	0.	0.004	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	2	266.5	266.5	300.	233.	2244.5	47.376	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	2	0.4	0.4	0.4	0.4	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	3	126.	127.333	175.	81.	2210.333	47.014	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	1	120000.	120000.	120000.	120000.	0.	0.	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-09/18/76	1	5.079	5.079	5.079	5.079	0.	0.	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			120000.								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	720.	720.	720.	720.	0.	0.	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	2.857	2.857	2.857	2.857	0.	0.	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			720.								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/76	3	1020.	1016.667	1030.	1000.	233.333	15.275	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0067

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	0	0.00				3	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	4	1	0.25	1	0	0.00	3	1	0.33						
		Other-Lo Lim.	6.5	4	0	0.00	1	0	0.00	3	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00				3	0	0.00						
		Drinking Water	250.	3	0	0.00				3	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0068

NPS Station ID: CHIC0068 LAT/LON: 34.495837/ -96.988616 Agency: 112WRD Date Created: 01/30/93
Location: 01S-03E-04 DACD 1 BELOW SIPHONS CAMPGROUND FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): 342945096591901
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304 Depth of Water: 0 Aquifer:
Major Basin: Elevation: 0 Water Body Id:
Minor Basin: ECO Region:
RF1 Index: 11130304 RF1 Mile Point: 0.000 Distance from RF1: 2.70 On/Off RF1:
RF3 Index: 11130303000700.00 RF3 Mile Point: 0.30 Distance from RF3: 0.04 On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0068

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/76	3	26.	25.667	27.	24.	2.333	1.528	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/76	3	10.4	10.533	12.	9.2	1.973	1.405	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/14/76-06/23/76	3	16.7	17.133	22.	12.7	21.763	4.665	**	**	**	**
00400	PH (STANDARD UNITS)	06/14/76-06/23/76	3	8.8	8.667	9.	8.2	0.173	0.416	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/14/76-06/23/76	3	8.8	8.528	9.	8.2	0.202	0.45	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-06/23/76	3	0.002	0.003	0.006	0.001	0.	0.003	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	2	266.5	266.5	300.	233.	2244.5	47.376	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	2	0.4	0.4	0.4	0.4	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	3	126.	127.333	175.	81.	2210.333	47.014	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/76	3	1020.	1016.667	1030.	1000.	233.333	15.275	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0068

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	0	0.00				3	0	0.00						
00400	PH	Other-Hi Lim.	9.	3	1	0.33				3	1	0.33						
		Other-Lo Lim.	6.5	3	0	0.00				3	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00				3	0	0.00						
		Drinking Water	250.	3	0	0.00				3	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0069

NPS Station ID: CHIC0069 LAT/LON: 34.496170/ -96.982810 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK AT THE BROMIDE FOOT BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_15
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 920 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/4 MILE DUE NORTH OF VETERANS LAKE AT THE BROMIDE FOOT BRIDGE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THIS STUDY WERE PUBLISHED IN THE MARCH 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0069

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	11.	11.	11.	11.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	8000.	8000.	8000.	8000.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	3.903	3.903	3.903	3.903	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			8000.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	100.	100.	100.	100.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	2.	2.	2.	2.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			100.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0069

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0070

NPS Station ID: CHIC0070 LAT/LON: 34.496198/ -96.982866 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK ABOVE BROMIDE FOOT BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_15
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 910 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK ABOVE BROMIDE FOOT BRIDGE APPROXIMATELY 1000 FEET DUE SOUTH OF SULPHUR AND ONLY 100 FEET DUE SOUTH OF BROMIDE SPRING. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0070

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/14/76	1	26.	26.	26.	26.	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/14/76	1	10.9	10.9	10.9	10.9	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/14/76-06/14/76	1	17.	17.	17.	17.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/14/76-06/14/76	1	9.	9.	9.	9.	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-06/14/76	1	9.	9.	9.	9.	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-06/14/76	1	0.001	0.001	0.001	0.001	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/14/76	1	1.	1.	1.	1.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/14/76	1	110.	110.	110.	110.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	1	750.	750.	750.	750.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0070

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	1	1	1.00				1	1	1.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0070

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
	Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0071

NPS Station ID: CHIC0071 LAT/LON: 34.496393/ -96.982782 Agency: 112WRD Date Created: 01/30/93
Location: 01S-03E-03 CBDB 1 ABOVE BROMIDE FOOT BRIDG FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): 342947096585801
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304 Depth of Water: 0 Aquifer:
Major Basin: Elevation: 0 Water Body Id:
Minor Basin: ECO Region:
RF1 Index: 11130304 RF1 Mile Point: 0.000 Distance from RF1: 3.20 On/Off RF1:
RF3 Index: 11130303000701.97 RF3 Mile Point: 2.13 Distance from RF3: 0.03 On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0071

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/14/76	1	26.	26.	26.	26.	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/14/76	1	10.9	10.9	10.9	10.9	0.	0.	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/14/76-06/14/76	1	16.7	16.7	16.7	16.7	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	06/14/76-06/14/76	1	8.9	8.9	8.9	8.9	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/14/76-06/14/76	1	8.9	8.9	8.9	8.9	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-06/14/76	1	0.001	0.001	0.001	0.001	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/14/76	1	1.	1.	1.	1.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/14/76	1	110.	110.	110.	110.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	1	750.	750.	750.	750.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0071

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00400	PH	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
		Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0072

NPS Station ID: CHIC0072
LAT/LON: 34.496809/ -96.982866
Agency: 11NPSWRD
Date Created: 09/20/97
Location: BROMIDE SPRING
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_NPS_BROMSP
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 920
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT BROMIDE SPRING APPROXIMATELY A 1/4 MILE SOUTH OF SULPHUR AND 3/4 MILE EAST OF HWY 177. SAMPLING FOR THIS SITE WAS DONE FROM FEBRUARY 1967 THROUGH MAY 1967. THE OBJECTIVE OF THE STUDY WAS TO SEE IF THE WATER WAS OF ADEQUATE BACTERIOLOGICAL QUALITY TO MEET THE U.S. PUBLIC HEALTH SERVICE DRINKING WATER STANDARDS. THE STUDY WAS DONE BY THE U.S. DEPARTMENT OF THE INTERIOR - FEDERAL WATER POLLUTION CONTROL ADMINISTRATION. RESULTS ARE IN THE 1968 REPORT "A STUDY OF THE BACTERIOLOGICAL CONTAMINATION OF HILLSIDE SPRING AT PLATT NATIONAL PARK". FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0072

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	35	1.	36.943	356.	0.5	8053.055	89.739	0.5	0.5	13.	174.8
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	02/14/67-05/22/67	35	0.	0.445	2.551	-0.301	0.899	0.948	-0.301	-0.301	1.114	2.24
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			2.786								
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	36 ##	0.5	0.639	4.	0.5	0.394	0.628	0.5	0.5	0.5	0.5
31613	LOG FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24	02/14/67-05/22/67	36 ##	-0.301	-0.259	0.602	-0.301	0.032	0.178	-0.301	-0.301	-0.301	-0.301
31613	GM FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24H	GEOMETRIC MEAN =			0.551								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	36 ##	0.5	2.042	33.	0.5	30.02	5.479	0.5	0.5	1.625	4.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	36 ##	-0.301	-0.073	1.519	-0.301	0.193	0.439	-0.301	-0.301	0.151	0.602
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			0.844								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	19	20700.	26263.158	82000.	5000.	357864678.363	18917.312	7900.	16900.	33000.	60000.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	19	4.316	4.326	4.914	3.699	0.088	0.296	3.898	4.228	4.519	4.778
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			21176.026								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	25	2400.	35902.	720000.	100.	20475904300.	143094.04	404.	1050.	7450.	43400.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	25	3.38	3.513	5.857	2.	0.645	0.803	2.606	3.021	3.868	4.626
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			3261.658								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0072

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	35	0	0.00	9	0	0.00	26	0	0.00						
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	36	0	0.00	9	0	0.00	27	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0073

NPS Station ID: CHIC0073 | LAT/LON: 34.496809/ -96.984116 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: ROCK CREEK NORTH OF VETERANS LAKE | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM | STORET Station ID(s): CHIC_SCH_T2_7
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 920 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/4 MILE DUE NORTH OF VETERANS LAKE AND ON THE EAST EDGE OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON MAY 28 AND AUGUST 5 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL(405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0073

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/05/75-08/05/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	08/05/75-08/05/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-05/28/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-05/28/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			200.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0073

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00							1	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0074

NPS Station ID: CHIC0074
LAT/LON: 34.496865/ -96.984031
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Unnamed Spring in Bed of Rock Cr
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S12 /GOULD_19 /CNR-12 /1197
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle. Station is an unnamed spring in the bed of Rock Creek. The outlet is a vertical cast iron pipe set in the bed of Rock Creek. The spring is mineralized. This is Gould's No. 19. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0074

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/22/89-06/25/90	8	23.85	24.238	28.1	21.8	5.64	2.375	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/22/89-10/21/93	10	5170.	4942.	6640.	2410.	1830662.222	1353.02	2490.	4012.5	5975.	6575.
00403	PH, LAB, STANDARD UNITS SU	07/03/89-10/21/93	9	8.	8.078	8.4	7.8	0.049	0.222	7.8	7.9	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/03/89-10/21/93	9	8.	8.03	8.4	7.8	0.052	0.228	7.8	7.9	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/03/89-10/21/93	9	0.01	0.009	0.016	0.004	0.	0.004	0.004	0.005	0.013	0.016
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/03/89-07/07/92	8	465.	457.625	473.	421.	305.696	17.484	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	563.	563.	563.	563.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	1.28	1.15	2.1	0.17	0.509	0.714	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.004	0.008	0.025	0.001	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/22/89-10/21/93	10	0.105	0.098	0.16	0.	0.003	0.052	0.003	0.066	0.143	0.159
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.24	0.245	0.5	0.	0.051	0.226	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	9	149.	149.444	157.	141.	23.778	4.876	141.	146.5	153.5	157.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	69.2	69.2	69.2	69.2	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	31.1	31.1	31.1	31.1	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	77.5	77.5	77.5	77.5	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	3.8	3.8	3.8	3.8	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	1800.	1800.	1800.	1800.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/22/89-10/21/93	8	16.5	20.406	45.	0.25	202.249	14.221	**	**	**	**
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	161.	161.	161.	161.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.3	0.3	0.3	0.3	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0074

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	75.	75.	75.	75.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	11.9	11.9	11.9	11.9	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1950.	1950.	1950.	1950.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	17.	17.	17.	17.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1 ##	28.5	28.5	28.5	28.5	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	15.	15.	15.	15.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	16.	16.	16.	16.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	962.	962.	962.	962.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	9	149.	148.	155.	138.	23.	4.796	138.	145.5	151.	155.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	9	0.	1.444	8.	0.	7.278	2.698	0.	0.	2.5	8.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/22/89-10/21/93	10	0.27	0.264	0.5	0.025	0.017	0.13	0.039	0.16	0.34	0.487
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/22/89-10/21/93	7	6.	7.643	23.	1.5	48.56	6.968	**	**	**	**
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.	24.	24.	24.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	0.04	0.04	0.04	0.04	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0074

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	9	0	0.00	1	0	0.00	4	0	0.00	4	0	0.00			
		Other-Lo Lim.	6.5	9	0	0.00	1	0	0.00	4	0	0.00	4	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	10	0	0.00	1	0	0.00	5	0	0.00	4	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	1	1.00	1	1	1.00									
		Drinking Water	250.	1	1	1.00	1	1	1.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	8	0	0.00	1	0	0.00	3	0	0.00	4	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0074

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0075

NPS Station ID: CHIC0075 | LAT/LON: 34.496977/ -96.988309 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: ROCK CREEK AT SULPHUR CAMPGROUNDS | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM | STORET Station ID(s): CHIC_HARP_18
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 910 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY 500 FEET UPSTREAM FROM CHIC_HARP_16. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0075

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-06/23/77	15	15.	15.467	27.	5.	59.481	7.712	5.	11.	23.5	26.1
00300	OXYGEN, DISSOLVED MG/L	09/05/76-06/23/77	16	9.75	10.381	14.6	7.1	5.204	2.281	7.8	8.525	12.525	14.11
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	16	1.15	1.731	5.3	0.3	1.609	1.268	0.65	0.9	2.6	3.62
00340	COD, .25N K2CR2O7 MG/L	09/05/76-07/01/77	17	17.	24.706	94.	4.	528.346	22.986	8.8	13.	27.5	70.
00403	PH, LAB, STANDARD UNITS SU	09/05/76-07/01/77	14	8.	8.214	10.1	7.7	0.371	0.609	7.75	7.875	8.3	9.45
00403	CONVERTED PH, LAB, STANDARD UNITS	09/05/76-07/01/77	14	8.	8.032	10.1	7.7	0.406	0.638	7.75	7.875	8.3	9.45
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-07/01/77	14	0.01	0.009	0.02	0.	0.	0.006	0.001	0.005	0.013	0.018
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	2	241.	241.	254.	228.	338.	18.385	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-04/01/77	4	8.5	11.	27.	0.	130.	11.402	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	5	0.22	0.613	1.904	0.	0.593	0.77	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-04/01/77	4	0.1	0.11	0.21	0.03	0.006	0.076	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	6	0.325	0.572	1.64	0.	0.404	0.636	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	4	0.085	0.095	0.195	0.015	0.008	0.091	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-03/09/77	5	314.	326.4	475.	93.	24871.3	157.706	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	11.	11.	11.	11.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	6	75500.	292333.333	830000.	6000.141	898666666.667	376694.394	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-12/19/76	6	4.852	4.988	5.919	3.778	0.654	0.809	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			97347.584								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0075

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	550.	3412.143	29600.	0.	62762587.363	7922.284	110.	295.	1925.	19550.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	2.739	2.767	4.471	0.	1.019	1.01	1.171	2.47	3.277	4.225
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			585.446								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	13	560.	4203.846	39500.	0.	114453642.308	10698.301	36.	100.	3450.	25140.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	13	2.748	2.701	4.597	0.	1.276	1.13	0.782	2.	3.538	4.18
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			502.607								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-06/23/77	16	1900.	1528.438	2200.	500.	422952.396	650.348	538.5	755.	2087.5	2165.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	4	0.143	0.26	0.73	0.025	0.105	0.324	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0075

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	16	0	0.00	9	0	0.00	6	0	0.00	1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	14	1	0.07	9	1	0.11	3	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	14	0	0.00	9	0	0.00	3	0	0.00	2	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	4	0	0.00	2	0	0.00	2	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	5	0	0.00	4	0	0.00	1	0	0.00						
		Drinking Water	250.	5	4	0.80	4	3	0.75	1	1	1.00						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	6	6	1.00	6	6	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	14	13	0.93	8	7	0.88	6	6	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0076

NPS Station ID: CHIC0076
LAT/LON: 34.497143/ -96.983754
Agency: 11NPSWRD
Date Created: 09/20/97
Location: MEDICINE SPRING
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_NPS_MEDSP
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 920
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT MEDICINE SPRING APPROXIMATELY 200 FEET SOUTH OF SULPHUR AND 3/4 MILE EAST OF HWY 177. SAMPLING FOR THIS SITE WAS DONE FROM FEBRUARY 1967 THROUGH MAY 1967. THE OBJECTIVE OF THE STUDY WAS TO SEE IF THE WATER WAS OF ADEQUATE BACTERIOLOGICAL QUALITY TO MEET THE U.S. PUBLIC HEALTH SERVICE DRINKING WATER STANDARDS. THE STUDY WAS DONE BY THE U.S. DEPARTMENT OF THE INTERIOR - FEDERAL WATER POLLUTION CONTROL ADMINISTRATION. RESULTS ARE IN THE 1968 REPORT "A STUDY OF THE BACTERIOLOGICAL CONTAMINATION OF HILLSIDE SPRING AT PLATT NATIONAL PARK". FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0076

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	33 ##	0.5	35.061	475.	0.5	9464.293	97.285	0.5	0.5	11.	156.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	02/14/67-05/22/67	33 ##	-0.301	0.336	2.677	-0.301	0.896	0.946	-0.301	-0.301	1.04	2.193
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			2.169								
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	37 ##	0.5	10.284	92.	0.5	688.563	26.24	0.5	0.5	0.5	71.6
31613	LOG FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24	02/14/67-05/22/67	37 ##	-0.301	0.059	1.964	-0.301	0.562	0.75	-0.301	-0.301	-0.301	1.853
31613	GM FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24H	GEOMETRIC MEAN =			1.146								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	0.5	45.892	600.	0.5	15055.196	122.7	0.5	0.5	15.	198.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	-0.301	0.312	2.778	-0.301	1.068	1.033	-0.301	-0.301	1.167	2.296
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			2.052								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	18	34700.	64483.333	297000.	4000.	5685596764.706	75402.896	6340.	16275.	92000.	208800.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	18	4.54	4.564	5.473	3.602	0.243	0.493	3.798	4.211	4.964	5.316
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			36654.181								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	24	6800.	23175.833	115000.	170.	1068496060.145	32687.858	400.	912.5	45750.	79000.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	24	3.809	3.769	5.061	2.23	0.751	0.867	2.54	2.952	4.657	4.88
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			5879.089								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0076

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	33	0	0.00	10	0	0.00	23	0	0.00						
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	37	0	0.00	10	0	0.00	27	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0077

NPS Station ID: CHIC0077
LAT/LON: 34.497226/ -96.988337
Agency: 112WRD
Date Created: 10/10/92
Location: 01S-03E-04 DABD 1 CAMPGROUND
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 342950096591801
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 0.30
On/Off RF1:
RF3 Index: 11130303060000.00
RF3 Mile Point: 0.41
Distance from RF3: 0.01
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0077

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	2	24.25	24.25	25.	23.5	1.125	1.061	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	2	7.75	7.75	8.4	7.1	0.845	0.919	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	0.75	0.75	1.2	0.3	0.405	0.636	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/18/76	2	26.3	26.3	42.8	9.8	544.5	23.335	**	**	**	**
00400	PH (STANDARD UNITS)	09/05/76-09/18/76	2	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	09/05/76-09/18/76	2	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/18/76	2	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	2	1900.	1900.	1950.	1850.	5000.	70.711	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0077

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00	1	0	0.00				1	0	0.00			
00400	PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0078

NPS Station ID: CHIC0078 LAT/LON: 34.497587/ -96.984781 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK SOUTH OF CAMPGROUND ENTRANCE BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_16
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 920 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/2 MILE DUE NORTH OF VETERANS LAKE AND ON THE EAST EDGE OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0078

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	100.	133.333	300.	0.	23333.333	152.753	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	2.	1.492	2.477	0.	1.727	1.314	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			31.072								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0078

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	0	0.00	3	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0079

NPS Station ID: CHIC0079
LAT/LON: 34.497587/ -96.984866
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK AT BROMIDE FOOT BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_SCH_T2_10
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 920
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/4 MILE DUE NORTH OF VETERANS LAKE AND ON THE EAST EDGE OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON SEPTEMBER 21 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR FECAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0079

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	1	3500.	3500.	3500.	3500.	0.	0.	**	**	**	**
31614	LOG FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	1	3.544	3.544	3.544	3.544	0.	0.	**	**	**	**
31614	GM FECAL COLIFORM,MPN,TUBE CONFIGURATION	GEOMETRIC MEAN =			3500.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0079

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0080

NPS Station ID: CHIC0080
LAT/LON: 34.497948/ -96.985005
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Rock Creek at Bridge near Campground
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_ROCK4
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 920
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur South Okla 7.5' USGS quadrangle in Township/Range/Section: T1S/R3E/3. Station is known as Rock Creek Site 4 and is located on Rock Creek at the center of the downstream side of the low water bridge near Rock Creek Campground. This station is approximately one mile below CHIC_ROCK3. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	81	15.2	14.948	24.1	2.5	43.29	6.579	6.3	8.75	20.85	22.88
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	81	705.	733.123	1150.	332.	20365.185	142.707	578.4	641.	812.	917.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	80	7.7	8.111	12.7	3.1	2.821	1.68	6.2	6.9	9.6	10.1
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	81	8.3	8.158	8.6	7.	0.082	0.287	7.6	8.15	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	81	8.3	8.019	8.6	7.	0.102	0.319	7.6	8.15	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	81	0.005	0.01	0.1	0.003	0.	0.013	0.004	0.005	0.007	0.025
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	81	275.	264.753	299.	187.	685.263	26.178	222.	249.5	283.	289.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	80	0.07	0.08	0.26	0.02	0.002	0.045	0.04	0.05	0.09	0.159
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	59	0.002	0.002	0.008	0.001	0.	0.001	0.002	0.002	0.002	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	81	0.14	0.145	0.26	0.07	0.001	0.037	0.1	0.12	0.17	0.188
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	58	0.1	0.129	0.52	0.03	0.008	0.088	0.049	0.08	0.16	0.234
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	80	291.	287.4	329.	194.	835.813	28.91	248.4	268.25	309.5	322.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	79	20.	20.468	36.	10.	16.278	4.035	16.	18.	22.	26.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	271.5	268.588	329.	159.	1777.309	42.158	216.7	242.25	304.5	322.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	4.	18.813	127.	0.	817.8	28.597	0.	0.	33.5	54.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	63	0.08	0.116	0.4	0.02	0.008	0.089	0.04	0.05	0.12	0.28
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	81	4.3	5.044	15.3	1.6	6.928	2.632	2.1	3.25	6.25	8.48

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0080

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	1	0.01	37	0	0.00	25	0	0.00	18	1	0.06			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	27	0	0.00	19	0	0.00	13	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	37	0	0.00	24	0	0.00	18	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	16.8	15.9	23.5	6.	52.108	7.219	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	897.5	837.5	1056.	559.	32505.9	180.294	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	8.15	8.017	10.2	6.2	2.226	1.492	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	7.9	7.817	8.3	7.	0.286	0.534	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	6	7.804	7.54	8.3	7.	0.378	0.614	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	6	0.016	0.029	0.1	0.005	0.001	0.037	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	272.	261.833	299.	220.	1003.367	31.676	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.1	0.095	0.16	0.04	0.002	0.05	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	6	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.16	0.165	0.22	0.12	0.001	0.033	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	6	0.145	0.193	0.52	0.08	0.026	0.163	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	311.5	291.5	323.	238.	1526.7	39.073	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	22.	24.	36.	15.	64.	8.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	309.	290.667	323.	238.	1487.867	38.573	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	0.	0.833	5.	0.	4.167	2.041	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	6.1	6.	9.6	2.	10.62	3.259	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	15.75	15.017	23.5	2.5	47.307	6.878	3.46	8.275	21.2	23.11
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	776.	785.167	1010.	460.	29397.788	171.458	516.7	652.25	948.75	1007.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.85	8.317	12.7	5.6	4.643	2.155	5.78	6.7	9.425	12.4
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.3	8.283	8.4	8.2	0.007	0.083	8.2	8.2	8.375	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.3	8.276	8.4	8.2	0.007	0.084	8.2	8.2	8.375	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.005	0.005	0.006	0.004	0.	0.001	0.004	0.004	0.006	0.006
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	281.5	269.833	290.	204.	712.515	26.693	210.3	273.	283.	288.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.07	0.082	0.26	0.04	0.003	0.058	0.043	0.053	0.08	0.206
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.004	0.001	0.	0.001	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.135	0.138	0.19	0.1	0.001	0.031	0.103	0.11	0.168	0.184
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.08	0.094	0.21	0.03	0.003	0.054	0.033	0.053	0.135	0.195
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	292.5	292.667	328.	210.	1038.606	32.227	228.6	277.	320.25	326.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	18.5	19.917	26.	16.	9.72	3.118	16.3	18.	22.75	25.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	282.	268.667	328.	159.	2785.152	52.775	173.1	222.25	311.	326.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	0.	24.	127.	0.	2107.455	45.907	0.	0.	38.5	121.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	3.2	4.55	15.3	1.9	14.592	3.82	1.93	2.275	4.475	13.26

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.4	15.217	23.5	6.8	50.874	7.133	6.8	7.45	22.475	23.29
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	671.	726.583	1150.	576.	26631.356	163.191	576.6	617.75	799.25	1070.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.05	7.683	9.9	5.9	2.258	1.503	5.99	6.35	9.35	9.9
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.2	8.117	8.3	7.6	0.056	0.237	7.66	7.925	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.2	8.048	8.3	7.6	0.061	0.248	7.66	7.925	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.012	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	275.5	267.167	290.	222.	488.879	22.111	224.1	255.5	283.5	288.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.055	0.068	0.15	0.03	0.001	0.033	0.033	0.05	0.087	0.135
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.003	0.008	0.002	0.	0.002	0.002	0.002	0.005	0.008
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.145	0.144	0.25	0.07	0.002	0.046	0.079	0.113	0.168	0.226
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.09	0.124	0.38	0.03	0.011	0.104	0.033	0.06	0.145	0.35

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	292.	291.167	327.	248.	653.97	25.573	250.4	269.25	316.5	325.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	21.	21.083	27.	17.	10.992	3.315	17.	18.	24.25	26.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	290.	274.083	327.	183.	1851.174	43.025	196.5	243.5	305.75	325.5
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	4.	17.083	96.	0.	791.902	28.141	0.	0.	23.	79.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.085	0.12	0.29	0.04	0.009	0.094	0.043	0.05	0.208	0.287
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	3.5	4.2	9.6	1.6	5.804	2.409	1.72	2.2	6.15	8.82

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.25	15.325	23.5	6.3	40.133	6.335	6.99	9.525	21.575	23.05
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	628.	701.167	919.	580.	18628.515	136.486	580.	588.75	847.5	915.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.65	7.675	9.9	5.5	1.96	1.4	5.62	6.725	8.55	9.87
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.2	8.125	8.3	7.6	0.053	0.23	7.66	7.975	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.2	8.057	8.3	7.6	0.058	0.241	7.66	7.975	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.011	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	284.5	277.083	295.	222.	479.72	21.903	229.8	270.5	292.75	294.7
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.06	0.057	0.1	0.02	0.001	0.025	0.02	0.033	0.078	0.094
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.003	0.005	0.002	0.	0.001	0.002	0.002	0.003	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.13	0.128	0.17	0.08	0.001	0.029	0.083	0.103	0.155	0.167
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.1	0.142	0.28	0.04	0.007	0.082	0.046	0.09	0.213	0.277
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	11	292.	289.909	322.	228.	701.491	26.486	233.6	288.	306.	319.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	10	20.5	20.8	27.	17.	7.067	2.658	17.2	19.	22.	26.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	256.	264.364	322.	182.	1368.655	36.995	194.6	249.	292.	318.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	17.	25.545	55.	0.	594.073	24.374	0.	0.	52.	55.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.085	0.109	0.4	0.02	0.01	0.099	0.026	0.053	0.133	0.322
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.45	5.458	15.3	2.	11.597	3.405	2.42	3.625	6.075	12.81

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.2	15.358	23.5	4.7	41.803	6.465	5.24	9.675	20.75	23.23
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	713.5	729.75	907.	568.	11103.114	105.371	581.8	642.	804.75	894.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.55	8.142	11.2	5.9	2.65	1.628	6.08	6.925	9.625	10.84
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.25	8.15	8.4	7.6	0.057	0.239	7.66	8.025	8.3	8.37
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.247	8.077	8.4	7.6	0.063	0.251	7.66	8.025	8.3	8.37
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.008	0.025	0.004	0.	0.006	0.004	0.005	0.009	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	270.	259.417	282.	187.	867.356	29.451	197.5	245.75	281.25	282.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.075	0.078	0.16	0.02	0.001	0.033	0.032	0.06	0.095	0.142
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.002	0.001	0.	0.	0.001	0.002	0.002	0.002
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.14	0.147	0.18	0.09	0.001	0.029	0.096	0.133	0.178	0.18
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	11	0.1	0.129	0.23	0.05	0.004	0.061	0.056	0.09	0.21	0.226
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	288.	288.	322.	256.	442.727	21.041	257.8	268.25	305.75	317.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	21.	20.75	27.	16.	12.386	3.519	16.3	17.25	22.75	26.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	269.	266.75	322.	171.	1856.386	43.086	188.4	236.25	301.5	317.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	5.5	21.25	91.	0.	852.932	29.205	0.	0.5	44.	79.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.07	0.118	0.29	0.04	0.009	0.095	0.043	0.05	0.208	0.287
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.5	4.867	8.5	2.5	3.388	1.841	2.68	3.4	6.	8.05

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	14.75	14.875	24.1	4.5	52.498	7.246	5.07	8.4	22.325	23.89
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	674.5	672.667	852.	332.	24783.152	157.427	385.7	560.5	811.5	851.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	11	8.5	8.173	11.	3.1	4.816	2.195	3.84	7.2	9.9	10.84
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.3	8.258	8.5	7.6	0.064	0.254	7.72	8.2	8.475	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.3	8.169	8.5	7.6	0.073	0.27	7.72	8.2	8.475	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.005	0.007	0.025	0.003	0.	0.006	0.003	0.003	0.006	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	259.	253.917	284.	201.	742.447	27.248	205.8	231.	279.25	282.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	11	0.08	0.1	0.25	0.05	0.003	0.058	0.052	0.06	0.11	0.232
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	5	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.135	0.149	0.24	0.09	0.002	0.041	0.099	0.123	0.168	0.231
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	5	0.12	0.118	0.18	0.07	0.002	0.04	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	274.	269.5	326.	194.	1497.545	38.698	202.7	245.25	292.	325.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	19.	18.25	25.	10.	17.841	4.224	10.6	16.25	21.	24.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	261.	257.25	324.	162.	1923.659	43.86	180.3	229.	289.25	319.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	1.5	12.25	64.	0.	375.295	19.373	0.	0.	19.	54.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.09	0.126	0.34	0.04	0.009	0.097	0.04	0.055	0.203	0.316
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	5.3	5.642	9.2	2.1	5.161	2.272	2.49	4.	7.775	8.96

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.25	15.217	22.5	4.6	41.085	6.41	5.11	9.5	20.775	22.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	724.5	726.333	869.	586.	7135.152	84.47	602.5	658.5	807.75	851.9
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.6	8.308	11.1	6.8	2.026	1.423	6.83	7.2	9.6	10.74
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.25	8.142	8.6	7.3	0.126	0.355	7.39	8.1	8.3	8.54
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.247	7.964	8.6	7.3	0.161	0.401	7.39	8.1	8.3	8.54
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.011	0.05	0.003	0.	0.014	0.003	0.005	0.008	0.043
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	273.	261.667	291.	197.	808.788	28.439	205.4	243.	282.75	289.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.08	0.084	0.18	0.02	0.002	0.049	0.023	0.05	0.108	0.174
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.145	0.152	0.26	0.08	0.002	0.047	0.086	0.123	0.178	0.239
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	293.	292.083	329.	261.	508.447	22.549	261.6	272.	311.5	324.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	19.	19.667	27.	16.	13.515	3.676	16.	17.	21.5	26.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	270.5	269.	329.	173.	1736.727	41.674	190.4	243.75	301.5	322.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	10.	23.083	90.	0.	816.629	28.577	0.	1.25	47.5	78.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.09	0.121	0.29	0.03	0.007	0.083	0.036	0.063	0.188	0.278
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	5.05	4.975	7.3	3.2	1.517	1.231	3.2	3.775	5.875	6.94

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	3	6.7	7.767	11.8	4.8	13.103	3.62	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	3	798.	752.667	810.	650.	7941.333	89.114	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	3	10.1	9.8	10.1	9.2	0.27	0.52	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	3	8.3	8.333	8.4	8.3	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	3	8.3	8.331	8.4	8.3	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	3	0.005	0.005	0.005	0.004	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	270.	268.333	284.	251.	274.333	16.563	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.07	0.1	0.16	0.07	0.003	0.052	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.14	0.15	0.19	0.12	0.001	0.036	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	275.	284.333	310.	268.	506.333	22.502	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	3	22.	23.	25.	22.	3.	1.732	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	271.	268.667	303.	232.	1264.333	35.557	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	7.	15.667	36.	4.	312.333	17.673	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	3	0.06	0.06	0.07	0.05	0.	0.01	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	3	4.7	5.433	8.4	3.2	7.163	2.676	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	37	8.8	9.57	21.6	2.5	19.052	4.365	4.68	6.35	13.2	15.12
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	37	798.	779.162	1150.	460.	21232.862	145.715	589.6	668.5	876.5	967.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	37	9.6	9.189	12.7	6.2	2.089	1.445	7.36	8.35	10.05	11.12
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	37	8.3	8.23	8.4	7.	0.074	0.272	8.2	8.2	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	37	8.3	8.048	8.4	7.	0.108	0.328	8.2	8.2	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	37	0.005	0.009	0.1	0.004	0.	0.017	0.004	0.005	0.006	0.006
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	280.	263.162	299.	187.	908.473	30.141	216.8	245.5	284.	291.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.07	0.081	0.26	0.02	0.003	0.051	0.028	0.05	0.095	0.16
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.13	0.129	0.16	0.1	0.	0.018	0.1	0.12	0.14	0.16
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	294.	295.811	329.	210.	774.991	27.839	262.6	278.5	321.	326.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	37	21.	21.514	27.	15.	8.146	2.854	17.8	20.	23.5	26.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	292.	285.838	329.	206.	964.306	31.053	244.6	265.	315.	324.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	2.	9.973	55.	0.	280.916	16.761	0.	0.	13.	48.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	37	4.2	5.13	15.3	1.6	11.285	3.359	2.	2.3	6.4	9.52

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	25	19.	17.284	23.4	8.2	20.981	4.581	9.2	13.5	20.7	22.26
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	25	641.	633.2	752.	511.	3092.417	55.61	572.8	587.	653.5	724.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	25	7.4	7.792	9.9	5.5	1.274	1.129	6.62	7.	8.7	9.6
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	25	8.2	8.212	8.5	7.9	0.021	0.145	7.96	8.15	8.3	8.34
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	25	8.2	8.187	8.5	7.9	0.022	0.147	7.96	8.15	8.3	8.34
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	25	0.006	0.006	0.013	0.003	0.	0.002	0.005	0.005	0.007	0.011
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	273.	272.	294.	201.	337.917	18.383	253.2	267.	282.5	291.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.07	0.078	0.25	0.02	0.002	0.044	0.046	0.055	0.085	0.126
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.14	0.144	0.25	0.07	0.002	0.049	0.08	0.1	0.18	0.21
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	282.	275.68	323.	194.	788.977	28.089	237.	262.5	292.	306.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	24	18.5	18.958	23.	16.	5.085	2.255	16.	17.	20.75	22.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	232.	231.76	312.	159.	1843.857	42.94	167.4	199.5	247.	300.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	36.	43.92	127.	0.	1264.66	35.562	0.6	18.5	59.5	100.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	25	4.	4.524	9.6	2.8	2.504	1.582	3.06	3.3	5.35	6.86

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0080

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	19	22.6	22.347	24.1	20.4	1.503	1.226	20.5	20.6	23.5	23.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	19	804.	774.947	1056.	332.	23852.053	154.441	538.	701.	880.	907.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	18	6.6	6.339	7.2	3.1	0.881	0.939	5.35	5.9	6.9	7.2
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	19	7.8	7.947	8.6	7.5	0.128	0.358	7.6	7.6	8.2	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	19	7.8	7.829	8.6	7.5	0.143	0.378	7.6	7.6	8.2	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	19	0.016	0.015	0.032	0.003	0.	0.01	0.003	0.006	0.025	0.025
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	19	270.	258.316	286.	217.	656.228	25.617	222.	225.	278.	281.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	18	0.08	0.08	0.18	0.03	0.001	0.034	0.039	0.06	0.1	0.117
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	19	0.17	0.176	0.26	0.14	0.001	0.028	0.16	0.16	0.18	0.22
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	18	300.	286.389	323.	223.	772.016	27.785	252.7	257.5	306.25	314.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	18	18.	20.333	36.	10.	44.941	6.704	11.8	17.	27.	31.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	291.	284.278	323.	223.	711.271	26.67	252.7	257.5	306.	309.5
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	0.	2.111	22.	0.	27.634	5.257	0.	0.	3.25	6.7
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	19	6.	5.563	9.2	2.7	4.208	2.051	2.8	3.4	7.	8.5

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0081

NPS Station ID: CHIC0081
LAT/LON: 34.498503/ -96.985642
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK CAMPGROUND SWIM AREA
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_SCH_T2_6
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 920
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/2 MILE DUE NORTH OF VETERANS LAKE AND NEAR SITE 26 OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON JUNE 24 AND AUGUST 20 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0081

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/20/75-08/20/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	08/20/75-08/20/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/24/75-06/24/75	1	1600.	1600.	1600.	1600.	0.	0.	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/24/75-06/24/75	1	3.204	3.204	3.204	3.204	0.	0.	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			1600.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0081

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00							1	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	1	1	1.00				1	1	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0082

NPS Station ID: CHIC0082 LAT/LON: 34.499476/ -96.987142 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BETWEEN 2 SIPHONS NEAR CAMPGROUND FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_17
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 910 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR SOUTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY A 1/2 MILE DUE NORTH OF VETERANS LAKE AND A COUPLE HUNDRED FEET NORTH OF ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0082

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	0.	66.667	200.	0.	13333.333	115.47	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	0.	0.767	2.301	0.	1.765	1.329	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			5.848								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0082

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	0	0.00	3	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0083

NPS Station ID: CHIC0083 LAT/LON: 34.500392/ -96.960198 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK BELOW THE SWIMMING AREA FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 980 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK BELOW THE SWIMMING AREA APPROXIMATELY 1/2 MILE EAST OF WHERE TRAVERTINE CREEK ENTERS ROCK CREEK. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0083

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-01/21/77	6	11.5	13.417	23.5	6.	58.642	7.658	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-01/21/77	7	9.8	10.014	13.6	7.2	5.435	2.331	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-01/21/77	6	1.6	1.467	2.2	0.6	0.427	0.653	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	09/05/76-01/21/77	4	11.5	30.5	89.	10.	1521.667	39.009	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	09/05/76-01/21/77	7	8.	8.243	9.8	7.6	0.506	0.711	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	09/05/76-01/21/77	7	8.	8.003	9.8	7.6	0.573	0.757	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-01/21/77	7	0.01	0.01	0.025	0.	0.	0.008	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/77-01/21/77	1	252.	252.	252.	252.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/21/77-01/21/77	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	2 ##	0.045	0.045	0.09	0.	0.004	0.064	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	2 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-01/21/77	2 ##	0.115	0.115	0.23	0.	0.026	0.163	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-01/21/77	2	5.5	5.5	8.	3.	12.5	3.536	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	7.	7.	7.	7.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	06/19/76-12/19/76	23	16200.	19595.652	78800.	400.	280548616.601	16749.586	1240.	9300.	28000.	36960.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	06/19/76-12/19/76	23	4.21	4.092	4.897	2.602	0.283	0.532	3.082	3.968	4.447	4.565
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			12369.779								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0083

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	44	745.	30138.409	500000.	0.	8562737320.666	92535.06	5.	112.5	2412.5	150000.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	44	2.872	2.776	5.699	0.	1.975	1.405	0.5	2.044	3.382	5.151
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			596.464								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-07/17/77	37	750.	3343.784	30000.	0.	43730957.508	6612.939	0.	220.	2000.	12000.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-07/17/77	37	2.875	2.632	4.477	0.	1.591	1.262	0.	2.341	3.301	4.06
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			428.813								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-01/21/77	7	500.	517.143	550.	500.	557.143	23.604	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	2 ##	0.008	0.008	0.015	0.	0.	0.011	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0083

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	7	0	0.00	6	0	0.00				1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	7	1	0.14	6	1	0.17				1	0	0.00			
		Other-Lo Lim.	6.5	7	0	0.00	6	0	0.00				1	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00	2	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00	2	0	0.00									
		Drinking Water	250.	2	0	0.00	2	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	23	22	0.96	7	6	0.86	10	10	1.00	6	6	1.00			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	44	31	0.70	8	2	0.25				36	29	0.81			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0084

NPS Station ID: CHIC0084
LAT/LON: 34.501115/ -96.961670
Agency: 112WRD
Date Created: 01/30/93
Location: 01S-03E-02 BDBD 1 BELOW SWIMMING AREA
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343004096574201
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 0.50
On/Off RF1:
RF3 Index: 11130303000701.97
RF3 Mile Point: 2.38
Distance from RF3: 0.01
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0084

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/05/76	1	23.5	23.5	23.5	23.5	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/05/76	1	8.4	8.4	8.4	8.4	0.	0.	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/05/76	1	0.6	0.6	0.6	0.6	0.	0.	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/05/76	1	10.7	10.7	10.7	10.7	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	09/05/76-09/05/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	09/05/76-09/05/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/05/76	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/05/76	1	550.	550.	550.	550.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0084

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00							1	0	0.00			
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0085

NPS Station ID: CHIC0085
LAT/LON: 34.501392/ -96.969170
Agency: 112WRD
Date Created: 01/30/93
Location: 01S-03E-03 AACA 1 TRAVERTINE AT HWY 177
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343005096580901
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 6.00
On/Off RF1:
RF3 Index: 11130303085200.00
RF3 Mile Point: 0.38
Distance from RF3: 0.00
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0085

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	2	23.5	23.5	24.5	22.5	2.	1.414	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	2	7.6	7.6	8.1	7.1	0.5	0.707	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	0.55	0.55	0.8	0.3	0.125	0.354	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/05/76	1	32.1	32.1	32.1	32.1	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	09/05/76-09/18/76	2	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	09/05/76-09/18/76	2	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/18/76	2	0.013	0.013	0.013	0.013	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	2	500.	500.	500.	500.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0085

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00	1	0	0.00				1	0	0.00			
00400	PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0086

NPS Station ID: CHIC0086 LAT/LON: 34.502003/ -96.971060 Agency: 11NPSWRD Date Created: 09/20/97
Location: HILLSIDE SPRING JUST WEST OF HIGHWAY 177 FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_NPS_HILLSP
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 960 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT HILLSIDE SPRING APPROXIMATELY A 1/4 MILE SOUTH OF SULPHUR AND JUST WEST OF HWY 177. SAMPLING FOR THIS SITE WAS DONE FROM JANUARY 1967 THROUGH MAY 1967. THE OBJECTIVE OF THE STUDY WAS TO SEE IF THE WATER WAS OF ADEQUATE BACTERIOLOGICAL QUALITY TO MEET THE U.S. PUBLIC HEALTH SERVICE DRINKING WATER STANDARDS. THE STUDY WAS DONE BY THE U.S. DEPARTMENT OF THE INTERIOR - FEDERAL WATER POLLUTION CONTROL ADMINISTRATION. RESULTS ARE IN THE 1968 REPORT "A STUDY OF THE BACTERIOLOGICAL CONTAMINATION OF HILLSIDE SPRING AT PLATT NATIONAL PARK". FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0086

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/30/67-05/22/67	47	19.	19.	19.	19.	0.	0.	19.	19.	19.	19.
00045	PRECIPITATION, TOTAL (INCHES PER DAY)	02/01/67-05/21/67	12	0.69	0.898	2.82	0.01	0.779	0.882	0.037	0.123	1.61	2.502
00061	FLOW, STREAM, INSTANTANEOUS CFS	01/28/67-05/22/67	49	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	01/30/67-05/22/67	46	2.5	48.739	1200.	0.5	35974.586	189.67	0.5	1.	14.	50.5
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	01/30/67-05/22/67	46	0.389	0.602	3.079	-0.301	0.69	0.831	-0.301	0.	1.143	1.684
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			3.998								
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	01/30/67-05/22/67	47 ##	0.5	2.117	29.	0.5	29.426	5.425	0.5	0.5	0.5	3.6
31613	LOG FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24	01/30/67-05/22/67	47 ##	-0.301	-0.13	1.462	-0.301	0.194	0.44	-0.301	-0.301	-0.301	0.229
31613	GM FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24H	GEOMETRIC MEAN =			0.741								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	01/30/67-05/22/67	47 ##	0.5	26.883	540.	0.5	9381.807	96.86	0.5	0.5	1.	28.8
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	01/30/67-05/22/67	47 ##	-0.301	0.151	2.732	-0.301	0.691	0.831	-0.301	-0.301	0.	1.447
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.417								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	21	450.	26227.714	480000.	40.1	0895050712.814	104379.36	73.	147.5	2335.	35600.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	21	2.653	2.884	5.681	1.602	1.026	1.013	1.863	2.168	3.368	4.499
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			765.364								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	22	545.	5321.818	90000.	4.	363143004.251	19056.311	9.2	30.	1275.	8220.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	22	2.72	2.468	4.954	0.602	1.213	1.102	0.956	1.477	3.081	3.915
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			293.697								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0086

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	46	1	0.02	19	0	0.00	27	1	0.04						
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	47	0	0.00	19	0	0.00	28	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0087

NPS Station ID: CHIC0087
LAT/LON: 34.502031/ -96.971087
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Hillside Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S8 /GOULD_12 /CNR-8 /1193
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Hillside Spring where the spring flows from a rock structure near Chickasaw National Recreation Area Headquarters. The spring is mineralized. This is Gould's No. 12. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean; Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0087

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/11/90	9	19.9	20.933	26.5	19.2	5.138	2.267	19.2	19.75	21.7	26.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	12	675.	676.333	826.	611.	2782.788	52.752	619.7	644.	684.25	785.5
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	10	7.4	7.38	7.6	7.3	0.008	0.092	7.3	7.3	7.4	7.58
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	10	7.4	7.372	7.6	7.3	0.009	0.092	7.3	7.3	7.4	7.58
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	10	0.04	0.042	0.05	0.025	0.	0.008	0.027	0.04	0.05	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	305.	296.9	317.	197.	1274.544	35.701	207.3	300.75	314.5	316.9
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	363.	363.	363.	363.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	0.14	0.125	0.19	0.	0.005	0.068	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.003	0.007	0.025	0.	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	11	0.11	0.103	0.12	0.08	0.	0.014	0.08	0.09	0.11	0.12
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.32	0.375	0.69	0.17	0.059	0.242	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	10	289.	287.7	298.	270.	72.678	8.525	271.2	282.75	294.5	297.8
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	111.	111.	111.	111.	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	49.2	49.2	49.2	49.2	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	333.	333.	333.	333.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	9.4	9.4	9.4	9.4	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	74.	74.	74.	74.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	10	21.5	22.7	37.	14.	40.011	6.325	14.4	19.5	24.5	36.2
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	133.	133.	133.	133.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.45	0.45	0.45	0.45	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0087

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	319.	319.	319.	319.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	57.5	57.5	57.5	57.5	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	8.	8.	8.	8.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1	8.9	8.9	8.9	8.9	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	6850.	6850.	6850.	6850.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1	13.	13.	13.	13.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	10.	10.	10.	10.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	191.	191.	191.	191.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	60.	60.	60.	60.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	16.	16.	16.	16.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	1220.	1220.	1220.	1220.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	285.5	284.5	298.	259.	132.056	11.492	260.5	280.	293.25	297.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	10	0.5	3.2	11.	0.	18.178	4.264	0.	0.	8.	10.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	11	0.2	0.272	0.86	0.025	0.056	0.237	0.028	0.08	0.35	0.776
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	10	0.45	0.54	1.5	0.1	0.216	0.465	0.1	0.175	0.875	1.46
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	0.05	0.05	0.05	0.05	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0087

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
		Other-Lo Lim.	6.5	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	11	0	0.00	1	0	0.00	7	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	10	0	0.00	1	0	0.00	6	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	1	1.00	1	1	1.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	1	1.00	1	1	1.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0087

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0088

NPS Station ID: CHIC0088
LAT/LON: 34.502587/ -96.939004
Agency: 11NPSWRD
Date Created: 06/07/97
Location: Buffalo Spring - the Source of Travertine Creek
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S2 /GOULD_2 /CHIC_TRAV1
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 1080
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/1. Station is known as Buffalo Spring and is the freshwater spring that is the full time source of Travertine Creek. Travertine Creek is intermittent above Buffalo Spring. Samples were collected near outfall of rock pool. This spring is Gould's No. 2 which is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. This station was know as TRAV1 in the park logs. For additional information on the station and the data in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	81	17.5	17.542	18.7	15.7	0.358	0.599	16.8	16.95	18.	18.3
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	81	565.	554.198	622.	368.	1785.335	42.253	507.2	530.	578.5	598.8
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	79	2.2	2.191	2.9	1.	0.106	0.326	1.8	2.	2.4	2.6
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	81	7.4	7.396	8.2	6.9	0.044	0.211	7.22	7.3	7.4	7.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	81	7.4	7.357	8.2	6.9	0.046	0.214	7.22	7.3	7.4	7.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	81	0.04	0.044	0.126	0.006	0.	0.017	0.032	0.04	0.05	0.061
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	81	324.	326.037	404.	296.	175.361	13.242	318.2	320.	328.5	335.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	80	0.02	0.037	0.35	0.	0.002	0.048	0.01	0.02	0.03	0.089
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	59	0.002	0.002	0.009	0.001	0.	0.001	0.001	0.002	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	81	0.4	0.365	0.49	0.002	0.011	0.105	0.222	0.3	0.45	0.478
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	58	0.115	0.143	0.7	0.04	0.014	0.118	0.059	0.078	0.165	0.23
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	81	332.	325.543	370.	210.	821.701	28.665	286.2	326.5	338.	350.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	79	16.	17.228	45.	10.	17.435	4.175	14.	15.	18.	21.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	81	332.	323.864	370.	210.	881.519	29.69	285.	324.5	337.	349.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	81	0.	1.679	29.	0.	20.121	4.486	0.	0.	0.5	5.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	62	0.12	0.147	0.39	0.02	0.008	0.092	0.04	0.09	0.18	0.286
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	81	1.	2.023	14.2	0.2	8.47	2.91	0.6	0.7	1.6	4.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0088

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	79	79	1.00	36	36	1.00	24	24	1.00	19	19	1.00			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	26	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	36	0	0.00	24	0	0.00	19	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	6	17.4	17.45	18.2	16.7	0.363	0.602	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	6	602.	600.667	622.	575.	244.267	15.629	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	6	2.1	2.05	2.3	1.6	0.075	0.274	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	6	7.3	7.25	7.4	6.9	0.035	0.187	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	6	7.3	7.211	7.4	6.9	0.037	0.192	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	6	0.05	0.061	0.126	0.04	0.001	0.033	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	6	321.	322.	326.	319.	8.4	2.898	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	6	0.015	0.015	0.02	0.01	0.	0.005	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	6	0.002	0.002	0.002	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	6	0.425	0.398	0.49	0.16	0.015	0.121	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	6	0.105	0.147	0.3	0.05	0.009	0.096	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	6	336.	340.667	358.	328.	135.867	11.656	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	6	17.5	17.	18.	15.	1.6	1.265	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	6	336.	338.333	358.	328.	123.067	11.094	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	6	0.	2.333	9.	0.	14.667	3.83	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	6	0.55	1.1	4.	0.2	2.096	1.448	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.35	17.483	18.6	16.5	0.492	0.702	16.59	16.9	18.	18.57
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	543.	553.833	610.	512.	1064.152	32.621	514.7	530.75	586.75	607.
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	12	2.15	2.175	2.6	2.	0.031	0.176	2.	2.025	2.2	2.54
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.4	7.392	7.5	7.3	0.004	0.067	7.3	7.325	7.4	7.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.4	7.387	7.5	7.3	0.004	0.067	7.3	7.325	7.4	7.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.04	0.041	0.05	0.032	0.	0.006	0.032	0.04	0.048	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	323.5	330.667	404.	319.	549.879	23.449	319.3	322.	326.5	383.3
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.03	0.033	0.09	0.	0.001	0.023	0.006	0.02	0.038	0.081
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	12	0.002	0.002	0.004	0.001	0.	0.001	0.001	0.001	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.425	0.415	0.49	0.29	0.003	0.058	0.305	0.373	0.46	0.481
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	12	0.1	0.109	0.23	0.04	0.003	0.057	0.04	0.07	0.15	0.215
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	333.	325.417	357.	234.	925.902	30.429	258.3	325.75	337.25	351.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	12	16.	15.417	18.	12.	3.538	1.881	12.3	14.	16.75	18.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	333.	325.417	357.	234.	925.902	30.429	258.3	325.75	337.25	351.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	1.15	2.108	13.3	0.5	12.626	3.553	0.56	0.7	1.425	9.97

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.75	17.617	18.2	16.8	0.24	0.49	16.8	17.25	17.975	18.2
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	558.	551.	619.	457.	1566.182	39.575	476.5	531.5	570.	608.8
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	11	2.2	2.218	2.9	1.7	0.134	0.366	1.7	2.	2.5	2.84
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.3	7.308	7.5	7.1	0.01	0.1	7.13	7.3	7.375	7.47
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.3	7.298	7.5	7.1	0.01	0.1	7.13	7.3	7.375	7.47
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.05	0.05	0.079	0.032	0.	0.012	0.034	0.042	0.05	0.075
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	323.	325.667	342.	315.	68.242	8.261	315.6	320.	332.75	340.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.02	0.053	0.35	0.01	0.009	0.096	0.01	0.01	0.038	0.272
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	12	0.002	0.003	0.009	0.002	0.	0.003	0.002	0.002	0.003	0.009
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.4	0.354	0.48	0.002	0.021	0.143	0.058	0.293	0.46	0.48
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	11	0.09	0.102	0.19	0.04	0.003	0.052	0.042	0.06	0.14	0.188

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	333.	327.	351.	243.	738.909	27.183	268.5	328.25	337.	347.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	12	16.	17.	23.	10.	12.182	3.49	11.5	15.	19.	22.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	332.	324.417	351.	235.	845.174	29.072	261.7	324.75	335.5	346.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	2.583	14.	0.	18.992	4.358	0.	0.	3.75	12.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	11	0.1	0.163	0.39	0.04	0.015	0.122	0.04	0.09	0.21	0.388
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	1.1	2.333	12.5	0.5	10.999	3.316	0.53	0.65	2.5	9.68

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.85	17.725	18.6	15.7	0.651	0.807	16.06	17.35	18.3	18.54
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	550.5	532.	572.	368.	3143.636	56.068	411.2	517.25	568.75	571.4
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	12	2.2	2.192	2.8	1.3	0.284	0.533	1.36	1.7	2.775	2.8
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.3	7.317	7.4	7.1	0.007	0.083	7.16	7.3	7.4	7.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.3	7.309	7.4	7.1	0.007	0.084	7.16	7.3	7.4	7.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.05	0.049	0.079	0.04	0.	0.011	0.04	0.04	0.05	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	325.	325.583	335.	320.	22.083	4.699	320.	321.25	329.5	333.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.02	0.022	0.05	0.	0.	0.013	0.	0.02	0.03	0.044
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	12	0.003	0.003	0.005	0.001	0.	0.001	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.37	0.358	0.48	0.21	0.009	0.096	0.213	0.26	0.445	0.48
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	12	0.145	0.234	0.7	0.06	0.047	0.218	0.063	0.098	0.315	0.682
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	332.	319.083	350.	239.	1338.811	36.59	240.8	326.25	336.75	347.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	10	18.	19.	26.	15.	14.889	3.859	15.1	16.	22.	25.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	331.	314.75	350.	225.	1656.205	40.696	229.2	304.5	336.75	347.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	4.333	29.	0.	93.152	9.652	0.	0.	2.25	26.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.13	0.127	0.22	0.03	0.004	0.066	0.033	0.055	0.18	0.214
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	1.25	2.008	8.7	0.6	5.19	2.278	0.63	0.825	2.3	7.17

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.7	17.642	18.7	16.8	0.394	0.627	16.8	16.975	18.2	18.58
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	569.	561.667	597.	501.	670.242	25.889	509.7	549.	577.	593.1
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	12	2.2	2.192	2.6	1.8	0.048	0.219	1.83	2.1	2.375	2.54
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.4	7.392	7.8	7.1	0.028	0.168	7.16	7.3	7.475	7.71
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.4	7.365	7.8	7.1	0.029	0.17	7.16	7.3	7.475	7.71
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.04	0.043	0.079	0.016	0.	0.015	0.021	0.034	0.05	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	324.5	328.333	364.	319.	147.697	12.153	319.3	321.	331.5	354.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.03	0.042	0.18	0.	0.002	0.048	0.006	0.02	0.03	0.153
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	12	0.002	0.002	0.002	0.001	0.	0.	0.001	0.002	0.002	0.002
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.4	0.367	0.47	0.23	0.007	0.083	0.239	0.3	0.438	0.464
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	12	0.115	0.119	0.18	0.06	0.002	0.043	0.063	0.08	0.16	0.18
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	331.5	326.417	350.	285.	405.538	20.138	286.2	322.	336.	349.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	12	16.	16.5	21.	12.	5.364	2.316	12.9	15.25	17.	20.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	331.	324.833	350.	285.	399.061	19.977	285.	322.	335.25	347.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	1.583	7.	0.	5.538	2.353	0.	0.	3.75	6.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.135	0.167	0.39	0.04	0.014	0.116	0.04	0.093	0.208	0.387
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	1.05	1.067	1.7	0.6	0.121	0.347	0.63	0.725	1.35	1.64

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.55	17.5	18.3	16.8	0.238	0.488	16.83	16.975	17.95	18.21
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	565.5	541.5	621.	422.	3258.091	57.08	436.7	502.5	578.75	610.8
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	11	2.2	2.155	2.6	1.	0.191	0.437	1.2	2.	2.4	2.6
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.4	7.558	8.1	7.1	0.121	0.348	7.16	7.325	7.975	8.1
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.4	7.456	8.1	7.1	0.132	0.364	7.16	7.325	7.975	8.1
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.04	0.035	0.079	0.008	0.	0.021	0.008	0.012	0.048	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	325.	322.833	336.	296.	97.788	9.889	302.6	320.	327.5	334.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	11	0.03	0.053	0.19	0.01	0.003	0.053	0.012	0.02	0.08	0.172
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/06/87-05/13/92	5	0.002	0.002	0.002	0.001	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.39	0.335	0.45	0.039	0.019	0.139	0.06	0.25	0.443	0.45
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/06/87-05/13/92	5	0.16	0.148	0.18	0.1	0.001	0.036	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	332.	322.333	351.	210.	1570.788	39.633	231.6	327.25	343.25	350.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	12	17.5	19.333	45.	12.	72.606	8.521	12.6	15.25	19.75	38.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	332.	322.083	351.	210.	1562.811	39.532	231.6	327.25	343.	350.7
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	0.25	2.	0.	0.386	0.622	0.	0.	0.	1.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.12	0.124	0.2	0.02	0.003	0.056	0.032	0.083	0.18	0.194
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	2.55	4.3	14.2	0.6	22.962	4.792	0.6	0.925	5.65	13.96

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	12	17.35	17.475	18.3	16.8	0.266	0.515	16.83	16.975	17.975	18.27
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	12	561.	553.75	591.	503.	895.114	29.918	503.9	527.5	577.25	589.2
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	12	2.2	2.242	2.6	1.9	0.032	0.178	1.96	2.125	2.375	2.54
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	12	7.4	7.467	8.2	7.1	0.073	0.271	7.16	7.325	7.5	8.05
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	12	7.4	7.409	8.2	7.1	0.077	0.277	7.16	7.325	7.5	8.05
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	12	0.04	0.039	0.079	0.006	0.	0.018	0.01	0.032	0.048	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	326.5	324.75	370.	300.	331.114	18.197	301.2	310.75	331.75	359.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.025	0.033	0.09	0.	0.001	0.028	0.	0.02	0.04	0.087
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	12	0.405	0.354	0.48	0.2	0.008	0.091	0.212	0.28	0.42	0.462
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	12	329.5	328.417	370.	286.	598.629	24.467	286.9	318.	345.	364.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	12	16.5	16.917	21.	14.	4.265	2.065	14.3	15.25	18.	20.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	329.5	327.	370.	283.	611.091	24.72	283.9	318.	345.	362.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	12	0.	1.417	6.	0.	6.629	2.575	0.	0.	3.75	6.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.13	0.162	0.37	0.06	0.01	0.1	0.06	0.085	0.225	0.352
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	12	1.	1.092	1.8	0.6	0.159	0.399	0.6	0.75	1.425	1.77

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	3	16.9	16.967	17.1	16.9	0.013	0.115	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	3	585.	587.	598.	578.	103.	10.149	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	3	2.4	2.367	2.5	2.2	0.023	0.153	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	3	7.5	7.467	7.5	7.4	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	3	7.5	7.464	7.5	7.4	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	3	0.032	0.034	0.04	0.032	0.	0.005	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	3	326.	327.667	332.	325.	14.333	3.786	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	3	0.03	0.03	0.04	0.02	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	3	0.31	0.34	0.4	0.31	0.003	0.052	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	3	321.	313.667	333.	287.	569.333	23.861	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	3	16.	15.667	16.	15.	0.333	0.577	**	**	**	**

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Annual Analysis for 1994 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	3	321.	313.667	333.	287.	569.333	23.861	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	3	0.	0.	0.	0.	0.	0.	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.11	0.12	0.17	0.08	0.002	0.046	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	3	0.8	0.8	0.9	0.7	0.01	0.1	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	36	17.2	17.233	18.7	15.7	0.297	0.545	16.77	16.9	17.5	18.02
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	36	570.	561.361	622.	368.	1995.666	44.673	511.4	538.75	586.5	602.4
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	36	2.4	2.328	2.8	2.	0.051	0.226	2.	2.1	2.475	2.6
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	36	7.4	7.408	7.8	6.9	0.019	0.138	7.3	7.325	7.5	7.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	36	7.4	7.385	7.8	6.9	0.02	0.14	7.3	7.325	7.5	7.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	36	0.04	0.041	0.126	0.016	0.	0.017	0.032	0.032	0.048	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	36	324.	324.	335.	310.	26.343	5.133	319.1	321.	326.75	330.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	36	0.02	0.024	0.08	0.	0.	0.013	0.01	0.02	0.03	0.04
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	36	0.42	0.394	0.49	0.039	0.007	0.086	0.281	0.38	0.445	0.48
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	36	331.5	321.417	358.	210.	887.107	29.784	284.1	325.	335.75	341.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	36	16.5	17.333	26.	12.	7.143	2.673	15.	16.	18.	21.3
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	36	331.5	321.417	358.	210.	887.107	29.784	284.1	325.	335.75	341.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	36	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	36	0.9	2.239	13.3	0.3	10.008	3.164	0.57	0.7	2.325	6.81

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	25	17.7	17.548	18.6	16.8	0.308	0.555	16.8	16.9	17.9	18.34
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	25	556.	548.84	621.	457.	1252.057	35.384	507.6	520.5	574.	586.2
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	24	2.2	2.133	2.8	1.3	0.107	0.327	1.6	2.025	2.2	2.65
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	25	7.3	7.38	8.1	7.2	0.028	0.168	7.3	7.3	7.4	7.48
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	25	7.3	7.358	8.1	7.2	0.029	0.17	7.3	7.3	7.4	7.48
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	25	0.05	0.044	0.063	0.008	0.	0.01	0.034	0.04	0.05	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	25	331.	334.4	404.	296.	393.667	19.841	322.	325.5	335.5	366.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	25	0.03	0.064	0.35	0.	0.006	0.078	0.006	0.02	0.09	0.184
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	25	0.3	0.297	0.49	0.002	0.012	0.111	0.158	0.225	0.38	0.448
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	25	329.	318.2	357.	239.	1053.333	32.455	244.2	316.5	336.	349.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	24	16.5	18.125	45.	10.	44.027	6.635	12.	15.	19.75	23.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	25	327.	314.28	357.	225.	1222.71	34.967	237.4	306.	334.5	342.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	25	0.	3.92	29.	0.	52.493	7.245	0.	0.	6.	16.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	25	1.1	1.36	4.	0.5	0.788	0.887	0.6	0.7	1.7	2.76

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0088

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/06/87-03/03/94	20	18.1	18.09	18.6	17.3	0.078	0.279	17.81	17.925	18.275	18.48
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/06/87-03/03/94	20	547.	548.	619.	422.	2084.	45.651	474.5	525.5	575.	603.6
00300	OXYGEN, DISSOLVED MG/L	07/06/87-03/03/94	19	2.1	2.005	2.9	1.	0.146	0.382	1.6	1.8	2.2	2.3
00403	PH, LAB, STANDARD UNITS SU	07/06/87-03/03/94	20	7.3	7.395	8.2	7.1	0.115	0.339	7.1	7.125	7.4	8.1
00403	CONVERTED PH, LAB, STANDARD UNITS	07/06/87-03/03/94	20	7.3	7.308	8.2	7.1	0.123	0.351	7.1	7.125	7.4	8.1
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/06/87-03/03/94	20	0.05	0.049	0.079	0.006	0.001	0.024	0.008	0.04	0.075	0.079
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	20	320.	319.25	328.	300.	44.197	6.648	305.1	319.	323.5	325.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/06/87-03/03/94	19	0.03	0.026	0.06	0.	0.	0.016	0.	0.01	0.04	0.05
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/06/87-03/03/94	20	0.44	0.4	0.48	0.16	0.008	0.089	0.244	0.353	0.458	0.479
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/06/87-03/03/94	20	340.5	342.15	370.	328.	101.608	10.08	328.6	335.25	350.	351.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/06/87-03/03/94	19	16.	15.895	19.	13.	2.433	1.56	14.	15.	17.	18.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	20	337.5	340.25	370.	324.	118.197	10.872	328.1	332.25	350.	351.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/06/87-03/03/94	20	0.	1.9	9.	0.	6.411	2.532	0.	0.	3.75	5.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/06/87-03/03/94	20	1.2	2.465	14.2	0.2	15.358	3.919	0.61	1.	1.5	12.37

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0089

NPS Station ID: CHIC0089 LAT/LON: 34.502615/ -96.938977 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUFFALO SPRING NEAR TRAVERTINE CREEK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_HARP_9
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1090 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT BUFFALO SPRING NEAR TRAVERTINE CREEK IN THE NE CORNER OF CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0089

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-12/12/76	3	15.	15.167	18.5	12.	10.583	3.253	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	10/16/76-12/12/76	4	5.95	5.6	7.2	3.3	3.18	1.783	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-12/12/76	3	0.6	0.533	0.7	0.3	0.043	0.208	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	10/30/76-10/30/76	1	83.	83.	83.	83.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	10/16/76-12/12/76	4	7.7	7.3	8.7	5.1	2.38	1.543	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	10/16/76-12/12/76	4	7.689	5.7	8.7	5.1	5.795	2.407	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/16/76-12/12/76	4	0.02	1.997	7.943	0.002	15.717	3.964	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	11/14/76-11/14/76	1	2.	2.	2.	2.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-11/14/76	1	1.12	1.12	1.12	1.12	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-11/14/76	1	0.42	0.42	0.42	0.42	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-11/14/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	1	0.028	0.028	0.028	0.028	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-10/30/76	1	3.	3.	3.	3.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/12/76	4	1750.	2875.	7200.	800.	8995833.333	2999.305	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	10/16/76-12/12/76	4	3.185	3.282	3.857	2.903	0.2	0.447	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			1916.062								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-12/12/76	4	45.	55.	130.	0.	3100.	55.678	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-12/12/76	4	1.628	1.342	2.114	0.	0.868	0.932	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			21.994								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-12/12/76	4	300.	260.	320.	120.	8800.	93.808	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-12/12/76	4	2.477	2.385	2.505	2.079	0.042	0.204	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			242.462								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0089

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-12/12/76	4	550.	550.	550.	550.	0.	0.	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-11/14/76	1	0.005	0.005	0.005	0.005	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0089

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	4	1	0.25	4	1	0.25									
00403	PH, LAB	Other-Hi Lim.	9.	4	0	0.00	4	0	0.00									
		Other-Lo Lim.	6.5	4	1	0.25	4	1	0.25									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	4	2	0.50	4	2	0.50									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	4	0	0.00	4	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0090

NPS Station ID: CHIC0090 LAT/LON: 34.502615/ -96.938977 Agency: 11NPSWRD Date Created: 09/20/97
Location: BUFFALO SPRING NEAR TRAVERTINE CREEK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_SCH_BUFFSP
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPO.) QUADRANGLE. THE SITE IS AT BUFFALO SPRING NEAR TRAVERTINE CREEK IN THE NE CORNER OF CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE FROM MAY 1975 THROUGH AUGUST 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0090

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-09/02/75	4	170.	135.75	200.	3.	8632.25	92.91	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	06/11/75-09/02/75	4	2.224	1.806	2.301	0.477	0.791	0.889	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			64.022								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/11/75-06/11/75	1	2.	2.	2.	2.	0.	0.	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	06/11/75-06/11/75	1	0.301	0.301	0.301	0.301	0.	0.	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			2.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0090

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	4	0	0.00				2	0	0.00	2	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0091

NPS Station ID: CHIC0091
LAT/LON: 34.502753/ -96.970143
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Pavilion Spring - Outlet A
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S3 /GOULD_5 /CNR-3 /1190
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is known as Pavilion Spring - Outlet A. This is Gould's No. 5. This is the main fountain in the present pavilion and is still a source of water for many local people. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. The spring is mineralized. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0091

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	26	20.	20.05	22.3	19.1	0.696	0.834	19.1	19.2	20.5	21.34
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	50	732.5	734.24	855.	662.	2040.88	45.176	672.6	691.	778.5	784.7
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	48	7.4	7.488	8.	7.1	0.053	0.23	7.29	7.3	7.6	7.81
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	48	7.4	7.434	8.	7.1	0.056	0.237	7.29	7.3	7.6	7.81
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	48	0.04	0.037	0.079	0.01	0.	0.017	0.016	0.025	0.05	0.051
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	302.	303.5	318.	287.	52.5	7.246	294.2	299.75	308.5	314.4
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	371.	371.	371.	371.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	8	0.165	0.176	0.33	0.02	0.01	0.101	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.001	0.006	0.025	0.	0.	0.011	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	13	0.1	0.095	0.12	0.08	0.	0.013	0.08	0.08	0.1	0.116
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.4	0.578	1.36	0.15	0.287	0.536	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	288.	288.278	306.	258.	150.918	12.285	268.8	282.75	300.	306.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	68.4	68.4	68.4	68.4	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	31.	31.	31.	31.	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	78.6	78.6	78.6	78.6	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	3.9	3.9	3.9	3.9	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	93.	93.	93.	93.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	18	18.	19.444	31.	12.	24.614	4.961	14.7	16.75	22.	31.
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	162.	162.	162.	162.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**

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Parameter Inventory for Station: CHIC0091

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	98.	98.	98.	98.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	8.5	8.5	8.5	8.5	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1	17.	17.	17.	17.	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1960.	1960.	1960.	1960.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	11.	11.	11.	11.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	104.	104.	104.	104.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	22.5	22.5	22.5	22.5	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	16.	16.	16.	16.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1 ##	6.5	6.5	6.5	6.5	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	286.5	285.889	306.	240.	235.046	15.331	267.	280.75	300.	302.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	0.	2.389	18.	0.	21.075	4.591	0.	0.	4.	9.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	13	0.19	0.231	0.61	0.025	0.03	0.173	0.039	0.09	0.35	0.55
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	31	0.7	0.935	2.	0.1	0.394	0.628	0.22	0.5	1.5	2.
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.	24.	24.	24.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1 ##	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0091

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
		Other-Lo Lim.	6.5	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	13	0	0.00	1	0	0.00	9	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	18	0	0.00	1	0	0.00	14	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00	1	0	0.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	1	1	1.00	1	1	1.00									
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0091

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0092

NPS Station ID: CHIC0092 LAT/LON: 34.502753/ -96.970199 Agency: 11NPSWRD Date Created: 09/20/97
Location: PAVILION SPRING JUST EAST OF HIGHWAY 177 FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_NPS_PAVSP
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT PAVILION SPRING APPROXIMATELY A 1/4 MILE SOUTH OF SULPHUR AND JUST EAST OF HWY 177. SAMPLING FOR THIS SITE WAS DONE FROM FEBRUARY 1967 THROUGH MAY 1967. THE OBJECTIVE OF THE STUDY WAS TO SEE IF THE WATER WAS OF ADEQUATE BACTERIOLOGICAL QUALITY TO MEET THE U.S. PUBLIC HEALTH SERVICE DRINKING WATER STANDARDS. THE STUDY WAS DONE BY THE U.S. DEPARTMENT OF THE INTERIOR - FEDERAL WATER POLLUTION CONTROL ADMINISTRATION. RESULTS ARE IN THE 1968 REPORT "A STUDY OF THE BACTERIOLOGICAL CONTAMINATION OF HILLSIDE SPRING AT PLATT NATIONAL PARK". FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0092

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	37 ##	0.5	0.5	0.5	0.5	0.	0.	0.5	0.5	0.5	0.5
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	02/14/67-05/22/67	37 ##	-0.301	-0.301	-0.301	-0.301	0.	0.	-0.301	-0.301	-0.301	-0.301
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			0.5								
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	37 ##	0.5	0.5	0.5	0.5	0.	0.	0.5	0.5	0.5	0.5
31613	LOG FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24	02/14/67-05/22/67	37 ##	-0.301	-0.301	-0.301	-0.301	0.	0.	-0.301	-0.301	-0.301	-0.301
31613	GM FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24H	GEOMETRIC MEAN =			0.5								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	0.5	0.5	0.5	0.5	0.	0.	0.5	0.5	0.5	0.5
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	-0.301	-0.301	-0.301	-0.301	0.	0.	-0.301	-0.301	-0.301	-0.301
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			0.5								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	23	9.	26.913	348.	1.	5021.628	70.863	1.4	4.	16.	38.8
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	23	0.954	0.957	2.542	0.	0.335	0.579	0.12	0.602	1.204	1.589
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			9.059								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	25	12.	36.54	260.	0.5	3525.332	59.375	1.	4.5	40.	126.2
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	25	1.079	1.101	2.415	-0.301	0.474	0.688	0.	0.651	1.591	2.101
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			12.63								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0092

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	37	0	0.00	10	0	0.00	27	0	0.00						
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	37	0	0.00	10	0	0.00	27	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0093

NPS Station ID: CHIC0093
LAT/LON: 34.502781/ -96.970282
Agency: 112WRD
Date Created: 11/14/92
Location: 01S-03E-03 AACD 1 PAVILION SPRING
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): 343012096581301
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.30
On/Off RF1:
RF3 Index: 11130303000705.53
RF3 Mile Point: 5.53
Distance from RF3: 0.09
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0093

Parameter	Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th

******** No Parameter Data at this Station Suitable for Statistical Analysis ********

Station Inventory for Station: CHIC0094

NPS Station ID: CHIC0094
LAT/LON: 34.502837/ -96.970254
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Pavilion Spring - Outlet B
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S4 /GOULD_6-11B /CNR-4E /1199
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Outlet B of Pavilion Spring. This is Gould's Nos. 6-11. Exact identification to the original 7 springs of the Pavilion Springs group is unknown. The spring is mineralized. Eastern most tile (right tile facing downstream) of adjacent pair set in a poured concrete base - 35' at 297 degrees magnetic from main fountain. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516).

Parameter Inventory for Station: CHIC0094

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	26	20.	19.988	21.1	18.4	0.44	0.664	19.21	19.4	20.5	21.
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	50	719.5	728.88	875.	659.	2097.985	45.804	678.2	691.5	765.75	779.7
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	48	7.4	7.45	8.	7.1	0.07	0.265	7.1	7.3	7.575	7.9
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	48	7.4	7.379	8.	7.1	0.075	0.274	7.1	7.3	7.575	7.9
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	48	0.04	0.042	0.079	0.01	0.001	0.023	0.013	0.027	0.05	0.079
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	326.	330.222	389.	304.	617.242	24.844	304.	310.5	336.25	378.2
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	368.	368.	368.	368.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	8	0.155	0.143	0.25	0.	0.006	0.077	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.002	0.007	0.025	0.002	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	13	0.1	0.096	0.12	0.07	0.	0.019	0.07	0.075	0.11	0.12
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.22	0.228	0.28	0.19	0.002	0.041	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	315.	316.	402.	274.	999.647	31.617	286.6	291.5	324.25	371.4
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	72.6	72.6	72.6	72.6	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	31.	31.	31.	31.	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	82.3	82.3	82.3	82.3	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	3.7	3.7	3.7	3.7	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	92.	92.	92.	92.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	18	18.5	19.289	28.	0.2	41.996	6.48	10.82	17.	24.25	28.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0094

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	166.	166.	166.	166.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.3	0.3	0.3	0.3	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	99.	99.	99.	99.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	45.8	45.8	45.8	45.8	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1940.	1940.	1940.	1940.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1 ##	4.5	4.5	4.5	4.5	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1 ##	28.5	28.5	28.5	28.5	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	12.	12.	12.	12.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1 ##	6.5	6.5	6.5	6.5	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	1980.	1980.	1980.	1980.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	315.	312.056	402.	264.	1034.761	32.168	273.	291.5	324.25	358.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	0.	3.944	29.	0.	82.173	9.065	0.	0.	0.5	24.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	13	0.34	0.393	0.9	0.025	0.075	0.275	0.047	0.205	0.605	0.86
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	30	0.6	0.697	1.5	0.1	0.193	0.44	0.1	0.375	1.	1.5
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	0.14	0.14	0.14	0.14	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0094

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
		Other-Lo Lim.	6.5	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	13	0	0.00	1	0	0.00	9	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	18	0	0.00	1	0	0.00	14	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00	1	0	0.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0094

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0095

NPS Station ID: CHIC0095
LAT/LON: 34.502837/ -96.970254
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Pavilion Spring - Outlet C
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S5 /GOULD_6-11C /CNR-5W /1200
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Outlet C of Pavilion Spring. This is Gould's Nos. 6-11. Exact identification to the original 7 springs of the Pavilion Springs group is unknown. The spring is mineralized. Western most tile (left tile facing downstream) of adjacent pair set in a poured concrete base - 35' at 297 degrees magnetic from main fountain. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516).

Parameter Inventory for Station: CHIC0095

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	26	20.	19.892	20.8	18.4	0.254	0.504	19.31	19.5	20.125	20.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	50	719.	718.12	879.	520.	4356.761	66.006	650.1	677.5	771.25	781.8
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	48	7.5	7.556	8.1	7.2	0.057	0.239	7.2	7.4	7.675	7.91
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	48	7.5	7.498	8.1	7.2	0.06	0.246	7.2	7.4	7.675	7.91
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	48	0.032	0.032	0.063	0.008	0.	0.016	0.012	0.021	0.04	0.063
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	330.	330.167	384.	302.	498.382	22.324	304.7	308.5	340.5	363.3
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	368.	368.	368.	368.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	8	0.15	0.135	0.25	0.	0.005	0.07	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.003	0.008	0.025	0.001	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	13	0.1	0.095	0.11	0.07	0.	0.013	0.074	0.085	0.105	0.11
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.44	0.403	0.64	0.09	0.053	0.23	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	325.5	322.111	386.	290.	750.81	27.401	290.	295.25	337.75	361.7
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	68.3	68.3	68.3	68.3	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	30.9	30.9	30.9	30.9	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	82.6	82.6	82.6	82.6	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	4.1	4.1	4.1	4.1	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	87.	87.	87.	87.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	18	18.	19.611	28.	12.	15.663	3.958	16.5	17.	22.	28.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0095

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	161.	161.	161.	161.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	133.	133.	133.	133.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	5.2	5.2	5.2	5.2	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1950.	1950.	1950.	1950.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1 ##	4.5	4.5	4.5	4.5	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1 ##	28.5	28.5	28.5	28.5	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	22.5	22.5	22.5	22.5	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	15.	15.	15.	15.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1 ##	6.5	6.5	6.5	6.5	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	314.	314.	314.	314.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	325.5	310.111	386.	207.	1801.046	42.439	238.5	287.75	337.75	350.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	1.5	12.	112.	0.	767.765	27.709	0.	0.	13.25	56.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	13	0.27	0.265	0.74	0.025	0.03	0.173	0.055	0.145	0.32	0.588
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	28	0.25	0.313	1.5	0.06	0.083	0.289	0.1	0.1	0.475	0.6
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.	24.	24.	24.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1 ##	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0095

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
		Other-Lo Lim.	6.5	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	13	0	0.00	1	0	0.00	9	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	18	0	0.00	1	0	0.00	14	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0095

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0096

NPS Station ID: CHIC0096
LAT/LON: 34.502865/ -96.970282
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Pavilion Spring - Outlet D
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S6 /GOULD_6-11D /CNR-6 /1191
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Outlet D of Pavilion Spring. This is Gould's Nos. 6-11. Exact identification to the original 7 springs of the Pavilion Springs group is unknown. The spring is mineralized. Sampled at the small outlet located in rock work at base of the southeast abutment (7. feet from the corner) of the highway tunnel - 46' at 299 degrees magnetic from the main fountain. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; NPS WRD; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516).

Parameter Inventory for Station: CHIC0096

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	26	20.	19.988	21.9	18.9	0.752	0.867	19.04	19.1	20.125	21.73
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	50	737.	746.88	1410.	595.	11679.536	108.072	679.1	694.	777.	791.8
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	48	7.4	7.435	7.9	7.2	0.042	0.206	7.2	7.3	7.6	7.8
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	48	7.4	7.393	7.9	7.2	0.044	0.21	7.2	7.3	7.6	7.8
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	48	0.04	0.04	0.063	0.013	0.	0.016	0.016	0.025	0.05	0.063
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	327.	328.056	373.	304.	211.35	14.538	306.7	321.5	333.5	342.4
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	369.	369.	369.	369.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	8	0.16	0.15	0.22	0.	0.004	0.065	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.003	0.007	0.025	0.001	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	13	0.09	0.088	0.12	0.05	0.	0.019	0.058	0.08	0.1	0.12
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.275	0.278	0.45	0.11	0.02	0.142	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	18	309.5	313.	339.	284.	251.647	15.863	290.3	304.	327.5	337.2
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	69.	69.	69.	69.	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	31.4	31.4	31.4	31.4	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	73.6	73.6	73.6	73.6	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	3.7	3.7	3.7	3.7	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	92.	92.	92.	92.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	18	18.	18.944	26.	12.	16.173	4.022	13.8	15.75	22.25	25.1

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0096

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	158.	158.	158.	158.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.3	0.3	0.3	0.3	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	50.	50.	50.	50.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	5.2	5.2	5.2	5.2	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1930.	1930.	1930.	1930.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1 ##	4.5	4.5	4.5	4.5	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1 ##	28.5	28.5	28.5	28.5	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	11.	11.	11.	11.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	28.	28.	28.	28.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	1810.	1810.	1810.	1810.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	309.	303.778	339.	224.	856.418	29.265	261.8	288.25	327.5	337.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	18	0.	9.222	74.	0.	409.477	20.236	0.	0.	5.5	43.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	13	0.14	0.271	0.93	0.025	0.066	0.258	0.043	0.095	0.395	0.794
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	31	0.6	0.748	2.	0.1	0.16	0.4	0.3	0.5	1.	1.42
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.	24.	24.	24.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1 ##	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0096

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
		Other-Lo Lim.	6.5	48	0	0.00	1	0	0.00	34	0	0.00	13	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	13	0	0.00	1	0	0.00	9	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	18	0	0.00	1	0	0.00	14	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0096

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	1	1.00	1	1	1.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0097

NPS Station ID: CHIC0097
LAT/LON: 34.502892/ -96.970282
Agency: 11NPSWRD
Date Created: 05/31/97
Location: Pavilion Spring - Outlet E
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S7 /GOULD_6-11E /CNR-7 /1192
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Outlet E of Pavilion Spring. This is Gould's Nos. 6-11. Exact identification to the original 7 springs of the Pavilion Springs group is unknown. The spring is mineralized. Sampled at the small outlet under the walkway - 3 feet inside the highway tunnel. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0097

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/08/89-06/19/92	22	20.	20.555	29.9	19.1	4.87	2.207	19.23	19.775	20.475	21.92
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/08/89-10/21/93	46	739.5	744.261	1390.	595.	12920.775	113.67	639.	695.	780.5	790.
00403	PH, LAB, STANDARD UNITS SU	06/08/89-10/21/93	44	7.4	7.452	8.2	7.2	0.054	0.232	7.25	7.3	7.6	7.75
00403	CONVERTED PH, LAB, STANDARD UNITS	06/08/89-10/21/93	44	7.4	7.405	8.2	7.2	0.056	0.237	7.25	7.3	7.6	7.75
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/08/89-10/21/93	44	0.04	0.039	0.063	0.006	0.	0.015	0.018	0.025	0.05	0.057
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	14	308.	311.714	334.	302.	90.066	9.49	303.	305.75	313.5	332.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	8	0.165	0.168	0.29	0.01	0.008	0.09	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.002	0.007	0.025	0.001	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/08/89-10/21/93	13	0.1	0.098	0.12	0.08	0.	0.013	0.08	0.085	0.11	0.116
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.255	0.245	0.29	0.18	0.002	0.047	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/08/89-07/07/92	14	297.	296.643	310.	283.	69.324	8.326	284.	290.75	301.5	310.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	110.	110.	110.	110.	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	44.7	44.7	44.7	44.7	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	305.	305.	305.	305.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	9.4	9.4	9.4	9.4	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	91.	91.	91.	91.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/08/89-10/21/93	14	16.5	16.286	23.	0.	34.527	5.876	6.	13.75	20.5	22.5
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1	31.	31.	31.	31.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0097

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	141.	141.	141.	141.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.45	0.45	0.45	0.45	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	385.	385.	385.	385.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	84.6	84.6	84.6	84.6	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1	17.	17.	17.	17.	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	5.	5.	5.	5.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	12.	12.	12.	12.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1	8.3	8.3	8.3	8.3	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	6260.	6260.	6260.	6260.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	15.	15.	15.	15.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1	29.	29.	29.	29.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	2710.	2710.	2710.	2710.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	23.	23.	23.	23.	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	54.	54.	54.	54.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	15.	15.	15.	15.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1	38.	38.	38.	38.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	1340.	1340.	1340.	1340.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	14	296.	286.857	310.	208.	713.363	26.709	235.	277.25	301.5	310.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/08/89-07/07/92	14	0.	9.786	79.	0.	474.335	21.779	0.	0.	9.	53.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/08/89-10/21/93	13	0.1	0.175	0.6	0.025	0.025	0.159	0.031	0.055	0.26	0.48
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/08/89-10/21/93	31	1.	1.042	2.	0.4	0.187	0.432	0.52	0.7	1.2	1.9
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	2.17	2.17	2.17	2.17	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0097

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403	PH, LAB	Other-Hi Lim.	9.	44	0	0.00	1	0	0.00	30	0	0.00	13	0	0.00			
		Other-Lo Lim.	6.5	44	0	0.00	1	0	0.00	30	0	0.00	13	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	13	0	0.00	1	0	0.00	9	0	0.00	3	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	14	0	0.00	1	0	0.00	10	0	0.00	3	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	1	1.00	1	1	1.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	1	1	1.00	1	1	1.00									
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0097

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01077	SILVER, TOTAL	Fresh Acute	4.1	1	1	1.00	1	1	1.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	1	1	1.00	1	1	1.00									
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0098

NPS Station ID: CHIC0098 | LAT/LON: 34.502948/ -96.955366 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: TRAVERTINE CREEK AT BEAR FALLS | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM | STORET Station ID(s): CHIC_SCH_T2_5
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 1040 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT BEAR FALLS APPROXIMATELY 1 MILE DUE SOUTH OF TULL CREST LAKE. SAMPLING FOR THIS SITE WAS DONE FROM MAY 1975 THROUGH SEPTEMBER 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM AND FECAL COLIFORM. THE RESULTS OF THIS STUDY WERE PUBLISHED IN THE MARCH 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0098

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	07/22/75-07/22/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	07/22/75-07/22/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-09/21/75	4	750.	2425.	8000.	200.	13895833.333	3727.712	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/28/75-09/21/75	4	2.866	2.984	3.903	2.301	0.451	0.672	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			964.114								
31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	1	2500.	2500.	2500.	2500.	0.	0.	**	**	**	**
31614	LOG FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	1	3.398	3.398	3.398	3.398	0.	0.	**	**	**	**
31614	GM FECAL COLIFORM,MPN,TUBE CONFIGURATION	GEOMETRIC MEAN =			2500.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0098

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00							1	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	4	1	0.25	1	0	0.00	1	0	0.00	2	1	0.50			
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0099

NPS Station ID: CHIC0099 LAT/LON: 34.503031/ -96.955504 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CK 250 FEET NE OF COLD SPRING CAMP FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_5
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1040 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 250 FEET NORTHEAST OF COLD SPRING CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0099

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	4.	4.	4.	4.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	100.	100.	100.	100.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	2.	2.	2.	2.	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			100.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0099

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0100

NPS Station ID: CHIC0100 LAT/LON: 34.503365/ -96.948420 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK SOUTH SIDE OF THE NATURE CENTER FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY A 1/4 MILE NORTHEAST OF COLD SPRING CAMPGROUND ON THE SOUTH SIDE OF THE NATURE CENTER. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0100

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	45.	45.	45.	45.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	600.	600.	600.	600.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	2.778	2.778	2.778	2.778	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			600.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0100

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0101

NPS Station ID: CHIC0101 LAT/LON: 34.503587/ -96.971531 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK 50 FT SOUTH OF LOW WATER BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_14
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 930 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY 200 FEET SOUTH OF THE CONFLUENCE WITH TRAVERTINE CREEK AND 50 FEET SOUTH OF THE LOW WATER BRIDGE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0101

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	8.	8.	8.	8.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	2000.	2000.	2000.	2000.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	3.301	3.301	3.301	3.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			2000.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0101

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0102

NPS Station ID: CHIC0102 LAT/LON: 34.503615/ -96.955421 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CK .25 MILES NE OF COLD SPRING CAMP FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_4
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1040 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY A 1/4 MILE NORTHEAST OF COLD SPRING CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0102

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0102

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0103

NPS Station ID: CHIC0103
LAT/LON: 34.503615/ -96.971671
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Rock Creek near Lincoln Bridge
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_ROCK3
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 925
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/3. Station is known as Rock Creek Site 3 and is located on Rock Creek at the end of a rock outcrop extending from the left bank of the west side of the low water bridge near Lincoln Bridge. This station is below the confluence with Travertine Creek and sufficiently below the three culvert sections of the low water bridge to allow an adequate mix of Travertine Creek with Rock Creek water. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	81	15.5	15.294	24.6	3.7	30.765	5.547	8.5	10.	20.25	22.16
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	81	688.	724.58	1180.	339.	20462.747	143.048	586.6	627.5	824.5	915.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	80	7.9	8.185	12.4	3.3	1.847	1.359	6.91	7.3	9.075	9.99
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	81	8.2	8.154	8.6	6.9	0.074	0.272	7.66	8.1	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	81	8.2	8.02	8.6	6.9	0.092	0.303	7.66	8.1	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	81	0.006	0.01	0.126	0.003	0.	0.015	0.005	0.005	0.008	0.023
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	81	280.	276.148	306.	213.	342.453	18.505	258.	264.5	289.	297.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	80	0.1	0.094	0.21	0.02	0.002	0.042	0.05	0.06	0.118	0.16
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	59	0.002	0.002	0.007	0.001	0.	0.001	0.001	0.002	0.003	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	81	0.15	0.15	0.25	0.08	0.001	0.035	0.11	0.12	0.17	0.198
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	58	0.1	0.146	0.82	0.	0.022	0.15	0.05	0.08	0.14	0.396
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	80	293.5	293.313	337.	204.	743.433	27.266	262.3	276.	314.	325.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	79	20.	20.114	42.	11.	21.	4.583	15.	17.	22.	25.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	288.	278.913	337.	191.	1527.423	39.082	205.7	250.5	309.75	324.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	5.	14.4	97.	0.	545.686	23.36	0.	0.	18.	42.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	63	0.1	0.166	0.86	0.03	0.031	0.175	0.05	0.07	0.17	0.424
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	81	4.4	4.896	14.2	1.5	5.164	2.272	2.58	3.3	5.9	7.28

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0103

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	1	0.01	37	0	0.00	25	0	0.00	18	1	0.06			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	27	0	0.00	19	0	0.00	13	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	37	0	0.00	24	0	0.00	18	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	16.75	16.317	22.4	10.	29.266	5.41	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	883.5	856.667	1080.	660.	24421.467	156.274	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	8.1	8.05	10.	6.	1.891	1.375	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	7.85	7.783	8.3	6.9	0.33	0.574	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	6	7.722	7.465	8.3	6.9	0.451	0.672	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	6	0.019	0.034	0.126	0.005	0.002	0.047	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	282.5	273.167	300.	236.	624.567	24.991	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.095	0.103	0.19	0.05	0.003	0.059	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	6	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.16	0.167	0.21	0.13	0.001	0.029	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	6	0.15	0.25	0.82	0.1	0.079	0.281	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	319.	301.333	330.	250.	1274.267	35.697	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	21.5	25.333	42.	14.	116.667	10.801	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	316.5	299.667	328.	250.	1180.267	34.355	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	0.	1.667	5.	0.	6.667	2.582	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	4.15	4.55	8.6	1.5	8.115	2.849	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.35	15.425	22.	3.7	34.102	5.84	4.84	10.375	20.6	21.76
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	759.	786.667	1010.	492.	26822.606	163.776	541.8	662.	950.5	1007.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	8.25	8.45	12.4	7.	2.908	1.705	7.03	7.225	8.55	12.07
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.3	8.275	8.4	8.1	0.009	0.097	8.13	8.2	8.375	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.3	8.265	8.4	8.1	0.009	0.097	8.13	8.2	8.375	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.005	0.005	0.008	0.004	0.	0.001	0.004	0.004	0.006	0.007
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	286.	280.667	297.	220.	421.515	20.531	235.3	278.5	293.	296.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.095	0.104	0.21	0.05	0.002	0.044	0.053	0.073	0.128	0.189
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.004	0.001	0.	0.001	0.001	0.001	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.15	0.148	0.2	0.1	0.001	0.035	0.103	0.113	0.185	0.197
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.06	0.069	0.16	0.	0.002	0.041	0.006	0.05	0.098	0.142
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	297.5	297.333	333.	236.	654.424	25.582	248.	288.	313.75	330.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	19.	19.583	24.	15.	8.265	2.875	15.3	18.	22.25	24.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	295.5	277.833	333.	200.	2303.424	47.994	200.9	227.75	313.75	330.3
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	0.	19.5	88.	0.	1173.727	34.26	0.	0.	36.75	87.7
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	3.75	5.125	12.5	2.3	12.044	3.47	2.33	2.925	6.575	12.2

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	17.3	15.667	22.2	8.9	33.613	5.798	8.93	9.3	21.325	22.05
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	654.5	722.25	1180.	572.	30222.75	173.847	574.7	605.25	804.	1087.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.35	7.733	10.1	6.3	1.459	1.208	6.36	6.95	8.575	9.98
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.2	8.092	8.3	7.6	0.048	0.219	7.69	7.9	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.2	8.033	8.3	7.6	0.052	0.228	7.69	7.9	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.013	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	271.5	275.917	306.	257.	272.447	16.506	257.3	262.25	288.25	304.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.08	0.086	0.16	0.05	0.001	0.035	0.05	0.053	0.11	0.148
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.003	0.007	0.002	0.	0.002	0.002	0.002	0.004	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.145	0.146	0.23	0.08	0.001	0.038	0.089	0.12	0.16	0.215
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.11	0.171	0.61	0.03	0.03	0.174	0.045	0.08	0.14	0.562

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	294.5	296.917	337.	242.	695.356	26.37	250.4	282.5	320.75	332.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	20.	20.833	26.	15.	13.061	3.614	15.3	18.25	24.75	25.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	294.5	283.833	337.	191.	1725.606	41.54	200.9	269.25	315.75	331.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	1.5	13.083	97.	0.	750.629	27.398	0.	0.	17.	73.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.095	0.221	0.86	0.05	0.06	0.246	0.053	0.063	0.368	0.74
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.15	4.542	6.9	2.3	2.395	1.548	2.54	3.5	6.325	6.87

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	13.35	15.183	24.6	8.4	32.503	5.701	8.82	10.125	20.4	23.88
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	633.5	685.833	913.	568.	13629.97	116.747	573.1	597.25	797.25	895.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.85	8.042	10.	6.4	1.028	1.014	6.61	7.4	8.65	9.85
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.2	8.133	8.3	7.6	0.05	0.223	7.69	7.95	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.2	8.07	8.3	7.6	0.054	0.233	7.69	7.95	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.011	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	282.5	281.667	298.	258.	147.515	12.146	261.	271.5	293.	297.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.095	0.082	0.12	0.02	0.001	0.034	0.026	0.045	0.11	0.117
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.006	0.001	0.	0.001	0.001	0.002	0.002	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.14	0.134	0.2	0.08	0.001	0.038	0.083	0.095	0.16	0.194
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.1	0.137	0.45	0.04	0.012	0.112	0.043	0.08	0.148	0.387
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	11	296.	295.	324.	227.	741.	27.221	235.6	293.	311.	323.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	10	20.	20.1	26.	15.	9.656	3.107	15.1	18.25	22.	25.6
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	288.	281.818	324.	198.	1082.164	32.896	212.4	272.	296.	322.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	6.	13.182	37.	0.	195.164	13.97	0.	0.	26.	35.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.095	0.116	0.3	0.04	0.005	0.068	0.049	0.07	0.138	0.261
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.2	5.358	14.2	2.5	9.463	3.076	2.77	3.675	6.275	12.04

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.7	15.5	22.2	6.4	29.389	5.421	7.06	10.575	20.025	21.96
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	701.5	723.917	913.	601.	11840.447	108.814	603.4	621.25	829.25	893.8
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.7	8.183	10.3	6.7	1.445	1.202	6.82	7.225	9.3	10.18
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.2	8.133	8.3	7.6	0.044	0.21	7.69	8.025	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.2	8.075	8.3	7.6	0.048	0.219	7.69	8.025	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.008	0.025	0.005	0.	0.006	0.005	0.005	0.009	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	279.	276.917	296.	257.	179.72	13.406	257.3	263.	288.5	295.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.085	0.086	0.16	0.02	0.001	0.037	0.029	0.063	0.11	0.145
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.003	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.155	0.153	0.19	0.1	0.001	0.026	0.106	0.14	0.178	0.187
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	11	0.09	0.144	0.45	0.05	0.019	0.139	0.052	0.06	0.11	0.438
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	287.	292.917	326.	265.	480.265	21.915	265.6	270.75	313.75	324.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	19.5	20.167	26.	15.	15.97	3.996	15.	16.5	23.75	26.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	274.	274.167	326.	195.	1605.061	40.063	207.3	242.75	309.	323.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	7.	18.75	93.	0.	736.932	27.146	0.	0.75	28.25	78.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.1	0.217	0.86	0.03	0.062	0.249	0.036	0.06	0.368	0.74
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.05	4.442	8.1	2.1	3.141	1.772	2.34	3.	5.2	7.77

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	15.5	15.333	24.	6.2	37.464	6.121	6.89	9.225	20.85	23.49
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	645.	646.333	848.	339.	23841.333	154.406	364.8	571.	782.	844.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	11	8.6	8.145	10.4	3.3	3.877	1.969	4.02	7.2	9.6	10.24
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.3	8.25	8.6	7.6	0.066	0.258	7.75	8.125	8.45	8.57
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.3	8.163	8.6	7.6	0.075	0.273	7.75	8.125	8.45	8.57
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.005	0.007	0.025	0.003	0.	0.006	0.003	0.004	0.008	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	264.	263.	300.	213.	677.636	26.031	213.3	259.	279.75	295.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	11	0.11	0.109	0.19	0.04	0.002	0.048	0.042	0.05	0.15	0.184
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	5	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.145	0.157	0.25	0.11	0.002	0.043	0.113	0.123	0.183	0.241
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	5	0.13	0.17	0.38	0.09	0.014	0.119	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	281.	276.5	326.	204.	1259.909	35.495	211.8	252.5	304.75	323.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	18.5	18.167	26.	11.	17.242	4.152	11.9	14.5	20.75	25.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	273.5	267.	326.	202.	1586.	39.825	202.6	233.5	299.5	320.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	3.	9.5	42.	0.	183.364	13.541	0.	0.	15.5	37.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.105	0.158	0.48	0.05	0.016	0.128	0.053	0.08	0.225	0.429
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	5.15	5.308	9.	3.1	3.117	1.766	3.13	3.7	6.675	8.43

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.55	15.625	22.8	6.5	31.171	5.583	7.1	10.55	20.275	22.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	704.5	721.833	853.	614.	7051.242	83.972	616.1	646.	813.5	843.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	8.	8.333	10.8	7.1	1.279	1.131	7.16	7.325	9.25	10.35
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.25	8.2	8.6	7.6	0.056	0.237	7.72	8.125	8.3	8.51
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.247	8.127	8.6	7.6	0.062	0.249	7.72	8.125	8.3	8.51
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.006	0.007	0.025	0.003	0.	0.006	0.003	0.005	0.008	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	279.5	279.75	303.	261.	186.932	13.672	261.9	267.5	288.	302.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.09	0.095	0.17	0.03	0.002	0.041	0.036	0.07	0.118	0.167
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.145	0.153	0.24	0.1	0.001	0.038	0.103	0.133	0.168	0.228
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	293.	297.25	331.	266.	489.114	22.116	267.2	276.5	316.	330.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	18.	18.667	25.	15.	9.152	3.025	15.3	16.	20.75	24.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	285.5	278.833	331.	197.	1500.515	38.736	209.9	247.5	308.75	325.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	8.	18.417	90.	0.	670.992	25.904	0.	1.25	26.75	75.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.09	0.144	0.44	0.03	0.018	0.134	0.039	0.073	0.163	0.428
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.8	4.725	7.3	3.1	1.413	1.189	3.13	3.6	5.15	6.88

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	3	8.7	9.367	12.7	6.7	9.333	3.055	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	3	641.	703.	828.	640.	11719.	108.254	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	3	9.2	9.333	9.9	8.9	0.263	0.513	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	3	8.3	8.267	8.3	8.2	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	3	8.3	8.264	8.3	8.2	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	3	0.005	0.005	0.006	0.005	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	271.	278.	298.	265.	309.	17.578	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.06	0.093	0.17	0.05	0.004	0.067	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.16	0.163	0.18	0.15	0.	0.015	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	301.	293.667	314.	266.	616.333	24.826	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	3	23.	22.333	24.	20.	4.333	2.082	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	293.	278.333	308.	234.	1530.333	39.119	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	8.	15.333	32.	6.	209.333	14.468	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	3	0.07	0.067	0.08	0.05	0.	0.015	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	3	4.	5.1	8.2	3.1	7.41	2.722	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	37	10.2	10.981	21.	3.7	13.819	3.717	6.48	8.55	14.65	15.7
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	37	751.	760.838	1180.	492.	22770.64	150.899	607.2	631.5	853.	969.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	37	8.8	8.951	12.4	6.5	1.635	1.279	7.3	7.95	9.9	10.48
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	37	8.3	8.224	8.4	6.9	0.055	0.234	8.18	8.2	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	37	8.3	8.055	8.4	6.9	0.084	0.29	8.18	8.2	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	37	0.005	0.009	0.126	0.004	0.	0.02	0.005	0.005	0.006	0.007
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	284.	278.919	306.	220.	380.465	19.506	256.2	264.5	294.	300.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.11	0.099	0.21	0.02	0.002	0.047	0.048	0.05	0.125	0.162
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.14	0.135	0.16	0.09	0.	0.019	0.11	0.12	0.15	0.16
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	301.	299.541	337.	236.	611.089	24.72	264.4	286.	321.5	328.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	37	21.	20.622	26.	14.	12.131	3.483	15.	18.5	23.5	25.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	293.	293.324	337.	221.	775.947	27.856	251.6	277.5	317.5	328.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	6.	6.216	26.	0.	56.508	7.517	0.	0.	11.	18.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	37	4.4	5.211	14.2	1.5	7.264	2.695	2.8	3.5	6.5	8.68

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	25	18.7	17.444	24.6	8.9	17.483	4.181	10.02	14.35	20.1	21.94
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	25	636.	638.76	740.	552.	2250.44	47.439	577.4	605.5	673.	715.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	25	7.8	7.892	9.7	6.3	0.85	0.922	6.7	7.2	8.55	9.3
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	25	8.2	8.196	8.5	7.9	0.022	0.149	7.9	8.1	8.3	8.34
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	25	8.2	8.17	8.5	7.9	0.023	0.151	7.9	8.1	8.3	8.34
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	25	0.006	0.007	0.013	0.003	0.	0.003	0.005	0.005	0.008	0.013
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	273.	273.08	298.	214.	256.577	16.018	260.4	266.	282.5	292.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.07	0.084	0.19	0.02	0.001	0.038	0.04	0.06	0.11	0.136
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.15	0.148	0.23	0.08	0.002	0.043	0.086	0.11	0.18	0.208
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	288.	280.56	314.	227.	542.673	23.295	237.2	268.5	293.	309.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	24	19.	18.625	20.	14.	2.94	1.715	15.5	18.	20.	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	242.	245.8	314.	191.	1547.75	39.341	196.2	202.5	278.	305.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	30.	34.76	97.	0.	1065.19	32.637	0.	0.	44.	91.2
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	25	3.6	3.968	6.8	2.3	1.12	1.058	2.96	3.1	5.	5.38

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0103

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	19	21.5	20.863	24.	9.8	8.391	2.897	19.8	20.2	22.2	22.8
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	19	792.	766.895	1080.	339.	27582.099	166.079	425.	708.	844.	913.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	18	7.2	7.017	8.1	3.3	1.072	1.035	5.73	6.975	7.45	7.92
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	19	7.9	7.963	8.6	7.5	0.138	0.371	7.5	7.6	8.2	8.6
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	19	7.9	7.834	8.6	7.5	0.156	0.395	7.5	7.6	8.2	8.6
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	19	0.013	0.015	0.032	0.003	0.	0.01	0.003	0.006	0.025	0.032
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	19	282.	274.789	297.	213.	388.175	19.702	257.	261.	285.	295.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	18	0.1	0.098	0.17	0.05	0.001	0.032	0.059	0.068	0.11	0.152
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	19	0.18	0.183	0.25	0.15	0.001	0.029	0.15	0.16	0.2	0.24
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	18	312.	298.222	330.	204.	1045.477	32.334	262.5	271.5	321.25	328.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	18	18.	21.056	42.	11.	62.056	7.878	13.7	16.	26.	35.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	309.5	295.278	325.	204.	921.742	30.36	262.5	271.5	318.	318.7
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	1.5	2.944	17.	0.	18.056	4.249	0.	0.	5.	8.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	19	5.2	5.505	11.5	2.3	5.137	2.267	2.4	4.	7.	7.2

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0104

NPS Station ID: CHIC0104 | LAT/LON: 34.503727/ -96.971531 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: ROCK CREEK AT SANDY BEACH | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM | STORET Station ID(s): CHIC_SCH_T2_1
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 930 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK AT SANDY BEACH APPROXIMATELY 100 FEET SOUTH OF THE TRAVERTINE CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE FROM MAY 1975 THROUGH AUGUST 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0104

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-08/05/75	3	200.	666.667	1600.	200.	653333.333	808.29	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	06/11/75-08/05/75	3	2.301	2.602	3.204	2.301	0.272	0.521	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			400.								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-05/13/75	2	250.	250.	300.	200.	5000.	70.711	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-05/13/75	2	2.389	2.389	2.477	2.301	0.016	0.125	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			244.949								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0104

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	1	0.33				1	1	1.00	2	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	2	0	0.00				2	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0105

NPS Station ID: CHIC0105 LAT/LON: 34.503865/ -96.970615 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK 100 FT WEST OF LINCOLN BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_8
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 100 FEET WEST OF LINCOLN BRIDGE AND 150 FEET UPSTREAM FROM THE ROCK CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0105

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	2600.	2333.333	3200.	1200.	1053333.333	1026.32	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	3.415	3.333	3.505	3.079	0.05	0.224	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			2153.285								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	400.	633.333	1500.	0.	603333.333	776.745	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	2.602	1.926	3.176	0.	2.865	1.693	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			84.343								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0105

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	3	1.00	3	3	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0106

NPS Station ID: CHIC0106 LAT/LON: 34.503893/ -96.970254 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK UPSTREAM OF INVERTED SIPHON FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_7
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK DOWNSTREAM FROM BRIDGE AND UPSTREAM FROM INVERTED SIPHON AND APPROXIMATELY 200 FEET UPSTREAM FROM ROCK CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0106

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	11.	11.	11.	11.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	380000.	380000.	380000.	380000.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	5.58	5.58	5.58	5.58	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			380000.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	2600.	2600.	2600.	2600.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	3.415	3.415	3.415	3.415	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			2600.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0106

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0107

NPS Station ID: CHIC0107
LAT/LON: 34.503893/ -96.970559
Agency: 112WRD
Date Created: 11/14/92
Location: 01S-03E-03 AACA 1 INV. SIPHON LINCOLN BRID
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343014096581401
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 1.60
On/Off RF1:
RF3 Index: 11130303000701.97
RF3 Mile Point: 4.53
Distance from RF3: 0.10
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0107

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	2	24.	24.	26.	22.	8.	2.828	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	1	9.6	9.6	9.6	9.6	0.	0.	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	1	21.6	21.6	21.6	21.6	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/23/76-06/23/76	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	1	342.	342.	342.	342.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	1	61.	61.	61.	61.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	1	700.	700.	700.	700.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0107

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00400	PH	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
		Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0108

NPS Station ID: CHIC0108
LAT/LON: 34.503948/ -96.955476
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Travertine Creek at Sycamore Crossing
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_TRAV3
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 992
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/2. Station is known as Travertine Creek Site 3 and is located on Traverine Creek at Sycamore Crossing at the upstream side of the bridge. The station is located immediately above heavy swimming use areas across from Cold Springs Campground. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	81	16.1	15.525	25.2	9.	12.075	3.475	10.92	12.35	18.6	19.2
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	81	541.	536.16	652.	295.	3005.836	54.826	485.6	515.	578.5	586.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	80	8.5	8.612	10.7	3.4	0.806	0.898	7.9	8.1	9.1	9.7
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	81	8.2	8.174	8.8	7.	0.084	0.29	7.64	8.1	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	81	8.2	8.034	8.8	7.	0.104	0.323	7.64	8.1	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	81	0.006	0.009	0.1	0.002	0.	0.013	0.004	0.005	0.008	0.023
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	81	314.	313.679	383.	170.	423.146	20.571	303.2	309.	318.5	327.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	80	0.03	0.038	0.2	0.	0.001	0.031	0.01	0.02	0.04	0.07
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	59	0.002	0.002	0.007	0.001	0.	0.001	0.001	0.002	0.002	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	81	0.22	0.227	0.36	0.001	0.004	0.063	0.14	0.185	0.27	0.31
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	59	0.11	0.121	0.34	0.	0.004	0.062	0.06	0.08	0.15	0.19
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	81	325.	319.58	410.	176.	734.447	27.101	295.2	317.5	330.	336.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	79	18.	17.342	22.	9.	5.587	2.364	14.	17.	19.	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	81	321.	308.531	362.	176.	1077.902	32.831	262.2	298.	328.	332.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	81	0.	11.049	95.	0.	408.348	20.208	0.	0.	13.	41.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	63	0.11	0.151	0.75	0.	0.015	0.124	0.05	0.08	0.18	0.344
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	81	2.5	3.348	28.	0.5	12.246	3.499	1.2	1.6	3.9	6.08

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0108

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	1	0.01	36	0	0.00	25	0	0.00	19	1	0.05			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	26	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	36	0	0.00	24	0	0.00	19	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	16.35	16.333	19.6	12.6	8.711	2.951	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	580.5	584.	602.	579.	78.8	8.877	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	8.45	8.5	9.4	7.6	0.376	0.613	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	7.9	7.783	8.3	7.	0.346	0.588	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	6	7.737	7.484	8.3	7.	0.453	0.673	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	6	0.018	0.033	0.1	0.005	0.001	0.038	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	316.5	316.167	320.	310.	11.367	3.371	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.03	0.032	0.05	0.02	0.	0.012	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	6	0.001	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.265	0.266	0.31	0.22	0.002	0.039	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	6	0.135	0.148	0.27	0.07	0.005	0.074	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	330.5	331.	339.	327.	18.	4.243	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	18.	18.167	20.	16.	1.767	1.329	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	330.5	330.167	339.	323.	28.167	5.307	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	0.	0.833	5.	0.	4.167	2.041	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	1.4	1.383	2.	0.7	0.238	0.488	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	15.1	15.142	19.5	9.	12.368	3.517	9.57	12.45	18.925	19.35
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	534.5	531.583	589.	455.	1491.356	38.618	464.	509.	560.	587.8
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.8	8.825	10.7	7.9	0.798	0.894	7.93	8.	9.525	10.46
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.308	8.4	8.2	0.006	0.079	8.2	8.225	8.4	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.302	8.4	8.2	0.006	0.08	8.2	8.225	8.4	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.005	0.006	0.004	0.	0.001	0.004	0.004	0.006	0.006
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	312.	317.417	383.	301.	484.083	22.002	301.6	304.75	321.5	365.3
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.04	0.035	0.06	0.	0.	0.016	0.006	0.023	0.04	0.057
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.003	0.005	0.001	0.	0.001	0.001	0.002	0.003	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.275	0.256	0.36	0.13	0.005	0.071	0.13	0.21	0.305	0.348
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.105	0.097	0.14	0.03	0.002	0.04	0.033	0.063	0.138	0.14
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	325.5	323.333	340.	300.	105.152	10.254	304.8	317.5	328.	338.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	16.5	16.667	21.	12.	7.697	2.774	12.6	14.25	19.	20.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	319.5	309.25	330.	234.	835.114	28.898	245.7	299.5	326.75	329.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	14.083	83.	0.	610.811	24.715	0.	0.	24.	68.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.45	2.775	6.2	1.4	1.831	1.353	1.46	1.8	3.475	5.54

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	15.95	15.375	19.7	10.9	12.72	3.567	10.93	11.65	18.55	19.55
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	542.5	543.75	602.	503.	989.841	31.462	505.1	511.25	570.5	595.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.35	8.55	9.9	7.7	0.397	0.63	7.79	8.1	8.975	9.72
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.2	8.117	8.3	7.6	0.049	0.221	7.66	8.025	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.2	8.055	8.3	7.6	0.053	0.23	7.66	8.025	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.009	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	312.	313.167	330.	288.	117.788	10.853	293.4	309.25	319.5	329.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.03	0.048	0.2	0.01	0.003	0.055	0.01	0.015	0.04	0.173
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.003	0.007	0.001	0.	0.002	0.001	0.002	0.005	0.007
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.235	0.217	0.32	0.001	0.008	0.09	0.04	0.158	0.283	0.317
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.1	0.118	0.31	0.05	0.005	0.073	0.053	0.065	0.15	0.274

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	322.	322.333	336.	309.	63.697	7.981	310.5	315.75	329.	335.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.5	17.583	22.	12.	5.174	2.275	13.5	17.	18.75	21.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	320.	313.25	333.	233.	697.659	26.413	255.8	311.	327.5	332.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	1.	9.083	82.	0.	540.083	23.24	0.	0.	6.75	60.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.11	0.15	0.38	0.05	0.012	0.11	0.056	0.08	0.188	0.374
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.55	4.95	28.	1.	55.845	7.473	1.	1.25	5.35	21.49

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Annual Analysis for 1990 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	15.8	15.642	19.4	9.2	11.354	3.37	10.07	13.35	18.9	19.34
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	525.	504.667	557.	364.	3929.152	62.683	372.4	494.	545.75	556.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.55	8.583	9.6	7.8	0.32	0.565	7.86	8.1	9.125	9.48
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.2	8.125	8.3	7.6	0.046	0.214	7.66	8.1	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.2	8.065	8.3	7.6	0.05	0.223	7.66	8.1	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.006	0.009	0.025	0.005	0.	0.006	0.005	0.005	0.008	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	311.	311.833	322.	304.	29.242	5.408	304.3	308.25	315.	321.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.03	0.032	0.12	0.	0.001	0.032	0.	0.005	0.04	0.096
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.002	0.006	0.001	0.	0.001	0.001	0.001	0.002	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.205	0.226	0.34	0.14	0.004	0.061	0.152	0.183	0.285	0.331
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.12	0.14	0.34	0.04	0.006	0.076	0.055	0.095	0.165	0.301
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	314.	295.417	332.	242.	1244.629	35.279	244.1	262.25	324.	331.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	10	17.5	18.5	22.	17.	3.611	1.9	17.	17.	20.25	21.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	280.5	282.	332.	217.	1926.182	43.888	218.8	243.75	324.	331.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	13.417	95.	0.	865.902	29.426	0.	0.	10.	81.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.095	0.119	0.25	0.05	0.004	0.063	0.053	0.073	0.18	0.232
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	3.3	3.808	11.2	1.2	7.557	2.749	1.26	2.	4.275	9.76

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.9	15.9	19.4	9.9	11.227	3.351	10.5	12.4	18.6	19.34
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	547.5	546.583	584.	510.	599.902	24.493	513.	523.25	568.	582.5
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.4	8.683	9.9	7.8	0.565	0.752	7.83	8.125	9.45	9.87
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.2	8.142	8.5	7.6	0.061	0.247	7.66	8.025	8.275	8.47
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.2	8.068	8.5	7.6	0.067	0.258	7.66	8.025	8.275	8.47
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.006	0.009	0.025	0.003	0.	0.006	0.003	0.005	0.009	0.022
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	316.	317.083	348.	300.	130.992	11.445	303.	311.5	317.5	341.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.04	0.039	0.09	0.	0.001	0.023	0.006	0.023	0.04	0.084
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.002	0.002	0.001	0.	0.	0.001	0.002	0.002	0.002
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.215	0.218	0.31	0.14	0.002	0.049	0.149	0.18	0.258	0.298
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.11	0.113	0.2	0.	0.003	0.051	0.021	0.093	0.148	0.191
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	325.	324.667	338.	305.	67.515	8.217	308.6	322.25	329.5	336.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.	17.167	20.	13.	3.97	1.992	13.3	17.	18.75	19.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	321.5	311.583	332.	264.	519.174	22.785	267.	296.25	328.25	331.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	6.	13.083	58.	0.	351.902	18.759	0.	0.	15.5	53.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.12	0.147	0.38	0.	0.013	0.115	0.015	0.083	0.185	0.374
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.4	3.225	11.3	1.2	7.789	2.791	1.2	1.425	4.05	9.29

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	15.7	15.917	25.2	9.8	18.902	4.348	10.46	12.075	18.65	23.43
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	526.	511.583	652.	295.	9810.083	99.046	321.1	455.75	582.5	633.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	11	8.5	8.173	9.8	3.4	2.79	1.67	4.28	8.1	9.	9.64
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.275	8.8	7.6	0.088	0.296	7.75	8.1	8.4	8.74
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.17	8.8	7.6	0.099	0.315	7.75	8.1	8.4	8.74
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.007	0.025	0.002	0.	0.006	0.002	0.004	0.008	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	312.	302.583	344.	170.	1964.083	44.318	204.2	306.	323.5	340.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	11	0.03	0.047	0.12	0.01	0.001	0.036	0.012	0.02	0.05	0.118
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	5	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.21	0.219	0.32	0.12	0.003	0.059	0.129	0.178	0.265	0.314
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	5	0.14	0.128	0.18	0.07	0.002	0.047	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	326.	311.75	334.	176.	1956.023	44.227	210.8	317.75	331.5	334.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.5	16.917	21.	9.	10.629	3.26	10.2	16.	19.	20.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	324.5	304.917	334.	176.	2002.083	44.745	205.4	294.	331.	334.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	6.833	42.	0.	200.333	14.154	0.	0.	7.5	38.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.125	0.194	0.75	0.04	0.043	0.207	0.04	0.065	0.268	0.648
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.55	3.725	9.4	0.5	8.655	2.942	0.74	1.7	5.	9.37

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.9	15.8	19.2	9.7	11.313	3.363	10.33	12.35	18.65	19.17
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	545.	547.75	598.	483.	1265.659	35.576	488.4	527.5	581.	597.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.45	8.658	9.8	7.5	0.504	0.71	7.62	8.125	9.325	9.71
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.242	8.7	7.6	0.074	0.271	7.72	8.125	8.375	8.64
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.15	8.7	7.6	0.083	0.287	7.72	8.125	8.375	8.64
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.007	0.025	0.002	0.	0.006	0.002	0.004	0.008	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	316.5	315.333	339.	303.	104.242	10.21	303.	305.5	319.5	334.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.03	0.033	0.09	0.	0.001	0.026	0.	0.02	0.038	0.084
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.205	0.208	0.29	0.13	0.002	0.05	0.139	0.17	0.248	0.287
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	326.5	333.	410.	294.	791.636	28.136	300.6	320.	340.75	392.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.5	16.833	20.	12.	5.606	2.368	12.3	15.5	18.	19.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	322.	318.5	362.	276.	568.818	23.85	277.8	302.75	328.5	356.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	10.	14.5	48.	0.	282.818	16.817	0.	0.	27.25	45.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.12	0.16	0.32	0.03	0.01	0.098	0.045	0.087	0.27	0.317
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	3.05	2.858	4.2	1.3	0.877	0.937	1.36	1.95	3.65	4.11

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	3	11.8	11.4	12.6	9.8	2.08	1.442	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	3	578.	564.667	587.	529.	974.333	31.214	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	3	9.7	9.5	9.7	9.1	0.12	0.346	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	3	8.3	8.3	8.4	8.2	0.01	0.1	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	3	8.3	8.292	8.4	8.2	0.01	0.1	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	3	0.005	0.005	0.006	0.004	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	326.	327.333	338.	318.	101.333	10.066	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.03	0.033	0.04	0.03	0.	0.006	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.21	0.227	0.27	0.2	0.001	0.038	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	328.	324.667	343.	303.	408.333	20.207	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	3	18.	18.	18.	18.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	315.	312.	333.	288.	513.	22.65	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	13.	12.667	15.	10.	6.333	2.517	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.09	0.09	0.11	0.07	0.	0.02	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	3	2.4	2.267	3.1	1.3	0.823	0.907	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	36	12.3	12.867	18.2	9.	5.838	2.416	9.77	11.1	14.1	16.66
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	36	527.5	525.222	583.	364.	3013.206	54.893	436.1	510.	574.	581.3
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	36	9.	8.972	10.7	7.7	0.418	0.647	8.04	8.525	9.375	9.83
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	36	8.3	8.278	8.5	7.	0.054	0.233	8.2	8.3	8.4	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	36	8.3	8.121	8.5	7.	0.08	0.282	8.2	8.3	8.4	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	36	0.005	0.008	0.1	0.003	0.	0.016	0.004	0.004	0.005	0.006
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	314.	316.278	383.	288.	274.035	16.554	303.1	307.5	318.	340.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	36	0.03	0.028	0.05	0.	0.	0.014	0.	0.02	0.04	0.043
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	36	0.2	0.212	0.36	0.13	0.004	0.061	0.137	0.17	0.224	0.32
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	326.	320.611	343.	249.	418.644	20.461	293.4	319.	332.	339.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	36	18.	18.028	22.	12.	4.371	2.091	15.4	17.	19.	21.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	326.	316.417	342.	249.	494.65	22.241	279.3	309.75	330.75	333.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	0.	4.194	27.	0.	51.704	7.191	0.	0.	8.75	15.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	36	2.	2.233	5.3	0.7	0.939	0.969	1.17	1.525	2.975	3.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	25	17.5	16.284	19.3	12.3	6.677	2.584	12.46	13.2	18.5	18.82
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	25	541.	551.4	652.	485.	1331.833	36.494	507.6	534.5	584.5	591.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	25	8.5	8.704	9.9	7.8	0.439	0.662	7.92	8.2	9.25	9.8
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	25	8.2	8.196	8.6	8.	0.014	0.117	8.1	8.1	8.25	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	25	8.2	8.183	8.6	8.	0.014	0.118	8.1	8.1	8.25	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	25	0.006	0.007	0.01	0.003	0.	0.002	0.005	0.006	0.008	0.008
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	319.	318.08	332.	284.	96.743	9.836	306.	315.	325.	328.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.04	0.057	0.2	0.	0.002	0.047	0.01	0.025	0.09	0.12
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.22	0.214	0.28	0.001	0.004	0.06	0.136	0.2	0.255	0.27
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	323.	318.64	410.	242.	881.157	29.684	265.	316.5	328.	332.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	24	17.5	17.083	22.	12.	7.123	2.669	12.5	15.5	19.	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	310.	291.12	362.	217.	1500.527	38.737	229.	263.	320.5	325.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	14.	27.52	95.	0.	839.01	28.966	0.	1.5	45.5	82.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	25	2.7	2.768	6.4	0.5	2.496	1.58	1.	1.35	4.05	5.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0108

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	20	19.15	19.36	25.2	18.5	2.027	1.424	18.51	18.625	19.4	19.69
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	20	555.5	536.8	602.	295.	4890.484	69.932	446.1	529.5	578.	601.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	19	8.1	7.811	8.4	3.4	1.192	1.092	7.5	7.9	8.2	8.4
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	20	7.9	7.96	8.8	7.3	0.168	0.41	7.51	7.6	8.275	8.67
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	20	7.889	7.805	8.8	7.3	0.193	0.439	7.51	7.6	8.275	8.67
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	20	0.013	0.016	0.05	0.002	0.	0.012	0.002	0.005	0.025	0.031
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	20	310.	303.5	320.	170.	1007.316	31.738	303.	306.25	312.75	317.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	19	0.04	0.033	0.06	0.	0.	0.015	0.	0.03	0.04	0.05
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	20	0.285	0.271	0.32	0.12	0.002	0.048	0.186	0.26	0.308	0.31
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	20	327.	318.9	351.	176.	1204.516	34.706	310.4	320.75	330.	334.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	19	17.	16.368	19.	9.	4.579	2.14	14.	16.	17.	18.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	20	323.	316.1	334.	176.	1154.937	33.984	299.6	320.	330.	333.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	20	0.	2.8	29.	0.	46.695	6.833	0.	0.	3.	11.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	20	3.9	6.08	28.	1.3	36.024	6.002	1.87	2.55	8.55	11.29

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0109

NPS Station ID: CHIC0109
LAT/LON: 34.503948/ -96.970337
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Travertine Creek at Lincoln Bridge
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_TRAV4
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 928
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/3. Station is known as Travertine Creek Site 4 and is located on Travertine Creek at center of the downstream side of the Lincoln Bridge. This station is about 100 feet above the confluence with Rock Creek. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	81	15.8	15.44	25.2	5.9	21.915	4.681	9.62	10.8	19.85	21.
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	81	658.	690.815	1200.	311.	21820.078	147.716	543.	587.	793.5	895.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	80	8.8	8.94	12.2	3.	1.938	1.392	7.9	8.2	9.6	10.97
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	81	8.3	8.231	8.7	6.9	0.091	0.301	7.66	8.2	8.4	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	81	8.3	8.062	8.7	6.9	0.12	0.346	7.66	8.2	8.4	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	81	0.005	0.009	0.126	0.002	0.	0.015	0.003	0.004	0.006	0.023
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	81	295.	292.753	316.	176.	316.013	17.777	278.	284.	304.	310.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	80	0.05	0.061	0.16	0.	0.002	0.039	0.01	0.03	0.09	0.12
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	59	0.002	0.002	0.008	0.	0.	0.001	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	81	0.18	0.184	0.35	0.001	0.003	0.051	0.122	0.15	0.21	0.25
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	59	0.1	0.123	0.4	0.01	0.005	0.071	0.05	0.08	0.17	0.2
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	80	313.	314.288	420.	203.	946.587	30.767	294.2	305.	326.75	341.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	79	19.	19.177	24.	11.	8.609	2.934	15.	17.	21.	23.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	80	311.5	301.088	412.	203.	1619.625	40.245	238.1	276.	325.5	341.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	80	0.5	13.2	82.	0.	492.744	22.198	0.	0.	17.75	57.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	63	0.1	0.13	0.39	0.01	0.008	0.088	0.064	0.08	0.14	0.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	81	2.7	2.907	8.	0.7	1.577	1.256	1.5	2.05	3.4	4.16

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0109

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	1	0.01	36	0	0.00	25	0	0.00	19	1	0.05			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	26	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	36	0	0.00	24	0	0.00	19	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	17.2	16.917	21.	10.8	16.206	4.026	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	813.	823.167	917.	730.	5958.567	77.192	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	8.75	8.8	9.5	8.1	0.448	0.669	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	7.9	7.8	8.4	6.9	0.384	0.62	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	6	7.737	7.453	8.4	6.9	0.528	0.727	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	6	0.018	0.035	0.126	0.004	0.002	0.047	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	289.	288.167	305.	270.	166.567	12.906	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.045	0.048	0.09	0.01	0.001	0.029	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	6	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.19	0.187	0.25	0.13	0.002	0.043	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	6	0.135	0.133	0.25	0.02	0.007	0.082	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	324.5	321.833	334.	306.	99.767	9.988	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	20.	20.333	24.	18.	4.267	2.066	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	324.5	321.5	334.	306.	105.9	10.291	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	0.	0.333	2.	0.	0.667	0.816	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	2.1	1.833	2.5	0.7	0.475	0.689	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	15.45	15.175	22.	5.9	26.298	5.128	7.01	11.	20.35	21.73
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	673.	704.25	968.	552.	19823.114	140.795	560.4	588.75	848.25	947.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	9.05	9.392	11.6	7.6	1.848	1.359	7.72	8.225	10.875	11.45
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.4	8.375	8.5	8.3	0.006	0.075	8.3	8.3	8.4	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.4	8.369	8.5	8.3	0.006	0.076	8.3	8.3	8.4	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.004	0.004	0.005	0.003	0.	0.001	0.003	0.004	0.005	0.005
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	296.5	296.083	312.	273.	157.356	12.544	275.1	285.5	308.5	311.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.07	0.065	0.12	0.	0.002	0.041	0.006	0.03	0.1	0.12
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.003	0.008	0.001	0.	0.002	0.001	0.002	0.005	0.007
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.205	0.208	0.35	0.11	0.004	0.067	0.11	0.173	0.238	0.329
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.105	0.124	0.4	0.01	0.011	0.107	0.01	0.053	0.188	0.337
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	313.5	323.333	420.	280.	1192.061	34.526	286.9	309.25	328.25	398.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	18.	18.583	24.	15.	10.083	3.175	15.	16.	21.	23.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	312.	305.667	412.	227.	2627.697	51.261	229.1	261.25	323.25	393.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	17.667	82.	0.	804.242	28.359	0.	0.	39.	74.8
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.85	2.675	3.5	1.7	0.395	0.628	1.7	2.075	3.1	3.47

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.65	15.7	21.5	9.7	22.04	4.695	10.	10.95	19.925	21.35
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	625.	700.917	1200.	536.	35195.902	187.606	543.2	595.	773.25	1108.5
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.15	8.492	12.1	4.8	2.855	1.69	5.67	7.925	9.425	11.41
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.2	8.175	8.4	7.6	0.058	0.242	7.69	8.1	8.4	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.2	8.101	8.4	7.6	0.064	0.254	7.69	8.1	8.4	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.006	0.008	0.025	0.004	0.	0.006	0.004	0.004	0.008	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	293.	294.917	316.	275.	170.083	13.042	276.8	284.25	308.	314.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.06	0.07	0.16	0.01	0.003	0.053	0.01	0.02	0.123	0.154
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.003	0.006	0.001	0.	0.001	0.001	0.002	0.003	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.175	0.174	0.27	0.001	0.005	0.072	0.043	0.14	0.238	0.264
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.095	0.105	0.19	0.05	0.002	0.048	0.05	0.055	0.148	0.184

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Annual Analysis for 1989 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	311.5	317.083	342.	304.	180.992	13.453	304.3	305.5	327.	341.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	19.5	19.5	24.	12.	10.091	3.177	13.5	18.	21.75	23.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	310.	308.25	342.	234.	753.841	27.456	250.8	301.	327.	338.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.5	8.833	73.	0.	431.606	20.775	0.	0.	8.75	55.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.095	0.144	0.39	0.07	0.011	0.104	0.073	0.08	0.17	0.369
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	3.05	2.95	5.	1.4	1.228	1.108	1.4	1.775	3.7	4.7

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Annual Analysis for 1990 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.15	15.867	21.5	8.9	17.897	4.23	9.47	11.95	19.775	21.05
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	610.	676.667	895.	502.	14808.788	121.691	528.1	593.75	784.75	877.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.55	8.733	10.4	7.8	0.706	0.84	7.83	7.95	9.525	10.16
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.192	8.4	7.6	0.054	0.231	7.69	8.125	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.119	8.4	7.6	0.059	0.244	7.69	8.125	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.008	0.025	0.004	0.	0.006	0.004	0.005	0.008	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	294.5	292.333	304.	278.	64.97	8.06	278.6	285.5	297.75	303.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.05	0.059	0.14	0.	0.002	0.044	0.003	0.02	0.095	0.134
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.002	0.004	0.	0.	0.001	0.	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.175	0.182	0.27	0.1	0.002	0.048	0.109	0.16	0.215	0.264
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.15	0.153	0.29	0.04	0.005	0.071	0.049	0.1	0.195	0.275
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	11	308.	292.091	370.	226.	2171.491	46.599	228.8	245.	324.	362.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	10	21.	20.5	23.	17.	4.5	2.121	17.1	18.75	22.25	23.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	11	308.	290.	370.	224.	2400.2	48.992	224.4	240.	324.	362.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	11	0.	2.091	21.	0.	39.691	6.3	0.	0.	0.	17.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.095	0.115	0.21	0.04	0.003	0.051	0.049	0.083	0.17	0.201
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.65	3.067	5.7	1.9	1.275	1.129	1.93	2.15	3.875	5.25

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.2	15.408	21.5	8.3	23.741	4.872	8.93	10.525	19.95	21.29
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	655.5	686.083	988.	528.	20400.447	142.83	531.3	576.75	773.25	959.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.65	9.067	11.6	7.9	1.362	1.167	7.9	8.225	9.775	11.33
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.208	8.5	7.6	0.066	0.257	7.69	8.05	8.4	8.47
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.123	8.5	7.6	0.074	0.273	7.69	8.05	8.4	8.47
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.008	0.025	0.003	0.	0.006	0.003	0.004	0.009	0.021
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	298.	294.	310.	270.	170.727	13.066	273.3	281.5	304.	309.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.055	0.062	0.12	0.	0.001	0.036	0.009	0.04	0.095	0.117
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.175	0.178	0.23	0.11	0.001	0.034	0.116	0.17	0.205	0.227
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.1	0.104	0.17	0.02	0.002	0.045	0.035	0.08	0.15	0.17
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	313.	318.25	379.	304.	409.477	20.236	304.3	306.5	320.5	363.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	18.5	18.917	24.	13.	9.72	3.118	13.6	17.25	21.75	23.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	310.	299.417	370.	239.	1388.629	37.264	239.3	271.25	320.	356.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	5.5	18.833	65.	0.	622.879	24.958	0.	0.25	36.5	65.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.095	0.139	0.39	0.01	0.012	0.11	0.031	0.08	0.17	0.369
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.55	2.467	3.6	1.3	0.684	0.827	1.3	1.575	3.275	3.54

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.25	15.842	25.2	8.4	27.394	5.234	8.76	10.6	19.85	23.76
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	643.5	643.75	868.	311.	31650.568	177.906	347.	517.25	804.	865.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	11	8.8	8.545	12.2	3.	5.075	2.253	3.88	7.8	9.6	11.78
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.4	8.308	8.7	7.6	0.077	0.278	7.75	8.2	8.4	8.67
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.4	8.204	8.7	7.6	0.089	0.299	7.75	8.2	8.4	8.67
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.004	0.006	0.025	0.002	0.	0.006	0.002	0.004	0.006	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	292.	283.583	312.	176.	1306.083	36.14	204.5	280.	305.	310.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	11	0.05	0.058	0.15	0.	0.002	0.042	0.004	0.03	0.08	0.14
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/13/92	5	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.185	0.188	0.28	0.12	0.002	0.048	0.123	0.15	0.233	0.268
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	5	0.12	0.13	0.21	0.08	0.003	0.056	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	310.	307.5	355.	203.	1344.455	36.667	230.9	301.5	326.25	348.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	19.	18.333	23.	11.	10.061	3.172	12.2	17.	20.	22.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	308.5	297.917	350.	203.	1677.356	40.956	217.7	270.5	326.25	344.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	9.583	48.	0.	292.992	17.117	0.	0.	12.	46.2
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.095	0.138	0.35	0.05	0.009	0.096	0.053	0.08	0.178	0.335
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.75	3.65	8.	1.4	4.67	2.161	1.49	2.375	5.275	7.76

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	16.25	15.342	21.	8.1	23.701	4.868	8.76	10.35	20.075	20.88
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	616.	673.417	963.	547.	18038.992	134.309	553.6	579.75	768.75	936.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	8.7	9.05	11.1	7.9	0.812	0.901	8.08	8.5	9.575	10.86
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	8.3	8.292	8.7	7.6	0.07	0.264	7.75	8.225	8.4	8.64
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	8.3	8.195	8.7	7.6	0.08	0.283	7.75	8.225	8.4	8.64
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.005	0.006	0.025	0.002	0.	0.006	0.002	0.004	0.006	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	301.	296.583	312.	272.	166.992	12.923	273.8	285.75	308.	311.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.045	0.054	0.1	0.	0.001	0.032	0.006	0.04	0.087	0.1
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.165	0.173	0.26	0.11	0.002	0.044	0.11	0.15	0.2	0.245
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	314.	317.5	371.	294.	509.727	22.577	294.6	298.25	331.5	360.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	18.5	18.5	23.	13.	10.273	3.205	13.	17.	21.	22.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	294.5	294.5	362.	234.	1625.182	40.314	235.2	263.25	328.75	354.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	13.	23.	67.	0.	682.182	26.119	0.	0.5	52.	65.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.1	0.128	0.3	0.02	0.007	0.086	0.038	0.08	0.15	0.3
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	3.35	3.183	5.	1.5	1.125	1.061	1.59	2.1	3.8	4.82

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	3	10.3	9.7	10.4	8.4	1.27	1.127	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	3	610.	665.333	813.	573.	16696.333	129.214	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	3	10.3	10.533	11.5	9.8	0.763	0.874	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	3	8.5	8.433	8.5	8.3	0.013	0.115	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	3	8.5	8.423	8.5	8.3	0.014	0.116	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	3	0.003	0.004	0.005	0.003	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	304.	298.	309.	281.	223.	14.933	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.06	0.063	0.09	0.04	0.001	0.025	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.19	0.19	0.19	0.19	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	307.	331.667	383.	305.	1977.333	44.467	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	3	21.	20.667	22.	19.	2.333	1.528	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	287.	299.667	373.	239.	4609.333	67.892	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	20.	32.	66.	10.	892.	29.866	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.07	0.083	0.12	0.06	0.001	0.032	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	3	3.	2.867	4.	1.6	1.453	1.206	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	36	10.9	11.919	19.5	5.9	8.797	2.966	8.37	10.325	14.675	16.43
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	36	797.	764.639	1200.	528.	27002.866	164.325	569.7	586.75	894.25	964.5
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	36	9.4	9.25	11.6	4.8	1.299	1.14	8.15	8.8	9.775	10.49
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	36	8.4	8.344	8.5	6.9	0.067	0.258	8.3	8.3	8.4	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	36	8.4	8.122	8.5	6.9	0.118	0.343	8.3	8.3	8.4	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	36	0.004	0.008	0.126	0.003	0.	0.02	0.003	0.004	0.005	0.005
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	292.	292.583	312.	270.	159.279	12.621	272.7	281.	303.75	309.3
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	36	0.05	0.058	0.14	0.	0.002	0.039	0.007	0.023	0.09	0.12
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	36	0.17	0.182	0.35	0.1	0.003	0.057	0.11	0.14	0.2	0.273
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	324.	326.556	420.	253.	925.625	30.424	291.2	312.25	335.5	373.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	36	21.	20.556	24.	13.	6.311	2.512	17.4	19.	22.75	23.3
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	324.	320.944	412.	234.	1120.283	33.471	277.8	297.75	334.	364.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	0.	5.611	46.	0.	98.53	9.926	0.	0.	9.	20.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	36	2.7	2.717	5.9	0.7	0.999	0.999	1.3	2.025	3.4	3.86

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	25	17.9	16.172	20.4	9.6	15.358	3.919	10.06	11.7	19.5	19.84
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	25	599.	592.64	698.	509.	1610.073	40.126	537.8	565.5	610.5	641.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	25	8.8	9.356	12.2	7.8	2.083	1.443	7.96	8.25	10.75	11.8
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	25	8.3	8.264	8.6	8.1	0.015	0.122	8.1	8.2	8.3	8.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	25	8.3	8.248	8.6	8.1	0.015	0.123	8.1	8.2	8.3	8.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	25	0.005	0.006	0.008	0.003	0.	0.001	0.004	0.005	0.006	0.008
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	304.	302.44	316.	271.	87.757	9.368	292.8	297.5	310.	312.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.05	0.067	0.16	0.	0.002	0.046	0.016	0.035	0.1	0.144
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.18	0.176	0.25	0.001	0.003	0.053	0.11	0.155	0.22	0.24
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	305.	301.32	370.	226.	801.143	28.304	243.	301.5	310.	323.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	24	19.	18.792	24.	12.	9.389	3.064	13.	17.	21.	22.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	264.	270.48	370.	224.	1545.76	39.316	226.6	238.5	307.5	316.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	21.	30.84	82.	0.	832.057	28.845	0.	0.5	60.	68.8
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	25	2.8	2.74	5.7	1.4	1.296	1.138	1.46	1.65	3.55	4.08

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0109

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	20	20.7	20.86	25.2	19.1	1.556	1.247	19.73	20.025	21.4	21.95
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	20	726.	680.65	798.	311.	16981.082	130.311	438.1	666.	781.75	797.1
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	19	8.1	7.805	8.5	3.	1.411	1.188	7.6	7.9	8.2	8.5
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	20	7.95	7.985	8.7	7.4	0.151	0.388	7.51	7.6	8.3	8.66
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	20	7.947	7.84	8.7	7.4	0.173	0.416	7.51	7.6	8.3	8.66
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	20	0.011	0.014	0.04	0.002	0.	0.011	0.002	0.005	0.025	0.031
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	20	284.	280.95	298.	176.	656.155	25.616	278.	280.25	293.75	297.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	19	0.07	0.057	0.12	0.	0.001	0.028	0.02	0.04	0.08	0.08
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	20	0.195	0.198	0.26	0.13	0.001	0.036	0.141	0.18	0.225	0.249
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	19	313.	308.105	330.	203.	711.544	26.675	298.	308.	316.	327.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	19	17.	17.053	20.	11.	4.275	2.068	15.	16.	18.	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	19	312.	303.737	327.	203.	771.871	27.783	263.	308.	314.	327.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	19	0.	4.368	67.	0.	231.912	15.229	0.	0.	2.	5.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	20	2.7	3.46	8.	2.1	2.738	1.655	2.12	2.5	4.125	6.98

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0110

NPS Station ID: CHIC0110 LAT/LON: 34.504003/ -96.966255 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK 1/2 MILE NW OF COLD SPRING CAMP FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T4_3
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROX. A 1/2 MILE NORTHWEST OF COLD SPRING CAMPGROUND AND A 1/4 MILE EAST OF CHIC_SCH_T4_2. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0110

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	2 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			1.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0110

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	2	0	0.00	2	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0111

NPS Station ID: CHIC0111 LAT/LON: 34.504059/ -96.970005 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CK AT INVERTED SIPHON BELOW BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_4
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT INVERTED SIPHON APPROXIMATELY 200 FEET DOWNSTREAM FROM CHIC_HARP_7. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0111

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-06/23/76	2	24.	24.	26.	22.	8.	2.828	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/16/76-06/23/76	2	9.45	9.45	9.6	9.3	0.045	0.212	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/16/76-06/23/76	2	15.5	15.5	22.	9.	84.5	9.192	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/16/76-06/23/76	2	8.5	8.5	9.	8.	0.5	0.707	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/16/76-06/23/76	2	8.26	8.26	9.	8.	0.616	0.785	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/16/76-06/23/76	2	0.006	0.006	0.01	0.001	0.	0.006	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	2	277.5	277.5	342.	213.	8320.5	91.217	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	1	6.	6.	6.	6.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	2	65.5	65.5	70.	61.	40.5	6.364	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-06/23/76	2	695.	695.	700.	690.	50.	7.071	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0111

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00				2	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	2	1	0.50				2	1	0.50						
		Other-Lo Lim.	6.5	2	0	0.00				2	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0111

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00				2	0	0.00						
	Drinking Water	250.	2	0	0.00				2	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0112

NPS Station ID: CHIC0112 LAT/LON: 34.504087/ -96.969865 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK 200 FT EAST OF LINCOLN BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_6
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 200 FEET EAST OF LINCOLN BRIDGE AND 250 FEET UPSTREAM FROM THE ROCK CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0112

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-10/28/75	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-10/28/75	1	3400.	3400.	3400.	3400.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-10/28/75	1	3.531	3.531	3.531	3.531	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			3400.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-10/28/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-10/28/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0112

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0113

NPS Station ID: CHIC0113 LAT/LON: 34.504142/ -96.949532 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK BELOW THE NATURE CENTER FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_1
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1040 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 1000 FEET NORTH OF THE CHICKASAW NRA BOUNDARY AND BELOW THE NATURE CENTER. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0113

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/04/76-06/23/77	7	21.	20.5	22.	17.	2.75	1.658	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/04/76-06/23/77	7	8.7	8.6	10.	7.1	1.2	1.095	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-06/23/77	3	0.3	0.467	0.9	0.2	0.143	0.379	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/04/76-06/23/77	5	13.	19.8	36.	10.	125.7	11.212	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/04/76-06/23/77	7	8.1	8.314	9.	8.	0.175	0.418	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/04/76-06/23/77	7	8.1	8.187	9.	8.	0.194	0.44	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/04/76-06/23/77	7	0.008	0.007	0.01	0.001	0.	0.004	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-10/16/76	2	342.	342.	392.	292.	5000.	70.711	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/04/76-10/16/76	3	4.	3.667	6.	1.	6.333	2.517	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/04/76-10/16/76	4	2.	2.25	4.	1.	1.583	1.258	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	06/19/76-10/16/76	12	5150.	11225.	38500.	2000.	132462045.455	11509.216	2510.	4125.	19000.	34750.
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	06/19/76-10/16/76	12	3.712	3.868	4.585	3.301	0.161	0.401	3.381	3.615	4.277	4.534
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			7381.747								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	30	205.	2611.133	70000.	0.	162105467.499	12732.065	2.	23.	492.5	844.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/05/76-07/17/77	30	2.312	2.078	4.845	0.	1.025	1.012	0.13	1.36	2.692	2.926
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			119.768								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-07/17/77	21	300.	1401.905	20000.	0.	18388056.19	4288.13	114.	200.	660.	1780.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-07/17/77	21	2.477	2.512	4.301	0.	0.584	0.764	2.046	2.301	2.81	3.25
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			324.744								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/04/76-06/23/77	7	550.	548.571	550.	540.	14.286	3.78	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0113

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	7	0	0.00	2	0	0.00	4	0	0.00	1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	7	1	0.14	2	0	0.00	4	1	0.25	1	0	0.00			
		Other-Lo Lim.	6.5	7	0	0.00	2	0	0.00	4	0	0.00	1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	4	0	0.00	1	0	0.00	3	0	0.00						
		Drinking Water	250.	4	0	0.00	1	0	0.00	3	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	12	12	1.00	4	4	1.00	6	6	1.00	2	2	1.00			
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	30	16	0.53	4	4	1.00	1	0	0.00	25	12	0.48			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0114

NPS Station ID: CHIC0114 LAT/LON: 34.504142/ -96.971032 Agency: 11NPSWRD Date Created: 05/24/97
Location: Rock Creek near Black Sulphur Spring Pump House FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_ROCK2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SOUTH CENTRAL MISS. R. Elevation: 928 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/3. Station is known as Rock Creek Site 2 and is located on Rock Creek at an underwater concrete structure stretching across the creek. Station is on the right bank near the Black Sulphur Spring pump house. This station is located about 100 to 200 feet above the confluence of Rock Creek with Travertine Creek. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	81	15.1	14.956	26.7	1.5	62.236	7.889	4.22	7.85	22.35	24.58
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	81	635.	689.185	2790.	357.	92562.603	304.241	470.6	558.	788.5	868.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	79	6.8	6.973	13.3	1.9	7.571	2.752	3.3	4.5	9.4	10.3
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	81	8.	7.949	8.7	7.	0.085	0.291	7.42	7.8	8.1	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	81	8.	7.835	8.7	7.	0.098	0.313	7.42	7.8	8.1	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	81	0.01	0.015	0.1	0.002	0.	0.014	0.006	0.008	0.016	0.038
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	81	254.	251.741	375.	159.	1434.019	37.868	208.	225.5	284.5	294.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	80	0.095	0.105	0.31	0.	0.003	0.057	0.05	0.06	0.13	0.17
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	59	0.002	0.004	0.06	0.001	0.	0.008	0.001	0.002	0.003	0.009
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	81	0.12	0.127	0.2	0.07	0.001	0.027	0.1	0.11	0.15	0.17
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	58	0.145	0.192	0.88	0.04	0.022	0.148	0.069	0.098	0.24	0.393
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	80	258.5	262.35	513.	160.	2722.154	52.174	210.	230.5	288.75	300.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	79	21.	21.557	56.	12.	36.122	6.01	16.	18.	24.	27.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	239.	247.	508.	160.	3046.658	55.197	185.7	210.25	278.	294.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	80	0.	15.35	191.	0.	1055.673	32.491	0.	0.	10.	57.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	63	0.12	0.183	0.46	0.04	0.015	0.124	0.06	0.08	0.28	0.396
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	81	4.3	5.433	19.5	2.	10.829	3.291	2.7	3.4	6.65	9.44

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0114

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	79	16	0.20	36	0	0.00	25	1	0.04	18	15	0.83			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	27	0	0.00	19	0	0.00	13	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	37	0	0.00	24	0	0.00	18	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	6	17.05	16.733	26.7	6.8	70.155	8.376	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	6	905.	1105.167	2790.	454.	747616.567	864.648	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	6	6.7	5.75	9.9	1.9	9.467	3.077	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	6	7.65	7.617	8.1	7.	0.198	0.445	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	6	7.582	7.435	8.1	7.	0.237	0.487	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	6	0.026	0.037	0.1	0.008	0.001	0.036	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	223.5	221.667	295.	159.	2492.667	49.927	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.18	0.167	0.23	0.06	0.004	0.063	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	6	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	6	0.115	0.135	0.2	0.11	0.001	0.037	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	6	0.25	0.333	0.88	0.09	0.077	0.277	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	6	276.	285.167	513.	160.	15815.367	125.759	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	6	27.	29.5	56.	13.	248.3	15.758	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	270.	282.333	508.	160.	15346.267	123.88	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	6	0.	2.833	12.	0.	24.167	4.916	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	6	4.65	7.183	16.3	2.2	32.79	5.726	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	15.8	15.133	24.5	1.5	62.444	7.902	2.16	7.35	22.15	24.35
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	746.5	690.667	870.	379.	24188.061	155.525	433.9	565.75	826.25	860.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	11	6.6	7.045	13.3	2.6	11.579	3.403	2.8	3.8	8.8	13.
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.	8.033	8.3	7.8	0.041	0.202	7.8	7.825	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.	7.993	8.3	7.8	0.042	0.206	7.8	7.825	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.01	0.01	0.016	0.005	0.	0.004	0.005	0.005	0.015	0.016
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	280.	268.75	294.	178.	983.659	31.363	201.1	260.	288.25	293.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.075	0.091	0.31	0.05	0.005	0.071	0.05	0.06	0.087	0.247
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.002	0.004	0.001	0.	0.001	0.001	0.002	0.002	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.11	0.114	0.14	0.09	0.	0.016	0.093	0.1	0.128	0.14
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.115	0.133	0.27	0.08	0.003	0.052	0.083	0.1	0.15	0.243
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	277.	274.167	358.	183.	1603.424	40.043	204.6	258.5	288.	342.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	21.5	20.917	24.	14.	8.629	2.937	14.9	20.	23.	24.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	263.5	245.	291.	167.	2078.364	45.589	168.2	195.25	278.	287.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	0.	29.167	191.	0.	3541.242	59.508	0.	0.	56.25	158.9
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	3.45	4.883	19.5	2.7	21.969	4.687	2.73	2.9	4.4	15.39

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.35	15.133	25.6	3.5	75.684	8.7	3.92	6.075	23.775	25.21
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	640.	648.75	860.	452.	15359.659	123.934	463.4	564.75	771.25	842.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	6.7	6.733	10.1	2.9	6.857	2.619	3.02	4.525	9.675	10.1
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	7.9	7.858	8.1	7.4	0.055	0.235	7.43	7.725	8.075	8.1
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	7.889	7.794	8.1	7.4	0.06	0.245	7.43	7.725	8.075	8.1
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.013	0.016	0.04	0.008	0.	0.01	0.008	0.008	0.019	0.037
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	238.5	248.083	295.	181.	1410.265	37.553	189.1	224.5	290.5	294.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.065	0.102	0.23	0.04	0.004	0.062	0.043	0.053	0.155	0.212
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.003	0.004	0.009	0.002	0.	0.003	0.002	0.002	0.006	0.009
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.13	0.13	0.18	0.09	0.001	0.028	0.093	0.103	0.15	0.177
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.145	0.197	0.5	0.04	0.027	0.163	0.043	0.053	0.353	0.476

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	254.	263.333	391.	192.	2935.333	54.179	197.4	224.	295.25	364.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	20.	21.667	28.	16.	21.152	4.599	16.	18.	26.	28.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	228.5	250.75	388.	192.	3147.477	56.102	194.1	210.	289.75	358.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	1.	12.583	98.	0.	782.811	27.979	0.	0.	12.25	76.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.145	0.203	0.46	0.04	0.023	0.152	0.04	0.085	0.348	0.454
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.3	4.583	8.3	2.	5.054	2.248	2.03	2.25	6.875	8.09

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Annual Analysis for 1990 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	14.2	15.592	25.7	5.8	63.984	7.999	6.28	8.925	24.55	25.7
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	630.	696.75	1480.	490.	75293.477	274.397	490.6	508.25	766.75	1297.9
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	6.85	6.458	9.7	2.9	5.684	2.384	3.02	4.125	8.7	9.61
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.	7.933	8.2	7.4	0.064	0.253	7.43	7.825	8.1	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.	7.853	8.2	7.4	0.071	0.267	7.43	7.825	8.1	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.01	0.014	0.04	0.006	0.	0.011	0.006	0.008	0.015	0.037
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	257.5	262.083	375.	162.	3064.447	55.357	175.8	221.75	297.75	353.1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.095	0.094	0.16	0.03	0.001	0.038	0.033	0.065	0.12	0.151
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.009	0.06	0.001	0.	0.017	0.001	0.002	0.011	0.047
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.11	0.124	0.19	0.07	0.001	0.036	0.076	0.1	0.15	0.186
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	12	0.165	0.198	0.5	0.07	0.017	0.132	0.073	0.103	0.28	0.461
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	11	258.	260.545	392.	206.	2607.273	51.061	206.8	218.	270.	372.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	10	22.	21.7	25.	16.	6.9	2.627	16.4	20.	24.	24.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	252.	255.727	388.	206.	2723.618	52.188	206.8	211.	270.	369.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	11	0.	4.818	49.	0.	216.164	14.703	0.	0.	0.	40.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.14	0.174	0.44	0.06	0.013	0.112	0.063	0.085	0.258	0.392
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.85	6.383	15.5	2.8	13.767	3.71	2.98	3.6	8.55	13.91

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.3	15.367	25.6	3.2	60.853	7.801	3.53	9.125	22.075	25.21
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	635.5	699.5	1470.	463.	70326.455	265.191	474.1	541.75	768.25	1275.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	6.5	6.75	11.6	2.9	9.27	3.045	2.96	3.5	9.625	11.3
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.	7.908	8.2	7.4	0.074	0.271	7.43	7.725	8.1	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	7.989	7.824	8.2	7.4	0.081	0.285	7.43	7.725	8.1	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.01	0.015	0.04	0.006	0.	0.011	0.006	0.008	0.019	0.037
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	251.	252.333	294.	208.	595.879	24.411	213.1	237.5	268.5	291.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.115	0.104	0.18	0.	0.003	0.052	0.015	0.065	0.153	0.174
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	12	0.002	0.004	0.02	0.001	0.	0.005	0.001	0.002	0.002	0.017
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.115	0.124	0.17	0.1	0.001	0.023	0.1	0.11	0.148	0.164
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	11	0.18	0.188	0.5	0.06	0.016	0.125	0.064	0.08	0.24	0.456
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	260.	268.667	391.	210.	2057.697	45.362	216.6	240.	286.	361.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	21.	21.583	31.	15.	26.811	5.178	15.3	16.5	24.75	30.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	234.	246.083	388.	183.	3232.992	56.859	185.7	201.	277.75	359.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	3.5	22.583	97.	0.	1105.538	33.25	0.	0.	51.5	86.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.15	0.216	0.46	0.04	0.026	0.162	0.046	0.065	0.385	0.454
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	3.9	5.342	12.	2.	10.237	3.2	2.33	3.275	7.3	11.64

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	12.8	14.517	25.	3.6	69.945	8.363	3.78	7.6	23.1	24.85
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	576.5	569.917	837.	357.	22351.902	149.506	363.6	434.25	649.75	819.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	11	6.9	7.4	11.4	3.4	6.866	2.62	3.42	6.1	9.8	11.16
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.1	8.117	8.7	7.4	0.111	0.333	7.55	7.925	8.35	8.64
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.1	7.991	8.7	7.4	0.128	0.358	7.55	7.925	8.35	8.64
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.008	0.01	0.04	0.002	0.	0.01	0.002	0.005	0.012	0.032
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	234.	237.333	290.	185.	1040.424	32.256	191.9	211.5	261.	288.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	11	0.11	0.114	0.27	0.05	0.004	0.062	0.052	0.06	0.13	0.248
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-05/14/92	5	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.12	0.134	0.19	0.11	0.001	0.025	0.113	0.12	0.153	0.184
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/14/92	5	0.12	0.144	0.28	0.09	0.006	0.078	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	229.5	235.083	296.	168.	1272.629	35.674	180.	214.	253.	295.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	17.	18.833	26.	12.	19.424	4.407	12.9	16.	23.5	25.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	221.	228.75	296.	168.	1266.386	35.586	177.	209.	250.	292.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	0.	6.333	52.	0.	228.97	15.132	0.	0.	7.5	40.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.15	0.16	0.3	0.06	0.007	0.086	0.06	0.08	0.223	0.297
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	5.75	5.942	9.5	2.3	5.604	2.367	2.51	4.175	8.425	9.41

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	12	16.3	15.242	24.6	3.1	61.541	7.845	3.49	8.025	22.225	24.54
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	12	646.5	649.333	802.	469.	8486.061	92.12	496.9	599.	705.5	797.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	12	7.05	7.267	11.3	3.7	6.019	2.453	3.73	5.225	9.5	10.97
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	12	8.1	7.958	8.2	7.4	0.059	0.243	7.49	7.8	8.1	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	12	8.1	7.885	8.2	7.4	0.065	0.255	7.49	7.8	8.1	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	12	0.008	0.013	0.04	0.006	0.	0.01	0.006	0.008	0.016	0.034
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	258.5	254.667	298.	212.	860.606	29.336	212.9	222.75	271.5	298.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.1	0.093	0.17	0.02	0.002	0.042	0.029	0.063	0.11	0.164
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	12	0.125	0.127	0.17	0.09	0.001	0.025	0.093	0.103	0.15	0.164
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	12	263.	259.917	299.	214.	698.992	26.438	215.8	241.25	278.25	297.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	12	20.	20.5	29.	15.	16.455	4.056	15.3	17.25	23.5	27.8
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	232.	238.417	299.	185.	1280.265	35.781	188.	214.25	262.5	296.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	12	4.5	21.5	95.	0.	1000.818	31.636	0.	0.	47.5	83.9
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.16	0.191	0.4	0.06	0.012	0.11	0.06	0.105	0.278	0.376
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	12	4.85	4.65	7.1	2.1	1.803	1.343	2.52	3.8	5.175	6.92

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	3	4.4	6.4	11.5	3.3	19.81	4.451	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	3	592.	578.	615.	527.	2083.	45.64	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	3	10.3	10.333	11.4	9.3	1.103	1.05	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	3	8.2	8.167	8.2	8.1	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	3	8.2	8.164	8.2	8.1	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	3	0.006	0.007	0.008	0.006	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	252.	260.667	292.	238.	785.333	28.024	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.09	0.103	0.16	0.06	0.003	0.051	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	3	0.14	0.14	0.15	0.13	0.	0.01	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	3	266.	265.667	291.	240.	650.333	25.502	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	3	23.	22.333	24.	20.	4.333	2.082	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	240.	248.333	285.	220.	1108.333	33.292	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	3	6.	17.333	46.	0.	625.333	25.007	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	3	0.07	0.067	0.07	0.06	0.	0.006	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	3	4.3	5.2	7.4	3.9	3.67	1.916	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	37	7.6	8.354	22.6	1.5	24.191	4.918	3.28	4.35	9.35	15.18
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	37	635.	675.73	923.	379.	19438.814	139.423	489.	595.	798.5	870.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	36	9.15	8.694	13.3	4.5	4.466	2.113	6.3	6.8	10.2	11.46
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	37	8.1	8.027	8.3	7.	0.049	0.222	7.8	7.9	8.2	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	37	8.1	7.931	8.3	7.	0.059	0.242	7.8	7.9	8.2	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	37	0.008	0.012	0.1	0.005	0.	0.015	0.006	0.006	0.013	0.016
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	265.	259.135	299.	159.	1599.787	39.997	180.4	237.	292.	295.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.06	0.093	0.31	0.	0.004	0.064	0.038	0.05	0.115	0.182
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	37	0.12	0.124	0.17	0.07	0.001	0.024	0.09	0.11	0.14	0.162
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	37	259.	258.	303.	160.	1393.556	37.33	190.2	237.	291.	296.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	37	23.	22.541	28.	13.	11.811	3.437	15.8	21.	25.	26.2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	258.	253.757	303.	160.	1475.634	38.414	190.2	227.	289.	294.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	37	0.	4.243	63.	0.	193.134	13.897	0.	0.	0.	10.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	37	3.8	5.805	19.5	2.	19.315	4.395	2.1	2.9	7.35	12.78

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	25	19.2	17.856	25.7	7.8	28.385	5.328	8.62	13.35	21.95	24.08
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	25	562.	562.6	743.	414.	7235.167	85.06	458.6	492.5	638.5	683.8
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	25	6.9	7.024	10.1	3.6	3.563	1.888	4.16	6.	8.6	9.68
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	25	8.	8.032	8.4	7.7	0.028	0.168	7.8	7.95	8.1	8.24
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	25	8.	8.001	8.4	7.7	0.029	0.171	7.8	7.95	8.1	8.24
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	25	0.01	0.01	0.02	0.004	0.	0.004	0.006	0.008	0.011	0.016
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	255.	259.64	375.	185.	1187.073	34.454	225.2	242.	271.	297.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.09	0.108	0.27	0.05	0.003	0.054	0.06	0.07	0.125	0.194
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	25	0.12	0.131	0.19	0.09	0.001	0.028	0.1	0.11	0.15	0.184
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	25	255.	255.52	358.	168.	1323.593	36.381	207.2	238.5	272.	301.
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	24	19.	18.708	24.	14.	5.955	2.44	15.5	17.	20.	22.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	211.	214.28	278.	167.	846.627	29.097	169.8	196.5	231.	255.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	25	40.	41.24	191.	0.	2160.44	46.481	0.	0.5	64.5	97.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	25	4.3	4.98	10.2	2.9	2.898	1.702	3.32	3.85	5.85	7.52

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0114

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/04/94	19	24.4	23.995	26.7	21.4	2.864	1.692	21.4	21.7	25.6	25.7
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/04/94	19	670.	881.947	2790.	357.	301015.83	548.649	379.	646.	830.	1480.
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/04/94	18	3.3	3.461	7.	1.9	1.175	1.084	2.26	2.9	3.8	4.75
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/04/94	19	7.5	7.689	8.7	7.3	0.148	0.384	7.4	7.4	7.8	8.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/04/94	19	7.5	7.58	8.7	7.3	0.16	0.401	7.4	7.4	7.8	8.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/04/94	19	0.032	0.026	0.05	0.002	0.	0.014	0.003	0.016	0.04	0.04
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	19	219.	226.947	282.	162.	743.164	27.261	208.	208.	243.	267.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/04/94	18	0.125	0.124	0.23	0.05	0.002	0.039	0.077	0.1	0.145	0.167
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/04/94	19	0.11	0.126	0.2	0.1	0.001	0.03	0.1	0.1	0.15	0.175
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/04/94	18	264.	280.778	513.	210.	7361.007	85.796	210.	213.5	317.5	404.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/04/94	18	19.5	23.333	56.	12.	115.765	10.759	15.6	16.	29.	39.8
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	260.	278.556	508.	210.	7109.791	84.32	210.	213.5	307.75	400.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/04/94	18	0.	2.222	12.	0.	10.065	3.173	0.	0.	4.	5.7
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/04/94	19	5.	5.305	9.5	2.	5.046	2.246	2.2	3.5	7.6	9.2

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0115

NPS Station ID: CHIC0115 LAT/LON: 34.504198/ -96.969449 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CK BETWEEN LINCOLN & HWY 177 BRIDGES FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T4_5
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 50 FEET WEST OF HWY 177 AND 350 FEET UPSTREAM FROM THE ROCK CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0115

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	2 ##	5.5	5.5	11.	0.	60.5	7.778	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	2	1600.	1600.	2300.	900.	980000.	989.949	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	12/22/75-01/09/76	2	3.158	3.158	3.362	2.954	0.083	0.288	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			1438.749								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	900.	900.	1500.	300.	720000.	848.528	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	2.827	2.827	3.176	2.477	0.244	0.494	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			670.82								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0115

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	2	1	0.50	2	1	0.50									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0116

NPS Station ID: CHIC0116
LAT/LON: 34.504198/ -96.969615
Agency: 11NPSWRD
Date Created: 09/20/97
Location: TRAVERTINE CREEK AT LINCOLN BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_7
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT LINCOLN BRIDGE APPROXIMATELY 200 FEET DOWNSTREAM FROM CHIC_HARP_6. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0116

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/30/76-06/23/77	12	14.5	15.625	23.	9.	21.642	4.652	9.6	13.	20.875	22.85
00300	OXYGEN, DISSOLVED MG/L	10/30/76-06/23/77	13	9.9	9.723	11.8	8.	1.204	1.097	8.16	8.8	10.2	11.64
00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-07/01/77	14	0.6	0.8	1.6	0.2	0.218	0.467	0.25	0.475	1.25	1.55
00340	COD, .25N K2CR2O7 MG/L	10/30/76-07/01/77	12	10.	19.583	79.	6.	460.992	21.471	6.	8.	26.5	67.3
00403	PH, LAB, STANDARD UNITS SU	10/30/76-07/01/77	12	8.1	8.017	8.9	6.8	0.254	0.504	7.01	7.85	8.275	8.72
00403	CONVERTED PH, LAB, STANDARD UNITS	10/30/76-07/01/77	12	8.1	7.655	8.9	6.8	0.397	0.63	7.01	7.85	8.275	8.72
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/30/76-07/01/77	12	0.008	0.022	0.158	0.001	0.002	0.044	0.002	0.005	0.014	0.12
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/77-01/21/77	1	250.	250.	250.	250.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	11/14/76-04/01/77	3	14.	11.333	18.	2.	69.333	8.327	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	5	0.08	0.223	0.67	0.	0.074	0.271	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	3	0.05	0.043	0.05	0.03	0.	0.012	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-07/01/77	5	0.42	0.625	1.735	0.	0.456	0.675	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	4	0.028	0.031	0.07	0.	0.001	0.029	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-03/09/77	4	209.5	216.	265.	180.	1420.667	37.692	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	7.	7.	7.	7.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1	16.	16.	16.	16.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/30/76-12/19/76	4	46500.	74500.	180000.	25000.	5049666666.667	71061.007	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	10/30/76-12/19/76	4	4.667	4.747	5.255	4.398	0.131	0.362	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			55849.212								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0116

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/30/76-06/23/77	12	230.	730.833	5200.	80.	2046244.697	1430.47	86.	155.	590.	3925.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/30/76-06/23/77	12	2.358	2.503	3.716	1.903	0.246	0.496	1.932	2.185	2.771	3.495
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			318.328								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-06/23/77	12	635.	1637.5	9800.	160.	7117420.455	2667.849	202.	300.	1900.	7490.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/30/76-06/23/77	12	2.802	2.895	3.991	2.204	0.263	0.513	2.286	2.477	3.277	3.791
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			785.037								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/30/76-06/23/77	13	1150.	1076.538	1600.	550.	192430.769	438.669	554.	592.5	1550.	1600.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	3	0.01	0.008	0.015	0.	0.	0.008	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0116

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	13	0	0.00	7	0	0.00	6	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	12	0	0.00	7	0	0.00	4	0	0.00	1	0	0.00			
		Other-Lo Lim.	6.5	12	0	0.00	7	0	0.00	4	0	0.00	1	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	3	0	0.00	2	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	4	0	0.00	3	0	0.00	1	0	0.00						
		Drinking Water	250.	4	1	0.25	3	0	0.00	1	1	1.00						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	1	1.00				1	1	1.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	4	4	1.00	4	4	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	12	9	0.75	6	4	0.67	6	5	0.83						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0117

NPS Station ID: CHIC0117
LAT/LON: 34.504309/ -96.971337
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Black Sulphur Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S9 /GOULD_13-15 /CNR-2 /1189
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle. Station is located at Black Sulphur Spring. This is Gould's Nos. 13-15 (presumably one or more of the Beach Springs). The water currently flows into a concrete collecting basin from which the water is pumped and chlorinated; on demand; to a spigot for public use. Excess water outfalls into Rock Creek. The spring is mineralized. This is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516).

Parameter Inventory for Station: CHIC0117

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/22/89-06/11/90	8	21.95	22.35	25.8	19.5	4.246	2.061	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	06/22/89-10/21/93	11	883.	893.182	1086.	818.	6218.964	78.86	818.	820.	927.	1054.6
00403	PH, LAB, STANDARD UNITS SU	07/03/89-10/21/93	10	7.4	7.44	7.7	7.2	0.018	0.135	7.22	7.4	7.525	7.69
00403	CONVERTED PH, LAB, STANDARD UNITS	07/03/89-10/21/93	10	7.4	7.422	7.7	7.2	0.019	0.136	7.22	7.4	7.525	7.69
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/03/89-10/21/93	10	0.04	0.038	0.063	0.02	0.	0.011	0.02	0.03	0.04	0.061
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	9	309.	308.778	319.	300.	34.444	5.869	300.	304.	312.5	319.
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	385.	385.	385.	385.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	05/28/90-10/21/93	6	0.195	0.16	0.26	0.	0.011	0.103	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	05/28/90-10/21/93	5	0.002	0.007	0.025	0.002	0.	0.01	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	06/22/89-10/21/93	10	0.1	0.097	0.11	0.08	0.	0.013	0.08	0.08	0.11	0.11
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	05/28/90-06/25/90	4	0.405	0.353	0.54	0.06	0.042	0.206	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	06/22/89-07/07/92	9	276.	294.556	436.	268.	2883.778	53.701	268.	270.	290.	436.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	64.5	64.5	64.5	64.5	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	29.6	29.6	29.6	29.6	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	121.	121.	121.	121.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	5.2	5.2	5.2	5.2	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	152.	152.	152.	152.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	06/22/89-10/21/93	8	22.	25.	38.	17.	50.571	7.111	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0117

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	156.	156.	156.	156.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	181.	181.	181.	181.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1 ##	7.5	7.5	7.5	7.5	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1 ##	16.5	16.5	16.5	16.5	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1 ##	2.6	2.6	2.6	2.6	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	3090.	3090.	3090.	3090.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1 ##	4.5	4.5	4.5	4.5	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1 ##	28.5	28.5	28.5	28.5	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	22.5	22.5	22.5	22.5	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	22.	22.	22.	22.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	950.	950.	950.	950.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	9	270.	290.333	419.	265.	2402.5	49.015	265.	268.5	287.	419.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	06/22/89-07/07/92	9	3.	4.222	17.	0.	28.444	5.333	0.	0.	6.	17.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	06/22/89-10/21/93	10	0.23	0.233	0.46	0.025	0.019	0.138	0.027	0.13	0.335	0.452
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	06/22/89-10/21/93	8	0.75	1.075	2.	0.4	0.408	0.639	**	**	**	**
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.	24.	24.	24.	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1 ##	0.003	0.003	0.003	0.003	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0117

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00403	PH, LAB	Other-Hi Lim.	9.	10	0	0.00	1	0	0.00	5	0	0.00	4	0	0.00			
		Other-Lo Lim.	6.5	10	0	0.00	1	0	0.00	5	0	0.00	4	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	5	0	0.00	1	0	0.00	4	0	0.00						
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	10	0	0.00	1	0	0.00	5	0	0.00	4	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	8	0	0.00	1	0	0.00	3	0	0.00	4	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	0 &	0	0.00												
		Drinking Water	5.	0 &	0	0.00												
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	0	0.00	1	0	0.00									
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0117

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	0 &	0	0.00												
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0118

NPS Station ID: CHIC0118 | LAT/LON: 34.504392/ -96.971476 | Agency: 11NPSWRD | Date Created: 09/20/97
Location: BLACK SULPHUR SPRING | FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING | STORET Station ID(s): CHIC_NPS_BLACSP
RMI-Indexes: | Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 | Depth of Water: 0 | Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI | Elevation: 940 | Water Body Id:
Minor Basin: WASHITA RIVER | ECO Region:
RF1 Index: 11130303 | RF1 Mile Point: 0.000 | Distance from RF1: 0.00 | On/Off RF1:
RF3 Index: 11130304000100.00 | RF3 Mile Point: 0.00 | Distance from RF3: 1.03 | On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT BLACK SULPHUR SPRING APPROXIMATELY A 1/4 MILE SOUTH OF SULPHUR AND EAST OF ROCK CREEK. SAMPLING FOR THIS SITE WAS DONE FROM FEBRUARY 1967 THROUGH MAY 1967. THE OBJECTIVE OF THE STUDY WAS TO SEE IF THE WATER WAS OF ADEQUATE BACTERIOLOGICAL QUALITY TO MEET THE U.S. PUBLIC HEALTH SERVICE DRINKING WATER STANDARDS. THE STUDY WAS DONE BY THE U.S. DEPARTMENT OF THE INTERIOR - FEDERAL WATER POLLUTION CONTROL ADMINISTRATION. RESULTS ARE IN THE 1968 REPORT "A STUDY OF THE BACTERIOLOGICAL CONTAMINATION OF HILLSIDE SPRING AT PLATT NATIONAL PARK". FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0118

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	02/14/67-05/22/67	37 ##	0.5	2.338	54.	0.5	78.779	8.876	0.5	0.5	0.5	2.2
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	02/14/67-05/22/67	37 ##	-0.301	-0.174	1.732	-0.301	0.178	0.421	-0.301	-0.301	-0.301	0.169
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			0.669								
31613	FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24HR	02/14/67-05/22/67	37 ##	0.5	0.676	7.	0.5	1.142	1.069	0.5	0.5	0.5	0.5
31613	LOG FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24	02/14/67-05/22/67	37 ##	-0.301	-0.27	0.845	-0.301	0.036	0.188	-0.301	-0.301	-0.301	-0.301
31613	GM FECAL COLIFORM,MEMBR FILTER,M-FC AGAR,44.5C,24H	GEOMETRIC MEAN =			0.537								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	0.5	0.568	3.	0.5	0.169	0.411	0.5	0.5	0.5	0.5
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/14/67-05/22/67	37 ##	-0.301	-0.28	0.477	-0.301	0.016	0.128	-0.301	-0.301	-0.301	-0.301
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			0.525								
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	22	39.5	378.682	6000.	3.	1618015.656	1272.012	4.3	19.75	162.75	742.
31749	LOG PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	03/13/67-05/22/67	22	1.597	1.718	3.778	0.477	0.588	0.767	0.631	1.295	2.209	2.787
31749	GM PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	GEOMETRIC MEAN =			52.208								
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	24	20.	308.563	5550.	0.5	1262907.637	1123.792	1.5	5.25	152.	441.
31751	LOG PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	03/13/67-05/22/67	24	1.301	1.382	3.744	-0.301	0.927	0.963	0.151	0.719	2.18	2.642
31751	GM PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	GEOMETRIC MEAN =			24.11								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0118

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	37	0	0.00	10	0	0.00	27	0	0.00						
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	37	0	0.00	10	0	0.00	27	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0119

NPS Station ID: CHIC0119 LAT/LON: 34.504420/ -96.971087 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CK AT SANDY BEACH UPSTREAM OF TRAVERTINE CK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_13
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 930 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK AT SANDY BEACH APPROXIMATELY 50 FEET UPSTREAM FROM THE TRAVERTINE CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 1975 AND OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0119

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-01/09/76	4	35.	38.25	83.	0.	1228.917	35.056	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-01/09/76	4	18000.	94250.	340000.	1000.	26938250000.	164128.76	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-01/09/76	4	4.22	4.243	5.531	3.	1.09	1.044	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			17486.5								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	4	2200.	10875.	39000.	100.	354702500.	18833.547	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	4	3.102	3.199	4.591	2.	1.298	1.139	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1580.506								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0119

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	4	4	1.00	4	4	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0120

NPS Station ID: CHIC0120 LAT/LON: 34.504448/ -96.968476 Agency: 11NPSWRD Date Created: 09/20/97
Location: DISCHARGE FROM CULVERT 50 FT EAST OF BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /CANAL/TYPA/AMBNT STORET Station ID(s): CHIC_SCH_T4_2
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT THE DISCHARGE POINT APPROXIMATELY 1000 FEET SOUTH OF THE TOWN OF SULPHUR AND 50 FEET EAST OF BRIDGE. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0120

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	2	127.5	127.5	180.	75.	5512.5	74.246	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	2	126000.	126000.	230000.	22000.	21632000000.	147078.21	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	12/22/75-01/09/76	2	4.852	4.852	5.362	4.342	0.519	0.721	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			71133.677								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	78350.	78350.	150000.	6700.	10267445000.	101328.402	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	4.501	4.501	5.176	3.826	0.911	0.955	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			31701.735								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0120

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	2	2	1.00	2	2	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0121

NPS Station ID: CHIC0121
LAT/LON: 34.504448/ -96.968616
Agency: 112WRD
Date Created: 01/30/93
Location: 01S-03E-03 AAAD 1 CULVERT E. OF HWY 177
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343016096580701
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 2.70
On/Off RF1:
RF3 Index: 11130303000701.97
RF3 Mile Point: 6.25
Distance from RF3: 0.21
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0121

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/29/76	3	24.	24.	24.5	23.5	0.25	0.5	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/29/76	3	8.9	8.7	10.4	6.8	3.27	1.808	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/18/76-06/29/76	2	48.35	48.35	87.	9.7	2987.645	54.659	**	**	**	**
00400	PH (STANDARD UNITS)	06/14/76-06/29/76	3	8.3	8.233	9.	7.4	0.643	0.802	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/14/76-06/29/76	3	8.3	7.816	9.	7.4	0.905	0.951	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-06/29/76	3	0.005	0.015	0.04	0.001	0.	0.021	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-06/29/76	2	241.	241.	344.	138.	21218.	145.664	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/29/76	3	47.	76.	173.	8.	7437.	86.238	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/29/76	3	15.	25.667	58.	4.	814.333	28.537	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/14/76	1	500.	500.	500.	500.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0121

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	0	0.00				3	0	0.00						
00400	PH	Other-Hi Lim.	9.	3	1	0.33				3	1	0.33						
		Other-Lo Lim.	6.5	3	0	0.00				3	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00				3	0	0.00						
		Drinking Water	250.	3	0	0.00				3	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0122

NPS Station ID: CHIC0122 LAT/LON: 34.504477/ -96.968032 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK EAST OF CHIC_SCH_T4_2 FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T4_4
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 1000 FEET SOUTH OF THE TOWN OF SULPHUR AND 50-75 YARDS EAST OF CHIC_SCH_T4_2. SAMPLING FOR THIS SITE WAS DONE ON DECEMBER 22 1975 AND JANUARY 9 1976 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0122

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	12/22/75-01/09/76	2 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			1.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/22/75-01/09/76	2	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0122

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	2	0	0.00	2	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0123

NPS Station ID: CHIC0123
LAT/LON: 34.504477/ -96.969031
Agency: 11NPSWRD
Date Created: 09/20/97
Location: TRAVERTINE CREEK AT HWY 177
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_6
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT HIGHWAY 177 APPROXIMATELY 400 FEET DOWNSTREAM FROM CHIC_HARP_3. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0123

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	2	23.5	23.5	24.5	22.5	2.	1.414	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	2	7.6	7.6	8.1	7.1	0.5	0.707	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	0.55	0.55	0.8	0.3	0.125	0.354	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	09/05/76-09/05/76	1	32.	32.	32.	32.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	09/05/76-09/18/76	2	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	09/05/76-09/18/76	2	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/18/76	2	0.013	0.013	0.013	0.013	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	1	10000.	10000.	10000.	10000.	0.	0.	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-09/18/76	1	4.	4.	4.	4.	0.	0.	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			10000.								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	3000.	3000.	3000.	3000.	0.	0.	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	3.477	3.477	3.477	3.477	0.	0.	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			3000.								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	2	500.	500.	500.	500.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0123

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00	1	0	0.00				1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0124

NPS Station ID: CHIC0124 LAT/LON: 34.504503/ -96.968143 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK NEAR CULVERT EAST OF HWY 177 FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_3
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK IN THE VERY NORTHERN PART OF CHICKASAW NATIONAL RECREATION AREA NEAR THE CULVERT EAST OF HIGHWAY 177. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0124

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-12/19/76	4	23.75	20.75	24.5	11.	42.417	6.513	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/29/76	3	8.9	8.7	10.4	6.8	3.27	1.808	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-01/21/77	2	19.2	19.2	24.6	13.8	58.32	7.637	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/18/76-01/21/77	4	42.	45.25	87.	10.	1268.917	35.622	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/14/76-01/21/77	6	7.95	8.017	9.	7.4	0.342	0.585	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-01/21/77	6	7.947	7.778	9.	7.4	0.41	0.64	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-01/21/77	6	0.011	0.017	0.04	0.001	0.	0.016	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-01/21/77	3	298.	260.	344.	138.	11692.	108.13	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-01/21/77	4	27.5	59.	173.	8.	6114.	78.192	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-01/21/77	4	36.5	38.75	78.	4.	1227.583	35.037	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	1	1460000.	1460000.	1460000.	1460000.	0.	0.	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-09/18/76	1	6.164	6.164	6.164	6.164	0.	0.	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			1460000.								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-01/21/77	3	155000.	176666.667	329000.	46000.	20374333333.333	142738.689	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-01/21/77	3	5.19	5.123	5.517	4.663	0.186	0.431	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			132870.471								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/19/76-01/21/77	2	31000.	31000.	37000.	25000.	72000000.	8485.281	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	12/19/76-01/21/77	2	4.483	4.483	4.568	4.398	0.014	0.12	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			30413.813								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-12/19/76	3	500.	600.	800.	500.	30000.	173.205	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0124

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	0	0.00				3	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	6	1	0.17	3	0	0.00	3	1	0.33						
		Other-Lo Lim.	6.5	6	0	0.00	3	0	0.00	3	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	4	0	0.00	1	0	0.00	3	0	0.00						
		Drinking Water	250.	4	0	0.00	1	0	0.00	3	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	3	3	1.00	3	3	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0125

NPS Station ID: CHIC0125 LAT/LON: 34.504615/ -96.967003 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK AT CENTRAL CAMPGROUND SWIM AREA FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T2_8
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY 100 FEET SOUTH OF THE CENTRAL CAMPGROUND AT THE CENTRAL CAMPGROUND SWIM AREA. SAMPLING FOR THIS SITE WAS DONE ON AUGUST 5 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0125

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	08/05/75-08/05/75	1	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	08/05/75-08/05/75	1	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0125

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0126

NPS Station ID: CHIC0126 LAT/LON: 34.504643/ -96.940948 Agency: 11NPSWRD Date Created: 09/20/97
Location: ANTELOPE SPRINGS NEAR TRAVERTINE CREEK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_HARP_8 /SCH_ANTSP
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1080 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT ANTELOPE SPRINGS APPROX. 500 FT NORTH OF TRAVERTINE CREEK AND 1 MILE EAST OF THE TOWN OF SULPHUR. THIS SITE IS THE SAME AS CHIC_SCH_ANTSP. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0126

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-10/30/76	2	16.75	16.75	19.	14.5	10.125	3.182	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	10/16/76-11/14/76	3	7.5	6.667	9.4	3.1	10.443	3.232	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	10/30/76-11/14/76	2	0.6	0.6	0.9	0.3	0.18	0.424	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	10/30/76-11/14/76	2	37.5	37.5	71.	4.	2244.5	47.376	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	10/16/76-11/14/76	3	8.1	8.267	9.1	7.6	0.583	0.764	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	10/16/76-11/14/76	3	8.1	7.947	9.1	7.6	0.736	0.858	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/16/76-11/14/76	3	0.008	0.011	0.025	0.001	0.	0.013	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-11/14/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-11/14/76	1	0.06	0.06	0.06	0.06	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-11/14/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-11/14/76	1	0.035	0.035	0.035	0.035	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/76-10/30/76	1	4.	4.	4.	4.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-11/14/76	3	2600.	3966.667	7100.	2200.	7403333.333	2720.907	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	10/16/76-11/14/76	3	3.415	3.536	3.851	3.342	0.076	0.275	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			3437.305								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-11/14/76	3	20.	23.333	50.	0.	633.333	25.166	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-11/14/76	3	1.301	1.	1.699	0.	0.79	0.889	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			10.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-11/14/76	3	10.	80.	220.	10.	14700.	121.244	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-11/14/76	3	1.	1.447	2.342	1.	0.601	0.775	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			28.02								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-11/14/76	3	550.	550.	550.	550.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0126

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-11/14/76	1	0.005	0.005	0.005	0.005	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0126

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	1	0.33	3	1	0.33									
00403	PH, LAB	Other-Hi Lim.	9.	3	1	0.33	3	1	0.33									
		Other-Lo Lim.	6.5	3	0	0.00	3	0	0.00									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	3	3	1.00	3	3	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	3	0	0.00	3	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0127

NPS Station ID: CHIC0127 LAT/LON: 34.504643/ -96.940948 Agency: 11NPSWRD Date Created: 09/27/97
Location: ANTELOPE SPRINGS NEAR TRAVERTINE CREEK FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING STORET Station ID(s): CHIC_SCH_ANTSP /HARP_8
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 1080 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS AT ANTELOPE SPRINGS APPROXIMATELY 500 FEET NORTH OF TRAVERTINE CREEK AND 1 MILE EAST OF THE TOWN OF SULPHUR. THIS SITE IS THE SAME AS CHIC_HARP_8. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL STREP; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THIS STUDY WERE PUBLISHED IN THE MARCH 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RON PARKER- RESOURCE MANAGEMENT SPECIALIST AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0127

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-10/18/75	1	8.	8.	8.	8.	0.	0.	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			1.								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-10/18/75	1	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0127

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503 COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0128

NPS Station ID: CHIC0128
LAT/LON: 34.504670/ -96.941031
Agency: 11NPSWRD
Date Created: 05/31/97
Location: Antelope Spring
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/SPRING
STORET Station ID(s): CHIC_S1 /GOULD_1 /CNR-13 /1198
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 1078
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/1. Station is known as Antelope Spring and is a major contributing source to Travertine Creek - located approximately 0.1 mile below Buffalo Spring. Samples were collected where the main flow exits the rock wall. This freshwater spring is Gould's No. 1 which is one of the original 33 springs identified by Gould in 1906 for which Chickasaw National Recreation Area was established. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. This station was known as TRAV2 in the park logs. For additional information on the station and data in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	81	17.9	17.76	20.1	12.3	0.676	0.822	16.96	17.4	18.2	18.48
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	82	571.5	568.207	652.	340.	2274.66	47.693	520.	547.75	602.5	619.8
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	80	0.6	0.844	9.8	0.1	2.013	1.419	0.41	0.5	0.6	0.79
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	82	7.3	7.382	8.4	6.9	0.058	0.24	7.2	7.3	7.4	7.57
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	82	7.3	7.335	8.4	6.9	0.06	0.245	7.2	7.3	7.4	7.57
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	82	0.05	0.046	0.126	0.004	0.	0.018	0.027	0.04	0.05	0.063
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	81	324.	324.21	351.	297.	62.118	7.881	318.	321.	327.5	334.
00440	BICARBONATE ION (MG/L AS HCO3)	10/21/93-10/21/93	1	418.	418.	418.	418.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	81	0.02	0.03	0.16	0.	0.001	0.027	0.01	0.015	0.03	0.068
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	60	0.002	0.002	0.025	0.	0.	0.003	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	82	0.185	0.204	0.71	0.002	0.008	0.09	0.12	0.16	0.24	0.294
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10/21/93-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	59	0.1	0.109	0.31	0.02	0.003	0.057	0.05	0.06	0.14	0.19
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	81	335.	331.988	402.	237.	460.712	21.464	319.2	329.	340.	348.
00916	CALCIUM, TOTAL (MG/L AS CA)	10/21/93-10/21/93	1	68.3	68.3	68.3	68.3	0.	0.	**	**	**	**
00927	MAGNESIUM, TOTAL (MG/L AS MG)	10/21/93-10/21/93	1	30.6	30.6	30.6	30.6	0.	0.	**	**	**	**
00929	SODIUM, TOTAL (MG/L AS NA)	10/21/93-10/21/93	1	76.	76.	76.	76.	0.	0.	**	**	**	**
00937	POTASSIUM, TOTAL MG/L AS K)	10/21/93-10/21/93	1	3.8	3.8	3.8	3.8	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/21/93-10/21/93	1	3.	3.	3.	3.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	80	18.	17.7	24.	12.	6.947	2.636	15.	16.	20.	21.
01002	ARSENIC, TOTAL (UG/L AS AS)	10/21/93-10/21/93	1 ##	11.	11.	11.	11.	0.	0.	**	**	**	**
01007	BARIUM, TOTAL (UG/L AS BA)	10/21/93-10/21/93	1	162.	162.	162.	162.	0.	0.	**	**	**	**
01012	BERYLLIUM, TOTAL (UG/L AS BE)	10/21/93-10/21/93	1 ##	0.25	0.25	0.25	0.25	0.	0.	**	**	**	**
01022	BORON, TOTAL (UG/L AS B)	10/21/93-10/21/93	1	82.	82.	82.	82.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	10/21/93-10/21/93	1	2.	2.	2.	2.	0.	0.	**	**	**	**
01037	COBALT, TOTAL (UG/L AS CO)	10/21/93-10/21/93	1 ##	2.	2.	2.	2.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	10/21/93-10/21/93	1 ##	17.	17.	17.	17.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	10/21/93-10/21/93	1	19.	19.	19.	19.	0.	0.	**	**	**	**
01055	MANGANESE, TOTAL (UG/L AS MN)	10/21/93-10/21/93	1	40.4	40.4	40.4	40.4	0.	0.	**	**	**	**
01059	THALLIUM, TOTAL (UG/L AS TL)	10/21/93-10/21/93	1 ##	5.5	5.5	5.5	5.5	0.	0.	**	**	**	**
01062	MOLYBDENUM, TOTAL (UG/L AS MO)	10/21/93-10/21/93	1	4.	4.	4.	4.	0.	0.	**	**	**	**
01064	TELLURIUM, TOTAL IN WHOLE WATER SAMPLE (UG/L)	10/21/93-10/21/93	1	44.	44.	44.	44.	0.	0.	**	**	**	**
01067	NICKEL, TOTAL (UG/L AS NI)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01077	SILVER, TOTAL (UG/L AS AG)	10/21/93-10/21/93	1	8.7	8.7	8.7	8.7	0.	0.	**	**	**	**
01082	STRONTIUM, TOTAL (UG/L AS SR)	10/21/93-10/21/93	1	1900.	1900.	1900.	1900.	0.	0.	**	**	**	**
01087	VANADIUM, TOTAL (UG/L AS V)	10/21/93-10/21/93	1	14.	14.	14.	14.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	10/21/93-10/21/93	1	39.	39.	39.	39.	0.	0.	**	**	**	**
01097	ANTIMONY, TOTAL (UG/L AS SB)	10/21/93-10/21/93	1	25.	25.	25.	25.	0.	0.	**	**	**	**
01105	ALUMINUM, TOTAL (UG/L AS AL)	10/21/93-10/21/93	1	83.	83.	83.	83.	0.	0.	**	**	**	**
01127	GERMANIUM, TOTAL (UG/L AS GE)	10/21/93-10/21/93	1 ##	22.5	22.5	22.5	22.5	0.	0.	**	**	**	**
01132	LITHIUM, TOTAL (UG/L AS LI)	10/21/93-10/21/93	1	18.	18.	18.	18.	0.	0.	**	**	**	**
01147	SELENIUM, TOTAL (UG/L AS SE)	10/21/93-10/21/93	1	40.	40.	40.	40.	0.	0.	**	**	**	**
01152	TITANIUM, TOTAL (UG/L AS TI)	10/21/93-10/21/93	1 ##	7.	7.	7.	7.	0.	0.	**	**	**	**
34423	METHYLENE CHLORIDE TOTWUG/L	10/21/93-10/21/93	1	1460.	1460.	1460.	1460.	0.	0.	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	81	332.	327.049	356.	230.	453.423	21.294	314.2	324.5	337.	341.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	81	0.	4.938	75.	0.	146.709	12.112	0.	0.	4.	16.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	64	0.1	0.141	0.47	0.02	0.011	0.107	0.05	0.07	0.158	0.325
71870	BROMIDE (MG/L AS BR)	10/21/93-10/21/93	1	1.56	1.56	1.56	1.56	0.	0.	**	**	**	**
71875	HYDROGEN SULFIDE (MG/L)	10/21/93-10/21/93	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
71900	MERCURY, TOTAL (UG/L AS HG)	10/21/93-10/21/93	1 ##	24.5	24.5	24.5	24.5	0.	0.	**	**	**	**
74010	IRON, TOTAL (MG/L AS FE)	10/21/93-10/21/93	1	0.24	0.24	0.24	0.24	0.	0.	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	81	1.1	1.527	8.2	0.3	1.836	1.355	0.5	0.8	1.85	2.48

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0128

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	78	0.98	36	36	1.00	25	23	0.92	19	19	1.00			
00403	PH, LAB	Other-Hi Lim.	9.	82	0	0.00	37	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	82	0	0.00	37	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	60	0	0.00	27	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	82	0	0.00	37	0	0.00	25	0	0.00	20	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	80	0	0.00	37	0	0.00	24	0	0.00	19	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	1	0	0.00	1	0	0.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
01007	BARIUM, TOTAL	Drinking Water	2000.	1	0	0.00	1	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	1	0	0.00	1	0	0.00									
		Drinking Water	4.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00	1	0	0.00									
		Drinking Water	5.	1	0	0.00	1	0	0.00									
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00	1	0	0.00									
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00	1	0	0.00									
		Drinking Water	1300.	1	0	0.00	1	0	0.00									
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00	1	0	0.00									
		Drinking Water	15.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0128

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
01059	THALLIUM, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	2.	0 &	0	0.00												
01067	NICKEL, TOTAL	Fresh Acute	1400.	1	0	0.00	1	0	0.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01077	SILVER, TOTAL	Fresh Acute	4.1	1	1	1.00	1	1	1.00									
		Drinking Water	100.	1	0	0.00	1	0	0.00									
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00	1	0	0.00									
		Drinking Water	5000.	1	0	0.00	1	0	0.00									
01097	ANTIMONY, TOTAL	Fresh Acute	88.	1	0	0.00	1	0	0.00									
		Drinking Water	6.	1	1	1.00	1	1	1.00									
01147	SELENIUM, TOTAL	Fresh Acute	20.	1	1	1.00	1	1	1.00									
		Drinking Water	50.	1	0	0.00	1	0	0.00									
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	1	1	1.00	1	1	1.00									
71900	MERCURY, TOTAL	Fresh Acute	2.4	0 &	0	0.00												
		Drinking Water	2.	0 &	0	0.00												
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	6	17.95	17.917	18.2	17.6	0.054	0.232	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	6	613.	614.5	625.	604.	71.9	8.479	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	6	0.55	0.583	0.7	0.5	0.01	0.098	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	6	7.25	7.2	7.3	6.9	0.024	0.155	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	6	7.247	7.173	7.3	6.9	0.025	0.158	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	6	0.057	0.067	0.126	0.05	0.001	0.03	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	323.5	322.833	326.	318.	10.567	3.251	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.01	0.015	0.03	0.01	0.	0.008	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	6	0.001	0.001	0.002	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	6	0.16	0.177	0.22	0.15	0.001	0.03	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	6	0.115	0.117	0.2	0.06	0.002	0.047	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	6	341.	340.5	354.	330.	65.5	8.093	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	6	18.5	18.5	21.	15.	4.3	2.074	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	338.	338.167	346.	330.	32.167	5.672	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	6	0.	2.333	8.	0.	13.467	3.67	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	6	1.65	1.833	4.	0.3	2.015	1.419	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	17.5	17.642	18.5	16.9	0.359	0.599	16.9	17.	18.25	18.47
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	559.	562.167	614.	488.	1648.697	40.604	496.1	536.5	608.75	613.4
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	0.6	0.608	0.8	0.5	0.006	0.079	0.5	0.6	0.6	0.77
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	7.4	7.358	7.4	7.3	0.003	0.051	7.3	7.3	7.4	7.4
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	7.4	7.356	7.4	7.3	0.003	0.052	7.3	7.3	7.4	7.4
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.04	0.044	0.05	0.04	0.	0.005	0.04	0.04	0.05	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	322.	324.083	333.	319.	16.992	4.122	319.3	321.25	327.5	331.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.025	0.028	0.07	0.	0.	0.019	0.003	0.013	0.04	0.061
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	12	0.002	0.002	0.007	0.001	0.	0.002	0.001	0.001	0.003	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.185	0.204	0.46	0.14	0.007	0.086	0.14	0.155	0.2	0.394
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.06	0.077	0.17	0.02	0.002	0.047	0.026	0.04	0.105	0.164
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	335.5	336.5	360.	315.	162.091	12.731	317.7	329.75	339.5	359.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	15.	15.917	20.	13.	6.083	2.466	13.	14.	17.75	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	332.5	330.	340.	315.	70.	8.367	315.3	324.25	336.75	339.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	6.5	44.	0.	235.	15.33	0.	0.	0.	41.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	1.	0.933	1.9	0.3	0.181	0.425	0.33	0.7	1.	1.75

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	17.9	17.833	18.5	16.8	0.244	0.494	16.95	17.45	18.25	18.47
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	571.5	572.25	637.	520.	1300.932	36.068	525.1	538.75	597.75	632.5
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	0.6	0.625	0.9	0.5	0.013	0.114	0.5	0.6	0.6	0.87
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	7.3	7.3	7.5	7.1	0.011	0.104	7.13	7.225	7.375	7.47
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	7.3	7.288	7.5	7.1	0.011	0.105	7.13	7.225	7.375	7.47
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.05	0.051	0.079	0.032	0.	0.013	0.034	0.042	0.06	0.075
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	322.5	326.167	344.	317.	72.879	8.537	317.6	320.25	330.75	342.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.02	0.035	0.16	0.	0.002	0.046	0.	0.013	0.03	0.139
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.185	0.208	0.4	0.002	0.012	0.109	0.025	0.173	0.293	0.382
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.09	0.096	0.15	0.05	0.001	0.036	0.05	0.063	0.128	0.15

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	335.	326.833	345.	237.	819.606	28.629	264.6	330.	337.75	342.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	18.	18.333	22.	12.	9.515	3.085	12.9	16.25	21.5	22.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	333.	325.417	345.	230.	922.083	30.366	259.7	330.	336.5	342.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	1.417	7.	0.	5.72	2.392	0.	0.	2.75	6.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.105	0.153	0.42	0.04	0.014	0.119	0.046	0.083	0.223	0.396
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	1.3	1.467	2.8	0.3	0.81	0.9	0.33	0.725	2.375	2.71

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	18.1	18.108	18.8	17.5	0.197	0.444	17.53	17.65	18.525	18.77
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	559.	538.75	584.	340.	4374.932	66.143	394.	528.25	576.5	583.7
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	0.6	0.592	0.8	0.4	0.019	0.138	0.4	0.425	0.7	0.77
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	7.3	7.292	7.4	7.1	0.004	0.067	7.16	7.3	7.3	7.37
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	7.3	7.286	7.4	7.1	0.004	0.067	7.16	7.3	7.3	7.37
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.05	0.052	0.079	0.04	0.	0.009	0.043	0.05	0.05	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	324.	327.167	351.	320.	75.606	8.695	320.3	322.	331.25	345.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.025	0.023	0.04	0.	0.	0.012	0.003	0.013	0.03	0.04
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	12	0.002	0.002	0.003	0.	0.	0.001	0.	0.002	0.003	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.195	0.206	0.34	0.11	0.007	0.082	0.11	0.125	0.265	0.34
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.115	0.15	0.31	0.06	0.007	0.085	0.063	0.08	0.198	0.304
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	334.	322.583	342.	240.	900.811	30.014	253.8	323.	337.75	341.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	10	20.	19.9	24.	15.	8.767	2.961	15.2	17.75	23.	23.9
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	333.	317.833	342.	240.	1297.061	36.015	241.2	320.5	337.5	341.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	4.75	42.	0.	149.659	12.234	0.	0.	2.25	33.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.08	0.106	0.3	0.02	0.007	0.082	0.026	0.06	0.115	0.282
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	1.1	1.433	3.4	0.5	0.653	0.808	0.59	0.9	1.85	3.07

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	17.75	17.783	18.5	16.9	0.258	0.508	17.02	17.4	18.275	18.44
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	582.	580.167	617.	538.	529.788	23.017	544.3	560.5	598.25	614.3
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	0.6	0.583	0.8	0.4	0.012	0.111	0.4	0.525	0.6	0.77
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	7.3	7.342	7.6	7.1	0.015	0.124	7.16	7.3	7.4	7.57
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	7.3	7.326	7.6	7.1	0.016	0.125	7.16	7.3	7.4	7.57
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.05	0.047	0.079	0.025	0.	0.013	0.027	0.04	0.05	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	324.	325.25	335.	319.	24.205	4.92	319.6	321.25	326.75	334.7
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.02	0.028	0.08	0.	0.001	0.023	0.003	0.02	0.03	0.077
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	12	0.002	0.002	0.002	0.001	0.	0.001	0.001	0.001	0.002	0.002
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.18	0.226	0.71	0.1	0.026	0.161	0.106	0.145	0.245	0.578
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	12	0.1	0.102	0.16	0.05	0.001	0.036	0.053	0.07	0.125	0.16
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	337.5	332.417	348.	288.	252.992	15.906	298.2	329.	343.	347.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.	17.25	21.	13.	5.295	2.301	13.6	15.5	18.	21.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	330.	328.	345.	284.	233.636	15.285	295.4	324.75	336.75	342.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	4.417	24.	0.	61.72	7.856	0.	0.	4.	21.9
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.105	0.159	0.42	0.06	0.014	0.117	0.06	0.083	0.228	0.396
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	1.	1.133	1.8	0.5	0.213	0.462	0.53	0.75	1.625	1.8

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	17.85	17.508	20.1	12.3	3.212	1.792	13.8	17.5	18.	19.53
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	12	573.5	556.	652.	416.	4690.364	68.486	428.6	522.75	603.75	642.7
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	11	0.6	2.4	9.8	0.1	12.744	3.57	0.16	0.5	3.9	9.6
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	12	7.45	7.667	8.4	7.1	0.202	0.45	7.16	7.3	8.1	8.37
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	12	7.447	7.497	8.4	7.1	0.234	0.483	7.16	7.3	8.1	8.37
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	12	0.036	0.032	0.079	0.004	0.001	0.024	0.004	0.008	0.05	0.071
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	324.	321.333	336.	297.	124.788	11.171	298.8	318.5	327.5	334.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	11	0.03	0.043	0.14	0.01	0.001	0.038	0.01	0.02	0.06	0.126
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	5	0.001	0.001	0.002	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	12	0.235	0.221	0.32	0.12	0.003	0.056	0.132	0.165	0.25	0.305
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/01/87-05/13/92	5	0.14	0.128	0.18	0.06	0.002	0.048	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	335.	338.	402.	302.	546.909	23.386	308.6	327.	341.5	386.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	12	17.5	17.5	20.	12.	5.545	2.355	13.2	16.	19.75	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	329.5	327.083	350.	300.	227.174	15.072	300.6	317.	337.5	347.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	10.917	75.	0.	495.538	22.261	0.	0.	14.5	61.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.105	0.132	0.47	0.02	0.014	0.118	0.029	0.058	0.163	0.386
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	2.	2.933	8.2	0.5	7.281	2.698	0.59	1.025	4.35	8.17

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	12	17.9	17.758	18.5	16.9	0.275	0.525	16.99	17.225	18.175	18.44
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	13	569.	566.538	621.	503.	1075.103	32.789	506.6	551.5	586.	614.6
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	12	0.6	0.575	0.7	0.4	0.006	0.075	0.43	0.525	0.6	0.67
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	13	7.4	7.415	8.	7.1	0.046	0.215	7.18	7.3	7.5	7.84
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	13	7.4	7.375	8.	7.1	0.048	0.219	7.18	7.3	7.5	7.84
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	13	0.04	0.042	0.079	0.01	0.	0.017	0.016	0.032	0.05	0.068
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	323.5	322.25	336.	307.	98.386	9.919	307.3	312.75	331.5	335.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	13	0.02	0.029	0.08	0.	0.	0.022	0.004	0.015	0.04	0.072
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	1 ##	0.025	0.025	0.025	0.025	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	13	0.16	0.178	0.28	0.12	0.002	0.045	0.124	0.145	0.205	0.26
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	12	335.	332.	361.	285.	401.636	20.041	295.2	321.25	347.	357.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	13	17.	17.385	22.	15.	4.756	2.181	15.	15.5	18.	21.6
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	328.5	327.833	356.	281.	349.424	18.693	292.4	321.25	339.5	353.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	12	0.	4.167	20.	0.	46.697	6.834	0.	0.	5.	18.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	13	0.12	0.161	0.39	0.025	0.013	0.114	0.043	0.08	0.275	0.358
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	12	1.35	1.292	2.1	0.5	0.31	0.557	0.53	0.725	1.775	2.04

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	3	17.2	17.167	17.4	16.9	0.063	0.252	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	3	614.	609.667	621.	594.	196.333	14.012	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	3	0.6	0.6	0.6	0.6	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	3	7.4	7.4	7.5	7.3	0.01	0.1	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	3	7.4	7.392	7.5	7.3	0.01	0.1	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	3	0.04	0.041	0.05	0.032	0.	0.009	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	323.	323.	328.	318.	25.	5.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.03	0.027	0.03	0.02	0.	0.006	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	3	0.17	0.187	0.24	0.15	0.002	0.047	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	3	331.	329.333	335.	322.	44.333	6.658	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	3	17.	17.333	18.	17.	0.333	0.577	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	331.	329.333	335.	322.	44.333	6.658	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	3	0.	0.	0.	0.	0.	0.	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.09	0.1	0.15	0.06	0.002	0.046	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	3	0.9	0.8	0.9	0.6	0.03	0.173	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	36	17.5	17.628	18.8	17.2	0.121	0.348	17.3	17.4	17.875	18.03
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	37	583.	573.216	625.	340.	2932.674	54.154	524.	544.	614.	621.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	36	0.6	0.542	0.7	0.1	0.014	0.118	0.4	0.5	0.6	0.7
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	37	7.3	7.359	7.6	6.9	0.015	0.121	7.3	7.3	7.4	7.5
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	37	7.3	7.341	7.6	6.9	0.015	0.123	7.3	7.3	7.4	7.5
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	37	0.05	0.046	0.126	0.025	0.	0.016	0.032	0.04	0.05	0.05
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	323.	322.806	334.	312.	16.618	4.077	317.7	321.25	325.5	326.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	37	0.02	0.021	0.06	0.	0.	0.012	0.01	0.01	0.03	0.032
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	27	0.002	0.003	0.025	0.001	0.	0.005	0.001	0.001	0.002	0.005
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	37	0.18	0.223	0.71	0.12	0.012	0.109	0.148	0.16	0.25	0.34
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	36	334.5	334.139	348.	320.	44.18	6.647	323.4	330.	339.5	342.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	37	18.	18.027	24.	13.	5.138	2.267	15.	17.	19.5	21.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	334.5	334.139	348.	320.	44.18	6.647	323.4	330.	339.5	342.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	36	0.	0.	0.	0.	0.	0.	0.	0.	0.	0.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	36	1.	1.417	5.1	0.3	0.999	0.999	0.57	0.8	1.875	2.48

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	25	17.9	17.488	18.7	12.3	1.541	1.241	16.86	16.9	18.1	18.54
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	25	562.	566.36	652.	515.	1009.657	31.775	520.6	546.5	588.	604.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	25	0.6	1.332	9.8	0.4	5.781	2.404	0.6	0.6	0.75	4.06
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	25	7.3	7.416	8.3	7.2	0.069	0.262	7.26	7.3	7.4	7.92
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	25	7.3	7.367	8.3	7.2	0.071	0.267	7.26	7.3	7.4	7.92
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	25	0.05	0.043	0.063	0.005	0.	0.014	0.013	0.04	0.05	0.055
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	330.	329.4	351.	297.	98.	9.899	321.	324.5	334.5	341.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.04	0.042	0.16	0.	0.001	0.036	0.	0.02	0.065	0.084
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	19	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.003	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	25	0.19	0.18	0.34	0.002	0.005	0.067	0.107	0.13	0.225	0.258
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	25	330.	324.64	402.	237.	1272.74	35.675	267.	317.	344.	359.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	24	18.	18.125	23.	12.	11.505	3.392	12.5	16.25	21.	22.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	322.	310.24	337.	230.	929.357	30.485	242.4	307.	328.5	332.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	25	7.	14.4	75.	0.	346.833	18.623	0.	0.	22.	42.8
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	25	1.1	1.352	3.4	0.3	0.631	0.794	0.4	0.6	1.9	2.44

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/01/87-03/03/94	20	18.3	18.34	20.1	18.	0.191	0.437	18.1	18.1	18.375	18.5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/01/87-03/03/94	20	580.	561.25	637.	416.	2760.934	52.545	462.5	542.75	589.5	611.2
00300	OXYGEN, DISSOLVED MG/L	07/01/87-03/03/94	19	0.6	0.774	3.9	0.5	0.58	0.761	0.5	0.5	0.7	0.8
00403	PH, LAB, STANDARD UNITS SU	07/01/87-03/03/94	20	7.3	7.38	8.4	7.1	0.129	0.359	7.1	7.125	7.375	8.09
00403	CONVERTED PH, LAB, STANDARD UNITS	07/01/87-03/03/94	20	7.3	7.29	8.4	7.1	0.138	0.371	7.1	7.125	7.375	8.09
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/01/87-03/03/94	20	0.05	0.051	0.079	0.004	0.001	0.023	0.008	0.042	0.075	0.079
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	20	320.5	320.25	333.	303.	51.461	7.174	307.1	319.25	324.	328.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/01/87-03/03/94	19	0.02	0.029	0.14	0.	0.001	0.031	0.	0.01	0.03	0.07
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/01/87-10/21/93	14	0.002	0.001	0.002	0.	0.	0.001	0.001	0.001	0.002	0.002
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/01/87-03/03/94	20	0.19	0.199	0.4	0.08	0.005	0.071	0.112	0.153	0.248	0.27
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/01/87-03/03/94	20	337.5	337.3	361.	302.	141.274	11.886	321.8	335.	341.5	353.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/01/87-03/03/94	19	16.	16.526	20.	13.	3.596	1.896	15.	15.	18.	20.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	20	336.	335.3	356.	302.	115.168	10.732	321.8	333.	338.	349.6

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0128

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/01/87-03/03/94	20	0.	2.	8.	0.	6.526	2.555	0.	0.	4.	5.9
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/01/87-03/03/94	20	1.35	1.945	8.2	0.3	4.845	2.201	0.52	0.8	1.7	7.57

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0129

NPS Station ID: CHIC0129 LAT/LON: 34.504698/ -96.950337 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK BELOW THE NATURE CENTER FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T2_11
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK APPROXIMATELY A 1/2 MILE NORTHEAST OF THE COLD CREEK CAMPGROUND BELOW THE NATURE CENTER. SAMPLING FOR THIS SITE WAS DONE IN SEPTEMBER 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL AND FECAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY M. SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0129

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	09/12/75-09/14/75	2	2400.	2400.	2700.	2100.	180000.	424.264	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	09/12/75-09/14/75	2	3.377	3.377	3.431	3.322	0.006	0.077	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			2381.176								
31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	1	400.	400.	400.	400.	0.	0.	**	**	**	**
31614	LOG FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/17/75-09/17/75	1	2.602	2.602	2.602	2.602	0.	0.	**	**	**	**
31614	GM FECAL COLIFORM,MPN,TUBE CONFIGURATION	GEOMETRIC MEAN =			400.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0129

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	2	2	1.00							2	2	1.00			
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0130

NPS Station ID: CHIC0130
Location: 01S-03E-01 ABA 1
Station Type: /TYPA/AMBNT/STREAM
RMI-Indexes:
RMI-Miles:
HUC: 11130303
Major Basin:
Minor Basin:
RF1 Index: 11130303
RF3 Index: 11130303088803.69
Description:

LAT/LON: 34.504726/ -96.938059
Depth of Water: 0
Elevation: 0
RF1 Mile Point: 0.000
RF3 Mile Point: 5.92

Agency: 112WRD
FIPS State/County: 40099 OKLAHOMA/MURRAY
STORET Station ID(s): 343017096561701
Within Park Boundary: Yes
Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 0.00
Distance from RF3: 0.12

Date Created: 04/14/78
On/Off RF1:
On/Off RF3:

Parameter Inventory for Station: CHIC0130

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	08/03/72-08/03/72	1	668.	668.	668.	668.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	08/03/72-08/03/72	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	08/03/72-08/03/72	1	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	08/03/72-08/03/72	1	0.008	0.008	0.008	0.008	0.	0.	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	08/03/72-08/03/72	1	4.8	4.8	4.8	4.8	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	08/03/72-08/03/72	1	307.	307.	307.	307.	0.	0.	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	08/03/72-08/03/72	1	374.	374.	374.	374.	0.	0.	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	08/03/72-08/03/72	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	08/03/72-08/03/72	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	08/03/72-08/03/72	1	270.	270.	270.	270.	0.	0.	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	08/03/72-08/03/72	1	0.	0.	0.	0.	0.	0.	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	08/03/72-08/03/72	1	36.	36.	36.	36.	0.	0.	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	08/03/72-08/03/72	1	43.	43.	43.	43.	0.	0.	**	**	**	**
00933	SODIUM,PLUS POTASSIUM (MG/L)	08/03/72-08/03/72	1	48.	48.	48.	48.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	08/03/72-08/03/72	1	18.	18.	18.	18.	0.	0.	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	08/03/72-08/03/72	1	43.	43.	43.	43.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	08/03/72-08/03/72	1	384.	384.	384.	384.	0.	0.	**	**	**	**
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	08/03/72-08/03/72	1	0.	0.	0.	0.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0130

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	1	0	0.00							1	0	0.00			
		Other-Lo Lim.	6.5	1	0	0.00							1	0	0.00			
00618	NITRATE NITROGEN, DISSOLVED AS N	Drinking Water	10.	1	0	0.00							1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00							1	0	0.00			
		Drinking Water	250.	1	0	0.00							1	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1	0	0.00							1	0	0.00			
71851	NITRATE NITROGEN, DISSOLVED (AS NO3)	Drinking Water	44.	1	0	0.00							1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0131

NPS Station ID: CHIC0131
LAT/LON: 34.504726/ -96.982782
Agency: 112WRD
Date Created: 01/30/93
Location: 01S-03E-03 AABC 1 SANDY BEACH
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343017096585801
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 1.50
On/Off RF1:
RF3 Index: 11130303085200.00
RF3 Mile Point: 0.06
Distance from RF3: 0.06
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0131

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-09/18/76	6	25.55	25.417	27.2	23.2	2.97	1.723	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-09/18/76	6	7.55	7.583	9.9	5.1	3.458	1.859	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	1.05	1.05	1.5	0.6	0.405	0.636	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/14/76-09/18/76	5	17.	21.18	46.4	3.3	292.572	17.105	**	**	**	**
00400	PH (STANDARD UNITS)	06/14/76-09/18/76	6	8.05	8.225	9.	7.75	0.26	0.51	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/14/76-09/18/76	6	8.047	8.041	9.	7.75	0.3	0.548	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-09/18/76	6	0.009	0.009	0.018	0.001	0.	0.007	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/29/76	3	204.	229.667	288.	197.	2564.333	50.639	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/16/76	2	1.8	1.8	3.	0.6	2.88	1.697	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/29/76	4	80.5	70.75	86.	36.	544.917	23.343	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-09/18/76	6	895.	1300.	2350.	680.	656680.	810.358	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0131

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	6	0	0.00	1	0	0.00	4	0	0.00	1	0	0.00			
00400	PH	Other-Hi Lim.	9.	6	1	0.17	1	0	0.00	4	1	0.25	1	0	0.00			
		Other-Lo Lim.	6.5	6	0	0.00	1	0	0.00	4	0	0.00	1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	4	0	0.00				4	0	0.00						
		Drinking Water	250.	4	0	0.00				4	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0132

NPS Station ID: CHIC0132 LAT/LON: 34.504920/ -96.950976 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK AT LITTLE NIAGARA WATERFALL FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T2_3
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT LITTLE NIAGRA WATERFALL APPROXIMATELY A 1/2 MILE NORTHWEST OF THE COLD CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE FROM MAY 1975 TO AUGUST 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY M. SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0132

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	06/11/75-08/20/75	2	200.	200.	200.	200.	0.	0.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	06/11/75-08/20/75	2	2.301	2.301	2.301	2.301	0.	0.	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			200.								
31506	COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-06/11/75	3	200.	813.333	2100.	140.	1242533.333	1114.69	**	**	**	**
31506	LOG COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	05/13/75-06/11/75	3	2.301	2.59	3.322	2.146	0.408	0.639	**	**	**	**
31506	GM COLIFORM,TOT,MPN, CONFIRMED TEST, TUBE CONFIG.	GEOMETRIC MEAN =			388.859								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0132

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	2	0	0.00				1	0	0.00	1	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	3	1	0.33				3	1	0.33						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0133

NPS Station ID: CHIC0133
LAT/LON: 34.505142/ -96.971837
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK AT SANDY BEACH
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_14
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK AT SANDY BEACH APPROXIMATELY 500 FEET UPSTREAM FROM WHERE TRAVERTINE CREEK ENTERS ROCK CREEK. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0133

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	19	17.	18.	29.	5.	64.639	8.04	5.5	11.	25.5	27.
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	20	8.8	8.985	15.5	5.1	5.603	2.367	5.85	7.575	10.125	11.92
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	17	1.9	2.294	9.	0.6	4.138	2.034	0.68	1.	2.35	5.48
00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	19	20.	28.263	122.	3.	656.427	25.621	10.	16.	29.	52.
00403	PH, LAB, STANDARD UNITS SU	06/14/76-06/23/77	18	7.95	8.139	9.8	7.6	0.301	0.549	7.69	7.8	8.325	9.08
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-06/23/77	18	7.947	7.96	9.8	7.6	0.335	0.579	7.69	7.8	8.325	9.08
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-06/23/77	18	0.011	0.011	0.025	0.	0.	0.007	0.001	0.005	0.016	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	5	204.	225.	288.	197.	1485.	38.536	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-04/01/77	6	8.	8.767	19.	0.6	47.047	6.859	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	4	0.182	0.181	0.36	0.	0.024	0.155	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	3	0.21	0.208	0.22	0.195	0.	0.013	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	5	0.45	0.558	1.12	0.06	0.267	0.517	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	5	0.06	0.224	0.8	0.04	0.107	0.327	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	9	105.	199.556	485.	36.	27426.778	165.61	36.	80.5	369.	485.
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	8.	8.	8.	8.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	20.	20.	20.	20.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	6	335000.	548333.333	1930000.	10000.	546136666666.667	739010.6	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-12/19/76	6	5.201	5.183	6.286	4.	0.812	0.901	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			152241.47								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0133

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	3500.	16432.143	126000.	200.	1106582156.593	33265.33	250.	637.5	20875.	78450.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	3.54	3.533	5.1	2.301	0.72	0.848	2.389	2.804	4.309	4.795
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			3414.316								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	13	3200.	8349.231	44000.	0.	161537841.026	12709.754	40.	320.	11850.	35600.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	13	3.505	3.165	4.643	0.	1.558	1.248	0.8	2.423	4.061	4.531
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1463.275								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	20	1500.	1453.75	2350.	440.	565628.618	752.083	486.5	680.	2187.5	2295.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	4	0.063	0.151	0.477	0.	0.049	0.221	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0133

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	20	0	0.00	9	0	0.00	10	0	0.00	1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	18	2	0.11	9	1	0.11	8	1	0.13	1	0	0.00			
		Other-Lo Lim.	6.5	18	0	0.00	9	0	0.00	8	0	0.00	1	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	3	0	0.00	2	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	9	0	0.00	4	0	0.00	5	0	0.00						
		Drinking Water	250.	9	3	0.33	4	2	0.50	5	1	0.20						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	6	6	1.00	6	6	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	14	14	1.00	8	8	1.00	6	6	1.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0134

NPS Station ID: CHIC0134
LAT/LON: 34.505227/ -96.972754
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK AT BLACK SULPHUR BEACH
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_SCH_T2_9
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 0
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK AT BLACK SULPHUR BEACH APPROXIMATELY A 1/4 MILE NORTHWEST OF THE TRAVERTINE CREEK CONFLUENCE. SAMPLING FOR THIS SITE WAS DONE IN SEPTEMBER 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR FECAL COLIFORM. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0134

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31614	FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	1	3100.	3100.	3100.	3100.	0.	0.	**	**	**	**
31614	LOG FECAL COLIFORM,MPN,TUBE CONFIGURATION	09/21/75-09/21/75	1	3.491	3.491	3.491	3.491	0.	0.	**	**	**	**
31614	GM FECAL COLIFORM,MPN,TUBE CONFIGURATION	GEOMETRIC MEAN =			3100.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0134

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0135

NPS Station ID: CHIC0135
LAT/LON: 34.505282/ -96.951671
Agency: 112WRD
Date Created: 01/30/93
Location: 01S-03E-02 AAAB 1 LITTLE NIAGRA
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343019096570601
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 4.40
On/Off RF1:
RF3 Index: 11130303000701.97
RF3 Mile Point: 2.61
Distance from RF3: 0.30
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0135

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	2	21.	21.	21.5	20.5	0.5	0.707	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	2	8.85	8.85	9.5	8.2	0.845	0.919	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	0.34	0.34	0.6	0.08	0.135	0.368	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	09/05/76-09/18/76	2	14.45	14.45	25.	3.9	222.605	14.92	**	**	**	**
00400	PH (STANDARD UNITS)	09/05/76-09/18/76	2	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	09/05/76-09/18/76	2	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/18/76	2	0.008	0.008	0.008	0.008	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	2	525.	525.	550.	500.	1250.	35.355	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0135

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00	1	0	0.00				1	0	0.00			
00400	PH	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0136

NPS Station ID: CHIC0136
LAT/LON: 34.505282/ -96.975310
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK NEAR CULVERT AT HWY 7
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_13
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK NEAR THE CULVERT AT HIGHWAY 7 IN THE NORTHERN PART OF CHICKASAW NATIONAL RECREATION AREA JUST WEST OF SULPHUR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0136

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00310	BOD, 5 DAY, 20 DEG C MG/L	09/18/76-09/18/76	1	20.7	20.7	20.7	20.7	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	09/18/76-09/18/76	1	215.	215.	215.	215.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	09/18/76-09/18/76	1	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	09/18/76-09/18/76	1	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/18/76-09/18/76	1	0.013	0.013	0.013	0.013	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	1	1320000.	1320000.	1320000.	1320000.	0.	0.	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-09/18/76	1	6.121	6.121	6.121	6.121	0.	0.	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			1320000.								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	204000.	204000.	204000.	204000.	0.	0.	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	5.31	5.31	5.31	5.31	0.	0.	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			204000.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0136

			Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00403 PH, LAB	Other-Hi Lim.	9.	1	0	0.00	1	0	0.00									
	Other-Lo Lim.	6.5	1	0	0.00	1	0	0.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0136

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0137

NPS Station ID: CHIC0137 LAT/LON: 34.505420/ -96.951616 Agency: 11NPSWRD Date Created: 09/20/97
Location: TRAVERTINE CREEK AT LITTLE NIAGARA FOOT BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_3
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT THE LITTLE NIAGRA FOOT BRIDGE APPROXIMATELY A 1/4 MILE NORTHEAST OF THE ROCK CREEK CAMPGROUND. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 18 AND OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS OF THE STUDY WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0137

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/18/75-01/09/76	3 ##	0.	1.333	4.	0.	5.333	2.309	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/18/75-01/09/76	4	0.	250.	1000.	0.	250000.	500.	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/18/75-01/09/76	4	0.	0.75	3.	0.	2.25	1.5	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			5.623								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	4	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/18/75-01/09/76	4	0.	0.	0.	0.	0.	0.	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			1.								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0137

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	4	1	0.25	4	1	0.25									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0138

NPS Station ID: CHIC0138
LAT/LON: 34.505503/ -96.951616
Agency: 11NPSWRD
Date Created: 09/20/97
Location: TRAVERTINE CREEK AT LITTLE NIAGARA
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_5
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 1030
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON TRAVERTINE CREEK AT LITTLE NIAGRA WATERFALL APPROXIMATELY 1000 FEET NORTH OF THE CHICKASAW NATIONAL RECREATION AREA. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0138

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	09/05/76-09/18/76	2	21.	21.	21.5	20.5	0.5	0.707	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	09/05/76-09/18/76	2	8.85	8.85	9.5	8.2	0.845	0.919	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	0.3	0.3	0.6	0.	0.18	0.424	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	09/05/76-09/18/76	2	14.5	14.5	25.	4.	220.5	14.849	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	09/05/76-09/18/76	2	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	09/05/76-09/18/76	2	8.1	8.1	8.1	8.1	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	09/05/76-09/18/76	2	0.008	0.008	0.008	0.008	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-09/18/76	1	36000.	36000.	36000.	36000.	0.	0.	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-09/18/76	1	4.556	4.556	4.556	4.556	0.	0.	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			36000.								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	270.	270.	270.	270.	0.	0.	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-09/18/76	1	2.431	2.431	2.431	2.431	0.	0.	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			270.								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	09/05/76-09/18/76	2	525.	525.	550.	500.	1250.	35.355	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0138

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	2	0	0.00	1	0	0.00				1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	2	0	0.00	1	0	0.00				1	0	0.00			
		Other-Lo Lim.	6.5	2	0	0.00	1	0	0.00				1	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	1	1	1.00	1	1	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	1	1	1.00	1	1	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0139

NPS Station ID: CHIC0139 LAT/LON: 34.505781/ -96.975865 Agency: 11NPSWRD Date Created: 09/20/97
Location: STORM CULVERT 20 FT SOUTH OF BROADWAY BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /CANAL/TYPA/AMBNT STORET Station ID(s): CHIC_SCH_T3_12
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS WHERE THE STORM DRAIN DISCHARGES INTO ROCK CREEK APPROXIMATELY 20 FEET SOUTH OF BROADWAY BRIDGE AND 200 FEET SOUTHEAST OF THE HIGH SCHOOL IN SULPHUR. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT -RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0139

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3	150.	167.333	272.	80.	9441.333	97.167	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	40000.	153666.667	420000.	1000.53580333333.333		231474.261	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	4.602	4.408	5.623	3.	1.748	1.322	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			25611.583								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	8600.	69666.667	200000.	400.12756893333.333		112946.418	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	3.934	3.946	5.301	2.602	1.821	1.35	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			8828.01								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0139

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	3	1.00	3	3	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0140

NPS Station ID: CHIC0140 LAT/LON: 34.506143/ -96.975865 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK SOUTH OF BROADWAY BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_11
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK SOUTH OF BROADWAY BRIDGE APPROXIMATELY 200 FEET SOUTHEAST OF THE HIGH SCHOOL IN SULPHUR. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0140

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3	7.	6.	11.	0.	31.	5.568	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	500.	1033.333	2400.	200.	1423333.333	1193.035	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	2.699	2.793	3.38	2.301	0.298	0.546	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			621.447								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	200.	266.667	500.	100.	43333.333	208.167	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	2.301	2.333	2.699	2.	0.123	0.351	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			215.443								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0140

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	1	0.33	3	1	0.33									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0141

NPS Station ID: CHIC0141 LAT/LON: 34.506143/ -96.975948 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK AT HWY 7 DOWNSTREAM FROM BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_12D
RMI-Indexes: Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 940 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK DOWNSTREAM OF THE BRIDGE AT HIGHWAY 7 IN THE NORTHERN PART OF CHICKASAW NATIONAL RECREATION AREA JUST WEST OF SULPHUR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0141

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/18/76-06/18/76	1	31.	31.	31.	31.	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/18/76-06/18/76	1	6.	6.	6.	6.	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/18/76-06/18/76	1	226.	226.	226.	226.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/18/76-06/18/76	1	8.3	8.3	8.3	8.3	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/18/76-06/18/76	1	8.3	8.3	8.3	8.3	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/18/76-06/18/76	1	0.005	0.005	0.005	0.005	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/18/76-06/18/76	1	245.	245.	245.	245.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/18/76-06/18/76	1	282.	282.	282.	282.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/18/76-06/18/76	1	83.	83.	83.	83.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/18/76-06/18/76	1	360.	360.	360.	360.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0141

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0141

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
	Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0142

NPS Station ID: CHIC0142
LAT/LON: 34.506392/ -96.975948
Agency: 11NPSWRD
Date Created: 09/20/97
Location: ROCK CREEK AT HWY 7 UNDER BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_12
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 940
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK UNDER THE BRIDGE AT HIGHWAY 7 IN THE NORTHERN PART OF CHICKASAW NATIONAL RECREATION AREA JUST WEST OF SULPHUR. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0142

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	19	16.5	17.289	28.	4.	70.092	8.372	4.	10.5	25.	28.
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	20	9.45	9.62	14.3	5.7	5.002	2.236	6.67	8.025	11.15	13.79
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	17	1.5	1.506	4.4	0.6	0.804	0.897	0.68	0.85	1.95	2.48
00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	20	21.5	29.1	100.	1.	669.253	25.87	4.4	13.	35.75	77.2
00403	PH, LAB, STANDARD UNITS SU	06/14/76-07/01/77	19	8.	8.063	8.9	6.8	0.275	0.524	7.5	7.8	8.3	8.9
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-07/01/77	19	8.	7.732	8.9	6.8	0.391	0.625	7.5	7.8	8.3	8.9
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-07/01/77	19	0.01	0.019	0.158	0.001	0.001	0.035	0.001	0.005	0.016	0.032
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	5	204.	208.8	283.	163.	2036.7	45.13	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-01/21/77	5	1.	3.2	11.	0.	21.7	4.658	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	4	0.13	0.205	0.47	0.09	0.033	0.181	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	3	0.08	0.063	0.1	0.01	0.002	0.047	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	5	0.19	0.468	1.64	0.12	0.431	0.656	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	5	0.04	0.068	0.165	0.03	0.003	0.056	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	8	179.	250.	567.	55.	35973.143	189.666	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1 ##	2.5	2.5	2.5	2.5	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1 ##	5.	5.	5.	5.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	6	15000.	71316.667	350000.	6900.18	717641666.667	136812.432	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-12/19/76	6	4.175	4.365	5.544	3.839	0.386	0.621	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			23196.704								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0142

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	500.	2816.429	32100.	100.	71188209.341	8437.311	150.	275.	895.	16850.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	14	2.699	2.784	4.507	2.	0.339	0.582	2.151	2.439	2.951	3.855
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			608.095								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	12	4250.	7963.333	37500.	660.	109544496.97	10466.351	732.	1325.	12750.	30600.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	12	3.628	3.607	4.574	2.82	0.29	0.538	2.86	3.09	4.098	4.45
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			4049.995								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	20	1700.	1533.25	2650.	420.	679132.303	824.095	468.5	647.5	2337.5	2445.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	4	0.033	0.039	0.09	0.	0.001	0.038	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0142

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	20	0	0.00	9	0	0.00	10	0	0.00	1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	19	0	0.00	9	0	0.00	8	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	19	0	0.00	9	0	0.00	8	0	0.00	2	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	3	0	0.00	2	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	8	0	0.00	4	0	0.00	4	0	0.00						
		Drinking Water	250.	8	3	0.38	4	2	0.50	4	1	0.25						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	6	6	1.00	6	6	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	14	13	0.93	8	8	1.00	6	5	0.83						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0143

NPS Station ID: CHIC0143
LAT/LON: 34.506392/ -96.976116
Agency: 112WRD
Date Created: 11/14/92
Location: 01S-03E-03 ABBB 1 UNDER HWY 7 BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343023096583401
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 1.00
On/Off RF1:
RF3 Index: 11130303000701.97
RF3 Mile Point: 4.53
Distance from RF3: 0.04
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0143

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-09/18/76	6	25.	26.083	31.	23.	8.442	2.905	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/14/76-09/18/76	6	7.55	7.95	11.4	5.7	4.723	2.173	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/18/76	2	1.05	1.05	1.5	0.6	0.405	0.636	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/14/76-09/18/76	5	25.4	65.8	225.7	3.9	8453.51	91.943	**	**	**	**
00400	PH (STANDARD UNITS)	06/14/76-09/18/76	6	8.3	8.317	8.9	7.8	0.222	0.471	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/14/76-09/18/76	6	8.3	8.129	8.9	7.8	0.264	0.514	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-09/18/76	6	0.005	0.007	0.016	0.001	0.	0.007	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	3	246.	244.333	283.	204.	1562.333	39.526	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-06/18/76	3	4.	95.667	282.	1.	26042.333	161.376	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-06/23/76	3	83.	112.667	178.	77.	3210.333	56.66	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-09/18/76	6	675.	1175.	2350.	360.	842350.	917.796	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0143

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	6	0	0.00	1	0	0.00	4	0	0.00	1	0	0.00			
00400	PH	Other-Hi Lim.	9.	6	0	0.00	1	0	0.00	4	0	0.00	1	0	0.00			
		Other-Lo Lim.	6.5	6	0	0.00	1	0	0.00	4	0	0.00	1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00				3	0	0.00						
		Drinking Water	250.	3	0	0.00				3	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0144

NPS Station ID: CHIC0144
LAT/LON: 34.506587/ -96.975920
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Rock Creek Above Highway 7 Bridge
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_ROCK1
RMI-Indexes:
Within Park Boundary: Yes
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 930
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Sulphur North Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/3. Station is known as Rock Creek Site 1 and is located on Rock Creek at the left bank about 15 yards above the Highway 7 Bridge. This station is the first accessible site on Rock Creek before it enters Chickasaw National Recreation Area. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	81	15.4	15.296	27.3	2.	63.094	7.943	4.82	7.65	22.95	25.54
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	81	584.	649.642	3100.	345.	104329.183	323.	444.4	519.5	741.5	809.4
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	80	7.3	7.67	19.6	2.7	9.095	3.016	3.61	5.65	9.875	11.09
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	81	8.1	8.022	8.6	7.	0.08	0.282	7.6	7.9	8.2	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	81	8.1	7.907	8.6	7.	0.093	0.305	7.6	7.9	8.2	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	81	0.008	0.012	0.1	0.003	0.	0.013	0.005	0.006	0.013	0.025
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	81	241.	239.975	300.	157.	1075.424	32.794	191.6	220.5	263.5	286.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	80	0.1	0.112	0.31	0.04	0.003	0.058	0.05	0.07	0.145	0.189
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	59	0.002	0.003	0.021	0.001	0.	0.004	0.002	0.002	0.003	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	81	0.12	0.128	0.23	0.05	0.001	0.032	0.1	0.11	0.14	0.178
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	58	0.16	0.215	1.4	0.05	0.04	0.201	0.079	0.105	0.27	0.392
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	80	248.	255.525	552.	156.	2884.328	53.706	200.4	230.25	277.5	285.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	79	20.	21.367	55.	12.	34.697	5.89	16.	18.	24.	26.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	80	240.	248.888	520.	156.	2649.164	51.47	200.2	217.75	275.75	283.9
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	80	0.	6.638	64.	0.	151.55	12.311	0.	0.	7.75	29.6
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	63	0.17	0.218	0.78	0.	0.031	0.176	0.05	0.08	0.27	0.534
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	81	4.3	5.642	19.5	0.7	13.04	3.611	2.54	3.15	7.05	9.36

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0144

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	10	0.13	37	0	0.00	25	0	0.00	18	10	0.56			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	27	0	0.00	19	0	0.00	13	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	37	0	0.00	24	0	0.00	18	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	37	0	0.00	25	0	0.00	19	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	6	17.15	16.95	27.3	6.4	74.115	8.609	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	6	830.5	1099.167	3100.	402.	1018108.967	1009.014	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	6	7.3	6.633	10.3	3.3	7.135	2.671	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	6	7.7	7.65	8.2	7.	0.231	0.481	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	6	7.604	7.443	8.2	7.	0.282	0.531	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	6	0.025	0.036	0.1	0.006	0.001	0.036	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	6	210.	213.5	284.	157.	2050.7	45.285	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	6	0.175	0.178	0.26	0.12	0.003	0.054	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	6	0.002	0.002	0.003	0.001	0.	0.001	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	6	0.12	0.128	0.2	0.09	0.001	0.038	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	6	0.255	0.293	0.5	0.17	0.017	0.13	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	6	273.	287.5	552.	156.	19684.7	140.302	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	6	25.5	29.167	55.	12.	261.367	16.167	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	6	270.	280.833	520.	156.	16468.167	128.328	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	6	0.	6.667	32.	0.	164.267	12.817	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	6	9.55	9.133	16.3	2.	41.059	6.408	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	15.7	15.292	26.	2.	67.097	8.191	2.39	6.975	22.625	25.37
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	703.	646.75	818.	345.	22399.477	149.665	393.9	531.25	770.5	811.1
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	12	6.95	8.133	19.6	2.7	23.544	4.852	2.85	4.8	11.375	17.71
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	8.15	8.117	8.3	7.8	0.027	0.164	7.83	8.	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	8.147	8.087	8.3	7.8	0.028	0.167	7.83	8.	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.007	0.008	0.016	0.005	0.	0.003	0.005	0.005	0.01	0.015
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	263.5	256.917	284.	182.	708.083	26.61	199.4	250.25	273.5	281.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.07	0.092	0.31	0.05	0.005	0.07	0.05	0.063	0.095	0.247
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	12	0.003	0.003	0.004	0.001	0.	0.001	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.11	0.112	0.14	0.09	0.	0.014	0.093	0.1	0.12	0.137
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	12	0.115	0.128	0.2	0.07	0.002	0.043	0.076	0.09	0.158	0.2
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	256.	254.833	282.	186.	690.879	26.285	202.8	243.75	277.5	281.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	12	20.5	20.917	26.	15.	7.902	2.811	16.2	19.25	22.75	25.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	256.	250.917	282.	186.	924.811	30.411	190.8	242.25	277.5	281.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	0.	3.917	47.	0.	184.083	13.568	0.	0.	0.	32.9
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	3.6	5.458	19.5	2.8	21.512	4.638	2.83	3.05	6.325	15.63

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	16.4	15.625	26.6	5.2	74.728	8.645	5.23	6.6	24.05	26.21
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	607.	619.583	810.	446.	13775.356	117.368	462.8	525.25	723.75	807.
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	12	6.85	7.133	10.3	3.5	4.786	2.188	3.89	5.3	9.275	10.27
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	7.95	7.933	8.2	7.5	0.052	0.227	7.53	7.8	8.1	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	7.947	7.875	8.2	7.5	0.055	0.235	7.53	7.8	8.1	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.011	0.013	0.032	0.006	0.	0.008	0.006	0.008	0.016	0.03
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	233.	243.333	300.	198.	1288.97	35.902	198.9	216.75	280.5	299.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.09	0.11	0.22	0.04	0.004	0.063	0.043	0.05	0.17	0.211
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	12	0.003	0.004	0.011	0.002	0.	0.003	0.002	0.002	0.005	0.01
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.125	0.128	0.19	0.09	0.001	0.029	0.093	0.1	0.148	0.178
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	12	0.205	0.229	0.69	0.06	0.032	0.18	0.06	0.065	0.315	0.585

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	245.	257.167	404.	194.	3222.515	56.767	195.8	220.	281.75	371.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	12	20.5	20.417	26.	15.	13.72	3.704	15.3	16.5	23.75	25.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	224.5	246.667	388.	194.	3115.879	55.82	195.8	207.25	281.75	357.7
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	3.5	10.5	64.	0.	329.364	18.148	0.	0.	15.	50.5
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.195	0.232	0.55	0.	0.035	0.188	0.012	0.085	0.393	0.55
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	5.2	5.267	9.4	0.7	8.641	2.939	1.12	2.35	7.975	9.34

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	16.4	16.025	26.6	5.8	62.958	7.935	6.31	8.825	24.65	26.33
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	574.	643.833	1300.	481.	53295.061	230.857	482.2	488.75	716.5	1152.1
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	12	7.1	7.117	10.1	3.4	3.909	1.977	3.91	5.475	8.675	9.98
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	8.1	8.025	8.3	7.5	0.064	0.253	7.53	7.925	8.2	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	8.1	7.946	8.3	7.5	0.071	0.266	7.53	7.925	8.2	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.008	0.011	0.032	0.005	0.	0.008	0.005	0.006	0.012	0.03
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	242.5	243.417	295.	190.	1129.538	33.609	192.4	219.5	275.75	292.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.105	0.109	0.17	0.05	0.001	0.038	0.053	0.083	0.145	0.167
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	12	0.003	0.004	0.021	0.001	0.	0.005	0.001	0.002	0.003	0.016
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.12	0.128	0.23	0.05	0.003	0.052	0.056	0.105	0.13	0.227
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	12	0.18	0.302	1.4	0.05	0.132	0.364	0.062	0.143	0.293	1.124
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	11	250.	256.818	404.	200.	2937.364	54.197	202.	220.	262.	379.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	10	22.	22.	28.	16.	10.889	3.3	16.4	20.	24.25	27.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	11	250.	254.	388.	200.	2530.4	50.303	202.	220.	262.	366.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	11	0.	2.818	16.	0.	30.564	5.528	0.	0.	4.	15.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.19	0.218	0.62	0.05	0.028	0.168	0.059	0.085	0.245	0.572
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	8.5	7.383	14.6	1.	17.674	4.204	1.45	3.375	9.1	14.21

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	16.6	15.658	26.6	3.6	63.392	7.962	3.96	8.95	22.625	26.03
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	590.5	639.583	1290.	409.	52934.811	230.076	419.5	521.75	713.5	1134.6
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	12	6.95	7.742	14.9	3.5	11.483	3.389	3.53	5.15	10.25	13.85
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	8.05	7.975	8.2	7.5	0.066	0.256	7.53	7.75	8.2	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	8.047	7.899	8.2	7.5	0.072	0.268	7.53	7.75	8.2	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.009	0.013	0.032	0.006	0.	0.009	0.006	0.006	0.018	0.03
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	239.	232.417	282.	180.	931.538	30.521	182.4	204.5	253.75	276.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.13	0.124	0.23	0.04	0.003	0.054	0.046	0.083	0.165	0.215
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	12	0.002	0.004	0.02	0.001	0.	0.006	0.001	0.002	0.003	0.018
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.13	0.128	0.17	0.1	0.	0.022	0.1	0.105	0.148	0.164
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	11	0.19	0.195	0.41	0.08	0.01	0.098	0.082	0.12	0.27	0.382
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	251.	257.167	404.	185.	2957.061	54.379	189.5	235.	274.5	367.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	12	20.5	21.333	31.	16.	23.879	4.887	16.	16.5	24.75	30.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	233.	246.917	388.	185.	2862.447	53.502	189.5	210.25	270.75	356.5
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	4.	10.25	33.	0.	168.75	12.99	0.	0.	23.5	32.7
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.18	0.234	0.55	0.03	0.034	0.183	0.033	0.09	0.393	0.55
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	3.4	3.95	8.8	2.1	3.134	1.77	2.28	2.925	4.2	7.81

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	14.85	14.917	25.2	3.8	66.28	8.141	4.1	7.6	22.75	24.99
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	544.	550.583	815.	379.	18824.447	137.202	385.	422.5	602.75	802.7
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	11	7.6	7.9	11.2	3.2	5.536	2.353	3.72	6.7	10.1	11.04
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	8.2	8.192	8.6	7.7	0.072	0.268	7.79	8.	8.425	8.6
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	8.2	8.119	8.6	7.7	0.078	0.279	7.79	8.	8.425	8.6
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.006	0.008	0.02	0.003	0.	0.005	0.003	0.004	0.01	0.017
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	226.5	229.333	294.	180.	1038.97	32.233	182.4	206.	247.5	286.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	11	0.1	0.109	0.31	0.04	0.006	0.074	0.044	0.06	0.12	0.278
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/07/87-05/14/92	5	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.13	0.131	0.2	0.08	0.001	0.036	0.086	0.103	0.14	0.197
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/07/87-05/14/92	5	0.12	0.132	0.26	0.08	0.006	0.074	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	233.	240.25	294.	204.	650.568	25.506	209.4	224.25	250.	290.4
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	12	18.5	18.75	24.	13.	15.114	3.888	13.3	15.25	22.75	24.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	230.	235.917	284.	204.	678.265	26.044	205.2	215.	250.	283.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	0.	4.333	32.	0.	90.788	9.528	0.	0.	7.5	25.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.15	0.247	0.78	0.05	0.053	0.23	0.053	0.07	0.428	0.699
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	5.95	6.158	12.2	2.4	7.603	2.757	2.58	3.925	7.975	11.15

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	12	16.45	15.6	26.1	3.6	64.627	8.039	3.99	8.1	22.85	25.74
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	12	591.	599.167	750.	451.	6680.515	81.734	473.2	558.25	641.	743.1
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	12	7.1	7.458	11.	3.8	5.643	2.375	3.95	5.325	9.875	10.67
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	12	8.15	8.033	8.3	7.5	0.059	0.242	7.56	7.9	8.2	8.27
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	12	8.147	7.961	8.3	7.5	0.064	0.254	7.56	7.9	8.2	8.27
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	12	0.007	0.011	0.032	0.005	0.	0.008	0.005	0.006	0.013	0.028
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	245.5	242.583	290.	203.	644.992	25.397	203.	223.75	260.75	282.5
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.09	0.094	0.15	0.05	0.001	0.028	0.053	0.075	0.108	0.144
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	12	0.14	0.137	0.18	0.09	0.001	0.025	0.096	0.113	0.158	0.174
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	12	251.	251.833	296.	210.	600.697	24.509	213.3	238.75	266.75	292.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	12	20.	20.833	28.	16.	14.333	3.786	16.3	17.5	24.75	27.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	237.	243.333	296.	210.	718.788	26.81	210.3	222.25	263.75	291.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	12	3.	8.5	30.	0.	145.727	12.072	0.	0.	19.75	30.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	12	0.155	0.199	0.4	0.06	0.015	0.124	0.06	0.093	0.318	0.394
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	12	4.1	4.292	6.8	3.	1.315	1.147	3.	3.2	5.05	6.35

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Annual Analysis for 1994 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	3	4.9	6.633	11.3	3.7	16.693	4.086	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	3	535.	544.	579.	518.	991.	31.48	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	3	11.1	11.967	14.7	10.1	5.853	2.419	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	3	8.2	8.2	8.2	8.2	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	3	8.2	8.2	8.2	8.2	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	3	0.006	0.006	0.006	0.006	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	3	246.	260.333	290.	245.	660.333	25.697	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	3	0.08	0.1	0.15	0.07	0.002	0.044	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	3	0.14	0.15	0.18	0.13	0.001	0.026	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	3	238.	252.333	284.	235.	754.333	27.465	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	3	22.	22.	24.	20.	4.	2.	**	**	**	**

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Annual Analysis for 1994 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	3	238.	249.	279.	230.	691.	26.287	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	3	5.	3.333	5.	0.	8.333	2.887	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/19/89-03/04/94	3	0.06	0.057	0.07	0.04	0.	0.015	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	3	4.3	4.033	4.3	3.5	0.213	0.462	**	**	**	**

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Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	37	7.7	8.781	23.	2.	24.608	4.961	3.6	4.9	13.15	15.42
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	37	624.	633.568	861.	345.	18036.863	134.301	427.4	541.	749.5	808.6
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	37	9.5	8.973	13.3	5.4	3.379	1.838	6.88	7.45	10.25	11.24
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	37	8.2	8.103	8.3	7.	0.046	0.215	7.98	8.	8.2	8.22
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	37	8.2	7.996	8.3	7.	0.058	0.241	7.98	8.	8.2	8.22
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	37	0.006	0.01	0.1	0.005	0.	0.015	0.006	0.006	0.01	0.011
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	37	246.	243.27	300.	157.	1631.369	40.39	181.6	210.5	283.	290.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	37	0.08	0.1	0.31	0.04	0.004	0.061	0.05	0.06	0.12	0.202
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	37	0.13	0.122	0.17	0.05	0.001	0.024	0.088	0.11	0.14	0.142
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	37	256.	251.378	296.	156.	1266.853	35.593	185.8	235.	282.	286.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	37	23.	22.135	27.	12.	9.953	3.155	18.4	20.	24.	25.2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	37	254.	249.162	296.	156.	1231.64	35.095	185.8	229.	280.	284.
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	37	0.	2.216	26.	0.	36.119	6.01	0.	0.	0.	8.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	37	3.7	5.997	19.5	2.	21.786	4.668	2.36	2.9	8.05	14.36

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	25	19.4	17.916	25.7	7.5	30.502	5.523	8.38	13.1	22.3	24.32
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	25	529.	524.72	674.	379.	3755.627	61.283	445.2	487.5	558.	606.8
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	25	6.7	8.036	19.6	4.6	13.072	3.616	4.86	6.	9.25	14.78
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	25	8.1	8.092	8.5	7.8	0.028	0.168	7.86	7.95	8.2	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	25	8.1	8.061	8.5	7.8	0.029	0.171	7.86	7.95	8.2	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	25	0.008	0.009	0.016	0.003	0.	0.003	0.005	0.006	0.011	0.014
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	25	251.	247.88	295.	180.	546.777	23.383	219.2	233.5	264.5	272.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	25	0.09	0.111	0.31	0.04	0.003	0.058	0.056	0.08	0.125	0.202
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	25	0.12	0.133	0.22	0.09	0.001	0.037	0.096	0.1	0.155	0.194
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	25	242.	243.96	278.	210.	259.373	16.105	221.2	235.5	255.5	269.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	24	19.5	18.833	24.	14.	5.275	2.297	15.5	17.25	20.	21.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	25	230.	229.96	278.	202.	427.123	20.667	207.	210.5	243.	261.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	25	6.	14.	64.	0.	300.75	17.342	0.	0.	30.	38.6
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	25	4.3	4.872	9.4	0.7	5.573	2.361	1.66	3.25	6.55	8.56

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Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0144

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/07/87-03/04/94	19	24.9	24.537	27.3	21.8	3.614	1.901	21.8	22.1	26.1	26.6
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/07/87-03/04/94	19	625.	845.316	3100.	399.	359983.228	599.986	400.	590.	810.	1300.
00300	OXYGEN, DISSOLVED MG/L	07/07/87-03/04/94	18	3.75	4.483	6.8	2.7	2.007	1.417	3.15	3.375	6.3	6.8
00403	PH, LAB, STANDARD UNITS SU	07/07/87-03/04/94	19	7.7	7.774	8.6	7.3	0.139	0.372	7.4	7.5	7.9	8.6
00403	CONVERTED PH, LAB, STANDARD UNITS	07/07/87-03/04/94	19	7.7	7.663	8.6	7.3	0.152	0.389	7.4	7.5	7.9	8.6
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/07/87-03/04/94	19	0.02	0.022	0.05	0.003	0.	0.013	0.003	0.013	0.032	0.04
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	19	224.	223.158	262.	198.	380.251	19.5	198.	202.	237.	250.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/07/87-03/04/94	18	0.13	0.136	0.26	0.05	0.002	0.046	0.068	0.1	0.17	0.179
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/07/87-03/04/94	19	0.12	0.134	0.23	0.09	0.001	0.038	0.1	0.11	0.15	0.2
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/07/87-03/04/94	18	251.5	280.111	552.	200.	9480.575	97.368	200.	208.5	315.5	418.8
00945	SULFATE, TOTAL (MG/L AS SO4)	07/07/87-03/04/94	18	18.5	23.167	55.	13.	117.206	10.826	14.8	16.	28.	42.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	18	250.	274.611	520.	200.	7872.016	88.724	200.	208.5	305.5	401.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/07/87-03/04/94	18	0.	5.5	32.	0.	79.559	8.92	0.	0.	10.	17.6
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/07/87-03/04/94	19	5.3	5.963	12.2	3.1	5.76	2.4	3.5	4.1	8.2	8.8

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Station Inventory for Station: CHIC0145

NPS Station ID: CHIC0145
LAT/LON: 34.506615/ -97.033809
Agency: 11NPSWRD
Date Created: 09/20/97
Location: GUY SANDY CREEK AT HIGHWAY 7
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_HARP_23
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI
Elevation: 900
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
THE SITE IS LOCATED ON THE DAVIS OKLAHOMA-MURRAY CO. 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON GUY SANDY CREEK APPROXIMATELY 1/4 MILE UPSTREAM FROM ARBUCKLE RESERVOIR WHERE HWY 7 CROSSES GUY SANDY CREEK. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0145

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	02/12/77-06/13/77	6	15.25	17.083	29.5	9.	61.142	7.819	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	02/12/77-06/13/77	6	9.55	9.417	11.5	7.1	2.102	1.45	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	02/12/77-07/01/77	7	1.	1.071	2.5	0.3	0.556	0.745	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	02/12/77-07/01/77	7	13.	13.857	32.	4.	94.476	9.72	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	02/12/77-07/01/77	5	8.2	8.3	9.	8.	0.16	0.4	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	02/12/77-07/01/77	5	8.2	8.2	9.	8.	0.173	0.415	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	02/12/77-07/01/77	5	0.006	0.006	0.01	0.001	0.	0.003	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	04/01/77-04/01/77	1	14.	14.	14.	14.	0.	0.	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	04/01/77-07/01/77	2	0.079	0.079	0.108	0.05	0.002	0.041	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	02/12/77-04/01/77	2	0.165	0.165	0.18	0.15	0.	0.021	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	04/01/77-07/01/77	2	1.03	1.03	1.33	0.73	0.18	0.424	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	04/01/77-07/01/77	2	0.053	0.053	0.07	0.035	0.001	0.025	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	02/12/77-02/12/77	1	25.	25.	25.	25.	0.	0.	**	**	**	**
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	11.	11.	11.	11.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1	13.	13.	13.	13.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	5	100.	360.	1300.	0.	290200.	538.702	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	02/27/77-06/13/77	5	2.	1.904	3.114	0.	1.365	1.168	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			80.248								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	5	240.	748.	2000.	100.	687520.	829.168	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0145

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	02/27/77-06/13/77	5	2.38	2.612	3.301	2.	0.304	0.552	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			409.535								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	02/12/77-06/13/77	6	480.	465.833	555.	350.	7404.167	86.047	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	07/01/77-07/01/77	1	0.02	0.02	0.02	0.02	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0145

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	6	0	0.00	2	0	0.00	4	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	5	1	0.20	2	0	0.00	2	1	0.50	1	0	0.00			
		Other-Lo Lim.	6.5	5	0	0.00	2	0	0.00	2	0	0.00	1	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00	1	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00	1	0	0.00									
		Drinking Water	250.	1	0	0.00	1	0	0.00									
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	0	0.00				1	0	0.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	5	2	0.40	1	0	0.00	4	2	0.50						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0146

NPS Station ID: CHIC0146
LAT/LON: 34.506753/ -97.033892
Agency: 11NPSWRD
Date Created: 05/24/97
Location: Guy Sandy Creek at Highway 7 Bridge
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): CHIC_GS1
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin: SOUTH CENTRAL MISS. R.
Elevation: 895
Water Body Id:
Minor Basin: WASHITA RIVER
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 0.00
On/Off RF1:
RF3 Index: 11130304000100.00
RF3 Mile Point: 0.00
Distance from RF3: 1.03
On/Off RF3:
Description:
Station is located on the Davis Okla 7.5' USGS quadrangle in Township/Range/Section: T1N/R3E/31. Station is known as Guy Sandy Creek Site 1 and is located on Guy Sandy Creek at the Highway 7 bridge - upstream side of westbound lane. This site was monitored because it was the first accessible site prior to entering Chickasaw National Area. Data were collected at this station as part of a water quality monitoring program maintained by the Resource Management staff at Chickasaw National Recreation Area from 1987-1994. For additional information on the station and the data stored in STORET; contact: Chickasaw National Recreation Area; P.O. Box 201; Sulphur OK 73086. Data processed and uploaded to STORET by Dean Tucker; National Park Service Water Resources Division; 1201 Oak Ridge Dr. Suite 250; Fort Collins CO 80525 (tel. 970-225-3516; fax. 970-225-9965).

Parameter Inventory for Station: CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	81	14.5	14.891	26.4	0.2	57.945	7.612	4.58	6.8	22.05	24.3
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	81	528.	519.975	622.	305.	5651.299	75.175	422.4	475.5	578.5	611.6
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	80	7.65	7.448	12.	3.5	3.468	1.862	5.41	6.025	8.975	9.79
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	81	8.2	8.042	8.7	6.9	0.098	0.314	7.44	7.85	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	81	8.2	7.893	8.7	6.9	0.121	0.348	7.44	7.85	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	81	0.006	0.013	0.126	0.002	0.	0.016	0.005	0.005	0.014	0.037
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	81	272.	261.383	316.	145.	1510.614	38.867	200.8	242.	289.5	300.8
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	80	0.05	0.056	0.17	0.	0.001	0.027	0.03	0.04	0.07	0.08
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	59	0.002	0.002	0.007	0.	0.	0.001	0.001	0.002	0.003	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	81	0.11	0.128	0.51	0.003	0.006	0.078	0.06	0.08	0.155	0.2
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	58	0.19	0.226	0.66	0.08	0.017	0.129	0.099	0.148	0.265	0.422
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	81	256.	248.926	355.	146.	1646.744	40.58	196.8	220.5	278.	290.6
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	79	22.	21.975	50.	10.	39.948	6.32	14.	17.	26.	30.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	81	250.	245.173	330.	144.	1484.495	38.529	191.2	220.5	273.5	286.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	81	0.	3.753	25.	0.	29.713	5.451	0.	0.	6.	10.8
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	63	0.18	0.234	0.79	0.02	0.026	0.161	0.094	0.14	0.28	0.508
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	81	3.	3.923	42.5	0.3	25.215	5.021	1.02	2.	4.55	6.

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0146

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	80	5	0.06	36	0	0.00	25	0	0.00	19	5	0.26			
00403	PH, LAB	Other-Hi Lim.	9.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
		Other-Lo Lim.	6.5	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	59	0	0.00	26	0	0.00	19	0	0.00	14	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	79	0	0.00	36	0	0.00	24	0	0.00	19	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	81	0	0.00	36	0	0.00	25	0	0.00	20	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Annual Analysis for 1987 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	6	17.25	16.633	24.5	5.5	54.903	7.41	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	6	530.5	527.167	619.	421.	6180.567	78.617	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	6	7.65	7.617	11.1	4.3	5.614	2.369	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	6	7.75	7.7	8.2	6.9	0.296	0.544	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	6	7.622	7.424	8.2	6.9	0.387	0.622	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	6	0.024	0.038	0.126	0.006	0.002	0.046	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	263.	253.	286.	192.	1287.6	35.883	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	0.04	0.047	0.06	0.04	0.	0.01	**	**	**	**
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	6	0.002	0.003	0.006	0.001	0.	0.002	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	6	0.135	0.15	0.25	0.11	0.003	0.053	**	**	**	**
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	6	0.27	0.315	0.54	0.19	0.016	0.127	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	6	246.	238.833	271.	181.	1206.967	34.741	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	6	20.5	20.5	24.	16.	12.7	3.564	**	**	**	**
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	240.5	235.5	271.	181.	1041.1	32.266	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	6	0.	3.333	11.	0.	27.067	5.203	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	6	1.5	1.583	3.2	0.3	1.022	1.011	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1988 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.5	14.45	24.	0.2	64.75	8.047	1.01	7.9	22.8	23.79
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	550.5	540.167	622.	305.	7186.879	84.775	362.3	520.5	604.25	619.9
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	7.25	7.417	12.	3.5	7.751	2.784	3.59	4.925	10.125	11.55
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.1	8.05	8.3	7.7	0.055	0.235	7.73	7.8	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.1	7.992	8.3	7.7	0.059	0.243	7.73	7.8	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.008	0.01	0.02	0.005	0.	0.005	0.005	0.005	0.016	0.019
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	288.	273.833	307.	145.	1909.061	43.693	175.6	269.75	296.5	304.9
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.05	0.047	0.07	0.01	0.	0.02	0.013	0.033	0.068	0.07
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.005	0.001	0.	0.001	0.001	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.1	0.118	0.22	0.06	0.003	0.059	0.06	0.063	0.178	0.211
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.15	0.201	0.66	0.09	0.023	0.153	0.093	0.123	0.218	0.537
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	272.5	254.417	288.	152.	1601.174	40.015	170.	237.	283.75	287.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	23.5	22.333	30.	10.	35.333	5.944	11.8	16.75	27.	29.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	270.5	251.5	287.	144.	1624.455	40.305	164.4	237.	276.25	284.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	2.917	9.	0.	14.447	3.801	0.	0.	7.5	8.7
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	3.7	6.317	42.5	1.	131.716	11.477	1.	1.55	4.425	31.28

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.8	15.025	24.7	5.	64.151	8.009	5.21	6.275	22.725	24.58
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	520.5	519.5	618.	369.	5824.091	76.316	387.	471.25	597.	615.6
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	6.65	6.783	9.3	3.9	2.047	1.431	4.35	6.125	8.	9.
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.15	8.008	8.2	7.4	0.075	0.275	7.46	7.825	8.2	8.2
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.147	7.912	8.2	7.4	0.086	0.293	7.46	7.825	8.2	8.2
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.007	0.012	0.04	0.006	0.	0.01	0.006	0.006	0.015	0.035
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	263.5	253.25	292.	160.	1300.023	36.056	179.5	238.5	275.75	291.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.06	0.06	0.12	0.03	0.001	0.028	0.03	0.04	0.06	0.117
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.003	0.007	0.001	0.	0.002	0.001	0.001	0.003	0.006
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.102	0.097	0.2	0.003	0.002	0.049	0.017	0.063	0.118	0.182
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.2	0.253	0.62	0.08	0.023	0.152	0.092	0.148	0.34	0.56

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1989 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	250.5	239.25	291.	146.	1463.295	38.253	166.7	217.25	266.25	286.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	18.5	20.667	33.	10.	58.97	7.679	10.9	14.	27.5	32.4
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	243.	236.583	291.	146.	1345.72	36.684	166.7	217.25	261.75	283.2
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	2.667	15.	0.	28.061	5.297	0.	0.	3.75	14.1
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.17	0.253	0.79	0.02	0.044	0.209	0.044	0.153	0.275	0.709
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	2.1	2.608	7.7	0.4	4.086	2.021	0.55	1.2	3.175	6.92

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1990 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.85	15.608	26.4	5.8	62.69	7.918	5.86	8.	23.575	26.19
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	515.	503.583	585.	321.	5060.629	71.138	362.7	476.	559.25	584.1
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	7.25	7.117	10.2	3.8	2.863	1.692	4.31	5.775	8.3	9.69
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.1	8.042	8.3	7.4	0.075	0.275	7.49	7.9	8.275	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.1	7.944	8.3	7.4	0.086	0.293	7.49	7.9	8.275	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.008	0.011	0.04	0.005	0.	0.01	0.005	0.005	0.013	0.034
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	273.	266.667	312.	161.	1687.333	41.077	184.7	248.5	299.	309.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.05	0.054	0.12	0.	0.001	0.028	0.012	0.04	0.07	0.105
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.005	0.	0.	0.001	0.	0.002	0.003	0.004
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.1	0.122	0.27	0.04	0.004	0.062	0.049	0.085	0.144	0.249
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	12	0.185	0.201	0.48	0.08	0.01	0.101	0.092	0.143	0.215	0.42
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	227.	228.083	303.	158.	2199.174	46.895	158.6	183.75	268.25	296.7
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	10	24.	25.5	50.	13.	105.389	10.266	13.4	19.25	29.75	48.2
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	227.	225.583	282.	158.	1871.902	43.265	158.6	183.75	264.5	280.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	0.	2.5	25.	0.	52.273	7.23	0.	0.	0.	19.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.165	0.186	0.37	0.03	0.01	0.1	0.048	0.103	0.275	0.352
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	2.65	3.433	7.9	0.7	4.942	2.223	1.03	1.85	5.625	7.42

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1991 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	16.15	15.383	24.3	2.6	61.045	7.813	3.17	8.025	22.9	24.09
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	538.	537.75	612.	470.	2243.477	47.365	470.3	492.25	579.5	604.8
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	7.65	7.525	9.9	5.5	2.626	1.62	5.5	5.65	9.125	9.72
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.2	8.042	8.3	7.4	0.097	0.312	7.46	7.8	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.2	7.922	8.3	7.4	0.113	0.336	7.46	7.8	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.006	0.012	0.04	0.005	0.	0.011	0.005	0.005	0.016	0.035
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	272.5	266.917	301.	208.	742.083	27.241	216.1	245.25	287.5	297.7
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.06	0.053	0.08	0.	0.	0.022	0.009	0.04	0.07	0.077
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	12	0.002	0.002	0.003	0.001	0.	0.001	0.001	0.001	0.002	0.003
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.11	0.11	0.19	0.04	0.002	0.039	0.049	0.09	0.138	0.178
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	11	0.19	0.241	0.44	0.08	0.013	0.113	0.094	0.17	0.36	0.43
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	265.	257.167	312.	204.	1054.697	32.476	206.7	222.25	279.	303.9
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	22.	22.5	30.	17.	24.636	4.964	17.	17.25	26.5	30.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	259.5	253.083	307.	200.	1001.356	31.644	202.7	221.75	270.5	300.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	4.	4.083	12.	0.	14.083	3.753	0.	0.5	5.	11.4
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.205	0.271	0.79	0.09	0.04	0.2	0.093	0.16	0.31	0.709
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	2.9	3.167	5.1	1.3	1.388	1.178	1.54	2.325	4.3	5.04

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1992 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.75	14.892	26.3	4.9	56.057	7.487	5.17	6.975	21.025	25.49
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	494.	475.	587.	307.	9023.273	94.991	311.5	401.	561.75	579.8
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	11	8.	7.745	9.8	3.9	3.617	1.902	4.24	6.8	9.7	9.78
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.2	8.15	8.7	7.4	0.101	0.318	7.55	8.	8.3	8.61
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.2	8.022	8.7	7.4	0.119	0.344	7.55	8.	8.3	8.61
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.006	0.009	0.04	0.002	0.	0.01	0.003	0.005	0.01	0.032
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	272.	256.833	316.	164.	2062.333	45.413	171.2	225.25	289.	308.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	11	0.07	0.077	0.17	0.03	0.001	0.035	0.034	0.06	0.08	0.154
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	07/02/87-05/13/92	5	0.002	0.002	0.002	0.002	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.16	0.197	0.51	0.05	0.023	0.152	0.053	0.1	0.223	0.504
00669	PHOSPHORUS, TOTAL HYDROLYZABLE (MG/L AS P)	07/02/87-05/13/92	5	0.14	0.144	0.22	0.09	0.003	0.05	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	271.	266.833	355.	178.	2492.152	49.921	190.	227.5	298.75	346.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	18.5	18.25	26.	11.	22.386	4.731	11.	15.25	21.5	25.7
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	262.	261.833	330.	178.	2108.515	45.919	190.	227.5	294.	328.8
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	1.	5.	25.	0.	62.727	7.92	0.	0.	7.25	22.3
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.17	0.247	0.65	0.1	0.033	0.182	0.106	0.125	0.283	0.629
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	4.55	5.483	20.1	0.9	24.736	4.974	1.14	2.45	6.	16.2

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1993 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	12	15.95	15.208	24.3	2.8	61.45	7.839	3.28	7.325	22.7	23.94
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	12	535.5	530.667	621.	408.	4422.242	66.5	423.3	469.25	579.75	620.7
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	12	8.05	7.617	9.5	5.6	2.156	1.468	5.66	5.95	9.	9.44
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	12	8.2	8.075	8.3	7.4	0.084	0.29	7.49	7.875	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	12	8.2	7.964	8.3	7.4	0.097	0.312	7.49	7.875	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	12	0.006	0.011	0.04	0.005	0.	0.01	0.005	0.005	0.014	0.034
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	266.	256.083	310.	159.	1907.538	43.675	171.3	233.5	282.5	310.
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.05	0.05	0.1	0.	0.001	0.028	0.006	0.03	0.075	0.094
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	12	0.1	0.109	0.19	0.03	0.002	0.043	0.045	0.08	0.143	0.181
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	12	259.5	251.667	300.	195.	1196.97	34.597	198.	219.25	280.5	298.5
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	12	22.5	23.25	30.	18.	15.477	3.934	18.	20.25	26.75	29.1
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	250.5	247.333	295.	189.	1138.788	33.746	193.8	215.5	272.5	294.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	12	4.5	4.333	10.	0.	16.424	4.053	0.	0.	8.	10.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	12	0.21	0.238	0.49	0.09	0.013	0.114	0.105	0.165	0.278	0.466
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	12	3.65	3.667	5.	2.5	0.784	0.886	2.59	2.85	4.6	4.97

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	3	4.3	6.533	12.2	3.1	24.443	4.944	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	3	567.	558.333	615.	493.	3777.333	61.46	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	3	9.3	9.133	9.8	8.3	0.583	0.764	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	3	8.3	8.267	8.3	8.2	0.003	0.058	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	3	8.3	8.264	8.3	8.2	0.003	0.058	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	3	0.005	0.005	0.006	0.005	0.	0.001	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	3	277.	257.	290.	204.	2149.	46.357	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	3	0.05	0.053	0.08	0.03	0.001	0.025	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	3	0.14	0.14	0.16	0.12	0.	0.02	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	3	271.	253.667	284.	206.	1746.333	41.789	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	3	24.	24.667	27.	23.	4.333	2.082	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Annual Analysis for 1994 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	3	259.	245.	274.	202.	1443.	37.987	**	**	**	**
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	3	10.	8.667	12.	4.	17.333	4.163	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/18/89-03/03/94	3	0.14	0.14	0.17	0.11	0.001	0.03	**	**	**	**
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	3	3.4	4.067	6.	2.8	2.893	1.701	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #1: 9/15 to 2/28 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	36	6.4	8.111	21.3	0.2	20.438	4.521	2.87	4.925	12.3	13.56
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	36	533.5	518.75	621.	305.	7554.65	86.917	381.9	476.75	587.25	615.
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	36	8.1	8.119	12.	5.8	2.173	1.474	6.1	6.725	9.15	9.85
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	36	8.2	8.089	8.3	6.9	0.079	0.281	7.77	7.9	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	36	8.2	7.933	8.3	6.9	0.104	0.322	7.77	7.9	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	36	0.006	0.012	0.126	0.005	0.	0.02	0.005	0.005	0.013	0.017
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	36	280.	259.278	310.	145.	2303.235	47.992	163.1	235.	290.	302.6
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	36	0.045	0.047	0.09	0.	0.	0.021	0.017	0.033	0.068	0.07
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	36	0.12	0.142	0.51	0.06	0.009	0.097	0.07	0.1	0.148	0.229
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	36	255.5	248.25	326.	152.	2073.107	45.531	174.7	220.25	285.	297.1
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	36	22.	21.778	33.	10.	31.321	5.596	14.4	17.25	26.75	29.3
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	36	251.5	245.472	326.	144.	2019.571	44.94	174.7	220.25	283.5	295.6
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	36	0.	2.778	12.	0.	15.263	3.907	0.	0.	5.	10.
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	36	2.35	3.986	42.5	0.3	47.238	6.873	0.84	1.3	4.4	6.06

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #2: 3/01 to 6/30 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	25	18.8	18.056	26.4	8.3	24.804	4.98	10.16	13.4	22.6	23.42
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	25	524.	527.48	622.	392.	2930.26	54.132	450.6	494.5	566.5	595.4
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	25	8.2	8.276	10.5	5.6	1.791	1.338	6.76	7.1	9.45	10.06
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	25	8.2	8.212	8.4	8.1	0.009	0.093	8.1	8.1	8.3	8.3
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	25	8.2	8.203	8.4	8.1	0.009	0.093	8.1	8.1	8.3	8.3
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	25	0.006	0.006	0.008	0.004	0.	0.001	0.005	0.005	0.008	0.008
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	25	266.	266.64	312.	219.	390.657	19.765	237.6	260.	276.	292.2
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	25	0.06	0.065	0.17	0.02	0.001	0.035	0.03	0.04	0.08	0.12
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	25	0.1	0.104	0.27	0.003	0.004	0.06	0.036	0.06	0.138	0.194
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	25	261.	257.08	303.	173.	676.91	26.017	222.	246.	271.5	286.2
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	24	25.	25.417	50.	11.	51.036	7.144	17.	22.25	27.75	31.5
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	25	258.	251.96	280.	173.	540.707	23.253	222.	242.	266.5	277.4
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	25	2.	5.12	25.	0.	43.86	6.623	0.	0.	9.	15.4
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	25	3.4	4.088	20.1	1.5	12.75	3.571	1.76	2.35	4.9	5.58

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Seasonal Analysis for Season #3: 7/01 to 9/14 - Station CHIC0146

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	07/02/87-03/03/94	20	23.45	23.14	26.3	19.6	3.094	1.759	21.3	21.4	24.3	25.6
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	07/02/87-03/03/94	20	522.	512.8	620.	322.	6045.958	77.756	378.	470.25	582.	617.1
00300	OXYGEN, DISSOLVED MG/L	07/02/87-03/03/94	19	5.5	5.084	6.3	3.5	0.856	0.925	3.8	3.9	5.8	6.1
00403	PH, LAB, STANDARD UNITS SU	07/02/87-03/03/94	20	7.75	7.745	8.7	7.4	0.124	0.352	7.4	7.4	7.975	8.19
00403	CONVERTED PH, LAB, STANDARD UNITS	07/02/87-03/03/94	20	7.747	7.639	8.7	7.4	0.135	0.368	7.4	7.4	7.975	8.19
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	07/02/87-03/03/94	20	0.018	0.023	0.04	0.002	0.	0.014	0.006	0.011	0.04	0.04
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	20	258.	258.6	316.	160.	1571.305	39.64	192.4	238.5	290.	308.4
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	07/02/87-03/03/94	19	0.06	0.059	0.1	0.	0.	0.02	0.04	0.05	0.07	0.08
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	07/02/87-03/03/94	20	0.12	0.132	0.23	0.05	0.003	0.052	0.061	0.094	0.188	0.2
00900	HARDNESS, TOTAL (MG/L AS CACO3)	07/02/87-03/03/94	20	230.	239.95	355.	146.	2086.576	45.679	180.7	215.	270.	297.3
00945	SULFATE, TOTAL (MG/L AS SO4)	07/02/87-03/03/94	19	18.	18.	24.	10.	14.444	3.801	11.	16.	20.	24.
45634	HARDNESS, CALCIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	20	230.	236.15	330.	146.	1700.766	41.24	180.7	212.75	265.75	290.1
45635	HARDNESS, MAGNESIUM, AS CAC03, WATER, WHOLE, MG/L	07/02/87-03/03/94	20	0.	3.8	25.	0.	37.326	6.11	0.	0.	5.	10.8
82079	TURBIDITY,LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	07/02/87-03/03/94	20	3.3	3.605	7.7	1.	2.896	1.702	1.21	2.425	4.425	6.92

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding box-and-whisker plot

Station Inventory for Station: CHIC0147

NPS Station ID: CHIC0147
Location: GUY SANDY CREEK
Station Type: /TYPA/AMBNT/STREAM
RMI-Indexes:
RMI-Miles:
HUC: 11130303
Major Basin: T/ARBUCKLE RESERVOIR
Minor Basin: OK HWY 7 BRDG 4.5 MI W OF DAVIS
RF1 Index: 11130303009
RF3 Index: 11130303060000.00
Description:
OK HWY 7 BRDG 4.5 MI W OF DAVIS SEC31 T1N R3E LU

LAT/LON: 34.515281/ -97.033338
Depth of Water: 0
Elevation: 0
RF1 Mile Point: 4.360
RF3 Mile Point: 0.28

Agency: 11EPALES
FIPS State/County: 40000 OKLAHOMA/
STORET Station ID(s): 4002B1
Within Park Boundary: No
Aquifer:
Water Body Id:
ECO Region:
Distance from RF1: 0.00
Distance from RF3: 0.14

Date Created: / /
On/Off RF1: OFF
On/Off RF3:

Parameter Inventory for Station: CHIC0147

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/25/74-10/20/75	13	0.025	0.032	0.095	0.003	0.001	0.027	0.006	0.013	0.045	0.086
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/25/74-10/20/75	13	0.95	1.362	3.4	0.5	1.147	1.071	0.5	0.575	2.	3.4
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	11/25/74-10/20/75	13	0.09	0.142	0.62	0.01	0.025	0.157	0.014	0.05	0.185	0.456
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/25/74-10/20/75	13	0.05	0.095	0.26	0.02	0.006	0.078	0.024	0.045	0.155	0.24
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	11/25/74-10/20/75	13	0.025	0.028	0.06	0.008	0.	0.015	0.009	0.018	0.038	0.054

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0147

						----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00630 NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	13	0	0.00	5	0	0.00	5	0	0.00	3	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0148

NPS Station ID: CHIC0148
LAT/LON: 34.515559/ -96.968337
Agency: 112WRD
Date Created: 01/30/93
Location: 01N-03E-34 ADAC 1 BELOW HWY 177 BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 07329844
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 21.90
On/Off RF1:
RF3 Index: 11130303086000.00
RF3 Mile Point: 0.00
Distance from RF3: 0.03
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0148

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/16/76-09/05/76	3	25.	25.333	27.	24.	2.333	1.528	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/16/76-09/05/76	3	8.4	8.533	8.8	8.4	0.053	0.231	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-09/05/76	1	1.8	1.8	1.8	1.8	0.	0.	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/23/76-09/05/76	2	32.4	32.4	42.8	22.	216.32	14.708	**	**	**	**
00400	PH (STANDARD UNITS)	06/16/76-09/05/76	3	7.8	8.167	8.9	7.8	0.403	0.635	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/16/76-09/05/76	3	7.8	7.959	8.9	7.8	0.468	0.684	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/16/76-09/05/76	3	0.016	0.011	0.016	0.001	0.	0.008	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-06/23/76	2	248.	248.	292.	204.	3872.	62.225	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/16/76-06/16/76	1	4.	4.	4.	4.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/16/76-06/23/76	2	61.5	61.5	64.	59.	12.5	3.536	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/16/76-09/05/76	3	675.	1295.	2600.	610.	1278325.	1130.63	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0148

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	3	0	0.00				2	0	0.00	1	0	0.00			
00400	PH	Other-Hi Lim.	9.	3	0	0.00				2	0	0.00	1	0	0.00			
		Other-Lo Lim.	6.5	3	0	0.00				2	0	0.00	1	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	0	0.00				2	0	0.00						
		Drinking Water	250.	2	0	0.00				2	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0149

NPS Station ID: CHIC0149 LAT/LON: 34.515616/ -96.968616 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK AT HWY 177 DOWNSTREAM OF BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_11
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 950 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK DOWNSTREAM OF THE BRIDGE AT HIGHWAY 177 APPROXIMATELY A 1/2 MILE EAST OF LUCY LAKE. CHIC_HARP_10 IS ON THE UPSTREAM SIDE OF BRIDGE. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0149

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/14/76-06/23/77	20	14.25	16.95	27.	7.	48.024	6.93	7.2	11.25	24.75	25.9
00300	OXYGEN, DISSOLVED MG/L	06/14/76-06/23/77	21	8.8	9.19	14.4	5.8	2.887	1.699	7.3	8.4	9.75	11.2
00310	BOD, 5 DAY, 20 DEG C MG/L	09/05/76-07/01/77	18	1.3	1.344	2.4	0.7	0.165	0.406	0.79	1.1	1.6	1.86
00340	COD, .25N K2CR2O7 MG/L	06/14/76-07/01/77	20	21.5	28.75	178.	3.	1323.355	36.378	12.	13.25	27.75	42.3
00403	PH, LAB, STANDARD UNITS SU	06/14/76-07/01/77	20	7.9	8.03	9.	6.9	0.257	0.507	7.71	7.8	8.15	8.9
00403	CONVERTED PH, LAB, STANDARD UNITS	06/14/76-07/01/77	20	7.9	7.772	9.	6.9	0.327	0.572	7.71	7.8	8.15	8.9
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/14/76-07/01/77	20	0.013	0.017	0.126	0.001	0.001	0.026	0.001	0.007	0.016	0.02
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/16/76-01/21/77	5	196.	210.4	292.	180.	2188.8	46.785	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/14/76-04/01/77	7	3.	13.429	52.	1.	378.286	19.45	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-07/01/77	6	0.19	0.645	2.97	0.11	1.302	1.141	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-03/09/77	4	0.12	0.118	0.16	0.07	0.002	0.049	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-07/01/77	7	0.085	0.458	1.5	0.	0.414	0.644	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-07/01/77	5	0.045	0.044	0.09	0.005	0.001	0.03	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/14/76-03/09/77	10	174.	288.5	580.	59.	47306.278	217.5	59.5	102.25	547.75	580.
01027	CADMIUM, TOTAL (UG/L AS CD)	04/23/77-04/23/77	1 ##	0.5	0.5	0.5	0.5	0.	0.	**	**	**	**
01034	CHROMIUM, TOTAL (UG/L AS CR)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01042	COPPER, TOTAL (UG/L AS CU)	04/23/77-04/23/77	1	6.	6.	6.	6.	0.	0.	**	**	**	**
01051	LEAD, TOTAL (UG/L AS PB)	04/23/77-04/23/77	1	16.	16.	16.	16.	0.	0.	**	**	**	**
01092	ZINC, TOTAL (UG/L AS ZN)	04/23/77-04/23/77	1	10.	10.	10.	10.	0.	0.	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	09/18/76-12/19/76	6	86000.	119166.667	260000.	20000.	9573766666.667	97845.627	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	09/18/76-12/19/76	6	4.934	4.927	5.415	4.301	0.178	0.422	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			84461.438								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0149

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	13	1400.	2964.615	18500.	40.	23827943.59	4881.387	184.	600.	3350.	13100.
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	09/18/76-06/23/77	13	3.146	3.103	4.267	1.602	0.404	0.636	2.002	2.778	3.525	4.04
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			1266.876								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	11	10900.	17672.727	65000.	3600.	345288181.818	18581.932	3600.	3600.	28000.	58240.
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-06/23/77	11	4.037	4.048	4.813	3.556	0.192	0.438	3.556	3.556	4.447	4.749
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			11165.366								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/14/76-06/23/77	21	1900.	1546.429	2600.	450.	724197.857	850.998	468.	642.5	2350.	2500.
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-07/01/77	5 ##	0.	0.008	0.03	0.	0.	0.013	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0149

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	21	0	0.00	11	0	0.00	9	0	0.00	1	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	20	1	0.05	11	1	0.09	7	0	0.00	2	0	0.00			
		Other-Lo Lim.	6.5	20	0	0.00	11	0	0.00	7	0	0.00	2	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	4	0	0.00	3	0	0.00	1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	10	0	0.00	6	0	0.00	4	0	0.00						
		Drinking Water	250.	10	4	0.40	6	3	0.50	4	1	0.25						
01027	CADMIUM, TOTAL	Fresh Acute	3.9	1	0	0.00				1	0	0.00						
		Drinking Water	5.	1	0	0.00				1	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	1	0	0.00				1	0	0.00						
01042	COPPER, TOTAL	Fresh Acute	18.	1	0	0.00				1	0	0.00						
		Drinking Water	1300.	1	0	0.00				1	0	0.00						
01051	LEAD, TOTAL	Fresh Acute	82.	1	0	0.00				1	0	0.00						
		Drinking Water	15.	1	1	1.00				1	1	1.00						
01092	ZINC, TOTAL	Fresh Acute	120.	1	0	0.00				1	0	0.00						
		Drinking Water	5000.	1	0	0.00				1	0	0.00						
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	6	6	1.00	6	6	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	13	12	0.92	7	7	1.00	6	5	0.83						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0150

NPS Station ID: CHIC0150 LAT/LON: 34.515671/ -96.968253 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BELOW BRIDGE 1/2 MI EAST OF LACY LAKE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_SCH_T3_10
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 0 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY 1000 FEET NORTH OF SULPHUR AND A 1/2 MILE EAST OF LACY LAKE. SAMPLING FOR THIS SITE WAS DONE ON OCTOBER 28 1975 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR TOTAL COLIFORM; FECAL COLIFORM; AND CHEMICAL OXYGEN DEMAND. THE RESULTS WERE PUBLISHED IN THE 1976 REPORT "WATER QUALITY STUDY FOR PLATT NATIONAL PARK" BY MICHAEL SCHORNICK; MARGARET JOHANNING; AND DR. LEALE E. STREEBIN; ALL WITH THE SCHOOL OF CIVIL ENGINEERING AT THE UNIVERSITY OF OKLAHOMA. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0150

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00340	COD, .25N K2CR2O7 MG/L	10/28/75-01/09/76	3	20.	26.667	45.	15.	258.333	16.073	**	**	**	**
31503	COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35 C	10/28/75-01/09/76	3	1900.	1866.667	2100.	1600.	63333.333	251.661	**	**	**	**
31503	LOG COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,3	10/28/75-01/09/76	3	3.279	3.268	3.322	3.204	0.004	0.06	**	**	**	**
31503	GM COLIFORM,TOT,MEMBR FILTER,DELAYED,M-ENDO MED,35	GEOMETRIC MEAN =			1855.087								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	300.	266.667	300.	200.	3333.333	57.735	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/28/75-01/09/76	3	2.477	2.418	2.477	2.301	0.01	0.102	**	**	**	**
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			262.074								

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0150

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	3	3	1.00	3	3	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0151

NPS Station ID: CHIC0151
LAT/LON: 34.515837/ -96.968060
Agency: 112WRD
Date Created: 11/14/92
Location: 01N-03E-34 ADAD 1 ABOVE HWY 177 BRIDGE
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 343057096580501
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130304
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130304
RF1 Mile Point: 0.000
Distance from RF1: 2.50
On/Off RF1:
RF3 Index: 11130303000703.57
RF3 Mile Point: 3.56
Distance from RF3: 0.00
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0151

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/23/76-06/23/76	1	26.	26.	26.	26.	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	1	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00335	COD, .025N K2CR2O7 MG/L	06/23/76-06/23/76	1	22.	22.	22.	22.	0.	0.	**	**	**	**
00400	PH (STANDARD UNITS)	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/23/76-06/23/76	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	1	317.	317.	317.	317.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	1	60.	60.	60.	60.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	1	1065.	1065.	1065.	1065.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0151

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00400	PH	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
		Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0152

NPS Station ID: CHIC0152 LAT/LON: 34.515948/ -96.967866 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK AT HWY 177 UPSTREAM OF BRIDGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_10
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 950 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK UPSTREAM OF THE BRIDGE AT HIGHWAY 177 APPROXIMATELY A 1/2 MILE EAST OF LUCY LAKE. CHIC_HARP_11 IS ON THE DOWNSTREAM SIDE OF BRIDGE. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0152

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	06/23/76-06/23/76	1	26.	26.	26.	26.	0.	0.	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	06/23/76-06/23/76	1	7.9	7.9	7.9	7.9	0.	0.	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	06/23/76-06/23/76	1	22.	22.	22.	22.	0.	0.	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	06/23/76-06/23/76	1	8.	8.	8.	8.	0.	0.	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	06/23/76-06/23/76	1	0.01	0.01	0.01	0.01	0.	0.	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	06/23/76-06/23/76	1	317.	317.	317.	317.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	06/23/76-06/23/76	1	3.	3.	3.	3.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	06/23/76-06/23/76	1	60.	60.	60.	60.	0.	0.	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	06/23/76-06/23/76	1	1065.	1065.	1065.	1065.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0152

				Total	Exceed	Prop.	----------9/15-2/28----------			----------3/01-6/30----------			----------7/01-9/14----------			----------n/a----------		
Parameter		Std. Type	Std. Value	Obs	Standard	Exceeding	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.	Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1	0	0.00				1	0	0.00						
00403	PH, LAB	Other-Hi Lim.	9.	1	0	0.00				1	0	0.00						
		Other-Lo Lim.	6.5	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0152

Parameter	Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00940 CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	1	0	0.00				1	0	0.00						
	Drinking Water	250.	1	0	0.00				1	0	0.00						

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0153

NPS Station ID: CHIC0153 LAT/LON: 34.520976/ -96.966366 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK BELOW OG&E COOLING WATER DISCHARGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_21
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 950 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK BELOW THE OG&E COOLING WATER DISCHARGE APPROXIMATELY 1000 FEET SOUTH OF THE OG&E POWER PLANT. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0153

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-01/21/77	5	13.5	13.3	17.	10.	8.2	2.864	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	10/16/76-01/21/77	6	9.3	9.717	13.4	7.5	4.706	2.169	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	10/16/76-01/21/77	6	1.2	1.167	1.5	0.8	0.051	0.225	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	10/30/76-01/21/77	5	14.	18.6	35.	2.	216.3	14.707	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	10/16/76-01/21/77	6	7.65	7.65	8.5	7.1	0.259	0.509	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	10/16/76-01/21/77	6	7.625	7.458	8.5	7.1	0.303	0.551	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/16/76-01/21/77	6	0.024	0.035	0.079	0.003	0.001	0.03	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	2	161.	161.	182.	140.	882.	29.698	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-01/21/77	3	4.	3.333	5.	1.	4.333	2.082	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	2 ##	0.07	0.07	0.14	0.	0.01	0.099	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	2	0.23	0.23	0.23	0.23	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	11/14/76-01/21/77	2	0.215	0.215	0.37	0.06	0.048	0.219	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-01/21/77	2	0.033	0.033	0.035	0.03	0.	0.004	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-01/21/77	3	625.	516.	730.	193.	81003.	284.61	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/19/76	5	27000.	31340.	56000.	9000.	538528000.	23206.206	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	10/16/76-12/19/76	5	4.431	4.372	4.748	3.954	0.151	0.388	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			23560.567								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	6	140.	353.333	1500.	0.	327786.667	572.527	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	6	2.102	1.91	3.176	0.	1.164	1.079	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			81.264								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	6	170.	473.333	2100.	60.	640386.667	800.242	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	6	2.202	2.314	3.322	1.778	0.297	0.545	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0153

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			206.039								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-01/21/77	6	3005.	3118.333	4000.	2600.	261816.667	511.68	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	2 ##	0.01	0.01	0.02	0.	0.	0.014	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0153

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	6	0	0.00	6	0	0.00									
00403	PH, LAB	Other-Hi Lim.	9.	6	0	0.00	6	0	0.00									
		Other-Lo Lim.	6.5	6	0	0.00	6	0	0.00									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00	2	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00	3	0	0.00									
		Drinking Water	250.	3	2	0.67	3	2	0.67									
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	5	5	1.00	5	5	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	6	3	0.50	6	3	0.50									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0154

NPS Station ID: CHIC0154 LAT/LON: 34.522837/ -96.968032 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK AT OG&E COOLING WATER DISCHARGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_19
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 950 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY 200 FEET WEST OF THE OG&E POWER PLANT WHERE THE COOLING WATER IS DISCHARGED. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0154

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	01/21/76-12/19/76	5	24.	22.9	25.	19.5	4.8	2.191	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	10/16/76-12/19/76	4	9.2	9.575	12.	7.9	3.229	1.797	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	01/21/76-12/19/76	6	39.5	50.833	154.	6.	2776.967	52.697	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	01/21/76-12/12/76	4	7.35	7.35	7.8	6.9	0.137	0.37	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	01/21/76-12/12/76	4	7.347	7.237	7.8	6.9	0.154	0.392	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	01/21/76-12/12/76	4	0.045	0.058	0.126	0.016	0.002	0.048	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	01/21/76-01/21/76	1	92.	92.	92.	92.	0.	0.	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	01/21/76-11/14/76	2	1.5	1.5	2.	1.	0.5	0.707	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	01/21/76-01/21/76	1	2.2	2.2	2.2	2.2	0.	0.	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	01/21/76-01/21/76	1	0.625	0.625	0.625	0.625	0.	0.	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	01/21/76-10/16/76	2	0.15	0.15	0.19	0.11	0.003	0.057	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	01/21/76-01/21/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	01/21/76-10/30/76	2	1327.5	1327.5	1375.	1280.	4512.5	67.175	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	01/21/76-12/19/76	6	4975.	24891.667	65000.	4600.	965226416.667	31068.093	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	01/21/76-01/21/76	1 ##	0.	0.	0.	0.	0.	0.	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0154

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	4	0	0.00	4	0	0.00									
00403	PH, LAB	Other-Hi Lim.	9.	4	0	0.00	4	0	0.00									
		Other-Lo Lim.	6.5	4	0	0.00	4	0	0.00									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1	0	0.00	1	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	2	2	1.00	2	2	1.00									
		Drinking Water	250.	2	2	1.00	2	2	1.00									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0155

NPS Station ID: CHIC0155 LAT/LON: 34.524754/ -96.968755 Agency: 11NPSWRD Date Created: 09/20/97
Location: ROCK CREEK ABOVE OG&E COOLING WATER DISCHARGE FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM STORET Station ID(s): CHIC_HARP_20
RMI-Indexes: Within Park Boundary: No
RMI-Miles:
HUC: 11130303 Depth of Water: 0 Aquifer:
Major Basin: SO CEN LOWER MISSISSIPPI Elevation: 950 Water Body Id:
Minor Basin: WASHITA RIVER ECO Region:
RF1 Index: 11130303 RF1 Mile Point: 0.000 Distance from RF1: 0.00 On/Off RF1:
RF3 Index: 11130304000100.00 RF3 Mile Point: 0.00 Distance from RF3: 1.03 On/Off RF3:
Description:
THE SITE IS LOCATED ON THE SULPHUR NORTH OKLAHOMA 7.5 MINUTE SERIES (TOPOGRAPHIC) QUADRANGLE. THE SITE IS ON ROCK CREEK APPROXIMATELY 1000 FEET NORTH OF THE OG&E POWER PLANT COOLING WATER DISCHARGE. SAMPLING FOR THIS SITE WAS DONE FROM JUNE 1976 THROUGH JULY 1977 IN AN EFFORT TO IDENTIFY POSSIBLE SOURCES OF POLLUTION. THE SAMPLES WERE ANALYZED FOR PHYSICAL; CHEMICAL; AND BIOLOGICAL PROPERTIES. THE STUDY WAS FUNDED BY THE NATIONAL PARK SERVICE; AND THE RESULTS WERE PUBLISHED IN THE 1977 REPORT "WATER QUALITY MANAGEMENT STUDY FOR CHICKASAW NATIONAL RECREATION AREA" BY LEALE E. STREEBIN AND JAMES F. HARP. FOR INFORMATION ON CHICKASAW NATIONAL RECREATION AREA CONTACT RESOURCE MANAGEMENT AT CHICKASAW NRA P.O. BOX 201 SULPHUR OK 73086. TEL (405) 622-3165. DATA WERE PROCESSED AND UPLOADED TO STORET BY PAUL MCELVERY NPS-WRD FORT COLLINS COLORADO 80525. TEL (970) 225-3516.

Parameter Inventory for Station: CHIC0155

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/16/76-01/21/77	5	13.	11.9	14.	8.	6.05	2.46	**	**	**	**
00300	OXYGEN, DISSOLVED MG/L	10/16/76-01/21/77	6	9.45	9.717	11.2	8.5	1.622	1.273	**	**	**	**
00310	BOD, 5 DAY, 20 DEG C MG/L	10/16/76-01/21/77	6	0.95	1.183	2.5	0.5	0.574	0.757	**	**	**	**
00340	COD, .25N K2CR2O7 MG/L	10/16/76-01/21/77	6	6.5	10.833	23.	3.	83.767	9.152	**	**	**	**
00403	PH, LAB, STANDARD UNITS SU	10/16/76-01/21/77	6	7.95	7.967	9.1	6.9	0.487	0.698	**	**	**	**
00403	CONVERTED PH, LAB, STANDARD UNITS	10/16/76-01/21/77	6	7.947	7.543	9.1	6.9	0.702	0.838	**	**	**	**
00403	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/16/76-01/21/77	6	0.011	0.029	0.126	0.001	0.002	0.048	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/16/76-01/21/77	2	233.	233.	254.	212.	882.	29.698	**	**	**	**
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10/16/76-01/21/77	3	1.	2.	5.	0.	7.	2.646	**	**	**	**
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	11/14/76-01/21/77	2 ##	0.14	0.14	0.28	0.	0.039	0.198	**	**	**	**
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	11/14/76-01/21/77	2 ##	0.035	0.035	0.07	0.	0.002	0.049	**	**	**	**
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	10/16/76-01/21/77	3	0.34	0.333	0.38	0.28	0.003	0.05	**	**	**	**
00665	PHOSPHORUS, TOTAL (MG/L AS P)	11/14/76-01/21/77	2	0.037	0.037	0.06	0.013	0.001	0.033	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/16/76-01/21/77	3	82.	78.333	110.	43.	1132.333	33.65	**	**	**	**
31501	COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,35C	10/16/76-12/19/76	5	21000.	19200.	27000.	10000.	55200000.	7429.67	**	**	**	**
31501	LOG COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,	10/16/76-12/19/76	5	4.322	4.253	4.431	4.	0.035	0.188	**	**	**	**
31501	GM COLIFORM,TOT,MEMBRANE FILTER,IMMED.M-ENDO MED,3	GEOMETRIC MEAN =			17909.905								
31616	FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	6	125.	233.333	720.	0.	79026.667	281.117	**	**	**	**
31616	LOG FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	10/16/76-01/21/77	6	2.	1.823	2.857	0.	1.073	1.036	**	**	**	**
31616	GM FECAL COLIFORM,MEMBR FILTER,M-FC BROTH,44.5 C	GEOMETRIC MEAN =			66.489								
31673	FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	6	170.	471.667	1900.	10.	519776.667	720.955	**	**	**	**
31673	LOG FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	10/16/76-01/21/77	6	2.227	2.214	3.279	1.	0.599	0.774	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

Parameter Inventory for Station: CHIC0155

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
31673	GM FECAL STREPTOCOCCI, MBR FILT,KF AGAR,35C,48HR	GEOMETRIC MEAN =			163.824								
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	10/16/76-01/21/77	6	850.	891.667	1150.	650.	39416.667	198.536	**	**	**	**
70507	PHOSPHORUS,IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	11/14/76-01/21/77	2 ##	0.003	0.003	0.005	0.	0.	0.004	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0155

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	6	0	0.00	6	0	0.00									
00403	PH, LAB	Other-Hi Lim.	9.	6	1	0.17	6	1	0.17									
		Other-Lo Lim.	6.5	6	0	0.00	6	0	0.00									
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	2	0	0.00	2	0	0.00									
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	3	0	0.00	3	0	0.00									
		Drinking Water	250.	3	0	0.00	3	0	0.00									
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	5	5	1.00	5	5	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	6	3	0.50	6	3	0.50									

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

Station Inventory for Station: CHIC0156

NPS Station ID: CHIC0156
LAT/LON: 34.527781/ -96.966670
Agency: 112WRD
Date Created: / /
Location: ROCK CREEK N OF SULPHUR, OK
FIPS State/County: 40099 OKLAHOMA/MURRAY
Station Type: /TYPA/AMBNT/STREAM
STORET Station ID(s): 07329843
RMI-Indexes:
Within Park Boundary: No
RMI-Miles:
HUC: 11130303
Depth of Water: 0
Aquifer:
Major Basin:
Elevation: 0
Water Body Id:
Minor Basin:
ECO Region:
RF1 Index: 11130303
RF1 Mile Point: 0.000
Distance from RF1: 1.40
On/Off RF1:
RF3 Index: 11130303000900.00
RF3 Mile Point: 1.47
Distance from RF3: 0.04
On/Off RF3:
Description:

Parameter Inventory for Station: CHIC0156

Parameter		Period of Record	Obs	Median	Mean	Maximum	Minimum	Variance	Std. Dev.	10th	25th	75th	90th
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	10/30/58-09/16/59	3	19.4	21.467	27.8	17.2	31.293	5.594	**	**	**	**
00060	FLOW, STREAM, MEAN DAILY CFS	10/30/58-09/16/59	3	0.9	0.667	1.	0.1	0.243	0.493	**	**	**	**
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	10/30/58-08/23/60	5	1300.	1500.	2100.	1120.	178200.	422.137	**	**	**	**
00400	PH (STANDARD UNITS)	10/30/58-08/23/60	5	8.2	8.24	8.3	8.2	0.003	0.055	**	**	**	**
00400	CONVERTED PH (STANDARD UNITS)	10/30/58-08/23/60	5	8.2	8.237	8.3	8.2	0.003	0.055	**	**	**	**
00400	MICRO EQUIVALENTS/LITER OF H+ COMPUTED FROM PH	10/30/58-08/23/60	5	0.006	0.006	0.006	0.005	0.	0.001	**	**	**	**
00405	CARBON DIOXIDE (MG/L AS CO2)	10/30/58-08/23/60	5	1.4	1.74	2.7	1.1	0.573	0.757	**	**	**	**
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	10/30/58-08/23/60	5	113.	149.8	218.	112.	2704.2	52.002	**	**	**	**
00440	BICARBONATE ION (MG/L AS HCO3)	10/30/58-08/23/60	5	136.	180.	266.	128.	4322.	65.742	**	**	**	**
00445	CARBONATE ION (MG/L AS CO3)	10/30/58-08/23/60	5	0.	1.2	4.	0.	3.2	1.789	**	**	**	**
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	07/20/60-08/23/60	2	0.205	0.205	0.27	0.14	0.008	0.092	**	**	**	**
00900	HARDNESS, TOTAL (MG/L AS CACO3)	10/30/58-08/23/60	5	250.	279.2	360.	230.	3333.2	57.734	**	**	**	**
00902	HARDNESS, NON-CARBONATE (MG/L AS CACO3)	10/30/58-08/23/60	5	118.	129.2	248.	32.	9297.2	96.422	**	**	**	**
00915	CALCIUM, DISSOLVED (MG/L AS CA)	10/30/58-08/23/60	5	54.	53.2	66.	34.	139.2	11.798	**	**	**	**
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	10/30/58-08/23/60	5	35.	35.8	48.	25.	94.7	9.731	**	**	**	**
00930	SODIUM, DISSOLVED (MG/L AS NA)	10/30/58-08/23/60	5	174.	200.	278.	143.	3831.5	61.899	**	**	**	**
00931	SODIUM ADSORPTION RATIO	10/30/58-08/23/60	5	4.8	5.16	6.4	4.1	1.153	1.074	**	**	**	**
00932	SODIUM, PERCENT	10/30/58-09/16/59	3	60.	60.667	63.	59.	4.333	2.082	**	**	**	**
00940	CHLORIDE,TOTAL IN WATER MG/L	10/30/58-08/23/60	5	278.	334.	480.	235.	10784.5	103.848	**	**	**	**
00945	SULFATE, TOTAL (MG/L AS SO4)	07/20/60-08/23/60	2	99.5	99.5	179.	20.	12640.5	112.43	**	**	**	**
70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	07/20/60-08/23/60	2	869.5	869.5	1090.	649.	97240.5	311.834	**	**	**	**
70303	SOLIDS, DISSOLVED-TONS PER ACRE-FT	07/20/60-08/23/60	2	1.18	1.18	1.48	0.88	0.18	0.424	**	**	**	**
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	07/20/60-08/23/60	2	0.9	0.9	1.2	0.6	0.18	0.424	**	**	**	**

** - Less than 9 observations ## - Computed with 50% or more of the total observations as values that were half the detection limit p - Has a corresponding time series plot

EPA Water Quality Criteria Analysis for Station: CHIC0156

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	9/15-2/28 Obs	9/15-2/28 Exceed	9/15-2/28 Prop.	3/01-6/30 Obs	3/01-6/30 Exceed	3/01-6/30 Prop.	7/01-9/14 Obs	7/01-9/14 Exceed	7/01-9/14 Prop.	n/a Obs	n/a Exceed	n/a Prop.
00400	PH	Other-Hi Lim.	9.	5	0	0.00	3	0	0.00				2	0	0.00			
		Other-Lo Lim.	6.5	5	0	0.00	3	0	0.00				2	0	0.00			
00618	NITRATE NITROGEN, DISSOLVED AS N	Drinking Water	10.	2	0	0.00							2	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	5	0	0.00	3	0	0.00				2	0	0.00			
		Drinking Water	250.	5	4	0.80	3	3	1.00				2	1	0.50			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Station: CHIC0156

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	2	0	0.00							2	0	0.00			
71851	NITRATE NITROGEN, DISSOLVED (AS NO3)	Drinking Water	44.	2	0	0.00							2	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Entire CHIC Study Area

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
00076	TURBIDITY, HACH TURBIDIMETER	Other-Hi Lim.	50.	3	0	0.00	1	0	0.00	1	0	0.00	1	0	0.00			
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	Other-Lo Lim.	4.	61 &	29	0.48	8	0	0.00	45	25	0.56	8	4	0.50			
00300	OXYGEN, DISSOLVED	Other-Lo Lim.	4.	1524	213	0.14	654	77	0.12	541	54	0.10	329	82	0.25			
00400	PH	Other-Hi Lim.	9.	227	4	0.02	63	0	0.00	111	3	0.03	53	1	0.02			
		Other-Lo Lim.	6.5	227	0	0.00	63	0	0.00	111	0	0.00	53	0	0.00			
00403	PH, LAB	Other-Hi Lim.	9.	1714	14	0.01	651	6	0.01	648	8	0.01	415	0	0.00			
		Other-Lo Lim.	6.5	1714	2	0.00	651	2	0.00	648	0	0.00	415	0	0.00			
00406	PH, FIELD	Other-Hi Lim.	9.	28	0	0.00				21	0	0.00	7	0	0.00			
		Other-Lo Lim.	6.5	28	0	0.00				21	0	0.00	7	0	0.00			
00613	NITRITE NITROGEN, DISSOLVED AS N	Drinking Water	1.	10	0	0.00	4	0	0.00	3	0	0.00	3	0	0.00			
00615	NITRITE NITROGEN, TOTAL AS N	Drinking Water	1.	1199	0	0.00	508	0	0.00	442	0	0.00	249	0	0.00			
00618	NITRATE NITROGEN, DISSOLVED AS N	Drinking Water	10.	6	0	0.00	1	0	0.00	1	0	0.00	4	0	0.00			
00620	NITRATE NITROGEN, TOTAL AS N	Drinking Water	10.	1398	0	0.00	578	0	0.00	485	0	0.00	335	0	0.00			
00630	NITRITE PLUS NITRATE, TOTAL 1 DET.	Drinking Water	10.	118	0	0.00	44	0	0.00	58	0	0.00	16	0	0.00			
00631	NITRITE PLUS NITRATE, DISS. 1 DET.	Drinking Water	10.	12	0	0.00	4	0	0.00	3	0	0.00	5	0	0.00			
00940	CHLORIDE,TOTAL IN WATER	Fresh Acute	860.	197	5	0.03	81	3	0.04	95	2	0.02	21	0	0.00			
		Drinking Water	250.	197	53	0.27	81	32	0.40	95	15	0.16	21	6	0.29			
00945	SULFATE, TOTAL (AS SO4)	Drinking Water	250.	1377	2	0.00	565	0	0.00	478	2	0.00	334	0	0.00			
00950	FLUORIDE, DISSOLVED AS F	Drinking Water	4.	30	1	0.03	12	0	0.00	11	1	0.09	7	0	0.00			
01000	ARSENIC, DISSOLVED	Fresh Acute	360.	3	0	0.00	2	0	0.00				1	0	0.00			
		Drinking Water	50.	3	0	0.00	2	0	0.00				1	0	0.00			
01002	ARSENIC, TOTAL	Fresh Acute	360.	35	0	0.00	21	0	0.00	8	0	0.00	6	0	0.00			
		Drinking Water	50.	35	0	0.00	21	0	0.00	8	0	0.00	6	0	0.00			
01007	BARIUM, TOTAL	Drinking Water	2000.	12	0	0.00	12	0	0.00									
01012	BERYLLIUM, TOTAL	Fresh Acute	130.	12	0	0.00	12	0	0.00									
		Drinking Water	4.	12	0	0.00	12	0	0.00									
01025	CADMIUM, DISSOLVED	Fresh Acute	3.9	5 &	0	0.00	1	0	0.00	3	0	0.00	1	0	0.00			
		Drinking Water	5.	5 &	0	0.00	1	0	0.00	3	0	0.00	1	0	0.00			
01027	CADMIUM, TOTAL	Fresh Acute	3.9	32 &	2	0.06	14	2	0.14	13	0	0.00	5	0	0.00			
		Drinking Water	5.	32 &	0	0.00	14	0	0.00	13	0	0.00	5	0	0.00			
01030	CHROMIUM, DISSOLVED	Drinking Water	100.	8	0	0.00	3	0	0.00	4	0	0.00	1	0	0.00			
01032	CHROMIUM, HEXAVALENT	Fresh Acute	16.	2	1	0.50				2	1	0.50						
		Drinking Water	100.	2	0	0.00				2	0	0.00						
01034	CHROMIUM, TOTAL	Drinking Water	100.	43	0	0.00	21	0	0.00	16	0	0.00	6	0	0.00			
01040	COPPER, DISSOLVED	Fresh Acute	18.	39	32	0.82	9	7	0.78	15	11	0.73	15	14	0.93			
		Drinking Water	1300.	39	26	0.67	9	3	0.33	15	9	0.60	15	14	0.93			
01042	COPPER, TOTAL	Fresh Acute	18.	76	33	0.43	28	8	0.29	28	11	0.39	20	14	0.70			
		Drinking Water	1300.	76	31	0.41	28	6	0.21	28	11	0.39	20	14	0.70			
01049	LEAD, DISSOLVED	Fresh Acute	82.	8	0	0.00	2	0	0.00	5	0	0.00	1	0	0.00			
		Drinking Water	15.	8	2	0.25	2	2	1.00	5	0	0.00	1	0	0.00			
01051	LEAD, TOTAL	Fresh Acute	82.	45	0	0.00	22	0	0.00	17	0	0.00	6	0	0.00			
		Drinking Water	15.	39 &	4	0.10	20	2	0.10	14	2	0.14	5	0	0.00			
01059	THALLIUM, TOTAL	Fresh Acute	1400.	12	0	0.00	12	0	0.00									
		Drinking Water	2.	2 &	2	1.00	2	2	1.00									
01065	NICKEL, DISSOLVED	Fresh Acute	1400.	3	0	0.00				3	0	0.00						
		Drinking Water	100.	3	0	0.00				3	0	0.00						
01067	NICKEL, TOTAL	Fresh Acute	1400.	12	0	0.00	12	0	0.00									
		Drinking Water	100.	12	0	0.00	12	0	0.00									
01075	SILVER, DISSOLVED	Fresh Acute	4.1	2	0	0.00	1	0	0.00	1	0	0.00						
		Drinking Water	100.	2	0	0.00	1	0	0.00	1	0	0.00						
01077	SILVER, TOTAL	Fresh Acute	4.1	12	4	0.33	12	4	0.33									
		Drinking Water	100.	12	0	0.00	12	0	0.00									
01090	ZINC, DISSOLVED	Fresh Acute	120.	29	3	0.10	11	2	0.18	11	1	0.09	7	0	0.00			
		Drinking Water	5000.	29	0	0.00	11	0	0.00	11	0	0.00	7	0	0.00			
01092	ZINC, TOTAL	Fresh Acute	120.	69	0	0.00	31	0	0.00	26	0	0.00	12	0	0.00			
		Drinking Water	5000.	69	0	0.00	31	0	0.00	26	0	0.00	12	0	0.00			
01097	ANTIMONY, TOTAL	Fresh Acute	88.	12	0	0.00	12	0	0.00									
		Drinking Water	6.	2 &	2	1.00	2	2	1.00									
01147	SELENIUM, TOTAL	Fresh Acute	20.	35	2	0.06	21	2	0.10	8	0	0.00	6	0	0.00			
		Drinking Water	50.	35	0	0.00	21	0	0.00	8	0	0.00	6	0	0.00			
31501	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	Other-Hi Lim.	1000.	423	106	0.25	183	66	0.36	211	28	0.13	29	12	0.41			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

EPA Water Quality Criteria Analysis for Entire CHIC Study Area

Parameter		Std. Type	Std. Value	Total Obs	Exceed Standard	Prop. Exceeding	----------9/15-2/28---------- Obs	Exceed	Prop.	----------3/01-6/30---------- Obs	Exceed	Prop.	----------7/01-9/14---------- Obs	Exceed	Prop.	----------n/a---------- Obs	Exceed	Prop.
31503	COLIFORM,TOT,MEMBRANE FILTR,DELAY. M-END	Other-Hi Lim.	1000.	58	23	0.40	45	22	0.49	4	1	0.25	9	0	0.00			
31506	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE C	Other-Hi Lim.	1000.	14	5	0.36	1	0	0.00	9	2	0.22	4	3	0.75			
31613	FECAL COLIFORM, MEMBRANE FILTER, AGAR	Other-Hi Lim.	200.	194	0	0.00	58	0	0.00	136	0	0.00						
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	Other-Hi Lim.	200.	4	4	1.00	4	4	1.00									
31616	FECAL COLIFORM, MEMBRANE FILTER, BROTH	Other-Hi Lim.	200.	328	131	0.40	141	56	0.40	105	34	0.32	82	41	0.50			
34423	METHYLENE CHLORIDE, TOTAL	Drinking Water	5.	11	11	1.00	11	11	1.00									
71851	NITRATE NITROGEN, DISSOLVED (AS NO3)	Drinking Water	44.	6	0	0.00	1	0	0.00	1	0	0.00	4	0	0.00			
71890	MERCURY, DISSOLVED	Fresh Acute	2.4	3	0	0.00	2	0	0.00				1	0	0.00			
		Drinking Water	2.	3	0	0.00	2	0	0.00				1	0	0.00			
71900	MERCURY, TOTAL	Fresh Acute	2.4	22 &	0	0.00	8	0	0.00	8	0	0.00	6	0	0.00			
		Drinking Water	2.	22 &	0	0.00	8	0	0.00	8	0	0.00	6	0	0.00			
82079	TURBIDITY, LAB	Other-Hi Lim.	50.	1229	1	0.00	541	1	0.00	387	0	0.00	301	0	0.00			

& - Below detection limit observations, for which half the detection limit exceeded the criterion, were excluded from the criterion comparison for this parameter

NPS Servicewide Inventory and Monitoring Program Level I

Water Quality Parameter Inventory Data Evaluation and Analysis:

Missing Level I Groups

There are STORET Data for Every Level I I&M Parameter Group Within the CHIC Study Area

NPS Servicewide Inventory and Monitoring Program Level I

Water Quality Parameter Inventory Data Evaluation and Analysis:

Present Level I Groups

STORET Data Within the CHIC Study Area Exist for These Groups:

Alkalinity		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	1537	1371	70	96	66
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	234	0	0	234	4
00435	ACIDITY, TOTAL (MG/L AS CACO3)	3	0	3	0	3
00440	BICARBONATE ION (MG/L AS HCO3)	60	12	3	45	20
00445	CARBONATE ION (MG/L AS CO3)	48	0	3	45	8
		1882	1383	79	420	101 (70)[1]

pH		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00400	PH (STANDARD UNITS)	242	82	46	114	43
00403	PH, LAB (STANDARD UNITS)	1714	1550	164	0	58
00406	PH, FIELD (STANDARD UNITS)	28	0	28	0	1
		1984	1632	238	114	102 (98)[1]

Conductivity		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00094	SPECIFIC CONDUCTANCE, FIELD (UMHOS/CM @ 25C)	79	0	28	51	5
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	1751	1628	13	110	57
		1830	1628	41	161	62 (58)[1]

Dissolved Oxygen		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE (MG/L)	68	0	68	0	9
00300	OXYGEN, DISSOLVED (MG/L)	1539	1289	188	62	60
		1607	1289	256	62	69 (69)[1]

Water Temperature		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	1914	1492	263	159	97
		1914	1492	263	159	97 (97)[1]

Flow		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00058	FLOW RATE, GALLONS/MIN.	3	0	3	0	3
00059	FLOW RATE, INSTANTANEOUS, GALLONS/MINUTE	2	2	0	0	2
00060	FLOW, STREAM, MEAN DAILY CFS	4	0	0	4	2
00061	FLOW, STREAM, INSTANTANEOUS CFS	195	80	10	105	12
00065	STAGE, STREAM (FEET)	78	78	0	0	1
		282	160	13	109	20 (17)[1]

[1]Since a station can have data for more than one of the parameters in the parameter group, the number in the parenthesis is the number of unique stations having data for this parameter group.

Clarity/Turbidity		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00076	TURBIDITY, HACH TURBIDIMETER (FORMAZIN TURB UNIT)	3	3	0	0	1
00077	TRANSPARENCY, SECCHI DISC (INCHES)	10	0	0	10	4
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	90	0	79	11	37
82079	TURBIDITY, LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	1229	1229	0	0	15
		1332	1232	79	21	57 (57)[1]

Nitrate/Nitrogen		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	13	0	0	13	7
00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	10	10	0	0	1
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	1460	1308	84	68	56
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	6	0	0	6	3
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	1409	1358	36	15	51
00625	NITROGEN, KJELDAHL, TOTAL (MG/L AS N)	174	25	90	59	25
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	118	17	42	59	12
00631	NITRITE PLUS NITRATE, DISS. 1 DET. (MG/L AS N)	12	12	0	0	3
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	6	0	0	6	3
		3208	2730	252	226	161 (64)[1]

Phosphate/Phosphorus		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	2	0	0	2	2
00665	PHOSPHORUS, TOTAL (MG/L AS P)	180	37	84	59	40
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	110	10	41	59	9
70505	PHOSPHORUS, TOTAL, COLORIMETRIC METHOD (MG/L AS P)	11	0	0	11	5
70507	PHOSPHORUS, IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	1112	1080	32	0	41
		1415	1127	157	131	97 (61)[1]

Chlorophyll		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
32211	CHLOROPHYLL A (UG/L) SPECTROPHOTOMETRIC ACID METH.	1	1	0	0	1
32217	CHLOROPHYLL A (UG/L) FLUOROMETRIC UNCORRECTED	11	0	0	11	4
		12	1	0	11	5 (5)[1]

Sulfates/Total Dissolved Solids/Hardness		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00900	HARDNESS, TOTAL (MG/L AS CACO3)	1429	1366	3	60	39
00945	SULFATE, TOTAL (MG/L AS SO4)	1392	1367	3	22	43
70300	RESIDUE, TOTAL FILTRABLE (DRIED AT 180C), (MG/L)	235	27	203	5	50
		3056	2760	209	87	132 (85)[1]

Bacteria		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	132	0	132	0	14
31501	COLIFORM, TOT, MEMBRANE FILTER,IMMED.M-ENDOMED,35C	427	0	85	342	25
31503	COLIFORM, TOT, MEMBRANE FILTER,DELAY,M-ENDOMED,35C	58	0	58	0	28
31506	COLIFORM, TOT, MPN, CONFIRMED TEST, TUBE CONFIG.	14	0	14	0	7
31613	FECAL COLIFORM, MEMBR, FILTER,M-FC AGAR,44.5C,24HR	194	0	0	194	5
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	4	0	4	0	4
31616	FECAL COLIFORM, MEMBR FILTER, M-FC BROTH, 44.5C	328	0	178	150	22
31673	FECAL STREPTOCOCCI, MBR FILT, KF AGAR, 35C, 48HR	539	0	195	344	43
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	275	0	0	275	9
		1971	0	666	1305	157 (58)[1]

[1]Since a station can have data for more than one of the parameters in the parameter group, the number in the parenthesis is the number of unique stations having data for this parameter group.

Toxic Elements		Total Obs.	01/01/85 to 08/23/95	01/01/75 to 12/31/84	Before 01/01/75	Total Stations
01097	ANTIMONY, TOTAL (UG/L AS SB)	12	12	0	0	12
01000	ARSENIC, DISSOLVED (UG/L AS AS)	3	0	3	0	3
01002	ARSENIC, TOTAL (UG/L AS AS)	35	35	0	0	13
01012	BERYLLIUM, TOTAL (UG/L AS BE)	12	12	0	0	12
01025	CADMIUM, DISSOLVED (UG/L AS CD)	6	3	3	0	6
01027	CADMIUM, TOTAL (UG/L AS CD)	45	37	8	0	21
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	8	5	3	0	7
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	2	0	0	2	2
01034	CHROMIUM, TOTAL (UG/L AS CR)	43	35	8	0	21
01040	COPPER, DISSOLVED (UG/L AS CU)	39	3	34	2	12
01042	COPPER, TOTAL (UG/L AS CU)	76	36	40	0	25
01049	LEAD, DISSOLVED (UG/L AS PB)	8	3	3	2	8
01051	LEAD, TOTAL (UG/L AS PB)	45	37	8	0	21
71890	MERCURY, DISSOLVED (UG/L AS HG)	3	0	3	0	3
71900	MERCURY, TOTAL (UG/L AS HG)	34	34	0	0	13
01065	NICKEL, DISSOLVED (UG/L AS NI)	3	3	0	0	3
01067	NICKEL, TOTAL (UG/L AS NI)	12	12	0	0	12
01147	SELENIUM, TOTAL (UG/L AS SE)	35	35	0	0	13
01075	SILVER, DISSOLVED (UG/L AS AG)	2	2	0	0	1
01077	SILVER, TOTAL (UG/L AS AG)	12	12	0	0	12
01059	THALLIUM, TOTAL (UG/L AS TL)	12	12	0	0	12
01090	ZINC, DISSOLVED (UG/L AS ZN)	29	0	27	2	8
01092	ZINC, TOTAL (UG/L AS ZN)	69	37	32	0	24
34423	METHYLENE CHLORIDE, TOTAL (UG/L)	11	11	0	0	11
		556	376	172	8	275 (34)[1]

[1]Since a station can have data for more than one of the parameters in the parameter group, the number in the parenthesis is the number of unique stations having data for this parameter group.

NPS Servicewide Inventory and Monitoring Program Level I

Water Quality Parameter Inventory Data Evaluation and Analysis:

Park Summary: Level I Group Currentness and Distribution

Parameter Group	Total Obs.	Obs. Since 1985	% Obs. Since 1985	Stations Measuring This Group	% of Total Stations Measuring This Group	Obs. Per Station Measuring This Group	Period of Record For This Group	Observations Per Year of Period of Record
Alkalinity	1882	1383	73.5	70	44.9	26.9	09/10/51-03/04/94	44.3
pH	1984	1632	82.3	98	62.8	20.2	09/10/51-08/23/95	45.1
Conductivity	1830	1628	89.0	58	37.2	31.6	09/10/51-08/23/95	41.6
Dissolved Oxygen	1607	1289	80.2	69	44.2	23.3	01/28/67-08/23/95	56.2
Water Temperature	1914	1492	78.0	97	62.2	19.7	09/10/51-08/23/95	43.5
Flow	282	160	56.7	17	10.9	16.6	09/10/51-08/23/95	6.4
Clarity/Turbidity	1332	1232	92.5	57	36.5	23.4	01/28/67-03/04/94	49.2
Nitrate/Nitrogen	3208	2730	85.1	64	41.0	50.1	09/16/59-08/23/95	89.3
Phosphate/Phosphorus	1415	1127	79.6	61	39.1	23.2	01/28/67-08/23/95	49.5
Chlorophyll	12	1	8.3	5	3.2	2.4	03/30/73-08/26/91	0.7
Sulfates/Total Dissolved Solids/Hardness	3056	2760	90.3	85	54.5	36.0	09/10/51-08/23/95	69.5
Bacteria	1971	0	0.0	58	37.2	34.0	01/30/67-07/17/77	188.4
Toxic Elements	556	376	67.6	34	21.8	16.4	05/06/69-08/23/95	21.1

Water Quality Observations
Outside STORET Edit Criteria for CHIC

(Disposition: X = Discarded, Blank = Retained)

NPS Station ID	Parameter		Date	Time	Parameter Value	Agency	STORET Station ID	Disposition
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770516		2400.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		9300.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		6300.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		8000.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		6000.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		3100.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		3200.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	770516		7900.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	770614		6400.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	770719		6900.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	770818		16700.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	770818		5800.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0011	01042	COPPER, TOTAL (UG/L AS CU)	771020		6200.0000000	11NPSWRD	CHIC_GARTON_5	
CHIC0033	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		6500.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		5300.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		3800.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01040	COPPER, DISSOLVED (UG/L AS CU)	771020		2900.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01042	COPPER, TOTAL (UG/L AS CU)	770516		6000.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01042	COPPER, TOTAL (UG/L AS CU)	770614		6100.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0033	01042	COPPER, TOTAL (UG/L AS CU)	770719		6400.0000000	11NPSWRD	CHIC_GARTON_2	
CHIC0036	00340	COD, .25N K2CR2O7 MG/L	701211		16000.0000000	21OK13II	400228	
CHIC0036	00500	RESIDUE, TOTAL (MG/L)	701211		19200.0000000	21OK13II	400228	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770516		3100.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		7200.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		9700.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		11600.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		5300.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		3800.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		5200.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01040	COPPER, DISSOLVED (UG/L AS CU)	771020		3900.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770516		5200.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770614		6400.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770719		7200.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770719		9300.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770818		9200.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	770818		5300.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	771020		5900.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0040	01042	COPPER, TOTAL (UG/L AS CU)	771020		8000.0000000	11NPSWRD	CHIC_GARTON_4	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770516		4800.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770614		4200.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		7000.0000000	11NPSWRD	CHIC_GARTON_3	

Water Quality Observations
Outside STORET Edit Criteria for CHIC

(Disposition: X = Discarded, Blank = Retained)

NPS Station ID	Parameter		Date	Time	Parameter Value	Agency	STORET Station ID	Disposition
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770719		5200.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		6000.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	770818		8200.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01040	COPPER, DISSOLVED (UG/L AS CU)	771020		2700.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	770516		5100.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	770614		5400.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	770719		7500.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	770719		5700.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	770818		6000.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0041	01042	COPPER, TOTAL (UG/L AS CU)	771020		7200.0000000	11NPSWRD	CHIC_GARTON_3	
CHIC0061	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S13	
CHIC0063	71900	MERCURY, TOTAL (UG/L AS HG)	931021		52.0000000	11NPSWRD	CHIC_S14	
CHIC0065	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S18	
CHIC0066	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	900410	0830	0.0000000	112WRD	07329852	X
CHIC0066	00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	900515	1155	0.0000000	112WRD	07329852	X
CHIC0074	00440	BICARBONATE ION (MG/L AS HCO3)	931021		563.0000000	11NPSWRD	CHIC_S12	
CHIC0074	71900	MERCURY, TOTAL (UG/L AS HG)	931021		48.0000000	11NPSWRD	CHIC_S12	
CHIC0087	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S8	
CHIC0091	71900	MERCURY, TOTAL (UG/L AS HG)	931021		48.0000000	11NPSWRD	CHIC_S3	
CHIC0094	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S4	
CHIC0095	71900	MERCURY, TOTAL (UG/L AS HG)	931021		48.0000000	11NPSWRD	CHIC_S5	
CHIC0096	71900	MERCURY, TOTAL (UG/L AS HG)	931021		48.0000000	11NPSWRD	CHIC_S6	
CHIC0097	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S7	
CHIC0117	71900	MERCURY, TOTAL (UG/L AS HG)	931021		48.0000000	11NPSWRD	CHIC_S9	
CHIC0128	71900	MERCURY, TOTAL (UG/L AS HG)	931021		49.0000000	11NPSWRD	CHIC_S1	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	760121		65000.0000000	11NPSWRD	CHIC_HARP_19	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	761016		5000.0000000	11NPSWRD	CHIC_HARP_19	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	761030		65000.0000000	11NPSWRD	CHIC_HARP_19	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	761114		4950.0000000	11NPSWRD	CHIC_HARP_19	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	761212		4600.0000000	11NPSWRD	CHIC_HARP_19	
CHIC0154	70300	RESIDUE,TOTAL FILTRABLE (DRIED AT 180C),MG/L	761219		4800.0000000	11NPSWRD	CHIC_HARP_19	

APPENDICES

Appendix A

Computer Files Transmitted With

Park Baseline Water Quality Data Inventory and Analysis

Computer disk(s) accompanying this report include up to seven (depending on the presence or absence of certain data elements) compressed (ZIP) files containing digital copies of nearly all the tables, figures, and other materials used to produce this report. To decompress these files, you must use the commonly available shareware program PKUNZIP. The command to type at the DOS prompt is:

PKUNZIP -E *COMPRESS.ZIP FILENAME.EXT*

where COMPRESS.ZIP is the name of one of the seven compressed (ZIP) files listed below and FILENAME.EXT is the name of the file you wish to extract. If you want to decompress all of the files in COMPRESS.ZIP, simply omit the FILENAME.EXT. To obtain a listing of all the files compressed into a particular ZIP file, type the following:

PKUNZIP -V *COMPRESS.ZIP* |MORE

where COMPRESS.ZIP is the name of one of the seven compressed ZIP files listed below. If a ZIP file spans multiple disks, use the last disk of the series (span) when obtaining a listing of all the files compressed into a particular ZIP file. Once you see the file you wish to obtain, substitute this file name for FILENAME.EXT in the first command line above to extract and decompress this particular file.

Included on one of the disk(s) accompanying this report is a program named PRINTZIP. This program will decompress ZIP files which don't span multiple disks and print certain files to a Hewlett-Packard (or compatible) Laser Printer. To use PRINTZIP, however, you must still have a copy of PKUNZIP in a directory listed in your path or in the same directory as the PRINTZIP program. PRINTZIP provides an easy, menu-driven interface for using PKUNZIP to decompress files and then send them to the printer. PRINTZIP allows you to send individual files, groups of files, or all files to the printer. PRINTZIP will not work with ZIP files that span multiple disks.

The following compressed (ZIP) files are included on the disk(s) accompanying this report:

(1) <u>CHICTABS.ZIP</u>

This compressed file contains all the tables presented in the report. The files compressed into this file include:

(a) CHICSITE.DOC - Descriptive listing of select fields from the industrial facilities discharges, drinking water intakes, and EPA-USGS stream gages databases.

(b) CHICAGNC.DOC - Contacts for agencies whose data were retrieved within the study area.

(c) CHICAGNQ.DOC - Number of stations, observations, and parameters retrieved by agency code within the study area and park.

(d) CHICOV0.DOC - Overview of park and retrieved data.

(e) CHICOV1.DOC - Station period of record table.

(f) CHICOV2.DOC - Parameter period of record table.

(g) CHICOV3.DOC - Station/parameter period of record table.

(h) CHICINV.DOC - Station by station descriptive statistics over the entire period of record and comparison against EPA Water Quality Criteria for each station.

(i) CHICSEAN.DOC - Seasonal and annual water quality descriptive statistics at stations with water quality data meeting the default seasonal and annual criteria.

(j) CHICEPAS.DOC - EPA Water Quality Criteria comparison for data at all stations combined within the study area.

(k) CHICIDEA.DOC - Comparison of downloaded STORET data with NPS Servicewide Inventory and Monitoring Program "Level I" water quality parameters.

(l) CHICBAD.DOC - Water quality observation values that were outside the range of one of 190 STORET edit criteria and were either discarded or retained.

All these compressed document files are in ASCII format and contain printer codes appropriate to Hewlett-Packard (or compatible) Laser Printers. While at the DOS prompt, any of these document files may be printed directly to a Hewlett-Packard (or compatible) Laser Printer by using the PRINT command. For example, if the document CHICOV1.DOC is in the subdirectory C:\WATER, you could type: PRINT C:\WATER\CHICOV1.DOC. This will print the file to your local or networked Hewlett-Packard (or compatible) Laser Printer attached to parallel port one (LPT1:). Alternatively, you can use the PRINTZIP program to decompress and print any of these files provided the ZIP file doesn't span multiple disks. These ASCII files can also be imported into word-processed documents, but the printer codes will then have to be removed.

(2) CHICFIGS.ZIP

This compressed file contains graphics files for all the statistical figures (time series plots; annual box and whiskers plots; seasonal box and whiskers plots) in the report in two different formats: Computer Graphic Metafile (CGM) and Hewlett-Packard Printer Control Language (PCL). The files are named with the last three digits of the Station Name followed by the five digit STORET code. The file name extension begins with either a 1 (time series), 2 (annual), or 3 (seasonal) and then either GM for CGM or CL for PCL. For example, 00100300.2GM would denote the file contains an annual box and whiskers plot in CGM format for parameter 00300 (dissolved oxygen) at station CHIC0001. While at the DOS prompt, any PCL file can be printed directly to a Hewlett-Packard (or compatible) Laser Printer by using the COPY command. For example, if the graphic 00100300.2CL (an annual box and whiskers plot of parameter 00300, dissolved oxygen, at station CHIC0001) is in the subirectory C:\WATER, you would type: COPY C:\WATER\00100300.2CL LPT1: /B. This will print the file to your local or networked Hewlett-Packard (or compatible) Laser Printer attached to parallel port one (LPT1:). The /B is necessary because the PCL file is in a binary format. Alternatively, you can use the PRINTZIP program to decompress and print any of the PCL files provided the ZIP file doesn't span multiple disks. The CGM files can be imported and/or edited in most graphics packages, including WordPerfect.

(3) CHICPARM.ZIP

This file compresses CHICPARM.DBF which contains all the actual values (raw data) of all the water quality data downloaded from STORET and summarized in the report. The detailed database structure for this file is contained in Appendix B.

(4) CHICSITE.ZIP

This compressed file contains up to five geo-referenced, DBASE III+ compatible site (point location) files documenting the location in the study area of water quality monitoring stations, industrial facilities discharges, drinking water intakes, water gages, and water impoundments. These files include:

(a) CHICWQ.DBF - All water quality monitoring station locations within the project's study area downloaded from STORET.

(b) CHICIFD.DBF - All municipal and industrial facility discharges within the project's study area downloaded from the IFD database.

(c) CHICDRIN.DBF - All drinking water intakes within the project's study area downloaded from the DRINKS database.

(d) CHICGAGE.DBF - All water gages within the project's study area downloaded from the GAGES database.

(e) CHICDAMS.DBF - All water impoundments within the project's study area downloaded from the DAMS database.

The absence of any of these files indicates that none of the particular sites were found within the study area. Detailed database structures for each of these files are contained in Appendix B.

(5) CHICMISC.ZIP

This compressed file contains a variety of graphic and document files that are contained in the report. They are grouped into this miscellaneous compressed (ZIP) file because they don't fit neatly into any of the other compressed files. The files contained in this compressed file include:

(a) CHICEXEC.DOC - WordPerfect Ver. 5.1 copy of the Executive Summary in the report.

(b) CHICTOC.DOC - WordPerfect Ver. 5.1 copy of the report's Table of Contents.

(c) INTRO.DOC - WordPerfect Ver. 5.1 copy of all the text in the report from the Introduction through the Interpretive Guide to Water Quality Results.

(d) APPENDIX.DOC - WordPerfect Ver. 5.1 copy of all the Appendices in the report.

(e) CHICREGI - PCL and CLP (Windows Clipboard) copies of map displaying the regional location of the park and study area.

(f) CHICWQ - PCL and CLP (Windows Clipboard) copies of park maps displaying water quality station locations within the park's study area. If, due to scaling and aesthetic concerns, multiple maps were needed, these files will have alphabetically ordered suffixes (CHICWQA, CHICWQB, CHICWQC, etc.) and the index map name will end with an ampersand (&).

(g) CHICIDG - PCL and CLP (Windows Clipboard) copies of park maps displaying locations of industrial facilities discharges, drinking water intakes, and stream gages within the park's study area. If, due to scaling and aesthetic concerns, multiple maps were needed, these files will have alphabetically ordered suffixes (CHICIDGA, CHICIDGB, CHICIDGC, etc.) and the index map name will end with an ampersand (&). If no industrial facilities discharges, drinking water intakes, water gages, or water impoundments exist within the park's study area, these files will not be in the compressed (ZIP) file.

(h) CHICSEHY - PCL and CLP (Windows Clipboard) copies of the hydrographs or other materials used by WRD staff as the basis for a first attempt at a seasonal analysis of the park's water quality data.

Other materials may also be included in this miscellaneous compressed (ZIP) file as warranted by conditions at the park. As with CHICFIGS.ZIP and CHICTABS.ZIP, you can use the PRINTZIP program to print any of the PCL files in CHICMISC.ZIP provided the ZIP file doesn't span multiple disks. You should not, however, use PRINTZIP to print the WordPerfect document files. The CLP (Windows Clipboard) files can be imported (pasted) and/or edited in most Windows-based word processors and graphics packages.

(6) CHICRF3.ZIP

This compressed file contains the Environmental Protection Agency's River Reach File Ver. 3.0 provisional data for the USGS catalog unit(s) encompassing the study area. The attribute data exist in both ASCII and DBASE III+ format, while the geographic traces exist in ASCII format. This compressed file contains four files for each catalog unit that touches the study area. Catalog units are identified by unique 8-character numeric names which identify the region, subregion, accounting unit, and catalog unit. Examples (your 8-character numeric names will be different) of the file types included in this compressed file are:

(a) 12345678.RF3 - ASCII formatted attribute file from the River Reach File for all hydrographic traces within the catalog unit.

(b) 12345678.DBF - DBASE III+ formatted attribute file from the River Reach File for all hydrographic traces within the catalog unit.

(c) 12345678.TRC - ASCII formatted geographic file from the River Reach File containing digital, geo-referenced descriptions of all hydrographic traces within the catalog unit at a scale of 1:100,000 suitable for import into a geographic information system.

(d) 12345678.CUB - ASCII formatted geographic file from the River Reach File containing a digital, geo-referenced description of the catalog unit boundary suitable for import into a geographic information system.

Detailed database structures for RF3-related files are contained in Appendix B.

(7) CHICWQMW.ZIP

Between 2000 and 2002, all Baseline Water Quality Data Inventory and Analysis Reports were compiled or re-compiled in Microsoft Word 2000 (Ver. 9.0) format. This complete, digital version of the report will be made available through various means, including the Internet. Although the reports can be opened in Microsoft Word 1997 (Ver. 8.0), the time series and annual and seasonal box-plots may not be centered appropriately on a page due to discrepancies with how Word 2000 formats pictures and how Word 1997 formatted pictures. Consequently, Word 2000 is the recommended software for viewing the report. Prior to printing the report from Word, be sure to enable "Print Text as Graphics" or "Print True Type Font as Graphics" in the Printer Properties. This ensures a more faithful reproduction of the maps included in the Word document.

The Microsoft Word version of the Baseline Water Quality Data Inventory and Analysis Report may differ slightly from the original analog version. Reports issued during 1994-1996 didn't have as many "bells-and-whistles" as subsequent reports. In compiling digital Microsoft Word versions of these earlier reports, attempts were made to bring these 1994-1996 reports up to the current standard wherever feasible and practicable. Unfortunately, some changes were not feasible or practicable. For example, water quality criteria screens were added or modified over time when newer criteria became available. The digital Microsoft Word version of Appendix F presents the latest criteria screening parameters and values. Some of these parameters and/or values may not have been screened against in the EPA water quality criteria analyses for each station and the entire study area in the 1994-1996 analog versions of the report. Similarly, the Introduction, Methodology, and Interpretive Guide to Water Quality Results may mention certain features that aren't included in the 1994-1996 reports. Additionally, to prepare a Microsoft Word version of this report, data were processed through different versions of software than used originally. Consequently, some results presented in the Overview and Executive Summary may differ slightly from those presented in the analog report (eg. # of In Park and Longer Term Stations).

Appendix B

Water Quality Database File Structures

The following table provides the DBASE III+ database field structure for all the water quality parameter data downloaded from STORET. This data will allow parks or other interested parties to replicate the statistical analyses and graphics contained in this report; perform more sophisticated analyses; or to establish a baseline park water quality database.

Parameter Data File: CHICPARM.DBF in CHICPARM.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
NPSSTATID	1	8	8	NPS Station ID (NPS park code + 4 digit sequence number)
BEGDATE	9	14	6	Measurement Start Date [yymmdd]
BEGTIME	15	18	4	Measurement Start Time [hhmm]
PARMCODE	19	23	5	STORET Parameter Code
PARMVALU	24	39	16.7	Parameter Value
REMARK	40	40	1	Parameter Remark Value
				A=Value is Mean of 2 or More Determinations
				B=Results Based Upon Colony Counts Outside Acceptable Range
				C=Value Calculated
				D=Field Measurement
				E=Extra Sample Taken in Compositing Process
				F=Female Species
				G=Maximum of 2 or More Determinations
				H=Based on Field Kit Determination
				I=Value is Less Than Practical Quantitation Limit and Greater Than or Equal to the Method Detection Limit
				J=Estimated, Not the Result of Analytic Measurement
				K=Off-scale Low, Actual Value Not Known, But Known to be Less Than Value Shown
				L=Off-scale High, Actual Value Not Known, But Known to be Greater Than Value Shown

Parameter Data File: CHICPARM.DBF in CHICPARM.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
				M=Presence Verified, But Not Quantified, Below Quantification Limit; For Species, Male; For Oxygen Reduction Potential, Indicates a Negative Value
				N=Presumptive Evidence of Presence
				O=Analysis Lost
				P=Too Numerous to Count
				Q=Exceeded Normal Holding Time
				R=Significant Rain in Last 48 Hours
				S=Laboratory test
				T=Less Than Detection Criteria
				U=Analyzed For But Not Detected, Value is Detection Limit For Process Used; If Species, Undetermined
				V=Analyte was Detected in Sample and Method Blank
				W=Less Than Lowest Value Reportable Under Remark "T"
				X=Quasi Vertically-Integrated Sample
				Y=Analysis of Unpreserved Sample
				Z=Too Many Colonies Were Present to Count (TNTC), Value Represents Filtration Value
				$=Calculated By Retrieval Software
MEDIA	41	46	6	Sample Media
DEPTH	47	55	9.3	Depth of Sample [in feet]
ENDDATE	56	61	6	Measurement End Date [yymmdd] [all composite samples]
ENDTIME	62	65	4	Measurement End Time [hhmm] [all composite samples]
SAMPTYPE	66	69	4	Type of Sample ["sophisticated" composite samples]
				C=Continuous Collection
				G=Collection of Individual Grab Samples
				GNxx=xx is the Number of Individual Grab Samples
				B=N/A

Parameter Data File: CHICPARM.DBF in CHICPARM.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
COMPTYPE	70	70	1	Composite Value Type ["sophisticated" composite samples]
				A=Average
				H=Maximum
				L=Minimum
				N=Number of Observations
				#=Number of Observations
				S=Standard Deviation
				U=Sum of Squares
				V=Variance
				C=Coefficient of Error
				X=Coefficient of Variance
				E=Skewness
				F=Kurtosis
				Z=Number of Observations That Exceed an Established Limit
				%=Precision
				$=Accuracy
				B=N/A
				D=Indicates Replicate Sample
COMPST	71	71	1	Composite Space/Time Indicator
				S=Space
				T=Time
				B=Space and Time
				F=Flow Proportional
				1-9=Replicate Number

Note: DBASE III+ record lengths will be one greater than the last stop column displayed (71 here) because DBASE III+ reserves the first space/column of every record for a deletion flag. Hence, DBASE III+ will display a record length of 72 for this database.

The following table provides the DBASE III+ database field structure for all the water quality station locations downloaded from STORET. As this file is geo-referenced, it should import easily into the park's Geographic Information System.

Water Quality Station Data File: CHICWQ.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
NPSSTATID	1	8	8	NPS Station ID (NPS park code + 4 digit sequence number)
AGENCY	9	16	8	Agency Code of Station Owner
STORIDP	17	31	15	STORET Primary Station Code
STORIDS1	32	43	12	STORET First Secondary Station Code
STORIDS2	44	55	12	STORET Second Secondary Station Code
STORIDS3	56	65	10	STORET Third Secondary Station Code
LATITUDE	66	73	8	Station Latitude [degrees:minutes:seconds]
LONGITUDE	74	82	9	Station Longitude [degrees:minutes:seconds]
LAT	83	93	11.6	Station Latitude [decimal degrees, (-) below equator]
LON	94	104	11.6	Station Longitude [decimal degrees, (-) western hemisphere]
LLPREC	105	105	1	Latitude/Longitude Precision Code
RMI	106	329	224	River Mile Index
STATLOC	330	377	48	Station Location Description
CNTYCODE	378	382	5	FIPS State/County Code
STNAME	383	398	16	State Name
CNTYNAME	399	418	20	County Name
HYDUNIT	419	426	8	Hydrologic Unit Code (MAJ/MIN/SUB = Catalog Unit)
MAJBASN	427	450	24	Major Basin Name
MINBASN	451	490	40	Minor Basin Name
STATTYPE	491	550	60	Station Type
STORDATE	551	556	6	Date Station was Stored in STORET
RF1INDEX	557	567	11	RF1 Reach Number Location [2]
RF1MILE	568	575	8.3	Mile Point on RF1 Reach [2]
RF1LOC	576	578	3	Indicates the Location as ON or OFF RF1 Reach [2]
RF1DIST	579	584	6.2	Distance From RF1 Reach

Water Quality Station Data File: CHICWQ.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
RF3INDEX	585	601	17	RF3 Reach Number Location [3]
RF3MILE	602	607	6.2	Mile point on RF3 Reach [3]
RF3LOC	608	610	3	Indicates the Location as ON or OFF RF3 Reach [2]
RF3DIST	611	616	6.2	Distance From RF3 Reach
DEPH2O	617	620	4	Depth of Water at Station Location [in feet]
ELEV	621	625	5	Station Elevation
ECOREG	626	628	3	ECO Region
H2OBODY	629	678	50	Waterbody ID
AQUIFERS	679	718	40	Aquifer Description
STATDESC1	719	790	72	Station Sentence Description
STATDESC2	791	862	72	Station Sentence Description
STATDESC3	863	934	72	Station Sentence Description
STATDESC4	935	1006	72	Station Sentence Description
STATDESC5	1007	1078	72	Station Sentence Description
STATDESC6	1079	1150	72	Station Sentence Description
STATDESC7	1151	1222	72	Station Sentence Description
STATDESC8	1223	1294	72	Station Sentence Description
STATDESC9	1295	1366	72	Station Sentence Description
STATDESC10	1367	1438	72	Station Sentence Description
STATDESC11	1439	1510	72	Station Sentence Description
STATDESC12	1511	1582	72	Station Sentence Description
STATDESC13	1583	1654	72	Station Sentence Description
STATDESC14	1655	1726	72	Station Sentence Description
STATDESC15	1727	1798	72	Station Sentence Description
STATLOCKED	1799	1799	1	Station Locked (Logical) True/False

The following table provides the DBASE III+ database field structures for the EPA Industrial Facilities Discharge database. As this file is geo-referenced, it should import easily into the park's Geographic Information System.

Industrial Facilities Discharges File: CHICIFD.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
SITEID	1	9	9	Site Identifier (NPDES Number)
LATITUDE	10	17	8	Facility Latitude (Degrees:Minutes:Seconds)
LONGITUDE	18	26	9	Facility Longitude (Degrees:Minutes:Seconds)
LAT	27	37	11.6	Facility Latitude (decimal degrees, (-) below equator)
LON	38	48	11.6	Facility Longitude (decimal degrees, (-) west. hem.)
RF1INDEX	49	59	11	RF1 Reach Number Location
RF1MILE	60	65	6.2	Mile Point on RF1 Reach
RF1DIST	66	71	6.2	Distance From RF1 Reach
RF3INDEX	72	88	17	RF3 Reach Number Location
RF3MILE	89	94	6.2	Mile Point on RF3 Reach
RF3DIST	95	100	6.2	Distance From RF3 Reach
ADR	101	125	25	Address
BFL	126	132	7.2	Total Direct Combined C&P Flow (1000 GPD)
CCFLG	133	133	1	Coastal County Flag "Y"/"N"/"E"=Estuary
CC1	134	138	5	City Code #1 (EPA Code)
CFL	139	145	7.2	Total Direct Cooling Flow (1000 GPD)
CNC	146	148	3	County Code (FIPS)
CTY	149	168	20	City Name
CZIP	169	177	9	Canadian Zip Code
DNB	178	186	9	Dunn & Bradstreet Number
DNBFLG	187	187	1	Dunn & Bradstreet PCS Source Flag
EGF	188	202	15.4	Flow From Effluent Guidelines (1000 GPD)
EGS	203	208	6	Effluent Guidelines Subcategory
EXPDT	209	216	8	Expiration Date (mm/dd/yy)
E308SN	217	220	4	Effluent Guidelines Survey Number
FAC	221	229	9	SCS Facility Identifier (Cross-Reference)
FDS	230	232	3	Facility Data Source

Industrial Facilities Discharges File: CHICIFD.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
FFL	233	239	7.2	Total Facility Flow (1000 GPD)
FHF	240	240	1	Fac. Hit Flag (Reach File) V=Versar Assumed
FLOTYP	241	243	3	I=Blow Down, R=Bottom Ash, S=Fly Ash
FLR	244	250	7.2	Flow Recvd-Industrial (1000 GPD) Permit Data
FRDS	251	259	9	FRDS ID# - XREF To Water Supply
FRW	260	289	30	Facility Receiving Water Name
FS1	290	293	4	Facility SIC Code (From PCS)
FS2	294	297	4	Facility SIC Code #1
FS3	298	301	4	Facility SIC Code #2
FS4	302	305	4	Facility SIC Code #3
FS5	306	309	4	Facility SIC Code #4
FUD	310	317	8	Facility Level Last Date Updated (mm/dd/yy)
IACC	318	318	1	Inactive/Active Indicator ("I" or "A")
ICAT	319	320	2	WQAB Industrial Category
ICAT2	321	322	2	WQAB Industrial Category 2
ICAT3	323	324	2	WQAB Industrial Category 3
IFL	325	331	7	Total Indirect Flow (1000 GPD)
IFT	332	332	1	Illinois Facility Type (A thru Z)
IG1	333	334	2	Facility Industrial Group #1
IG2	335	336	2	Facility Industrial Group #2
IJCN	337	346	10	Canadian Record Identifier
INACT	347	353	7	Inactive/Rescinded P=Based on Permit;A=Actual
INDCNT	354	357	4	Computed Number of Indirect Dischargers
LATLON	358	372	15	Polygon Retrieval Lat/Long.
MAJ	373	373	1	Major-Minor Flag (From PCS)
MAPID	374	377	4	Map Identifier
MJMN	378	381	4	Major/Minor Basin (EPA-STORET)
NAM	382	441	60	Facility Name
NDC	442	444	3	Number of Discharges (Pipes)

Industrial Facilities Discharges File: CHICIFD.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
NDSFLO	445	451	7.2	NEEDS Flow (1000 GPD)
NDSIFLO	452	458	7.2	NEEDS Industrial Flow (1000 GPD)
NID	459	462	4	Number of Indirect Dischargers
NPC	463	463	1	NEEDS Pre-Treatment Code "Y"=Yes, "N"=No
NPS	464	464	1	NPDES Facility Source/Status
NSN	465	473	9	NEEDS Survey Number
NTC	474	474	1	NEEDS Treatment Code
OCP	475	480	6	Organic Chemical Producers ID Number
ODESCC	481	481	1	ODES Coastal County "Y"=Yes; "N"=No
OFL	482	488	7.2	Total Non-Direct Other Flow (1000 GPD)
OWN	489	491	3	Ownership Code
PFL	492	498	7.2	Total Direct Process Flow (1000 GPD)
REG	499	500	2	EPA Region
REGKEY	501	504	4	Region Key
RSLOFLO	505	511	7.2	Receiving Stream Low Flow
RSMNFLO	512	518	7.2	Receiving Stream Mean Flow
STA	519	520	2	State Postal Abbreviation
STAID	521	535	15	State Identifier
STC	536	537	2	State Code (FIPS)
STCITY	538	544	7	State/City Code
TFLOW	545	551	7.2	Type Flow (1000 GPD)
UFL	552	558	7.2	Total Direct Undefined Flow (1000 GPD)
XEGS	559	561	3	Effluent Guidelines Subcat Index
XKEY	562	562	1	"1","2","3","4","5","6","7","8","9"
XNME	563	565	3	GLP,DIR,F2C,ENF,CET,LAG,PPB,M85,M86
ZIP	566	570	5	Zip Code

The following table provides the DBASE III+ database field structures for drinking water intakes from the EPA DRINKS database. As this file is geo-referenced, it should import easily into the park's Geographic Information System.

Drinking Water Intakes File: CHICDRIN.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
SITEID	1	20	20	Site Identifier
LATITUDE	21	28	8	Facility Latitude (Degrees:Minutes:Seconds)
LONGITUDE	29	37	9	Facility Longitude (Degrees:Minutes:Seconds)
LAT	38	48	11.6	Facility Latitude (decimal degrees, (-) below equator)
LON	49	59	11.6	Facility Longitude (decimal degrees, (-) west. hem.)
RF1INDEX	60	70	11	RF1 Reach Number Location
RF1MILE	71	76	6.2	Mile Point on RF1 Reach
RF1DIST	77	82	6.2	Distance From RF1 Reach
RF3INDEX	83	99	17	RF3 Reach Number Location
RF3MILE	100	105	6.2	Mile Point on RF3 Reach
RF3DIST	106	111	6.2	Distance From RF3 Reach
AQCD	112	115	4	Aquifer Code
ASC	116	138	23	STORET Agency/Station Code
AVGD	139	142	4	Average Depth
BUY	143	143	1	Purchase Code
CC1	144	148	5	City Code #1 (EPA Code)
CNC	149	151	3	County Code (FIPS)
CNME	152	166	15	Contact Name
CNN	167	186	20	County Name
CTITLE	187	201	15	Contact Title
CTY	202	221	20	City Name
DUD	222	229	8	Date of Update
FRDS	230	238	9	FRDS ID# - Cross-Reference
GEOAG	239	258	20	Geologic Age
GEOCDE	259	261	3	Geologic Age Code
IDAT	262	269	8	Date (mm/dd/yy)

Drinking Water Intakes File: CHICDRIN.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
INTAKET	270	270	1	Type Source G/S/B
INTRVWR	271	285	15	Interviewer
MAXD	286	289	4	Maximum Depth
MILES	290	296	7.2	Miles
MIND	297	300	4	Minimum Depth
NAME	301	320	20	Name
NPD	321	329	9	NPDES# XREF to IFD Database
NWLS	330	332	3	Number of Wells
OWN	333	335	3	Ownership
PAVGF	336	342	7.2	Production Avg. Daily (Gal/Day)
PCTSUP	343	345	3	%Surface / %Ground
PHONE	346	355	10	Telephone Number
PMAXF	356	362	7.2	Production Max. Daily (Gal/Day)
POPSV	363	371	9	Population Served
REG	372	373	2	EPA Region
SHLAT	374	379	6	Sitehelp Latitude (DDMMSS)
SHLNG	380	386	7	Sitehelp Longitude (DDDMMSS)
SHMILES	387	393	7.2	Sitehelp Miles
SHNME	394	403	10	Sitehelp Source Name
SHPCT	404	410	7.2	Sitehelp Percent of Reach Miles
SRC	411	413	3	Sitehelp Source Code
STA	414	415	2	State Abbreviation
STC	416	417	2	State Code (FIPS)
TUF	418	424	7.2	Total Utility Flow
TYPCDE	425	425	1	Type Code
UHF	426	426	1	Utility Hit Flag (Reach File)
VCDE	427	427	1	Versar Code='V'=>25K; '*'=<25K POPSVD
WFPC	428	428	1	Wellfield Precision Code
WFTYP	429	429	1	Well Type (Cassing,Artesian,Infiltration,etc.)

Drinking Water Intakes File: CHICDRIN.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
WUN	430	449	20	Water Utility Name

The following table provides the DBASE III+ database field structures for the Water Gage database. As this file is geo-referenced, it should import easily into the park's Geographic Information System.

Water Gage File: CHICGAGE.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
SITEID	1	20	20	Site Identifier
LATITUDE	21	28	8	Facility Latitude (DDMMSS)
LONGITUDE	29	37	9	Facility Longitude (DDDMMSS)
LAT	38	48	11.6	Facility Latitude (decimal degrees, (-) below equator)
LON	49	59	11.6	Facility Longitude (decimal degrees, (-) west. hem.)
RF1INDEX	60	70	11	RF1 Reach Number Location
RF1MILE	71	76	6.2	Mile Point on RF1 Reach
RF1DIST	77	82	6.2	Distance From RF1 Reach
RF3INDEX	83	99	17	RF3 Reach Number Location
RF3MILE	100	105	6.2	Mile Point on RF3 Reach
RF3DIST	106	111	6.2	Distance From RF3 Reach
JAN	112	118	7.2	Monthly Flow - January
FEB	119	125	7.2	Monthly Flow - February
MAR	126	132	7.2	Monthly Flow - March
APR	133	139	7.2	Monthly Flow - April
MAY	140	146	7.2	Monthly Flow - May
JUN	147	153	7.2	Monthly Flow - June
JUL	154	160	7.2	Monthly Flow - July
AUG	161	167	7.2	Monthly Flow - August
SEP	168	174	7.2	Monthly Flow - September
OCT	175	181	7.2	Monthly Flow - October
NOV	182	188	7.2	Monthly Flow - November
DEC	189	195	7.2	Monthly Flow - December
RGN	196	197	2	Region Code
AREA	198	204	7.2	Drainage Area (SQ.MI.)
DUD	205	212	8	Date of Update

Water Gage File: CHICGAGE.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
FBCF	213	213	1	Flag - Basic Characteristic File ('Y')
FDFF	214	214	1	Flag - Daily Flows File ('Y')
FQMINV	215	224	10	IHS Pt. Files Index
GHF	225	225	1	Hit Flag (Reach File)
ICDE	226	226	1	Integrity Code
LFVEL	227	233	7.2	Low Flow Velocity
METHOD	234	236	3	Calculation Method Code
MFVEL	237	243	7.2	Mean Flow Velocity
MNFLO	244	250	7.2	USGS Mean Annual Flow
NME	251	298	48	Station Name
SHLAT	299	304	6	Sitehelp Latitude (DDMMSS)
SHLNG	305	311	7	Sitehelp Longitude (DDDMMSS)
SHMILES	312	318	7.2	Sitehelp Miles
SHNME	319	328	10	Sitehelp Source Name
SHPCT	329	335	7.2	Sitehelp Percent of Reach Miles
SITE	336	337	2	Site Location
SRC	338	340	3	Sitehelp Source Code
STCTY	341	345	5	State/County Numeric Code
SVTEN	346	352	7.2	USGS 7-10 Year Flow
BEG_WYR	353	356	4	Beginning Water Year
END_WYR	357	359	4	Ending Water Year
ELEV	361	368	8.2	Elevation (Feet)
WELL_DP	369	376	8.2	Well Depth (Feet)

The following table provides the DBASE III+ database field structures for the Water Impoundment database. As this file is geo-referenced, it should import easily into the park's Geographic Information System.

Water Impoundment File: CHICDAMS.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
SITEID	1	7	7	Site Identifier
SOURCE	8	10	3	Source of Data
ST1	11	12	2	Primary State Code Abbreviation
STCTY1	13	17	5	State/County Numeric Code
NAME	18	47	30	Official Name of Dam
LATITUDE	48	53	6	Facility Latitude (DDMMSS)
LONGITUDE	54	60	7	Facility Longitude (DDDMMSS)
LAT	61	70	10.6	Facility Latitude (decimal degrees, (-) below equator)
LON	71	81	11.6	Facility Longitude (decimal degrees, (-) west. hem.)
INME	82	111	30	Impoundment Name
RNME	112	139	28	River, Stream, or Tributary Name on Which Dam Built
CUSEGMI	140	149	10	Catalog Unit, Segment, and Segment Length
REGN	150	151	2	Water Resources Council Region Code
RGBSN	152	155	4	Water Resources Region/Basin Code
CU	156	163	8	Catalog Unit
SEG	164	166	3	Reach Segment of Dam
SEGL	167	171	5.2	Reach Segment Length
PURP	172	172	1	Major Purpose of Dam
				I=Irrigation
				H=Hydroelectric
				N=Navigation
				S=Water Supply
				R=Recreation
				P=Stock/Farm Pond
				D=Debris Control
				F=Flood Control

Water Impoundment File: CHICDAMS.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
				O=Other
FRF3	173	189	17	RF3 Reach Number Location
FRF3MI	190	194	5	Mile Point on RF3 Reach
PURPKEY	195	195	1	Purpose Key
PUR2	196	196	1	Purpose of Dam 2 (See Above)
PUR3	197	197	1	Purpose of Dam 3 (See Above)
PUR4	198	198	1	Purpose of Dam 4 (See Above)
PUR5	199	199	1	Purpose of Dam 5 (See Above)
PUR6	200	200	1	Purpose of Dam 6 (See Above)
PUR7	201	201	1	Purpose of Dam 7 (See Above)
PUR8	202	202	1	Purpose of Dam 8 (See Above)
PUR9	203	203	1	Purpose of Dam 9 (See Above)
PUR10	204	204	1	Purpose of Dam 10 (See Above)
TYPDAM	205	206	2	Major Dam Portion Type
				RE=Earth
				VA=Vaulted Arch
				CD=Buttress
				PG=Gravity
				ER=Rockfill
				MV=Multi-Arch
				OT=Other
YRCMP	207	210	4	Year Dam Completed
SHGT	211	214	4	Structural Height (Feet)
HHGT	215	218	4	Hydraulic Height (Feet)
VNORM	219	236	8	Normal Storage of Impoundment (Acre-Feet)
VMAX	227	234	8	Maximum Storage of Impoundment (Acre-Feet)
LCRST	235	239	5	Crest Length of Dam (Feet)
TSPL	240	240	1	Spillway Type
				C=Controlled

Water Impoundment File: CHICDAMS.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
				U=Uncontrolled
				N=None
				X=Unknown
WSPL	241	244	4	Dam Spillway Width (Feet)
QMAX	245	251	7	Maximum Spillway Discharge (CFS)
PINS	252	258	7.2	Quantity of Installed Power (Megawatts)
PPRO	259	265	7.2	Quantity of Proposed Power (Megawatts)
LOCK	266	266	1	Number of Navigational Locks
OWNR	267	290	24	Name of Impoundment Owner
PFOWN	291	291	1	Ownership Code
				N=Non-Federal
				G=Federal Government Agency
				C=Corps of Engineers
				X=Unknown
FEDR	292	292	1	Federally Regulated (Y=Yes, N=No, X=Unknown)
FLND	293	293	1	Private Dam on Federal Land (Y=Yes, N=No, X=Unknown)
SCSA	294	294	1	Type of Soil Conservation Service Assistance
				N=No Assistance
				T=Technical Assistance
				F=Financial Assistance
				B=Both Technical and Financial Assistance
				X=Unknown
DHAZ	295	295	1	Degree of Downstream Hazard
				1=High (More than a Few Lives Lost; Excessive Economic Loss)
				2=Significant (A Few Lives Lost; Appreciable Economic Loss)
				3=Low (No Lives Expected Lost; Minimal Economic Loss)
DCITY	296	319	24	Nearest Downstream City

Water Impoundment File: CHICDAMS.DBF in CHICSITE.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
POP	320	326	7	Population of Downstream City
DMILE	327	331	5.2	Distance of Downstream City From Dam (Miles)
RET	332	342	11.2	Retention Coefficient (Dimensionless)
MIX	343	353	11.2	Mixing Coefficient (Dimensionless)
SAREA	354	361	8	Surface Area of Impoundment (Acres)
SAFLG	362	362	1	Surface Area Flag (C=Calc., M=Measured, O=Other)
ILNTH	363	367	5	Length of Impoundment (Feet)
ILFLG	368	368	1	Impoundment Length Flag (C=Calc., M=Measured, O=Other)
UPKEY	369	374	6	Update Key (YYMMDD)

The following table provides the ASCII and DBASE III+ database field structures for the EPA River Reach File Ver. 3.0 (1:100,000 scale hydrography) attributes. The actual numeric file names will vary depending on the catalog unit(s). This information can be readily incorporated into the park's Geographic Information System.

RF3 Structure File: 12345678.RF3 and 12345678.DBF in CHICRF3.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
CATUNIT	1	8	8	Cataloging Unit (CU)
SEGM	9	12	4	Segment Number (SEG)
MI	13	17	5.2	Mile Point (MI)
UPMI	18	22	5.2	Upstream Mile Pt.
SEQNO	23	33	11.6	Hydro Sequence No.
RFLAG	34	34	1	Reach Flag (0,1)
OWFLAG	35	35	1	Open Water Flag (0,1)
TFLAG	36	36	1	Terminal Flag (0,1)
SFLAG	37	37	1	Start Flag (0,1)
RCHTYPE	38	38	1	Reach Type Code
LEV	39	40	2	Stream Level
JUNC	41	42	2	Level of Downstream Reach
DIVERGENCE	43	43	1	Divergence Code
STARTCU	44	51	8	Start CU
STRTSG	52	55	4	Start SEG
STOPCU	56	63	8	Stop CU
STOPSG	64	67	4	Stop SEG
USDIR	68	68	1	Upstream Direction
TERMID	69	73	5	Terminal Stream ID
TRMBLV	74	74	1	Terminal Base Level
PNAME	75	104	30	Primary Name
PNMCD	105	115	11	Primary Name Code
CNAME	116	145	30	Complement Name
CNMCD	146	156	11	Complement Name Code

RF3 Structure File: 12345678.RF3 and 12345678.DBF in CHICRF3.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
OWNAME	157	186	30	Open Water Name
OWNMCD	187	197	11	Open Water Name Code
DSCU	198	205	8	Downstream CU
DSSEG	206	209	4	Downstream SEG
DSMI	210	214	5.2	Downstream MI
CCU	215	222	8	Complement CU
CSEG	223	226	4	Complement SEG
CMILE	227	231	5.2	Complement MI
CDIR	232	232	1	Complement Direction
ULCU	233	240	8	Upstream Left CU
ULSEG	241	244	4	Upstream Left SEG
ULMI	245	249	5.2	Upstream Left MI
URCU	250	257	8	Upstream Right CU
URSEG	258	261	4	Upstream Right SEG
URMI	262	266	5.2	Upstream Right MI
SEGL	267	272	6.2	Reach Length (Miles)
RFORGFLAG	273	273	1	RF Orgin flag(1,2,3)
ALTPNMCD	274	281	8	Alt. Primary Name Code
ALTOWNMC	282	289	8	Alt. OW Name Code
DLAT	290	297	8.4	Downstream Latitude
DLONG	298	305	8.4	Downstream Longitude
ULAT	306	313	8.4	Upstream Latitude
ULONG	314	321	8.4	Upstream Longitude
MINLAT	322	329	8.4	Minimum Latitude
MINLONG	330	337	8.4	Minimum Longitude
MAXLAT	338	345	8.4	Maximum Latitude
MAXLONG	346	353	8.4	Maximum Longitude
NDLGREC	354	357	4	No. of DLG Records
LL1KEY1	358	367	10	Starting DLG LL Key1

RF3 Structure File: 12345678.RF3 and 12345678.DBF in CHICRF3.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
LL2KEY1	368	377	10	Ending DLG LL Key1
LL1KEY2	378	387	10	Starting DLG LL Key2
LL2KEY2	388	497	10	Ending DLG LL Key2
LL1KEY3	398	407	10	Starting DLG LL Key3
LL2KEY3	408	417	10	Ending DLG LL Key3
LL1KEY4	418	427	10	Starting DLG LL Key4
LL2KEY4	428	437	10	Ending DLG LL Key4
LL1KEY5	438	447	10	Starting DLG LL Key5
LL2KEY5	448	457	10	Ending DLG LL Key5
LL1KEY6	458	467	10	Starting DLG LL Key6
LL2KEY6	468	477	10	Ending DLG LL Key6
LL1KEY7	478	487	10	Starting DLG LL Key7
LL2KEY7	488	597	10	Ending DLG LL Key7
LL1KEY8	498	507	10	Starting DLG LL Key8
LL2KEY8	508	517	10	Ending DLG LL Key8
LL1KEY9	518	527	10	Starting DLG LL Key9
LL2KEY9	528	537	10	Ending DLG LL Key9
LL1KEY10	538	547	10	Start DLG LL Key 10
LL2KEY10	548	557	10	Ending DLG LL Key10
LN1AT2	558	561	4	DLG Line Attr. 1
LN2AT2	562	565	4	DLG Line Attr. 2
AREA1	566	569	4	DLG Area ID 1
AREA2	570	573	4	DLG Area ID 2
AR1AT2	574	577	4	DLG Area Attribute
AR1AT4	578	581	4	DLG Area Attribute
AR2AT2	582	585	4	DLG Area Attribute
AR2AT4	586	589	4	DLG Area Attribute
UPDATE1	590	595	6	Update Date #1 (mmddyy)
UPDTCD1	596	603	8	Update Type Code #1

RF3 Structure File: 12345678.RF3 and 12345678.DBF in CHICRF3.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
UPDTSRC1	604	611	8	Update Source #1
UPDATE2	612	617	6	Update Date #2 (mmddyy)
UPDTCD2	618	625	8	Update Type Code#2
UPDTSRC2	626	633	8	Update Source #2
UPDATE3	634	639	6	Update Date #3 (mmddyy)
UPDTCD3	640	647	8	Update Type Code #3
UPDTSRC3	648	655	8	Update Source #3
DIVCU	656	663	8	Divergent CU
DIVSEG	664	667	4	Divergent SEG
DIVMILE	668	672	5.2	Divergent MI
DLGID	673	678	6	DLG Number Special Use For Internal State Codes
FILLER	678	685	7	Filler: Future Use

Note: The structure for the .DBF file varies slightly from the RF3 structure displayed here in that the fields UPDATE1, UPDATE2, and UPDATE3 have a width of 8 and the last two fields, DLGID and FILLER, have been replaced with a field named ID of length 17. This ID field combines the CATUNIT, SEGM, and MI fields.

The following table provides the ASCII database field structures for the EPA River Reach File Ver. 3.0 (1:100,000 scale hydrography) traces. The actual numeric file names will vary depending on the catalog unit(s). This file contains the actual hydrographic network and is suitable for conversion into a variety of Geographic Information System formats.

RF3 Trace File: 12345678.TRC in CHICRF3.ZIP				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
(Header Record)				
CATUNIT	1	8	8	Cataloging Unit
SEGM	9	12	4	Segment Number
MI	13	17	5.2	Mile Point
NPTS	18	21	4	Number of Lat/Lon Coordinates
(Coordinate Record)				
LATITUDE	1	8	8.4	Latitude in Decimal
LONGITUDE	9	16	8.4	Longitude in Decimal
FILLER	17	21	5	

The following table provides the ASCII database field structures for the EPA River Reach File Ver. 3.0 (1:100,000 scale hydrography) catalog unit boundary file. The actual numeric file names will vary depending on the catalog unit(s). This file contains the actual catalog unit boundary and is suitable for conversion into a variety of Geographic Information System formats.

Catalog Unit Boundary File: 12345678.CUB in CHICRF3.ZIP
First Line = Catalog Unit Number (8 Characters)
Subsequent Lines:
L=DDMMSS,L=DDDMMSS,L=DDMMSS,L=DDDMMSS,L=DDMMSS,L=DDDMMSS, ...
Example:
02070010
L=391259,L=0770809,L=391220,L=0770749,L=391147,L=0770715,L=391120,L=0770633,
L=391058,L=0770535,L=391042,L=0770520,L=391016,L=0770427,L=390948,L=0770416,
L=390526,L=0765331,L=390500,L=0765149,L=390456,L=0765139,L=390357,L=0765123,
...
L=390744,L=0771007,L=390826,L=0771022,L=390910,L=0771022,L=390950,L=0771003,
L=391107,L=0770922,
There can be as many as four latitude/longitude pairs per line.

The following table provides the DBASE III+ database field structure of the Water Resources Division's "encyclopedia" file that documents the minimum and maximum parameter values found and the park(s) where they occurred. This file is intended for Water Resources Division internal use, but will be available to anyone upon request after Baseline Water Quality Data Inventory and Analysis reports have been completed for all parks.

Encyclopedia File: WRD File For Internal Use Only				
Field Name	**Start**	**Stop**	**Length**	**Field Description**
PARM	1	5	5	STORET Parameter Code
PARMNAME	6	45	40	Parameter Name
MINVAL	46	61	16.7	Minimum Value
MINVALPARK	62	65	4	Park Unit with Minimum Value
MAXVAL	66	71	16.7	Maximum Value
MAXVALPARK	72	75	4	Park Unit with Maximum Value

Appendix C

STORET Water Quality Control/Edit Checking

The following table provides the high and low values used by STORET since November 1983 for 190 common water quality parameters to screen or error check data. Data entered into STORET prior to November 1983, however, were not subjected to this edit/bounds check. Additionally, data from the USGS WATSTORE system that is loaded into STORET is never subjected to these edit criteria and agencies entering data in STORET can override these edit criteria to enter data values that fall outside a range. As a consequence, all data downloaded from STORET for the purposes of this project were filtered through these edit criteria to document values outside the generally accepted ranges. Decisions were then made on a case-by-case basis to retain or discard obviously incorrect data. Refer to the Water Quality Observations Outside STORET Edit Criteria section of the Interpretive Guide To Water Quality Results chapter for more information on this subject.

STORET Code	STORET Parameter Description	High Value	Low Value
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	37.0	-2.0
00011	TEMPERATURE, WATER (DEGREES FAHRENHEIT)	98.0	31.0
00020	TEMPERATURE, AIR (DEGREES CENTIGRADE)	52.0	-40.0
00021	TEMPERATURE, AIR (DEGREES FAHRENHEIT)	125.0	-40.0
00026	TOXICS-IDENTIFY DATA COLLECTION BY EPA DIRECTIVE	1990.9	1977.0
00032	CLOUD COVER (PERCENT)	101.0	0.0
00035	WIND VELOCITY (MILES PER HOUR)	85.0	0.0
00036	WIND DIRECTION IN DEGREES FROM TRUE N (CLOCKWISE)	361.0	0.0
00045	PRECIPITATION, TOTAL (INCHES PER DAY)	15.0	0.0
00070	TURBIDITY, (JACKSON CANDLE UNITS)	1500.0	0.0
00074	TURBIDITY, TRANSMISSOMETER, PERCENT TRANSMISSION	101.0	0.0
00075	TURBIDITY, HELLIGE (PPM AS SILICON DIOXIDE)	500.0	0.0
00076	TURBIDITY,HACH TURBIDIMETER (FORMAZIN TURB UNIT)	1000.0	0.0
00077	TRANSPARENCY, SECCHI DISC (INCHES)	600.0	0.0
00080	COLOR (PLATINUM-COBALT UNITS)	500.0	0.0
00081	COLOR,APPARENT(UNFILTERED SAMPLE) PLAT-COB UNITS	500.0	0.0
00085	ODOR (THRESHOLD NUMBER AT ROOM TEMPERATURE)	250.0	0.0
00094	SPECIFIC CONDUCTANCE,FIELD (UMHOS/CM @ 25C)	60000.0	1.0
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	60000.0	1.0
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE (MG/L)	30.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
00300	OXYGEN, DISSOLVED (MG/L)	30.0	0.0
00301	OXYGEN, DISSOLVED, PERCENT OF SATURATION%	200.0	0.0
00310	BOD, 5 DAY, 20 DEG C (MG/L)	150.0	0.0
00335	COD, .025N K2CR2O7 (MG/L)	1000.0	0.0
00340	COD, .25N K2CR2O7 (MG/L)	1000.0	0.0
00365	CHLORINE DEMAND, 15 MINUTE (MG/L)	15.0	0.0
00400	PH (STANDARD UNITS)	12.0	0.9
00403	PH, LAB, STANDARD UNITS, (STANDARD UNITS)	12.0	0.9
00405	CARBON DIOXIDE (MG/L AS CO2)	100.0	0.0
00406	PH, FIELD (STANDARD UNITS)	12.0	0.9
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	1000.0	0.0
00415	ALKALINITY, PHENOLPHTHALEIN (MG/L)	750.0	0.0
00435	ACIDITY, TOTAL (MG/L AS CACO3)	1000.0	0.0
00436	ACIDITY, MINERAL (METHYL ORANGE) (MG/L AS CACO3)	1000.0	0.0
00437	ACIDITY, CO2 (PHENOLPHTHALEIN) (MG/L AS CACO3)	750.0	0.0
00440	BICARBONATE ION (MG/L AS HCO3)	450.0	0.0
00445	CARBONATE ION (MG/L AS CO3)	100.0	0.0
00480	SALINITY - PARTS PER THOUSAND	40.0	0.0
00500	RESIDUE, TOTAL (MG/L)	15000.0	0.0
00505	RESIDUE, TOTAL VOLATILE (MG/L)	10000.0	0.0
00510	RESIDUE, TOTAL FIXED (MG/L)	10000.0	0.0
00515	RESIDUE, TOTAL FILTRABLE (DRIED AT 105C), (MG/L)	20000.0	0.0
00520	RESIDUE, VOLATILE FILTRABLE (MG/L)	10000.0	0.0
00525	RESIDUE, FIXED FILTRABLE (MG/L)	10000.0	0.0
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	10000.0	0.0
00535	RESIDUE, VOLATILE NONFILTRABLE (MG/L)	10000.0	0.0
00540	RESIDUE, FIXED NONFILTRABLE (MG/L)	10000.0	0.0
00545	RESIDUE, SETTLEABLE (ML/L)	1000.0	0.0
00546	RESIDUE, SETTLEABLE (MG/L)	1000.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
00550	OIL & GREASE (SOXHLET EXTRACTION) TOTAL,REC., (MG/L)	250.0	0.0
00600	NITROGEN, TOTAL (MG/L AS N)	100.0	0.0
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	15.0	0.0
00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	25.0	0.0
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	20.0	0.0
00615	NITRITE NITROGEN, TOTAL (MG/L AS N)	5.0	0.0
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	50.0	0.0
00625	NITROGEN, KJELDAHL, TOTAL, (MG/L AS N)	50.0	0.0
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	55.0	0.0
00635	NITROGEN, AMMONIA & ORG., TOTAL 1 DET (MG/L AS N)	70.0	0.0
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	30.0	0.0
00653	PHOSPHATE, TOTAL SOLUBLE (MG/L)	30.0	0.0
00655	PHOSPHATE, POLY (MG/L AS PO4)	30.0	0.0
00660	PHOSPHATE, ORTHO (MG/L AS PO4)	30.0	0.0
00665	PHOSPHORUS, TOTAL (MG/L AS P)	10.0	0.0
00666	PHOSPHORUS, DISSOLVED (MG/L AS P)	10.0	0.0
00680	CARBON, TOTAL ORGANIC (MG/L AS C)	100.0	0.0
00681	CARBON, DISSOLVED ORGANIC (MG/L AS C)	100.0	0.0
00685	CARBON, TOTAL INORGANIC (MG/L AS C)	100.0	0.0
00690	CARBON, TOTAL (MG/L AS C)	150.0	0.0
00720	CYANIDE, TOTAL (MG/L AS CN)	10.0	0.0
00745	SULFIDE, TOTAL (MG/L AS S)	1500.0	0.0
00746	SULFIDE, DISSOLVED (MG/L AS S)	1500.0	0.0
00760	SULFITE WASTE LIQUOR, PEARL BENSON INDEX (MG/L)	150.0	0.0
00900	HARDNESS, TOTAL (MG/L AS CACO3)	5000.0	0.0
00910	CALCIUM (MG/L AS CACO3)	3000.0	0.0
00915	CALCIUM, DISSOLVED (MG/L AS CA)	1000.0	0.0
00916	CALCIUM, TOTAL (MG/L AS CA)	1000.0	0.0
00920	MAGNESIUM (MG/L AS CACO3)	3000.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
00925	MAGNESIUM, DISSOLVED (MG/L AS MG)	1000.0	0.0
00927	MAGNESIUM, TOTAL (MG/L AS MG)	1000.0	0.0
00929	SODIUM, TOTAL (MG/L AS NA)	5000.0	0.0
00930	SODIUM, DISSOLVED (MG/L AS NA)	5000.0	0.0
00931	SODIUM ADSORPTION RATIO	50.0	0.0
00935	POTASSIUM, DISSOLVED (MG/L AS K)	175.0	0.0
00937	POTASSIUM, TOTAL MG/L AS K)	175.0	0.0
00940	CHLORIDE, TOTAL IN WATER, (MG/L)	22000.0	0.0
00945	SULFATE, TOTAL (MG/L AS SO4)	2500.0	0.0
00946	SULFATE, DISSOLVED (MG/L AS SO4)	2500.0	0.0
00950	FLUORIDE, DISSOLVED (MG/L AS F)	15.0	0.0
00951	FLUORIDE, TOTAL (MG/L AS F)	15.0	0.0
00955	SILICA, DISSOLVED (MG/L AS SI02)	2000.0	0.0
00956	SILICA, TOTAL (MG/L AS SI02)	2000.0	0.0
01000	ARSENIC, DISSOLVED (UG/L AS AS)	5000.0	0.0
01002	ARSENIC, TOTAL (UG/L AS AS)	5000.0	0.0
01005	BARIUM, DISSOLVED (UG/L AS BA)	2000.0	0.0
01007	BARIUM, TOTAL (UG/L AS BA)	2000.0	0.0
01010	BERYLLIUM, DISSOLVED (UG/L AS BE)	2000.0	0.0
01012	BERYLLIUM, TOTAL (UG/L AS BE)	2000.0	0.0
01020	BORON, DISSOLVED (UG/L AS B)	5000.0	0.0
01022	BORON, TOTAL (UG/L AS B)	5000.0	0.0
01025	CADMIUM, DISSOLVED (UG/L AS CD)	500.0	0.0
01027	CADMIUM, TOTAL (UG/L AS CD)	500.0	0.0
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	2000.0	0.0
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	2000.0	0.0
01033	CHROMIUM, TRI-VAL (UG/L AS CR)	2000.0	0.0
01034	CHROMIUM, TOTAL (UG/L AS CR)	2000.0	0.0
01040	COPPER, DISSOLVED (UG/L AS CU)	2000.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
01042	COPPER, TOTAL (UG/L AS CU)	5000.0	0.0
01045	IRON, TOTAL (UG/L AS FE)	56000.0	0.0
01046	IRON, DISSOLVED (UG/L AS FE)	56000.0	0.0
01047	IRON, FERROUS (UG/L AS FE)	56000.0	0.0
01049	LEAD, DISSOLVED (UG/L AS PB)	1000.0	0.0
01051	LEAD, TOTAL (UG/L AS PB)	1000.0	0.0
01055	MANGANESE, TOTAL (UG/L AS MN)	5000.0	0.0
01056	MANGANESE, DISSOLVED (UG/L AS MN)	5000.0	0.0
01065	NICKEL, DISSOLVED (UG/L AS NI)	2000.0	0.0
01067	NICKEL, TOTAL (UG/L AS NI)	2000.0	0.0
01075	SILVER, DISSOLVED (UG/L AS AG)	5000.0	0.0
01077	SILVER, TOTAL (UG/L AS AG)	5000.0	0.0
01090	ZINC, DISSOLVED (UG/L AS ZN)	25000.0	0.0
01092	ZINC, TOTAL (UG/L AS ZN)	25000.0	0.0
01105	ALUMINUM, TOTAL (UG/L AS AL)	20000.0	0.0
01106	ALUMINUM, DISSOLVED (UG/L AS AL)	20000.0	0.0
01145	SELENIUM, DISSOLVED (UG/L AS SE)	100.0	0.0
01501	ALPHA, TOTAL	200.0	0.0
01503	ALPHA, DISSOLVED	75.0	0.0
01505	ALPHA, SUSPENDED	150.0	0.0
03501	BETA, TOTAL	3500.0	0.0
03503	BETA, DISSOLVED	3000.0	0.0
03505	BETA, SUSPENDED	1500.0	0.0
09503	RADIUM 226, DISSOLVED	500.0	0.0
13501	STRONTIUM 90, TOTAL	500.0	0.0
22703	URANIUM, NATURAL, DISSOLVED	500.0	0.0
31501	COLIFORM, TOT,MEMBRANE FILTER,IMMED.M-ENDO MED, 35C	24000000.0	0.0
31502	COLIFORM, TOTAL, 10/ML	24000000.0	0.0
31503	COLIFORM, TOT,MEMBR FILTER, DELAYED,M-ENDO MED, 35C	24000000.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
31504	COLIFORM, TOT,MEMBR FILTER,IMMED,LES ENDO AGAR, 35C	24000000.0	0.0
31613	FECAL COLIFORM, MEMBR FILTER, M-FC AGAR,44.5C, 24HR	10000000.0	0.0
31615	FECAL COLIFORM, MPN, EC MED, 44.5C (TUBE 31614)	10000000.0	0.0
31616	FECAL COLIFORM, MEMBR FILTER,M-FC BROTH, 44.5C	10000000.0	0.0
31672	FECAL STREPTOCOCCI,PLATE COUNT M-ENTER AGAR,35C48HR	500000.0	0.0
31673	FECAL STREPTOCOCCI, MBR FILT, KF AGAR, 35C, 48HR	500000.0	0.0
31677	FECAL STREPTOCOCCI,MPN,AD-EVA, 35C (TUBE 31678)	500000.0	0.0
31679	FECAL STREPTOCOCCI, MF M-ENTEROCOCCUS AGAR,35C,48H	500000.0	0.0
31749	PLATE COUNT, TOTAL, TPC AGAR, 20C, 48 HRS	99999999.0	0.0
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	99999999.0	0.0
32210	CHLOROPHYLL-A UG/L TRICHROMATIC UNCORRECTED	500.0	0.0
32211	CHLOROPHYLL-A UG/L SPECTROPHOTOMETRIC ACID. METH.	750.0	0.0
32212	CHLOROPHYLL-B UG/L TRICHROMATIC UNCORRECTED	1000.0	0.0
32214	CHLOROPHYLL-C UG/L TRICHROMATIC UNCORRECTED	200.0	0.0
32217	CHLOROPHYLL A UG/L FLUOROMETRIC UNCORRECTED	500.0	0.0
32218	PHEOPHYTIN-A UG/L SPECTROPHOTOMETRIC ACID. METH.	200.0	0.0
32219	PHEOPHYTIN RATIO(OD 663)SPECTRO,BEFORE/AFTER ACID	2.0	0.0
32221	CHLOROPHYLL A,% OF(PHEOPHYTIN A+CHL A),SPEC-ACID.	101.0	0.0
32230	CHLOROPHYLL A (MG/L)	0.5	0.0
32231	CHLOROPHYLL B (MG/L)	0.8	0.0
32232	CHLOROPHYLL C (MG/L)	0.2	0.0
32234	CHLOROPHYLL, TOTAL (A+B+C) (MG/L)	1.0	0.0
32270	CHLOROFORM EXTRACTABLES TOTAL IN MG PER LITER	5.0	0.0
32730	PHENOLICS, TOTAL, RECOVERABLE (UG/L)	1500.0	0.0
38260	METHYLENE BLUE ACTIVE SUBST. (DETERGENTS, ETC.)	10.0	0.0
39330	ALDRIN IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39340	GAMMA-BHC(LINDANE),WHOLE WATER, (UG/L)	20.0	0.0
39350	CHLORDANE(TECH MIX & METABS),WHOLE WATER, (UG/L)	20.0	0.0
39360	DDD IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0

STORET Code	STORET Parameter Description	High Value	Low Value
39365	DDE IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39370	DDT IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39380	DIELDRIN IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39390	ENDRIN IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39400	TOXAPHENE IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39410	HEPTACHLOR IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39420	HEPTACHLOR EPOXIDE IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39480	METHOXYCHLOR IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39516	PCBS IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39530	MALATHION IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39540	PARATHION IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39600	METHYL PARATHION IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
39782	LINDANE IN WHOLE WATER SAMPLE (UG/L)	20.0	0.0
50060	CHLORINE, TOTAL RESIDUAL (MG/L)	5.0	0.0
60050	ALGAE, TOTAL (CELLS/ML)	700000.0	0.0
70300	RESIDUE, TOTAL FILTRABLE (DRIED AT 180C), (MG/L)	4000.0	0.0
70505	PHOSPHATE, TOTAL,COLORIMETRIC METHOD (MG/L AS P)	10.0	0.0
70507	PHOSPHORUS, IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	10.0	0.0
71850	NITRATE NITROGEN, TOTAL (MG/L AS NO3)	65.0	0.0
71886	PHOSPHORUS, TOTAL, AS PO4 - (MG/L)	30.0	0.0
71890	MERCURY, DISSOLVED (UG/L AS HG)	10.0	0.0
71895	MERCURY, SUSPENDED (UG/L AS HG)	10.0	0.0
71900	MERCURY, TOTAL (UG/L AS HG)	10.0	0.0
74010	IRON, TOTAL (MG/L AS FE)	56000.0	0.0

Appendix D

STORET Administrative Parameters

STORET Code	Description of STORET Administrative Parameters
00022	LENGTH OF EXPOSURE OF SAMPLE OR TEST - DAYS
00026	TOXICS-IDENTIFY DATA COLLECTION BY EPA DIRECTIVE
00027	CODE NO FOR AGENCY COLLECTING SAMPLE
00028	CODE NO FOR AGENCY ANALYZING SAMPLE
00029	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE
00063	SAMPLING POINTS, NUMBER OF IN A CROSS SECTION
00073	SAMPLE LOC CODE DEFINED BY THERMAL STRUCT & DEPTH
00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI
00115	SAMPLE TREATMENT CODE (1=RAW,2=TREATED)
00116	INTENSIVE SURVEY IDENTIFICATION NUMBER
00145	TOTAL PRODUCTION OF PRODUCT MANUFACTURED TONS/DAY
01273	TOTAL ACID PRIORITY POLLUTANTS MG/L
01274	TOTAL BASE-NEUTRAL PRIORITY POLLUTANTS MG/L
01275	TOTAL VOLATILE PRIORITY POLLUTANTS MG/L
01365	ANALYSIS DATE (DIOXIN) (YYMMDD)
04177	SAMPLE STABILIZATION, RECOVERY TEST CODE
04178	FIELD PROTOCOL(CONFDNCE ASSIGNED FIELD SAMPLE) CODE
04179	SAMPLE STATION LOCKED CODE
04180	CONDITION OF STATION SITE CODE
04181	LABORATORY QA/QC PLAN CONFIDENCE CODE
04182	SAMPLE TYPE CODE
04183	SAMPLE REMARKS CODE
30333	BAG MESH SIZE, BEDLOAD SAMPLER, MM
34772	NPDES NUMBER, CROSS REFERENCE CODE
34785	GAGE TYPE, METHOD CODE

STORET Code	Description of STORET Administrative Parameters
45575	GC MAKE AND MODEL INFORMATION CODE
45576	GC DETECTOR TYPE CODE
45577	GC COLUMN TYPE CODE
45580	METHOD OF ANALYSIS CODE
45581	LABORATORY LOCATION CODE
46107	SAMPLE LOCATION CODE (TREATMENT PLANT OPERATION)
46390	TOXICITY CHARACTERISTIC LEACHING PROCEDURE P OR F
46396	PROCESS TO SIGNIFICANTLY REDUCE PATHOGENS YES OR NO
46397	PROCESS TO FURTHER REDUCE PATHOGENS YES OR NO
47001	PERMIT EXPIRATION DATE (JULIAN CALENDAR)
47044	OBSERVATIONS,WASTE SITE-SEVERITY OF PROBLEMS CODE
47460	SUBSAMPLE - DECIMAL FRACTION OF WHOLE NUMBER
47477	COMPOSITION AND/OR DISPOSITION OF CATCH NUM CODE
70231	CURRENT DIRECTION (DEGREES FROM DOWNSTREAM FLOW)
71999	SAMPLE PURPOSE CODE
72032	NUMBER OF SPILLWAY GATES OPEN
73672	DATE OF ANALYSIS YYMMDD
73673	DATE OF EXTRACTION YYMMDD
74031	GRANT, PROJECT COST ELIGIBLE FOR CONSTRUCTION
74032	GRANT, AMOUNT OF PL 660 GRANT FOR THIS PROJECT
74033	GRANT, FEDERAL, OTHER THAN PL 660 GRANT
74034	GRANT, FUTURE PL 660 WHICH MAY APPLY TO THIS PROJ
74035	GRANT, TOTAL FEDERAL, WHICH APPLIES TO THIS PROJ
74036	GRANT, PROJ NUMBER ASSIGNED TO THIS APPLICATION
74037	GRANT, TYPE OF PROJECT TO WHICH GRANT APPLIES
74038	GRANT, STATUS OF PROJECT TO WHICH GRANT APPLIES
74039	PCS/STORET WATER QUALITY FILE INTERFACE YR/MO/DAY
74040	SURVEY NUMBER YYMMNO
74041	STORET STORAGE TRANSACTION DATE YR/MO/DAY

STORET Code	Description of STORET Administrative Parameters
74050	RADIOACTIVITY, GENERAL (PERMIT)
74051	ALGICIDES, GENERAL (PERMIT)
74052	CHLORINATED HYDROCARBONS, GENERAL (PERMIT)
74053	PESTICIDES, GENERAL (PERMIT)
74056	COLIFORM, TOTAL, GENERAL (PERMIT)
74065	STREAM FLOW CLASS
74066	ANNUAL RUNOFF
74067	SOIL CLASSIFICATION
74068	WATER QUALITY DESIGNATED USE CLASSIFICATION (IA)
74100	PRIMARY 1972 SIC CODE
74101	SECONDARY 1972 SIC CODE
74102	SECONDARY 1972 SIC CODE
74103	SECONDARY 1972 SIC CODE
74200	SAMPLE PRESERVATION METHODS ONE OR MORE IN COMB.
74205	LAND RESOURCE AREA (IOWA)
74206	SOIL EROSION POTENTIAL (IOWA)
74209	WATER QUALITY INDEX - STATE OF ILLINOIS, EPA
74210	FOREST STREAM WATER QUALITY INDEX CALC. NUMBER
74990	FISH SPECIES NUMERIC CODE - F&W SERVICE
74995	ANATOMY CODE
75000	SPECIES CODE-REMARK=SEX (M=MALE,F=FEMALE,U=UNK.)
81028	WITHDRAWAL OF GROUNDWATER (MILLION GAL/DAY)
82258	WATER CLASSIFICATION CODE (1-9) CODE
82292	DATA RELAY GROUND STATION SOURCE NODE CODE, CODE
82309	CONTAMINATION SOURCE POSSIBLE CODES NUMERIC CODE
82310	DEPTH CONFIDENCE IN REPORTED VALUES NUMERIC CODES
82373	FREQUENCY OF SAMPLING M=MON,Q=QUAR,Y=YR,R=RNFFCODE
82519	DRILLER REGISTRATION NUMBER ALPHA-NUMERIC CODE
82562	NARRATIVE REQUIREMENT EXCEEDANCES INTEGER

STORET Code	Description of STORET Administrative Parameters
82576	DAILY EXCURSION TIME, WATER MIN
82577	MONTHLY EXCURSION TIME, WATER TOTAL MIN
82578	DAY/MAXIMUM EXCURSION TIME, WATER MIN
82579	CODE NUMBER FOR PERSON COLLECTING SAMPLE
84002	CODE, GENERAL INFORMATION - ALPHA, NUMERIC CODE
84003	WATER SHED ID NUMBER (IOWA)
84005	FISH SPECIES CODE-FISH & WILDLIFE SER
84006	OWNERSHIP CLASSIFICATION OF LAKE, ILLINOIS SYSTEM
84010	PUBLIC ACCESS TO LAKE ILLINOIS SYSTEM
84011	CONFIDENCE CODE FOR GLC CONFIRMATION CODE
84012	PATIENT PARAMETERS (AGE, SEX, WT, ETC.) CODE
84013	SAMPLE PARAMETERS D=DESIGN SPECIMEN, S=SURPLUS
84027	CODE NUMBER FOR AGENCY COLLECTING SAMPLE
84028	CODE NO FOR AGENCY ANALYZING SAMPLE
84029	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE FIELD
84033	EGD ANALYTICAL DATA COMPLETENESS Y=YES N=NO CODE
84034	EGD SMPL NO.(SMPL.IDENT) NUMERIC=SCS ALPH+4NUM=JRB
84035	EGD SAMPLE CLASSIFICATION CATEGORY ALPHA CODE
84036	EGD INDUSTRIAL CATEGORY NUMERIC CODE
84037	EGD INDUSTRIAL CATEGORY NAME ALPHA CODE
84038	EGD LABORATORY NUMERIC CODE
84039	EGD LABORATORY NAME ALPHA CODE
84040	EGD SAMPLE STATUS (1-5,9,AND BLANK) NUMERIC CODE
84041	EGD ACID STATUS (1-5,9,AND BLANK) NUMERIC CODE
84042	EGD BASE STATUS (1-5,9AND BLANK) NUMERIC CODE
84043	EGD PESTICIDE STATUS (1-5,9,AND BLANK) NUMERIC CODE
84044	EGD VOA FRACT. STATUS INDICATOR (1-5,9,BLANK) CODE
84045	EGD ACID EXTRACT DATE (YYMMDD) NUMERIC CODE
84046	EGD BASE EXTRACTION DATE (YYMMDD) NUMERIC CODE

STORET Code	Description of STORET Administrative Parameters
84047	EGD PESTICIDE EXTRACTION DATE (YYMMDD) NUMERIC CODE
84048	EGD VOA FRACTION INJECTION DATE YYMMDD NUMERIC CODE
84049	EGD ACID CONC. FACTOR (FIVE NUMERIC DIGITS) CODE
84050	EGD BASE CONC.FACTOR (FIVE NUMERIC DIGITS) CODE
84051	EGD PESTICIDE CONC.FACTOR (FIVE NUMERIC DIGITS) CODE
84052	EGD VOA FRACTION CONC. FACTOR (5 NUMERIC DIGITS) CODE
84053	SAMPLE TYPE AND FREQUENCY OF COLLECTION CODE
84054	LITHOLOGY ALPHA-NUMERIC CODE
84055	AVAILABLE LOGS ALPHA-NUMERIC CODE
84056	WATER USE CATEGORY ALPHA-NUMERIC CODE
84057	INSPECTION TYPE ALPHA-NUMERIC CODE
84058	HYDROGEOLOGIC SYSTEM ALPHA-NUMERIC CODE
84059	WELL OWNERSHIP ALPHA-NUMERIC CODE
84060	TOPOGRAPHY ALPHA-NUMERIC CODE
84061	WELL USE ALPHA-NUMERIC CODE
84062	MEASURING POINT DESCRIPTION ALPHA-NUMERIC CODE
84063	DRILLING METHOD ALPHA-NUMERIC CODE
84064	WELL DATA AVAILABILITY ALPHA-NUMERIC CODE
84065	PERMIT COMPLIANCE DATA ALPHA-NUMERIC CODE
84067	NATURE OF MONITORING ALPHA-NUMERIC CODE
84073	REPLACES EXISTING WELL ALPHA-NUMERIC CODE
84074	AQUIFER TYPE (SEE USGS HANDBOOK) ALPHA CODE
84075	WELL PERMIT NUMBER ALPHA-NUMERIC CODE
84076	TSD MONITORING WELL TYPE ALPHA CODE
84077	TSD MONITORING WELL SAMPLING METHOD ALPHA CODE
84083	POLLUTION VERIFICATION ALPHA CODE
84084	WELL SAMPLE PURPOSE ALPHA CODE
84090	SAMPLE FILE CONTROL PROJECT IDENTIFICATION A-CODE
84091	INFILTRATION DATE/BEGINNING 'YYMMDD'

STORET Code	Description of STORET Administrative Parameters
84092	INFILTRATION DATE/ENDING 'YYMMDD'
84093	ENFORCEMENT FORM #2-C,DATA IDENTIFICATION CODE
84102	SAMPLE SPECIES-SUB ID ALPHA CODE
84103	DIOXIN LABORATORY ALPHA CODE
84104	DIOXIN STUDY ALPHA CODE
84112	SOURCE OF GEOHYDROLOGIC DATA CODE
84119	SOURCE OF EVACUATION DATA CODE
84121	REGULATING AGENCY CODE
84122	SAMPLE PURPOSE CODE
84126	SOURCE OF DEPTH DATA CODE
84127	METHOD OF DEPTH MEASUREMENT CODE
84128	SOURCE OF WATER-LEVEL DATA CODE
84129	DATA QUALITY
84141	LAKE, PHYSICAL CONDITION AT SAMPLE TIME, 1-5, CODE
84142	LAKE,RECREATIONAL SUITABILITY @ SMPL TIME,1-5, CODE
84164	SAMPLER TYPE, CODE
85300	PROBLEM CODE NES SURVEY
85327	WATER LEVEL AT SAMPLE COLLECTION TIME-CODE-NES
85332	CLOUD COVER AT SAMPLE COLLECTION TIME-CODE-NES
85553	WELL COMPLETION DATE (MONTH/YEAR)
85554	WELL WORKOVER DATE, LATEST (MONTH/YEAR)

Appendix E

STORET Parameters Not Suitable for Statistical Analysis

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
00001	X-SEC. LOC., HORIZ (FT. FROM R BANK LOOK UPSTR.)
00002	X-SEC. LOC., HORIZ (% FROM R BANK LOOK UPSTR.)
00003	SAMPLING STATION LOCATION, VERTICAL (FEET)
00005	X-SEC. LOC., VERTICAL (PERCENT OF TOTAL DEPTH)
00006	DISTANCE FROM LOCATION IN X MILES
00007	DISTANCE FROM LOCATION IN Y MILES
00008	NUMBER USED IN SAMPLE ACCOUNTING PROCEDURE
00009	X-SEC. LOC.(FT FROM LEFT BANK LOOKING DOWNSTRM)
00027	CODE NO FOR AGENCY COLLECTING SAMPLE
00028	CODE NO FOR AGENCY ANALYZING SAMPLE
00033	WEATHER CODE FOR OCEAN-OBSERV. (WMO CODE 4677)
00037	WIND FORCE (BEAUFORT UNITS)
00038	WIND DIRECTION (WMO CODES 0885 + 0887)
00041	WEATHER (WMO CODE 4501)
00042	ALTITUDE IN FEET ABOVE MEAN SEA LEVEL
00043	CLOUD TYPE (WMO CODE 0500)
00044	CLOUD AMOUNT (WMO CODE 2700)
00047	TOTAL PARTIAL PRESSURE DISSOLVED GASES (MM HG)
00048	TOTAL PARTIAL PRESSURE DISSOLVED GASES (% SAT)
00049	SURFACE AREA IN SQUARE MILES
00050	EVAPORATION, TOTAL (INCHES PER DAY)
00051	SURFACE AREA IN SQUARE FEET
00053	SURFACE AREA, ACRES
00054	RESERVOIR STORAGE - ACRE FEET
00063	SAMPLING POINTS, NUMBER OF IN A CROSS SECTION
00067	TIDE STAGE

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
00069	SEA WAVES(0=NONE;1=0-3";2=4-20";3=21-48";4=4-8')
00097	SAMPLING STATION LOCATION, VERTICAL (FEET)
00098	SAMPLING STATION LOCATION, VERTICAL (METERS)
00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI
00115	SAMPLE TREATMENT CODE (1=RAW,2=TREATED)
01300	OIL-GREASE (SEVERITY)
01305	DETERGENT SUDS (SEVERITY)
01310	GAS BUBBLES (SEVERITY)
01315	SLUDGE, FLOATING (SEVERITY)
01320	GARBAGE, FLOATING (SEVERITY)
01325	ALGAE, FLOATING MATS (SEVERITY)
01330	ODOR, ATMOSPHERIC (SEVERITY)
01331	TASTE (SEVERITY)
01335	SEWAGE SOLIDS, FRESH, FLOATING (SEVERITY)
01340	FISH, DEAD (SEVERITY)
01345	DEBRIS, FLOATING (SEVERITY)
01350	TURBIDITY (SEVERITY)
01351	FLOW, STRM,1DRY,2LOW,3NORM,4FLOOD,5ABOVE NORM,CODE
01355	ICE COVER, FLOATING OR SOLID (SEVERITY)
03595	BIOASSAY (96 HR), EFFLUENT, TOTAL CODE
03596	BIOASSAY (48 HR), EFFLUENT, TOTAL CODE
03597	BIOASSAY (24 HR), EFFLUENT, TOTAL CODE
03598	TOXICITY, EFFLUENT, TOTAL CODE
03599	TOXICITY, CHOICE OF SPECIES, EFFLUENT CODE
03600	TOXICITY, TROUT, EFFLUENT, TOTAL CODE
03601	TOXICITY, SAND DOLLAR, EFFLUENT CODE
03602	BIOCHEMICAL OXYGEN DEMAND, EFFLUENT, TOTAL CODE
03603	SOLIDS, TOTAL SUSPENDABLE, EFFLUENT, TOTAL CODE
03605	FLOW METER CALIBRATION, WATER CODE

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
03717	ONCORHYNCHUS MYKISS, WATER CODE
04117	TETHER LINE USED FOR COLLECTING SAMPLE CODE
04160	HALOCARBONS, PURGEABLE, SCAN, EFFLUENT CODE
04161	HALOCARBONS, PURGEABLE, SCAN, SLUDGE CODE
04162	AROMATIC, PURGEABLE, SCAN, EFFLUENT CODE
04163	AROMATIC, PURGEABLE, SCAN, SLUDGE CODE
04164	PHENOLIC, TOTAL, SCAN, EFFLUENT CODE
04165	PHENOLIC, TOTAL, SCAN, SLUDGE CODE
04166	PCB, TOTAL, SCAN, EFFLUENT CODE
04167	PCB, TOTAL, SCAN, SLUDGE CODE
04174	FREE LIQUIDS IN SEWAGE SLUDGE CODE
34765	AVIAN NUMERICAL SPECIES CODE (BIRDS)
34766	MAMMALIAN NUMERICAL SPECIES CODE
34771	MACROPHYTE, INSTREAM, VISUAL SIGHTING CODE
34773	ODOR, AMBIENT WATER CODE
34774	FISH, INSTREAM, VISUAL SIGHTING CODE
34775	STREAMBANK CHANNEL ALTERATIONS CODE
34776	HYDRAULIC STRUCTURES, INSTREAM CODE
34780	LAND USE, ADJACENT STREAM CODE
34781	SAMPLE POINTS, # OF LONGTDNL TRANSECTS, REACH CODE
34782	STREAM STAGE TREND CODE
34789	HABITATS, TYPES SAMPLED CODE
45613	FLOATING SOLIDS/VISIBLE FOAM, VISUAL, YES=1, NO=0, CODE
45614	SANITARY WASTE DISCHARGE ASSESSMENT, YES=1, NO=0, CODE
45615	INTERMITTENT DISCHARGE ASSESSMENT, YES=1, NO=0,CODE
46001	WATER APPEARANCE CODE (BASED ON FIELD ASSESSMENT)
46478	EQUIPMENT INSPECTION, VISUAL CODE
46486	TOXICITY,ACUTE 24HR(STATIC)CERIODAPHNIA (P/F) CODE
47454	FLOW METER REVOLUTIONS NUMBER

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
47455	LATITUDE, STARTING, OF A SAMPLE TOW DDMMSS
47456	LONGITUDE, STARTING, OF A SAMPLE TOW DDDMMSS
47457	LATITUDE, FINISHING, OF A SAMPLE TOW DDMMSS
47458	LONGITUDE, FINISHING, OF A SAMPLE TOW DDDMMSS
47459	LENGTH FREQUENCY NUMBER
47461	TIME THAT THE EQUIPMENT WAS SAMPLING MINUTES
47476	DIRECTION OF TOW IN RELATION TO CURRENT NUM CODE
50044	HYDROGRAPH LIMB, 1BASE, 2RISING, 3PEAK, 4FALLING, CODE
61390	DIATOMS,FIRST DOMINANT SPECIES OF UNITS - CODE
61391	DIATOMS,SECOND DOMINANT SPECIES OF UNITS - CODE
61392	DIATOMS,THIRD DOMINANT SPECIES OF UNITS - CODE
61393	DIATOMS,FOURTH DOMINANT SPECIES OF UNITS - CODE
70220	WAVE DIRECTION (WMO CODES 0885 + 0887)
70222	WAVE HEIGHT (WMO CODE 1555)
70223	WAVE PERIOD (WMO CODE 3155)
71090	BIVALVE SPECIES CODE
71500	EQUITABILITY INDEX,BENTHIC MACROINVER CODE
72000	ELEVATION OF LAND SURFACE DATUM (FT. ABOVE MSL)
72001	DEPTH, TOTAL OF HOLE (FT BELOW LAND SURFACE DATUM)
72002	DEPTH TO TOP OF WATER-BEARING ZONE SAMPLED (FT)
72003	DEPTH TO BOTTOM OF WATER-BEARING ZONE SAMPLED (FT)
72004	PUMP OR FLOW PERIOD PRIOR TO SAMPLING MINUTES
72005	SAMPLE SOURCE CODE (BM WELL DATA)
72006	SAMPLING CONDITION CODE (BM WELL DATA)
72007	FORMATION NAME CODE (BM WELL DATA)
72017	SERIES CODE (BM WELL DATA)
72018	SYSTEM CODE (BM WELL DATA)
72111	DIRECT READOUT GROUND STATN TRANSMIT EROR CODE NUM
74054	FECAL STREPTOCOCCI, GENERAL (PERMIT)

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
74055	FECAL COLIFORM, GENERAL (PERMIT)
80889	ACTIVATED SLUDGE PROCESS MODIFICATION CODE
81024	DRAINAGE AREA IN SQUARE MILES (SQ. MI.)
81637	SHELLFISH SPECIES NUMERIC CODE
82289	LAGOON OBSERVATION, VISUAL, Y=YES N=NO CODE
82398	SAMPLING METHOD (CODES)
82524	STORAGE COEFFICIENT NUMERICAL CODE
82923	ATMOSPHERIC DEPOSITION TYPE, WET CODE
83205	ATMOSPHERIC DEPOSITION TYPE, BULK CODE
84000	GEOLOGIC AGE CODE (SEE USGS CATALOG)
84001	AQUIFER NAME CODE (SEE USGS CATALOG)
84004	LAKE TYPE ILLINOIS CLASSIFICATION SYSTEM
84007	ANATOMY ALPHA CODE
84008	LIFE STYLE/HABITAT OF THE INDIVIDUALS IN THE SAMPLE
84009	SHELLFISH SPECIES ALPHANUMERIC CODE
84014	SPECIES SEX CODE
84030	CLOUD AMOUNT ALPHA WEATHER CODES
84031	PHYSICAL WEATHER ALPHA WEATHER CODES
84032	STREAM CONDITION ALPHA WEATHER CODES
84066	OIL AND GREASE, VISUAL, ALPHA-NUMERIC CODE
84068	SERIES CODE ALPHA-NUMERIC CODE
84069	FORMATION CODE ALPHA-NUMERIC CODE
84070	METHOD OF TESTING WELL YIELD ALPHA-NUMERIC CODE
84071	WATER LEVEL MEASUREMENT CONDITIONS ALPHA-NUM CODE
84072	WATER LEVEL MEASUREMENT METHOD ALPHA-NUMERIC CODE
84078	GIARDIA LAMBLIA, 2HSO4 OR SUC GRAD, MICRO, CODE
84079	BACTERIA, CELLUOLYTIC, AEROBIC-ANAEROBIC, RT 5-7, CODE
84080	BACTERIA, HYDROCARBONOCLASTIC, SHAKE INC 32C/WK, CODE
84081	YERSINIA ENTEROCOLITICA, SB BROTH, MAC AGAR,22C, CODE

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
84082	SALMONELLA/SHIGELLA, QUANT OR QUAL, HVF OR SWAB, CODE
84085	ORGANICS, VOLATILE, DETECTED, NUMERIC CODE, CODE
84086	MACROINVERTEBRATE SPECIES NUMERIC CODE
84087	MACROINVERTEBRATE HABITAT CODE
84088	BIOLOGY 1 MACROINVERTEBRATE CODE
84089	BIOLOGY 2 MACROINVERTEBRATE CODE
84094	PHYTOPLANKTON SPECIES CODE, NUMERIC
84095	PHYTOPLANKTON SPECIES CODE, ALPHA
84096	SEVERITY OF NON-PLANKTON ALGAE-MAT COVERAGE CODE
84097	LAGOON MOUTH CONDITION CODE
84098	COLOR OF NON-PLANKTONIC ALGAE CODE
84099	WATER - RELATIVE WATER LEVEL CODE
84100	SEX(1-MALE,2-FEMALE,3-MIXED,4-UNKNOWN) NUM CODE
84101	METAFORM, BENTHIC, ADULT(A), PUPAE(P), LARVAE(L) CODE
84105	OIL-SEPARATOR OBSERVATION ASSESS (0=DID NOT,1=DID)
84106	EVAPORAT/BED OBS ASSESS (0=DID NOT LOOK, 1=DID LOOK)
84107	AREA INSPECTION, VISUAL (0=DID NOT, 1=DID) CODE
84108	DRAIN FIELD INSPECTION ASSESS (0=DID NOT, 1=DID) CODE
84109	SLUDGE BUILD-UP IN WATER (0=DID NOT OBS, 1=OBS) CODE
84110	POND OBSERVATION ASSESS WATER (0=DID NOT, 1=DID) CODE
84111	LITHOLOGIC MODIFIER CODE
84113	WELL INTAKE FINISH CODE
84114	WELL CASING MATERIAL CODE
84115	TYPE OF MATERIAL FROM WHICH OPENING IS MADE CODE
84116	DRILLING FLUID CODE
84117	TYPE OF SURFACE SEAL CODE
84118	METHOD OF DEVELOPMENT CODE
84120	PACKING MATERIAL CODE
84124	METHOD OF EVACUTAION CODE

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
84125	METHOD OF WATER-LEVEL MEASUREMENT CODE
84130	OUTFALL OBSERVATION, VISUAL, Y=YES N=NO CODE
84131	SAMPLING METHOD, CONFIDENCE CODE (A,B,C,D) CODE
84132	STREAMBANK, VEGETATIVE STABILITY RATING CODE
84133	STREAMBANK, STABILITY (BANK EROSION) RATING CODE
84134	PARTICLES, DEGREE SURROUNDED BY FINE SEDIMENT, CODE
84135	STREAMSIDE, (SHORELINE) COVER RATING CODE
84136	CANOPY TYPE CODE
84137	CHANNEL STABILITY RATING CODE (E,G,F,P) CODE
84138	COLIFORM, TOTAL, WATER, WHOLE, MPN, PRES=1, ABSNT=2, CODE
84139	ENTEROBACTER AGGLOMERANS, WTR, MF, PRES=1, ABSNT=2, CODE
84140	KLEBSIELLA PNEUMONIAE, WTR, WH, MF, PRES=1, ABSNT=2, CODE
84143	WELL, PURGING CONDITION CODE
84144	WELL, SELECTION CRITERIA CODE
84145	PROJECT COMPONENT CODE
84146	LAND USE, PREDOMINANT, WITHIN 100 FT OF WELL, CODE
84147	LAND USE, PREDOMINANT, 1/4 MI.RADIUS OF WELL, CODE
84148	LAND USE, PREDMNT., FRAC., WITHIN 1/4 MI OF WELL, CODE
84149	LAND USE, CHANGE, LAST 10 YRS, WITHIN 1/4MI WELL, CODE
84150	HABITAT QUALITY INDEX RATING CODE
84151	AQUATIC LIFE, USE CLASSES CODE
84152	STREAM, STAGE CLASS CODE
84153	STREAMBANKS, GRAZING DAMAGE CODE
84154	CHANNEL, MAJOR ALTERATIONS CODE
84155	RIFFLE/RUNS, OCCURRENCE CODE
84156	POOL, DESCRIPTION CODE
84157	SANDBARS, LARGE, OCCURRENCE CODE
84158	LAND USE, NEAR STREAM, PREDOMINANT CODE
84159	STREAM,COVER (INSTREAM SHELTER FOR ADULT FISH), CODE

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
84160	STREAM, DEGRADATION RATING CODE
84161	STREAM, ORDER CODE
84162	LAND RESOURCE AREA CODE
84163	FLOW, STREAM, CLASSIFICATION CODE
84165	DISCHARGE EVENT OBSERVATION, YES=1 NO=0, CODE
84166	STORM HYDROGRAPH, DIRECTION, (RISE,FALL), CODE
84167	MICROSCOPIC EXAMINATION CODE
84168	AVIAN SPECIES ALPHA CODE (BIRDS)
84169	MAMMALIAN ALPHA SPECIES CODE
84170	ALPHA AGE TEXT CODE
84200	LATITUDE/LONGITUDE COORDINATES OF WELL, METHOD CODE
84201	NATIONAL REFERENCE DATUM, ALTITUDE(VERTICAL) CODE
84202	ALTITUDE METHOD CODE
85000	STREAM MILE, ACTUAL MILES
85014	HABITAT, 1970 ACRES THIS TYPE FOR THIS STATION
85015	HAB., ESTIMATED ACRES THIS TYPE THIS STATION
85016	HAB., ESTIMATED ACRES THIS TYPE THIS STA. BY 1990
85017	HAB., ESTIMATED ACRES THIS TYPE THIS STA. BY 2000
85018	TYPE CODES: 1=CLEAR CUT/2=SELECT CUT/3=RNGE DEVLP
85019	ACRES, NO. ALTERED FROM 1965-1970 (0-5 YEARS OLD)
85020	ACRES, NO. ALTERED 1960-1965 (5-10 YEARS OLD)
85021	ACRES, NO. ALTERED 1955-1960 (10-15 YEARS OLD)
85022	ACRES, NO. ALTERED 1950-1955 (15-20 YEARS OLD)
85023	ACRES, NO. ALTERED BEFORE 1950 (20+ YEARS OLD)
85024	ACRES,PREDICTED YRLY.AVE.TO BE ALTERED IN FUTURE
85025	LANDOWNERS, CODES FOR ALL IN STATE OF OREGON
85026	ACRES, CURRENT OWNED THIS LANDOWNER THIS STATION
85027	ACRES, ESTIMATED OWNED BY L-O THIS STA. BY 1980
85028	ACRES, ESTIMATED OWNED BY L-O THIS STA. BY 1990

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
85029	ACRES, ESTIMATED OWNED BY L-O THIS STA. BY 2000
85030	LAND USES, CODES FOR ALL IN STATE OF OREGON
85031	ACRES, CURRENT DEDICATED TO THIS USE THIS STATION
85032	ACRES, ESTM. DEDICTD TO THIS USE THIS STA BY 1980
85033	ACRES, ESTM. DEDICTD TO THIS USE THIS STA BY 1990
85034	ACRES, ESTM. DEDICTD TO THIS USE BY YR.2000 --STA.
85035	HAB., INDICATED ANIMAL USES THIS TYPE IN WINTER
85036	HAB., INDICATED ANIMAL USES THIS TYPE IN SPRING
85037	HAB., INDICATED ANIMAL USES THIS TYPE IN SUMMER
85038	HAB., INDICATED ANIMAL USES THIS TYPE IN FALL
85039	HAB., INDICATED ANML USES THIS TYPE FOR WINTERING
85040	HAB., INDICATED ANML USES THIS TYPE FOR FEEDING
85041	HAB., INDICATED ANML USES TYPE FOR REARING YOUNG
85042	HAB., INDICATED BIRD USES THIS TYPE FOR NESTING
85043	HAB., INDICATED ANML USES THIS TYPE FOR SHELTER
85044	HAB., INDICATED ANML USES THIS TYPE FOR REST AREA
85045	ANML, SHOWS PRESENCE/ABSNC OF COMMENTS ON THIS ANML
85046	HAB.,ACRES OCCUPIED BY THIS ANML THIS UNIT & CO.
85050	ANIMALS ARE NOT PRESENT THIS STATION
85051	ANIMALS, ONLY A FEW ARE PRESENT THIS STATION
85052	ANIMALS COMMONLY SEEN; USE MODERATE THIS STATION
85053	ANIMALS FREQUENTLY SEEN; USE HEAVY THIS STATION
85070	OWNERSHIP (.1) AND ACCESS (.2) BY YEAR
85071	PRIVATE OWNERSHIP AND ACCESS MILEAGE
85072	FEDERAL OWNERSHIP AND ACCESS MILEAGE
85073	STATE OWNERSHIP AND ACCESS MILEAGE
85074	COUNTY OWNERSHIP AND ACCESS MILEAGE
85075	CITY OWNERSHIP AND ACCESS MILEAGE
85076	WATER YEAR DATA REFERS TO

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
85077	CALENDAR YEAR DATA REFERS TO
85088	MONTHS POLLUTION IS A PROBLEM JAN THRU JUNE
85089	MONTHS POLLUTION IS A PROBLEM JULY TO DECEMBER
85090	MAN-CAUSED CHANNEL CHANGE IN MILES
85091	STREAM BANK HABITAT DESTROYED IN MILES
85092	STREAMBED SILTED IN MILES
85093	TURBIDITY PROBLEM IN MILES
85094	SEVERITY: 1=ELIMINATES 2=INTERFERES 3=NO PROBLEM
85095	DURATION OF TURBIDITY PROBLEM IN MONTHS
85096	SEASON OF NATURAL DRY CHANNEL 1=SP 2=SU 3=F 4=W
85097	NATURAL DRY CHANNEL IN MILES
85098	MAN-CAUSED DRY CHANNEL SEASON 1=SP 2=SU 3=F 4=W
85099	MAN-CAUSED DRY CHANNEL IN MILES
85100	YEAR BARRIER IS PRESENT
85101	NUMBER OF NATURAL BARRIERS
85102	MILES BLOCKED BY NATURAL BARRIERS
85103	NUMBER OF NATURAL BARRIERS TO BE REMOVED
85104	NUMBER OF DAMS AND MAN CAUSED OBSTRUCTIONS
85105	MILES BLOCKED BY DAMS OR MAN CAUSED OBSTRUCTIONS
85106	NUMBER OF DAMS TO BE ALTERED
85107	MILES OF STREAM OCCUPIED BY IMPOUNDMENT
85108	LOWER END OF SECTION COVERED BY THIS FORM
85109	UPPER END OF SECTION COVERED BY THIS FORM
85110	LOWER LIMIT THIS SPECIES THIS FORM BY RIVER MILE
85111	UPPER LIMIT THIS SPECIES THIS FORM BY RIVER MILE
85112	STREAM SURVEY:1=COMPLETE 2=INCOMPLETE 3=NONE
85113	ABUNDANCE: 1=FSHWY/TAG&R 2=SURVEY 3=EST PLUS 4=EST
85114	ABUNDANCE: N=S&ST 1=ABUNDANT 4=SCARCE RGH FSH 3=SCARCE
85116	SQUARE YARDS OF SPAWNING AREA IN 1970

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
85117	SQUARE YARDS OF SPAWNING AREA IN 1980
85118	SQUARE YARDS OF SPAWNING AREA IN 1990
85119	SQUARE YARDS OF SPAWNING AREA IN 2000
85120	MILES OF REARING AREA IN 1970
85121	MILES OF REARING AREA IN 1980
85122	MILES OF REARING AREA IN 1990
85123	MILES OF REARING AREA IN 2000
85124	CATCH BY SPORT ANGLING IN 1970
85125	RECREATION DAYS SPENT ANGLING IN 1970
85126	RECREATION DAYS SPENT ANGLING IN 1980
85127	RECREATION DAYS SPENT ANGLING IN 1990
85128	RECREATION DAYS SPENT ANGLING IN 2000
85129	CONTRIBUTION TO COMMERCIAL CATCH IN 1970
85130	PERCENT OF TOTAL FISHING DONE FROM BOAT IN 1970
85131	PERCENT OF TOTAL FISHING DONE FROM BANK IN 1970
85132	PERCENT OF TOTAL FISHING DONE WITH LURE IN 1970
85133	PERCENT OF TOTAL FISHING DONE WITH BAIT IN 1970
85134	PERCENT OF TOTAL FISHING DONE WITH A FLY IN 1970
85146	YEAR THIS FACTOR HAS A LIMITING EFFECT
85157	MAN DAYS OF WATER SKIING
85158	SEVERITY: 1=INTERFERES 2=NO INTER. 3=NO ACTIVITY
85159	MAN DAYS OF BOATING OTHER THAN ANGLING
85160	SEVERITY: 1=INTERFERES 2=NO INTER. 3=NO ACTIVITY
85161	MAN DAYS OF SWIMMING
85162	SEVERITY: 1=INTERFERES 2=NO INTER. 3=NO ACTIVITY
85163	SEVERITY: 1=INTERFERES 2=NO INTER. 3=NOT PRESENT
85165	NUMBER OF MONTHS SUSPENDED SOLIDS ARE A PROBLEM
85167	NUMBER OF MONTHS PLANKTON IS A PROBLEM
85168	1=ELIMINATE PROD 2=REDUCE 3=NO INTER. 4=NOT PRES

STORET Code	Description of STORET Parameters Not Suitable for Statistical Analysis
85169	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85170	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85171	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85172	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85173	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85174	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85175	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85176	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85177	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85178	1=ELIMINATE PROD 2=UNDESIRABLE 3=REDUCE 4=NO PROB
85179	YEAR THIS NUMBER OF FACILITIES PRESENT
85180	NUMBER OF BOAT RAMPS
85181	NUMBER OF MOORAGES
85182	NUMBER OF PICNIC AREAS
85183	NUMBER OF CAMP AREAS
85184	NUMBER OF RESORTS
85185	YEAR THIS ZONED AREA PRESENT
85186	ACRES SET ASIDE FOR OTHER BOATING
85187	ACRES SET ASIDE FOR WATER SKIING
85188	MILES OF SHORE LOST TO ACCESS BY HOME SITES
85189	TOTAL MILES OF SHORELINE
85193	WILL RECR BE INC BY RELEASE OF FINGERL 0=NO 1=YES
85195	CATCH AND RECREATION ESTIMATE 1=BEST 4=POOREST
85333	PRECIPITATION-SAMPLE COLLECTION TIME-CODE- NES
85538	GAMMA SCAN DATE (YR,MO,DAY)
85539	DATE OF REPORT (YR,MO,DAY)
85658	TIME NIGHT CO2 HR
85661	TIME, INTERVAL DAY CO2 HR

Appendix F

National EPA Water Quality Criteria Summary[1]

The following table presents the national water quality criteria that were used to assess water quality data on a station-by-station basis and within the entire study area. Criteria are, for the most part, maximum values (except for dissolved oxygen, pH, and as noted). Criteria exist in any of four categories: Fresh Acute, Drinking Water, Marine Acute, and Other. Acute criteria are the highest 1-hour average concentrations which should not result in unacceptable impacts to aquatic organisms in either fresh or marine waters, respectively. The Drinking Water criteria are intended for human consumption; while the Other criteria represents National Park Service or other concerns. Parameters are listed in ascending order by STORET code. It is important to note that similar parameters often have non-consecutive codes. Consequently, scanning the entire list is necessary to obtain the criteria for all parameters of a particular type (eg. lead, copper, etc.). Refer to the Parameter Period of Record Tabulation to obtain the STORET code for any parameter measured in the park.

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
	00070				50[l]	TURBIDITY, JACKSON CANDLE UNITS	JTU	Physical
	00076				50[l]	TURBIDITY, HACH TURBIDIMETER, FORMAZIN TUR. UNITS	FTU	Physical
14808798	00154		250[s]			SULFATE (AS S) WHOLE WATER	MG/L	General Inorganic
7782447	00299				4.0[u]	OXYGEN, DISSOLVED, ANALYSIS BY PROBE	MG/L	Dissolved Oxygen
7782447	00300				4.0[u]	OXYGEN, DISSOLVED	MG/L	Dissolved Oxygen
	00400				≤6.5, ≥9.0[#]	PH	SU	Physical
	00403				≤6.5, ≥9.0[#]	PH, LAB	SU	Physical
	00406				≤6.5, ≥9.0[#]	PH, FIELD	SU	Physical

[1]Sources: (1) U.S. Environmental Protection Agency, Quality Criteria for Water 1995, Final Draft; (2) U.S. Environmental Protection Agency, 40 CFR 141 - National Primary Drinking Water Regulations, and 40 CFR 143 - National Secondary Drinking Water Regulations, July 1, 1994; and (3) Others as Noted in Footnotes.

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
471341	00409				<200[=]	ALKALINITY, TOTAL, LOW LEVEL GRAN ANALYSIS	UEQ/L	General Inorganic
17778880	00613		1			NITRITE NITROGEN, DISSOLVED AS N	MG/L	Nitrogen
17778880	00615		1			NITRITE NITROGEN, TOTAL AS N	MG/L	Nitrogen
17778880	00618		10			NITRATE NITROGEN, DISSOLVED AS N	MG/L	Nitrogen
17778880	00620		10			NITRATE NITROGEN, TOTAL AS N	MG/L	Nitrogen
17778880	00628		10			NITRITE + NITRATE, SUSPENDED AS N	MG/L	Nitrogen
17778880	00630		10			NITRITE PLUS NITRATE, TOTAL 1 DET.	MG/L	Nitrogen
17778880	00631		10			NITRITE PLUS NITRATE, DISSOLVED 1 DET.	MG/L	Nitrogen
57125	00718	22	200	1.0		CYANIDE, WEAK ACID, DISSOCIABLE, WATER, WHOLE	UG/L	General Inorganic
57125	00719	22	200	1.0		CYANIDE, FREE,IN WATER&WASTEWATERS, HBG METHOD	UG/L	General Inorganic
57125	00720	0.022	0.2	0.001		CYANIDE, TOTAL	MG/L	General Inorganic
57125	00722	0.022	0.2	0.001		CYANIDE, FREE (AMENABLE TO CHLORINATION)	MG/L	General Inorganic
57125	00723	22	200	1.0		CYANIDE, DISSOLVED STD METHOD	UG/L	General Inorganic
57125	00724	22	200	1.0		CYANIDE COMPLEXED TO A RANGE OF COMPNDS, WATER	UG/L	General Inorganic
16887006	00940	860	250[s]			CHLORIDE,TOTAL IN WATER	MG/L	General Inorganic
16887006	00941	860	250[s]			CHLORIDE, DISSOLVED IN WATER	MG/L	General Inorganic
14808798	00945		250[s]			SULFATE, TOTAL (AS SO4)	MG/L	General Inorganic
14808798	00946		250[s]			SULFATE, DISSOLVED (AS SO4)	MG/L	General Inorganic
1332214	00948		7000000			ASBESTOS, WHOLE SAMPLE	CNT/L	General Inorganic
16984488	00950		4.0			FLUORIDE, DISSOLVED AS F	MG/L	General Inorganic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
16984488	00951		4.0			FLUORIDE, TOTAL AS F	MG/L	General Inorganic
7782414	00953		4000			FLUORINE, TOTAL	UG/L	General Inorganic
7440382	00978	360	50	69		ARSENIC, TOTAL RECOVERABLE IN WATER AS AS	UG/L	Metal
7782492	00981	20	50	300		SELENIUM,TOTAL RECOVERABLE IN WATER AS SE	UG/L	Metal
7440280	00982	1400*	2.0	2130*		THALLIUM, TOTAL RECOVERABLE IN WATER AS TL	UG/L	Metal
7782492	00990	20	50	300		SELENITE, TOTAL RECOVERABLE INORGANIC	UG/L	Metal
7440382	00991	360	50	69		ARSENIC, TOTAL RECOVERABLE TRIVALENT INORGANIC	UG/L	Metal
7440382	00995	360	50	69		ARSENIC, INORGANIC DISS	UG/L	Metal
7440382	00996	360	50	69		ARSENIC, INORGANIC SUSP	UG/L	Metal
7440382	00997	360	50	69		ARSENIC, INORGANIC TOT	UG/L	Metal
7440417	00998	130*	4.0			BERYLLIUM,TOTAL RECOVERABLE IN WATER AS BE	UG/L	Metal
7440382	01000	360	50	69		ARSENIC, DISSOLVED	UG/L	Metal
7440382	01001	360	50	69		ARSENIC, SUSPENDED	UG/L	Metal
7440382	01002	360	50	69		ARSENIC, TOTAL	UG/L	Metal
7440393	01005		2000			BARIUM, DISSOLVED	UG/L	Metal
7440393	01006		2000			BARIUM, SUSPENDED	UG/L	Metal
7440393	01007		2000			BARIUM, TOTAL	UG/L	Metal
7440393	01009		2000			BARIUM,TOTAL RECOVERABLE IN WATER AS BA	UG/L	Metal
7440417	01010	130*	4.0			BERYLLIUM, DISSOLVED	UG/L	Metal
7440417	01011	130*	4.0			BERYLLIUM, SUSPENDED	UG/L	Metal

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7440417	01012	130*	4.0			BERYLLIUM, TOTAL	UG/L	Metal
7440439	01025	3.9+	5.0	43		CADMIUM, DISSOLVED	UG/L	Metal
7440439	01026	3.9+	5.0	43		CADMIUM, SUSPENDED	UG/L	Metal
7440439	01027	3.9+	5.0	43		CADMIUM, TOTAL	UG/L	Metal
7440473	01030		100			CHROMIUM, DISSOLVED	UG/L	Metal
7440473	01031		100			CHROMIUM, SUSPENDED	UG/L	Metal
7440473	01032	16	100	1100		CHROMIUM, HEXAVALENT	UG/L	Metal
16065831	01033	1700+	100	10300*		CHROMIUM, TRI-VAL	UG/L	Metal
7440473	01034		100			CHROMIUM, TOTAL	UG/L	Metal
7440508	01040	18+	1300[a]	2.9		COPPER, DISSOLVED	UG/L	Metal
7440508	01041	18+	1300[a]	2.9		COPPER, SUSPENDED	UG/L	Metal
7440508	01042	18+	1300[a]	2.9		COPPER, TOTAL	UG/L	Metal
7439921	01049	82+	15[a]	220		LEAD, DISSOLVED	UG/L	Metal
7439921	01050	82+	15[a]	220		LEAD, SUSPENDED	UG/L	Metal
7439921	01051	82+	15[a]	220		LEAD, TOTAL	UG/L	Metal
7440280	01057	1400*	2.0	2130*		THALLIUM, DISSOLVED	UG/L	Metal
7440280	01058	1400*	2.0	2130*		THALLIUM, SUSPENDED	UG/L	Metal
7440280	01059	1400*	2.0	2130*		THALLIUM, TOTAL	UG/L	Metal
7440020	01065	1400+	100	75		NICKEL, DISSOLVED	UG/L	Metal
7440020	01066	1400+	100	75		NICKEL, SUSPENDED	UG/L	Metal

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7440020	01067	1400[+]	100	75		NICKEL, TOTAL	UG/L	Metal
7440020	01074	1400[+]	100	75		NICKEL, TOTAL RECOVERABLE IN WATER AS NI	UG/L	Metal
7440224	01075	4.1[+]	100[s]	0.12		SILVER, DISSOLVED	UG/L	Metal
7440224	01076	4.1[+]	100[s]	0.12		SILVER, SUSPENDED	UG/L	Metal
7440224	01077	4.1[+]	100[s]	0.12		SILVER, TOTAL	UG/L	Metal
7440224	01079	4.1[+]	100[s]	0.12		SILVER, TOTAL RECOVERABLE IN WATER AS AG	UG/L	Metal
7440508	01089	0.018[+]	1.3[a]	0.0029		COPPER AS SUSPENDED BLACK OXIDE IN WATER	MG/L	General Inorganic
7440666	01090	120[+]	5000[s]	95		ZINC, DISSOLVED	UG/L	Metal
7440666	01091	120[+]	5000[s]	95		ZINC, SUSPENDED	UG/L	Metal
7440666	01092	120[+]	5000[s]	95		ZINC, TOTAL	UG/L	Metal
7440666	01094	120[+]	5000[s]	95		ZINC, TOTAL RECOVERABLE IN WATER AS ZN	UG/L	Metal
7440360	01095	88[p]	6.0	1500[p]		ANTIMONY, DISSOLVED	UG/L	Metal
7440360	01096	88[p]	6.0	1500[p]		ANTIMONY, SUSPENDED	UG/L	Metal
7440360	01097	88[p]	6.0	1500[p]		ANTIMONY, TOTAL	UG/L	Metal
7440439	01113	3.9[+]	5.0	43		CADMIUM,TOTAL RECOVERABLE IN WATER AS CD	UG/L	Metal
7439921	01114	82[+]	15[a]	220		LEAD, TOTAL RECOVERABLE IN WATER AS PB	UG/L	Metal
7440473	01118		100			CHROMIUM TOTAL RECOVERABLE IN WATER AS CR	UG/L	Metal
7440508	01119	18[+]	1300[a]	2.9		COPPER, TOTAL RECOVERABLE IN WATER AS CU	UG/L	Metal
7440280	01124	1400[*]	2.0	2130[*]		THALLIUM, ACID SOLUBLE, WATER, WHOLE	UG/L	Metal
7440280	01128	1400[*]	2.0	2130[*]		THALLIUM, TOTAL RECOVERABLE <95%	UG/L	Metal

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7782492	01145	20	50	300		SELENIUM, DISSOLVED	UG/L	Metal
7782492	01146	20	50	300		SELENIUM, SUSPENDED	UG/L	Metal
7782492	01147	20	50	300		SELENIUM, TOTAL	UG/L	Metal
7782492	01167	20	50	300		SELENIUM, ACID SOLUBLE, WATER, WHOLE	UG/L	Metal
18540299	01220	16	100	1100		CHROMIUM, HEXAVALENT, DISSOLVED	UG/L	Metal
7440360	01268	88[p]	6.0	1500[p]		ANTIMONY (SB), WATER, TOTAL RECOVERABLE	UG/L	Metal
57125	01291	22	200	1.0		CYANIDE, FILTERABLE, TOTAL IN WATER	UG/L	General Inorganic
7440666	01303	0.120[+]	5.0[s]	0.095		ZINC, POTENTIALLY DISSOLVED WATER	MG/L	Metal
7440224	01304	0.0041[+]	0.1[s]	0.00012		SILVER, POTENTIALLY DISSOLVED WATER	MG/L	Metal
7440508	01306	0.018[+]	1.3[a]	0.0029		COPPER, POTENTIALLY DISSOLVED WATER	MG/L	Metal
18540299	01307	0.016	0.1	1.1		CHROMIUM, HEXAVALENT, POTENTIALLY DISSOLVED	MG/L	Metal
7440382	01309	0.36	0.05	0.069		ARSENIC, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7440393	01311		2.0			BARIUM, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7440417	01312	0.13[*]	0.004			BERYLLIUM, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7440439	01313	0.0039[+]	0.005	0.043		CADMIUM, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
16065831	01314	1.7[+]	0.1	10.3[*]		CHROMIUM, TRIVALENT, POTENTIALLY DISSOLVED	MG/L	Metal
7439921	01318	0.082[+]	0.015[a]	0.220		LEAD, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7439976	01321	0.0024	0.002	0.0021		MERCURY, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7440020	01322	1.4[+]	0.1	0.075		NICKEL, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7782492	01323	0.020	0.050	0.300		SELENIUM, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal

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7440280	01324	1.4[*]	0.002	2.13[*]		THALLIUM, POTENTIALLY, DISSOLVED, WATER	MG/L	Metal
7440611	01326		0.020[c]			URANIUM, POTENTIALLY DISSOLVED, WATER	MG/L	Metal
7440224	01523	4.1[+]	100[s]	0.12		SILVER, IONIC	UG/L	Metal
50328	03648		0.2			BENZO (A) PYRENE, LIQUID FRACTION, ELUTRIATE	UG/L	General Organic
122349	04035		4.0			SIMAZINE, DISSOLVED, WATER, TOTAL RECOVERABLE	UG/L	Pesticide
10028178	04124		20[r]			TRITIUM, TOTAL, WATER	PC/ML	Radiological
10028178	07000		20000[r]			TRITIUM, TOTAL	PC/L	Radiological
10028178	07005		20000[r]			TRITIUM, DISSOLVED	PC/L	Radiological
10028178	07010		20000[r]			TRITIUM, SUSPENDED	PC/L	Radiological
	09501		5.0			RADIUM 226, TOTAL	PC/L	Radiological
	09503		5.0			RADIUM 226, DISSOLVED	PC/L	Radiological
	09505		5.0			RADIUM 226, SUSPENDED	PC/L	Radiological
	11500		5.0			RADIUM 226 + RADIUM 228, DISSOLVED	PC/L	Radiological
	11501		5.0			RADIUM 228, TOTAL	PC/L	Radiological
	11503		5.0			RADIUM 226 + RADIUM 228, TOTAL	PC/L	Radiological
10098972	13501		8.0[r]			STRONTIUM 90, TOTAL	PC/L	Radiological
10098972	13503		8.0[r]			STRONTIUM 90, DISSOLVED	PC/L	Radiological
10098972	13505		8.0[r]			STRONTIUM 90, SUSPENDED	PC/L	Radiological
7782492	22675	20	50	300		SELENIUM, DISSOLVED ORGANIC	UG/L	Metal
7782492	22676	20	50	300		SELENIUM, HEXAVALENT, DISSOLVED	UG/L	Metal

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7782492	22677	20	50	300		SELENIUM, TETRAVALENT, DISSOLVED	UG/L	Metal
7440382	22678	360	50	69		ARSENIC, DISSOLVED ORGANIC	UG/L	Metal
7440382	22679	850[*]	50	2319[*]		ARSENIC, PENTAVALENT,DISSOLVED	UG/L	Metal
7440382	22680	360	50	69		ARSENIC, TRIVALENT, DISSOLVED	UG/L	Metal
7440611	22703		20[c]			URANIUM, NATURAL DISSOLVED	UG/L	Metal
7440611	22705		20[c]			URANIUM, NATURAL SUSPENDED	UG/L	Metal
7440611	22706		20[c]			URANIUM, TOTAL AS U308	UG/L	Metal
7440611	22708		0.020[c]			URANIUM, NATURAL, TOTAL	MG/L	Radiological
7440611	28011		20[c]			URANIUM, NATURAL, TOTAL	UG/L	Radiological
88857	30191		7.0			DINOSEB, WATER, WHOLE RECOVERABLE	UG/L	Pesticide
75990	30200		200			DALAPON, WATER, WHOLE RECOVERABLE	UG/L	Pesticide
106934	30203		0.05			ETHANE, 1,2-DIBROMO-, WATER, WHOLE, RECOVERABLE	UG/L	Pesticide
	31501		1.0[n]		1000[b]	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED.	CFU/100ML	Bacteriological
	31503		1.0[n]		1000[b]	COLIFORM, TOTAL, MEMBRANE FILTER, DELAY. M-ENDO	CFU/100ML	Bacteriological
	31504		1.0[n]		1000[b]	COLIFORM, TOTAL, MEMBRANE FILTER, IMMED. LES-ENDO	CFU/100ML	Bacteriological
	31505		1.0[n]		1000[b]	COLIFORM, TOTAL, MPN, CONF. TEST 35C (TUBE 31506)	MPN/100ML	Bacteriological
	31506		1.0[n]		1000[b]	COLIFORM, TOTAL, MPN, CONF. TEST, TUBE CONFIG	MPN/100ML	Bacteriological
	31507		1.0[n]		1000[b]	COLIFORM, TOTAL, MPN, COMP. TEST 35C (TUBE 31508)	MPN/100ML	Bacteriological
	31508		1.0[n]		1000[b]	COLIFORM, TOTAL, MPN, COMP. TEST, TUBE CONFIG	MPN/100ML	Bacteriological
	31613				200[^]	FECAL COLIFORM, MEMBRANE FILTER, AGAR	CFU/100ML	Bacteriological

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
	31614				200^	FECAL COLIFORM, MPN, TUBE CONFIGURATION	MPN/100ML	Bacteriological
	31615				200^	FECAL COLIFORM, MPN, EC MED, 44.5C (TUBE 31614)	MPN/100ML	Bacteriological
	31616				200^	FECAL COLIFORM, MEMBRANE FILTER, BROTH, 44.5C	CFU/100ML	Bacteriological
	31617				200^	FECAL COLIFORM, MPN, EIJKMAN, 44.5C (TUBE 31618)	MPN/100ML	Bacteriological
	31625				200^	FECAL COLIFORM, MF, M-FC, 0.7 UM	CFU/100ML	Bacteriological
	31648				126^	E. COLI, MTEC, MF	CFU/100ML	Bacteriological
	31649				33^	ENTEROCOCCI, ME, MF	CFU/100ML	Bacteriological
67663	32003	28900*	100t			CARBON CHLOROFORM AND CARBON ALCOHOL EXTRS.,TOTAL	UG/L	General Organic
67663	32005	28900*	100t			CARBON CHLOROFORM EXTRACTABLES	UG/L	General Organic
67663	32021	28900*	100t			CARBON CHLOROFORM EXTRACTS, ETHER INSOLUBLES OF	UG/L	General Organic
67663	32022	28900*	100t			CARBON CHLOROFORM EXTRACTS, WATER SOLUBLES OF	UG/L	General Organic
75274	32101		100t			BROMODICHLOROMETHANE, WHOLE WATER	UG/L	General Organic
56235	32102	35200*	5.0	50000*		CARBON TETRACHLORIDE, WHOLE WATER	UG/L	General Organic
107062	32103	118000*	5.0	113000*		1,2-DICHLOROETHANE,WHOLE WATER	UG/L	General Organic
75252	32104		100t			BROMOFORM, WHOLE WATER	UG/L	General Organic
124481	32105		100t			DIBROMOCHLOROMETHANE, WHOLE WATER	UG/L	General Organic
67663	32106	28900*	100t			CHLOROFORM, WHOLE WATER	UG/L	General Organic
56235	32260	35.2*	0.005	50*		CARBON TETRACHLORIDE EXTRACTABLES	MG/L	General Organic
67663	32270	28.9*	0.1t			CHLOROFORM EXTRACTABLES TOTAL	MG/L	General Organic
108883	34010	17500*	1000	6300*		TOLUENE IN WTR SMPLE GC-MS, HEXADECONE EXTR.	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
1330207	34020		10000			XYLENES IN WTR SMPLE GC-MS, HEXADECONE EXTR.	UG/L	General Organic
83329	34205	1700*		970*		ACENAPHTHENE, TOTAL	UG/L	General Organic
83329	34206	1700*		970*		ACENAPHTHENE, DISSOLVED	UG/L	General Organic
83329	34207	1700*		970*		ACENAPHTHENE, SUSPENDED	UG/L	General Organic
107028	34210	68*		55*		ACROLEIN, TOTAL	UG/L	Pesticide
107028	34211	68*		55*		ACROLEIN, DISSOLVED	UG/L	Pesticide
107028	34212	68*		55*		ACROLEIN, SUSPENDED	UG/L	Pesticide
107131	34215	7550*				ACRYLONITRILE, TOTAL	UG/L	General Organic
107131	34216	7550*				ACRYLONITRILE, DISSOLVED	UG/L	General Organic
107131	34217	7550*				ACRYLONITRILE, SUSPENDED	UG/L	General Organic
71432	34235	5300*	5.0	5100*		BENZENE, DISSOLVED	UG/L	General Organic
71432	34236	5300*	5.0	5100*		BENZENE, SUSPENDED	UG/L	General Organic
92875	34239	2500*				BENZIDINE, DISSOLVED	UG/L	General Organic
92875	34240	2500*				BENZIDINE, SUSPENDED	UG/L	General Organic
58899	34265	2.0	0.2	0.16		R-BHC (LINDANE) GAMMA, DISSOLVED	UG/L	Pesticide
58899	34266	2.0	0.2	0.16		R-BHC (LINDANE) GAMMA, SUSPENDED	UG/L	Pesticide
75252	34288		100[t]			BROMOFORM, DISSOLVED	UG/L	General Organic
75252	34289		100[t]			BROMOFORM, SUSPENDED	UG/L	General Organic
56235	34297	35200*	5.0	50000*		CARBON TETRACHLORIDE, DISSOLVED	UG/L	General Organic
56235	34298	35200*	5.0	50000*		CARBON TETRACHLORIDE, SUSPENDED	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
108907	34301		100			CHLOROBENZENE, TOTAL	UG/L	General Organic
108907	34302		100			CHLOROBENZENE, DISSOLVED	UG/L	General Organic
108907	34303		100			CHLOROBENZENE, SUSPENDED	UG/L	General Organic
124481	34306		100[t]			CHLORODIBROMOMETHANE, TOTAL	UG/L	General Organic
124481	34307		100[t]			CHLORODIBROMOMETHANE, DISSOLVED	UG/L	General Organic
124481	34308		100[t]			CHLORODIBROMOMETHANE, SUSPENDED	UG/L	General Organic
67663	34316	28900[*]	100[t]			CHLOROFORM, DISSOLVED	UG/L	General Organic
67663	34317	28900[*]	100[t]			CHLOROFORM, SUSPENDED	UG/L	General Organic
57125	34325	0.022	0.2	0.001		CYANIDE, SUSPENDED	MG/L	General Inorganic
75274	34328		100[t]			DICHLOROBROMOMETHANE, DISSOLVED	UG/L	General Organic
75274	34329		100[t]			DICHLOROBROMOMETHANE, SUSPENDED	UG/L	General Organic
122667	34346	270[*]				1,2-DIPHENYLHYDRAZINE, TOTAL	UG/L	General Organic
122667	34347	270[*]				1,2-DIPHENYLHYDRAZINE, DISSOLVED	UG/L	General Organic
122667	34348	270[*]				1,2-DIPHENYLHYDRAZINE, SUSPENDED	UG/L	General Organic
33213659	34356	0.22		0.034		ENDOSULFAN, BETA, TOTAL	UG/L	Pesticide
33213659	34357	0.22		0.034		ENDOSULFAN, BETA, DISSOLVED	UG/L	Pesticide
33213659	34358	0.22		0.034		ENDOSULFAN, BETA, SUSPENDED	UG/L	Pesticide
959988	34361	0.22		0.034		ENDOSULFAN, ALPHA, TOTAL	UG/L	Pesticide
959988	34362	0.22		0.034		ENDOSULFAN, ALPHA, DISSOLVED	UG/L	Pesticide
959988	34363	0.22		0.034		ENDOSULFAN, ALPHA, SUSPENDED	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
100414	34371	32000*	700	430*		ETHYLBENZENE, TOTAL	UG/L	General Organic
100414	34372	32000*	700	430*		ETHYLBENZENE, DISSOLVED	UG/L	General Organic
100414	34373	32000*	700	430*		ETHYLBENZENE, SUSPENDED	UG/L	General Organic
206440	34376	3980*		40*		FLUORANTHENE, TOTAL	UG/L	General Organic
206440	34377	3980*		40*		FLUORANTHENE, DISSOLVED	UG/L	General Organic
206440	34378	3980*		40*		FLUORANTHENE, SUSPENDED	UG/L	General Organic
77474	34386	7.0*	50	7.0*		HEXACHLOROCYCLOPENTADIENE, TOTAL	UG/L	General Organic
77474	34387	7.0*	50	7.0*		HEXACHLOROCYCLOPENTADIENE, DISSOLVED	UG/L	General Organic
77474	34388	7.0*	50	7.0*		HEXACHLOROCYCLOPENTADIENE, SUSPENDED	UG/L	General Organic
87683	34391	90*		32*		HEXACHLOROBUTADIENE, TOTAL	UG/L	General Organic
87683	34392	90*		32*		HEXACHLOROBUTADIENE, DISSOLVED	UG/L	General Organic
87683	34393	90*		32*		HEXACHLOROBUTADIENE, SUSPENDED	UG/L	General Organic
67721	34396	980*		940*		HEXACHLOROETHANE, TOTAL	UG/L	General Organic
67721	34397	980*		940*		HEXACHLOROETHANE, DISSOLVED	UG/L	General Organic
67721	34398	980*		940*		HEXACHLOROETHANE, SUSPENDED	UG/L	General Organic
118741	34401	6.0[p]	1.0			HEXACHLOROBENZENE, DISSOLVED	UG/L	General Organic
118741	34402	6.0[p]	1.0			HEXACHLOROBENZENE, SUSPENDED	UG/L	General Organic
193395	34403		0.40[c]			INDENO (1,2,3-CD) PYRENE, TOTAL	UG/L	General Organic
193395	34404		0.40[c]			INDENO (1,2,3-CD) PYRENE, DISSOLVED	UG/L	General Organic
193395	34405		0.40[c]			INDENO (1,2,3-CD) PYRENE, SUSPENDED	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
78591	34408	117000*		12900*		ISOPHORONE, TOTAL	UG/L	Pesticide
78591	34409	117000*		12900*		ISOPHORONE, DISSOLVED	UG/L	Pesticide
78591	34410	117000*		12900*		ISOPHORONE, SUSPENDED	UG/L	Pesticide
75092	34423		5.0			METHYLENE CHLORIDE, TOTAL	UG/L	General Organic
75092	34424		5.0			METHYLENE CHLORIDE, DISSOLVED	UG/L	General Organic
75092	34425		5.0			METHYLENE CHLORIDE, SUSPENDED	UG/L	General Organic
91203	34443	2300*		2350*		NAPHTHALENE, DISSOLVED	UG/L	General Organic
91203	34444	2300*		2350*		NAPHTHALENE, SUSPENDED	UG/L	General Organic
98953	34447	27000*		6680*		NITROBENZENE, TOTAL	UG/L	General Organic
98953	34448	27000*		6680*		NITROBENZENE, DISSOLVED	UG/L	General Organic
98953	34449	27000*		6680*		NITROBENZENE, SUSPENDED	UG/L	General Organic
59507	34452	30*				PARACHLOROMETA CRESOL, TOTAL	UG/L	General Organic
59507	34453	30*				PARACHLOROMETA CRESOL, DISSOLVED	UG/L	General Organic
59507	34454	30*				PARACHLOROMETA CRESOL, SUSPENDED	UG/L	General Organic
87865	34459	20***	1.0	13		PCP (PENTACHLOROPHENOL), DISSOLVED	UG/L	Pesticide
87865	34460	20***	1.0	13		PCP (PENTACHLOROPHENOL), SUSPENDED	UG/L	Pesticide
85018	34461	30p		7.7p		PHENANTHRENE, TOTAL	UG/L	General Organic
85018	34462	30p		7.7p		PHENANTHRENE, DISSOLVED	UG/L	General Organic
85018	34463	30p		7.7p		PHENANTHRENE, SUSPENDED	UG/L	General Organic
108952	34466	10200*		5800*		PHENOL, DISSOLVED	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
108952	34467	10200*		5800*		PHENOL, SUSPENDED	UG/L	General Organic
127184	34475	5280*	5.0	10200*		TETRACHLOROETHYLENE, TOTAL	UG/L	General Organic
127184	34476	5280*	5.0	10200*		TETRACHLOROETHYLENE, DISSOLVED	UG/L	General Organic
127184	34477	5280*	5.0	10200*		TETRACHLOROETHYLENE, SUSPENDED	UG/L	General Organic
108883	34481	17500*	1000	6300*		TOLUENE, DISSOLVED	UG/L	General Organic
108883	34482	17500*	1000	6300*		TOLUENE, SUSPENDED	UG/L	General Organic
79016	34485	45000*	5.0	2000*		TRICHLOROETHYLENE, DISSOLVED	UG/L	General Organic
79016	34486	45000*	5.0	2000*		TRICHLOROETHYLENE, SUSPENDED	UG/L	General Organic
75014	34493		2.0			VINYL CHLORIDE, DISSOLVED	UG/L	General Organic
75014	34494		2.0			VINYL CHLORIDE, SUSPENDED	UG/L	General Organic
75354	34501		7.0			1,1-DICHLOROETHYLENE, TOTAL	UG/L	General Organic
75354	34502		7.0			1,1-DICHLOROETHYLENE, DISSOLVED	UG/L	General Organic
75354	34503		7.0			1,1-DICHLOROETHYLENE, SUSPENDED	UG/L	General Organic
71556	34506		200	31200*		1,1,1-TRICHLOROETHANE, TOTAL	UG/L	General Organic
71556	34507		200	31200*		1,1,1-TRICHLOROETHANE, DISSOLVED	UG/L	General Organic
71556	34508		200	31200*		1,1,1-TRICHLOROETHANE, SUSPENDED	UG/L	General Organic
79005	34511		5.0			1,1,2-TRICHLOROETHANE, TOTAL	UG/L	General Organic
79005	34512		5.0			1,1,2-TRICHLOROETHANE, DISSOLVED	UG/L	General Organic
79005	34513		5.0			1,1,2-TRICHLOROETHANE, SUSPENDED	UG/L	General Organic
79345	34516			9020*		1,1,2,2-TETRACHLOROETHANE, TOTAL	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
79345	34517			9020*		1,1,2,2-TETRACHLOROETHANE, DISSOLVED	UG/L	General Organic
79345	34518			9020*		1,1,2,2-TETRACHLOROETHANE, SUSPENDED	UG/L	General Organic
107062	34531	118000*	5.0	113000*		1,2-DICHLOROETHANE, TOTAL	UG/L	General Organic
107062	34532	118000*	5.0	113000*		1,2-DICHLOROETHANE, DISSOLVED	UG/L	General Organic
107062	34533	118000*	5.0	113000*		1,2-DICHLOROETHANE, SUSPENDED	UG/L	General Organic
95501	34536		600			1,2-DICHLOROBENZENE, TOTAL	UG/L	General Organic
95501	34537		600			1,2-DICHLOROBENZENE, DISSOLVED	UG/L	General Organic
95501	34538		600			1,2-DICHLOROBENZENE, SUSPENDED	UG/L	General Organic
78875	34541		5.0			1,2-DICHLOROPROPANE, TOTAL	UG/L	General Organic
78875	34542		5.0			1,2-DICHLOROPROPANE, DISSOLVED	UG/L	General Organic
78875	34543		5.0			1,2-DICHLOROPROPANE, SUSPENDED	UG/L	General Organic
156605	34546		100			TRANS-1,2-DICHLOROETHENE, TOTAL, IN WATER	UG/L	General Organic
156605	34547		100			TRANS-1,2-DICHLOROETHENE, DISSOLVED	UG/L	General Organic
156605	34548		100			TRANS-1,2-DICHLOROETHENE, SUSPENDED	UG/L	General Organic
120821	34551		70			1,2,4-TRICHLOROBENZENE, TOTAL	UG/L	General Organic
120821	34552		70			1,2,4-TRICHLOROBENZENE, DISSOLVED	UG/L	General Organic
120821	34553		70			1,2,4-TRICHLOROBENZENE, SUSPENDED	UG/L	General Organic
541731	34566		600			1,3-DICHLOROBENZENE, TOTAL	UG/L	General Organic
541731	34567		600			1,3-DICHLOROBENZENE, DISSOLVED	UG/L	General Organic
541731	34568		600			1,3-DICHLOROBENZENE, SUSPENDED	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
106467	34571		75			1,4-DICHLOROBENZENE, TOTAL	UG/L	General Organic
106467	34572		75			1,4-DICHLOROBENZENE, DISSOLVED	UG/L	General Organic
106467	34573		75			1,4-DICHLOROBENZENE, SUSPENDED	UG/L	General Organic
95578	34586	4380*				2-CHLOROPHENOL, TOTAL	UG/L	General Organic
95578	34587	4380*				2-CHLOROPHENOL, DISSOLVED	UG/L	General Organic
95578	34588	4380*				2-CHLOROPHENOL, SUSPENDED	UG/L	General Organic
120832	34601	2020*				2,4-DICHLOROPHENOL, TOTAL	UG/L	General Organic
120832	34602	2020*				2,4-DICHLOROPHENOL, DISSOLVED	UG/L	General Organic
120832	34603	2020*				2,4-DICHLOROPHENOL, SUSPENDED	UG/L	General Organic
105679	34606	2120*				2,4-DIMETHYLPHENOL, TOTAL	UG/L	General Organic
105679	34607	2120*				2,4-DIMETHYLPHENOL, DISSOLVED	UG/L	General Organic
105679	34608	2120*				2,4-DIMETHYLPHENOL, SUSPENDED	UG/L	General Organic
121142	34611	330*		590*		2,4-DINITROTOLUENE, TOTAL	UG/L	General Organic
121142	34612	330*		590*		2,4-DINITROTOLUENE, DISSOLVED	UG/L	General Organic
121142	34613	330*		590*		2,4-DINITROTOLUENE, SUSPENDED	UG/L	General Organic
72548	34651	0.6*		3.6*		P,P'-DDD, DISSOLVED	UG/L	Pesticide
72548	34652	0.6*		3.6*		P,P'-DDD, SUSPENDED	UG/L	Pesticide
72559	34653	1050*		14*		P,P'-DDE, DISSOLVED	UG/L	Pesticide
72559	34654	1050*		14*		P,P'-DDE, SUSPENDED	UG/L	Pesticide
50293	34655	1.1		0.13		P,P'-DDT, DISSOLVED	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
50293	34656	1.1		0.13		P,P'-DDT, SUSPENDED	UG/L	Pesticide
1746016	34675	0.01*	0.00003			2,3,7,8-TETRACHLORODIBENZO-P-DIOXIN(TCDD), TOT	UG/L	General Organic
1746016	34676	0.01*	0.00003			2,3,7,8-TETRACHLORODIBENZO-P-DIOXIN(TCDD), DISS	UG/L	General Organic
1746016	34677	0.01*	0.00003			2,3,7,8-TETRACHLORODIBENZO-P-DIOXIN(TCDD), SUSP	UG/L	General Organic
108952	34694	10200*		5800*		PHENOL (C6H5OH) - SINGLE COMPOUND, TOTAL	UG/L	General Organic
91203	34696	2300*		2350*		NAPHTHALENE, TOTAL	UG/L	General Organic
75990	38432		200			DALAPON, WATER, TOTAL	UG/L	Pesticide
75990	38433		200			DALAPON, WATER, DISSOLVED	UG/L	Pesticide
75990	38434		200			DALAPON, WATER, SUSPENDED	UG/L	Pesticide
96128	38437		0.2			DIBROMOCHLOROPROPANE, WATER, TOTAL	UG/L	Pesticide
96128	38438		0.2			DIBROMOCHLOROPROPANE, WATER, DISSOLVED	UG/L	Pesticide
96128	38439		0.2			DIBROMOCHLOROPROPANE WATER, SUSPENDED	UG/L	Pesticide
96128	38760		0.2			DBCP, WATER, TOTAL	UG/L	Pesticide
96128	38761		0.2			DBCP, WATER, DISSOLVED	UG/L	Pesticide
96128	38762		0.2			DBCP, WATER, SUSPENDED	UG/L	Pesticide
88857	38779		7.0			DINOSEB, DISSOLVED	UG/L	Pesticide
88857	38780		7.0			DINOSEB, SUSPENDED	UG/L	Pesticide
23135220	38865		200			OXAMYL, TOTAL	UG/L	Pesticide
23135220	38866		200			OXAMYL, DISSOLVED	UG/L	Pesticide
23135220	38867		200			OXAMYL, SUSPENDED	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
145733	38926		100			ENDOTHALL, WHOLE WATER SAMPLE	UG/L	Pesticide
2921882	38932	0.083		0.011		CHLORPYRIFOS, TOTAL RECOVERABLE	UG/L	Pesticide
2921882	38933	0.083		0.011		CHLORPYRIFOS, DISSOLVED	UG/L	Pesticide
2163806	38935		50			MONOSODIUM METHANEARSONATE (MSMA)	UG/L	Pesticide
2921882	39012	0.083		0.011		DURSBAN, FLAME PHOTOMETRIC, WATER SAMPLE	UG/L	Pesticide
56382	39015	0.065				ETHYLPARATHION, FLAME IONIFATION, WATER SAMPLE	UG/L	Pesticide
122349	39025		4.0			SIMAZINE, COULSON CONDUCTIVITY WATER SAMPLE	UG/L	Pesticide
87865	39032	20***	1.0	13		PCP (PENTACHLOROPHENOL) WHOLE WATER SAMPLE	UG/L	Pesticide
1912249	39033		3.0			ATRAZINE IN WHOLE WATER SAMPLE	UG/L	Pesticide
118741	39039	6.0p	1.0			HEXACHLOROBENZENE WATER SAMPLE, ELECTRON CPT	UG/L	Pesticide
93721	39045		50			2,4,5-TP INCLUDES ACIDS & SALTS WATER SAMPLE	UG/L	Pesticide
116063	39053		3.0			ALDICARB IN WHOLE WATER	UG/L	Pesticide
122349	39055		4.0			SIMAZINE IN WHOLE WATER	UG/L	Pesticide
117817	39100	2000*	6.0			BIS(2-ETHYLHEXYL) PHTHALATE, WHOLE WATER	UG/L	General Organic
117817	39103	2000*	6.0			BIS(2-ETHYLHEXYL) PHTHALATE, DISSOLVED	UG/L	General Organic
117817	39104	2000*	6.0			BIS(2-ETHYLHEXYL) PHTHALATE, SUSPENDED	UG/L	General Organic
	39117	0.94*		2.994*		PHTHLATE ESTERS IN WATER	MG/L	General Organic
75014	39175		2.0			VINYL CHLORIDE-WHOLE WATER SAMPLE	UG/L	General Organic
79016	39180	45000*	5.0	2000*		TRICHLOROETHYLENE-WHOLE WATER SAMPLE	UG/L	General Organic
50293	39300	1.1		0.13		P,P' DDT IN WHOLE WATER SAMPLE	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
72548	39310	0.6*		3.6*		P,P' DDD IN WHOLE WATER SAMPLE	UG/L	Pesticide
72559	39320	1050*		14*		P,P' DDE IN WHOLE WATER SAMPLE	UG/L	Pesticide
309002	39330	3.0		1.3		ALDRIN IN WHOLE WATER SAMPLE	UG/L	Pesticide
309002	39331	3.0		1.3		ALDRIN IN FILT. FRAC. OF WAT. SAMP.	UG/L	Pesticide
309002	39332	3.0		1.3		ALDRIN IN SUSP. FRAC. OF WAT. SAMP.	UG/L	Pesticide
58899	39340	2.0	0.2	0.16		GAMMA-BHC(LINDANE), WHOLE WATER	UG/L	Pesticide
58899	39341	2.0	0.2	0.16		GAMMA-BHC(LINDANE), DISSOLVED	UG/L	Pesticide
58899	39342	2.0	0.2	0.16		GAMMA-BHC(LINDANE), SUSPENDED	UG/L	Pesticide
57749	39350	2.4	2.0	0.09		CHLORDANE(TECH MIX & METABS), WHOLE WATER	UG/L	Pesticide
57749	39352	2.4	2.0	0.09		CHLORDANE(TECH MIX & METABS), DISSOLVED	UG/L	Pesticide
57749	39353	2.4	2.0	0.09		CHLORDANE(TECH MIX & METABS), SUSPENDED	UG/L	Pesticide
72548	39360	0.6*		3.6*		DDD IN WHOLE WATER SAMPLE	UG/L	Pesticide
72548	39361	0.6*		3.6*		DDD IN FILT. FRAC. OF WATER SMAPLE	UG/L	Pesticide
72548	39362	0.6*		3.6*		DDD IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
72559	39365	1050*		14*		DDE IN WHOLE WATER SAMPLE	UG/L	Pesticide
72559	39366	1050*		14*		DDE IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
72559	39367	1050*		14*		DDE IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
50293	39370	1.1		0.13		DDT IN WHOLE WATER SAMPLE	UG/L	Pesticide
50293	39371	1.1		0.13		DDT IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
50293	39372	1.1		0.13		DDT IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
60571	39380	2.5		0.71		DIELDRIN IN WHOLE WATER SAMPLE	UG/L	Pesticide
60571	39381	2.5		0.71		DIELDRIN IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
60571	39382	2.5		0.71		DIELDRIN IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
115297	39388	0.22		0.034		ENDOSULFAN IN WHOLE WATER SAMPLE	UG/L	Pesticide
72208	39390	0.18	2.0	0.037		ENDRIN IN WHOLE WATER SAMPLE	UG/L	Pesticide
72208	39391	0.18	2.0	0.037		ENDRIN IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
72208	39392	0.18	2.0	0.037		ENDRIN IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
8001352	39400	0.73	3.0	0.21		TOXAPHENE IN WHOLE WATER SAMPLE	UG/L	Pesticide
8001352	39401	0.73	3.0	0.21		TOXAPHENE IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
8001352	39402	0.73	3.0	0.21		TOXAPHENE IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
76448	39410	0.52	0.4	0.053		HEPTACHLOR IN WHOLE WATER SAMPLE	UG/L	Pesticide
76448	39411	0.52	0.4	0.053		HEPTACHLOR IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
76448	39412	0.52	0.4	0.053		HEPTACHLOR IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
1024573	39420	0.52	0.2	0.053		HEPTACHLOR EPOXIDE IN WHOLE WATER SAMPLE	UG/L	Pesticide
1024573	39421	0.52	0.2	0.053		HEPTACHLOR EPOXIDE IN FILT. FRAC. WATER SAMPLE	UG/L	Pesticide
1024573	39422	0.52	0.2	0.053		HEPTACHLOR EPOXIDE IN SUSP. FRAC. WATER SAMPLE	UG/L	Pesticide
72435	39478		40			METHOXYCHLOR IN WHOLE WATER DISSOLVED	UG/L	Pesticide
72435	39479		40			METHOXYCHLOR IN WHOLE WATER SUSPENDED	UG/L	Pesticide
72435	39480		40			METHOXYCHLOR IN WHOLE WATER SAMPLE	UG/L	Pesticide
56382	39540	0.065				PARATHION IN WHOLE WATER SAMPLE	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
56382	39542	0.065				PARATHION IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
56382	39543	0.065				PARATHION IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
1912249	39630		3.0			ATRAZINE(AATREX) IN WHOLE WATER SAMPLE	UG/L	Pesticide
1912249	39632		3.0			ATRAZINE DISSOLVED IN WATER	PPB	Pesticide
118741	39700	6.0[p]	1.0			HEXACHLOROBENZENE IN WHOLE WATER SAMPLE	UG/L	General Organic
87683	39702	90[*]		32[*]		HEXACHLOROBUTADIENE IN WHOLE WATER SAMPLE	UG/L	General Organic
1918021	39720		500			PICLORAM IN WHOLE WATER SAMPLE	UG/L	Pesticide
94757	39730		70			2,4-D IN WHOLE WATER SAMPLE	UG/L	Pesticide
94757	39732		70			2,4-D IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
94757	39733		70			2,4-D IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
93721	39760		50			SILVEX IN WHOLE WATER SAMPLE	UG/L	Pesticide
93721	39762		50			SILVEX IN FILT. FRAC. OF WATER SAMPLE	UG/L	Pesticide
93721	39763		50			SILVEX IN SUSP. FRAC. OF WATER SAMPLE	UG/L	Pesticide
58899	39782	2.0	0.2	0.16		LINDANE IN WHOLE WATER SAMPLE	UG/L	Pesticide
1071836	39941		700			ROUNDUP IN WHOLE WATER SAMPLE (GLYPHOSATE)	UG/L	Pesticide
7782505	45650	0.019		0.013		CHLORINE, IN ORGANIC COMPOUNDS, WATER, WHOLE	MG/L	General Inorganic
56382	46315	0.065				ETHYL PARATHION IN WHOLE WATER SAMPLE	UG/L	Pesticide
58899	46322	2.0	0.2	0.16		LINDANE PLUS ISOMERS IN WHOLE WATER SAMPLE	UG/L	Pesticide
76448	46326	0.52	0.4	0.053		HEPTACHLOR AND METABOLITES IN WHOLE H2O SAMPLE	UG/L	Pesticide
15972608	46342		2.0			ALACHLOR (LASSO), WATER, DISSOLVED	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7782505	46472	0.019		0.013		CHLORINE, TOTAL RESIDUAL, AVERAGE VALUE, WATER	MG/L	General Inorganic
7782505	46473	0.019		0.013		CHLORINE, FREE AVAILABLE, AVERAGE VALUE, WATER	MG/L	General Inorganic
57125	46479	22	200	1.0		CYANIDE, DISSOLVED, WATER	UG/L	General Inorganic
7440382	46551	360	50	69		ARSENIC, FIELD ACIDIFIED W/HNO3, LAB FILTERED	UG/L	Metal
7440393	46558		2000			BARIUM, FIELD ACIDIFIED W/HNO3-LAB FILT	UG/L	Metal
7440439	46559	3.9[+]	5.0	43		CADMIUM,FIELD ACIDIFIED-HNO3-LAB FILTER	UG/L	Metal
7440473	46560		100			CHROMIUM, FIELD ACIDIFIED-HNO3-LAB FILT.	UG/L	Metal
7440508	46562	18[+]	1300[a]	2.9		COPPER, FIELD ACIDIFIED-HNO3- LAB FILTER.	UG/L	Metal
7439921	46564	82[+]	15[a]	220		LEAD, FIELD ACIDIFIED-HNO3-LAB FILTERED	UG/L	Metal
7440224	46566	4.1[+]	100[s]	0.12		SILVER, FIELD ACIDIFIED-HNO3-LAB FILTER.	UG/L	Metal
7440666	46567	120[+]	5000[s]	95		ZINC, EXTRACTABLE, FIELD ACID W/HNO3,LAB FILTR	UG/L	Metal
56382	49011	0.065				UNKNOWNS AS PARATHION IN WHOLE WATER SAMPLE	UG/L	Pesticide
7782505	50058	0.019		0.013		CHLORINE DOSE	MG/L	General Inorganic
7782505	50060	0.019		0.013		CHLORINE, TOTAL RESIDUAL	MG/L	General Inorganic
7782505	50064	0.019		0.013		CHLORINE, FREE AVAILABLE	MG/L	General Inorganic
7782505	50066	0.019		0.013		CHLORINE, COMBINED AVAILABLE	MG/L	General Inorganic
7782505	50074	0.019		0.013		CHLORITE, WHOLE WATER	MG/L	General Inorganic
	61215				200[^]	FECAL COLIFORM, GENERAL #/100ML	#/100ML	Bacteriological
16887006	70352	860	250[s]			CHLORIDE, ORGANIC	MG/L	General Organic
14797558	71850		44			NITRATE NITROGEN, TOTAL (AS NO3)	MG/L	Nitrogen

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
14797558	71851		44			NITRATE NITROGEN, DISSOLVED (AS NO3)	MG/L	Nitrogen
14797650	71855		3.3			NITRITE NITROGEN, TOTAL (AS NO2)	MG/L	Nitrogen
14797650	71856		3.3			NITRITE NITROGEN, DISSOLVED (AS NO2)	MG/L	Nitrogen
7439976	71890	2.4	2.0	2.1		MERCURY, DISSOLVED	UG/L	Metal
7439976	71895	2.4	2.0	2.1		MERCURY, SUSPENDED	UG/L	Metal
7439976	71900	2.4	2.0	2.1		MERCURY, TOTAL	UG/L	Metal
7439976	71901	2.4	2.0	2.1		MERCURY,TOTAL RECOVERABLE IN WATER AS HG	UG/L	Metal
7440439	71946	3.9[+]	5.0	43		CADMIUM, EXTRACTABLE	UG/L	Metal
7440473	71947		100			CHROMIUM, EXTRACTABLE	UG/L	Metal
7439921	71949	82[+]	15[a]	220		LEAD, EXTRACTABLE	UG/L	Metal
7440666	71950	120[+]	5000[s]	95		ZINC, EXTRACTABLE	UG/L	Metal
7440508	71951	18[+]	1300[a]	2.9		COPPER, EXTRACTABLE	UG/L	Metal
1336363	76011	2000	500	10000		PCBS, SUSPENDED, WATER	NG/L	General Organic
1336363	76012	2000	500	10000		PCBS, TOTAL RECOVERABLE, WATER	NG/L	General Organic
156592	77093		70			CIS-1,2-DICHLOROETHYLENE, WHOLE WATER	UG/L	General Organic
100425	77128		100			STYRENE, WHOLE WATER	UG/L	General Organic
106489	77296			29700[*]		P-CHLOROPHENOL, WHOLE WATER	UG/L	General Organic
106934	77651		0.05			1,2-DIBROMOETHANE, WHOLE WATER	UG/L	General Organic
95954	77687	100[p]		240[p]		2,4,5-TRICHLOROPHENOL, WHOLE WATER	UG/L	General Organic
935955	77769			440[*]		2,3,5,6-TETRACHLOROPHENOL, WHOLE WATER	UG/L	General Organic

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
103231	77903		400			BIS (2-ETHYLHEXYL) ADIPATE, WHOLE WATER	UG/L	General Organic
18540299	78247	16	100	1100		CHROMIUM, HEXAVALENT, TOTAL RECOVERABLE	UG/L	Metal
57125	78248	22	200	1.0		CYANIDE, TOTAL RECOVERABLE, WATER, WHOLE	UG/L	Metal
	78456	11*		12*		HALOMETHANES, SUMMATION, WHOLE WATER	MG/L	General Organic
14808798	78462		250s			SULFATE, WATER, DISSOLVED AS S	MG/L	Metal
85007	78885		20			DIQUAT DIBROMIDE (REGLONE) WHOLE WATER SAMPLE	UG/L	Pesticide
7440611	80020		20c			URANIUM, DISS. BY EXTRACTION FLUOROMETRIC	UG/L	Radiological
16065831	80357	1700	100	10300*		CHROMIUM, TRIVALENT, DISSOLVED	UG/L	Metal
57125	81208	0.022	0.2	0.001		CYANIDE,FREE (NOT AMENABLE TO CHLORINATION)	MG/L	General Inorganic
608731	81283	100*		0.34*		BENZENEHEXACHLORIDE, WHOLE WATER	UG/L	Pesticide
88857	81287		7.0			DNBP(C10H12N2O5), WHOLE WATER SAMPLE	UG/L	Pesticide
26638197	81327	23000*	5.0	10300*		DICHLOROPROPANE, WHOLE WATER SAMPLE	UG/L	General Organic
25321226	81333	1120*		1970*		DICHLOROBENZENE ISOMER, WHOLE WATER SAMPLE	UG/L	General Organic
2921882	81403	0.083		0.011		DURSBAN (CHLOROPYRIFOS) WHOLE WATER SAMPLE	UG/L	Pesticide
1563662	81405		40			CARBOFURAN (EURADAN) WHOLE WATER SAMPLE	UG/L	Pesticide
76017	81501	7240*		390*		PENTACHLOROETHANE, WHOLE WATER SAMPLE	UG/L	General Organic
25321226	81524	1120*		1970*		DICHLOROBENZENE, WHOLE WATER SAMPLE	UG/L	General Organic
25322207	81549	9320*				TETRACHLOROETHANE, WHOLE WATER SAMPLE	UG/L	General Organic
26638197	81703	23*	0.005*	10.3*		DICHLOROPROPANE, WHOLE WATER SAMPLE	MG/L	General Organic
7440508	81750	18+	1300a	2.9		COPPER, INTERSTITIAL WATERFROM SEDIMENTS	UG/L	Metal

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
7440020	81752	1400[+]	100	75		NICKEL, INTERSTITIAL WATER FROM SEDIMENTS	UG/L	Metal
7440666	81754	120[+]	5000[s]	95		ZINC, INTERSTITIAL WATER FROM SEDIMENTS	UG/L	Metal
25323891	81853	18000[*]				TRICHLOROETHANE, WHOLE WATER SAMPLE	UG/L	General Organic
7439976	81931	2.4	2.0	2.1		MERCURY (HG) SUSPENDED FRACTION OF WATER	UG/G	Metal
7440666	81933	120[+]	5000[s]	95		ZINC (ZN) SUSPENDED FRACTION OF WATER	UG/G	Metal
7439921	81936	82[+]	15[a]	220		LEAD (PB) DISSOLVED CATIONIC SPECIES	UG/L	Metal
7440439	81937	3.9[+]	5.0	43		CADMIUM (CD) DISSOLVED CATIONIC SPECIES	UG/L	Metal
7440473	81938		100			CHROMIUM (CR) DISSOLVED CATIONIC SPECIES	UG/L	Metal
7440508	81939	18[+]	1300[a]	2.9		COPPER (CU) DISSOLVED CATIONIC SPECIES	UG/L	Metal
7440666	81940	120[+]	5000[s]	95		ZINC (ZN) DISSOLVED CATIONIC SPECIES	UG/L	Metal
7440473	81941		100			CHROMIUM (CR) DISSOLVED ANIONIC SPECIES	UG/L	Metal
7440508	81942	18[+]	1300[a]	2.9		COPPER (CU) DISSOLVED ANIONIC SPECIES	UG/L	Metal
7440666	81943	120[+]	5000[s]	95		ZINC (ZN) DISSOLVED ANIONIC SPECIES	UG/L	Metal
	82078				50[1]	TURBIDITY, FIELD	NTU	Physical
	82079				50[1]	TURBIDITY, LAB	NTU	Physical
88857	82226		7.0			2 SECONDARY BUTYL 4,6-DINITROPHENOL	UG/L	Pesticide
16887006	82295	860000	250000[s]			CHLORIDE DISSOLVED AS CL IN WATER	UG/L	General Inorganic
72435	82350		40			METHOXYCHLOR, DISSOLVED IN WATER	UG/L	Pesticide
72435	82351		40			METHOXYCHLOR, SUSPENDED IN WATER	UG/L	Pesticide
115297	82354	0.22		0.034		ENDOSULFAN, DISSOLVED IN WATER	UG/L	Pesticide

C.A.S. Number	STORET Code	FRESH ACUTE	DRINKING WATER	MARINE ACUTE	OTHER	PARAMETER DESCRIPTION	UNITS	CATEGORY
115297	82355	0.22		0.034		ENDOSULFAN, SUSPENDED IN WATER	UG/L	Pesticide
57125	82573	0.022	0.2	0.001		CYANIDE/CHLORINATION IN WATER	MG/L	General Inorganic
1646873	82586		4.0			ALDICARB SULFOXIDE, WATER, TOTAL RECOVERABLE	UG/L	General Organic
1646884	82587		2.0			ALDICARB SULFONE, WHOLE WATER, TOTAL RECOVERABLE	UG/L	General Organic
23135220	82613		200			OXAMYL, WHOLE WATER, TOTAL RECOVERABLE	UG/L	Pesticide
1563662	82615		40			CARBOFURAN, WHOLE WATER, TOTAL RECOVERABLE	UG/L	Pesticide
116063	82619		3.0			ALDICARB, WHOLE WATER, TOTAL RECOVERABLE	UG/L	Pesticide
33213659	82624	0.22		0.034		ENDOSULFAN, BETA, WH WATER, TOTAL RECOVERABLE	UG/L	Pesticide
96128	82625		0.2			DIBROMOCHLOROPROPANE, WATER, TOTAL RECOVERABLE	UG/L	Pesticide

Footnote Key:

[*]Insufficient Data to Develop Criteria. Value Presented is the L.O.E.L. - Lowest Observed Effect Level.
[+]Hardness Dependent Criteria (100 mg/L $CaCO_3$ Used).
[***]pH Dependent Criteria (7.8 pH Used).
[=]Rule of thumb criterion used by the NPS Air Quality Division for determining sensitivity to acid deposition.
[^]Freshwater bathing criterion, EPA geometric mean based on at least 5 samples equally spaced over a 30-day period; Enterococci marine water bathing criterion 35 CFU/100 ml.
[#]EPA freshwater aquatic life chronic criterion; marine criterion is ≤6.5, ≥8.5.
[!]Arizona state standard.
[a]EPA action level, 40 CFR 141.80.
[b]California and Florida state bathing water standards.
[c]A Compilation of Water Quality Goals, California Regional Water Quality Control Board Central Valley Region, Sacramento, California, September, 1991.
[n]Total coliform drinking water maximum contaminant level (1 cfu/100ml or 1 mpn/100ml) was not used in water quality criteria comparisons.
[p]Proposed Criterion.
[r]Average annual concentration assumed to produce a total body or organ dose of 4 mrem/year, 40 CFR 141.16.
[s]EPA National Secondary Drinking Water Regulation, 40 CFR 143.
[t]The maximum contaminant level for the sum of the concentrations of trihalomethanes is 100 µg/L, 40 CFR 141.12.
[u]Coldwater criterion one day minimum; warmwater criterion seven day mean minimum.

Appendix G

Inventory Data Evaluation and Analysis (IDEA)
Servicewide Inventory and Monitoring Program "Level I"
Parameter Groups

The following table provides the Servicewide Inventory and Monitoring Program's "Level I" water quality inventory parameter groups (National Park Service 1993). In order to determine the presence and/or absence of data for each of these parameter groups in the park, the parameter groups had to be defined by STORET parameter codes. This table provides the STORET codes and parameter descriptions for each parameter comprising one of the Servicewide Inventory and Monitoring Program's "Level I" water quality parameter groups. Additional parameters could have been incorporated into each group, but an effort was made to represent each group with the parameters deemed to most likely occur in STORET and parks. The Toxic Elements Parameter Group was defined as the EPA's Clean Water Act Section 304(a) Priority Toxic Pollutants (40 CFR 131.36). Parameters are listed in ascending order of STORET code within each parameter group. It is important to note that similar parameters often have non-consecutive codes. Consequently, scanning the entire list is necessary to find all the parameters of a particular type (eg. lead, copper, etc.). Refer to the Parameter Period of Record Tabulation to obtain the STORET code for any parameter measured in the park.

STORET Code	Water Temperature Parameter Group	C.A.S. Number
00010	TEMPERATURE, WATER (DEGREES CENTIGRADE)	-
00011	TEMPERATURE, WATER (DEGREES FAHRENHEIT)	-
STORET Code	**Flow Parameter Group[1]**	**C.A.S. Number**
00056	FLOW RATE, GALLONS/DAY	-
00058	FLOW RATE, GALLONS/MIN.	-
00059	FLOW RATE, INSTANTANEOUS, GALLONS/MINUTE	-
00060	FLOW, STREAM, MEAN DAILY CFS	-
00061	FLOW, STREAM, INSTANTANEOUS CFS	-
00065	STAGE, STREAM (FEET)	-
00067	TIDE STAGE CODE	-
00072	STAGE, STREAM (METERS)	-

[1]Tide stage is included in the Flow Parameter Group for coastal parks.

STORET Code	Clarity/Turbidity Parameter Group	C.A.S. Number
00070	TURBIDITY, (JACKSON CANDLE UNITS)	-
00075	TURBIDITY, HELLIGE (PPM AS SILICON DIOXIDE)	-
00076	TURBIDITY, HACH TURBIDIMETER (FORMAZIN TURB UNIT)	-
00077	TRANSPARENCY, SECCHI DISC (INCHES)	-
00078	TRANSPARENCY, SECCHI DISC (METERS)	-
00530	RESIDUE, TOTAL NONFILTRABLE (MG/L)	-
82078	TURBIDITY, FIELD NEPHELOMETRIC TURBIDITY UNITS NTU	-
82079	TURBIDITY, LAB NEPHELOMETRIC TURBIDITY UNITS, NTU	-

STORET Code	Conductivity Parameter Group	C.A.S. Number
00094	SPECIFIC CONDUCTANCE, FIELD (UMHOS/CM @ 25C)	-
00095	SPECIFIC CONDUCTANCE (UMHOS/CM @ 25C)	-
00096	SALINITY AT 25 DEGREES C (MG/ML)	-
00480	SALINITY - PARTS PER THOUSAND	-

STORET Code	Dissolved Oxygen Parameter Group	C.A.S. Number
00299	OXYGEN, DISSOLVED, ANALYSIS BY PROBE (MG/L)	7782447
00300	OXYGEN, DISSOLVED (MG/L)	7782447
00301	OXYGEN, DISSOLVED, PERCENT OF SATURATION	7782447
00389	OXYGEN, DISSOLVED, LAB ANAL. BY PROBE OF FIELD SAMPLE (MG/L)	7782447

STORET Code	pH Parameter Group	C.A.S. Number
00400	PH (STANDARD UNITS)	-
00403	PH, LAB (STANDARD UNITS)	-
00406	PH, FIELD (STANDARD UNITS)	-

STORET Code	Alkalinity Parameter Group	C.A.S. Number
00409	ALKALINITY, TOTAL, LOW LEVEL GRAN ANALYSIS (µEQ/L)	471341
00410	ALKALINITY, TOTAL (MG/L AS CACO3)	471341
00415	ALKALINITY, PHENOLPHTHALEIN (MG/L)	77098
00430	ALKALINITY, CARBONATE (MG/L AS CACO3)	471341
00435	ACIDITY, TOTAL (MG/L AS CACO3)	471341
00440	BICARBONATE ION (MG/L AS HCO3)	71523
00445	CARBONATE ION (MG/L AS CO3)	3812326
STORET Code	**Nitrate/Nitrogen Parameter Group**	**C.A.S. Number**
00600	NITROGEN, TOTAL (MG/L AS N)	17778880
00602	NITROGEN, DISSOLVED (MG/L AS N)	17778880
00605	NITROGEN, ORGANIC, TOTAL (MG/L AS N)	17778880
00607	NITROGEN, ORGANIC, DISSOLVED (MG/L AS N)	17778880
00608	NITROGEN, AMMONIA, DISSOLVED (MG/L AS N)	17778880
00610	NITROGEN, AMMONIA, TOTAL (MG/L AS N)	17778880
00612	AMMONIA, UNIONZED (MG/L AS N)	7664417
00618	NITRATE NITROGEN, DISSOLVED (MG/L AS N)	17778880
00620	NITRATE NITROGEN, TOTAL (MG/L AS N)	17778880
00623	NITROGEN, KJELDAHL, DISSOLVED (MG/L AS N)	17778880
00625	NITROGEN, KJELDAHL, TOTAL (MG/L AS N)	17778880
00630	NITRITE PLUS NITRATE, TOTAL 1 DET. (MG/L AS N)	17778880
00631	NITRITE PLUS NITRATE, DISSOLVED 1 DET. (MG/L AS N)	17778880
71845	NITROGEN, AMMONIA, TOTAL (MG/L AS NH4)	14798039
71846	NITROGEN, AMMONIA, DISSOLVED (MG/L AS NH4)	14798039
71850	NITRATE NITROGEN, TOTAL (MG/L AS NO3)	14797558
71851	NITRATE NITROGEN, DISSOLVED (MG/L AS NO3)	14797558
71855	NITRITE NITROGEN, TOTAL (MG/L AS NO2)	14797650
71856	NITRITE NITROGEN, DISSOLVED (MG/L AS NO2)	14797650

STORET Code	Phosphate/Phosphorus Parameter Group	C.A.S. Number
00650	PHOSPHATE, TOTAL (MG/L AS PO4)	14265442
00655	PHOSPHATE, POLY (MG/L AS PO4)	14265442
00660	PHOSPHATE, ORTHO (MG/L AS PO4)	14265442
00665	PHOSPHORUS, TOTAL (MG/L AS P)	7723140
00666	PHOSPHORUS, DISSOLVED (MG/L AS P)	7723140
00670	PHOSPHORUS, TOTAL ORGANIC (MG/L AS P)	7723140
00671	PHOSPHORUS, DISSOLVED ORTHOPHOSPHATE (MG/L AS P)	7723140
70505	PHOSPHORUS, TOTAL, COLORIMETRIC METHOD (MG/L AS P)	7723140
70507	PHOSPHORUS, IN TOTAL ORTHOPHOSPHATE (MG/L AS P)	7723140

STORET Code	Sulfates/Total Dissolved Solids/Hardness Parameter Group	C.A.S. Number
00900	HARDNESS, TOTAL (MG/L AS CACO3)	471341
00945	SULFATE, TOTAL (MG/L AS SO4)	14808798
00946	SULFATE, DISSOLVED (MG/L AS SO4)	14808798
70300	RESIDUE, TOTAL FILTRABLE (DRIED AT 180C), (MG/L)	-

STORET Code	Chlorophyll Parameter Group	C.A.S. Number
32209	CHLOROPHYLL A (UG/L) FLUOROMETRIC CORRECTED	479618
32210	CHLOROPHYLL A (UG/L) TRICHROMATIC UNCORRECTED	479618
32211	CHLOROPHYLL A (UG/L) SPECTROPHOTOMETRIC ACID METH.	479618
32217	CHLOROPHYLL A (UG/L) FLUOROMETRIC UNCORRECTED	479618
32223	CHLOROPHYLL A (MG/M2) SPECTROPHOTOMETRIC CORRECTED	479618
32228	CHLOROPHYLL A (MG/M2) PERIPHYTON SPECTRO.	479618
32229	CHLOROPHYLL A (MG/M2) FLUOR. CORRECTED, SUBSTRATER	479618
32230	CHLOROPHYLL A (MG/L)	479618

STORET Code	Bacteria Parameter Group	C.A.S. Number
00111	RATIO OF FECAL COLIFORM TO FECAL STREPTOCOCCI	-
31501	COLIFORM, TOT, MEMBRANE FILTER, IMMED., M-ENDO MED,35C	-
31503	COLIFORM, TOT, MEMBRANE FILTER, DELAY, M-ENDO MED, 35C	-
31504	COLIFORM, TOT, MEMBRANE FILTER, IMMED., LES-ENDO AGAR, 35C	-
31505	COLIFORM, TOT, MPN, CONFIRMED TEST,35C(TUBE 31506)	-
31506	COLIFORM, TOT, MPN, CONFIRMED TEST, TUBE CONFIG.	-
31507	COLIFORM, TOT, MPN, COMPLETED TEST,35C(TUBE 31508)	-
31508	COLIFORM, TOT, MPN, COMPLETED TEST, TUBE CONFIG.	-
31613	FECAL COLIFORM, MEMBR, FILTER,M-FC AGAR,44.5C,24HR	-
31614	FECAL COLIFORM, MPN, TUBE CONFIGURATION	-
31615	FECAL COLIFORM, MPN, EC MED, 44.5C (TUBE 31614)	-
31616	FECAL COLIFORM, MEMBR FILTER, M-FC BROTH, 44.5C	-
31617	FECAL COLIFORM, MPN,EIJKMAN TEST,44.5C(TUBE 31618)	-
31625	FECAL COLIFORM, MF, M-FC, 0.7 UM	-
31648	E. COLI - MTEC-MF	-
31649	ENTEROCOCCI- ME-MF	-
31673	FECAL STREPTOCOCCI, MBR FILT, KF AGAR, 35C, 48HR	-
31676	FECAL STREPTOCOCCI, MPN, KF BROTH, TUBE CONFIG.	-
31677	FECAL STREPTOCOCCI, MPN, AD-EVA, 35C (TUBE 31678)	-
31751	PLATE COUNT, TOTAL, TPC AGAR, 35C, 24 HRS	-
61214	FECAL STREPTOCOCCI, GENERAL #/100ML	-
61215	FECAL COLIFORM, GENERAL #/100ML	-
STORET Code	**Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants)**	**C.A.S. Number**
00718	CYANIDE, WEAK ACID, DISSOC. WATER, WHOLE (UG/L)	57125
00719	CYANIDE, FREE, IN WATER & WASTEWATERS, HBG (UG/L)	57125
00720	CYANIDE, TOTAL (MG/L AS CN)	57125
00722	CYANIDE, FREE (AMENABLE TO CHLORINATION) (MG/L)	57125

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
00723	CYANIDE, DISSOLVED STD METHOD (UG/L)	57125
00724	CYANIDE COMPLEXED TO A RANGE OF COMPNDS (UG/L)	57125
00969	CHRYSOTILE ASBESTOS FIBERS/LITER	1332214
00973	AMPHIBOLE ASBESTOS FIBERS/LITER	1332214
00976	AMBIGUOUS ASBESTOS FIBERS/LITER	1332214
00977	NON-AMPHIBOLE NON-CHRYSOTILE ASBESTOS FIBERS/LITER	1332214
00978	ARSENIC, TOTAL RECOVERABLE IN WATER AS AS	7440382
00981	SELENIUM, TOTAL RECOVERABLE IN WATER AS SE (UG/L)	7782492
00982	THALLIUM, TOTAL RECOVERABLE IN WATER AS (UG/L)	7440280
00990	SELENITE, TOTAL RECOVERABLE INORGANIC (UG/L)	7782492
00991	ARSENIC, TOTAL RECOVER. TRIVALENT INORGANIC (UG/L)	7440382
00995	ARSENIC, INORGANIC DISSOLVED (UG/L AS AS)	7440382
00996	ARSENIC, INORGANIC SUSPENDED (UG/L AS AS)	7440382
00997	ARSENIC, INORGANIC TOTAL (UG/L AS AS)	7440382
00998	BERYLLIUM, TOTAL RECOVERABLE IN WATER AS BE (UG/L)	7440417
01000	ARSENIC, DISSOLVED (UG/L AS AS)	7440382
01001	ARSENIC, SUSPENDED (UG/L AS AS)	7440382
01002	ARSENIC, TOTAL (UG/L AS AS)	7440382
01010	BERYLLIUM, DISSOLVED (UG/L AS BE)	7440417
01011	BERYLLIUM, SUSPENDED (UG/L AS BE)	7440417
01012	BERYLLIUM, TOTAL (UG/L AS BE)	7440417
01025	CADMIUM, DISSOLVED (UG/L AS CD)	7440439
01026	CADMIUM, SUSPENDED (UG/L AS CD)	7440439
01027	CADMIUM, TOTAL (UG/L AS CD)	7440439
01030	CHROMIUM, DISSOLVED (UG/L AS CR)	7440473
01031	CHROMIUM, SUSPENDED (UG/L AS CR)	7440473
01032	CHROMIUM, HEXAVALENT (UG/L AS CR)	7440473
01033	CHROMIUM, TRI-VAL (UG/L AS CR)	16065831
01034	CHROMIUM, TOTAL (UG/L AS CR)	7440473

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
01040	COPPER, DISSOLVED (UG/L AS CU)	7440508
01041	COPPER, SUSPENDED (UG/L AS CU)	7440508
01042	COPPER, TOTAL (UG/L AS CU)	7440508
01049	LEAD, DISSOLVED (UG/L AS PB)	7439921
01050	LEAD, SUSPENDED (UG/L AS PB)	7439921
01051	LEAD, TOTAL (UG/L AS PB)	7439921
01057	THALLIUM, DISSOLVED (UG/L AS TL)	7440280
01058	THALLIUM, SUSPENDED (UG/L AS TL)	7440280
01059	THALLIUM, TOTAL (UG/L AS TL)	7440280
01065	NICKEL, DISSOLVED (UG/L AS NI)	7440020
01066	NICKEL, SUSPENDED (UG/L AS NI)	7440020
01067	NICKEL, TOTAL (UG/L AS NI)	7440020
01074	NICKEL, TOTAL RECOVERABLE IN WATER AS NI (UG/L)	7440020
01075	SILVER, DISSOLVED (UG/L AS AG)	7440224
01076	SILVER, SUSPENDED (UG/L AS AG)	7440224
01077	SILVER, TOTAL (UG/L AS AG)	7440224
01079	SILVER, TOTAL RECOVERABLE IN WATER AS AG (UG/L)	7440224
01089	COPPER AS SUSPENDED BLACK OXIDE IN WATER (MG/L)	7440508
01090	ZINC, DISSOLVED (UG/L AS ZN)	7440666
01091	ZINC, SUSPENDED (UG/L ZN)	7440666
01092	ZINC, TOTAL (UG/L AS ZN)	7440666
01094	ZINC, TOTAL RECOVERABLE IN WATER AS ZN (UG/L)	7440666
01095	ANTIMONY, DISSOLVED (UG/L AS SB)	7440360
01096	ANTIMONY, SUSPENDED (UG/L AS SB)	7440360
01097	ANTIMONY, TOTAL (UG/L AS SB)	7440360
01113	CADMIUM, TOTAL RECOVERABLE IN WATER AS CD (UG/L)	7440439
01114	LEAD, TOTAL RECOVERABLE IN WATER AS PB (UG/L)	7439921
01118	CHROMIUM, TOTAL RECOVERABLE IN WATER AS CR (UG/L)	7440473
01119	COPPER,TOTAL RECOVERABLE IN WATER AS CU (UG/L)	7440508

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
01124	THALLIUM, ACID SOLUBLE, WATER, WHOLE (UG/L)	7440280
01128	THALLIUM,TOTAL RECOVERABLE <95%, UG/L AS TL	7440280
01138	SELENIUM, IN WATER, LBS/DAY	7782492
01145	SELENIUM, DISSOLVED (UG/L AS SE)	7782492
01146	SELENIUM, SUSPENDED (UG/L AS SE)	7782492
01147	SELENIUM, TOTAL (UG/L AS SE)	7782492
01167	SELENIUM, ACID SOLUBLE, WATER, WHOLE (UG/L)	7782492
01220	CHROMIUM, HEXAVALENT, DISSOLVED IN (UG/L AS CR)	18540299
01252	ARSENIC, LB/DAY/CFS STREAM FLOW	7440382
01253	CADMIUM, LB/DAY/CFS STREAM FLOW	7440439
01254	CHROMIUM, TOTAL (LBS/DAY/CFS STREAM FLOW)	7740473
01255	CHROMIUM, HEXAVALENT, LB/DAY/CFS STREAM FLOW	18540299
01256	COPPER, LB/DAY/CFS STREAM FLOW	7440508
01257	CYANIDE LB/DAY/CFS STREAM FLOW	57125
01259	LEAD, LB/DAY/CFS STREAM FLOW	7439921
01260	MERCURY, LB/DAY/CFS STREAM FLOW	7439976
01261	NICKEL, LB/DAY/CFS STREAM FLOW	7440020
01263	SILVER, LB/DAY/CFS STREAM FLOW	7440224
01264	ZINC LB/DAY/CFS STREAM FLOW	7440666
01268	ANTIMONY, (SB), WATER, TOTAL RECOVERABLE (UG/L)	7440360
01291	CYANIDE, FILTERABLE, TOTAL IN WATER (UG/L)	57125
01303	ZINC, POTENTIALLY DISSOLVED WATER (MG/L)	7440666
01304	SILVER, POTENTIALLY DISSOLVED WATER (MG/L)	7440224
01306	COPPER, POTENTIALLY DISSOLVED WATER (MG/L)	7440508
01307	CHROMIUM, HEXAVALENT, POTENT. DISS. WATER (MG/L)	18540299
01309	ARSENIC, POTENTIALLY, DISSOLVED, WATER (MG/L)	7440382
01312	BERYLLIUM, POTENTIALLY, DISSOLVED, WATER (MG/L)	7440417
01313	CADMIUM, POTENTIALLY, DISSOLVED, WATER (MG/L)	7440439

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
01314	CHROMIUM, TRIVALENT, POTENT., DISS., WATER (MG/L)	16065831
01318	LEAD, POTENTIALLY, DISSOLVED, WATER (MG/L)	7439921
01321	MERCURY, POTENTIALLY, DISSOLVED, WATER (MG/L)	7439976
01322	NICKEL, POTENTIALLY, DISSOLVED, WATER (MG/L)	7440020
01323	SELENIUM, POTENTIALLY, DISSOLVED, WATER (MG/L)	7782492
01324	THALLIUM, POTENTIALLY, DISSOLVED, WATER (MG/L)	7440280
01523	SILVER, IONIC (UG/L)	7440224
22675	SELENIUM, DISSOLVED ORGANIC (UG/L)	7782492
22676	SELENIUM, HEXAVALENT, DISSOLVED (UG/L)	7782492
22677	SELENIUM, TETRAVALENT, DISSOLVED	7782492
22678	ARSENIC, DISSOLVED ORGANIC (UG/L)	7440382
22679	ARSENIC, PENTAVALENT, DISSOLVED (UG/L)	7440382
22680	ARSENIC, TRIVALENT, DISSOLVED (UG/L)	7440382
30197	2-CHLOROETHYLVINYL ETHER,WATER,WHL,RECOVER (UG/L)	110758
30201	CHLOROMETHANE, WATER, WHOLE, RECOVERABLE (UG/L)	74873
30202	BROMOMETHANE, WATER, WHOLE, RECOVERABLE (UG/L)	74839
32003	CARBON CHLOROFORM AND CARBON ALCOHOL EXT. (UG/L)	67663
32005	CARBON CHLOROFORM EXTRACTABLES (UG/L)	67663
32021	CARBON CHLOROFORM EXTRACTS, ETHER INSOLUBLE (UG/L)	67663
32022	CARBON CHLOROFORM EXTRACTS, WATER SOLUBLES (UG/L)	67663
32101	BROMODICHLOROMETHANE, WHOLE WATER (UG/L)	75274
32102	CARBON TETRACHLORIDE, WHOLE WATER, (UG/L)	56235
32103	1,2-DICHLOROETHANE, WHOLE WATER (UG/L)	107062
32104	BROMOFORM, WHOLE WATER, (UG/L)	75252
32105	DIBROMOCHLOROMETHANE, WHOLE WATER, (UG/L)	124481
32106	CHLOROFORM, WHOLE WATER (UG/L)	67663
32260	CARBON TETRACHLORIDE EXTRACTABLES (MG/L)	56235
32270	CHLOROFORM EXTRACTABLES TOTAL IN MG PER LITER	67663

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34010	TOLUENE IN WTR SMPLE GC-MS, HEXADECONE EXT. (UG/L)	108883
34030	BENZENE IN WTR SMPLE GC-MS, HEXADECONE EXT. (UG/L)	71432
34198	BHC-DELTA, WATER, WHOLE (LBS/DAY)	319868
34200	ACENAPHTHYLENE, TOTAL (UG/L)	208968
34201	ACENAPHTHYLENE, DISSOLVED (UG/L)	208968
34202	ACENAPHTHYLENE, SUSPENDED (UG/L)	208968
34205	ACENAPHTHENE, TOTAL (UG/L)	83329
34206	ACENAPHTHENE, DISSOLVED (UG/L)	83329
34207	ACENAPHTHENE, SUSPENDED (UG/L)	83329
34210	ACROLEIN, TOTAL (UG/L)	107028
34211	ACROLEIN, DISSOLVED (UG/L)	107028
34212	ACROLEIN, SUSPENDED (UG/L)	107028
34215	ACRYLONITRILE, TOTAL (UG/L)	107131
34216	ACRYLONITRILE, DISSOLVED (UG/L)	107131
34217	ACRYLONITRILE, SUSPENDED (UG/L)	107131
34220	ANTHRACENE, TOTAL (UG/L)	120127
34221	ANTHRACENE, DISSOLVED (UG/L)	120127
34222	ANTHRACENE, SUSPENDED (UG/L)	120127
34225	ASBESTOS (FIBROUS) TOTAL (UG/L)	1332214
34226	ASBESTOS (FIBROUS) DISSOLVED (UG/L)	1332214
34227	ASBESTOS (FIBROUS) SUSPENDED (UG/L)	1332214
34230	BENZO(B)FLUORANTHENE, WHOLE WATER (UG/L)	205992
34231	BENZO(B)FLUORANTHENE, DISSOLVED (UG/L)	205992
34232	BENZO(B)FLUORANTHENE, SUSPENDED (UG/L)	205992
34235	BENZENE, DISSOLVED (UG/L)	71432
34236	BENZENE, SUSPENDED (UG/L)	71432
34239	BENZIDINE, DISSOLVED (UG/L)	92875
34240	BENZIDINE, SUSPENDED (UG/L)	92875

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34242	BENZO(K)FLUORANTHENE, TOTAL (UG/L)	207089
34243	BENZO(K)FLUORANTHENE, DISSOLVED (UG/L)	207089
34244	BENZO(K)FLUORANTHENE, SUSPENDED (UG/L)	207089
34247	BENZO-A-PYRENE, TOTAL (UG/L)	50328
34248	BENZO-A-PYRENE, DISSOLVED (UG/L)	50328
34249	BENZO-A-PYRENE, SUSPENDED (UG/L)	50328
34253	A-BHC-ALPHA, DISSOLVED (UG/L)	319846
34254	A-BHC-ALPHA, SUSPENDED (UG/L)	319846
34255	B-BHC-BETA, DISSOLVED (UG/L)	319857
34256	B-BHC-BETA, SUSPENDED (UG/L)	319857
34259	DELTA BENZENE HEXACHLORIDE, TOTAL (UG/L)	319868
34260	DELTA BENZENE HEXACHLORIDE, DISSOLVED (UG/L)	319868
34261	DELTA BENZENE HEXACHLORIDE, SUSPENDED (UG/L)	319868
34265	R-BHC (LINDANE) GAMMA, DISSOLVED (UG/L)	58899
34266	R-BHC (LINDANE) GAMMA, SUSPENDED (UG/L)	58899
34273	BIS (2-CHLOROETHYL) ETHER, TOTAL (UG/L)	111444
34274	BIS (2-CHLOROETHYL) ETHER, DISSOLVED (UG/L)	111444
34275	BIS (2-CHLOROETHYL) ETHER, SUSPENDED (UG/L)	111444
34278	BIS (2-CHLOROETHOXY) METHANE, TOTAL (UG/L)	111911
34279	BIS (2-CHLOROETHOXY) METHANE, DISSOLVED (UG/L)	111911
34280	BIS (2-CHLOROETHOXY) METHANE, SUSPENDED (UG/L)	111911
34288	BROMOFORM, DISSOLVED (UG/L)	75252
34289	BROMOFORM, SUSPENDED (UG/L)	75252
34292	N-BUTYL BENZYL PHTHALATE, WHOLE WATER (UG/L)	85687
34293	N-BUTYL BENZYL PHTHALATE, DISSOLVED (UG/L)	85687
34294	N-BUTYL BENZYL PHTHALATE, SUSPENDED (UG/L)	85687
34297	CARBON TETRACHLORIDE, DISSOLVED (UG/L)	56235
34298	CARBON TETRACHLORIDE, SUSPENDED (UG/L)	56235

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34301	CHLOROBENZENE, TOTAL (UG/L)	108907
34302	CHLOROBENZENE, DISSOLVED (UG/L)	108907
34303	CHLOROBENZENE, SUSPENDED (UG/L)	108907
34306	CHLORODIBROMOMETHANE, TOTAL (UG/L)	124481
34307	CHLORODIBROMOMETHANE, DISSOLVED (UG/L)	124481
34308	CHLORODIBROMOMETHANE, SUSPENDED (UG/L)	124481
34311	CHLOROETHANE, TOTAL (UG/L)	75003
34312	CHLOROETHANE, DISSOLVED (UG/L)	75003
34313	CHLOROETHANE, SUSPENDED (UG/L)	75003
34316	CHLOROFORM, DISSOLVED (UG/L)	67663
34317	CHLOROFORM, SUSPENDED (UG/L)	67663
34320	CHRYSENE, TOTAL (UG/L)	218019
34321	CHRYSENE, DISSOLVED (UG/L)	218019
34322	CHRYSENE, SUSPENDED (UG/L)	218019
34325	CYANIDE, SUSPENDED (MG/L)	57125
34327	DI-N-BUTYL PHTHALATE, DISSOLVED (UG/L)	84742
34328	DICHLOROBROMOMETHANE, DISSOLVED (UG/L)	75274
34329	DICHLOROBROMOMETHANE, SUSPENDED (UG/L)	75274
34336	DIETHYL PHTHALATE, TOTAL (UG/L)	84662
34337	DIETHYL PHTHALATE, DISSOLVED (UG/L)	84662
34338	DIETHYL PHTHALATE, SUSPENDED (UG/L)	84662
34341	DIMETHYL PHTHALATE, TOTAL (UG/L)	131113
34342	DIMETHYL PHTHALATE, DISSOLVED (UG/L)	131113
34343	DIMETHYL PHTHALATE, SUSPENDED (UG/L)	131113
34346	1,2-DIPHENYLHYDRAZINE, TOTAL (UG/L)	122667
34347	1,2-DIPHENYLHYDRAZINE, DISSOLVED (UG/L)	122667
34348	1,2-DIPHENYLHYDRAZINE, SUSPENDED (UG/L)	122667
34351	ENDOSULFAN SULFATE, TOTAL (UG/L)	1031078

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34352	ENDOSULFAN SULFATE, DISSOLVED (UG/L)	1031078
34353	ENDOSULFAN SULFATE, SUSPENDED (UG/L)	1031078
34356	ENDOSULFAN, BETA, TOTAL (UG/L)	33213659
34357	ENDOSULFAN, BETA, DISSOLVED (UG/L)	33213659
34358	ENDOSULFAN, BETA, SUSPENDED (UG/L)	33213659
34361	ENDOSULFAN, ALPHA, TOTAL (UG/L)	959988
34362	ENDOSULFAN, ALPHA, DISSOLVED (UG/L)	959988
34363	ENDOSULFAN, ALPHA, SUSPENDED (UG/L)	959988
34371	ETHYLBENZENE, TOTAL (UG/L)	100414
34372	ETHYLBENZENE, DISSOLVED (UG/L)	100414
34373	ETHYLBENZENE, SUSPENDED (UG/L)	100414
34376	FLUORANTHENE, TOTAL (UG/L)	206440
34377	FLUORANTHENE, DISSOLVED (UG/L)	206440
34378	FLUORANTHENE, SUSPENDED (UG/L)	206440
34381	FLUORENE, TOTAL (UG/L)	86737
34382	FLUORENE, DISSOLVED (UG/L)	86737
34383	FLUORENE, SUSPENDED (UG/L)	86737
34386	HEXACHLOROCYCLOPENTADIENE, TOTAL (UG/L)	77474
34387	HEXACHLOROCYCLOPENTADIENE, DISSOLVED (UG/L)	77474
34388	HEXACHLOROCYCLOPENTADIENE, SUSPENDED (UG/L)	77474
34391	HEXACHLOROBUTADIENE, TOTAL (UG/L)	87683
34392	HEXACHLOROBUTADIENE, DISSOLVED (UG/L)	87683
34393	HEXACHLOROBUTADIENE, SUSPENDED (UG/L)	87683
34396	HEXACHLOROETHANE, TOTAL (UG/L)	67721
34397	HEXACHLOROETHANE, DISSOLVED (UG/L)	67721
34398	HEXACHLOROETHANE, SUSPENDED (UG/L)	67721
34401	HEXACHLOROBENZENE, DISSOLVED (UG/L)	118741
34402	HEXACHLOROBENZENE, SUSPENDED (UG/L)	118741

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34403	INDENO (1,2,3-CD) PYRENE, TOTAL (UG/L)	193395
34404	INDENO (1,2,3-CD) PYRENE, DISSOLVED (UG/L)	193395
34405	INDENO (1,2,3-CD) PYRENE, SUSPENDED (UG/L)	193395
34408	ISOPHORONE, TOTAL (UG/L)	78591
34409	ISOPHORONE, DISSOLVED (UG/L)	78591
34410	ISOPHORONE, SUSPENDED (UG/L)	78591
34413	METHYL BROMIDE, TOTAL (UG/L)	74839
34414	METHYL BROMIDE, DISSOLVED (UG/L)	74839
34415	METHYL BROMIDE, SUSPENDED (UG/L)	74839
34418	METHYL CHLORIDE, TOTAL (UG/L)	74873
34419	METHYL CHLORIDE, DISSOLVED (UG/L)	74873
34420	METHYL CHLORIDE, SUSPENDED (UG/L)	74873
34423	METHYLENE CHLORIDE, TOTAL (UG/L)	75092
34424	METHYLENE CHLORIDE, DISSOLVED (UG/L)	75092
34425	METHYLENE CHLORIDE, SUSPENDED (UG/L)	75092
34428	N-NITROSODI-N-PROPYLAMINE, TOTAL (UG/L)	621647
34429	N-NITROSODI-N-PROPYLAMINE, DISSOLVED (UG/L)	621647
34430	N-NITROSODI-N-PROPYLAMINE, SUSPENDED (UG/L)	621647
34433	N-NITROSODIPHENYLAMINE, TOTAL (UG/L)	86306
34434	N-NITROSODIPHENYLAMINE, DISSOLVED (UG/L)	86306
34435	N-NITROSODIPHENYLAMINE, SUSPENDED (UG/L)	86306
34438	N-NITROSODIMETHYLAMINE, TOTAL (UG/L)	62759
34439	N-NITROSODIMETHYLAMINE, DISSOLVED (UG/L)	62759
34440	N-NITROSODIMETHYLAMINE, SUSPENDED (UG/L)	62759
34443	NAPHTHALENE, DISSOLVED (UG/L)	91203
34444	NAPHTHALENE, SUSPENDED (UG/L)	91203
34447	NITROBENZENE, TOTAL (UG/L)	98953
34448	NITROBENZENE, DISSOLVED (UG/L)	98953

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34449	NITROBENZENE, SUSPENDED (UG/L)	98953
34452	PARACHLOROMETA CRESOL, TOTAL (UG/L)	59507
34453	PARACHLOROMETA CRESOL, DISSOLVED (UG/L)	59507
34454	PARACHLOROMETA CRESOL, SUSPENDED (UG/L)	59507
34457	PCB - 1242, DISSOLVED (UG/L)	53469219
34458	PCB - 1242, SUSPENDED (UG/L)	53469219
34459	PCP (PENTACHLOROPHENOL), DISSOLVED (UG/L)	87865
34460	PCP (PENTACHLOROPHENOL), SUSPENDED (UG/L)	87865
34461	PHENANTHRENE, TOTAL (UG/L)	85018
34462	PHENANTHRENE, DISSOLVED (UG/L)	85018
34463	PHENANTHRENE, SUSPENDED (UG/L)	85018
34466	PHENOL, DISSOLVED (UG/L)	108952
34467	PHENOL, SUSPENDED (UG/L)	108952
34469	PYRENE, TOTAL (UG/L)	129000
34470	PYRENE, DISSOLVED (UG/L)	129000
34471	PYRENE, SUSPENDED (UG/L)	129000
34475	TETRACHLOROETHYLENE, TOTAL (UG/L)	127184
34476	TETRACHLOROETHYLENE, DISSOLVED (UG/L)	127184
34477	TETRACHLOROETHYLENE, SUSPENDED (UG/L)	127184
34481	TOLUENE, DISSOLVED (UG/L)	108883
34482	TOLUENE, SUSPENDED (UG/L)	108883
34485	TRICHLOROETHYLENE, DISSOLVED (UG/L)	79016
34486	TRICHLOROETHYLENE, SUSPENDED (UG/L)	79016
34493	VINYL CHLORIDE, DISSOLVED (UG/L)	75014
34494	VINYL CHLORIDE, SUSPENDED (UG/L)	75014
34496	1,1-DICHLOROETHANE, TOTAL (UG/L)	75343
34497	1,1-DICHLOROETHANE, DISSOLVED (UG/L)	75343
34498	1,1-DICHLOROETHANE, SUSPENDED (UG/L)	75343

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34501	1,1-DICHLOROETHYLENE, TOTAL (UG/L)	75354
34502	1,1-DICHLOROETHYLENE, DISSOLVED (UG/L)	75354
34503	1,1-DICHLOROETHYLENE, SUSPENDED (UG/L)	75354
34506	1,1,1-TRICHLOROETHANE, TOTAL (UG/L)	71556
34507	1,1,1-TRICHLOROETHANE, DISSOLVED (UG/L)	71556
34508	1,1,1-TRICHLOROETHANE, SUSPENDED (UG/L)	71556
34511	1,1,2-TRICHLOROETHANE, TOTAL (UG/L)	79005
34512	1,1,2-TRICHLOROETHANE, DISSOLVED (UG/L)	79005
34513	1,1,2-TRICHLOROETHANE, SUSPENDED (UG/L)	79005
34516	1,1,2,2-TETRACHLOROETHANE, TOTAL (UG/L)	79345
34517	1,1,2,2-TETRACHLOROETHANE, DISSOLVED (UG/L)	79345
34518	1,1,2,2-TETRACHLOROETHANE, SUSPENDED (UG/L)	79345
34521	BENZO(GHI)PERYLENE1,12-BENZOPERYLENE, TOTAL (UG/L)	191242
34522	BENZO(GHI)PERYLENE1,12-BENZOPERYLENE, DISS. (UG/L)	191242
34523	BENZO(GHI)PERYLENE1,12-BENZOPERYLENE, SUSP. (UG/L)	191242
34526	BENZO(A)ANTHRACENE1,2-BENZANTHRACENE, TOTAL (UG/L)	56553
34527	BENZO(A)ANTHRACENE1,2-BENZANTHRACENE, DISS. (UG/L)	56553
34528	BENZO(A)ANTHRACENE1,2-BENZANTHRACENE, SUSP. (UG/L)	56553
34531	1,2-DICHLOROETHANE, TOTAL (UG/L)	107062
34532	1,2-DICHLOROETHANE, DISSOLVED (UG/L)	107062
34533	1,2-DICHLOROETHANE, SUSPENDED (UG/L)	107062
34536	1,2-DICHLOROBENZENE, TOTAL (UG/L)	95501
34537	1,2-DICHLOROBENZENE, DISSOLVED (UG/L)	95501
34538	1,2-DICHLOROBENZENE, SUSPENDED (UG/L)	95501
34541	1,2-DICHLOROPROPANE, TOTAL (UG/L)	78875
34542	1,2-DICHLOROPROPANE, DISSOLVED (UG/L)	78875
34543	1,2-DICHLOROPROPANE, SUSPENDED (UG/L)	78875
34546	TRANS-1,2-DICHLOROETHENE, TOTAL, IN WATER (UG/L)	156605

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34547	TRANS-1,2-DICHLOROETHENE, DISSOLVED (UG/L)	156605
34548	TRANS-1,2-DICHLOROETHENE, SUSPENDED (UG/L)	156605
34551	1,2,4-TRICHLOROBENZENE, TOTAL (UG/L)	120821
34552	1,2,4-TRICHLOROBENZENE, DISSOLVED (UG/L)	120821
34553	1,2,4-TRICHLOROBENZENE, SUSPENDED (UG/L)	120821
34556	1,2,5,6-DIBENZANTHRACENE, TOTAL (UG/L)	53703
34557	1,2,5,6-DIBENZANTHRACENE, DISSOLVED (UG/L)	53703
34558	1,2,5,6-DIBENZANTHRACENE, SUSPENDED (UG/L)	53703
34561	1,3-DICHLOROPROPENE, TOTAL (UG/L)	542756
34562	1,3-DICHLOROPROPENE, DISSOLVED (UG/L)	542756
34563	1,3-DICHLOROPROPENE, SUSPENDED (UG/L)	542756
34566	1,3-DICHLOROBENZENE, TOTAL (UG/L)	541731
34567	1,3-DICHLOROBENZENE, DISSOLVED (UG/L)	541731
34568	1,3-DICHLOROBENZENE, SUSPENDED (UG/L)	541731
34571	1,4-DICHLOROBENZENE, TOTAL (UG/L)	106467
34572	1,4-DICHLOROBENZENE, DISSOLVED (UG/L)	106467
34573	1,4-DICHLOROBENZENE, SUSPENDED (UG/L)	106467
34576	2-CHLOROETHYL VINYL ETHER, TOTAL (UG/L)	110758
34577	2-CHLOROETHYL VINYL ETHER, DISSOLVED (UG/L)	110758
34578	2-CHLOROETHYL VINYL ETHER, SUSPENDED (UG/L)	110758
34581	2-CHLORONAPHTHALENE, TOTAL (UG/L)	91587
34582	2-CHLORONAPHTHALENE, DISSOLVED (UG/L)	91587
34583	2-CHLORONAPHTHALENE, SUSPENDED (UG/L)	91587
34586	2-CHLOROPHENOL, TOTAL (UG/L)	95578
34587	2-CHLOROPHENOL, DISSOLVED (UG/L)	95578
34588	2-CHLOROPHENOL, SUSPENDED (UG/L)	95578
34591	2-NITROPHENOL, TOTAL (UG/L)	88755
34592	2-NITROPHENOL, DISSOLVED (UG/L)	88755

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34593	2-NITROPHENOL, SUSPENDED (UG/L)	88755
34596	DI-N-OCTYL PHTHALATE, TOTAL (UG/L)	117840
34597	DI-N-OCTYL PHTHALATE, DISSOLVED (UG/L)	117840
34598	DI-N-OCTYL PHTHALATE, SUSPENDED (UG/L)	117840
34601	2,4-DICHLOROPHENOL, TOTAL (UG/L)	120832
34602	2,4-DICHLOROPHENOL, DISSOLVED (UG/L)	120832
34603	2,4-DICHLOROPHENOL, SUSPENDED (UG/L)	120832
34606	2,4-DIMETHYLPHENOL, TOTAL (UG/L)	105679
34607	2,4-DIMETHYLPHENOL, DISSOLVED (UG/L)	105679
34608	2,4-DIMETHYLPHENOL, SUSPENDED (UG/L)	105679
34611	2,4-DINITROTOLUENE, TOTAL (UG/L)	121142
34612	2,4-DINITROTOLUENE, DISSOLVED (UG/L)	121142
34613	2,4-DINITROTOLUENE, SUSPENDED (UG/L)	121142
34616	2,4-DINITROPHENOL, TOTAL (UG/L)	51285
34617	2,4-DINITROPHENOL, DISSOLVED (UG/L)	51285
34618	2,4-DINITROPHENOL, SUSPENDED (UG/L)	51285
34621	2,4,6-TRICHLOROPHENOL, TOTAL (UG/L)	88062
34622	2,4,6-TRICHLOROPHENOL, DISSOLVED (UG/L)	88062
34623	2,4,6-TRICHLOROPHENOL, SUSPENDED (UG/L)	88062
34626	2,6-DINITROTOLUENE, TOTAL (UG/L)	606202
34627	2,6-DINITROTOLUENE, DISSOLVED (UG/L)	606202
34628	2,6-DINITROTOLUENE, SUSPENDED (UG/L)	606202
34631	3,3'-DICHLOROBENZIDINE, TOTAL (UG/L)	91941
34632	3,3'-DICHLOROBENZIDINE, DISSOLVED (UG/L)	91941
34633	3,3'-DICHLOROBENZIDINE, SUSPENDED (UG/L)	91941
34636	4-BROMOPHENYL PHENYL ETHER, TOTAL (UG/L)	101553
34637	4-BROMOPHENYL PHENYL ETHER, DISSOLVED (UG/L)	101553
34638	4-BROMOPHENYL PHENYL ETHER, SUSPENDED (UG/L)	101553

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34641	4-CHLOROPHENYL PHENYL ETHER, TOTAL (UG/L)	7005723
34642	4-CHLOROPHENYL PHENYL ETHER, DISSOLVED (UG/L)	7005723
34643	4-CHLOROPHENYL PHENYL ETHER, SUSPENDED (UG/L)	7005723
34646	4-NITROPHENOL, TOTAL (UG/L)	100027
34647	4-NITROPHENOL, DISSOLVED (UG/L)	100027
34648	4-NITROPHENOL, SUSPENDED (UG/L)	100027
34651	P,P'-DDD, DISSOLVED (UG/L)	72548
34652	P,P'-DDD, SUSPENDED (UG/L)	72548
34653	P,P'-DDE, DISSOLVED (UG/L)	72559
34654	P,P'-DDE, SUSPENDED (UG/L)	72559
34655	P,P'-DDT, DISSOLVED (UG/L)	50293
34656	P,P'-DDT, SUSPENDED (UG/L)	50293
34657	DNOC (4,6-DINITRO-ORTHO-CRESOL), TOTAL (UG/L)	534521
34658	DNOC (4,6-DINITRO-ORTHO-CRESOL), DISSOLVED (UG/L)	534521
34659	DNOC (4,6-DINITRO-ORTHO-CRESOL), SUSPENDED (UG/L)	534521
34662	PCB - 1221, DISSOLVED (UG/L)	11104282
34663	PCB - 1221, SUSPENDED (UG/L)	11104282
34665	PCB - 1232, DISSOLVED (UG/L)	11141165
34666	PCB - 1232, SUSPENDED (UG/L)	11141165
34671	PCB - 1016, TOTAL (UG/L)	12674112
34672	PCB - 1016, DISSOLVED (UG/L)	12674112
34673	PCB - 1016, SUSPENDED (UG/L)	12674112
34675	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD),TOT(UG/L)	1746016
34676	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD)DISS(UG/L)	1746016
34677	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD)SUSP(UG/L)	1746016
34694	PHENOL(C6H5OH)-SINGLE COMPOUND TOTAL (UG/L)	108952
34696	NAPHTHALENE, TOTAL (UG/L)	91203
34750	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD)TOT(PG/L)	1746016

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
34751	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD)DISS(PG/L)	1746016
34752	2,3,7,8-TETRACHLORODIBENZO-PDIOXIN(TCDD)SUSP(PG/L)	1746016
39032	PCP (PENTACHLOROPHENOL) WHOLE WATER SAMPLE (UG/L)	87865
39039	HEXACHLOROBENZENE WATER SAMPLE,ELECTRON CPT (UG/L)	118741
39100	BIS(2-ETHYLHEXYL) PHTHALATE, WHOLE WATER (UG/L)	117817
39103	BIS(2-ETHYLHEXYL) PHTHALATE, DISSOLVED, (UG/L)	117817
39104	BIS(2-ETHYLHEXYL) PHTHALATE, SUSPENDED, (UG/L)	117817
39107	PHTHALATES,DIETHYLHEXYL SUS.FRAC.WTR DWT (MG/KG)	117817
39110	DI-N-BUTYL PHTHALATE, WHOLE WATER (UG/L)	84742
39114	DI-N-BUTYL PHTHALATE, SUSPENDED (UG/L)	84742
39115	PHTHALATES,DIBUTYL SUS.FRAC.WATER DWT (UG/KG)	84742
39120	BENZIDINE IN WHOLE WATER SAMPLE (UG/L)	92875
39175	VINYL CHLORIDE-WHOLE WATER SAMPLE (UG/L)	75014
39180	TRICHLOROETHYLENE-WHOLE WATER SAMPLE (UG/L)	79016
39300	P,P' DDT IN WHOLE WATER SAMPLE (UG/L)	50293
39310	P,P' DDD IN WHOLE WATER SAMPLE (UG/L)	72548
39320	P,P' DDE IN WHOLE WATER SAMPLE (UG/L)	72559
39330	ALDRIN IN WHOLE WATER SAMPLE (UG/L)	309002
39331	ALDRIN IN FILT. FRAC. OF WAT. SAMP. (UG/L)	309002
39332	ALDRIN IN SUSP. FRAC. OF WAT. SAMP. (UG/L)	309002
39336	BHC-ALPHA, WATER, WHOLE (LBS/DAY)	319846
39337	ALPHA BENZENE HEXACHLORIDE IN WHOLE WATER (UG/L)	319846
39338	BETA BENZENE HEXACHLORIDE IN WHOLE WATER (UG/L)	319857
39340	GAMMA-BHC(LINDANE), WHOLE WATER (UG/L)	58899
39341	GAMMA-BHC(LINDANE), DISSOLVED (UG/L)	58899
39342	GAMMA-BHC(LINDANE), SUSPENDED (UG/L)	58899
39344	BHC-GAMMA, WATER, WHOLE (LBS/DAY)	58899
39350	CHLORDANE(TECH MIX & METABS), WHOLE WATER (UG/L)	57749

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
39352	CHLORDANE(TECH MIX & METABS), DISSOLVED (UG/L)	57749
39353	CHLORDANE(TECH MIX & METABS), SUSPENDED (UG/L)	57749
39360	DDD IN WHOLE WATER SAMPLE (UG/L)	72548
39361	DDD IN FILT. FRAC. OF WATER SMAPLE (UG/L)	72548
39362	DDD IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	72548
39365	DDE IN WHOLE WATER SAMPLE (UG/L)	72559
39366	DDE IN FILT. FRAC. OF WATER SAMPLE (UG/L)	72559
39367	DDE IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	72559
39370	DDT IN WHOLE WATER SAMPLE (UG/L)	50293
39371	DDT IN FILT. FRAC. OF WATER SAMPLE (UG/L)	50293
39372	DDT IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	50293
39380	DIELDRIN IN WHOLE WATER SAMPLE (UG/L)	60571
39381	DIELDRIN IN FILT. FRAC. OF WATER SAMPLE (UG/L)	60571
39382	DIELDRIN IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	60571
39390	ENDRIN IN WHOLE WATER SAMPLE (UG/L)	72208
39391	ENDRIN IN FILT. FRAC. OF WATER SAMPLE (UG/L)	72208
39392	ENDRIN IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	72208
39400	TOXAPHENE IN WHOLE WATER SAMPLE (UG/L)	8001352
39401	TOXAPHENE IN FILT. FRAC. OF WATER SAMPLE (UG/L)	8001352
39402	TOXAPHENE IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	8001352
39410	HEPTACHLOR IN WHOLE WATER SAMPLE (UG/L)	76448
39411	HEPTACHLOR IN FILT. FRAC. OF WATER SAMPLE (UG/L)	76448
39412	HEPTACHLOR IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	76448
39420	HEPTACHLOR EPOXIDE IN WHOLE WATER SAMPLE (UG/L)	1024573
39421	HEPTACHLOR EPOXIDE IN FILT. FRAC. WAT. SAM. (UG/L)	1024573
39422	HEPTACHLOR EPOXIDE IN SUSP. FRAC. WAT. SAM. (UG/L)	1024573
39488	PCB - 1221 IN THE WHOLE WATER SAMPLE (UG/L)	11104282
39492	PCB - 1232 PCB SERIES WHOLE WATER SAMPLE (UG/L)	11141165

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
39496	PCB - 1242 PCB SERIES WHOLE WATER SAMPLE (UG/L)	53469219
39500	PCB - 1248 PCB SERIES WHOLE WATER SAMPLE (UG/L)	12672296
39501	PCB - 1248 IN FILT. FRAC. OF WATER SAMPLE (UG/L)	12672296
39502	PCB - 1248 IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	12672296
39504	PCB - 1254 PCB SERIES WHOLE WATER SAMPLE (UG/L)	11097691
39505	PCB - 1254 IN FILT. FRAC. OF WATER SAMPLE (UG/L)	11097691
39506	PCB - 1254 IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	11097691
39508	PCB - 1260 PCB SERIES WHOLE WATER SAMPLE (UG/L)	11096825
39509	PCB - 1260 IN FILT. FRAC. OF WATER SAMPLE (UG/L)	11096825
39510	PCB - 1260 IN SUSP. FRAC. OF WATER SAMPLE (UG/L)	11096825
39700	HEXACHLOROBENZENE IN WHOLE WATER SAMPLE (UG/L)	118741
39702	HEXACHLOROBUTADIENE IN WHOLE WATER SAMPLE (UG/L)	87683
39782	LINDANE IN WHOLE WATER SAMPLE (UG/L)	58899
39920	DNOC IN WHOLE WATER SAMPLE (UG/L)	534521
46322	LINDANE PLUS ISOMERS IN WHOLE WATER SAMPLE (UG/L)	58899
46323	DELTA-BHC IN WHOLE WATER SAMPLE (UG/L)	319868
46326	HEPTACHLOR AND METABOLITES IN WH. H2O SAMP. (UG/L)	76448
46479	CYANIDE, DISSOLVED, WATER (UG/L)	57125
46551	ARSENIC, FIELD ACIDIFIED W/HNO3, LAB FILT. (UG/L)	7440382
46559	CADMIUM, FIELD ACIDIFIED-HNO3-LAB FILTER (UG/L-CD)	7440439
46560	CHROMIUM, FIELD ACIDIFIED-HN03-LAB FILT. (UG/L-CR)	7440473
46562	COPPER, FIELD ACIDIFIED-HNO3-LAB FILTER. (UG/L-CU)	7440508
46564	LEAD, FIELD ACIDIFIED-HNO3-LAB FILTERED (UG/L-PB)	7439921
46566	SILVER, FIELD ACIDIFIED-HNO3-LAB FILTER.(UG/L-AG)	7440224
46567	ZINC, EXTRACT. FIELD ACID W/HNO3, LAB FILT. (UG/L)	7440666
70012	PARACHLOROMETA CRESOL, WATER, WHOLE (LBS/DAY)	59507
70017	HEXACHLOROCYCLOPENTADIENE, WATER, WHOLE (LBS/DAY)	77474
70021	LEAD, (TCLP), WATER, TOTAL (MG/L)	7439921

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
71890	MERCURY, DISSOLVED (UG/L AS HG)	7439976
71895	MERCURY, SUSPENDED (UG/L AS HG)	7439976
71900	MERCURY, TOTAL (UG/L AS HG)	7439976
71901	MERCURY, TOTAL RECOVERABLE IN WATER AS HG (UG/L)	7439976
71946	CADMIUM, EXTRACTABLE (UG/L AS CD)	7440439
71947	CHROMIUM, EXTRACTABLE (UG/L AS CR)	7440473
71949	LEAD, EXTRACTABLE (UG/L AS PB)	7439921
71950	ZINC, EXTRACTABLE (UG/L AS ZN)	7440666
71951	COPPER, EXTRACTABLE (UG/L AS CU)	7440508
73063	CHLOROGUAIACOL,4-, TOTAL, WATER (UG/L)	16766306
73522	PROPANE, 2,2'-OXYBIS(1-CHLORO)- TOTAL (UG/L)	108601
77163	1,3-DICHLOROPROPENE-1, WHOLE WATER (UG/L)	542756
77354	1,1-DICHLORO-2,2-DIFLUOROETHANE WHOLE WATER (UG/L)	471432
77771	3-CHLORO-4-HYDROXYBENZOPHENONE, WHOLE WATER (UG/L)	55191203
78113	ETHYL BENZENE WHOLE WATER SAMPLE (UG/L)	100414
78124	BENZENE IN WATER (VOLATILE ANALYSIS) (UG/L)	71432
78131	TOLUENE IN WHOLE WATER (VOLATILE ANALYSIS) (UG/L)	108883
78208	2,4-DINITRO-O-CRESOL IN WHOLE WATER SAMPLE (UG/L)	534521
78247	CHROMIUM, HEXAVALENT, TOTAL RECOVERABLE, WT (UG/L)	18540299
78248	CYANIDE, TOTAL RECOVERABLE, WATER, WHOLE (UG/L)	57125
80357	CHROMIUM, TRIVALENT, DISSOLVED, AS CR	16065831
81208	CYANIDE, FREE (NOT AMEN. TO CHLORINATION) (MG/L)	57125
81210	CYANIDE - STATE OF ILLINOIS (MG/L)	57125
81214	CADMIUM - STATE OF ILLINOIS (MG/L)-COLD	7440439
81215	CHROMIUM - STATE OF ILLINOIS (MG/L), COLD DIGEST	18540299
81216	CHROMIUM(TRI)-STATE OF ILLINOIS (MG/L)-COLD DIGEST	16065831
81217	CHROMIUM, TOTAL - STATE OF ILLINOIS (MG/L) COLD DIGEST	7440473
81218	COPPER, STATE OF ILLINOIS, MG/L, COLD DIGEST	7440508

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
81220	LEAD, STATE OF ILLINOIS, MG/L, COLD DIGEST	7439921
81222	NICKEL - STATE OF ILLINOIS, MG/L, COLD DIGEST	7440020
81223	SILVER, STATE OF ILLINOIS, MG/L, COLD DIGEST	7440224
81224	ZINC - STATE OF ILLINOIS, MG/L, COLD DIGEST	7440666
81642	SILVER (AG) IN WATER POUNDS PER DAY (LBS/DAY)	7440224
81750	COPPER, INTERSTITIAL WATER FROM SEDIMENTS (UG/L)	7440508
81751	LEAD, INTERSTITIAL WATER FROM SEDIMENTS (UG/L)	7439921
81752	NICKEL, INTERSTITIAL WATER FROM SEDIMENTS (UG/L)	7440020
81753	CADMIUM, INTERSTITIAL WATER FROM SEDIMENT	7440439
81754	ZINC, INTERSTITIAL WATER FROM SEDIMENTS (UG/L)	7440666
81766	HEPTACHLOR EPOXIDE IN EPILITHIC ALGAE SED. (UG/KG)	1024573
81931	MERCURY (HG) SUSPENDED FRACTION OF WATER (UG/G)	7439976
81932	CADMIUM (CD) SUSPENDED FRACTION OF WATER (UG/G)	7440439
81933	ZINC (ZN) SUSPENDED FRACTION OF WATER (UG/G)	7440666
81934	LEAD (PB) SUSPENDED FRACTION OF WATER (UG/G)	7439921
81936	LEAD (PB) DISSOLVED CATIONIC SPECIES (UG/L)	7439921
81937	CADMIUM (CD) DISSOLVED CATIONIC SPECIES (UG/L)	7440439
81938	CHROMIUM, DISSOLVED CATIONIC SPECIES (UG/L)	7440473
81939	COPPER (CU) DISSOLVED CATIONIC SPECIES (UG/L)	7440508
81940	ZINC (ZN) DISSOLVED CATIONIC SPECIES (UG/L)	7440666
81941	CHROMIUM, DISSOLVED ANIONIC SPECIES (UG/L)	7440473
81942	COPPER (CU) DISSOLVED ANIONIC SPECIES (UG/L)	7440508
81943	ZINC (ZN) DISSOLVED ANIONIC SPECIES (UG/L)	7440666
82058	CHROMIUM, TOTAL, PERCENT REMOVAL	7440473
82399	CHROMIUM, HEXAVALENT (KG/BATCH)	18540299
82512	M,P-DICHLOROBENZENE (MEASURES 1,3&1,4) TOT. (UG/L)	541731
82573	CYANIDE/CHLORINATION IN WATER (MG/L)	57125
82621	HEXACHLOROBENZENE, WATER, TOTAL RECOVER. (UG/L)	118741

STORET Code	Toxic Elements (EPA Section 304(a) Priority Toxic Pollutants) cont.-	C.A.S. Number
82622	ENDRIN ALDEHYDE, WH. WATER, TOTAL RECOVER. (UG/L)	7421934
82623	ENDOSULFAN SULFATE, WATER, TOTAL RECOVER. (UG/L)	1031078
82624	ENDOSULFAN, BETA, WH. WATER, TOTAL RECOVER. (UG/L)	33213659
82626	1,2-DIPHENYLHYDRAZINE, WATER, TOTAL RECOVER. (UG/L)	122667
82627	PARACHLOROMETA CRESOL, WATER, TOTAL RECOVER. (UG/L)	59507
85006	ZINC, TOTAL - (#/DAY)	7440666
85007	CHROMIUM, TOTAL (#/DAY)	7440473
85010	NICKEL, TOTAL - (#/DAY)	7440020
85013	MERCURY, TOTAL - (#/DAY)	7439976

Appendix H

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