

# **HYDROGEOLOGIC DATA FOR THE BLAINE AQUIFER AND ASSOCIATED UNITS IN SOUTHWESTERN OKLAHOMA AND NORTHWESTERN TEXAS**

By D.L. Runkle, D.L. Bergman, and R.S. Fabian

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## CONVERSION FACTORS AND VERTICAL DATUM

Multiply	By	To obtain
cubic foot per second (ft <sup>3</sup> /s)	0.02832	cubic meter per second
inch (in)	25.4	millimeter
foot (ft)	0.3048	meter
mile (mi)	1.609	kilometer
square mile (mi <sup>2</sup> )	2.590	square kilometer

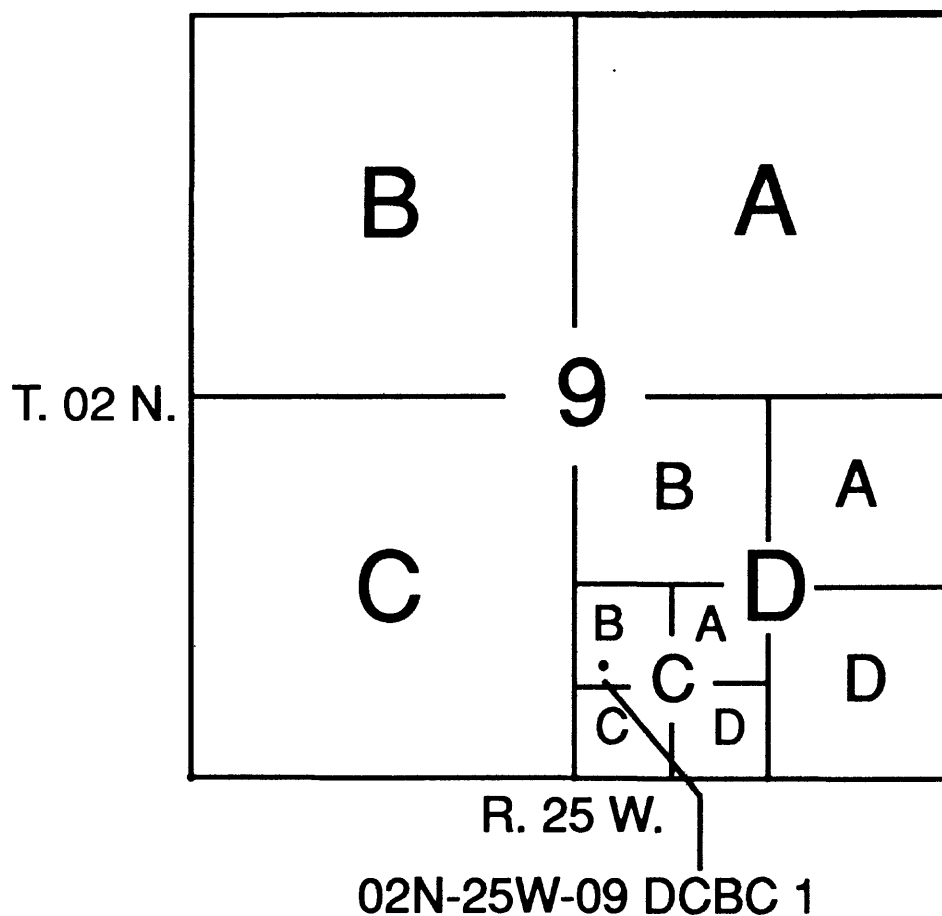
Temperature in degrees Celsius (°C) may be converted to degrees Fahrenheit (°F) as follows:

$$^{\circ}\text{F}=1.8\text{ }^{\circ}\text{C}+32$$

**Sea level:** In this report, "sea level" refers to the National Geodetic Vertical Datum of 1929 (NGVD of 1929)—a geodetic datum derived from a general adjustment of the first-order level nets of both the United States and Canada, formerly called Sea Level Datum of 1929.

## Location-numbering System In Oklahoma

The location-numbering system used in this report is based on the public land-classification system used by the Bureau of Land Management, U.S. Department of the Interior, and the Oklahoma District of the U.S. Geological Survey. The location number is often referred to as the local number or the station name. The location-numbering system illustration follows. The first number indicates the township north or south of a baseline (or standard parallel), the second number indicates the range west of the Indian meridian, and the third number indicates the section in which the well is located. The letters A, B, C, and D designate the northeast, northwest, southwest, and southeast quarters of a section or quarters of any smaller square area section. The first letter of the quarters, reading from left to right, designates the 160-acre quarter, the second letter designates the 40-acre quarter, the third letter designates the 10-acre quarter, and the fourth letter designates the 2.5-acre quarter. The number following the quarters is a sequential number that allows for a unique local number when more than one site is located in the same smallest quarter subdivision. For example, well 02N-25W-09 DCBC 1 is located in the SW 1/4, of the NW 1/4, of the SW 1/4, of the SE 1/4, of section 9, in township 2 north, and range 25 west.



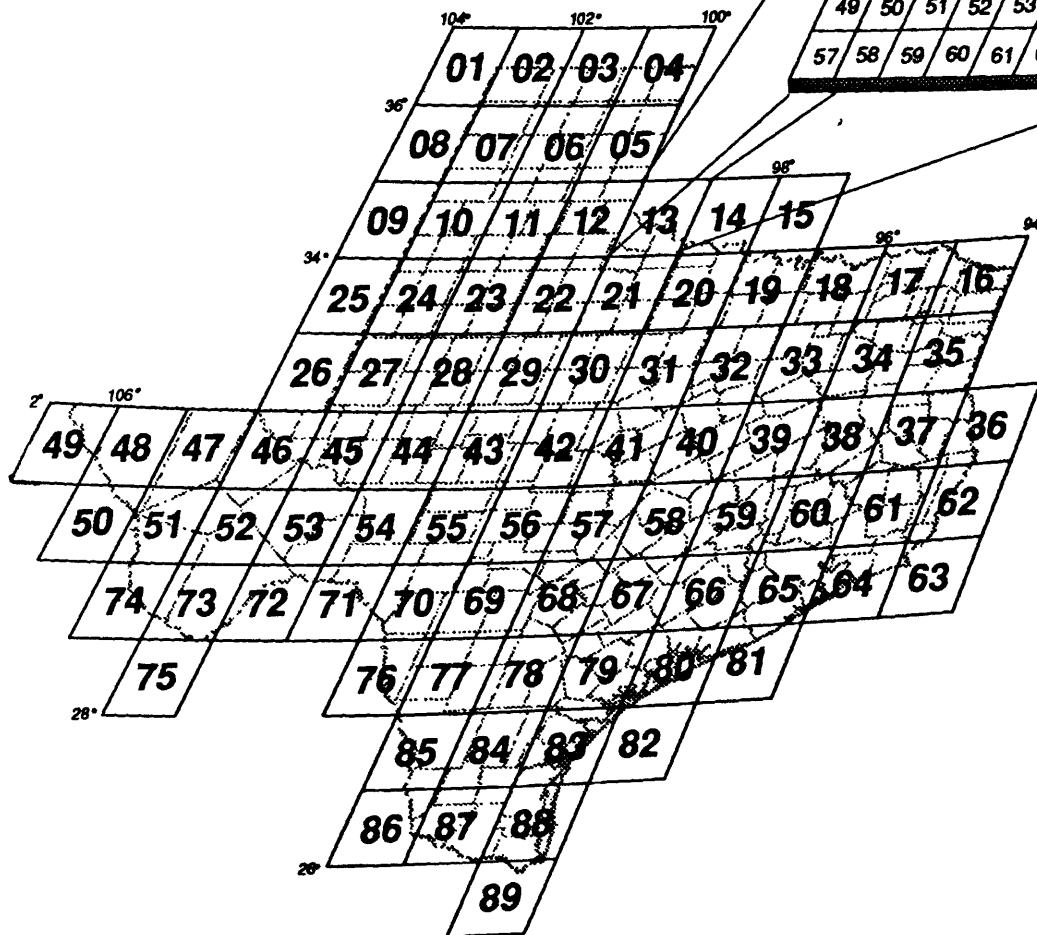
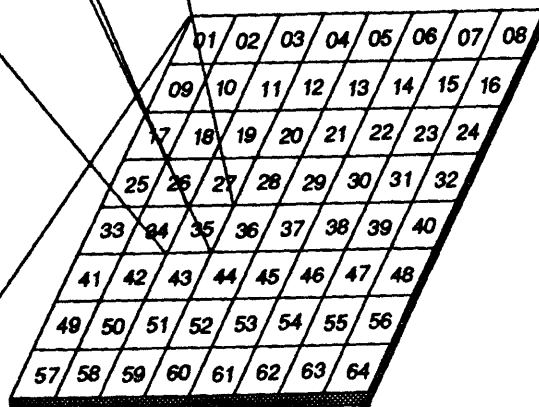
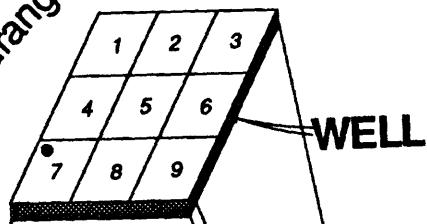
## **Well-numbering System In Texas**

The numbers assigned to wells in Texas in this report conform to the statewide system used by the Texas Water Commission. This system is based on the division of Texas into 1-degree quadrangles bounded by lines of latitude and longitude. Each 1-degree quadrangle is divided into 64 smaller quadrangles, 7 1/2 minutes on a side, each of which is further divided into 9 quadrangles, 2 1/2 minutes on a side. Each of the 89, 1-degree quadrangles in the State has been assigned a 2-digit number for identification. The 7 1/2 minute quadrangles are numbered from left to right beginning in the upper left-hand corner of the 1-degree quadrangle, and the 2 1/2 minute quadrangles within each 7 1/2 minute quadrangle are similarly numbered. Each well in a 2 1/2 minute quadrangle is assigned a 2-digit number. The well number is determined as follows: the first 2 numbers identify the 1-degree quadrangle, the next 2 numbers identify the 7 1/2 minute quadrangle, the fifth number identifies the 2 1/2 minute quadrangle, and the last 2 numbers are sequential numbers to provide a unique well number for the location within the 2 1/2 minute quadrangle.

The location-numbering system of Oklahoma was extended into Texas for three wells that were located within a mile of the Oklahoma-Texas State line. These three wells are: 03N-27W-23 DD 1 in Childress County, and 02S-24W-05 CADB 1 and 01N-26W-08 BADD 1 in Hardeman County.

1 degree quadrangle number  
 7-1/2' quadrangle number  
 2-1/2' quadrangle number  
 Well number in 2-1/2' quadrangle

13 35 7 01





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## Abstract

This report is a compilation of hydrogeologic data collected for an areal ground-water investigation of the Blaine aquifer and associated units in southwestern Oklahoma and northwestern Texas. The study area includes parts of Greer, Harmon, and Jackson counties in Oklahoma and parts of Childress, Collingsworth, Hall, Hardeman, and Wilbarger counties in Texas. The Blaine aquifer consists of cavernous gypsum and dolomite beds. Water from the Blaine aquifer supports a local agriculture based mainly on irrigated cotton and wheat. The purpose of the study was to determine the availability, quantity, and quality of ground water from the Blaine aquifer and associated units. This report provides a reference for some of the data that was used as input into a computer ground-water flow model that simulates ground-water flow in the Blaine aquifer. The data in this report consists of: (1) Monthly or periodic water-level measurements in 134 wells; (2) daily mean water-level measurements for 11 wells equipped with water-level recorders; (3) daily total precipitation measurements from five precipitation gages; (4) low-flow stream-discharge measurements for 89 stream sites; (5) miscellaneous stream-discharge measurements at seven stream sites; (6) chemical analyses of surface water from 78 stream sites during low-flow periods; (7) chemical analyses of ground water from 41 wells; and (8) chemical analyses of runoff water collected at five sites.

## INTRODUCTION

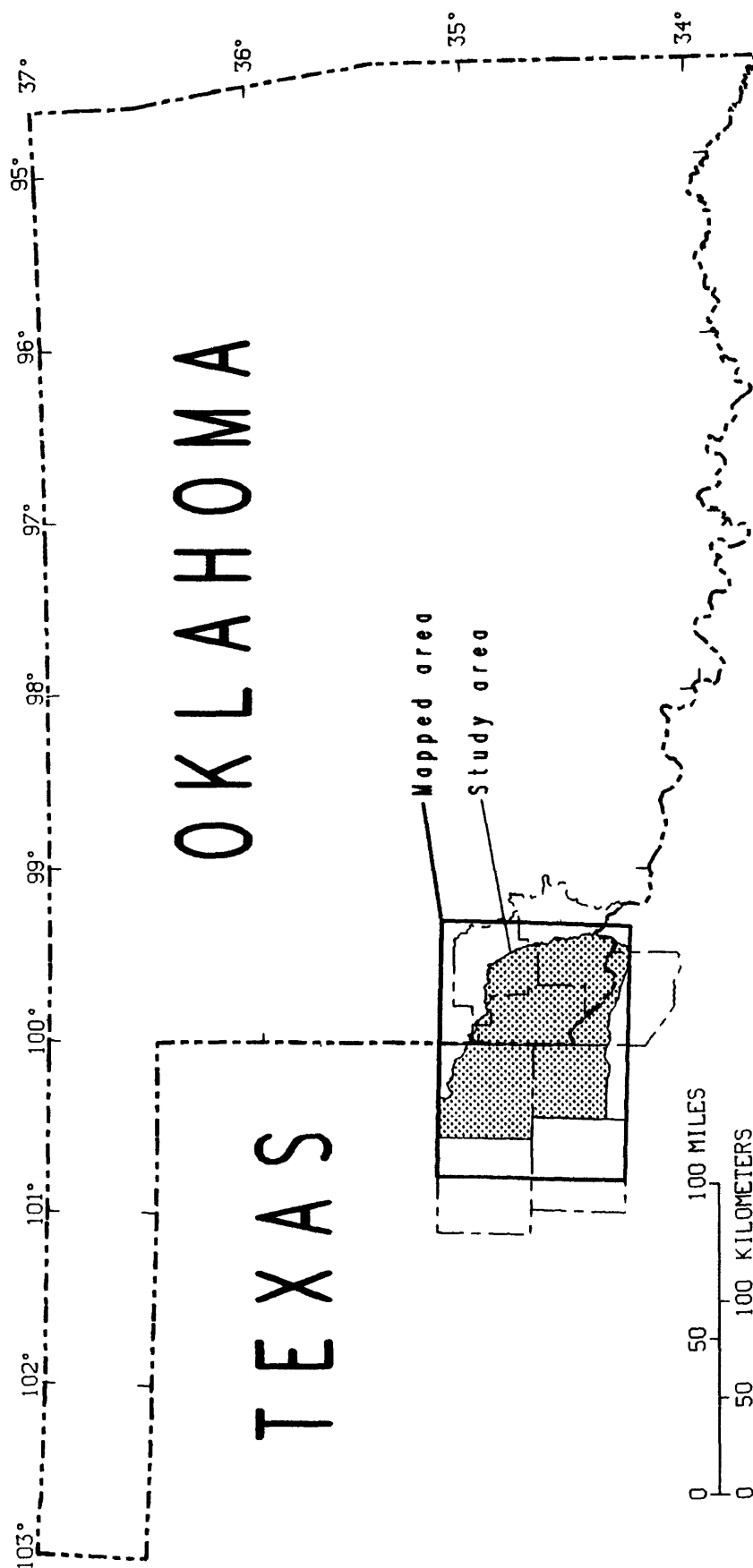
The hydrologic data contained in this report were collected for an areal ground-water investigation of the Blaine aquifer and associated units in southwestern Oklahoma and northwestern Texas

(fig. 1). The study area includes parts of Greer, Harmon, and Jackson counties in Oklahoma and parts of Childress, Collingsworth, Hall, Hardeman, and Wilbarger counties in Texas (fig. 2).

The Blaine aquifer consists of cavernous gypsum and dolomite beds. Water from the Blaine aquifer supports a local agriculture based mainly on irrigated cotton and wheat. The Blaine aquifer has been artificially recharged since about 1961, although much of the effort was abandoned after 1975; it was restarted in the 1990's as part of a demonstration project by the Oklahoma Water Resources Board. The aquifer was recharged at more than 60 different locations by diverting streamflow and storm runoff into sink holes and wells. Water in the Blaine aquifer is not used for human consumption because of the large dissolved-solids concentrations. The calcium-sulfate type water in the Blaine aquifer is acceptable for irrigation of salt-tolerant crops.

The purpose of the study was to determine the availability, quantity, and quality of ground water from the Blaine aquifer and associated units. Specific objectives were to: (1) Evaluate and map the stratigraphy and structure of all geologic units in the study area adjacent to the Blaine aquifer; (2) evaluate the hydrology of the Blaine aquifer and adjacent units; (3) determine the distribution of major and selected trace and organic chemical constituents in the aquifers; (4) analyze the effects that extensive irrigation development and the artificial recharge program have had on the Blaine and associated aquifers and project the effect they have had on the quantity and quality of water in the aquifers; and (5) determine if opportunities exist for additional artificial recharge.

This was a cooperative study with the Oklahoma Water Resources Board, Oklahoma Geological Survey, and U.S. Geological Survey. The stratigraphic nomenclature used in this report follows that of the Oklahoma Geological Survey.



**Figure 1.** Location of the study area.

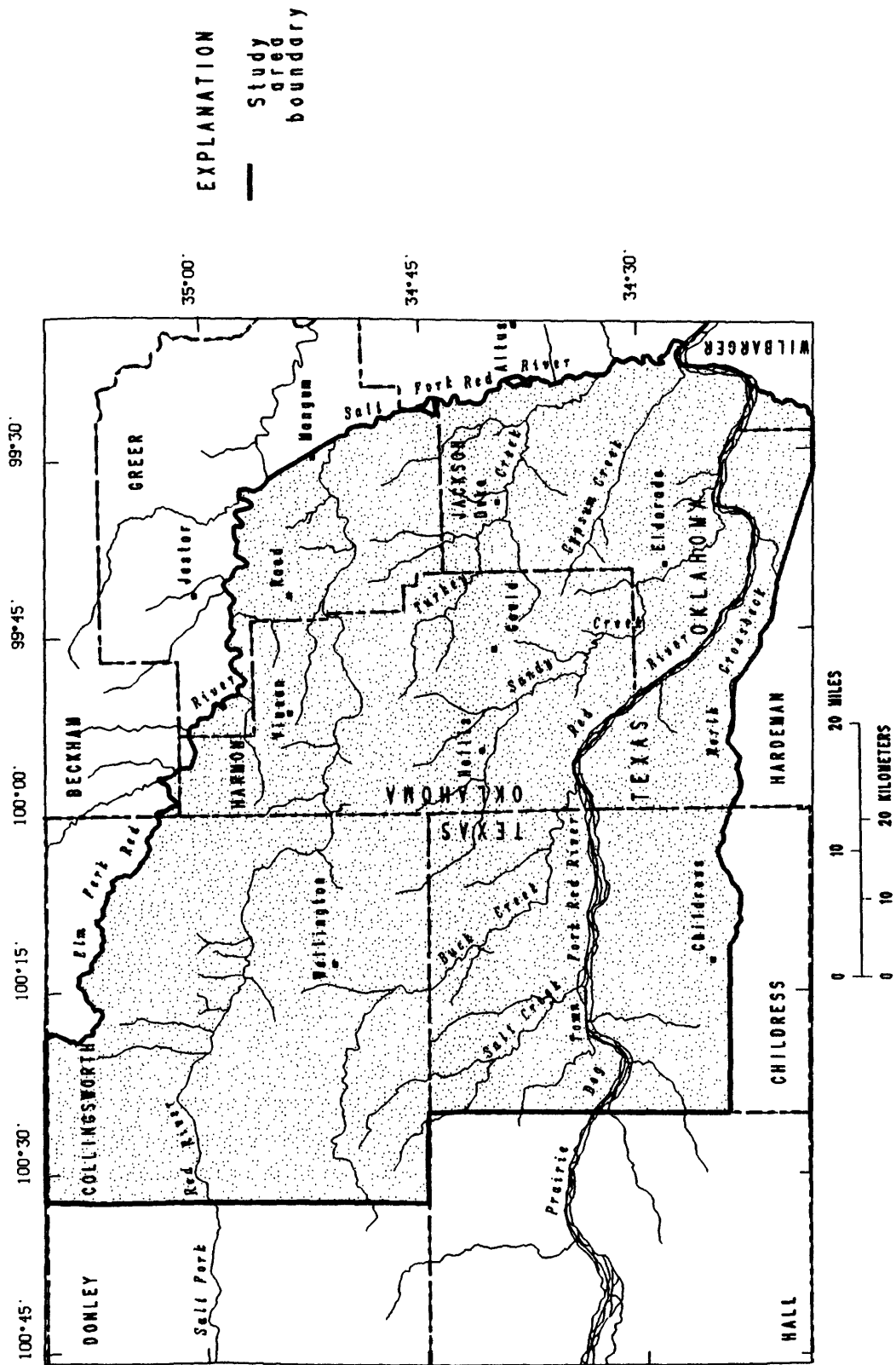


Figure 2. Geographic features of the study area.

The term Blaine aquifer used in this report refers to the geologic unit, Blaine Gypsum (or Formation) (table 1). The phrase Blaine aquifer and associated units refers to geologic units adjacent to the Blaine aquifer. Other minor aquifers, adjacent to the Blaine aquifer in some areas, include: Red River alluvial aquifer, Salt Fork Red River alluvial aquifer, Red River terrace aquifer, Salt Fork Red River terrace aquifer, Salt Fork Red River terrace and alluvial aquifer and the Whitehorse Group.

## **Purpose and Scope**

This report is a compilation of the hydrogeologic data collected for the areal ground-water investigation of the Blaine aquifer and associated units in southwestern Oklahoma and northwestern Texas. This report provides a reference for some of the data that was used as input into a computer ground-water model that simulates the ground-water flow in the Blaine aquifer. The results of the ground-water flow model can be found in the report, "Steady-state simulation, Blaine aquifer ground-water flow, southwestern Oklahoma and northwestern Texas" (1995).

## **Acknowledgments**

The authors would like to extend thanks to the residents and officials of Greer, Harmon, and Jackson counties in Oklahoma and Collingsworth, Childress, Hall, Hardeman, and Wilbarger counties in Texas. Particular recognition is due to Paul Horton for helping arrange contacts for establishing water-quality and water-level networks in the study area. Thanks are due to Charles R. Dyer III and Danny L. Swink, with the Oklahoma Geological Survey, for drilling 23 observation wells and 2 test holes for the project. Thanks also are due to Gary Glover and Dannie Spiser, with the Oklahoma Water Resources Board, for helping process the water samples and measuring water levels in wells. Thanks are extended to the Oklahoma State Department of Health and Oklahoma State Department of Health Radiological Laboratory for analyzing 103 sets of water-quality samples. Also, thanks to the Oklahoma State Department of Transportation, Texas State Department of Transportation, Harmon county commissioners and Jackson county commissioners for allowing the drilling of monitoring wells in the highway and county road rights-of-way.

The authors also would like to acknowledge the assistance of U.S. Geological Survey colleagues, D.L. Adams, L.A. Alf, R.W. Chadd, R.D. Gist, R.L. Goemaat, K.L. Gravitt, G.H. Haff, J.R. Hanlon, J.K. Kurklin, L.D. Mize, L.K. Osburn, L.T. Pham, C.R. Pruitt, D.J. Pruitt, A.R.B. Rooney, and W.B. Simons.

## **EXPLANATION OF TABLES AND METHODS OF DATA COLLECTION**

The data for this study were collected between 1985 and 1989 but all available water-level data for wells in Oklahoma are listed in tables 2 and 3 and are presented in selected hydrographs. The data in this report consist of: (1) Monthly or periodic water-level measurements in 134 wells; (2) daily mean water-level measurements for 11 wells equipped with water-level recorders; (3) daily total precipitation measurements from five precipitation gages; (4) low-flow stream-discharge measurements for 89 stream sites; (5) miscellaneous stream-discharge measurements at seven stream sites; (6) chemical analyses of surface water from 78 stream sites during low-flow periods; (7) chemical analyses of ground water from 41 ground-water wells; and (8) chemical analyses of runoff water collected at five sites.

The station number is a unique 8- to 15-digit number for a site. The hydrologic unit code is an 8-digit number for a geographic area representing all or part of a surface-drainage basin of distinct hydrologic features as delineated by the U.S. Geological Survey Office of Water Data Coordination as shown in the State Hydrologic Unit Map of Oklahoma (1976).

## **Water Levels**

### **Monthly or Periodic Water-level Measurements**

Water levels in 134 wells were measured monthly from May 1986 to March 1988 and are listed in table 2. Table 2 is organized by state, county, and local well number. The distribution of wells in the monthly water-level network is shown in figure 3. Hydrographs for selected wells in table 2 are shown in figures 4 and 5. Water levels were measured in some wells prior to May 1986. For wells in Oklahoma, all water-level measurements are listed in table 2. Only water levels measured in wells in Texas from May

Table 1.--Geologic unit or aquifer names used in this report

SYSTEM	SERIES	GROUP	FORMATION	MEMBER	BED, DEPOSIT, OR AQUIFER			
Quaternary	Holocene		Alluvial deposits		Salt Fork Red River alluvial aquifer 111SFRR			
			Terrace deposits		Red River alluvial aquifer 111RRVA			
					Salt Fork Red River terrace aquifer 110SFRT			
					Red River terrace aquifer 110RRVT			
Permian	Guadalupian	Whitehorse 310WTRS			unconformity			
						Dog Creek Shale 313DCK	Van Vacter 313VVCR	Gypsum bed 6
		Aome Dolomite						
		Gypsum bed 5						
		Gypsum bed 4						
		Gypsum bed 3						
		Gypsum bed 2						
		Gypsum bed 1						
		Mangum Dolomite						
		Elm Fork 313EMFK	Collingsworth Gypsum 313CLGR					
			Creta Dolomite					
			Cedartop Gypsum					
			Jester Dolomite					
			Haystack Gypsum					
			Gypsum Creek Dolomite					
		Flowerpot Shale 313FLRP						Unnamed salt bed in Flowerpot Shale
							Duncan Sandstone	

1986 to March 1988 are listed table 2. For a few wells, water levels were measured for a project conducted in the 1950's and then measured for this project in the 1980's.

### **Daily Mean Water Levels**

Daily mean water levels for 11 wells equipped with digital recorders are listed in table 3. Table 3 is organized by county and then by local well number. The location of the wells equipped with digital recorders is shown in figure 6. There is a hydrograph (figs. 7-17) for every recorder well listed in table 3.

### **Precipitation Data**

The daily precipitation sums for the five precipitation gages are listed in table 4. The locations of the precipitation gages are shown in figure 18. The precipitation gages are located adjacent to or within a half mile of five of the recorder wells.

### **Stream-discharge Measurements**

#### **Low-flow Stream-discharge Measurements**

Stream-discharge measurements for 89 stream sites were made during low-flow periods in March 1986, August 1987, and February 1988. Low-flow measurements (also referred to as base-flow measurements or seepage measurements) were made when no precipitation fell within or upstream from the study area for at least 14 days. The low-flow stream-discharge value is a measure of the amount of ground water discharging to the stream. Low-flow discharge measurements are listed in table 5. The locations of the low-flow discharge measurements are shown in figure 19.

#### **Miscellaneous Stream-discharge Measurements**

Miscellaneous stream-discharge measurements for seven sites are listed in table 6. The locations of the miscellaneous stream-discharge measurement sites are shown in figure 20.

### **Water Quality**

Selected total and dissolved common ion, trace, nutrient, organic or radionuclide chemical analyses, and physical properties of water samples are reported in tables 6, 7a-d, 8a-c, 9a, and 9b. The water samples were analyzed by one or more of the following laboratories: Oklahoma State Department of Health (now Oklahoma Department of Environmental Quality Laboratory), U.S. Geological Survey National Water Quality Laboratory, and Oklahoma State Department of Health Radiological Laboratory (now Oklahoma Department of Environmental Quality Radiochemical Laboratory).

The water samples were collected by either Oklahoma Water Resources Board or U.S. Geological Survey personnel. All stream and runoff samples were collected using a point-sampling method; water was not collected in increments across the stream channel. Ground-water samples from observation wells were collected using a small-diameter squeeze pump. The observation wells were pumped until the water cleared and specific conductance and pH readings stabilized. Water samples from irrigation, municipal, stock, and domestic wells were collected when specific conductance and pH readings stabilized after pumping the well sufficiently to evacuate at least 10 well volumes.

Tables 6, 7a-d, 8a-8c, 9a, and 9b have the National Water Information System (NWIS) and Water-Quality Data (QWDATA) parameter (STORET) codes shown in parentheses beneath the chemical constituent. These parameter codes were provided for the project cooperators.

Table 6 lists the field water-quality properties (specific conductance, pH, and air and water temperatures) for the miscellaneous stream-discharge measurements. The locations of the water-quality data collection sites for miscellaneous stream-discharge measurement sites are shown in figure 20. Chemical analyses of water collected from streams during low-flow periods are given in four tables. Table 7a lists the field water-quality properties, common ion, trace, and nutrient chemical analyses, table 7b lists the organic chemical analyses, table 7c lists the radionuclide chemical analyses, and 7d lists the field water-quality properties and bromide and chloride analyses. Data collection sites listed in table 7a are shown in figure 21, table 7b sites are shown in figure 22, table 7c sites are shown in figure 23, and table 7d sites are shown in figure 24.

Ground-water chemical analyses are listed in three tables. Table 8a lists the field water-quality properties, common ion, trace, and nutrient chemical analyses, table 8b lists the organic chemical analyses, and table 8c lists the radionuclide chemical analyses. Data collection sites listed in table 8a are shown in figure 25, table 8b sites are shown in figure 26, and table 8c sites are shown in figure 27.

Chemical analyses of runoff water are listed in table 9a and 9b. Table 9a lists the field water-quality properties, common ion, trace, and nutrient chemical analyses and table 9b lists the radionuclide chemical analyses. Data collection sites listed in table 9a are shown in figure 28 and table 9b sites are shown in figure 29.

Water in the aquifers, except the Salt Fork Red River terrace aquifer, has very large concentrations of dissolved solids, sulfate, and chloride and is unsuitable for human consumption. Drinking-water regulations can be found in the national primary and secondary drinking water regulations (U. S. Environmental Protection Agency, 1989b) and national primary drinking water regulations; radionuclides (U. S. Environmental Protection Agency, 1986).

The following definitions of selected mineral constituents and physical properties are summarized from the U.S. Environmental Protection Agency (1976) and U.S. Public Health Service (1962).

### Alkalinity as Calcium Carbonate ( $\text{CaCO}_3$ )

Alkalinity is defined as the capacity of a solution to neutralize an acid. In moderate concentrations (200 to 500 milligrams per liter), alkalinity has little effect on most uses of water (Hem, 1985). Bicarbonate ( $\text{HCO}_3^-$ ) and carbonate ( $\text{CO}_3^{2-}$ ) concentrations were calculated from alkalinity as calcium carbonate ( $\text{CaCO}_3$ ) concentrations for samples analyzed by the U.S. Geological Survey National Water Quality Laboratory and are shown in table 7a and table 8a. Bicarbonate can be calculated from alkalinity as  $\text{CaCO}_3$  for samples with a pH between 4.5 and 8.3 by multiplying alkalinity as  $\text{CaCO}_3$  by 1.22. The carbonate concentration is assumed to be zero for samples with a pH less than or equal to 8.3.

### Calcium and Magnesium

Limestone, dolomite, and gypsum are the principal rocks containing calcium and magnesium. Large

concentrations in water cause water hardness and form scale. Large concentrations of magnesium in water have a laxative effect (Dunfor and Becker, 1964).

### Chloride

Chloride is dissolved from most rocks. Chloride produces a salty taste in water. Under some conditions it may increase the corrosiveness of water (Dunfor and Becker, 1964).

### Dissolved Solids

The concentration of dissolved solids is determined from the weight of the dry residue after evaporation from a known quantity of water. Dissolved solids concentrations of 1,000 to 3,000 milligrams per liter are considered slightly saline, 3,000 to 10,000 milligrams per liter are moderately saline, 10,000 to 35,000 are very saline, and more than 35,000 are briny (Hem, 1985).

### Fluoride

Fluoride in ground water is probably derived from solution of fluorite, apatite, and hornblende. Optimum concentrations of fluoride are effective in reducing dental carries, especially in adolescents. Excessive concentrations may cause mottling of children's teeth (Dunfor and Becker, 1964).

### Hardness

Calcium and magnesium are the primary constituents that cause hardness. Hardness is a measure of the soap-consuming properties of water. As hardness increases, a greater amount of soap is required to produce a lather. Water hardness contributes to the formation of scale deposits. The U.S. Geological Survey uses the following classification of water hardness (Dunfor and Becker, 1964).

Calcium and magnesium hardness as $\text{CaCO}_3$ (milligrams per liter)	Hardness description
0-60	soft
61-120	moderately soft
121-180	hard
more than 180	very hard

## Iron

Iron is dissolved from many rocks and soils. The element can cause a reddish-brown stain on plumbing fixtures and fabrics washed in the water and can cause clogging of water mains. The iron criteria are of an esthetic nature (tastes and staining), and do not have a toxicological significance.

## Manganese

Manganese is found in association with salts and iron compounds. The presence of manganese may cause a dark brown or black stain on laundered fabrics or porcelain fixtures. Small concentrations may be objectionable due to taste.

## Nitrate

The occurrence of large nitrate concentrations in shallow ground water has been attributed to leaching in feedlots or to fertilizer from fields where nitrogen compounds have been applied. A large nitrate content is undesirable in drinking water because of its bitter taste. Large nitrate content also is reported to cause methemoglobinemia in infants (Dunfor and Becker, 1964).

## pH

pH is a mathematical expression indicating hydrogen ion activity. A pH of 7.0 is neutral, pH less than 7.0 is acidic, and pH greater than 7.0 is basic or alkaline. The hydrogen ion concentrations affect the corrosiveness of water (Hem, 1985).

## Potassium and Sodium

Potassium and sodium are dissolved from igneous and sedimentary rocks. Potassium generally exists in much smaller concentrations than sodium. Mineralized waters containing a large percentage of sodium salts may be unsatisfactory for irrigation. Low-sodium diets are prescribed for certain types of ailments.

## Radionuclides

Radionuclides in drinking water are suspected of increasing the risk of various forms of cancer. Radioactivity is monitored through a screening pro-

cess. When gross alpha activity exceeds 5 picocuries per liter the sample is analyzed for radium-226; if the concentration of radium-226 exceeds 3 picocuries per liter, the sample is analyzed for radium-228. The combined radium-226 and radium-228 should not exceed 5 picocuries per liter. Maximum contaminant levels for gross beta are defined in terms of the annual dose rate (millirem per year) from continuous ingestion. The dose rate is calculated on the basis of 2-liter daily intake. Gross beta as Cesium 137 (Cs 137) should not exceed 200 picocuries per liter.

## Silica

Silica is dissolved from practically all rocks and contributes to the formation of scale in pipes, water heaters, and boilers.

## Sodium-Adsorption Ratio (SAR)

The sodium-adsorption ratio (SAR) is a measure of the relative concentrations of calcium, magnesium, and sodium ions. SAR is expressed by the equation:

$$SAR = \sqrt{\frac{Na^+}{\frac{Ca^{++} + Mg^{++}}{2}}} \quad (1)$$

Sodium-adsorption ratio was introduced by the U.S. Salinity Laboratory Staff (1954) and divides water into 16 classes, depending on the SAR and specific conductance. The classifications indicate the usefulness of water for irrigation of various crops grown in different soil types.

## Specific Conductance

Specific conductance is a measure of the ability of water to conduct an electric current. By multiplying specific conductance by a conversion factor of 0.55 to 0.75, an estimate of total dissolved solids can be approximated (Hem, 1985).

## Sulfate

Sulfate combined with calcium can form scale. Water containing about 500 milligrams per liter of sulfate tastes bitter. Large concentrations of sulfate have a laxative effect (Dunfor and Becker, 1964).



## Temperature

Water temperature is evaluated for industrial cooling and its effect on the concentrations of dissolved gases and minerals.

## SELECTED REFERENCES

- Brown, Eugene, Skougstad, M.W., and Fishman, J.J., 1970, Methods for collection and analysis of water samples for dissolved minerals, and gasses: Techniques of Water-Resources Investigations of the U.S. Geological Survey, book 5, chapter A1, 160 p.
- Dunfor, N.C., and Becker, Edith, 1964, Public water supplies of the 100 largest cities in the United States, 1962: U.S. Geological Survey Water-Supply Paper 1812, 364 p.
- Havens, J.S., 1977, Reconnaissance of the water resources of the Lawton Quadrangle, southwestern Oklahoma: Oklahoma Geological Survey Hydrologic Atlas 6, 4 sheets, scale 1:250,000.
- Hem, J.D., 1985, Study and interpretation of the chemical characteristics of natural water: U.S. Geological Survey Water-Supply Paper 2254, 3d ed., 263 p.
- Johnson, K.S., 1967, Stratigraphy of the Blaine Formation and associated strata in southwestern Oklahoma: Urbana, Illinois, University of Illinois, unpublished Ph.D. dissertation, 247 p.
- Johnson, K.S., 1986, Hydrogeology and recharge of a gypsum-dolomite karst aquifer in southwestern Oklahoma, U.S.A.: International Symposium of Karst Water Resources, 1985, Ankara, Turkey, International Association of Hydrological Sciences Publication No. 161, p. 343-357.
- National Academy of Sciences-National Academy of Engineering, 1972: U.S. Environmental Protection Agency, Ecological Research Series, Report EPA R3-073-033, March 1973, 594 p.
- Oklahoma Water Resources Board, 1966, Ground water in Harmon, Jackson, Greer, and Beckham Counties, Oklahoma: Oklahoma Water Resources Board Publication No. 13, 21 p.
- Pettyjohn, W.A., White, Hal, and Dunn, Shari, 1983, Water atlas of Oklahoma: Stillwater, Oklahoma, University Center for Water Research, Oklahoma State University, 72 p.
- Runkle, D.L., and Johnson, K.S., 1988, Hydrologic study of a gypsum-dolomite karst aquifer in southwestern Oklahoma and adjacent parts of Texas, U.S.A.: Proceedings of the International Association of Hydrogeologists 21st Congress, Karst hydrogeology and karst environment protection, Volume 21, Part 1, p. 400-405.
- Runkle, D.L., and McLean, J.S., 1995, Steady-state simulation, Blaine aquifer ground-water flow, southwestern Oklahoma and northwestern Texas: U.S. Geological Survey Open-file Report 94-387, 92 p.
- Schoff, S.L., 1948, Ground-water irrigation in the Duke area, Jackson and Greer Counties, Oklahoma: Oklahoma Geological Survey Mineral Report 18, 8 p.
- Steele, C.E., and Barclay, J.E., 1965, Ground-water resources of Harmon County and adjacent parts of Greer and Jackson Counties, Oklahoma: Oklahoma Water Resources Board Bulletin 29, 96 p.
- U.S. Army Corps of Engineers, Arkansas-White-Red Office, 1954, Drainage Area Data, Arkansas, White, and Red River Basins: U.S. Army Corps of Engineers Drainage Area Pamphlet, 221 p.
- U.S. Environmental Protection Agency, 1974a, Manual of Methods for Chemical Analysis of Water and Wastes, EPA-625-15-003, Methods Development and Quality Assurance Research Laboratory, National Environmental Research Center, Cincinnati, Ohio, 298 p.
- \_\_\_\_\_, 1976, Quality criteria for water: Washington, U.S. Government Printing Office, 256 p.
- \_\_\_\_\_, 1986, Advance notice of proposed rule making, National primary drinking water regulations; radionuclides (section 141.50 of part 141) U. S. Federal Register, v. 51, no. 189, September 30, 1986, p. 34, 836-34, 862.
- \_\_\_\_\_, 1989b, Proposed rule, National primary and secondary drinking water regulations; (sections 141.50, 141.51, 141.61, and 141.62 of part 141 and 143.3 of part 143) U. S. Federal Register, v. 54, no. 97, May 22, 1989, p.22, 062-22, 160.
- U.S. Geological Survey, 1976, Hydrologic Unit Map--1974 State of Oklahoma: U.S. Geological Survey Hydrologic Unit map, 1 sheet, scale 1:500,000.
- U.S. Public Health Service, 1962, Public Health Service drinking water standards, 1962: U.S. Public Health Service Publication 956, 61 p.
- U.S. Salinity Laboratory Staff, 1954, Diagnosis and improvement of saline and alkali soils: U.S. Department of Agriculture, Agriculture Handbook no. 60, 160 p.



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## APPENDICES

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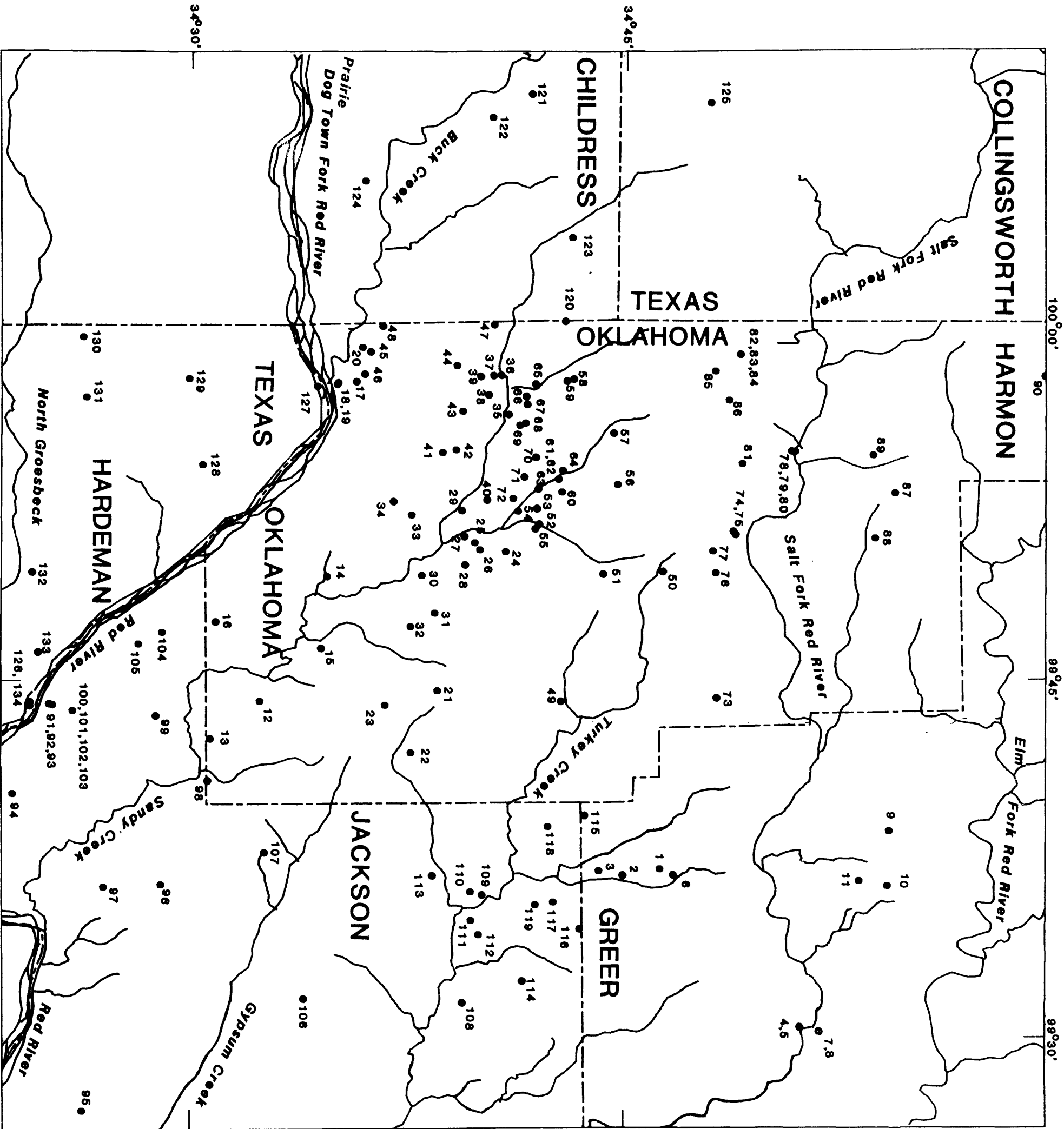


Figure 3.-- Location of wells in the water-level network.  
(Index numbers on map refer to sites in Table 2.)

### EXPLANATION

- 106
- Well in water-level network

SCALE 1:250,000

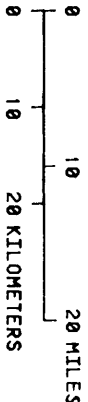


Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas

[Water levels are in feet below land-surface datum; water levels above land-surface datum are indicated by "+"; index number on location map refers to the number adjacent to the well symbol on figure 6; 110RRVT, Red River terrace aquifer; 110SFRT, Salt Fork Red River terrace aquifer; 110SFTA, Salt Fork Red River terrace and alluvial aquifer; 111RRVA, Red River alluvial aquifer; 111SFRR, Salt Fork Red River alluvial aquifer; 310WTRS, Whitehorse Group; 313BLIN, Blaine Gypsum (or Formation); 313CLGR, Collingsworth Gypsum Bed of the Elm Fork Member; 313DGCK, Dog Creek Shale; 313EMFK, Elm Fork Member of Blaine Gypsum (or Formation); 313FLRP, Flowerpot Shale; 313VVCR, Van Vactor Member of Blaine Gypsum (or Formation); MS, method of measurement and status of site; O, obstruction; P, well pumping; R, well recently pumped; S, nearby well pumping; X, affected by surface-water site; Z, other]

GREER COUNTY, OKLAHOMA

Index number on location map: 1  
 Station number: 344602099371601 Local number: 03N-23W-04 ABBD 1  
 Location: Lat 34 46'02", long 99 37'16", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,530 ft  
 Well depth: 20.5 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 23, 1986	5.45 S	Dec. 16, 1986	2.92 S	June 15, 1987	2.75 S	Dec. 29, 1987	5.27 S
July 23	4.30 S	Jan. 27, 1987	3.07 S	July 13	3.92 S	Jan. 25, 1988	2.95 S
Aug. 18	5.72 S	Feb. 24	1.48 S	Aug. 10	3.32 S	Feb. 22	3.70 S
Sept. 17	2.16 S	Mar. 17	1.88 S	Sept. 15	3.87 S	Mar. 21	3.35 S
Oct. 14	1.60 S	Apr. 15	3.20 S	Oct. 13	5.00 S		
Nov. 12	2.04 S	May 11	4.65 S	Nov. 16	4.55 S		
		Highest	1.48	Feb. 24, 1987			
		Lowest	5.72	Aug. 18, 1986			

Index number on location map: 2  
 Station number: 344445099370001 Local number: 03N-23W-09 DAB 1  
 Location: Lat 34 44'45", long 99 37'00", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,479.5 ft  
 Well depth: 125 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 11, 1986	21.30 S	Nov. 12	23.02 S	May 11	21.30 S	Nov. 16	21.08 S
June 24	37.56 S	Dec. 16	22.40 S	June 15	17.08 S	Dec. 29	21.61 S
July 23	36.93 S	Jan. 27, 1987	22.59 S	July 13	18.36 S	Jan. 25, 1988	20.20 S
Aug. 18	36.56 S	Feb. 24	21.07 S	Aug. 10	19.80 S	Feb. 22	20.55 S
Sept. 17	32.00 S	Mar. 17	19.32 S	Sept. 15	21.10 S	Mar. 21	19.54 S
Oct. 14	26.02 S	Apr. 15	20.00 S	Oct. 13	21.04 S		
		Highest	17.08	June 15, 1987			
		Lowest	37.56	June 24, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

GREER COUNTY, OKLAHOMA--Continued

Index number on location map: 3  
 Station number: 344355099371201 Local number: 03N-23W-16 DBAA 1  
 Location: Lat 34° 43' 55", long 99° 37' 12", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,457 ft  
 Well depth: 95 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 23, 1986	19.77 S	July 23, 1986	14.97	Nov. 12, 1986	3.20 S	Apr. 15, 1987	.44 S
June 24	18.34	Aug. 18	15.90 S	Dec. 16	2.20 S	May 11	1.76 S
		Highest	.44	Apr. 15, 1987			
		Lowest	19.77	May 23, 1986			

Index number on location map: 4  
 Station number: 345124099303901 Local number: 04N-22W-04 AAAA 1  
 Location: Lat 34° 51' 24", long 99° 30' 39", hydrologic unit 11120202  
 Aquifer: 111SFRR  
 Altitude of land-surface datum: 1,507 ft  
 Well depth: 53 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 03, 1987	7.55 S	Oct. 13, 1987	7.60 S	Dec. 31, 1987	6.63 S	Feb. 24, 1988	6.28 S
15	7.19 S	Nov. 16	6.90 S	Jan. 26, 1988	6.21 S	Mar. 21	6.24 S
		Highest	5.24	Mar. 21, 1988			
		Lowest	7.60	Oct. 13, 1987			

Index number on location map: 5  
 Station number: 345123099304101 Local number: 04N-22W-04 AAAA 2  
 Location: Lat 34° 51' 23", long 99° 30' 41", hydrologic unit 11120202  
 Aquifer: 111SFRR  
 Altitude of land-surface datum: 1,509 ft  
 Well depth: 58 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 03, 1987	5.34 SZ	Oct. 13, 1987	11.25 S	Dec. 31, 1987	10.63 S	Feb. 24, 1988	10.55 S
15	10.97 S	Nov. 16	10.97 S	Jan. 26, 1988	10.42 S	Mar. 21	10.13 S
		Highest	5.34	Sept. 03, 1987			
		Lowest	11.25	Oct. 13, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

GREER COUNTY, OKLAHOMA--Continued

Index number on location map: 8

Station number: 344630099370201 Local number: 04N-23W-33 DAB 1

Location: Lat 34°46'30", long 99°37'02", hydrologic unit 11120202

Aquifer: 313VVCr

Altitude of land-surface datum: 1,550 ft

Well depth: 155 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 16, 1949	31.57	Mar. 25, 1958	34.35	Oct. 03, 1962	44.40	Dec. 10, 1988	44.93
Oct. 21	30.93	Apr. 21	34.00	18	41.58	Jan. 02, 1989	44.00
Nov. 15, 1950	25.43	May 20	34.01	Nov. 13	38.30	Feb. 04	43.33
Apr. 25, 1951	30.61	June 24	35.52	Jan. 08, 1963	36.03	Mar. 11	42.74
Feb. 01, 1952	30.88	July 29	35.43	Feb. 05	38.19	Apr. 09	42.01
Nov. 19, 1953	42.62	Sept. 23	36.40	Mar. 26	35.90	May 08	41.27
Jan. 26, 1954	42.48	Oct. 27	36.95	Apr. 23	38.00	June 18	38.64
Apr. 21	48.27	Nov. 18	36.24	May 20	36.24	Sept. 04	47.24
May 26	43.62	Jan. 09, 1959	40.70	June 18	34.95	Oct. 07	43.15
June 23	42.09	26	40.04	Nov. 22	46.11	Nov. 18	40.30
Sept. 22	61.27	Feb. 24	37.90	Feb. 10, 1964	43.19	Dec. 11	39.82
Oct. 26	48.87	Apr. 21	42.55	Jan. 12, 1965	49.45	Jan. 26, 1970	39.50
Dec. 01	47.55	May 19	39.54	Feb. 17	48.34	Feb. 24	39.68
Jan. 03, 1955	46.97	June 30	37.48	Apr. 02	48.27	Dec. 29	52.11
24	46.83	Sept. 22	47.30	05	48.24	Jan. 07, 1975	33.03
Feb. 09	46.67	Oct. 20	43.70	May 25	49.22	Jan. 28, 1976	21.50
22	46.74	Nov. 19	42.09	July 29	74.11	Dec. 07	26.12
Mar. 22	51.53	Dec. 22	41.40	Sept. 29	68.68	Mar. 09, 1978	27.60
Apr. 19	57.60	Jan. 15, 1960	40.55	Oct. 12	63.11	Mar. 07, 1979	30.66
May 25	52.04	Feb. 22	39.00	Nov. 05	54.25	Feb. 28, 1980	37.22
June 24	50.12	Mar. 21	38.47	Jan. 03, 1966	46.45	Feb. 19, 1982	33.48 S
Aug. 24	59.14	Apr. 19	39.89	Apr. 19	44.18	Jan. 26, 1983	38.70 S
Sept. 28	56.76	May 17	37.04	June 20	43.79	Feb. 02, 1984	33.39 S
Oct. 26	49.10	June 21	37.67	July 12	55.43	Jan. 10, 1985	37.65 S
Nov. 29	46.08	July 19	36.05	Sept. 13	51.73	Jan. 07, 1986	27.72 S
Dec. 21	45.05	Sept. 13	37.82	Oct. 19	45.88	May 16	27.48
Jan. 31, 1956	44.22	Oct. 24	33.40	Nov. 15	43.96	June 24	27.75
Feb. 21	45.13	Nov. 14	31.62	Dec. 13	43.36	July 23	29.11
Apr. 24	45.40	Dec. 21	30.64	Jan. 17, 1967	43.77	Sept. 17	28.05
May 22	51.32	Jan. 16, 1961	29.90	Feb. 16	42.73	Oct. 14	23.08
July 24	52.77	Feb. 13	29.80	Apr. 13	48.26	Nov. 12	18.35 S
Sept. 18	49.80	Mar. 14	29.40	May 16	49.73	Dec. 16	18.72 S
Oct. 30	54.00	Apr. 19	29.20	June 15	56.81	Jan. 27, 1987	17.38 S
Nov. 27	51.21	May 17	30.71	Sept. 13	61.46	Feb. 24	17.46 S
Dec. 18	50.28	June 21	28.29	Oct. 11	54.35	Mar. 17	16.38 S
Jan. 22, 1957	49.16	July 12	34.94	Nov. 15	51.60	Apr. 15	16.50 S
Feb. 26	49.11	Sept. 06	36.76	Dec. 12	50.84	May 11	16.98 S
Apr. 04	48.35	26	34.19	Jan. 30, 1968	49.66	June 15	14.75 S
May 07	45.53	Oct. 24	33.10	Feb. 20	48.60	July 13	15.32 S
28	40.89	Nov. 14	32.65	Mar. 26	47.91	Sept. 15	18.73 S
June 25	35.15	Dec. 05	32.01	Apr. 25	47.40	Oct. 13	17.60 S
Oct. 01	39.56	Jan. 31, 1962	31.93	June 05	45.20	Nov. 16	17.10 S
29	35.65	Mar. 07	31.98	19	44.18	Dec. 29	17.35 S
Nov. 19	34.63	28	40.61	July 17	47.68	Jan. 25, 1988	16.95 S
Dec. 17	34.05	Apr. 25	41.25	Sept. 19	52.07	Feb. 22	16.82 S
Jan. 28, 1958	33.89	May 23	39.66	Oct. 10	51.88	Mar. 21	16.55 S
Feb. 25	33.81	June 27	35.36	Nov. 14	51.40		

Highest 14.75 June 15, 1987

Lowest 74.11 July 29, 1965

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

GREER COUNTY, OKLAHOMA--Continued

Index number on location map: 7  
 Station number: 345134099302901 Local number: 05N-22W-34 DCAB 1  
 Location: Lat 34 51'34", long 99 30'29", hydrologic unit 11120202  
 Aquifer: 111SFRR  
 Altitude of land-surface datum: 1,506 ft  
 Well depth: 40 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 03, 1987	7.13 S	Oct. 13, 1987	7.12 S	Dec. 31, 1987	5.20 S	Feb. 24, 1988	6.04 S
15	6.82 S	Nov. 18	6.87 S	Jan. 26, 1988	5.90 S	Mar. 21	5.28 S
		Highest	5.20	Dec. 31, 1987			
		Lowest	7.13	Sept. 03, 1987			

Index number on location map: 8  
 Station number: 345132099303001 Local number: 05N-22W-34 DCAC 1  
 Location: Lat 34 51'32", long 99 30'30", hydrologic unit 11120202  
 Aquifer: 111SFRR  
 Altitude of land-surface datum: 1504 ft  
 Well depth: 44 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 03, 1987	5.89 S	Oct. 13, 1987	5.84 S	Dec. 31, 1987	6.17 S	Feb. 24, 1988	4.95 S
15	5.43 S	Nov. 18	5.60 S	Jan. 27, 1988	4.89 S	Mar. 21	4.40 S
		Highest	4.40	Mar. 21, 1988			
		Lowest	6.17	Dec. 31, 1987			

Index number on location map: 9  
 Station number: 345356099384601 Local number: 05N-23W-20 ABA 1  
 Location: Lat 34 53'56", long 99 38'53", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,735 ft  
 Well depth: 80.5 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 22, 1986	58.90	Oct. 14, 1986	56.57	May 12, 1987	53.90 S	Oct. 15, 1987	53.55 S
June 24	57.87	Nov. 12	57.87	June 15	53.40 S	Nov. 18	53.74 S
July 23	57.79	Dec. 16	55.22 S	July 13	53.24 S	Jan. 27, 1988	53.94 S
Aug. 19	57.63	Jan. 27, 1987	55.08 S	Aug. 10	53.35 S	Feb. 24	53.80 S
Sept. 17	57.29	Apr. 15	54.10 S	Sept. 17	53.60 S	Mar. 23	53.43 S
		Highest	53.24	July 13, 1987			
		Lowest	58.90	May 22, 1986			



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

GREER COUNTY, OKLAHOMA--Continued

Index number on location map: 10

Station number: 346351099362501 Local number: 05N-23W-22 AADB 1

Location: Lat 34° 53' 53", long 99° 36' 35", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,753.7 ft

Well depth: 136 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 15, 1949	91.76 S	Jan. 25, 1955	103.74 S	Mar. 07, 1962	93.75 S	Dec. 18, 1986	79.77 S
Apr. 08, 1950	92.80 S	Feb. 09	98.88 S	Jan. 08, 1963	92.28 S	Jan. 27, 1987	78.10 S
15	89.23 S	23	95.90 S	Feb. 10, 1964	100.41 S	Feb. 24	79.83 S
Nov. 15	89.23 S	Mar. 23	96.81 S	Jan. 12, 1965	102.42 S	Mar. 18	78.92 S
Apr. 25, 1951	91.78 S	Apr. 25	100.10 S	Jan. 05, 1966	91.45 S	Apr. 15	77.85 S
Feb. 01, 1952	91.49 S	June 22	94.70 S	Jan. 19, 1967	94.09 S	May 11	82.32 S
Mar. 21	91.93 S	July 27	94.77 S	Jan. 30, 1968	95.34 S	June 15	75.85 S
Nov. 19, 1953	92.13 S	Sept. 29	98.90 S	Jan. 02, 1969	93.15 S	July 13	74.32 S
Jan. 28, 1954	92.97 S	Oct. 24	95.38 S	Jan. 27, 1970	93.12 S	Aug. 10	72.70 S
Mar. 25	95.29 S	Nov. 29	94.50 S	Jan. 07, 1975	88.40 S	Sept. 17	75.80 S
May 27	94.40 S	Dec. 22	94.15 S	May 22, 1986	89.98	Oct. 15	76.23 S
June 23	92.90 S	Jan. 31, 1958	94.81 S	June 24	87.58	Nov. 18	77.80 S
July 29	98.27 S	Jan. 22, 1957	106.20 S	July 23	88.94	Dec. 30	78.18 S
Aug. 25	100.05 S	Feb. 25, 1958	96.98 S	Aug. 19	87.35	Jan. 27, 1988	78.90 S
Oct. 28	98.82 S	Jan. 09, 1959	98.58 S	Sept. 17	86.55	Feb. 24	79.22 S
Dec. 02	96.40 S	July 19, 1960	92.63 S	Oct. 14	83.50	Mar. 23	78.98 S
Jan. 04, 1955	99.71 S	Apr. 19, 1961	91.19 S	Nov. 12	80.65		
		Highest	72.70	Aug. 10, 1987			
		Lowest	106.20	Jan. 22, 1957			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

GREER COUNTY, OKLAHOMA--Continued

Index number on location map: 11  
 Station number: 345251099303101 Local number: 05N-23W-27 ACA 1  
 Location: Lat 34° 52' 55", long 99° 36' 48", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,725 ft  
 Well depth: 109 ft  
 Remarks: Previously published as 05N-23W-27 ADB

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 29, 1953	64.82 S	Oct. 03, 1962	65.69	Oct. 12, 1967	67.36	Mar. 08, 1978	64.62
June 26, 1956	68.23	17	65.59	Nov. 15	68.65	Mar. 06, 1979	63.60
July 24	71.30	Nov. 13	65.29	Dec. 12	67.59	Feb. 28, 1980	64.02
Nov. 27	68.78	Jan. 08, 1963	65.08	Jan. 30, 1968	67.24	Feb. 19, 1982	64.26 S
Jan. 22, 1957	73.53	Feb. 05	66.48	Mar. 26	66.73	Jan. 26, 1983	63.34 S
June 25	67.35	Mar. 26	70.79	Apr. 25	67.48	Feb. 02, 1984	62.75 S
Oct. 29	69.30	June 18	73.88	June 05	65.68	Jan. 10, 1985	67.10 S
Nov. 18	67.74	Nov. 23	70.83	19	65.30	Jan. 07, 1986	62.21 S
Dec. 16	67.37	Jan. 12, 1965	68.63	July 17	65.59	May 15	63.22 S
Feb. 25, 1958	66.77	Feb. 17	69.22	Sept. 19	68.25	June 24	61.36 S
Mar. 25	67.09	Apr. 19	65.86	Oct. 10	66.93	July 23	73.99 SP
July 30	66.85	May 25	76.15	Nov. 13	66.01	Aug. 19	60.23 S
Sept. 23	69.08	July 13	66.00	Jan. 02, 1969	65.57	Sept. 17	59.98 S
Oct. 27	69.40	Oct. 12	66.60	Feb. 04	65.62	Oct. 14	58.72 S
Nov. 18	68.86	Nov. 04	68.68	Apr. 08	65.07	Nov. 12	57.83 S
Jan. 09, 1959	68.60	Jan. 05, 1966	64.90	May 08	65.11	Dec. 16	57.30 S
Jan. 13, 1960	65.60	Sept. 14	66.96	June 19	64.70	Mar. 18, 1967	56.38 S
July 19	65.50	Oct. 20	66.35	Sept. 04	66.44	May 11	61.15 S
Dec. 21	66.48	Nov. 18	67.46	Oct. 07	66.00	June 15	56.03 S
Feb. 14, 1961	64.05	Dec. 14	66.60	Nov. 19	65.73	July 13	55.70 S
May 17	71.45	Jan. 19, 1967	65.86	Dec. 11	65.31	Aug. 10	56.82 S
June 21	65.05	Mar. 16	68.12	Jan. 27, 1970	64.31	Sept. 17	56.65 S
Sept. 06	72.17	Apr. 13	68.77	Feb. 25	65.15	Oct. 15	59.78 S
26	65.80	May 16	67.51	Dec. 29	69.00	Nov. 18	56.92 S
Oct. 24	65.41	July 12	67.55	Jan. 07, 1975	62.95	Jan. 27, 1988	56.50 S
Apr. 25, 1962	72.26	Aug. 15	74.40	Jan. 28, 1976	60.50	Feb. 24	56.82 S
June 27	66.28	Sept. 12	68.45	Dec. 08	62.79	Mar. 23	56.10 S
Highest 55.70 July 13, 1987							
Lowest 76.15 May 25, 1965							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA

Index number on location map: 12

Station number: 343214099441401 Local number: 01N-24W-20 DDDD 1

Location: Lat 34 32'10", long 99 44'12", hydrologic unit 11130101

Aquifer: 313VVCr

Altitude of land-surface datum: 1,503 ft

Well depth: 97.3 ft

Remarks: Well drilled to 140 ft Jan. 15, 1953

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 15, 1953	50 R	Feb. 09, 1955	70.1	Nov. 12, 1986	62.35	Aug. 12, 1987	58.08 S
Apr. 22	67.35 S	June 22	70.6	Dec. 18	61.0 S	Sept. 18	58.83 S
Feb. 10, 1954	67.46	May 28, 1986	67.02	Jan. 28, 1987	61.09 S	Oct. 13	58.89 S
June 23	67.1	June 19	65.85	Mar. 04	59.95 S	Nov. 16	58.49 S
Aug. 25	71.0	July 23	68.3	Apr. 14	58.58 S	Dec. 17	58.61 S
Sept. 22	71.1	Aug. 12	67.23	May 13	59.16 S	Jan. 21, 1988	58.71 S
Oct. 27	70.6	Sept. 17	68.43	June 17	55.93 S	Feb. 23	58.42 S
Jan. 05, 1955	70.2	Oct. 16	66.47	July 14	58.88 S	Mar. 22	58.52 S
		Highest 50	Jan. 15, 1953				
		Lowest 71.1	Sept. 22, 1954				

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 13

Station number: 343020099422001 Local number: 01N-24W-34 DCC 1

Location: Lat 34 30'28", long 99 42'38", hydrologic unit 11130101

Aquifer: 313VVCr

Altitude of land-surface datum: 1,443.5 ft

Well depth: 94 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 11, 1954	15.09 S	May 17, 1980	14.35	Nov. 04, 1985	18.59	Nov. 07, 1989	23.55
Jan. 31, 1958	15.60	June 21	13.68	Jan. 04, 1986	18.18	18	15.44
Feb. 21	15.48	July 19	14.83	Apr. 19	19.10	Dec. 11	15.29
Mar. 20	15.68	Aug. 16	16.01	June 21	18.45	Jan. 26, 1970	15.13
30	15.90	Sept. 12	18.54	July 12	27.08	Feb. 24	15.22
Apr. 24	18.99	13	14.94	14	18.60	Mar. 25	50.73
May 22	18.28	Nov. 15	14.02	Aug. 17	78.85	Apr. 22	50.24
June 26	18.47	Dec. 21	12.70	Sept. 13	17.78	May 22	47.64
July 24	18.52	Jan. 17, 1981	14.80	Oct. 18	17.17	June 24	55.47
Aug. 28	18.10	Feb. 14	16.30	19	25.38	July 23	88.39
Sept. 18	17.74	Mar. 14	16.31	Nov. 15	18.91	Aug. 28	99.48
Oct. 30	17.53	Apr. 19	12.15	Dec. 13	18.77	Sept. 24	81.62
Nov. 27	17.29	May 17	12.57	15	59.94	Oct. 22	69.70
Dec. 18	17.19	June 21	12.93	Jan. 18, 1987	55.42	Nov. 24	61.23
Jan. 23, 1957	17.10	July 12	14.18	18	18.83	Dec. 29	17.34
Feb. 28	18.93	Aug. 01	14.39	Feb. 18	18.50	Jan. 07, 1975	13.15
Apr. 04	18.77	Sept. 08	14.94	Mar. 18	17.58	Jan. 29, 1978	13.42
May 07	15.00	25	13.78	Apr. 13	20.14	Dec. 28	13.12
28	13.09	28	17.73	May 18	18.20	Mar. 09, 1978	13.07
June 25	10.60	Oct. 24	14.78	June 15	18.00	Mar. 13, 1979	13.40
July 23	13.05	Nov. 21	14.49	July 12	17.68	Feb. 28, 1980	12.83
Aug. 27	13.83	Dec. 05	14.43	Aug. 15	19.03	Mar. 11, 1981	13.88 S
Oct. 01	13.87	Jan. 31, 1982	14.42	Sept. 14	18.88	Mar. 09, 1982	13.88 S
29	13.89	Mar. 07	14.35	15	77.40	Jan. 26, 1983	14.10 S
Nov. 19	13.73	28	17.18	Oct. 11	18.50	Jan. 16, 1984	12.18 S
Dec. 17	13.70	Apr. 25	15.99	13	69.57	Jan. 10, 1985	13.80 S
Feb. 25, 1958	13.82	May 23	15.85	Nov. 14	64.54	Jan. 08, 1986	12.24 S
Mar. 25	14.04	June 27	14.04	18	20.14	May 18	12.15
Apr. 22	13.79	Aug. 28	16.13	Dec. 12	18.79	June 19	11.45 S
May 20	13.80	Oct. 03	14.57	Jan. 17, 1988	57.74	July 22	13.00 S
June 24	13.84	18	14.48	30	18.02	Aug. 12	14.91 S
July 29	13.34	Nov. 13	14.22	Feb. 20	17.72	Sept. 17	12.90 S
Aug. 28	15.40	Jan. 08, 1983	13.58	Mar. 26	17.38	Oct. 18	10.15 S
Sept. 23	14.07	Feb. 05	14.20	Apr. 25	17.25	Nov. 12	9.12 S
Oct. 28	14.55	Mar. 26	16.29	May 21	59.10	Dec. 18	9.31 S
Nov. 19	14.54	Apr. 24	17.97	June 08	15.98	Jan. 28, 1987	9.52 S
Jan. 08, 1959	14.85	May 21	15.93	19	15.90	Mar. 04	7.90 S
27	14.28	June 18	14.69	July 17	15.72	19	7.50 S
Feb. 24	18.95	July 18	15.38	Aug. 15	18.14	Apr. 14	8.19 S
Mar. 24	18.00	Aug. 18	21.58	Sept. 19	17.25	May 13	8.59 S
Apr. 21	15.62	Nov. 22	23.78	Oct. 10	17.24	June 17	8.98 S
May 19	17.02	Feb. 10, 1984	15.10	Nov. 14	17.12	July 14	9.22 S
June 20	15.35	Jan. 13, 1985	18.04	Dec. 10	17.08	Aug. 11	9.23 S
30	17.32	Feb. 18	19.34	Jan. 07, 1989	18.95	Sept. 15	9.40 S
July 21	15.93	Apr. 01	20.08	Feb. 04	15.95	Oct. 13	9.38 S
Aug. 25	17.30	08	27.82	Mar. 11	18.80	Nov. 18	8.99 S
Sept. 22	16.60	May 25	27.02	Apr. 09	18.68	Jan. 21, 1988	8.66 S
Oct. 20	15.67	July 08	18.70	May 08	18.53	Feb. 23	8.81 S
Nov. 19	15.88	13	19.68	June 18	47.67	Mar. 22	8.38 S
Jan. 13, 1980	15.30	28	19.69	July 20	18.25		
Mar. 22	15.83	Sept. 30	29.57	Sept. 04	18.28		
Apr. 19	15.60	Oct. 12	18.35	Oct. 07	15.72		

Highest 8.98 June 17, 1987  
 Lowest 99.48 Aug. 28, 1970

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 14  
 Station number: 343428099492501 Local number: 01N-25W-10 BCBC 1  
 Location: Lat 34° 34' 28", long 99° 49' 25", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,520 ft  
 Well depth: 120 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 20, 1986	43.09	Nov. 12, 1986	33.96	Sept. 16, 1987	34.83 S	Feb. 25, 1988	29.00 S
June 19	39.25	Dec. 18	32.16 S	Oct. 14	31.07 S	Mar. 22	28.66 S
Aug. 12	63.68	Jan. 28, 1987	31.44 S	Nov. 16	26.38 S		
Sept. 17	48.66	Mar. 04	30.98 S	Dec. 17	29.31 S		
Oct. 16	38.37	Apr. 14	29.52 S	Jan. 21, 1988	29.13 S		
		Highest	26.38	Nov. 16, 1987			
		Lowest	63.68	Aug. 12, 1986			

Index number on location map: 15  
 Station number: 343419099462201 Local number: 01N-25W-12 DABA 1  
 Location: Lat 34° 34' 17", long 99° 46' 25", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,524 ft  
 Well depth: 212 ft  
 Remarks: Previously published as 01N-25W-12 DAA

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 19, 1986	63.38 S	Mar. 13, 1979	35.64	July 23, 1986	52.06 S	May 13, 1987	29.36 S
Jan. 16, 1967	55.42 S	Feb. 28, 1980	36.99	Aug. 12	70.66 S	June 16	20.24 S
Jan. 17, 1968	57.74 S	Mar. 11, 1981	42.22 S	Sept. 17	53.51 S	July 14	21.27 S
Jan. 07, 1969	56.38 S	Mar. 09, 1982	47.92 S	Oct. 16	37.84 S	Aug. 12	36.52 S
Jan. 26, 1970	47.06 S	Jan. 26, 1983	51.44 S	Nov. 12	36.86 S	Sept. 16	25.78 S
Dec. 29	61.71 S	Jan. 16, 1984	44.92 S	Dec. 18	27.85 S	Oct. 14	23.68 S
Jan. 20, 1972	54.94 S	Jan. 10, 1985	52.44 S	Jan. 28, 1987	27.30 S	Nov. 16	22.02 S
Jan. 07, 1975	38.07 S	Jan. 06, 1986	35.79 S	Mar. 04	26.32 S	Jan. 21, 1988	20.92 S
Dec. 28, 1976	36.58	May 16	39.82 S	19	24.78 S	Feb. 25	20.65 S
Mar. 09, 1978	33.92	June 19	36.48 S	Apr. 14	24.13 S	Mar. 22	19.91 S
		Highest	19.91	Mar. 22, 1988			
		Lowest	70.66	Aug. 12, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 16  
 Station number: 343042099474701 Local number: 01N-25W-35 DDBA 1  
 Location: Lat 34 30'38", long 99 47'30", hydrologic unit 11130101  
 Aquifer: 313VVCR  
 Altitude of land-surface datum: 1,485 ft  
 Well depth: 72 ft  
 Remarks: Previously published as 01N-25W-35 DDB

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 25, 1948	16 R	Jan. 10, 1985	21.67 S	Dec. 18, 1986	11.04 S	Sept. 15, 1987	11.59 S
Sept. 03, 1952	16.72 S	Jan. 06, 1986	17.78 S	Jan. 28, 1987	11.38 S	Oct. 13	11.31 S
Dec. 28, 1976	17.50	May 16	17.08 S	Mar. 04	9.73 S	Nov. 16	11.00 S
Mar. 09, 1978	16.60	June 19	16.62 S	19	9.98 S	Jan. 21, 1988	9.98 S
Feb. 28, 1980	16.95	July 22	20.47 S	Apr. 14	9.15 S	Feb. 23	10.07 S
Mar. 11, 1981	18.49 S	Aug. 12	24.80 S	May 13	10.15 S	Mar. 22	9.77 S
Mar. 09, 1982	20.80 S	Sept. 17	20.99 S	June 17	7.90 S		
Jan. 26, 1983	21.60 S	Oct. 16	14.07 S	July 14	9.98 S		
Jan. 16, 1984	18.92 S	Nov. 12	11.49 S	Aug. 11	18.88 S		
Highest 7.90 June 17, 1987							
Lowest 24.80 Aug. 12, 1986							

Index number on location map: 17  
 Station number: 343526099573401 Local number: 01N-26W-05 BACC 1  
 Location: Lat 34 35'28", long 99 57'34", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,562 ft  
 Well depth: 81 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	19.89	Nov. 13, 1986	17.06	May 13, 1987	20.54 S	Oct. 13, 1987	19.48 S
July 25	24.51	Dec. 17	17.50 S	June 16	15.80 S	Nov. 16	19.39 S
Aug. 13	23.99	Jan. 29, 1987	17.96 S	July 15	16.98 S	Jan. 20, 1988	19.04 S
Sept. 18	20.44	Mar. 06	17.22 S	Aug. 11	23.74 S	Feb. 23	19.02 S
Oct. 17	17.37	Apr. 14	17.45 S	Sept. 15	19.73 S	Mar. 22	18.95 S
Highest 15.80 June 16, 1987							
Lowest 24.51 July 25, 1986							

Index number on location map: 18  
 Station number: 343449099573101 Local number: 01N-26W-05 CDCD 1  
 Location: Lat 34 34'49", long 99 57'31", hydrologic unit 11130101  
 Aquifer: 111RRVA  
 Altitude of land-surface datum: 1,550 ft  
 Well depth: 40 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 22, 1987	4.36 S	Oct. 13, 1987	5.28 S	Jan. 20, 1988	4.35 S		
Aug. 17	5.04 S	Nov. 16	4.88 S	Feb. 23	4.52 S		
Sept. 15	4.83 S	Dec. 16	4.74 S	Mar. 22	4.28 S		
Highest 4.28 Mar. 22, 1988							
Lowest 5.28 Oct. 13, 1987							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 19

Station number: 343447099572701. Local number: 01N-26W-08 BAAB 1

Location: Lat 34° 34' 47", long 99° 57' 27", hydrologic unit 11130101

Aquifer: 111RRVA

Altitude of land-surface datum: 1,545 ft

Well depth: 28 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 22, 1987	3.34 S	Oct. 13, 1987	3.57 S	Jan. 20, 1988	2.67 S		
Aug. 17	3.43 S	Nov. 16	3.13 S	Feb. 23	3.01 S		
Sept. 15	4.00 S	Dec. 16	2.96 S	Mar. 22	2.70 S		
		Highest	2.67	Jan. 20, 1988			
		Lowest	4.00	Sept. 15, 1987			

Index number on location map: 20

Station number: 343534099590001. Local number: 01N-27W-01 AAAB 1

Location: Lat 34° 35' 39", long 99° 59' 00", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,570 ft

Well depth: 70 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	13.95	Nov. 13, 1986	12.44	May 12, 1987	14.81 S	Dec. 16, 1987	13.65 S
July 16	26.79	Dec. 17	12.31 S	June 16	10.37 S	Jan. 20, 1988	13.38 S
Aug. 12	28.52 S	Jan. 29, 1987	12.22 S	July 15	17.18 S	Feb. 23	14.22 S
12	29.52	Mar. 04	11.43 S	Sept. 15	13.26 S	Mar. 22	12.60 S
Sept. 18	15.72	18	11.38 S	Oct. 13	14.38 S		
Oct. 17	13.42	Apr. 14	11.59 S	Nov. 16	14.33 S		
		Highest	10.37	June 16, 1987			
		Lowest	29.52	Aug. 12, 1986			

Index number on location map: 21

Station number: 343818099444201. Local number: 02N-24W-17 DCCC 1

Location: Lat 34° 38' 18", long 99° 44' 42", hydrologic unit 11120202

Aquifer: 313DGCK

Altitude of land-surface datum: 1,590 ft

Well depth: 35.75 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 20, 1988	22.27	Nov. 12, 1986	20.98	June 17, 1987	19.68 S	Nov. 17, 1987	19.01 S
July 23	22.05	Mar. 04, 1987	20.78 S	July 14	19.32 S	Jan. 21, 1988	18.93 S
Aug. 12	22.15	18	20.78 S	Aug. 12	19.21 S	Feb. 25	19.09 S
Sept. 17	21.84 S	Apr. 14	20.65 S	Sept. 15	19.23 S	Mar. 21	18.93 S
Oct. 18	21.37	May 13	20.10 S	Oct. 14	19.28 S		
		Highest	18.93	Jan. 21, 1988			
		Lowest	22.27	June 20, 1988			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 22  
 Station number: 343728099420201 Local number: 02N-24W-23 CCCC 1  
 Location: Lat 34° 37' 24", long 99° 42' 04", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,531 ft  
 Well depth: 170 ft  
 Remarks: Well depth measured as 148 ft deep, Feb. 27, 1987

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June , 1957	80 R	July 09, 1987	44.61 S	Oct. 14, 1987	50.33 S	Jan. 21, 1988	51.74 S
Feb. 27, 1987	51.87 S	Aug. 12	45.88 S	Nov. 17	49.53 S	Feb. 25	51.19 S
June 18	48.05 S	Sept. 18	49.22 S	Dec. 17	49.85 S	Mar. 21	50.13 S
		Highest	44.61	July 09, 1987			
		Lowest	80	June , 1957			

Index number on location map: 23  
 Station number: 343631099450501 Local number: 02N-24W-32 ABAB 1  
 Location: Lat 34° 36' 29", long 99° 44' 04", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,574 ft  
 Well depth: 190 ft  
 Remarks: Original well depth 245 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 20, 1988	112.59	Dec. 18, 1988	101.63 S	June 17, 1987	93.84 S	Dec. 17, 1987	99.18 S
July 23	118.63	Jan. 28, 1987	102.93 S	July 14	93.93 S	Jan. 21, 1988	99.30 S
Aug. 12	117.01	Mar. 04	100.60 S	Aug. 12	98.25 S	Feb. 25	99.22 S
Sept. 17	118.44	18	97.84 S	Sept. 18	99.14 S	Mar. 21	97.68 S
Oct. 18	111.01 S	Apr. 14	98.31 S	Oct. 14	99.80 S		
Nov. 12	102.09 S	May 13	97.53 S	Nov. 17	98.35 S		
		Highest	93.84	June 17, 1987			
		Lowest	118.63	July 23, 1988			

Index number on location map: 24  
 Station number: 344037099503301 Local number: 02N-25W-05 AAD 1  
 Location: Lat 34° 40' 39", long 99° 50' 30", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,802 ft  
 Well depth: 95 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 28, 1986	47.27	Dec. 17, 1986	37.91 S	June 16, 1987	31.09 S	Dec. 18, 1987	35.85 S
June 18	45.88	Jan. 28, 1987	37.49 S	July 15	40.90 S	Jan. 20, 1988	35.21 S
Aug. 13	75.88	Mar. 04	35.77 S	Aug. 11	58.45 S	Feb. 25	35.03 S
Sept. 17	54.34	18	34.85 S	Sept. 18	40.78 S	Mar. 21	34.47 S
Oct. 18	43.48	Apr. 14	34.09 S	Oct. 14	38.97 S		
Nov. 12	39.00	May 12	43.82 S	Nov. 17	35.73 S		
		Highest	31.09	June 16, 1987			25
		Lowest	75.88	Aug. 13, 1986			



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 25

Station number: 343934099505201 Local number: 02N-25W-08 ACDC 1

Location: Lat 34 39'34", long 99 50'52", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,583 ft

Well depth: 82 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	37.35	Dec. 17, 1986	28.89 S	July 15, 1987	21.69 S	Jan. 20, 1988	23.11 S
June 18	34.63	Mar. 04, 1987	26.23 S	Aug. 12	31.83 S	Feb. 25	21.69 S
July 24	47.01	18	25.36 S	Sept. 15	28.53 S	Mar. 22	21.28 S
Sept. 17	40.14	Apr. 14	24.32 S	Oct. 14	25.55 S		
Oct. 16	35.04	May 12	25.64 S	Nov. 17	24.00 S		
Nov. 12	31.05	June 16	20.68 S	Dec. 16	23.69 S		
		Highest	20.68	June 16, 1987			
		Lowest	47.01	July 24, 1986			

Index number on location map: 26

Station number: 343945099503401 Local number: 02N-25W-08 ADA 1

Location: Lat 34 39'45", long 99 50'34", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,592 ft

Well depth: 160 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	53.13	Dec. 17, 1986	37.35 S	June 16, 1987	28.78 S	Dec. 16, 1987	33.69 S
June 18	45.17	Jan. 28, 1987	36.56 S	July 15	34.34 S	Jan. 20, 1988	33.03 S
July 23	56.84	Mar. 04	34.76 S	Aug. 12	41.42 S	Feb. 25	32.69 S
Sept. 17	58.39	18	32.65 S	Sept. 16	38.35 S	Mar. 22	32.20 S
Oct. 16	45.00	Apr. 14	32.59 S	Oct. 14	35.83 S		
Nov. 12	39.50	May 12	47.14 S	Nov. 17	33.90 S		
		Highest	28.78	June 16, 1987			
		Lowest	58.39	Sept. 17, 1986			

Index number on location map: 27

Station number: 343913099510801 Local number: 02N-25W-08 CDCA 1

Location: Lat 34 39'13", long 99 51'08", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,578 ft

Well depth: 150 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	33.38	Dec. 17, 1986	25.49 S	June 16, 1987	17.42 S	Dec. 16, 1987	20.18 S
June 18	30.36	Jan. 28, 1987	24.30 S	July 15	18.12 S	Jan. 20, 1988	19.57 S
July 23	40.44	Mar. 04	23.83 S	Aug. 12	27.58 S	Feb. 25	19.13 S
Sept. 17	42.09	18	22.02 S	Sept. 15	24.49 S	Mar. 21	18.65 S
Oct. 16	31.50	Apr. 14	21.00 S	Oct. 14	21.94 S		
Nov. 12	27.60	May 12	22.38 S	Nov. 17	20.50 S		
		Highest	17.42	June 16, 1987			
		Lowest	42.09	Sept. 17, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 28

Station number: 343919099495501 Local number: 02N-25W-09 DCBC 1

Location: Lat 34° 39' 15", long 99° 49' 57", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,592 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	50.48 S	Oct. 17, 1986	50.98	May 12, 1987	36.54 S	Jan. 20, 1988	35.60 S
June 19	48.59	Nov. 12	44.20	June 17	33.54 S	Feb. 25	36.02 S
July 24	53.29	Mar. 04, 1987	38.20 S	Sept. 18	42.89 S	Mar. 22	35.60 S
Aug. 02	68.40	18	37.10 S	Oct. 14	43.61 S		
Sept. 17	61.79	Apr. 14	36.44 S	Nov. 17	37.50 S		
				Highest	33.54	June 17, 1987	
				Lowest	68.40	Aug. 02, 1986	

Index number on location map: 29

Station number: 343908099521601 Local number: 02N-25W-18 BABA 1

Location: Lat 34° 39' 08", long 99° 52' 13", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,578 ft

Well depth: 84 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 19, 1986	14.79	Nov. 12, 1986	12.96	May 12, 1987	10.70 S	Nov. 17, 1987	9.00 S
June 18	14.18	Dec. 17	11.89 S	June 18	10.25 S	Jan. 20, 1988	10.30 S
July 23	13.85 S	Jan. 28, 1987	11.00 S	July 15	10.30 S	Feb. 25	9.99 S
Aug. 12	13.85	Mar. 04	10.68 S	Aug. 12	10.38 S	Mar. 21	9.70 S
Sept. 17	13.73	18	10.45 S	Sept. 15	10.59 S		
Oct. 16	13.72	Apr. 14	10.33 S	Oct. 14	10.80 S		
				Highest	9.00	Nov. 17, 1987	
				Lowest	14.79	May 19, 1986	

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 30

Station number: 343736097443001 Local number: 02N-25W-21 DBC 1

Location: Lat 34 37'45", long 99 49'30", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,566.39 ft

Well depth: 112 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Nov. 16, 1950	20.27	Sept. 13, 1966	56.21	July 19, 1968	54.20	Feb. 14, 1973	70.03
Mar. 20, 1952	25.86	Oct. 19	49.36	Aug. 15	62.29	July 23, 1986	46.42 S
Nov. 23, 1953	27.57	Nov. 15	47.44	Sept. 19	58.32	Aug. 13	46.27 S
Feb. 10, 1954	28.73	Dec. 13	54.34	Oct. 10	66.82	Sept. 17	20.18 S
Jan. 25, 1955	33.35	Jan. 18, 1967	55.30	Nov. 14	62.01	Oct. 16	12.75 S
Jan. 31, 1956	33.75	Feb. 16	46.62	Dec. 10	56.06	Nov. 12	9.88 S
Jan. 23, 1957	37.31	Mar. 16	72.36	Jan. 07, 1969	55.46	Mar. 04, 1987	6.93 S
Feb. 25, 1958	31.01	Apr. 13	55.33	Feb. 04	54.56	Apr. 14	5.26 S
Jan. 08, 1959	33.05	May 16	76.15	Mar. 11	55.09	May 12	7.69 S
Jan. 13, 1960	35.26	June 15	68.39	Apr. 09	51.31	June 16	2.96 S
Jan. 17, 1961	28.77	July 12	67.58	May 08	51.90	July 15	2.99 S
Jan. 31, 1962	31.16	Aug. 15	74.04	June 18	49.63	Aug. 12	13.77 S
Mar. 26, 1963	38.60	Sept. 14	82.99	July 20	69.71	Sept. 16	7.01 S
Jan. 13, 1965	49.69	Oct. 11	75.82	Sept. 04	55.15	Oct. 14	5.80 S
Apr. 07	78.38	Nov. 16	76.37	Oct. 07	48.58	Nov. 17	4.78 S
July 13	79.99	Dec. 12	72.38	Nov. 18	45.05	Jan. 21, 1988	3.88 S
Sept. 29	64.64	Jan. 30, 1968	65.11	Dec. 11	44.73	Feb. 25	3.58 S
Oct. 12	65.80	Mar. 26	64.44	Jan. 26, 1970	44.14	Mar. 21	3.18 S
Jan. 04, 1966	43.88	Apr. 25	78.64	Feb. 24	45.26		
Apr. 19	68.12	June 05	54.07	Dec. 29	71.08		
July 12	78.97	July 17	76.86	Jan. 19, 1972	61.77		
		Highest	2.96	June 16, 1987			
		Lowest	82.99	Sept. 14, 1967			

Index number on location map: 31

Station number: 343812099475501 Local number: 02N-25W-23 BAA 1

Location: Lat 34 38'12", long 99 47'55", hydrologic unit 11130101

Aquifer: 313EMFK

Altitude of land-surface datum: 1,555 ft

Well depth: 185 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 15, 1966	27 R	Nov. 12, 1986	19.76 S	June 16, 1987	12.25 S	Jan. 21, 1988	14.19 S
May 16, 1966	29.73 S	Dec. 18	19.64 S	July 14	12.06 S	Feb. 25	14.60 S
June 20	26.04 S	Jan. 28, 1987	18.90 S	Aug. 12	50.17 S	Mar. 21	12.92 S
July 25	66.42 S	Mar. 04	15.59 S	Sept. 16	18.14 S		
Sept. 17	43.21 S	19	14.30 S	Oct. 14	17.44 S		
Oct. 16	24.48 S	Apr. 14	15.50 S	Nov. 17	15.39 S		
		Highest	12.06	July 14, 1987			
		Lowest	66.42	July 25, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 32

Station number: 343723099472401 Local number: 02N-25W-28 AAAA 1

Location: Lat 34 37'22", long 99 47'21", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,545 ft

Well depth: 104 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 20, 1986	38.00	Nov. 12, 1986	25.42	June 18, 1987	15.38 S	Dec. 17, 1987	16.40 S
June 19	34.21	Dec. 18	24.59 S	July 14	13.88 S	Jan. 21, 1988	15.77 S
July 22	48.21	Jan. 28, 1987	23.55 S	Aug. 12	18.48 S	Feb. 25	15.88 S
Aug. 12	77.71	Mar. 04	19.40 S	Sept. 18	19.52 S	Mar. 21	14.35 S
Sept. 17	62.19	Apr. 14	19.33 S	Oct. 14	18.52 S		
Oct. 16	32.91	May 12	23.08 S	Nov. 17	16.44 S		
Highest 13.88 July 14, 1987							
Lowest 77.71 Aug. 12, 1986							

Index number on location map: 33

Station number: 343720099521201 Local number: 02N-25W-30 ABBB 1

Location: Lat 34 37'23", long 99 52'02", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,601 ft

Well depth: 166 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 19, 1953	55 R	Dec. 18, 1986	51.70 S	June 18, 1987	45.23 S	Dec. 18, 1987	46.92 S
June 10, 1986	57.38	Jan. 28, 1987	50.74 S	July 15	44.78 S	Jan. 21, 1988	46.45 S
Aug. 12	95.60	Mar. 04	49.59 S	Aug. 12	55.42 S	Feb. 25	46.34 S
Sept. 17	69.29	18	48.92 S	Sept. 18	50.48 S	Mar. 21	46.28 S
Oct. 16	58.10	Apr. 14	48.25 S	Oct. 14	48.43 S		
Nov. 13	52.88	May 12	55.38 S	Nov. 17	47.13 S		
Highest 44.78 July 15, 1987							
Lowest 95.60 Aug. 12, 1986							

Index number on location map: 34

Station number: 343720099523001 Local number: 02N-25W-30 CCBB 1

Location: Lat 34 38'45", long 99 52'34", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,590 ft

Well depth: 175 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	47.53	Apr. 14, 1987	36.28 S	Aug. 12, 1987	45.97 S	Jan. 21, 1988	34.53 S
July 18	62.68	May 12	46.58 S	Sept. 18	39.65 S	Feb. 25	34.81 S
Aug. 12	75.20	June 18	34.98 S	Oct. 14	36.65 S		
Mar. 18, 1987	37.32 S	July 15	44.99 S	Nov. 17	35.49 S		
Highest 34.53 Jan. 21, 1988							
Lowest 75.20 Aug. 12, 1986							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 35

Station number: 344044099561401 Local number: 02N-26W-04 ABC 1

Location: Lat 34°40'44", long 99°56'14", hydrologic unit 11130101

Aquifer: 313EMFK

Altitude of land-surface datum: 1,623 ft

Well depth: 220 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 28, 1983	40 R	Oct. 17, 1986	26.85 S	Mar. 17, 1987	17.41	Oct. 13, 1987	14.49 S
June 11, 1986	28.84 S	Nov. 13	23.63 S	Apr. 15	16.40 S	Nov. 16	13.36 S
July 15	33.63 S	Dec. 17	20.93 S	May 12	19.99 S	Jan. 20, 1988	12.55 S
Aug. 19	72.98 S	Jan. 29, 1987	19.58 S	June 16	11.85 S	Feb. 25	12.49 S
Sept. 18	31.64 S	Mar. 05	17.50 S	July 15	23.93 S	Mar. 21	12.18 S
		Highest	11.85	June 16, 1987			
		Lowest	72.98	Aug. 19, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 36

Station number: 343512099574701 Local number: 02N-26W-05 BCCC 1

Location: Lat 34°40'28", long 99°57'52", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,841 ft

Well depth: 149 ft

Remarks: Previously published as 02N-26W-05 BCC

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Nov. 16, 1950	20.24	Oct. 20, 1959	54.59	Feb. 16, 1967	73.44	Dec. 29, 1970	93.05
Apr. 26, 1951	24.84	Nov. 19	49.44	Mar. 16	83.53	Jan. 07, 1975	81.90
Mar. 20, 1952	23.03	Jan. 13, 1960	45.54	Apr. 13	142.42	Jan. 29, 1976	48.32
Nov. 23, 1953	32.47	Mar. 22	41.43	May 16	103.93	Dec. 27	48.39
Jan. 26, 1954	30.49	Apr. 19	52.42	June 15	87.20	Mar. 09, 1978	44.84
Feb. 10	30.23	May 17	51.74	July 12	89.78	Mar. 13, 1979	52.82
Aug. 25	52.49	June 21	43.72	Aug. 15	147.16	Feb. 28, 1980	57.27
Oct. 26	41.65	July 19	41.50	Sept. 14	121.70	Mar. 11, 1981	61.04 S
Dec. 02	40.00	Aug. 16	51.90	Oct. 11	90.60	Mar. 09, 1982	61.98 S
Jan. , 1955	37.8	Nov. 15	38.59	Nov. 16	88.88	Jan. 26, 1983	58.39 S
Feb.	37.8	Jan. 17, 1961	34.50	Dec. 12	82.80	Jan. 16, 1984	53.60 S
June	40.0	Feb. 14	32.56	Jan. 30, 1968	72.95	Jan. 10, 1985	65.55 S
Jan. 31, 1956	39.48	Mar. 14	31.76	Feb. 20	70.38	Jan. 06, 1986	51.88 S
Feb. 21	39.25	Apr. 19	43.98	Mar. 26	67.80	May 15	50.02 S
Mar. 20	40.07	May 17	43.40	Apr. 25	86.93	June 18	45.30 S
Dec. 18	49.52	June 21	35.09	June 05	69.24	July 23	53.96 S
Jan. 23, 1957	47.34	July 12	42.34	July 19	67.46	Aug. 13	67.20 S
Feb. 26	47.20	Oct. 24	44.21	July 17	70.68	Sept. 18	50.93 S
Apr. 04	47.45	Nov. 14	41.14	Aug. 15	108.20	Oct. 17	44.59 S
May 07	46.63	Dec. 05	39.05	Sept. 19	82.72	Nov. 13	40.45 S
28	42.58	Mar. 07, 1962	39.36	Oct. 10	75.43	Dec. 17	37.66 S
June 25	37.76	28	53.82	Nov. 14	81.32	Jan. 29, 1987	35.75 S
July 23	44.04	June 27	44.66	Dec. 10	71.86	Mar. 05	33.76 S
Oct. 01	50.72	Jan. 13, 1965	69.23	Jan. 07, 1969	68.53	17	32.85 S
29	36.60	Apr. 07	121.41	Feb. 04	66.52	Apr. 14	32.10 S
Nov. 19	41.85	July 13	120.88	Mar. 11	65.12	May 12	36.81 S
Dec. 17	39.92	Sept. 26	120.91	Apr. 08	69.83	June 16	29.10 S
Feb. 25, 1958	38.14	Oct. 12	106.90	09	63.28	July 15	33.20 S
Mar. 25	37.20	Jan. 04, 1966	73.93	June 18	63.62	Aug. 11	44.94 S
Apr. 22	37.38	Apr. 19	140.23	July 20	95.57	Sept. 15	32.44 S
May 20	37.65	July 12	143.42	Sept. 04	87.59	Oct. 13	31.03 S
June 24	37.53	Sept. 13	112.05	Oct. 07	72.70	Nov. 16	28.99 S
July 29	36.59	Oct. 19	82.95	Nov. 18	67.98	Dec. 16	28.60 S
Jan. 27, 1959	37.05	Nov. 15	79.90	Dec. 11	65.08	Jan. 20, 1988	27.82 S
Mar. 24	46.70	Dec. 13	73.17	Jan. 26, 1970	61.93	Feb. 23	27.42 S
June 30	44.20	Jan. 18, 1967	72.21	Feb. 24	60.35	Mar. 21	26.93 S

Highest 20.24 Nov. 16, 1950

Lowest 147.16 Aug. 15, 1967

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 37

Station number: 344012099575101 Local number: 02N-26W-05 CCBB 1

Location: Lat 34 40'12", long 99 57'51", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,638 ft

Well depth: 240 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1988	49.43 S	Jan. 29, 1987	34.08 S	Sept. 15, 1987	31.89 S	Feb. 23, 1988	26.45 S
Sept. 18	50.67 S	Mar. 05	32.30 S	Oct. 13	30.18 S	Mar. 21	28.12 S
Oct. 17	43.48 S	May 12	37.40 S	Nov. 18	28.05 S		
Nov. 13	38.08 S	June 18	27.25 S	Dec. 18	27.74 S		
Dec. 17	35.88 S	July 15	33.05 S	Jan. 20, 1988	26.90 S		
		Highest	26.12	Mar. 21, 1988			
		Lowest	50.67	Sept. 18, 1988			

Index number on location map: 38

Station number: 344002099570301 Local number: 02N-26W-05 DDCC 1

Location: Lat 34 40'02", long 99 57'03", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,630 ft

Well depth: 120 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1988	39.10 S	Dec. 17, 1986	27.46 S	June 16, 1987	18.50 S	Jan. 20, 1988	17.80 S
June 18	33.38 S	Jan. 29, 1987	25.42 S	Sept. 16	21.42 S	Feb. 25	17.23 S
Sept. 18	39.18 S	Mar. 05	23.67 S	Oct. 13	19.71 S	Mar. 21	16.90 S
Oct. 17	33.70 S	17	22.90 S	Nov. 16	17.68 S		
Nov. 13	30.03 S	Apr. 14	21.99 S	Dec. 16	18.89 S		
		Highest	16.90	Mar. 21, 1988			
		Lowest	39.16	Sept. 18, 1986			

Index number on location map: 39

Station number: 343945099574901 Local number: 02N-26W-08 BCBB 1

Location: Lat 34 39'45", long 99 57'49", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,643.8 ft

Well depth: 174 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Mar. 14, 1962	26 R	Oct. 17, 1986	48.33 S	Apr. 14, 1987	32.93 S	Oct. 13, 1987	31.68 S
Aug. 25, 1953	38.72 S	Nov. 13	41.32 S	May 12	36.12 S	Nov. 16	30.65 S
June 18, 1988	48.04 S	Dec. 17	38.31 S	June 16	30.19 S	Dec. 16	30.34 S
July 23	52.50 S	Jan. 29, 1987	38.44 S	July 15	29.28 S	Jan. 20, 1988	29.50 S
Aug. 13	66.28 S	Mar. 05	34.69 S	Aug. 11	36.69 S	Feb. 23	29.13 S
Sept. 18	53.24 S	17	33.90 S	Sept. 15	34.08 S	Mar. 21	28.83 S
		Highest	26	Mar. 14, 1962			
		Lowest	66.28	Aug. 13, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 40

Station number: 344000099523901 Local number: 02N-26W-12 AAAA 1

Location: Lat 34 40'00", long 99 52'39", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,802 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	30.28 S	Dec. 17, 1986	25.07 S	June 16, 1987	16.97 S	Dec. 16, 1987	17.65 S
July 16	34.39 S	Jan. 28, 1987	23.43 S	July 16	18.64 S	Jan. 20, 1988	16.94 S
Aug. 13	42.05 S	Mar. 04	22.14 S	Aug. 12	22.82 S	Feb. 25	17.82 S
Sept. 17	34.46 S	18	21.47 S	Sept. 16	19.50 S	Mar. 21	16.82 S
Oct. 17	30.59 S	Apr. 14	20.29 S	Oct. 14	18.46 S		
Nov. 13	27.46 S	May 12	22.79 S	Nov. 17	17.92 S		
		Highest	16.82 Mar. 21, 1988				
		Lowest	42.05 Aug. 13, 1986				

Index number on location map: 41

Station number: 343847099543801 Local number: 02N-26W-14 CCCC 1

Location: Lat 34 38'27", long 99 54'38", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,643 ft

Well depth: 66 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 20, 1986	45.94 S	Nov. 13, 1986	41.84 S	May 12, 1987	40.18 S	Dec. 16, 1987	35.83 S
June 18	41.53 S	Dec. 17	41.07 S	July 16	28.29 S	Jan. 20, 1988	34.11 S
July 23	43.39 S	Jan. 28, 1987	42.06 S	Aug. 11	29.93 S	Feb. 25	37.62 S
Aug. 13	44.23 S	Mar. 05	37.15 S	Sept. 16	32.93 S		
Sept. 18	46.89 S	18	38.92 S	Oct. 14	35.89 S		
Oct. 17	43.76 S	Apr. 14	39.82 S	Nov. 16	35.40 S		
		Highest	28.29 July 16, 1987				
		Lowest	46.89 Sept. 18, 1986				



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 42

Station number: 343855099544501 Local number: 02N-26W-15 AADD 1

Location: Lat 34 38'55", long 99 54'45", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,665 ft

Well depth: 130 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 10, 1954	72.11	May 17, 1960	80.10	July 13, 1965	96.35	Sept. 04, 1969	79.88
Mar. 20, 1956	76.85	June 21	70.20	26	95.97	Oct. 07	80.56
Apr. 20	78.36	July 19	71.55	Sept. 26	87.00	Nov. 18	81.11
May 22	78.12	Sept. 13	73.40	Oct. 12	88.98	Dec. 11	82.70
June 26	74.83	Oct. 26	61.45	Nov. 04	81.38	Jan. 26, 1970	83.17
July 24	77.78	Nov. 15	64.25	Jan. 04, 1966	84.22	Feb. 24	85.15
Aug. 28	80.32	Dec. 21	66.21	Apr. 19	87.10	Dec. 29	93.53
Sept. 18	81.61	Jan. 17, 1961	68.50	June 21	89.80	Jan. 07, 1975	76.20
Oct. 30	74.86	Feb. 14	69.47	July 12	90.78	Jan. 29, 1976	80.40
Nov. 27	81.72	Mar. 14	69.77	Sept. 13	78.09	Dec. 27	75.45
Dec. 18	82.36	Apr. 19	69.09	Oct. 19	80.59	Mar. 09, 1978	79.95
Jan. 23, 1957	83.07	May 17	69.81	Nov. 15	81.76	Mar. 13, 1979	85.60
Feb. 26	83.50	June 21	70.19	Dec. 13	83.02	Feb. 28, 1980	83.93
Apr. 04	84.05	July 12	68.65	Jan. 18, 1967	84.81	Mar. 11, 1981	89.78 S
May 07	72.40	Sept. 06	73.59	Feb. 16	85.18	Mar. 09, 1982	88.46 S
28	66.10	26	74.05	Mar. 16	86.99	Jan. 26, 1983	89.10 S
June 25	63.84	Oct. 24	74.65	Apr. 13	85.38	Jan. 16, 1984	77.76 S
Oct. 01	73.13	Nov. 14	75.14	May 16	89.02	Jan. 10, 1985	89.35 S
29	71.17	Dec. 05	75.51	June 15	89.40	Jan. 08, 1986	72.72 S
Nov. 19	72.40	Jan. 31, 1962	76.27	July 12	88.54	May 16	78.46 S
Dec. 17	73.52	Mar. 07	76.57	Aug. 15	90.00	June 18	76.41 S
Jan. 28, 1958	74.76	28	76.87	Sept. 14	91.15	July 23	77.22 S
Feb. 25	75.25	Apr. 25	68.55	Oct. 11	91.92	Aug. 12	78.18 S
Mar. 25	76.04	May 23	79.61	Nov. 16	92.80	Sept. 18	78.68 S
Apr. 22	76.23	June 27	76.69	Dec. 12	93.60	Oct. 17	75.32 S
May 20	74.35	Aug. 28	80.29	Jan. 30, 1968	94.52	Nov. 13	71.66 S
June 24	74.10	Oct. 07	78.08	Feb. 20	94.80	Dec. 17	71.02 S
July 29	71.66	16	79.25	Mar. 26	95.24	Jan. 28, 1987	71.65 S
Aug. 26	75.66	Nov. 13	59.25	Apr. 25	95.07	Mar. 05	68.71 S
Sept. 23	76.22	Jan. 08, 1963	80.29	June 05	89.76	18	67.94 S
Oct. 28	77.12	Feb. 03	81.07	19	89.87	Apr. 14	67.71 S
Nov. 19	77.57	Mar. 26	80.89	July 17	91.08	May 12	68.20 S
Jan. 08, 1959	78.64	Apr. 24	82.29	Aug. 15	89.83	June 16	60.16 S
27	78.86	May 21	85.16	Sept. 19	90.58	July 15	58.88 S
Feb. 25	79.20	June 18	80.05	Oct. 10	91.25	Aug. 11	61.13 S
Mar. 24	79.60	July 16	82.30	Nov. 14	92.40	Sept. 16	63.10 S
Apr. 21	81.00	Aug. 16	83.79	Dec. 10	93.12	Oct. 14	64.47 S
May 19	80.87	Nov. 23	86.13	Jan. 07, 1969	93.50	Nov. 16	65.57 S
June 29	78.25	Feb. 10, 1964	87.45	Feb. 04	94.03	Dec. 16	66.75 S
Sept. 22	81.48	Jan. 13, 1965	93.17	Mar. 11	94.53	Jan. 20, 1988	67.52 S
Oct. 20	81.87	Feb. 17	93.90	Apr. 09	94.93	Feb. 25	68.58 S
Nov. 19	81.82	Apr. 01	94.07	May 08	93.67	Mar. 21	68.79 S
Mar. 22, 1960	79.02	07	94.20	June 18	90.10		
Apr. 19	79.26	May 25	95.61	July 20	89.90		

Highest 58.88 July 15, 1987  
Lowest 96.35 July 13, 1965

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 43

Station number: 343908099562201 Local number: 02N-26W-16 BAAB 1

Location: Lat 34° 39' 08", long 99° 58' 22", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,648 ft

Well depth: 81 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 20, 1986	51.84	Nov. 13, 1986	45.45 S	May 12, 1987	39.01 S	Nov. 16, 1987	35.88 S
June 19	42.36	Dec. 17	44.18 S	June 16	34.13 S	Dec. 16	35.88 S
July 23	45.31	Jan. 29, 1987	43.11 S	July 15	33.89 S	Jan. 20, 1988	35.69 S
Aug. 13	47.19 S	Mar. 05	41.29 S	Aug. 11	34.53 S	Feb. 25	35.51 S
Sept. 18	48.96 S	18	40.63 S	Sept. 16	35.80 S	Mar. 21	35.26 S
Oct. 17	47.35 S	Apr. 14	39.63 S	Oct. 14	35.98 S		
Highest 33.89 July 15, 1987				Lowest 51.84 May 20, 1986			

Index number on location map: 44

Station number: 343860099561701 Local number: 02N-26W-18 ACBA 1

Location: Lat 34° 38' 56", long 99° 58' 17", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,667 ft

Well depth: 145 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 20, 1986	65.81 S	Oct. 17, 1986	60.14 S	Apr. 14, 1987	46.82 S	Oct. 13, 1987	45.60 S
June 19	58.72 S	Nov. 13	54.73	May 12	48.40 S	Nov. 16	44.73 S
July 23	61.52 S	Dec. 17	51.79 S	June 16	43.53 S	Jan. 20, 1988	43.77 S
Aug. 13	70.53 S	Jan. 29, 1987	50.30 S	Aug. 11	45.22 S	Feb. 23	43.40 S
Sept. 18	67.26 S	Mar. 05	48.45 S	Sept. 16	47.54 S	Mar. 21	43.12 S
Highest 43.12 Mar. 21, 1988				Lowest 70.53 Aug. 13, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 45

Station number: 343559099534901 Local number: 02N-26W-31 CBCD 1

Location: Lat 34 35'58", long 99 58'50", hydrologic unit 11120105

Aquifer: 313BLIN

Altitude of land-surface datum: 1,590 ft

Well depth: 150 ft

Remarks: Previously published as 02N-26W-31 CBC

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Nov. 16, 1950	31.51	July 29, 1958	30.50	May 21, 1963	34.95	Mar. 11, 1969	33.03
Mar. 20, 1952	33.95	Aug. 28	39.18	June 18	32.29	Apr. 09	32.63
Mar. 20, 1953	34.81	Sept. 23	38.22	Aug. 16	48.49	May 08	32.97
Oct. 20	35.32	Oct. 28	35.10	Nov. 23	34.53	June 18	33.63
Jan. 26, 1954	33.02	Nov. 19	33.80	Feb. 10, 1964	33.30	Sept. 04	36.33
Mar. 25	33.90	Jan. 08, 1959	32.90	Jan. 13, 1965	34.33	Oct. 07	34.27
Apr. 21	33.60	27	33.73	Feb. 17	35.02	Nov. 18	33.70
May 27	32.32	Feb. 24	33.50	Apr. 01	34.58	Dec. 11	33.52
June 23	32.48	Apr. 21	33.93	07	34.33	Jan. 26, 1970	33.14
Oct. 26	35.73	May 19	33.69	May 25	35.01	Feb. 24	33.08
Dec. 02	35.04	June 29	33.44	June 13	40.77	Dec. 29	36.10
Jan. 06, 1955	44.91	Sept. 22	46.45	July 26	35.01	Jan. 07, 1975	33.49
25	44.99	Oct. 20	34.92	Sept. 26	36.37	Jan. 29, 1976	32.71
Feb. 08	34.41	Nov. 19	34.62	Oct. 12	35.83	Dec. 28	33.17
22	34.98	Jan. 13, 1960	33.35	Nov. 04	34.71	Mar. 09, 1978	33.62
Mar. 22	34.42	Mar. 22	31.87	Jan. 04, 1966	33.80	Mar. 13, 1979	34.37
May 24	34.65	Apr. 19	35.14	Apr. 19	37.86	Feb. 28, 1980	34.06
June 23	27.90	May 17	41.20	June 21	34.10	Mar. 11, 1981	35.34 S
July 26	31.29	June 21	30.49	July 12	38.85	Mar. 09, 1982	34.55 S
Sept. 29	34.64	July 19	30.66	Sept. 13	34.22	Jan. 26, 1983	35.01 S
Oct. 25	32.93	Aug. 16	39.26	Oct. 19	31.52	Jan. 18, 1984	33.34 S
Nov. 29	32.87	Sept. 13	33.72	Nov. 15	32.18	Jan. 10, 1985	36.23 S
Dec. 22	32.35	Nov. 15	30.45	Dec. 13	32.20	Jan. 06, 1986	32.57 S
Jan. 31, 1956	32.18	Dec. 21	30.66	Jan. 18, 1967	32.56	May 16	33.62
Mar. 20	34.74	Jan. 17, 1961	30.35	Feb. 16	32.51	June 19	31.98 S
May 22	39.05	Feb. 14	30.33	Mar. 16	34.46	July 25	49.91 SR
June 26	32.81	Mar. 14	30.34	Apr. 13	37.69	Sept. 18	34.76 S
July 23	34.98	Apr. 19	31.18	May 16	33.09	Oct. 17	31.30 S
Sept. 18	47.00	May 17	30.96	June 15	32.81	Nov. 13	30.08
Oct. 30	35.70	June 21	30.59	July 12	33.71	Dec. 17	29.78 S
Nov. 27	34.89	July 12	30.60	Sept. 14	35.00	Jan. 29, 1987	31.59 S
Dec. 18	34.71	Sept. 06	33.36	Oct. 11	34.68	Mar. 05	29.01 S
Jan. 23, 1957	34.32	26	32.45	Nov. 16	34.37	18	28.89 S
Feb. 26	32.11	Oct. 24	34.98	Dec. 12	33.90	Apr. 14	29.12 S
Apr. 04	33.92	Nov. 21	33.62	Jan. 30, 1968	33.74	May 12	35.09 S
May 07	31.78	Dec. 05	32.23	Feb. 20	34.47	June 16	27.79 S
28	30.44	Jan. 31, 1962	31.58	Mar. 26	33.25	July 15	35.62 S
June 25	28.67	Mar. 07	31.64	Apr. 25	42.38	Aug. 11	35.98 S
Oct. 01	33.82	28	32.34	June 05	33.30	Sept. 15	32.32 S
29	32.82	May 23	32.91	19	32.34	Oct. 13	31.59 S
Nov. 19	32.55	June 27	31.23	July 17	32.52	Nov. 16	31.28 S
Dec. 17	32.30	Aug. 28	43.13	Aug. 15	43.60	Dec. 16	30.27 S
Jan. 28, 1958	32.20	Oct. 04	32.45	Sept. 19	34.47	Jan. 20, 1988	30.90 S
Feb. 25	32.02	16	32.26	Oct. 10	33.29	Feb. 23	30.81 S
Mar. 25	31.83	Nov. 13	27.40	Nov. 14	33.93	Mar. 22	30.49 S
Apr. 22	31.49	Jan. 08, 1963	31.22	Dec. 10	33.31		
May 20	31.10	Feb. 05	31.24	Jan. 07, 1969	32.10		
June 24	31.70	Mar. 26	32.16	Feb. 04	33.30		
		Highest	27.40	Nov. 13, 1962			
		Lowest	48.49	Aug. 16, 1963			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 46  
 Station number: 343547099580101 Local number: 02N-26W-31 DDDA 1  
 Location: Lat 34° 35' 44", long 99° 57' 54", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,599 ft  
 Well depth: 129 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	60.03	Aug. 07, 1986	70.72	Aug. 19, 1986	72.18	Oct. 17, 1986	58.91
July 17	61.99	12	65.33	Sept. 18	61.93	Nov. 13	57.70
		Highest	57.70	Nov. 13, 1986			
		Lowest	72.18	Aug. 19, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 47

Station number: 344015099594501 Local number: 02N-27W-01 CCBB 1

Location: Lat 34°40'13", long 99°59'58", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,680 ft

Well depth: 150 ft

Remarks: Previously published as 02N-27W-01 CCB

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1952	34.13	May 19, 1959	84.25	Oct. 12, 1965	120.43	July 20, 1969	105.03
Feb. 10, 1954	43.13	June 30	59.59	Nov. 04	89.91	Sept. 04	101.88
May 27	37.55	Oct. 20	88.08	Jan. 04, 1966	88.85	Oct. 07	87.29
Feb. 09, 1955	51.14	Nov. 19	83.87	Apr. 19	132.11	Nov. 18	83.39
23	51.20	Jan. 13, 1960	56.84	June 21	102.09	Dec. 11	80.55
Mar. 22	51.13	Mar. 22	58.08	July 12	137.19	Jan. 26, 1970	77.59
May 24	57.27	Apr. 19	83.48	Sept. 13	120.68	Feb. 24	78.14
June 23	50.80	May 17	86.04	Oct. 19	94.69	Jan. 07, 1975	78.89
26	49.13	June 21	57.18	Nov. 15	86.46	Jan. 29, 1976	84.67
Sept. 29	63.28	July 19	55.61	Dec. 13	86.50	Dec. 27	83.66
Oct. 25	57.25	Sept. 13	62.51	Jan. 18, 1967	88.07	Mar. 09, 1978	80.02
Nov. 29	54.28	Nov. 15	52.20	Feb. 16	88.91	Mar. 13, 1979	89.59
Dec. 22	52.99	Jan. 17, 1961	47.79	Mar. 16	91.10	Feb. 28, 1980	87.93
Jan. 31, 1958	51.88	Feb. 14	46.82	Apr. 13	99.20	Mar. 11, 1981	75.80 S
Feb. 21	51.82	Mar. 14	45.94	May 16	101.90	Mar. 09, 1982	74.80 S
Mar. 20	52.45	May 17	49.10	June 15	103.90	Jan. 26, 1983	73.13 S
Oct. 30	71.44	June 21	47.71	July 13	107.33	Jan. 10, 1985	80.26 S
Nov. 27	87.36	July 12	54.58	Aug. 15	98.75	Jan. 06, 1986	64.98 S
Dec. 18	65.84	Sept. 08	88.64	Sept. 14	108.50	May 15	65.25 S
Jan. 23, 1957	87.92	28	59.88	Oct. 11	100.44	June 18	57.12 S
Feb. 26	63.08	Oct. 24	58.41	Nov. 16	97.20	July 25	75.50 S
Apr. 04	82.97	Nov. 14	56.42	Dec. 12	97.00	Sept. 18	65.28 S
May 07	81.13	Dec. 05	53.94	Jan. 30, 1968	88.49	Oct. 17	58.25 S
28	55.67	Jan. 31, 1962	51.30	Feb. 20	86.03	Nov. 13	53.80 S
June 25	49.75	May 23	65.17	Mar. 26	83.40	Dec. 17	49.25 S
Oct. 01	82.55	June 27	80.57	Apr. 25	89.98	Jan. 29, 1987	47.89 S
Nov. 19	55.49	Oct. 04	88.30	June 05	73.60	Mar. 05	46.57 S
Dec. 17	53.85	Nov. 13	80.97	19	81.45	17	45.76 S
Jan. 28, 1958	52.71	Jan. 08, 1963	56.78	July 17	84.66	Apr. 14	44.89 S
Feb. 25	53.72	Feb. 05	55.78	Aug. 15	95.59	May 12	51.23 S
Mar. 25	51.57	June 18	88.83	Sept. 19	98.73	June 18	40.12 S
Apr. 22	51.29	Nov. 23	71.83	Oct. 10	92.10	July 15	40.45 S
May 20	51.31	Feb. 10, 1964	69.89	Nov. 14	91.01	Aug. 11	49.05 S
June 24	51.88	Jan. 13, 1965	84.05	Dec. 10	87.34	Sept. 16	42.85 S
July 29	52.36	Feb. 17	78.42	Jan. 07, 1969	84.43	Oct. 13	41.57 S
Sept. 23	53.82	Apr. 01	92.97	Feb. 04	82.51	Nov. 16	41.03 S
Nov. 19	57.83	May 25	93.71	Mar. 11	80.83	Dec. 16	40.99 S
Jan. 08, 1959	84.40	July 13	123.49	Apr. 09	79.66	Jan. 20, 1988	40.53 S
Feb. 24	83.29	28	94.28	May 08	83.16	Feb. 23	40.44 S
Apr. 21	87.42	Sept. 28	124.56	June 18	79.59	Mar. 21	40.35 S

Highest 34.13 May 15, 1952  
Lowest 137.19 July 12, 1966

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 48

Station number: 343630099595501 Local number: 02N-27W-36 BBCD 1

Location: Lat 34 36'21", long 99 59'53", hydrologic unit 11120105

Aquifer: 313BLIN

Altitude of land-surface datum: 1,628 ft

Well depth: 110 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	49.90	Nov. 13, 1986	48.03 S	May 12, 1987	61.63 S	Nov. 16, 1987	47.83 S
16	63.02	Dec. 17	47.64 S	June 16	48.43 S	Jan. 20, 1988	47.58 S
Aug. 12	53.51	Jan. 29, 1987	47.50 S	July 15	59.57 S	Feb. 23	47.62 S
19	64.28	Mar. 05	47.05 S	Aug. 11	60.14 S	Mar. 22	47.52 S
Sept. 18	50.76 S	18	47.09 S	Sept. 15	54.43 S		
Oct. 17	48.69 S	Apr. 14	47.17 S	Oct. 13	48.04 S		
Highest 46.43 June 16, 1987							
Lowest 64.28 Aug. 19, 1986							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 49

Station number: 344220099441801 Local number: 03N-24W-29 AAA 2

Location: Lat 34°42'35", long 99°44'18", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,526.6 ft

Well depth: 169 ft

Remarks: Also published as 03N-24W-29 AAA 1

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 07, 1954	83.18	Feb. 25, 1958	59.24	Oct. 03, 1962	70.83	Nov. 14, 1968	77.10
Feb. 02	85.30	Mar. 25	59.42	16	70.72	Dec. 10	76.89
Mar. 25	85.42	Apr. 22	59.45	Nov. 13	68.27	Jan. 02, 1969	76.37
Apr. 19	85.68	May 20	59.10	Jan. 08, 1963	67.25	Feb. 04	76.18
21	86.14	June 24	58.65	Feb. 05	67.09	Mar. 11	78.20
May 26	80.67	July 29	57.56	Mar. 26	64.60	Apr. 09	76.02
June 23	81.25	Aug. 26	56.68	Apr. 24	66.72	May 08	76.15
July 29	83.41	Sept. 23	57.23	May 21	69.70	June 18	67.72
Aug. 25	84.26	Oct. 28	58.04	June 18	67.70	July 20	69.40
Sept. 22	86.02	Nov. 19	58.74	July 15	67.98	Sept. 04	71.00
Oct. 25	86.22	Jan. 08, 1959	60.46	Aug. 16	71.25	Oct. 07	70.43
Dec. 02	87.79	27	60.52	Nov. 22	79.34	Nov. 18	68.80
Jan. 05, 1955	87.30	Feb. 24	60.02	Jan. 13, 1965	84.34	Dec. 11	67.00
25	87.36	Mar. 24	61.86	Feb. 17	83.29	Jan. 28, 1970	69.77
Feb. 09	67.25	Apr. 21	62.97	Apr. 02	84.66	Feb. 24	70.66
22	67.48	May 19	63.33	07	85.11	Dec. 29	84.80
Mar. 22	68.69	June 29	62.95	May 25	88.20	Jan. 07, 1975	33.96 Z
Apr. 19	65.68	July 21	61.07	July 29	92.14	Jan. 28, 1976	52.69
May 24	68.66	Aug. 25	64.86	Sept. 29	92.16	Dec. 27	62.85
June 23	63.32	Sept. 22	67.26	Oct. 12	89.40	Mar. 08, 1978	61.57
July 25	64.16	Oct. 29	67.23	Nov. 05	65.46	Mar. 13, 1979	65.70
Aug. 23	69.23	Nov. 19	67.30	Jan. 04, 1966	74.66	Feb. 28, 1980	69.63
Sept. 28	70.94	Jan. 26, 1960	66.30	Apr. 19	76.68	Mar. 11, 1981	75.12 S
Oct. 25	65.91	Mar. 22	63.28	June 21	77.60	Mar. 09, 1982	73.67 S
Nov. 29	65.61	Apr. 19	62.35	July 12	80.98	Jan. 26, 1983	72.06 S
Dec. 21	65.66	May 17	63.13	13	86.00	Jan. 16, 1984	64.55 S
Jan. 31, 1956	66.75	June 21	62.35	Sept. 13	83.29	Jan. 10, 1985	69.74 S
Feb. 21	68.15	July 19	61.26	Oct. 19	75.70	Jan. 06, 1986	50.26 S
Mar. 20	68.21	Sept. 13	62.79	Nov. 15	74.22	May 16	48.03 S
Apr. 24	71.56	Nov. 15	16.13	Dec. 13	76.24	June 20	47.39 S
May 22	71.74	Dec. 21	35.82	Jan. 17, 1967	76.66	July 25	45.95 S
June 26	67.98	Jan. 17, 1961	52.05	Feb. 16	77.10	Aug. 12	47.64 S
July 24	69.30	Feb. 14	52.50	Mar. 16	79.56	Sept. 18	43.47 S
Aug. 28	76.70	Mar. 14	47.40	Apr. 13	83.39	Oct. 15	15.45 S
Sept. 18	79.59	Apr. 19	16.33	May 16	84.59	Nov. 13	15.73 S
Oct. 30	74.30	May 17	18.00	June 15	85.23	Dec. 17	17.42 S
Nov. 27	72.34	June 21	43.53	July 12	88.17	Jan. 28, 1987	16.18 S
Dec. 18	72.20	July 12	46.15	Aug. 15	82.23	Feb. 25	16.06 S
Jan. 23, 1957	72.22	Aug. 01	53.14	Sept. 13	83.86	Mar. 18	15.45 S
Feb. 26	72.98	Sept. 06	59.32	Oct. 11	84.28	Apr. 16	16.57 S
Apr. 04	72.53	26	59.86	Nov. 15	84.85	May 12	17.73 S
May 07	63.00	Oct. 24	59.87	Dec. 12	84.27	June 16	14.55 S
28	15.47	Nov. 14	59.55	Jan. 30, 1968	83.89	July 14	14.97 S
June 25	16.22	Dec. 05	59.45	Mar. 26	83.16	Aug. 11	16.77 S
July 23	19.14	Jan. 31, 1962	59.53	Apr. 25	82.95	Sept. 15	19.36 S
Aug. 27	45.32	Mar. 07	60.34	June 05	80.03	Oct. 13	20.30 S
Oct. 01	55.77	28	61.42	19	81.13	Nov. 16	29.91 S
29	56.35	Apr. 25	63.80	July 17	79.25	Dec. 30	31.45 S
Nov. 19	57.85	May 23	64.65	Aug. 15	78.98	Jan. 25, 1988	31.94 S
Dec. 17	58.33	June 27	64.84	Sept. 19	77.41	Feb. 22	24.35 S
Jan. 28, 1958	58.94	Aug. 28	69.59	Oct. 10	77.69	Mar. 21	17.50 S
Highest 14.55 June 16, 1987							
Lowest 92.16 Sept. 29, 1965							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 50

Station number: 344808099494201 Local number: 03N-25W-04 AAB 1

Location: Lat 34°46'08", long 99°49'42", hydrologic unit 11130101

Aquifer: 313DGCK

Altitude of land-surface datum: 1,690 ft

Well depth: 117 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 22, 1986	14.44 S	Jan. 28, 1987	10.20 S	July 14, 1987	6.10 S	Jan. 26, 1988	9.39 S
June 20	11.57 S	Feb. 25	9.02 S	Aug. 11	8.02 S	Feb. 23	9.15 S
July 24	12.81 S	Mar. 18	6.81 S	Sept. 16	9.50 S	Mar. 22	10.10 S
Oct. 15	11.52 S	Apr. 16	6.29 S	Oct. 14	10.31 S		
Nov. 13	11.00 S	May 12	6.96 S	Nov. 17	9.92 S		
Dec. 17	10.43 S	June 18	5.28 S	Dec. 30	9.14 S		
Highest 5.28 June 18, 1987							
Lowest 14.44 May 22, 1986							

Index number on location map: 51

Station number: 344402099483201 Local number: 03N-25W-18 ADCA 1

Location: Lat 34°44'02", long 99°49'35", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,882 ft

Well depth: 392 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	85.87 S	Dec. 17, 1986	71.62 S	Aug. 11, 1987	65.42 S	Feb. 23, 1988	67.26 S
July 15	82.95	Apr. 16, 1987	66.10 S	Sept. 16	66.33 S	Mar. 22	67.30 S
Sept. 18	85.75	May 12	67.34 S	Oct. 14	66.33 S		
Oct. 15	80.53	June 18	64.95 S	Nov. 17	66.36 S		
Nov. 13	79.75	July 14	63.83 S	Jan. 26, 1988	67.20 S		
Highest 63.83 July 14, 1987							
Lowest 85.87 June 11, 1986							

Index number on location map: 52

Station number: 344148099514001 Local number: 03N-25W-30 DDC 1

Location: Lat 34°41'48", long 99°51'40", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,612 ft

Well depth: 150 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	26.67	Dec. 17, 1986	18.06 S	June 16, 1987	9.38 S	Jan. 26, 1988	14.20 S
July 15	26.95	Jan. 28, 1987	16.57 S	July 14	11.20 S	Feb. 23	14.20 S
Aug. 05	49.08	Feb. 25	14.54 S	Sept. 16	18.17 S	Mar. 22	13.58 S
Sept. 18	37.84 S	Mar. 18	12.80 S	Oct. 14	18.32 S		
Oct. 15	26.84 S	Apr. 16	12.54 S	Nov. 17	15.20 S		
Nov. 13	20.42 S	May 12	15.75 S	Dec. 30	14.25 S		
Highest 9.38 June 16, 1987							
Lowest 49.08 Aug. 05, 1986							



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 53

Station number: 344144099521901 Local number: 03N-25W-31 BABB 1

Location: Lat 34 41'44", long 99 52'19", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,605 ft

Well depth: 78.6 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	25.20	Nov. 13, 1986	11.98	Oct. 14, 1987	8.47 S	Mar. 22, 1988	5.28 S
June 18	17.96	Dec. 17	9.65 S	Nov. 17	7.30 S		
Aug. 13	43.60	Apr. 16, 1987	4.20 S	Jan. 26, 1988	6.20 S		
Sept. 18	29.50	May 12	6.95 S	Feb. 23	6.17 S		
		Highest	4.20	Apr. 16, 1987			
		Lowest	43.60	Aug. 13, 1986			

Index number on location map: 54

Station number: 344104099521201 Local number: 03N-25W-31 CDBA 1

Location: Lat 34 41'04", long 99 52'12", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,606 ft

Well depth: 160 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	15.49 S	Nov. 13, 1986	8.67 S	Sept. 16, 1987	7.85 S	Feb. 23, 1988	4.25 S
July 09	15.16 S	Dec. 17	7.90 S	Oct. 14	5.56 S	Mar. 22	2.67 S
15	16.35 S	Apr. 16, 1987	2.42 S	Nov. 17	4.36 S		
Sept. 18	27.73 S	July 14	2.68 S	Dec. 30	3.27 S		
Oct. 15	17.35 S	Aug. 11	6.63 S	Jan. 26, 1988	3.38 S		
		Highest	2.42	Apr. 16, 1987			
		Lowest	27.73	Sept. 18, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 55

Station number: 344145099512501 Local number: 03N-25W-32 BBBB 1

Location: Lat 34 41'40", long 99 51'28", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,617 ft

Well depth: 160 ft

Remarks: Previously published as 03N-25W-32 BBB

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 20, 1953	44.64	Sept. 13, 1960	43.57	Sept. 13, 1966	92.22	Feb. 24, 1970	56.30
Mar. 20, 1956	42.50	Oct. 25	38.97	Oct. 19	81.72	Dec. 29	84.14
Apr. 24	34.85	Nov. 15	31.72	Nov. 15	74.10	Jan. 07, 1975	50.96
Nov. 27	57.95	Jan. 17, 1961	29.69	Dec. 13	72.13	Jan. 29, 1976	39.69
Dec. 18	55.28	Feb. 14	28.92	Jan. 18, 1967	65.89	Dec. 27	41.23
Jan. 23, 1957	53.69	Mar. 14	30.25	Feb. 16	68.84	Mar. 09, 1978	39.86
Feb. 26	52.74	June 21	29.46	Mar. 16	71.63	Mar. 13, 1979	47.76
Apr. 04	51.63	July 12	33.14	Apr. 13	86.95	Feb. 28, 1980	46.95
May 07	50.78	Sept. 06	42.38	May 16	82.43	Mar. 11, 1981	63.36 S
28	44.35	26	38.42	June 15	86.71	Mar. 09, 1982	65.52 S
June 25	36.10	Oct. 24	39.02	July 12	84.75	Jan. 26, 1983	59.83 S
Oct. 01	50.67	Nov. 14	35.98	Oct. 11	92.10	Jan. 16, 1984	51.62 S
29	44.20	Dec. 05	34.61	Nov. 16	86.20	Jan. 10, 1985	70.84 S
Nov. 19	41.69	Jan. 31, 1962	32.47	Dec. 12	82.60	Jan. 06, 1986	42.89 S
Dec. 17	39.47	Mar. 07	33.10	Jan. 30, 1968	78.08	May 15	43.27 S
Jan. 28, 1958	38.04	28	38.33	Feb. 20	75.30	June 18	37.21 S
Feb. 25	43.09	May 23	49.63	Mar. 26	72.10	July 24	48.69 S
Mar. 25	36.60	June 27	40.67	Apr. 25	74.38	Aug. 13	66.14 S
Apr. 22	35.94	Oct. 04	54.02	June 05	74.06	Sept. 18	47.80 S
May 20	35.80	16	50.50	19	71.78	Oct. 15	37.40 S
June 24	35.20	Nov. 13	45.20	Sept. 19	83.90	Nov. 13	30.80 S
July 29	33.81	Feb. 05, 1963	45.31	Oct. 10	80.20	Dec. 17	29.34 S
Sept. 23	34.13	May 21	66.59	Nov. 14	73.42	Jan. 28, 1967	28.17 S
Oct. 28	41.54	June 18	55.27	Dec. 10	71.40	Feb. 25	28.99 S
Nov. 19	40.90	July 16	59.30	Jan. 07, 1969	67.90	Mar. 18	25.00 S
Jan. 08, 1959	39.18	Nov. 23	58.02	Feb. 04	66.10	Apr. 16	24.53 S
27	38.43	Feb. 10, 1964	58.19	Mar. 11	63.48	May 12	27.06 S
Feb. 24	38.59	Jan. 13, 1965	67.57	Apr. 09	61.93	June 16	24.92 S
Mar. 24	41.14	Feb. 17	65.26	May 08	62.08	July 14	23.63 S
Apr. 21	48.49	May 25	81.55	June 18	58.33	Sept. 16	29.20 S
May 19	48.60	Sept. 29	97.11	July 20	67.50	Oct. 14	27.40 S
Sept. 22	62.70	Oct. 12	93.35	Sept. 04	78.34	Nov. 17	26.53 S
Oct. 20	51.30	Nov. 04	83.89	Oct. 07	65.80	Dec. 30	25.66 S
Nov. 19	47.03	Jan. 04, 1966	69.11	Nov. 18	64.48	Jan. 26, 1968	25.75 S
June 21, 1960	36.83	Apr. 19	84.26	Dec. 11	57.70	Feb. 23	25.68 S
July 19	35.89	June 21	79.50	Jan. 26, 1970	56.00	Mar. 22	25.03 S

Highest 23.63 July 14, 1967

Lowest 97.11 Sept. 29, 1965

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 56

Station number: 344431099532001 Local number: 03N-26W-12 CDBC 1

Location: Lat 34 44'31", long 99 53'20", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,659 ft

Well depth: 121.6 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	68.81	Sept. 18, 1986	82.93	June 16, 1987	44.66 S	Oct. 14, 1987	46.83 S
June 20	58.88	Oct. 15	59.88	July 14	42.66 S	Nov. 17	46.60 S
July 24	82.68	Nov. 13	47.62	Aug. 11	61.23 S	Jan. 26, 1988	46.83 S
Aug. 18	91.38	May 12, 1987	55.30 S	Sept. 18	53.90 S	Feb. 23	47.31 S
		Highest	42.66	July 14, 1987			
		Lowest	91.38	Aug. 18, 1986			

Index number on location map: 57

Station number: 344422099552801 Local number: 03N-26W-15 BABB 1

Location: Lat 34 44'22", long 99 55'28", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,670 ft

Well depth: 214 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 29, 1986	68.29 S	Nov. 13, 1986	47.10 S	May 12, 1987	41.68 S	Nov. 17, 1987	41.95 S
June 20	57.71 S	Dec. 17	45.05 S	June 16	38.22 S	Dec. 30	40.95 S
July 24	66.11 S	Jan. 28, 1987	44.17 S	July 14	37.38 S	Jan. 26, 1988	42.30 S
Aug. 18	72.88 S	Feb. 25	43.66 S	Aug. 11	46.46 S	Feb. 23	42.52 S
Sept. 18	66.47 S	Mar. 18	40.52 S	Sept. 16	43.92 S	Mar. 22	42.68 S
Oct. 15	55.00 S	Apr. 16	40.15 S	Oct. 14	45.70 S		
		Highest	37.38	July 14, 1987			
		Lowest	72.88	Aug. 18, 1986			

Index number on location map: 58

Station number: 344258099574401 Local number: 03N-26W-20 CBA 1

Location: Lat 34 42'58", long 99 57'44", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,680 ft

Well depth: 220 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	65.91 S	Dec. 17, 1986	73.49 S	May 12, 1987	72.02 S	Jan. 26, 1988	69.91 S
July 15	85.08 S	Mar. 18, 1987	68.15 S	June 16	64.46 S	Feb. 23	69.76 S
Nov. 13	75.07 S	Apr. 16	65.74 S	Nov. 17	70.94 S	Mar. 22	69.14 S
		Highest	64.46	June 16, 1987			
		Lowest	85.08	July 15, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 59

Station number: 344244099673901 Local number: 03N-26W-20 CCDA 1

Location: Lat 34 42'44", long 99 57'39", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,674 ft

Well depth: 141.5 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	84.64	Nov. 13, 1986	28.87	May 12, 1987	64.13 S	Oct. 14, 1987	65.39 S
June 18	77.75	Dec. 17	10.74 S	June 16	56.13 S	Nov. 17	64.38 S
July 23	91.35	Jan. 28, 1987	9.97 S	July 14	58.04 S	Jan. 28, 1988	63.35 S
Aug. 13	99.01	Apr. 16	62.28 S	Aug. 11	75.60 S	Feb. 23	63.28 S
Sept. 18	87.25	May 11	75.60 S	Sept. 16	68.61 S	Mar. 22	62.65 S
Highest 9.97 Jan. 28, 1987							
Lowest 99.01 Aug. 13, 1986							

Index number on location map: 60

Station number: 344235099630001 Local number: 03N-26W-25 ABA 1

Location: Lat 34 42'35", long 99 53'00", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,640 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	46.35	Nov. 13, 1986	39.36	Apr. 15, 1987	32.16 S	Oct. 13, 1987	36.38 S
July 15	48.66	Dec. 17	37.28 S	May 12	37.20 S	Nov. 17	34.59 S
Aug. 05	74.17	Jan. 29, 1987	36.06 S	June 16	27.28 S	Jan. 20, 1988	33.33 S
Sept. 18	58.62 S	Mar. 04	33.05 S	July 15	32.62 S	Feb. 25	34.00 S
Oct. 16	45.82	17	30.98 S	Aug. 12	44.18 S	Mar. 21	30.29 S
Highest 27.28 June 16, 1987							
Lowest 74.17 Aug. 05, 1986							

Index number on location map: 61

Station number: 344228099633201 Local number: 03N-26W-25 BBCE 1

Location: Lat 34 42'28", long 99 53'32", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,625 ft

Well depth: 112.9 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	44.18	Nov. 13, 1986	29.87	May 12, 1987	25.69 S	Nov. 17, 1987	29.75 S
June 18	36.51	Dec. 17	27.91 S	June 16	19.04 S	Dec. 18	30.38 S
July 24	50.89	Jan. 29, 1987	26.85 S	July 15	25.11 S	Jan. 20, 1988	24.73 S
Aug. 13	64.66	Mar. 05	23.81 S	Aug. 12	39.13 S	Feb. 25	24.80 S
Sept. 18	48.96	17	20.35 S	Sept. 15	31.19 S	Mar. 21	28.24 S
Oct. 16	36.29	Apr. 15	22.74 S	Oct. 13	32.30 S		
Highest 19.04 June 16, 1987							
Lowest 64.66 Aug. 13, 1986							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 62

Station number: 344228099533202. Local number: 03N-26W-25 BBGD 2

Location: Lat 34 42'28", long 99 53'32", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,625 ft

Well depth: 160 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	40.60	July 24, 1986	47.30	Sept. 18, 1986	45.37	Nov. 13, 1986	26.42
June 18	32.92	Aug. 13	61.14	Oct. 16	32.65		
		Highest	26.42	Nov. 13, 1986			
		Lowest	61.14	Aug. 13, 1986			

Index number on location map: 63

Station number: 344148099530801. Local number: 03N-26W-25 CDDD 1

Location: Lat 34 41'48", long 99 53'08", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,620 ft

Well depth: 101.9 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 18, 1986	26.13	Dec. 17, 1986	17.91 S	June 16, 1987	8.95 S	Dec. 16, 1987	14.46 S
July 24	37.34	Jan. 29, 1987	16.54 S	July 15	10.90 S	Jan. 20, 1988	13.92 S
Aug. 13	51.55	Mar. 06	13.61 S	Aug. 12	20.89 S	Feb. 25	13.71 S
Sept. 18	38.93	17	12.35 S	Sept. 15	18.16 S	Mar. 21	13.24 S
Oct. 16	26.79	Apr. 15	12.34 S	Oct. 13	16.41 S		
Nov. 13	20.41	May 12	15.41 S	Nov. 18	14.72 S		
		Highest	8.95	June 16, 1987			
		Lowest	51.55	Aug. 13, 1986			

Index number on location map: 64

Station number: 344234099535001. Local number: 03N-26W-26 AABD 1

Location: Lat 34 42'37", long 99 53'54", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,640 ft

Well depth: 146 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	32.45	Dec. 17, 1986	33.91 S	June 16, 1987	25.48 S	Dec. 16, 1987	32.56 S
July 15	46.50	Jan. 29, 1987	33.43 S	July 15	27.33 S	Jan. 20, 1988	32.27 S
Aug. 05	74.02	Mar. 06	30.22 S	Aug. 12	47.78 S	Feb. 25	32.52 S
Sept. 18	56.20	17	26.01 S	Sept. 15	29.92 S	Mar. 21	32.14 S
Oct. 16	42.29	Apr. 15	29.38 S	Oct. 13	33.19 S		
Nov. 13	35.37	May 12	33.22 S	Nov. 17	32.67 S		
		Highest	25.48	June 16, 1987			
		Lowest	74.02	Aug. 05, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 65

Station number: 344139099573101 Local number: 03N-26W-32 BABD 1

Location: Lat 34 41'39", long 99 57'31", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,649 ft

Well depth: 68.5 ft. Original well depth was 105 ft.

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 18, 1986	52.20	Dec. 17, 1986	43.52 S	Sept. 16, 1987	43.18 S	Feb. 25, 1988	37.69 S
July 24	62.61	Mar. 05, 1987	39.18 S	Oct. 13	39.84 S	Mar. 21	38.51 S
Sept. 18	80.09	Apr. 15	38.02 S	Nov. 16	38.52 S		
Oct. 17	55.62	June 16	34.22 S	Dec. 16	38.11 S		
Nov. 13	45.71	Aug. 12	50.39 S	Jan. 20, 1988	37.44 S		
Highest 34.22 June 16, 1987				Lowest 80.09 Sept. 18, 1986			

Index number on location map: 66

Station number: 344120099570001 Local number: 03N-26W-32 DABA 1

Location: Lat 34 41'20", long 99 57'00", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,634 ft

Well depth: 280 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 11, 1986	40.05	Apr. 15, 1987	25.63 S	Sept. 16, 1987	30.68 S	Feb. 25, 1988	24.62 S
July 16	44.68	May 12	26.39 S	Oct. 13	29.68 S	Mar. 22	24.57 S
Aug. 13	65.19 S	June 16	22.03 S	Nov. 16	26.12 S		
Mar. 04, 1987	26.87 S	July 15	26.05 S	Dec. 16	25.42 S		
17	25.58 S	Aug. 12	37.06 S	Jan. 20, 1988	24.51 S		
Highest 22.03 June 16, 1987				Lowest 65.19 Aug. 13, 1986			

Index number on location map: 67

Station number: 344122099564001 Local number: 03N-26W-33 BCDC 1

Location: Lat 34 41'22", long 99 56'40", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,632 ft

Well depth: 119 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	43.92 S	Oct. 17, 1986	36.62 S	Apr. 15, 1987	22.55 S	Jan. 20, 1988	22.53 S
June 18	37.60 S	Nov. 13	26.66 S	May 12	26.19 S	Feb. 25	22.27 S
July 24	46.79 S	Dec. 17	28.82 S	June 16	19.53 S	Mar. 21	21.79 S
Aug. 13	62.80 S	Jan. 29, 1987	27.42 S	Oct. 13	26.15 S		
Sept. 18	46.99 S	Mar. 05	24.72 S	Nov. 16	23.75 S		
Highest 19.53 June 16, 1987				Lowest 62.80 Aug. 13, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 68

Station number: 344119099555301 Local number: 03N-26W-33 DAAB 1

Location: Lat 34° 41' 19", long 99° 55' 53", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,630 ft

Well depth: 89 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 15, 1986	41.54	Nov. 13, 1986	28.14 S	June 16, 1987	10.82 S	Dec. 16, 1987	22.19 S
June 18	34.96	Dec. 17	26.13 S	July 15	13.47 S	Jan. 20, 1988	21.55 S
July 24	46.26	Jan. 29, 1987	24.78 S	Aug. 12	32.55 S	Feb. 25	21.34 S
Aug. 13	60.87	Mar. 05	21.73 S	Sept. 16	26.98 S	Mar. 21	20.93 S
Sept. 18	48.09	Apr. 16	20.72 S	Oct. 13	23.93 S		
Oct. 17	34.31	May 12	23.60 S	Nov. 16	22.63 S		
		Highest	13.47	July 15, 1987			
		Lowest	60.87	Aug. 13, 1986			

Index number on location map: 69

Station number: 344118099563001 Local number: 03N-26W-33 DAAD 1

Location: Lat 34° 41' 07", long 99° 55' 47", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,635 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	33.20	Nov. 13, 1986	26.21 S	May 12, 1987	21.71 S	Nov. 16, 1987	20.67 S
July 10	44.54 S	Dec. 17	24.24 S	June 16	14.92 S	Dec. 16	20.31 S
Aug. 06	64.41 S	Jan. 29, 1987	22.86 S	July 15	22.21 S	Jan. 20, 1988	19.68 S
12	64.81 S	Mar. 05	19.81 S	Aug. 12	38.21 S	Feb. 25	19.50 S
Sept. 18	46.20	17	19.03 S	Sept. 16	25.02 S	Mar. 21	18.94 S
Oct. 17	32.43 S	Apr. 15	18.81 S	Oct. 13	19.98 S		
		Highest	14.92	June 16, 1987			
		Lowest	64.81	Aug. 12, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 70

Station number: 344141099542701 Local number: 03N-26W-35 BABC 1

Location: Lat 34° 41' 41", long 99° 54' 27", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,638 ft

Well depth: 72.2 ft. Original well depth was 125 ft.

Remarks: Previously published as 03N-26W-35 BAB

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 28, 1953	45.0	Feb. 08, 1955	51.18 S	July 24, 1986	59.22	June 16, 1987	30.19 S
Jan. 06, 1954	52.14 S	22	51.32 S	Aug. 13	75.40	July 15	31.90 S
25	51.38 S	Mar. 23	55.99 S	Sept. 18	61.71	Aug. 11	44.58 S
Feb. 09	47.79 S	May 24	61.72 S	Oct. 17	48.03	Sept. 15	40.77 S
Apr. 21	50.76 S	June 23	55.72 S	Nov. 13	41.70	Oct. 13	37.68 S
May 27	47.89 S	July 26	73.03 S	Dec. 17	39.63 S	Nov. 16	36.29 S
July 29	50.83 S	Oct. 25	69.50 S	Jan. 29, 1987	38.38 S	Dec. 16	35.92 S
Sept. 23	64.27 S	Nov. 29	57.87 S	Mar. 05	35.19 S	Jan. 20, 1988	35.29 S
Oct. 26	58.34 S	Dec. 12	55.47 S	17	34.42 S	Feb. 25	35.03 S
Dec. 02	53.13 S	May 22, 1986	55.86	Apr. 15	34.16 S	Mar. 21	34.50 S
Jan. 25, 1955	51.38 S	June 18	48.45	May 12	36.98 S		
Highest 30.19 June 16, 1987							
Lowest 75.40 Aug. 13, 1986							

Index number on location map: 71

Station number: 344113099533201 Local number: 03N-26W-36 CBBB 1

Location: Lat 34° 41' 17", long 99° 53' 37", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,637 ft

Well depth: 72 ft. Original well depth was 175 ft.

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 29, 1986	54.69	Nov. 12, 1986	45.39	May 12, 1987	39.15 S	Nov. 16, 1987	38.44 S
June 18	49.78	Dec. 17	41.42 S	June 16	32.67 S	Dec. 16	38.09 S
July 24	58.38	Jan. 29, 1987	40.25 S	July 15	34.80 S	17	41.42 S
Aug. 13	73.87	Mar. 04	39.42 S	Aug. 11	44.75 S	Jan. 20, 1988	37.29 S
Sept. 18	62.92	17	38.08 S	Sept. 15	42.07 S	Feb. 25	37.36 S
Oct. 16	50.61	Apr. 15	36.17 S	Oct. 13	39.58 S	Mar. 21	36.79 S
Highest 32.67 June 16, 1987							
Lowest 73.87 Aug. 13, 1986							



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 72

Station number: 344058099524801 Local number: 03N-28W-38 DDDC 1

Location: Lat 34 40'54", long 99 52'44", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,619 ft

Well depth: 160 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	31.75 S	Nov. 12, 1986	26.07 S	May 12, 1987	23.25 S	Nov. 16, 1987	19.66 S
July 18	31.87	Dec. 17	23.35 S	June 16	15.31 S	Dec. 17	19.81 S
Aug. 05	49.43	Jan. 28, 1987	21.48 S	July 15	19.77 S	Jan. 20, 1988	18.77 S
12	56.21	Mar. 04	19.18 S	Aug. 11	24.60 S	Feb. 25	18.82 S
Sept. 18	43.56 S	17	18.14 S	Sept. 15	19.13 S	Mar. 21	18.11 S
Oct. 16	32.33 S	Apr. 15	17.88 S	Oct. 13	20.96 S		
Highest 15.31 June 16, 1987				Lowest 56.21 Aug. 12, 1986			

Index number on location map: 73

Station number: 344758099442601 Local number: 04N-24W-20 DDC 1

Location: Lat 34 47'58", long 99 44'28", hydrologic unit 11120202

Aquifer: 313DGCK

Altitude of land-surface datum: 1,700 ft

Well depth: 124.6 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 29, 1986	88.98	Oct. 15, 1986	86.48 S	Apr. 16, 1987	77.16 S		
June 20	87.25	Nov. 13	84.61 S	May 12	78.27 S		
July 24	86.07	Dec. 17	84.64 S	June 16	81.93 S		
Highest 77.16 Apr. 16, 1987				Lowest 88.98 May 29, 1986			

Index number on location map: 74

Station number: 344836099511601 Local number: 04N-25W-20 BACB 1

Location: Lat 34 48'36", long 99 51'16", hydrologic unit 11120202

Aquifer: 110SFRT

Altitude of land-surface datum: 1,750 ft

Well depth: 9.8 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 22, 1986	7.09	Nov. 13, 1986	6.88 S	June 16, 1987	7.12 S	Jan. 26, 1988	7.50 S
June 20	6.98	Dec. 17	6.90 S	July 14	9.32 S	Feb. 23	8.32 S
July 24	7.41	Feb. 25, 1987	7.17 S	Aug. 11	7.36 S	Mar. 22	7.27 S
Aug. 18	7.32	Mar. 18	6.16 S	Sept. 16	7.28 S		
Sept. 18	7.20	Apr. 16	7.13 S	Oct. 14	7.25 S		
Oct. 15	6.92	May 12	7.32 S	Nov. 17	7.22 S		
Highest 6.16 Mar. 18, 1987				Lowest 9.32 July 14, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 75

Station number: 344831099512401 Local number: 04N-25W-20 BBDC 1

Location: Lat 34 48'31", long 99 51'24", hydrologic unit 11120202

Aquifer: 110SFRT

Altitude of land-surface datum: 1,800 ft

Well depth: 110 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 22, 1986	60.09	Nov. 13, 1986	60.75	June 16, 1987	60.46 S	Jan. 26, 1988	60.30 S
June 20	60.91	Dec. 17	60.62 S	July 14	60.52 S	Feb. 23	60.41 S
July 24	60.98	Feb. 25, 1987	60.63 S	Aug. 11	60.25 S	Mar. 22	60.36 S
Aug. 18	61.09	Mar. 18	60.58 S	Sept. 16	60.42 S		
Sept. 18	60.02	Apr. 16	60.52 S	Oct. 14	60.40 S		
Oct. 15	60.88	May 12	60.50 S	Nov. 17	60.30 S		
Highest 60.02 Sept. 18, 1986							
Lowest 61.09 Aug. 18, 1986							

Index number on location map: 76

Station number: 344755099494001 Local number: 04N-25W-21 DDC 1

Location: Lat 34 47'55", long 99 49'40", hydrologic unit 11120202

Aquifer: 110SFRT

Altitude of land-surface datum: 1,829 ft

Well depth: 70 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 24, 1987	41.18 S	Sept. 16, 1987	38.19 S	Dec. 30, 1987	37.87 S	Mar. 22, 1988	37.59 S
June 17	40.58 S	Oct. 14	37.90 S	Jan. 26, 1988	37.81 S		
Aug. 11	38.11 S	Nov. 17	37.75 S	Feb. 23	37.83 S		
Highest 37.59 Mar. 22, 1988							
Lowest 41.18 Apr. 24, 1987							

Index number on location map: 77

Station number: 344749099503502 Local number: 04N-25W-29 AAA 2

Location: Lat 34 47'49", long 99 50'35", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,798.4 ft

Well depth: 23 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Dec. 30, 1953	18.50 S	Apr. 20, 1955	20.20	Dec. 17, 1986	12.69 S	Aug. 11, 1987	12.50 S
Apr. 21, 1954	18.40	June 22	19.40	Jan. 20, 1987	12.78 S	Sept. 16	12.46 S
June 23	18.40	June 20, 1986	14.88 S	Feb. 25	12.24 S	Oct. 14	11.74 S
Aug. 25	20.30	July 24	15.04 S	Mar. 18	11.63 S	Nov. 17	12.56 S
Sept. 22	20.8	Aug. 18	15.34 S	Apr. 16	12.48 S	Dec. 30	12.30 S
Oct. 27	19.10	Sept. 18	14.50 S	May 12	12.36 S	Jan. 26, 1988	12.16 S
Jan. 05, 1955	20.60	Oct. 15	13.56 S	June 16	11.09 S	Feb. 23	12.01 S
Feb. 09	20.40	Nov. 13	12.62 S	July 14	11.73 S	Mar. 22	11.49 S
Highest 11.09 June 16, 1987							
Lowest 20.8 Sept. 22, 1954							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 78

Station number: 345039099544401 Local number: 04N-26W-02 CCBB 1

Location: Lat 34°50'39", long 99°54'44", hydrologic unit 11120202

Aquifer: 111SFRR

Altitude of land-surface datum: 1724 ft

Well depth: 22 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 04, 1987	6.49 S	Oct. 15, 1987	6.36 S	Dec. 29, 1987	5.33 S	Feb. 24, 1988	5.66 S
17	6.12 S	Nov. 18	5.97 S	Jan. 27, 1988	5.47 S	Mar. 23	5.40 S
		Highest	5.33	Dec. 29, 1987			
		Lowest	6.49	Sept. 04, 1987			

Index number on location map: 79

Station number: 345037099544401 Local number: 04N-26W-02 CCBC 1

Location: Lat 34°50'37", long 99°54'44", hydrologic unit 11120202

Aquifer: 111SFRR

Altitude of land-surface datum: 1,727 ft

Well depth: 18 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 01, 1987	6.43 S	Oct. 15, 1987	6.15 S	Dec. 29, 1987	5.00 S	Feb. 24, 1988	5.09 S
17	6.06 S	Nov. 18	5.62 S	Jan. 27, 1988	4.80 S	Mar. 23	4.64 S
		Highest	4.64	Mar. 23, 1988			
		Lowest	6.43	Sept. 01, 1987			

Index number on location map: 80

Station number: 345031099544501 Local number: 04N-26W-03 DDDD 1

Location: Lat 34°50'31", long 99°54'45", hydrologic unit 11120202

Aquifer: 313VVCR

Altitude of land-surface datum: 1,755 ft

Well depth: 230 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Sept. 03, 1987	139.28 SR	Oct. 15, 1987	33.38 S	Dec. 29, 1987	26.40 S	Feb. 24, 1988	25.80 S
17	64.65 SR	Nov. 18	27.84 S	Jan. 27, 1988	25.93 S	Mar. 23	25.60 S
		Highest	25.60	Mar. 23, 1988			
		Lowest	139.28	Sept. 03, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 81

Station number: 344849099541401 Local number: 04N-26W-14 CDDA 1

Location: Lat 34 48'49", long 99 54'14", hydrologic unit 11120202

Aquifer: 110SFRT

Altitude of land-surface datum: 1,874 ft

Well depth: 52.2 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 10, 1954	45.80	June 22, 1955	47.30	Dec. 17, 1986	47.83 S	Aug. 11, 1987	45.78 S
June 23	46.80	May 22, 1986	50.09	Jan. 28, 1987	47.15 S	Sept. 18	45.60 S
Aug. 25	46.80	June 20	50.45	Feb. 25	47.49 S	Oct. 14	45.35 S
Sept. 22	47.60	July 24	49.20	Mar. 18	47.55 S	Nov. 18	45.20 S
Oct. 27	46.80	Aug. 18	49.80	Apr. 18	46.35 S	Dec. 29	45.18 S
Jan. 05, 1955	46.90	Sept. 18	49.50	May 12	46.26 S	Jan. 26, 1988	45.20 S
Feb. 09	47.00	Oct. 15	48.80	June 16	46.10 S	Feb. 23	45.25 S
Apr. 20	47.40	Nov. 13	48.50	July 14	46.09 S	Mar. 22	45.22 S
Highest 45.18 Dec. 29, 1987							
Lowest 50.45 June 20, 1986							

Index number on location map: 82

Station number: 344844099584901 Local number: 04N-26W-19 BBBA 1

Location: Lat 34 48'44", long 99 58'49", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,930 ft

Well depth: 145 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 22, 1987	93.36 SR	Sept. 16, 1987	32.57 S	Dec. 29, 1987	32.35 S	Mar. 22, 1988	32.23 S
Aug. 17	32.62 S	Oct. 14	32.48 S	Jan. 26, 1988	32.32 S		
Sept. 02	32.21 S	Nov. 17	32.38 S	Feb. 23	32.33 S		
Highest 32.21 Sept. 02, 1987							
Lowest 32.62 Aug. 17, 1987							

Index number on location map: 83

Station number: 344844099584902 Local number: 04N-26W-19 BBBA 2

Location: Lat 34 48'44", long 99 58'49", hydrologic unit 11120202

Aquifer: 110SFTA

Altitude of land-surface datum: 1,930 ft

Well depth: 70 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 24, 1987	33.01 S	Sept. 16, 1987	32.77 S	Dec. 29, 1987	32.12 S	Mar. 22, 1988	32.40 S
Aug. 17	32.85 S	Oct. 14	32.67 S	Jan. 26, 1988	34.50 S		
Sept. 02	32.80 S	Nov. 17	32.55 S	Feb. 23	32.48 S		
Highest 32.12 Dec. 29, 1987							
Lowest 34.50 Jan. 26, 1988							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 84

Station number: 344844099584903 Local number: 04N-26W-19 BBBA 3

Location: Lat 34 48'44", long 99 58'49", hydrologic unit 11120202

Aquifer: 313DGCK

Altitude of land-surface datum: 1,930 ft

Well depth: 278 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 17, 1987	71.07 SR	Oct. 14, 1987	65.45 S	Jan. 26, 1988	64.72 S		
Sept. 02	65.88 S	Nov. 17	65.37 S	Feb. 23	64.55 S		
18	65.58 S	Dec. 29	64.94 S	Mar. 22	64.25 S		
		Highest	64.25	Mar. 22, 1988			
		Lowest	71.07	Aug. 17, 1987			

Index number on location map: 85

Station number: 344753099580701 Local number: 04N-26W-19 DDC 1

Location: Lat 34 47'53", long 99 58'07", hydrologic unit 11130101

Aquifer: 110SFTA

Altitude of land-surface datum: 1,918 ft

Well depth: 117 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 24, 1987	28.70 S	Oct. 14, 1987	27.45 S	Jan. 26, 1988	28.04 S		
June 17	27.73 S	Nov. 17	27.62 S	Feb. 23	28.18 S		
Sept. 18	27.55 S	Dec. 29	27.87 S	Mar. 22	27.10 S		
		Highest	28.70	Apr. 24, 1987			
		Lowest	28.18	Feb. 23, 1988			

Index number on location map: 86

Station number: 344821099585401 Local number: 04N-26W-20 ADD 1

Location: Lat 34 48'21", long 99 58'54", hydrologic unit 11130101

Aquifer: 110SFRT

Altitude of land-surface datum: 1,915 ft

Well depth: 94 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 29, 1986	58.62	Nov. 13, 1986	55.87	May 12, 1987	54.22 S	Nov. 17, 1987	53.08 S
June 20	58.84	Dec. 17	55.55 S	June 18	53.98 S	Dec. 29	53.00 S
July 24	58.71	Jan. 28, 1987	55.94 S	July 14	53.84 S	Jan. 28, 1988	53.37 S
Aug. 18	58.38	Feb. 26	54.60 S	Aug. 11	53.66 S	Feb. 23	52.86 S
Sept. 18	58.65	Mar. 18	54.70 S	Sept. 16	53.34 S	Mar. 22	53.27 S
Oct. 15	57.27	Apr. 18	54.55 S	Oct. 14	53.42 S		
		Highest	52.86	Feb. 23, 1988			
		Lowest	57.27	Oct. 15, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 87

Station number: 345408099530101 Local number: 05N-25W-18 CCDA 1

Location: Lat 34°54'08", long 99°53'02", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,878 ft

Well depth: 52.2 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 08, 1986	41.08	Feb. 25, 1987	37.63 S	Aug. 12, 1987	37.20 S	Jan. 27, 1988	37.36 S
Sept. 18	40.90 S	Mar. 17	37.08 S	Sept. 17	37.66 S	Feb. 24	37.30 S
Oct. 14	38.86	Apr. 18	37.35 S	Oct. 15	37.68 S	Mar. 23	36.90 S
Nov. 12	38.30	May 12	37.52 S	Nov. 18	37.65 S		
Dec. 18	39.07 S	June 18	36.70 S	Dec. 18	39.07 S		
Jan. 27, 1987	37.98 S	July 14	36.95 S	29	37.50 S		

Highest 36.70 June 18, 1987

Lowest 41.08 Aug. 08, 1986

Index number on location map: 88

Station number: 345322099510401 Local number: 05N-25W-21 CBCC 1

Location: Lat 34°53'25", long 99°51'09", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,662 ft

Well depth: 33.1 ft

Remarks: Well originally drilled to 42 ft.

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 19, 1954	29.93	Nov. 12, 1986	23.35	May 12, 1987	22.80 S	Nov. 18, 1987	20.10 S
May 22, 1986	24.78	Dec. 18	23.68 S	June 18	20.73 S	Dec. 30	20.40 S
July 24	25.12	Jan. 27, 1987	21.80 S	July 14	20.54 S	Jan. 27, 1988	20.56 S
Aug. 19	24.60	Feb. 25	23.55 S	Aug. 12	20.73 S	Feb. 24	21.10 S
Sept. 18	23.71	Mar. 17	22.97 S	Sept. 17	19.42 S	Mar. 23	20.80 S
Oct. 14	24.53	Apr. 18	22.63 S	Oct. 15	19.95 S		

Highest 19.42 Sept. 17, 1987

Lowest 29.93 Jan. 19, 1954

Index number on location map: 89

Station number: 345320099543601 Local number: 05N-26W-23 DDBB 1

Location: Lat 34°53'20", long 99°54'36", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,890 ft

Well depth: 115 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 07, 1986	48.48 S	Apr. 18, 1987	46.97 S	Aug. 12, 1987	47.27 S	Dec. 29, 1987	47.01 S
Oct. 14	47.09 S	May 12	47.38 S	Sept. 17	46.62 S	Jan. 27, 1988	47.03 S
Nov. 13	48.60 S	June 18	46.57 S	Oct. 15	46.41 S	Feb. 23	47.45 S
Dec. 18	47.38 S	July 14	48.64 S	Nov. 18	46.78 S	Mar. 22	47.88 S

Highest 46.41 Oct. 15, 1987

Lowest 48.64 July 14, 1987

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 90

Station number: 345915099575801 Local number: 08N-26W-17 DCCC 1

Location: Lat 34° 59' 15", long 99° 57' 56", hydrologic unit 11120304

Aquifer: 313BLIN

Altitude of land-surface datum: 1,898 ft

Well depth: 89.8 ft

Remarks: Well drilled to 116 ft in 1946

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Dec. 17, 1953	42.07 S	May 22, 1986	47.73 S	Mar. 17, 1987	20.83 S	Nov. 17, 1987	39.65 S
Feb. 14, 1954	44.40 S	July 24	43.69 S	Apr. 16	21.55 S	Dec. 30	41.82 S
Apr. 21	47.70 S	Aug. 19	44.19 S	May 12	27.10 S	Jan. 26, 1988	43.01 S
June 25	36.50 S	Sept. 18	39.77 S	June 18	24.65 S	Feb. 23	43.36 S
Jan. 07, 1955	49.30 S	Oct. 14	26.06 S	July 14	26.86 S	Mar. 22	43.03 S
Feb. 14	50.80 S	Nov. 13	16.58 S	Aug. 12	31.13 S		
Apr. 21	51.70 S	Dec. 17	21.32 S	Sept. 16	34.83 S		
June 25	35.70 S	Feb. 25, 1987	21.23 S	Oct. 14	37.23 S		
		Highest	16.58	Nov. 13, 1986			
		Lowest	51.70	Apr. 21, 1955			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA

Index number on location map: 91

Station number: 342500099440301. Local number: 02S-24W-05 ACBC 1

Location: Lat 34°25'00", long 99°44'03", hydrologic unit 11130101

Aquifer: 111RRVA

Altitude of land-surface datum: 1,425 ft

Well depth: 47 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 10, 1987	4.54 S	Oct. 13, 1987	5.01 S	Jan. 20, 1988	4.09 S		
Aug. 12	4.91 S	Nov. 16	4.73 S	Feb. 23	4.49 S		
Sept. 15	4.29 S	Dec. 17	4.52 S	Mar. 22	4.28 S		
		Highest	4.09	Jan. 20, 1988			
		Lowest	5.01	Oct. 13, 1987			

Index number on location map: 92

Station number: 342500099440302. Local number: 02S-24W-05 ACBC 2

Location: Lat 34°25'00", long 99°44'03", hydrologic unit 11130101

Aquifer: 313CLGR

Altitude of land-surface datum: 1,425 ft

Well depth: 70 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 10, 1987	2.59 S	Oct. 13, 1987	2.15 S	Jan. 20, 1988	1.70 S		
12	2.32 S	Nov. 16	1.98 S	Feb. 23	2.00 S		
Sept. 15	1.82 S	Dec. 17	1.88 S	Mar. 22	1.80 S		
		Highest	1.70	Jan. 20, 1988			
		Lowest	2.59	Aug. 10, 1987			

Index number on location map: 93

Station number: 342540099440501. Local number: 02S-24W-05 BDDD 1

Location: Lat 34°24'54", long 99°44'05", hydrologic unit 11130101

Aquifer: 111RRVA

Altitude of land-surface datum: 1,425 ft

Well depth: 50 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 10, 1987	5.39 S	Sept. 15, 1987	5.25 S	Dec. 17, 1987	5.28 S	Mar. 22, 1988	5.28 S
31	5.88 S	Oct. 13	5.88 S	Jan. 20, 1988	5.00 S		
Aug. 12	5.57 S	Nov. 16	5.48 S	Feb. 23	5.42 S		
		Highest	5.00	Jan. 20, 1988			
		Lowest	5.88	July 31, 1987			



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 94

Station number: 342338099392401 Local number: 02S-24W-12 CCCA 1

Location: Lat 34°23'39", long 99°40'18", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,479 ft

Well depth: 90 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 12, 1986	57.86	Jan. 28, 1987	57.19 S	June 17, 1987	54.04 S	Nov. 16, 1987	55.45 S
Sept. 17	58.01	Mar. 04	57.21 S	July 14	53.88 S	Dec. 17	56.04 S
Oct. 18	58.09	19	57.03 S	Aug. 11	54.19 S	Jan. 21, 1988	56.30 S
Nov. 12	58.01	Apr. 14	56.93 S	Sept. 15	54.87 S	Feb. 23	56.71 S
Dec. 18	57.53	May 13	56.71 S	Oct. 13	55.33 S	Mar. 22	56.60 S
Highest 53.88 July 14, 1987							
Lowest 58.09 Oct. 18, 1986							

Index number on location map: 95

Station number: 342605099270501 Local number: 01S-22W-36 AAB6 1

Location: Lat 34°26'05", long 99°27'05", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,400 ft

Well depth: 28.5 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 08, 1954	8.36	Nov. 12, 1986	+.65	May 13, 1987	2.09 S	Nov. 16, 1987	2.14 S
June 19, 1986	2.45	Dec. 18	+.33	June 17	+.08 S	Dec. 17	1.69 S
July 22	4.00	Jan. 28, 1987	+.15 S	July 14	.65 S	Jan. 20, 1988	.03 S
Aug. 12	4.58	Mar. 04	+.76 S	Aug. 11	2.14 S	Feb. 23	.93 S
Sept. 17	2.35	19	+.23 S	Sept. 15	2.86 S		
Oct. 16	+.22	Apr. 14	.31 S	Oct. 13	2.62 S		
Highest +.76 Mar. 04, 1987							
Lowest 8.36 Jan. 08, 1954							

Index number on location map: 96

Station number: 342848099363301 Local number: 01S-23W-09 DCDC 1

Location: Lat 34°28'47", long 99°36'33", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,504 ft

Well depth: 103 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 08, 1954	65.40	Oct. 27, 1954	64.4	May 28, 1986	65.56	Oct. 18, 1986	65.57
Feb. 10	65.34	Jan. 05, 1955	64.4	June 19	65.53	Nov. 12	65.08
Apr. 21	65.4	Feb. 09	65.3	July 22	65.63	Dec. 18	64.88
Aug. 29	65.3	Apr. 20	65.7	Aug. 12	65.67		
Sept. 29	65.4	June 29	65.8	Sept. 17	65.69		
Highest 64.4 Oct. 27, 1954 Jan. 05, 1955							
Lowest 65.8 June 29, 1955							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 97

Station number: 342648099362601 Local number: 01S-23W-28 ADBA 1

Location: Lat 34°28'48", long 99°36'28", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,445 ft

Well depth: 39.2 ft

Remarks: Well originally drilled to 45 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 12, 1954	36 R	Oct. 18, 1986	18.60	Apr. 14, 1987	15.83 S	Oct. 13, 1987	15.14 S
May 23, 1986	19.90	Nov. 12	17.13	May 13	15.87 S	Nov. 16	15.20 S
June 19	19.33	Dec. 18	16.77	June 17	13.60 S	Dec. 17	15.60 S
July 22	19.59	Jan. 28, 1987	16.89 S	July 14	14.02 S	Feb. 23, 1988	15.07 S
Aug. 12	19.76	Mar. 04	16.32 S	Aug. 11	14.49 S	Mar. 22	15.51 S
Sept. 17	19.70	19	15.85 S	Sept. 15	14.92 S		
Highest 13.60 June 17, 1987							
Lowest 36 Feb. 12, 1954							

Index number on location map: 98

Station number: 343020099404501 Local number: 01S-24W-02 ABB 1

Location: Lat 34°30'23", long 99°40'51", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,452 ft

Well depth: 55.5 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 06, 1954	28.94	Apr. 01, 1965	34.88	Mar. 26, 1968	33.90	Jan. 10, 1985	32.05 S
Jan. 23, 1957	34.10	08	34.80	Apr. 25	33.78	Jan. 06, 1986	29.33 S
Feb. 26	34.01	May 26	34.95	June 06	29.41	May 14	29.47 S
Nov. 19	30.54	July 13	35.60	Oct. 10	35.21	June 19	28.87 S
Dec. 17	29.69	28	34.75	Nov. 14	34.60	July 22	29.78 S
Feb. 25, 1958	29.97	Sept. 30	32.88	Dec. 10	34.45	Aug. 12	30.76 S
Oct. 28	30.40	Oct. 12	33.11	Jan. 07, 1969	34.30	Sept. 17	30.60
Jan. 26, 1960	38.30	Nov. 05	30.48	Mar. 11	34.18	Oct. 16	27.13 S
Dec. 21	28.32	Jan. 04, 1966	30.60	Apr. 09	35.03	Nov. 12	25.86 S
May 23, 1962	32.88	June 21	31.81	May 08	34.95	Dec. 18	25.98 S
June 27	26.73	Sept. 13	33.32	July 20	34.80	Jan. 28, 1987	26.30 S
Aug. 28	32.40	Oct. 19	33.06	Oct. 07	31.89	Mar. 04	25.19 S
Oct. 03	31.41	Nov. 15	33.10	Dec. 11	33.08	June 17	23.75 S
17	30.25	Dec. 13	33.23	Feb. 24, 1970	32.30	July 14	24.25 S
Nov. 13	30.90	Jan. 18, 1967	33.27	Dec. 29	34.68	Aug. 11	24.89 S
Jan. 08, 1963	31.00	Feb. 18	38.83	Jan. 15, 1974	30.83	Sept. 15	25.33 S
Feb. 05	31.22	Mar. 18	35.10	Jan. 07, 1975	28.32	Oct. 13	25.64 S
Apr. 24	31.69	Apr. 13	35.02	Jan. 29, 1976	29.30	Nov. 18	25.37 S
May 21	32.94	June 15	34.56	Dec. 28	30.73	Dec. 17	25.57 S
June 18	30.75	July 12	34.38	Mar. 09, 1978	31.62	Jan. 21, 1988	25.52 S
July 16	32.35	Aug. 15	35.74	Mar. 13, 1979	30.56	Feb. 23	25.32 S
Aug. 16	34.64	Sept. 14	34.83	Mar. 11, 1981	32.29 S	Mar. 22	25.03 S
Nov. 22	35.12	Oct. 11	34.56	Mar. 09, 1982	32.22 S		
Jan. 13, 1965	35.08	Dec. 12	34.50	Jan. 26, 1983	32.61 S		
Feb. 18	34.98	Jan. 30, 1968	34.02	Jan. 16, 1984	28.81 S		
Highest 23.75 June 17, 1987							
Lowest 38.83 Feb. 18, 1967							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 99

Station number: 342835099433501 Local number: 01S-24W-17 AADD 1

Location: Lat 34°28'35", long 99°43'35", hydrologic unit 11130101

Aquifer: 313VVCR

Altitude of land-surface datum: 1,466 ft

Well depth: 75 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 14, 1986	30.32	Nov. 12, 1986	26.70 S	May 13, 1987	25.10 S	Nov. 18, 1987	23.13 S
June 19	30.30 S	Dec. 18	25.99 S	June 17	21.63 S	Dec. 17	23.43 S
July 22	31.39 S	Jan. 28, 1987	25.81 S	July 14	22.23 S	Jan. 21, 1988	24.99 S
Aug. 12	33.06 S	Mar. 04	25.10 S	Aug. 11	23.22 S	Feb. 23	23.75 S
Sept. 17	33.20 S	19	24.58 S	Sept. 15	23.50 S	Mar. 22	26.01 S
Oct. 16	29.94 S	Apr. 14	24.28 S	Oct. 13	23.17 S		
Highest 21.63 June 17, 1987							
Lowest 33.20 Sept. 17, 1986							

Index number on location map: 100

Station number: 342542099434801 Local number: 01S-24W-32 DBAA 1

Location: Lat 34°25'42", long 99°43'48", hydrologic unit 11130101

Aquifer: 313VVCR

Altitude of land-surface datum: 1,470 ft

Well depth: 80 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 18, 1987	16.45 SZ	Aug. 12, 1987	26.45 S	Nov. 16, 1987	29.14 S	Feb. 23, 1988	31.58 S
19	26.01 S	Sept. 15	26.98 S	Dec. 17	30.20 S	Mar. 22	30.91 S
July 10	25.72 S	Oct. 13	28.50 S	Jan. 20, 1988	30.93 S		
Highest 16.45 June 18, 1987							
Lowest 31.58 Feb. 23, 1988							

Index number on location map: 101

Station number: 342542099434802 Local number: 01S-24W-32 DBAA 2

Location: Lat 34°25'42", long 99°43'48", hydrologic unit 11130101

Aquifer: 313FLRP

Altitude of land-surface datum: 1,470 ft

Well depth: 239 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 18, 1987	54.30 S	Aug. 12, 1987	51.65 S	Nov. 16, 1987	50.92 S	Feb. 23, 1988	51.77 S
19	51.89 S	Sept. 15	50.50 S	Dec. 17	48.85 S	Mar. 22	51.50 S
July 10	51.71 S	Oct. 13	51.84 S	Jan. 20, 1988	49.07 S		
Highest 48.85 Dec. 17, 1987							
Lowest 54.30 June 18, 1987							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 102

Station number: 342542099434803 Local number: 01S-24W-32 DBAA 3

Location: Lat 34° 25' 42", long 99° 43' 48", hydrologic unit 11130101

Aquifer: 313EMFK

Altitude of land-surface datum: 1,470 ft

Well depth: 179 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	103.10 SR	Sept. 15, 1987	43.69 S	Dec. 10, 1987	42.07 S	Mar. 22, 1988	40.38 S
July 10	78.33 SR	Oct. 13	43.28 S	Jan. 20, 1988	39.92 S		
Aug. 12	47.78 S	Nov. 16	41.90 S	Feb. 23	41.08 S		
		Highest	39.92	Jan. 20, 1988			
		Lowest	78.33	July 10, 1987			

Index number on location map: 103

Station number: 342542099434804 Local number: 01S-24W-32 DBAA 4

Location: Lat 34° 25' 42", long 99° 43' 48", hydrologic unit 11130101

Aquifer: 110RRVT

Altitude of land-surface datum: 1,470 ft

Well depth: 55 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 19, 1987	26.15 S	Aug. 12, 1987	26.58 S	Nov. 16, 1987	29.70 S	Feb. 23, 1988	31.99 S
23	26.01 S	Sept. 15	27.24 S	Dec. 17	30.20 S	Mar. 22	32.40 S
July 10	25.86 S	Oct. 13	28.82 S	Jan. 20, 1988	27.13 S		
		Highest	25.86	July 10, 1987			
		Lowest	32.40	Mar. 22, 1988			

Index number on location map: 104

Station number: 342847099470401 Local number: 01S-25W-11 DCDC 1

Location: Lat 34° 28' 47", long 99° 47' 04", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,530 ft

Well depth: 120 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 14, 1986	72.58	Nov. 12, 1986	71.97	May 13, 1987	67.41 S	Nov. 16, 1987	66.43 S
June 19	73.03	Dec. 18	68.85	June 17	66.18 S	Dec. 17	67.23 S
July 22	73.23	Jan. 28, 1987	68.47 S	July 14	65.15 S	Jan. 21, 1988	67.73 S
Aug. 12	76.55	Mar. 04	68.37 S	Aug. 11	64.78 S	Feb. 23	68.29 S
Sept. 17	73.91	19	67.95 S	Sept. 15	64.61 S	Mar. 22	68.28 S
Oct. 16	73.16	Apr. 14	67.70 S	Oct. 13	65.70 S		
		Highest	64.61	Sept. 15, 1987			
		Lowest	76.55	Aug. 12, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 105

Station number: 342744099460701 Local number: 01S-25W-13 CCCA 1

Location: Lat 34 27'58", long 99 46'34", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,527 ft

Well depth: 130 ft

Remarks: Previously published as 01S-25W-13 CCC

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 12, 1953	76.85	June 24, 1958	71.35	May 21, 1963	74.94	Mar. 11, 1969	77.72
Mar. 25, 1954	75.57	July 29	71.26	June 18	74.89	Apr. 09	77.75
Apr. 20	76.63	Aug. 25	72.80	July 18	80.90	May 08	77.65
May 27	76.73	Sept. 23	70.91	Aug. 16	77.59	June 19	77.64
June 23	76.04	Oct. 28	70.90	Nov. 22	76.80	Sept. 04	79.29
Aug. 25	78.70	Nov. 19	70.23	Feb. 10, 1964	87.79	Oct. 07	78.50
Sept. 23	79.17	Jan. 08, 1959	70.62	Jan. 13, 1965	78.03	Nov. 18	72.92
Oct. 25	77.03	27	70.79	Feb. 18	77.94	Dec. 11	77.59
Dec. 02	77.20	Feb. 24	71.06	Apr. 01	85.67	Jan. 26, 1970	76.10
Jan. 06, 1955	76.49	Mar. 24	69.90	08	77.96	Feb. 24	77.07
25	76.86	Apr. 21	73.36	May 26	74.97	Dec. 29	77.95
Feb. 08	76.19	May 19	72.73	July 13	78.73	Jan. 20, 1972	80.32
22	79.09	June 30	72.91	Sept. 30	80.86	Feb. 14, 1973	78.83
Mar. 22	79.37	Sept. 22	74.75	Oct. 12	80.36	Jan. 15, 1974	76.18
Apr. 20	79.74	Oct. 20	74.74	Nov. 04	79.05	Dec. 28, 1976	78.87
May 24	78.24	Nov. 19	73.84	Jan. 04, 1966	77.78	Mar. 09, 1978	75.20
June 24	76.43	Jan. 26, 1960	73.53	Apr. 19	78.34	Mar. 13, 1979	78.56
July 28	76.07	Mar. 21	73.57	June 21	77.75	Feb. 26, 1980	75.48
Sept. 29	76.29	Apr. 19	73.62	Sept. 13	78.74	Mar. 11, 1981	75.72 S
Oct. 25	76.20	May 17	73.85	Oct. 19	78.20	Mar. 09, 1982	76.78 S
Nov. 29	73.17	June 21	73.75	Nov. 15	77.98	Jan. 26, 1983	77.14 S
Dec. 21	72.55	July 19	73.38	Dec. 13	77.89	Jan. 18, 1984	75.55 S
Jan. 31, 1956	72.13	Aug. 16	76.21	Jan. 18, 1967	77.77	Jan. 10, 1985	76.10 S
Feb. 21	73.17	Sept. 13	73.74	Feb. 16	77.57	Jan. 06, 1986	73.17 S
Mar. 20	72.23	Nov. 15	72.35	Mar. 16	80.91	May 14	78.32
Apr. 24	75.13	Dec. 21	71.45	Apr. 13	78.30	June 19	74.23
May 22	73.65	Jan. 17, 1961	71.08	May 16	78.48	July 22	74.40
June 26	72.65	Feb. 14	71.06	June 15	78.26	Aug. 12	75.70
July 24	77.02	Mar. 14	71.06	July 12	78.55	Sept. 17	75.17
Aug. 28	81.45	Apr. 19	70.89	Aug. 15	78.30	Oct. 16	74.79
Sept. 18	77.08	May 17	70.92	Sept. 14	80.30	Nov. 12	73.57
Oct. 30	78.45	June 21	70.42	Oct. 11	78.73	Dec. 18	72.20
Nov. 27	76.10	July 12	70.67	Nov. 16	79.47	Jan. 28, 1987	71.56 S
Dec. 18	76.14	Sept. 06	73.13	Dec. 12	79.38	Mar. 04	71.13 S
Jan. 23, 1957	76.15	26	72.38	Jan. 30, 1968	79.08	19	70.82 S
Feb. 26	76.17	Oct. 24	72.33	Feb. 20	78.93	Apr. 14	70.56 S
Apr. 04	78.25	Nov. 21	71.04	Mar. 26	78.85	May 13	72.99 S
May 07	76.37	Dec. 05	72.24	Apr. 25	78.73	June 17	70.29 S
28	75.42	Jan. 31, 1962	72.26	June 06	78.62	July 14	70.45 S
June 25	72.63	May 23	74.87	19	78.60	Aug. 11	69.29 S
Oct. 01	69.77	June 27	74.14	July 17	79.50	Sept. 15	68.11 S
29	69.23	Aug. 28	74.08	Aug. 15	92.25	Oct. 13	68.34 S
Nov. 19	69.12	Oct. 03	72.55	Sept. 19	88.05	Nov. 16	68.62 S
Dec. 17	69.20	17	73.48	Oct. 10	87.47	Dec. 17	69.17 S
Feb. 25, 1958	69.87	Nov. 13	73.14	Nov. 14	84.67	Jan. 21, 1988	69.53 S
Mar. 25	70.47	Jan. 08, 1963	72.90	Dec. 10	78.30	Feb. 23	70.01 S
Apr. 22	70.67	Feb. 05	73.20	Jan. 07, 1969	78.00	Mar. 22	70.11 S
May 20	71.23	Mar. 26	74.18	Feb. 04	77.95		

Highest 88.11 Sept. 15, 1987  
Lowest 92.25 Aug. 15, 1968

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 106

Station number: 343359099314701 Local number: 01N-22W-08 DDCD 1

Location: Lat 34° 33' 44", long 99° 31' 46", hydrologic unit 11130101

Aquifer: 313VVCR

Altitude of land-surface datum: 1,478 ft

Well depth: 35 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 17, 1986	32.02	Dec. 18, 1986	30.66	June 15, 1987	29.65 S	Dec. 29, 1987	30.73 S
July 24	32.21	Jan. 27, 1987	30.83 S	July 13	29.80 S	Jan. 25, 1988	30.74 S
Aug. 18	32.22	Feb. 24	30.67 S	Aug. 10	29.93 S	Feb. 22	30.65 S
Sept. 17	32.20	Mar. 19	30.58 S	Sept. 15	29.83 S	Mar. 21	30.70 S
Oct. 14	31.60	Apr. 15	30.69 S	Oct. 13	30.30 S		
Nov. 12	30.74	May 11	30.75 S	Nov. 18	30.35 S		
Highest 29.65 June 15, 1987							
Lowest 32.22 Aug. 18, 1986							

Index number on location map: 107

Station number: 343221099375701 Local number: 01N-23W-20 DDAA 1

Location: Lat 34° 32' 21", long 99° 37' 53", hydrologic unit 11130101

Aquifer: 313VVCR

Altitude of land-surface datum: 1,440 ft

Well depth: 42.4 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 19, 1986	41.87 S	Nov. 12, 1986	39.12	May 11, 1987	41.57 S	Oct. 13, 1987	42.08 S
July 24	42.12	Dec. 18	40.77	June 15	40.25 S	Nov. 18	41.40 S
Aug. 18	42.30	Feb. 24, 1987	41.13 S	July 13	40.85 S	Jan. 25, 1988	41.98 S
Sept. 17	42.2	Mar. 19	41.03 S	Aug. 10	41.34 S		
Oct. 14	39.88	Apr. 15	41.30 S	Sept. 15	41.95 S		
Highest 39.12 Nov. 12, 1986							
Lowest 42.30 Aug. 18, 1986							

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 108

Station number: 343913099313901 Local number: 02N-22W-08 DDA 1

Location: Lat 34° 39' 13", long 99° 31' 39", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,417 ft

Well depth: 75 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 31, 1953	36.50 S	Oct. 20, 1959	35.99	May 28, 1965	42.68	June 19, 1969	38.21
Feb. 08, 1954	35.17	Nov. 18	34.74	July 13	41.22	July 21	39.98
Apr. 21	37.40	Dec. 14	35.07	26	44.88	Sept. 04	42.31
June 23	35.20	Jan. 27, 1960	33.48	Sept. 30	44.84	Oct. 07	40.10
Aug. 25	41.40	Feb. 22	32.58	Oct. 12	43.55	Nov. 18	38.37
Sept. 22	41.80	Mar. 21	32.10	Nov. 04	40.77	Dec. 11	37.60
Oct. 27	39.90	Apr. 19	31.75	Jan. 04, 1966	37.84	Jan. 27, 1970	36.50
Jan. 05, 1955	40.40	May 17	32.38	Apr. 19	39.01	Dec. 29	39.07
Feb. 09	39.70	June 20	32.30	June 20	38.82	Jan. 18, 1972	39.30
Apr. 20	43.00	Nov. 14	30.98	July 12	42.34	Jan. 07, 1975	28.59
June 22	40.70	Dec. 20	30.84	Sept. 13	40.80	Dec. 28, 1976	30.29
May 21, 1956	40.95	Jan. 16, 1961	30.29	Oct. 19	37.82	Mar. 09, 1978	30.20
June 26	39.70	Feb. 13	30.20	Nov. 15	36.88	Mar. 13, 1979	31.73
Sept. 17	48.15	Mar. 13	30.09	Dec. 13	37.37	Feb. 28, 1980	31.32
Oct. 30	46.42	Apr. 19	29.68	Jan. 18, 1967	37.59	Mar. 11, 1981	39.46 S
Nov. 28	44.85	May 16	30.54	Feb. 18	41.03	Mar. 09, 1982	36.85 S
Dec. 27	43.45	June 20	29.41	Mar. 15	39.55	Jan. 26, 1983	39.59 S
Jan. 22, 1957	42.53	Sept. 08	37.80	Apr. 13	42.47	Feb. 02, 1984	33.76 S
Feb. 26	41.59	28	35.97	May 18	44.00	Jan. 10, 1985	41.11 S
Apr. 04	40.22	Oct. 23	43.85	June 15	43.47	Jan. 07, 1986	28.92 S
May 28	32.10	Nov. 21	33.19	July 12	42.62	May 16	32.41 S
June 24	29.98	Dec. 05	32.80	Aug. 15	46.88	June 17	30.65 S
July 23	31.21	Jan. 31, 1962	31.82	Sept. 13	43.12	July 24	32.14 S
Oct. 29	33.20	Mar. 07	31.53	Oct. 11	43.70	Aug. 18	32.02 S
Nov. 18	32.65	28	33.01	Nov. 18	42.69	Sept. 17	28.78 S
Dec. 16	30.97	May 23	35.84	Dec. 12	42.14	Oct. 14	24.32 S
Feb. 24, 1958	31.05	June 27	33.29	Jan. 30, 1968	41.07	Nov. 12	21.82 S
Mar. 24	30.82	Oct. 03	37.07	Feb. 20	42.51	Dec. 16	21.48 S
Apr. 21	30.54	17	36.15	Mar. 26	39.58	Jan. 27, 1967	21.50 S
May 19	34.97	Nov. 13	34.13	Apr. 25	39.30	Feb. 24	20.15 S
June 24	30.10	Jan. 08, 1963	32.24	June 08	38.50	Mar. 18	19.57 S
July 29	29.85	Feb. 05	31.85	19	38.11	Apr. 15	19.74 S
Sept. 23	32.14	Mar. 26	31.70	July 17	37.98	May 11	21.15 S
Oct. 27	31.57	Apr. 23	35.90	Aug. 15	46.89	June 15	19.40 S
Nov. 19	33.47	May 21	35.18	Sept. 19	46.17	July 13	19.94 S
Jan. 09, 1959	32.06	June 17	34.05	Oct. 10	44.90	Aug. 10	19.72 S
26	31.80	July 15	37.91	Nov. 14	40.97	Sept. 15	24.24 S
Feb. 23	31.40	Aug. 15	42.47	Dec. 10	40.10	Oct. 13	23.82 S
Mar. 23	32.95	Nov. 15	42.62	Jan. 07, 1969	39.30	Nov. 18	23.74 S
May 19	35.78	Feb. 10, 1964	39.00	Feb. 04	38.71	Dec. 29	23.00 S
June 30	33.97	Jan. 12, 1965	42.50	Mar. 11	38.01	Jan. 25, 1968	22.37 S
July 20	34.91	Feb. 18	40.37	Apr. 09	37.50	Feb. 22	22.05 S
Sept. 20	38.01	Apr. 09	45.33	May 08	37.09	Mar. 21	21.88 S
Highest		19.40	June 15, 1987				
Lowest		48.15	Sept. 17, 1956				

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 109

Station number: 343953099360901 Local number: 02N-23W-10 ABDB 1

Location: Lat 34° 39' 53", long 99° 36' 09", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,431 ft

Well depth: 90 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 16, 1952	31.30 S	Nov. 12, 1986	20.82 S	May 11, 1987	23.60 S	Nov. 16, 1987	23.10 S
June 09, 1986	25.51 S	Dec. 18	21.77 S	June 15	19.65 S	Dec. 29	23.74 S
July 15	25.55 S	Jan. 27, 1987	22.60 S	July 13	20.88 S	Jan. 25, 1988	23.84 S
Aug. 05	28.33 S	Feb. 24	22.19 S	Aug. 10	23.48 S	Feb. 22	23.75 S
Sept. 17	25.06 S	Mar. 17	21.65 S	Sept. 15	23.53 S	Mar. 21	22.95 S
Oct. 14	22.10 S	Apr. 15	22.49 S	Oct. 13	24.00 S		
Highest 19.65				June 15, 1987			
Lowest 31.30				May 16, 1952			

Index number on location map: 110

Station number: 343929099361701 Local number: 02N-23W-10 DBBC 1

Location: Lat 34° 39' 29", long 99° 36' 17", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,422 ft

Well depth: 82 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Nov. 23, 1953	22.60	June 17, 1986	19.85 S	Sept. 17, 1986	18.78 S	Mar. 19, 1987	14.68 S
Aug. 29, 1967	23.00	July 24	21.94 SP	Nov. 12	13.70 S	June 15	5.47 S
May 23, 1986	20.02 S	Aug. 18	21.62 S	Dec. 16	14.75 S		
Highest 5.47				June 15, 1987			
Lowest 23.00				Aug. 29, 1967			

Index number on location map: 111

Station number: 343930099360501 Local number: 02N-23W-11 DBAC 1

Location: Lat 34° 39' 30", long 99° 35' 05", hydrologic unit 11120202

Aquifer: 313VVCR

Altitude of land-surface datum: 1,413 ft

Well depth: 80 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1986	23.49	Nov. 12, 1986	14.42	Apr. 15, 1987	17.92 S	Nov. 16, 1987	19.87 S
July 15	22.98	Dec. 18	16.14	May 11	21.60 S	Jan. 25, 1988	20.97 S
Sept. 07	20.13	Jan. 27, 1987	17.70 S	July 13	11.57 S	Feb. 22	20.23 S
Oct. 14	16.17	Mar. 19	16.71 S	Oct. 13	20.89 S	Mar. 21	19.19 S
Highest 11.57				July 13, 1987			
Lowest 23.49				June 10, 1986			



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 112

Station number: 343945099342501 Local number: 02N-23W-12 BBDD 1

Location: Lat 34° 39' 46", long 99° 34' 29", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,419 ft

Well depth: 200 ft

Remarks: Previously published as 02N-23W-12 BBD.

Well deepened from 90 to 200 ft in April 1953.

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1948	29.12	Apr. 22, 1958	25.56	Jan. 08, 1963	14.49	Nov. 14, 1968	37.60
Apr. 14, 1949	27.19	May 20	25.68	Feb. 05	26.21	Dec. 10	36.54
Oct. 20	25.55	June 24	26.96	May 21	36.29	Jan. 07, 1969	35.80
Nov. 14, 1950	26.87	July 29	25.78	June 18	28.99	Feb. 04	35.24
Jan. 25, 1951	28.50	Aug. 26	29.88	July 16	32.45	Mar. 11	33.27
Apr. 25	27.89	Sept. 23	28.60	Aug. 16	44.75	Apr. 09	34.18
Mar. 20, 1952	34.84	Nov. 18	28.95	Nov. 22	39.44	May 08	38.14
Mar. 18, 1953	32.55	Jan. 26, 1959	27.86	Feb. 10, 1964	33.08	June 19	34.90
Nov. 23	36.04	Feb. 23	28.80	Jan. 12, 1965	39.90	July 21	41.10
Jan. 26, 1954	33.90	Mar. 23	30.94	Feb. 18	31.75	Sept. 04	36.57
Mar. 26	38.30	Apr. 21	36.15	Apr. 01	35.92	Oct. 07	31.31
Apr. 21	37.94	May 19	32.38	08	46.13	Nov. 18	31.46
May 26	29.87	June 20	31.32	May 26	36.58	Dec. 11	31.15
June 23	33.98	July 21	33.57	July 13	47.54	Jan. 27, 1970	31.13
Aug. 24	63.21	Aug. 25	43.20	29	44.39	Feb. 24	31.59
Sept. 22	52.35	Oct. 20	33.12	Sept. 30	45.66	Dec. 29	37.70
Oct. 26	45.10	Nov. 19	25.62	Oct. 12	44.20	Dec. 28, 1976	27.57
Dec. 02	43.39	Dec. 22	30.96	Nov. 05	28.04	Mar. 09, 1978	27.53
Jan. 05, 1955	41.02	Jan. 15, 1960	27.79	Jan. 04, 1966	30.41	Mar. 13, 1979	27.90
24	39.98	Feb. 22	29.27	June 20	41.00	Feb. 28, 1980	27.72
Feb. 08	39.35	Mar. 21	28.60	July 12	46.40	Mar. 11, 1981	37.02 S
22	38.94	May 17	31.84	Sept. 13	41.39	Mar. 09, 1982	29.70 S
Mar. 23	42.22	June 19	31.99	Oct. 19	37.77	Feb. 02, 1984	28.36 S
Apr. 21	46.57	21	29.24	Nov. 15	36.13	Jan. 07, 1986	23.87 S
May 24	34.50	Sept. 13	35.59	Dec. 13	45.63	May 16	27.55 S
June 23	33.39	Nov. 14	25.90	Jan. 18, 1967	45.48	June 17	24.40 S
July 25	38.42	Dec. 21	25.60	Feb. 16	47.06	July 24	25.80 S
Aug. 22	51.77	Jan. 16, 1961	25.40	Mar. 15	55.76	Aug. 18	27.28 S
Sept. 28	47.89	Feb. 13	25.55	Apr. 13	61.63	Sept. 17	20.06 S
Oct. 26	32.35	Mar. 14	25.42	May 16	52.80	Oct. 14	13.68 S
Nov. 28	31.58	Apr. 19	24.98	June 15	51.63	Nov. 12	13.89 S
Dec. 21	30.95	May 17	27.72	July 12	49.63	Dec. 16	15.62 S
Jan. 31, 1956	22.03	June 21	27.35	Aug. 15	50.69	Jan. 27, 1987	14.52 S
Dec. 28	39.43	July 12	29.29	Sept. 13	49.23	Feb. 24	17.50 S
Jan. 22, 1957	38.67	Aug. 01	34.75	Oct. 11	44.87	Mar. 17	16.52 S
Feb. 26	36.83	Sept. 06	36.71	Nov. 16	42.95	Apr. 15	17.56 S
Apr. 04	35.25	26	33.20	Dec. 12	43.45	May 11	20.63 S
May 07	24.30	Oct. 24	31.32	Jan. 30, 1968	40.03	June 15	13.37 S
28	21.03	Nov. 21	28.20	Feb. 20	42.14	July 13	15.45 S
June 25	18.39	Dec. 05	28.47	Mar. 26	37.82	Aug. 10	18.46 S
Aug. 27	29.60	Jan. 31, 1962	27.46	Apr. 25	36.85	Sept. 15	20.38 S
Oct. 29	26.75	Apr. 25	38.81	June 06	37.59	Oct. 13	20.78 S
Nov. 19	26.19	May 23	33.73	19	34.60	Nov. 12	13.69 S
Dec. 17	25.62	June 27	29.77	July 17	35.32	Dec. 29	19.50 S
Jan. 28, 1958	23.85	Aug. 28	32.53	Aug. 15	42.90	Jan. 25, 1988	20.40 S
Feb. 25	25.16	Oct. 03	28.80	Sept. 19	44.87	Feb. 22	20.38 S
Mar. 24	25.68	Nov. 13	26.80	Oct. 10	40.02	Mar. 21	20.20 S

Highest 13.37 June 15, 1987

Lowest 63.21 Aug. 24, 1954

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 113

Station number: 343810099365701 Local number: 02N-23W-21 AAA 1

Location: Lat 34°38'10", long 99°36'57", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,428 ft

Well depth: 89 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Mar. 18, 1953	30.07	Oct. 24, 1981	23.20	Dec. 13, 1988	27.02	Jan. 15, 1974	22.01
July 30	29.42	Nov. 21	21.31	Jan. 18, 1987	27.58	Jan. 07, 1975	18.18
Jan. 06, 1955	33.48	Dec. 05	21.47	Feb. 18	28.75	Dec. 28, 1976	24.49
Dec. 28, 1956	29.81	Jan. 31, 1982	21.82	Mar. 18	29.52	Mar. 09, 1978	22.73
Jan. 23, 1957	29.55	Mar. 07	22.09	Apr. 13	31.95	Mar. 13, 1979	24.27
Feb. 26	29.14	28	22.34	May 18	32.96	Feb. 28, 1980	23.13
Apr. 04	28.42	Apr. 25	25.08	June 15	33.06	Mar. 11, 1981	25.07 S
June 25	11.85	May 23	25.11	July 12	29.97	Mar. 09, 1982	22.88 S
Dec. 17	18.15	June 27	22.77	Aug. 15	31.50	Jan. 26, 1983	26.85 S
Feb. 25, 1958	18.80	Aug. 28	26.67	Sept. 13	30.95	Jan. 20, 1984	20.70 S
Mar. 25	19.22	Oct. 03	22.45	Oct. 11	28.20	Jan. 10, 1985	26.58 S
Apr. 22	18.82	17	21.93	Dec. 12	30.36	Jan. 07, 1986	18.10 S
Sept. 23	20.66	Nov. 13	21.88	Jan. 30, 1988	29.97	May 16	19.41
Oct. 28	19.87	Jan. 08, 1983	21.90	Feb. 20	29.32	June 17	18.89
Nov. 18	21.42	Feb. 05	22.18	Mar. 26	29.20	July 24	17.93 S
Jan. 08, 1959	21.47	Mar. 26	22.74	Apr. 25	29.18	Aug. 18	20.75
Apr. 21	24.04	Apr. 24	24.69	June 06	27.78	Sept. 17	18.28 S
Sept. 22	24.07	May 21	26.50	19	27.88	Oct. 14	7.82 S
Nov. 19	23.23	June 18	20.09	July 17	27.64	Nov. 12	8.58 S
Jan. 15, 1960	21.97	Aug. 18	27.15	Aug. 15	31.59	Dec. 16	10.40 S
Apr. 19	21.80	Nov. 22	28.31	Sept. 19	31.42	Jan. 27, 1987	11.40 S
May 17	22.90	Feb. 10, 1984	32.29	Oct. 10	29.13	Feb. 24	10.55 S
June 21	20.07	Jan. 13, 1985	30.88	Nov. 14	28.72	Mar. 17	9.78 S
July 19	21.04	Feb. 18	30.54	Dec. 10	28.22	Apr. 15	10.88 S
Sept. 13	22.48	Apr. 01	30.31	Jan. 07, 1989	28.27	May 11	12.12 S
Nov. 15	20.13	08	29.08	Feb. 04	27.88	June 15	5.77 S
Dec. 21	19.45	May 26	30.69	Mar. 11	27.75	July 13	9.22 S
Jan. 17, 1981	17.57	Sept. 30	26.18	Apr. 09	27.45	Aug. 10	10.98 S
Feb. 14	18.05	Oct. 12	27.65	May 08	27.81	Sept. 15	12.43 S
Mar. 14	18.30	Nov. 05	21.84	June 19	25.55	Oct. 13	12.10 S
Apr. 19	18.25	Jan. 04, 1986	23.51	Sept. 04	19.80	Nov. 16	9.12 S
May 17	19.98	Apr. 19	24.64	Oct. 07	20.13	Jan. 25, 1988	9.30 S
June 21	19.75	June 20	36.80	Nov. 18	21.54	Feb. 22	10.28 S
July 12	23.27	July 12	27.50	Dec. 11	21.65	Mar. 21	8.74 S
Aug. 01	22.75	Sept. 13	29.00	Jan. 26, 1970	21.70		
Sept. 06	25.37	Oct. 19	26.84	Feb. 24	22.13		
26	24.26	Nov. 15	26.85	Dec. 29	27.82		

Highest 5.77 June 15, 1987

Lowest 36.80 June 20, 1986

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 114

Station number: 344114099323701. Local number: 03N-22W-32 CBAA 1

Location: Lat 34° 41' 17", long 99° 32' 33", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,432 ft

Well depth: 182 ft

Remarks: Previously published as 03N-22W-32 CBB 2

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 04, 1954	42 R	Oct. 20, 1959	44.20	June 17, 1963	41.20	Nov. 14, 1968	47.93
Mar. 19, 1956	44.43	Nov. 18	43.27	July 15	43.45	Dec. 10	47.03
Apr. 23	50.85	Dec. 14	43.08	Aug. 15	45.20	Jan. 07, 1969	48.32
May 21	46.53	Jan. 15, 1960	42.20	Nov. 15	54.16	Feb. 04	45.98
June 26	46.80	Feb. 22	41.22	Feb. 10, 1964	48.85	Mar. 11	45.44
July 23	47.83	Mar. 21	41.17	Jan. 12, 1965	50.26	Apr. 09	45.92
Aug. 27	58.17	May 17	42.75	Feb. 18	54.88	May 08	45.66
Sept. 17	58.24	June 20	41.75	May 26	54.97	June 19	47.01
Oct. 30	50.86	July 19	42.30	July 13	53.42	July 21	48.47
Nov. 26	49.66	Nov. 14	41.41	Sept. 30	53.32	Sept. 04	48.37
Dec. 27	48.61	Dec. 20	40.12	Oct. 12	52.00	Oct. 07	45.58
Jan. 22, 1957	48.39	Jan. 16, 1961	41.34	Nov. 05	48.34	Nov. 18	45.38
Feb. 26	47.83	Feb. 13	38.90	Jan. 04, 1966	45.47	Dec. 11	44.80
Apr. 04	47.04	Mar. 13	38.74	June 20	46.66	Jan. 27, 1970	44.07
May 07	42.06	Apr. 19	38.15	July 12	48.96	Feb. 24	43.68
28	39.05	May 16	39.99	Sept. 13	47.83	Dec. 12	P
June 24	36.35	June 20	39.35	Oct. 19	46.49	Dec. 28, 1976	38.45
Oct. 29	38.87	July 11	41.43	Nov. 15	46.21	Mar. 09, 1978	37.00
Nov. 18	38.36	31	41.80	Dec. 13	46.00	Mar. 13, 1979	40.10
Dec. 16	37.98	Sept. 06	44.66	Jan. 18, 1967	50.22	Feb. 28, 1980	40.76
Feb. 24, 1958	37.49	26	43.39	Feb. 16	49.62	Mar. 11, 1981	45.58 S
Mar. 24	37.80	Oct. 23	34.23	May 16	55.63	Mar. 09, 1982	43.82 S
Apr. 21	37.37	Nov. 21	41.45	June 15	57.65	Jan. 26, 1983	46.53 S
May 19	37.40	Dec. 05	41.25	July 12	53.92	Jan. 02, 1984	43.12 S
June 24	37.76	Jan. 31, 1962	40.52	Aug. 15	54.49	Jan. 10, 1985	47.17 S
July 29	37.20	Mar. 07	40.45	Sept. 13	53.58	Jan. 07, 1986	33.93 S
Aug. 26	39.56	28	42.29	Oct. 11	51.43	May 16	37.55
Sept. 23	39.01	May 23	42.70	Nov. 16	51.11	June 17	35.99
Oct. 27	38.83	June 27	41.40	Jan. 30, 1968	50.66	July 24	35.81
Nov. 18	38.96	Aug. 28	45.31	Feb. 20	48.93	Aug. 18	35.12
Jan. 09, 1959	40.27	Oct. 03	42.43	Mar. 26	48.13	Sept. 17	32.37
26	39.22	17	41.40	Apr. 25	48.21	Nov. 12	25.35
Feb. 23	39.27	Nov. 13	40.66	June 06	46.69	Dec. 16	24.73
Mar. 23	39.56	Jan. 08, 1963	37.89	19	46.67	Mar. 18, 1967	23.26 S
Apr. 21	42.24	Feb. 05	40.53	July 17	47.73	Apr. 15	23.78
May 19	41.69	Mar. 26	41.39	Aug. 15	49.88	Mar. 14, 1968	0
June 30	41.46	Apr. 23	44.79	Sept. 19	49.67		
Sept. 22	40.21	May 21	44.39	Oct. 10	48.86		
		Highest	23.26	Mar. 18, 1967			
		Lowest	58.17	Aug. 27, 1956			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 115

Station number: 344325099395901 Local number: 03N-23W-19 BBBB 1

Location: Lat 34 43'26", long 99 39'59", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,530.3 ft

Well depth: 170 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Jan. 19, 1954	81.72	Jan. 23, 1957	88.14 S	Dec. 29, 1970	98.85 S	Mar. 17, 1987	59.28 S
Feb. 08	81.84	Jan. 28, 1958	77.48	Dec. 14, 1971	95.70 S	Apr. 15	63.42 S
Apr. 21	83.40	Jan. 09, 1959	79.53 S	Jan. 07, 1975	75.87	May 11	64.40 S
June 23	79.60	Feb. 22, 1960	80.88 S	May 23, 1988	73.94	June 15	45.39 S
Aug. 25	83.60	Jan. 18, 1961	78.22 S	June 17	37.15 S	July 13	58.23 S
Sept. 22	84.30	Jan. 31, 1962	82.93 S	July 24	68.90	Aug. 10	62.70 S
Oct. 27	84.20	Jan. 08, 1963	83.79 S	Aug. 18	69.28	Sept. 15	64.08 S
Jan. 05, 1955	84.50	Jan. 13, 1965	94.98 S	Sept. 17	62.37	Oct. 13	66.32 S
Feb. 09	84.40	Jan. 04, 1966	90.78 S	Oct. 14	55.67	Nov. 16	64.72 S
Apr. 20	87.0	Jan. 30, 1968	97.55 S	Nov. 12	61.72	Jan. 25, 1988	64.75 S
June 22	82.70	Jan. 02, 1969	91.29 S	Dec. 16	64.12	Feb. 22	64.68 S
Mar. 20, 1956	85.10 S	Jan. 28, 1970	83.96 S	Feb. 24, 1987	64.95 S	Mar. 21	63.52 S
		Highest	37.15	June 17, 1986			
		Lowest	98.85	Dec. 29, 1970			

Index number on location map: 116

Station number: 344316099344401 Local number: 03N-23W-24 BBCC 1

Location: Lat 34 43'16", long 99 34'45", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,480.5 ft

Well depth: 190 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Aug. 31, 1953	81.12	Oct. 14, 1986	45.63 S	Apr. 15, 1987	41.28 S	Oct. 13, 1987	42.40 S
June 09, 1986	54.34	Nov. 12	42.02	May 11	44.33 S	Nov. 16	43.22 S
July 15	52.37	Dec. 16	41.64 S	June 15	39.17 S	Jan. 25, 1988	42.98 S
Aug. 04	54.18	Jan. 27, 1987	42.53 S	July 13	39.10 S	Feb. 22	42.75 S
13	53.98 S	Feb. 24	42.08 S	Aug. 10	40.59 S	Mar. 21	42.45 S
Sept. 17	50.58 S	Mar. 08	41.11 S	Sept. 15	42.30 S		
		Highest	39.10	July 13, 1987			
		Lowest	81.12	Aug. 31, 1953			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 117

Station number: 344220099355501 Local number: 03N-23W-27 ADAA 1

Location: Lat 34 42'21", long 99 35'52", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,467.7 ft

Well depth: 127 ft

Remarks: Previously published 03N-23W-27 AAD

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 10, 1948	29.97	Jan. 20, 1958	34.77	June 27, 1982	43.38	Nov. 14, 1988	45.02
Apr. 15, 1949	32.85	Feb. 26	33.84	Aug. 28	59.44	Dec. 10	43.69
Oct. 20	31.05	Mar. 26	33.92	Oct. 03	48.17	Jan. 02, 1989	43.08
Nov. 14, 1950	29.54	Apr. 22	33.72	17	42.97	Feb. 04	42.78
Apr. 25, 1951	31.39	May 20	33.70	Jan. 08, 1983	38.99	Mar. 11	42.42
Feb. 02, 1952	33.58	June 24	34.40	Feb. 05	38.80	June 18	40.82
Mar. 20	34.42	July 29	33.79	Mar. 28	39.30	July 20	44.96
Mar. 17, 1953	41.81	Aug. 26	39.32	May 21	45.00	Sept. 04	49.98
Oct. 22	49.47	Sept. 23	38.48	June 18	39.87	Oct. 07	44.79
Jan. 26, 1954	48.80	Oct. 27	37.92	July 15	48.50	Nov. 18	43.39
Feb. 08	48.08	Nov. 18	38.27	Nov. 22	49.68	Dec. 11	42.75
Apr. 21	50.85	Jan. 09, 1959	22.72	Jan. 12, 1985	48.90	Jan. 26, 1970	41.98
May 28	45.40	27	21.87	Feb. 18	47.92	Feb. 24	42.12
June 23	44.04	Feb. 24	39.17	Apr. 02	48.81	Dec. 07, 1978	37.44
Sept. 22	87.79	Mar. 24	41.18	05	49.88	Mar. 09, 1978	34.94
Oct. 28	59.22	Apr. 21	44.88	May 28	54.23	Mar. 13, 1979	40.02
Dec. 01	55.76	May 19	42.60	July 13	50.97	Feb. 28, 1980	41.81
Jan. 05, 1955	54.01	June 30	39.09	Sept. 29	63.37	Mar. 11, 1981	47.38 SR
24	53.14	July 21	41.71	Oct. 12	58.70	Mar. 09, 1982	41.38 S
Feb. 09	50.35	Sept. 22	51.72	Nov. 05	47.01	Jan. 26, 1983	41.08 S
22	49.74	Oct. 20	47.19	Jan. 04, 1986	43.25	Jan. 20, 1984	36.77 S
Mar. 23	52.87	Nov. 19	44.49	Apr. 19	43.93	Jan. 10, 1985	44.03 S
May 25	50.84	Dec. 22	42.28	July 12	52.92	Jan. 07, 1986	29.91 S
June 23	47.15	Jan. 26, 1980	41.51	Sept. 13	50.92	May 16	32.10 S
July 27	45.48	Feb. 22	40.30	Oct. 19	46.38	June 17	29.81 S
Aug. 24	53.88	Mar. 21	39.70	Nov. 15	44.79	July 24	30.64 S
Sept. 28	57.68	Apr. 19	39.64	Dec. 13	48.04	Aug. 18	30.50 S
Oct. 26	42.74	May 17	40.48	Jan. 17, 1987	44.71	Sept. 17	25.89 S
Dec. 21	42.00	June 21	40.53	Feb. 18	46.46	Oct. 14	23.06 S
Jan. 31, 1958	41.77	July 19	40.90	Apr. 13	59.19	Nov. 12	22.07 S
Feb. 21	41.72	Aug. 18	52.64	May 16	55.39	Dec. 18	22.18 S
Mar. 20	43.50	Sept. 13	44.10	June 15	53.56	Jan. 27, 1987	22.48 S
May 22	53.71	Oct. 24	38.11	July 12	51.12	Feb. 24	21.78 S
June 26	43.64	Nov. 14	37.23	Aug. 15	57.72	Mar. 18	21.10 S
July 24	46.84	Dec. 21	38.17	Sept. 13	59.04	Apr. 16	22.08 S
Aug. 28	63.43	Jan. 10, 1981	34.38	Oct. 11	53.80	May 11	23.58 S
Oct. 30	52.84	Mar. 14	33.97	Dec. 12	57.77	June 15	20.48 S
Nov. 27	49.17	May 17	36.31	Jan. 30, 1988	48.82	July 13	21.57 S
Dec. 18	48.48	June 21	35.23	Feb. 20	48.80	Aug. 10	25.24 S
Jan. 22, 1957	47.22	July 12	36.95	Mar. 26	47.82	Sept. 15	23.30 S
Feb. 26	46.44	Sept. 08	48.54	Apr. 25	47.23	Oct. 13	23.12 S
Apr. 04	45.58	26	45.51	June 02	44.78	Nov. 16	22.82 S
May 07	39.76	Nov. 14	42.02	19	43.89	Dec. 29	23.05 S
Oct. 01	34.85	Dec. 05	41.82	July 17	42.29	Jan. 25, 1988	22.52 S
29	33.98	Jan. 31, 1982	40.14	Aug. 15	51.85	Feb. 22	22.68 S
Nov. 19	33.69	Mar. 07	39.91	Sept. 19	45.92	Mar. 21	22.10 S
Dec. 17	33.65	Apr. 25	54.53	Oct. 10	45.28		

Highest 20.46 June 15, 1987

Lowest 87.79 Sept. 22, 1954

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 118

Station number: 344032098390201 Local number: 03N-23W-30 DAA 1

Location: Lat 34°42'09", long 99°39'01", hydrologic unit 11120202

Aquifer: 313BLIN

Altitude of land-surface datum: 1,453.7 ft

Well depth: 90 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Feb. 05, 1952	19.42 S	Jan. 26, 1960	24.72 S	Dec. 07, 1976	20.40	Oct. 14, 1986	10.53 S
Feb. 08, 1954	24.42 S	Jan. 16, 1961	20.62 S	Mar. 09, 1978	19.75	Nov. 12	9.48 S
Apr. 21	27.70 S	Jan. 31, 1962	21.19 S	Mar. 13, 1979	23.43	Dec. 18	10.23 S
June 23	23.10 S	Jan. 08, 1963	24.13 S	Feb. 28, 1980	24.37	Apr. 15, 1987	9.44 S
Sept. 22	29.79 S	Feb. 10, 1964	29.95 S	Mar. 09, 1982	25.42 S	May 11	10.16 S
Oct. 27	29.30 S	Jan. 13, 1965	29.94 S	Jan. 26, 1983	24.51 S	Aug. 10	9.18 S
Jan. 05, 1955	27.60 S	Jan. 04, 1966	28.67 S	Jan. 20, 1984	22.05 S	Sept. 15	10.49 S
Feb. 09	27.20 S	Jan. 17, 1967	30.69 S	Jan. 10, 1985	23.69 S	Oct. 13	10.85 S
Apr. 20	35.80 S	Jan. 30, 1968	33.39 S	Jan. 07, 1986	19.05 S	Nov. 18	10.89 S
June 22	27.20 S	Jan. 02, 1969	28.46 S	May 16	16.72 S	Jan. 25, 1988	10.88 S
Mar. 20, 1956	25.97 S	Jan. 26, 1970	22.49 S	June 17	15.89 S	Feb. 22	11.16 S
Jan. 23, 1957	28.90 S	Dec. 29	34.23 S	July 24	15.88 S	Mar. 21	10.60 S
Jan. 28, 1958	20.88 S	Dec. 14, 1971	33.60 S	Aug. 18	16.85 S		
Jan. 09, 1959	22.57 S	Jan. 07, 1975	19.67 S	Sept. 17	13.83 S		
		Highest	9.18	Aug. 10, 1987			
		Lowest	35.80	Apr. 20, 1955			

Index number on location map: 119

Station number: 344144099354501 Local number: 03N-23W-35 BBBB 1

Location: Lat 34°41'44", long 99°35'45", hydrologic unit 11120202

Aquifer: 313VVCR

Altitude of land-surface datum: 1,438 ft

Well depth: 94 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 09, 1986	15.99 S	Dec. 16, 1986	9.55 S	July 13, 1987	9.12 S	Jan. 25, 1988	11.42 S
July 15	15.34 S	Jan. 27, 1987	10.42 S	Aug. 10	12.20 S	Feb. 22	10.95 S
Aug. 13	18.20 S	Feb. 24	10.01 S	Sept. 15	12.27 S	Mar. 21	11.19 S
Sept. 17	13.13 S	Mar. 18	9.13 S	Oct. 13	11.67 S		
Oct. 14	9.85 S	Apr. 15	9.95 S	Nov. 16	11.32 S		
Nov. 12	8.65 S	June 15	9.35 S	Dec. 29	11.64 S		
		Highest	8.65	Nov. 12, 1986			
		Lowest	18.20	Aug. 13, 1986			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

CHILDRESS COUNTY, TEXAS

Index number on location map: 120

Station number: 344240100000801 Local number: 03N-27W-23 DD 1

Location: Lat 34 42'40", long 100 00'08", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,697 ft

Well depth: 97 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
Apr. 16, 1986	70.60 S	Sept. 18, 1986	89.35 S	May 12, 1987	72.59 S	Oct. 14, 1987	71.77 S
May 15	107.62	Oct. 15	88.25 S	June 18	63.36 S	Nov. 17	70.62 S
June 18	80.83	Nov. 13	82.34 S	July 14	66.28 S	Jan. 26, 1988	69.38 S
July 23	87.20	Dec. 17	77.50 S	Aug. 11	75.72 S	Feb. 23	69.38 S
Aug. 13	89.72	Apr. 16, 1987	70.60 S	Sept. 16	75.22 S	Mar. 22	69.05 S
Highest 63.36				June 16, 1987			
Lowest 107.62				May 15, 1986			

Index number on location map: 121

Station number: 344127100093801 Local number: 12-23-001

Location: Lat 34 41'27", long 100 09'38", hydrologic unit 11120105

Aquifer: 313BLIN

Altitude of land-surface datum: 1,762 ft

Well depth: 178 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 17, 1987	55.62 SP	Oct. 09, 1987	37.62 S	Jan. 26, 1988	36.05 S		
July 17	35.25 S	14	37.20 S	Feb. 23	36.48 S		
Sept. 16	38.69 S	Nov. 17	30.48 S	Mar. 22	36.35 S		
Highest 30.48				Nov. 17, 1987			
Lowest 38.69				Sept. 16, 1987			

Index number on location map: 122

Station number: 344006100083901 Local number: 12-23-003

Location: Lat 34 40'06", long 100 08'39", hydrologic unit 11120105

Aquifer: 313BLIN

Altitude of land-surface datum: 1,745 ft

Well depth: 177 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 13, 1987	53.98 S	Sept. 16, 1987	55.03 S	Nov. 17, 1987	55.50 S	Feb. 21, 1988	55.41 S
July 17	52.93 S	Oct. 09	55.25 S	Dec. 30	55.52 S	Mar. 22	56.11 S
Aug. 12	55.54 S	14	55.38 S	Jan. 26, 1988	55.55 S		
Highest 52.93				July 17, 1987			
Lowest 56.11				Mar. 22, 1988			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

CHILDRESS COUNTY, TEXAS--Continued

Index number on location map: 123

Station number: 344253100033901 Local number: 12-24-207

Location: Lat 34 42'53", long 100 03'39", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,732 ft

Well depth: 212 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 24, 1987	60.70 S	Oct. 09, 1987	76.89 S	Jan. 26, 1988	63.58 S		
July 17	59.03 S	14	62.58 S	Feb. 23	62.62 S		
Sept. 16	63.79 S	Nov. 17	61.41 S	Mar. 22	63.43 S		
		Highest	59.03	July 17, 1987			
		Lowest	76.89	Oct. 09, 1987			

Index number on location map: 124

Station number: 343542100055901 Local number: 12-32-101

Location: Lat 34 35'42", long 100 05'59", hydrologic unit 11120105

Aquifer: 313BLIN

Altitude of land-surface datum: 1,702 ft

Well depth: 170 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
May 13, 1987	83.13 S	Sept. 16, 1987	82.82 S	Nov. 17, 1987	83.42 S	Mar. 22, 1988	83.13 S
July 17	81.61 S	Oct. 09	82.93 S	Jan. 26, 1988	83.76 S		
Aug. 12	82.20 S	14	82.86 S	Feb. 23	83.60 S		
		Highest	81.61	July 17, 1987			
		Lowest	83.76	Jan. 26, 1988			



Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

COLLINGSWORTH COUNTY, TEXAS

Index number on location map: 125

Station number: 344739100092001 Local number: 12-15-601

Location: Lat 34° 47' 39", long 100° 09' 20", hydrologic unit 11120202

Aquifer: 310WTRS

Altitude of land-surface datum: 1,964 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 24, 1987	64.85 S	Sept. 18, 1987	69.90 S	Nov. 17, 1987	55.63 S	Feb. 23, 1988	54.62 S
July 17	69.97 S	Oct. 09	82.33 S	Dec. 30	54.95 S	Mar. 22	54.70 S
Aug. 12	67.70 S	14	55.60 S	Jan. 26, 1988	55.90 S		
		Highest	54.70	Mar. 22, 1988			
		Lowest	82.33	Oct. 09, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARDEMAN COUNTY, TEXAS

Index number on location map: 126

Station number: 342444099441001 Local number: 02S-24W-05 CADB 1

Location: Lat 34 24'44", long 99 44'10", hydrologic unit 11130101

Aquifer: 110RRVT

Altitude of land-surface datum: 1,440 ft

Well depth: 27 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 08, 1987	13.44 S	Aug. 12, 1987	13.85 S	Nov. 16, 1987	13.60 S	Feb. 23, 1988	13.41 S
10	13.49 S	Sept. 15	10.68 SX	Dec. 17	13.47 S	Mar. 22	13.18 S
30	13.68 S	Oct. 13	13.78 S	Jan. 20, 1988	13.17 S		
		Highest	10.68	Sept. 15, 1987			
		Lowest	13.85	Aug. 12, 1987			

Index number on location map: 127

Station number: 343436099572201 Local number: 01N-26W-08 BADD 1

Location: Lat 34 34'36", long 99 57'22", hydrologic unit 11130101

Aquifer: 313VCCR

Altitude of land-surface datum: 1,555 ft

Well depth: 70 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
July 22, 1987	12.65 S	Sept. 15, 1987	12.23 S	Nov. 16, 1987	12.64 S	Jan. 20, 1988	12.02 S
Aug. 17	12.55 S	Oct. 13	12.77 S	Dec. 16	12.40 S	Feb. 23	12.40 S
		Highest	12.02	Jan. 20, 1988			
		Lowest	12.77	Oct. 13, 1987			

Index number on location map: 128

Station number: 343009099540501 Local number: 13-25-902

Location: Lat 34 30'09", long 99 54'05", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,598 ft

Well depth: 250 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	94.74 S	Sept. 15, 1987	95.43 S	Dec. 17, 1987	94.30 S	Mar. 22, 1988	94.52 S
July 17	96.29 S	Oct. 13	94.50 S	Jan. 20, 1988	94.30 S		
Aug. 11	99.69 S	Nov. 16	94.32 S	Feb. 23	94.55 S		
		Highest	94.30	Dec. 17, 1987 and Jan. 20, 1988			
		Lowest	99.69	Aug. 11, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARDEMAN COUNTY, TEXAS--Continued

Index number on location map: 129

Station number: 342940099574201 Local number: 13-33-102

Location: Lat 34° 29' 40", long 99° 57' 42", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,781 ft

Well depth: 195 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	139.38 SP	Sept. 15, 1987	134.88 S	Nov. 18, 1987	131.44 S	Feb. 23, 1988	151.54 S
Aug. 11	141.54 SR	Oct. 13	137.19 S	Jan. 20, 1988	147.08 S	Mar. 22	152.78 SR
		Highest	131.44	Nov. 18, 1987			
		Lowest	151.54	Feb. 23, 1988			

Index number on location map: 130

Station number: 342554099592901 Local number: 13-33-403

Location: Lat 34° 29' 00", long 99° 59' 25", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,677 ft

Well depth: 230 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	79.18 S	Sept. 15, 1987	80.62 S	Jan. 20, 1988	81.87 S		
July 17	78.53 S	Oct. 13	80.99 S	Feb. 23	82.18 S		
Aug. 11	79.58 S	Nov. 18	80.97 S	Mar. 22	81.85 S		
		Highest	78.53	July 17, 1987			
		Lowest	82.18	Feb. 23, 1988			

Index number on location map: 131

Station number: 342807099585401 Local number: 13-33-501

Location: Lat 34° 28' 07", long 99° 56' 54", hydrologic unit 11130101

Aquifer: 313BLIN

Altitude of land-surface datum: 1,828 ft

Well depth: 200 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	78.31 S	Sept. 15, 1987	74.15 S	Dec. 17, 1987	74.04 S	Mar. 22, 1988	74.99 S
July 17	75.23 S	Oct. 13	74.40 S	Jan. 20, 1988	74.34 S		
Aug. 11	73.62 S	Nov. 18	73.94 S	Feb. 23	75.09 S		
		Highest	73.62	Aug. 11, 1987			
		Lowest	78.31	June 23, 1987			

Table 2.--Monthly or periodic water-level measurements in selected wells in southwestern Oklahoma and northwestern Texas--Continued

HARDEMAN COUNTY, TEXAS--Continued

Index number on location map: 132  
 Station number: 342417099493801 ° Local number: 13-34-802  
 Location: Lat 34° 24' 17", long 99° 49' 38", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,520 ft  
 Well depth: 110 ft

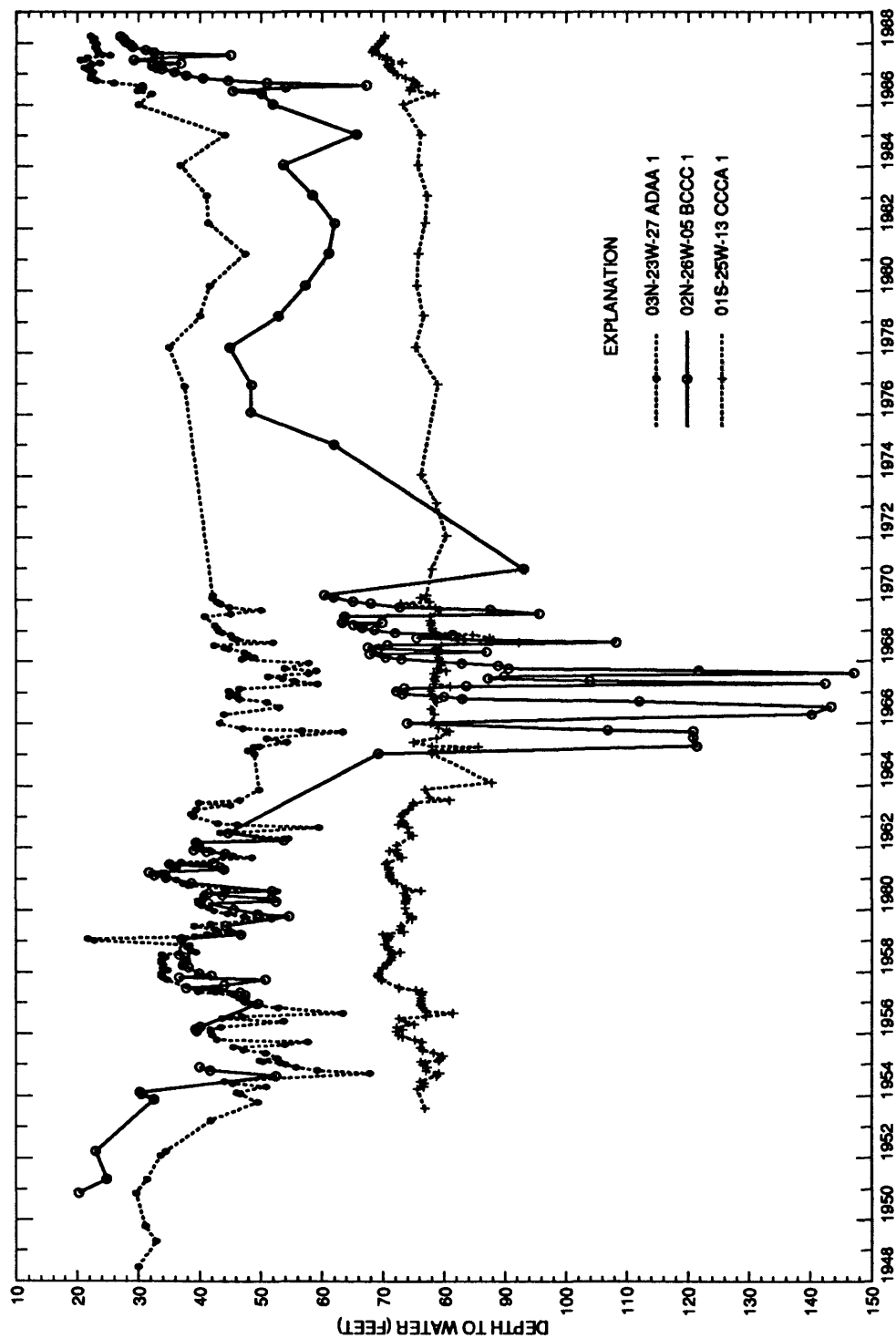
Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	40.87 S	Sept. 15, 1987	34.39 S	Dec. 17, 1987	34.38 S	Mar. 22, 1988	42.90 S
July 17	33.59 S	Oct. 13	34.29 S	Jan. 20, 1988	34.49 S		
Aug. 11	33.57 S	Nov. 18	34.19 S	Feb. 23	38.08 S		
		Highest	33.57	Aug. 11, 1987			
		Lowest	42.90	Mar. 22, 1988			

Index number on location map: 133  
 Station number: 342430099481401 ° Local number: 13-34-905  
 Location: Lat 34° 24' 30", long 99° 48' 14", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,525 ft  
 Well depth: 137 ft

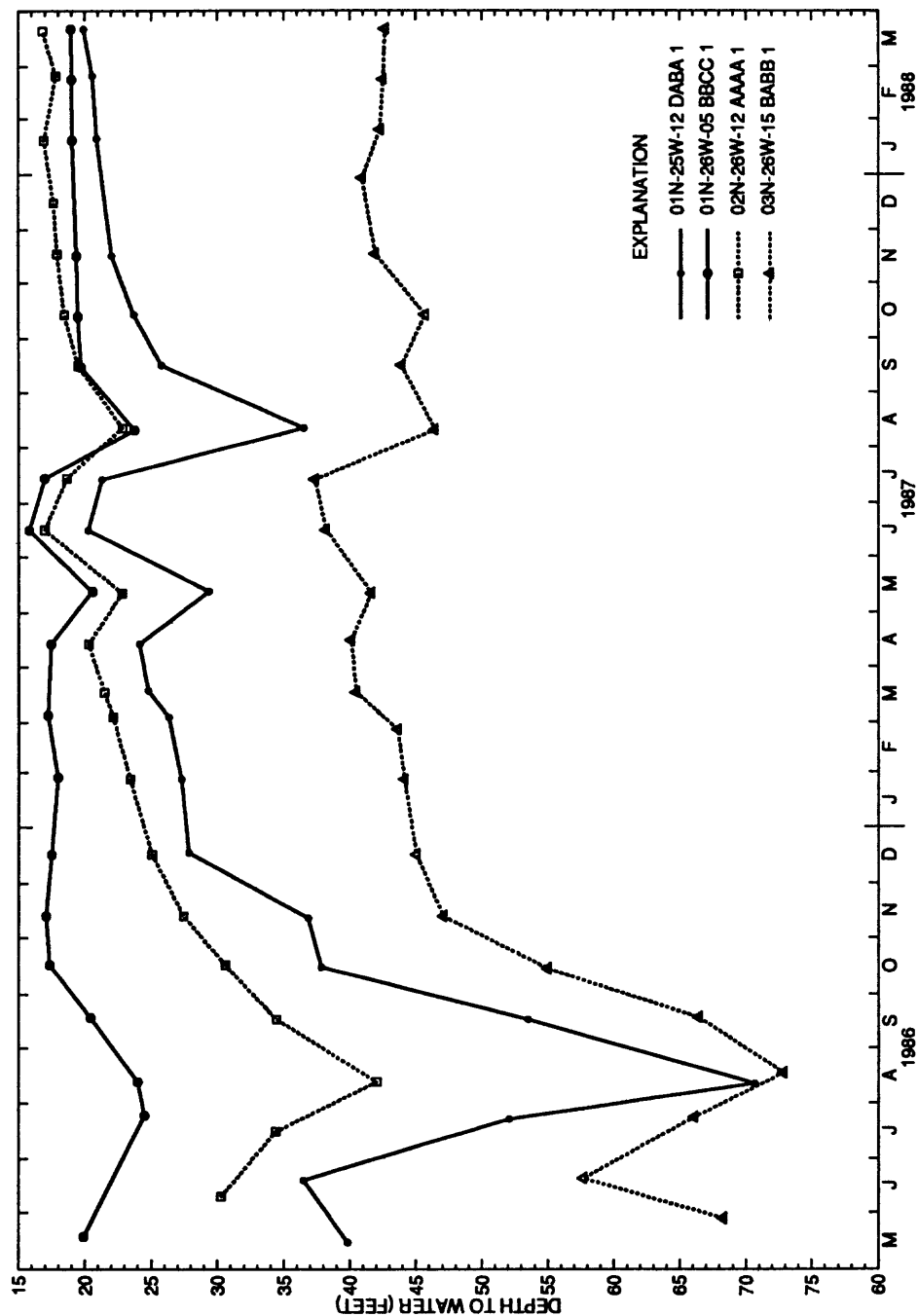
Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	48.82 S	Sept. 15, 1987	49.28 S	Dec. 17, 1987	50.53 S	Mar. 22, 1988	51.74 S
July 17	48.58 S	Oct. 13	49.83 S	Jan. 20, 1988	51.03 S		
Aug. 11	48.83 S	Nov. 18	50.11 S	Feb. 23	51.49 S		
		Highest	48.58	July 17, 1987			
		Lowest	51.74	Mar. 22, 1988			

Index number on location map: 134  
 Station number: 342413099443101 ° Local number: 13-35-701  
 Location: Lat 34° 24' 13", long 99° 44' 31", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,490 ft  
 Well depth: 78 ft

Date	Water level MS	Date	Water level MS	Date	Water level MS	Date	Water level MS
June 23, 1987	48.54 S	Sept. 15, 1987	48.77 S	Dec. 17, 1987	48.75 S	Mar. 22, 1988	47.35 S
July 17	47.88 S	Oct. 13	47.81 S	Jan. 20, 1988	47.05 S		
Aug. 11	47.28 S	Nov. 18	48.73 S	Feb. 23	47.24 S		
		Highest	48.73	Nov. 18, 1987			
		Lowest	48.54	June 23, 1987			



**Figure 4.** Hydrograph of wells 03N-23W-27 ADAA 1, 02N-26W-05 BCCC 1, and 01S-25W-13 CCAA 1 from June 1948 to March 1988 drilled in the Blaine aquifer.



**Figure 5.** Hydrograph of wells 01N-25W-12 DABA 1, 01N-26W-05 BBCC 1, 02N-26W-12 AAAA 1, and 03N-26W-15 BABB 1 from May 1986 to March 1988 drilled in the Blaine aquifer.

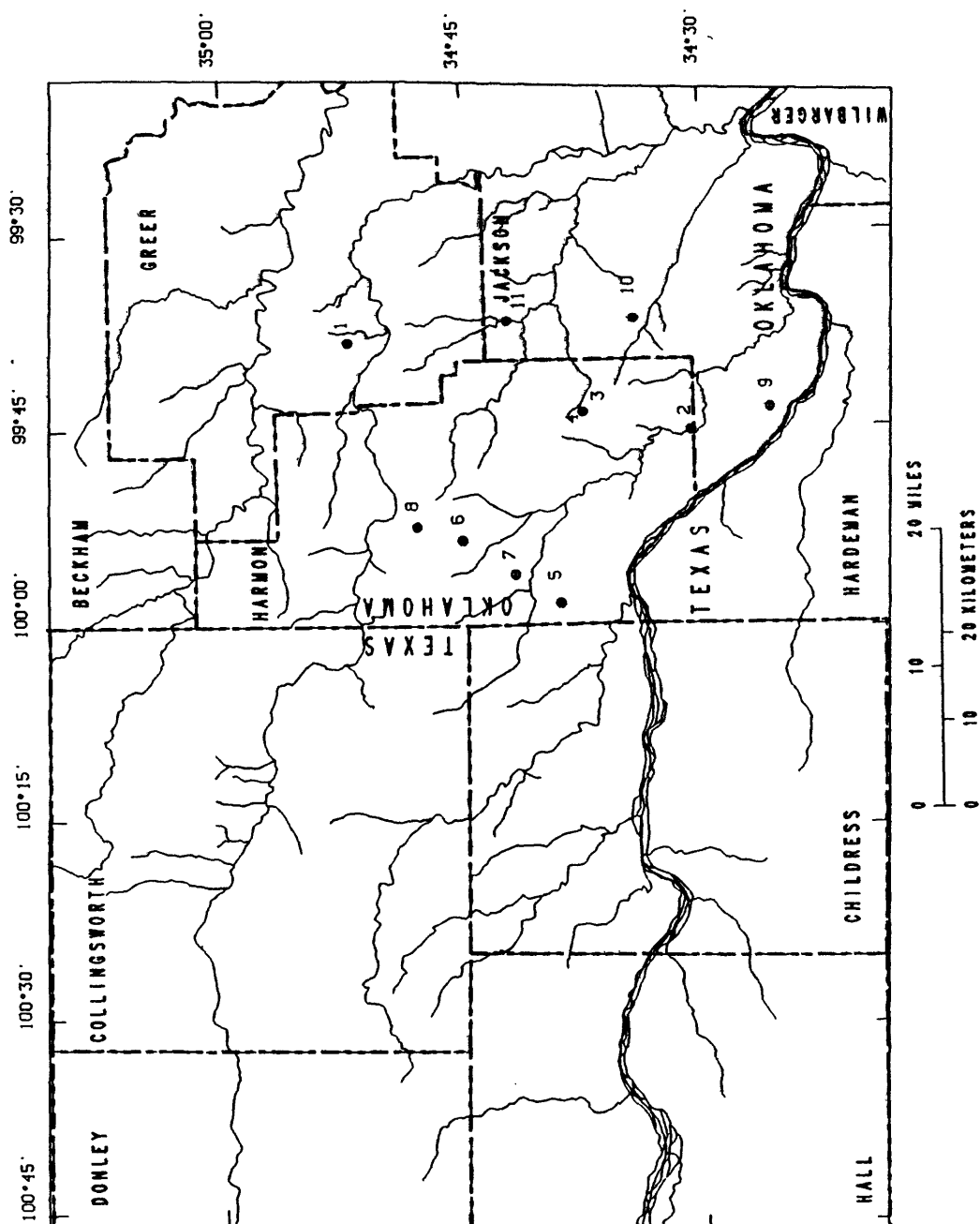


Figure 6. Location of wells equipped with water-level recorders in southwestern Oklahoma (index numbers on map refer to sites in table 3).

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma

[Water levels are in feet below land-surface datum; index number on location map refers to the number adjacent to the well symbol on figure 8; 110RRVT, Red River terrace aquifer; 110SFRT, Salt Fork Red River terrace aquifer; 110SFTA, Salt Fork Red River terrace and alluvial aquifer; 111RRVA, Red River alluvial aquifer; 111SFRR, Salt Fork Red River alluvial aquifer; 310WTRS, Whitehorse Group; 313BLIN, Blaine Gypsum (or Formation); 313CLGR, Collingsworth Gypsum Bed of the Elm Fork Member; 313DGCK, Dog Creek Shale; 313EMFK, Elm Fork Member of Blaine Gypsum (or Formation); 313FLRP, Flowerpot Shale; 313VVCr, Van Vactor Member of Blaine Gypsum (or Formation); -- no data]

## GREER COUNTY, OKLAHOMA

Index number on location map: 1  
 Station number: 345203099382801 Local number: 05N-23W-32 AADD 1  
 Location: Lat 34°52'03", long 99°38'28", hydrologic unit 11120202  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,705 ft  
 Well depth: 120 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	28.19	29.12	29.91	28.54	28.63	28.08	24.16	24.60	25.98
2	--	--	--	27.97	29.22	29.87	28.76	28.57	27.97	24.10	24.62	25.96
3	--	--	--	28.25	29.32	29.90	28.64	28.71	28.06	24.09	24.67	25.99
4	--	--	--	28.25	29.38	29.88	28.65	28.88	27.96	24.02	24.76	26.02
5	--	--	--	28.15	29.56	29.69	28.66	28.97	27.78	24.06	24.78	26.06
6	--	--	--	28.25	29.60	29.57	28.58	29.01	27.63	24.09	24.78	26.13
7	--	--	--	28.44	29.64	29.49	28.57	29.01	27.52	24.09	24.83	26.19
8	--	--	--	28.38	29.59	29.36	28.53	29.00	27.44	24.12	24.86	26.29
9	--	--	--	28.35	29.59	29.43	28.42	28.94	27.34	24.11	24.95	26.28
10	--	--	--	28.51	29.49	29.43	28.47	28.92	27.18	24.10	24.97	26.31
11	--	--	--	28.56	29.57	29.37	28.34	28.97	26.85	24.10	24.94	26.38
12	--	--	--	28.51	29.66	29.35	28.35	29.03	26.80	24.13	24.96	26.43
13	--	--	--	28.45	29.55	29.18	28.52	29.04	26.32	24.27	25.03	26.45
14	--	--	--	28.44	29.43	28.94	28.58	29.11	26.00	24.23	25.07	26.53
15	--	--	--	28.63	29.61	28.99	28.57	29.17	25.70	24.17	25.13	26.48
16	--	--	--	28.72	29.77	28.84	28.53	29.11	25.44	24.18	25.20	26.55
17	--	--	27.68	28.68	29.87	28.74	28.48	29.08	25.27	24.14	25.26	26.67
18	--	--	27.73	28.66	29.89	28.86	28.46	29.10	25.15	24.24	25.32	26.77
19	--	--	27.65	28.80	29.92	28.89	28.52	29.16	24.91	24.31	25.37	26.79
20	--	--	27.75	28.94	29.96	28.81	28.70	29.15	24.76	24.37	25.42	26.82
21	--	--	27.89	28.82	29.87	28.83	28.83	29.30	24.64	24.39	25.46	26.90
22	--	--	27.84	28.93	29.88	28.64	28.69	29.42	24.54	24.37	25.53	26.98
23	--	--	27.72	28.79	29.86	28.56	28.67	29.37	24.51	24.35	25.62	26.92
24	--	--	27.74	28.86	29.90	28.76	28.75	29.31	24.46	24.43	25.58	26.89
25	--	--	27.89	29.03	29.95	28.86	28.77	29.29	24.42	24.48	25.54	26.96
26	--	--	27.99	29.13	29.89	28.79	28.79	29.30	24.40	24.48	25.65	27.00
27	--	--	28.01	29.08	29.78	28.57	28.80	29.34	24.28	24.49	25.80	27.04
28	--	--	28.04	28.99	29.77	28.75	28.79	29.27	24.19	24.50	25.84	27.20
29	--	--	28.07	29.16	--	28.85	28.70	28.80	24.16	24.53	25.83	27.29
30	--	--	28.03	29.30	--	28.76	28.67	28.54	24.19	24.57	25.86	27.30
31	--	--	28.03	29.14	--	28.66	--	28.29	--	24.60	25.95	--
Mean	--	--	--	28.66	29.66	29.11	28.61	29.03	25.92	24.27	25.23	26.59
Max.	--	--	--	29.30	29.96	29.91	28.83	29.42	28.06	24.60	25.95	27.30
Min.	--	--	--	27.97	29.12	28.56	28.34	28.29	24.16	24.02	24.60	25.96

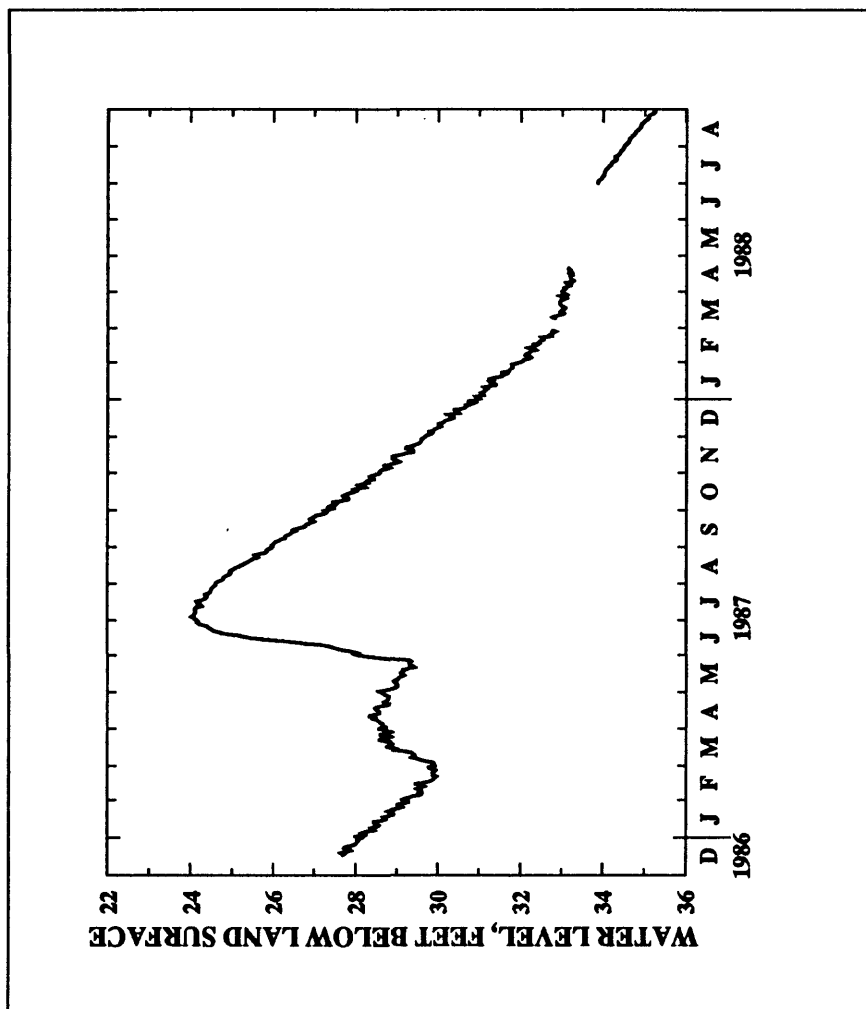


Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## GREER COUNTY, OKLAHOMA--Continued

05N-23W-32 AADD 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	27.24	28.58	29.69	31.00	31.99	--	32.99	--	--	33.86	34.51	--
2	27.39	28.57	29.70	30.95	32.05	--	33.03	--	--	33.89	34.54	--
3	27.49	28.59	29.83	30.90	32.06	--	33.07	--	--	33.89	34.57	--
4	27.34	28.67	29.86	31.09	32.19	--	33.04	--	--	33.93	34.60	--
5	27.37	28.82	29.75	31.06	32.25	--	33.14	--	--	33.98	34.61	--
6	27.51	28.74	29.87	31.02	32.20	--	33.24	--	--	33.98	34.63	--
7	27.54	28.66	29.91	31.11	32.11	--	33.13	--	--	34.00	34.64	--
8	27.43	28.84	29.98	31.11	32.13	--	33.09	--	--	34.03	34.67	--
9	27.62	28.98	30.06	31.18	32.21	32.84	33.23	--	--	34.02	34.70	--
10	27.82	29.06	30.01	31.20	32.23	32.76	33.27	--	--	34.02	34.73	--
11	27.83	28.99	30.00	31.11	32.34	32.83	33.21	--	--	34.04	34.75	--
12	27.71	28.93	30.11	31.25	32.25	32.97	33.20	--	--	34.06	34.77	--
13	27.68	28.87	30.14	31.42	32.17	33.05	33.18	--	--	34.09	34.79	--
14	27.75	28.87	30.17	31.33	32.30	33.01	33.19	--	--	34.12	34.83	--
15	27.82	28.93	30.31	31.25	32.36	32.96	33.26	--	--	34.14	34.85	--
16	27.93	29.11	30.37	31.22	32.32	32.98	33.25	--	--	34.17	34.88	--
17	28.00	29.19	30.34	31.32	32.46	33.04	33.17	--	--	34.19	34.91	--
18	27.89	29.39	30.27	31.26	32.44	33.08	33.22	--	--	34.19	34.91	--
19	28.02	29.39	30.22	31.36	32.48	33.02	33.22	--	--	34.24	34.92	--
20	28.22	29.37	30.49	31.55	32.55	32.95	33.17	--	--	34.31	34.94	--
21	28.16	29.21	30.44	31.57	32.55	32.95	33.14	--	--	34.32	34.97	--
22	28.06	29.22	30.47	31.64	32.50	32.93	--	--	--	34.28	35.01	--
23	28.15	29.37	30.37	31.51	32.73	32.95	--	--	--	34.28	35.06	--
24	28.29	29.42	30.58	31.68	32.69	32.95	--	--	--	34.34	35.09	--
25	28.24	29.53	30.64	31.72	32.76	33.05	--	--	--	34.38	35.08	--
26	28.28	29.55	30.69	31.75	32.75	33.11	--	--	--	34.39	35.09	--
27	28.46	29.57	30.67	31.79	32.83	33.01	--	--	--	34.41	35.12	--
28	28.38	29.57	30.83	31.78	32.75	32.94	--	--	--	34.43	35.21	--
29	28.34	29.60	30.89	31.80	--	33.11	--	--	--	34.47	35.23	--
30	28.41	29.65	30.70	31.78	--	33.07	--	--	--	34.50	35.21	--
31	28.51	--	30.88	31.88	--	33.02	--	--	--	34.50	--	--
Mean	27.90	29.11	30.27	31.37	--	--	--	--	--	34.18	--	--
Max.	28.51	29.65	30.89	31.88	--	--	--	--	--	34.50	--	--
Min.	27.24	28.57	29.69	30.90	--	--	--	--	--	33.86	--	--



**Figure 7.** Hydrograph of well 05N-23W-32 AADD 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA

Index number on location map: 2  
 Station number: 343041099451001 Local number: 01N-24W-32 CBCC 1  
 Location: Lat 34°30'41", long 99°45'10", hydrologic unit 11130101  
 Aquifer: 313VVCR  
 Altitude of land-surface datum: 1,483 ft  
 Well depth: 76.5 ft

Water Year, October 1985 to September 1986												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	29.37	29.78	34.14	31.56
2	--	--	--	--	--	--	--	--	28.42	29.39	33.26	31.50
3	--	--	--	--	--	--	--	--	28.46	29.12	32.79	31.46
4	--	--	--	--	--	--	--	--	28.47	28.98	32.23	31.41
5	--	--	--	--	--	--	--	--	27.73	29.09	31.89	31.28
6	--	--	--	--	--	--	--	--	27.22	29.63	31.68	31.18
7	--	--	--	--	--	--	--	--	27.59	30.23	31.94	31.16
8	--	--	--	--	--	--	--	--	27.80	31.14	32.89	31.06
9	--	--	--	--	--	--	--	--	27.92	31.48	33.83	30.98
10	--	--	--	--	--	--	--	--	28.05	31.40	34.48	30.91
11	--	--	--	--	--	--	--	--	28.11	30.93	34.46	30.92
12	--	--	--	--	--	--	--	--	28.08	30.51	35.01	30.88
13	--	--	--	--	--	--	--	--	28.16	30.33	34.70	30.82
14	--	--	--	--	--	--	--	--	28.21	30.33	34.10	30.76
15	--	--	--	--	--	--	--	--	28.24	31.96	33.50	30.70
16	--	--	--	--	--	--	--	--	28.33	33.22	32.93	30.60
17	--	--	--	--	--	--	--	--	28.46	33.93	32.63	30.51
18	--	--	--	--	--	--	--	--	28.44	34.23	32.98	30.50
19	--	--	--	--	--	--	--	--	28.42	34.29	33.08	30.46
20	--	--	--	--	--	--	--	--	28.44	33.54	32.97	30.44
21	--	--	--	--	--	--	--	--	28.45	32.45	32.87	30.41
22	--	--	--	--	--	--	--	--	28.47	31.75	32.50	30.37
23	--	--	--	--	--	--	--	--	28.61	31.29	32.31	30.32
24	--	--	--	--	--	--	--	--	28.92	30.98	32.16	30.28
25	--	--	--	--	--	--	--	--	28.99	31.13	32.07	30.31
26	--	--	--	--	--	--	--	--	28.83	32.13	31.99	30.28
27	--	--	--	--	--	--	--	--	28.83	32.88	31.95	30.27
28	--	--	--	--	--	--	--	--	28.89	33.14	31.86	30.23
29	--	--	--	--	--	--	--	28.22	28.97	34.17	31.76	29.61
30	--	--	--	--	--	--	--	28.27	29.15	34.84	31.69	28.84
31	--	--	--	--	--	--	--	28.31	--	34.99	31.62	--
Mean	--	--	--	--	--	--	--	--	28.37	31.72	32.85	30.67
Max.	--	--	--	--	--	--	--	--	29.15	34.99	35.01	31.56
Min.	--	--	--	--	--	--	--	--	27.22	28.98	31.62	28.84

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 01N-24W-32 CBCC 1--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	28.92	28.55	28.57	28.70	28.47	25.48	28.01	28.60	24.62	25.64	27.59	27.52
2	28.20	28.56	28.61	28.56	28.49	25.61	28.16	28.59	24.83	25.70	27.87	27.78
3	27.34	28.47	28.64	28.73	28.51	25.74	28.09	28.64	25.02	25.80	28.06	27.48
4	26.34	28.28	28.66	28.70	28.52	25.79	28.12	28.68	25.09	25.84	28.82	27.28
5	26.68	28.18	28.61	28.63	28.51	25.75	28.14	28.69	25.13	25.91	28.90	27.19
6	26.99	28.06	28.54	28.68	28.42	25.77	28.11	28.68	25.18	26.19	27.61	27.15
7	27.11	28.16	28.54	28.76	28.35	25.79	28.12	28.66	25.23	27.15	27.19	27.12
8	27.19	28.29	28.55	28.68	28.38	25.78	28.10	28.66	25.29	27.40	27.02	27.13
9	27.32	28.39	28.62	28.64	28.35	25.89	28.06	28.63	25.30	27.55	28.95	27.09
10	27.30	28.36	28.63	28.71	28.28	25.92	28.11	28.63	25.23	27.71	28.88	27.08
11	27.24	28.39	28.57	28.72	28.32	25.93	28.05	28.66	24.86	27.12	28.83	27.09
12	26.99	28.48	28.64	28.67	28.36	25.96	28.08	28.68	24.82	26.83	27.05	27.07
13	26.95	28.51	28.63	28.62	28.27	25.90	28.19	28.69	25.04	28.70	27.93	27.03
14	27.01	28.33	28.59	28.62	28.21	25.83	28.20	28.73	25.15	28.81	29.01	27.04
15	27.12	28.33	28.61	28.71	28.27	25.92	28.19	28.78	25.21	27.21	27.89	26.98
16	27.12	28.36	28.62	28.73	28.08	25.87	28.18	28.87	25.26	27.39	27.17	27.00
17	27.12	28.36	28.62	28.68	28.01	25.76	28.17	28.93	25.34	28.93	28.94	27.02
18	27.17	28.51	28.63	28.66	28.11	25.72	28.17	27.01	25.42	28.60	28.83	27.05
19	27.22	28.41	28.58	28.72	28.16	25.84	28.22	27.01	25.41	28.53	28.78	27.02
20	27.21	28.58	28.63	28.77	28.18	25.88	28.32	28.93	25.45	28.51	28.77	27.02
21	26.85	28.49	28.68	28.67	28.12	25.95	28.36	28.98	25.47	28.50	27.15	27.02
22	25.98	28.44	28.64	28.71	28.14	25.88	28.29	28.98	25.49	28.71	28.43	27.02
23	25.58	28.59	28.57	28.61	28.12	25.86	28.31	28.69	25.55	27.07	29.55	26.97
24	25.87	28.55	28.58	28.64	28.14	25.99	28.37	28.33	25.59	27.15	29.66	26.94
25	26.08	28.45	28.65	28.71	28.15	26.04	28.38	26.00	25.62	28.29	29.24	26.96
26	26.21	28.58	28.68	28.73	28.08	26.00	28.39	25.71	25.65	28.50	28.67	26.95
27	26.27	28.58	28.67	28.66	25.81	25.92	28.42	25.71	25.64	28.10	27.94	26.95
28	26.33	28.55	28.67	28.58	25.19	26.07	28.52	25.02	25.65	28.74	27.52	26.88
29	26.44	28.50	28.68	28.65	--	26.12	28.57	23.38	25.68	28.56	27.30	26.62
30	26.40	26.47	28.64	28.66	--	26.08	28.63	23.80	25.62	28.05	27.20	26.70
31	26.44	--	28.64	28.53	--	26.05	--	24.36	--	27.69	27.18	--
Mean	26.87	26.42	26.62	26.67	26.21	25.87	26.23	26.31	25.29	27.06	27.74	27.07
Max.	28.92	28.59	28.68	28.77	28.52	26.12	28.63	27.01	25.68	28.74	29.66	27.78
Min.	25.58	26.06	26.54	26.53	25.19	25.46	26.01	23.38	24.62	25.64	26.77	26.62

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

01N-24W-32 CBCC 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	26.70	25.70	26.63	26.72	26.43	26.46	26.29	26.09	27.13	26.91	--	26.94
2	26.80	25.99	26.61	26.64	26.46	26.30	26.33	26.12	27.03	26.89	--	26.89
3	26.84	26.11	26.68	26.60	26.44	25.85	26.35	26.22	27.04	26.85	--	26.83
4	26.76	26.22	26.66	26.69	26.52	25.95	26.33	26.25	26.98	26.86	--	26.78
5	26.78	26.33	26.58	26.64	26.54	26.04	26.42	26.24	26.94	26.86	--	26.73
6	26.83	26.30	26.66	26.59	26.49	26.04	26.47	26.17	27.06	26.86	--	26.69
7	26.83	26.28	26.64	26.63	26.41	26.05	26.38	26.18	27.59	26.86	--	26.64
8	26.77	26.40	26.68	26.61	26.41	26.17	26.37	26.23	27.64	26.86	--	26.62
9	26.86	26.47	26.70	26.65	26.46	26.11	26.49	26.33	27.43	26.83	--	26.63
10	26.94	26.51	26.64	26.63	26.45	26.04	26.49	26.34	27.34	26.80	--	26.60
11	26.92	26.47	26.67	26.51	26.52	26.13	26.45	26.37	27.31	26.71	--	26.57
12	26.85	26.44	26.71	26.62	26.42	26.25	26.51	26.34	27.19	26.73	--	26.58
13	26.82	26.41	26.69	26.66	26.34	26.29	26.59	26.38	27.09	26.78	--	26.55
14	26.84	26.40	26.71	26.57	26.44	26.25	26.67	26.49	27.22	26.83	--	26.13
15	26.86	26.43	26.77	26.48	26.46	26.23	26.64	26.52	27.34	27.28	--	26.14
16	26.90	26.52	26.78	26.43	26.40	26.25	27.20	26.56	27.34	26.63	--	26.15
17	26.91	26.54	26.72	26.37	26.50	26.30	26.55	26.61	27.29	26.64	--	26.15
18	26.84	26.65	26.64	26.25	26.45	26.32	25.47	26.67	27.30	26.44	--	27.71
19	26.89	26.62	26.58	26.30	26.47	26.27	25.48	26.75	27.32	26.81	--	26.49
20	26.98	26.60	26.71	26.40	26.51	26.23	25.70	26.68	27.41	26.94	--	26.18
21	26.92	26.50	26.63	26.38	26.49	26.24	25.77	26.66	28.25	29.36	--	26.23
22	26.85	26.51	26.65	26.41	26.42	26.24	25.88	26.64	29.00	26.69	--	26.56
23	26.87	26.56	26.56	26.29	26.59	26.27	26.00	26.64	29.81	26.79	--	26.68
24	26.73	26.59	26.69	26.43	26.57	26.26	25.97	26.66	30.02	26.59	--	26.66
25	26.62	26.63	26.66	26.41	26.54	26.33	26.03	26.71	30.15	26.22	--	26.77
26	26.70	26.62	26.66	26.43	26.49	26.38	26.08	26.66	28.89	28.01	--	26.81
27	26.79	26.62	26.64	26.43	26.53	26.28	26.13	26.85	27.72	27.93	--	26.84
28	26.74	26.60	26.74	26.39	26.50	26.26	26.10	27.04	27.42	--	--	26.87
29	26.73	26.61	26.71	26.34	26.56	26.41	26.07	26.97	27.03	--	--	26.98
30	26.75	26.62	26.56	26.31	--	26.34	26.15	26.84	26.93	--	--	26.97
31	26.73	--	26.68	26.37	--	26.31	--	27.05	--	--	--	--
Mean	26.79	26.44	26.67	26.49	26.48	26.22	26.25	26.52	27.67	--	--	27.78
Max.	26.98	26.65	26.78	26.72	26.59	26.46	27.20	27.05	30.15	--	--	28.94
Min.	26.73	25.70	26.56	26.25	26.34	25.85	25.47	26.09	26.93	--	--	26.18

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## Ø1N-24W-32 CBCC 1--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	26.98	27.16	27.28	27.20	--	--	--	--	--	--	--	--
2	27.04	27.08	27.26	27.21	--	--	--	--	--	--	--	--
3	27.06	27.09	27.26	27.27	--	--	--	--	--	--	--	--
4	27.08	27.17	27.31	27.21	--	--	--	--	--	--	--	--
5	27.08	27.24	27.23	27.13	--	--	--	--	--	--	--	--
6	27.08	27.17	27.17	27.16	--	--	--	--	--	--	--	--
7	27.12	27.18	27.21	27.23	--	--	--	--	--	--	--	--
8	27.06	27.21	27.30	27.31	--	--	--	--	--	--	--	--
9	27.09	27.17	27.23	27.24	--	--	--	--	--	--	--	--
10	27.10	27.26	27.20	27.20	--	--	--	--	--	--	--	--
11	27.12	27.16	27.22	27.20	--	--	--	--	--	--	--	--
12	27.14	27.20	27.22	27.33	--	--	--	--	--	--	--	--
13	27.13	27.22	27.17	27.30	--	--	--	--	--	--	--	--
14	27.09	27.22	27.17	27.18	--	--	--	--	--	--	--	--
15	27.10	27.24	27.33	27.26	--	--	--	--	--	--	--	--
16	27.12	27.32	27.27	27.26	--	--	--	--	--	--	--	--
17	27.11	27.28	27.26	27.20	--	--	--	--	--	--	--	--
18	27.20	27.21	27.17	27.26	--	--	--	--	--	--	--	--
19	27.14	27.30	27.11	--	--	--	--	--	--	--	--	--
20	27.13	27.30	27.22	--	--	--	--	--	--	--	--	--
21	27.18	27.26	27.22	--	--	--	--	--	--	--	--	--
22	27.09	27.20	27.20	--	--	--	--	--	--	--	--	--
23	27.16	27.16	27.16	--	--	--	--	--	--	--	--	--
24	27.16	27.12	27.26	--	--	--	--	--	--	--	--	--
25	27.17	27.13	27.20	--	--	--	--	--	--	--	--	--
26	27.17	27.16	27.14	--	--	--	--	--	--	--	--	--
27	27.13	27.29	27.26	--	--	--	--	--	--	--	--	--
28	27.24	27.22	27.28	--	--	--	--	--	--	--	--	--
29	27.20	27.24	27.22	--	--	--	--	--	--	--	--	--
30	27.21	27.28	27.18	--	--	--	--	--	--	--	--	--
31	27.20	--	27.19	--	--	--	--	--	--	--	--	--
Mean	27.13	27.21	27.22	--	--	--	--	--	--	--	--	--
Max.	27.24	27.32	27.33	--	--	--	--	--	--	--	--	--
Min.	26.98	27.08	27.11	--	--	--	--	--	--	--	--	--

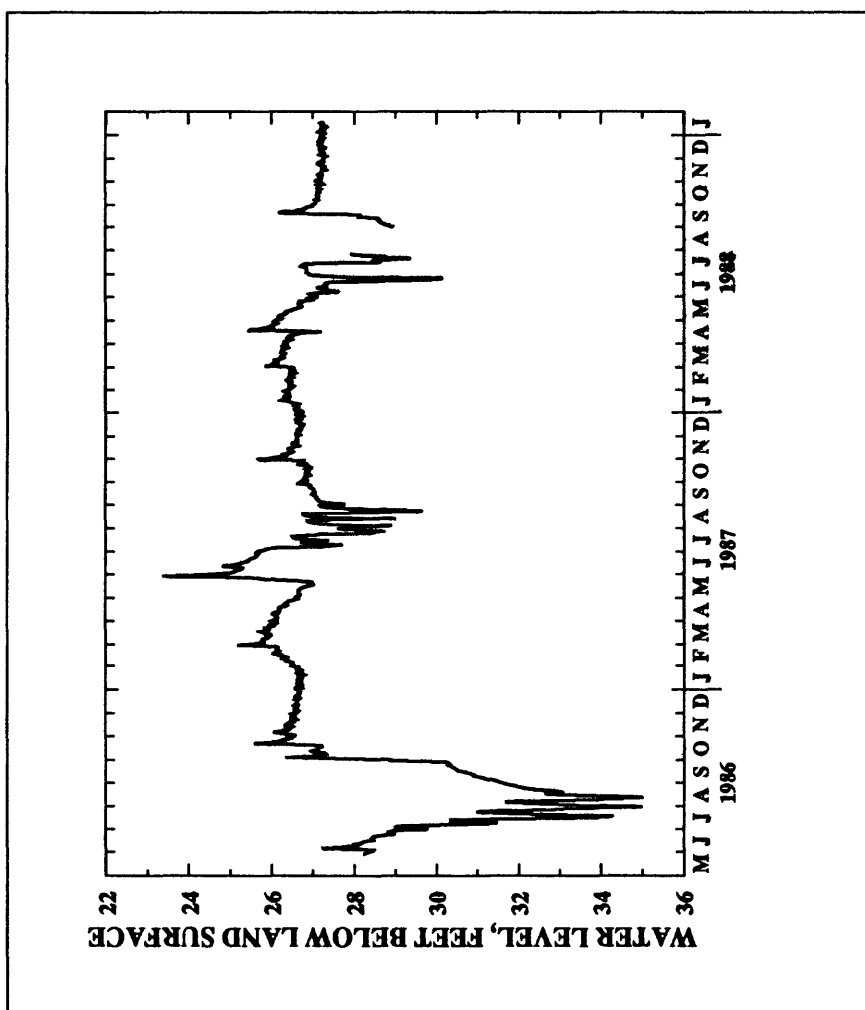


Figure 8. Hydrograph of well 01N-24W-32 CBCC 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 3  
 Station number: 343724099434901. Local number: 02N-24W-21 DDDD 1  
 Location: Lat 34° 37' 24", long 99° 43' 07", hydrologic unit 11120202  
 Aquifer: 313EMFK  
 Altitude of land-surface datum: 1,525 ft  
 Well depth: 266 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	--	35.36	37.80
2	--	--	--	--	--	--	--	--	--	--	35.49	37.85
3	--	--	--	--	--	--	--	--	52.06	--	35.67	37.86
4	--	--	--	--	--	--	--	--	--	--	35.82	37.88
5	--	--	--	--	--	--	--	--	--	--	35.86	37.94
6	--	--	--	--	--	--	--	--	--	--	35.80	37.97
7	--	--	--	--	--	--	--	--	--	--	35.80	38.08
8	--	--	--	--	--	--	--	--	--	--	35.81	38.13
9	--	--	--	--	--	--	--	--	--	34.01	35.87	38.10
10	--	--	--	--	--	--	--	--	--	--	35.91	38.15
11	--	--	--	--	--	--	--	--	--	--	35.90	38.17
12	--	--	--	--	--	--	--	--	36.79	--	35.92	38.22
13	--	--	--	--	--	--	--	--	--	--	36.08	38.26
14	--	--	--	--	--	--	--	--	--	--	36.19	38.30
15	--	--	--	--	--	--	--	--	--	--	36.33	38.28
16	--	--	--	--	--	--	--	--	--	34.36	36.49	38.38
17	--	--	--	--	--	--	--	--	--	34.31	36.60	38.39
18	--	--	--	--	--	--	--	--	34.17	34.37	36.73	38.49
19	--	--	--	--	--	--	--	--	--	34.70	36.79	38.62
20	--	--	--	--	--	--	--	--	--	34.92	36.95	38.55
21	--	--	--	--	--	--	--	--	--	35.05	37.08	38.60
22	--	--	--	--	--	--	--	--	--	35.21	37.21	38.72
23	--	--	--	--	--	--	--	--	--	--	37.34	38.71
24	--	--	--	--	--	--	--	--	--	--	37.41	38.67
25	--	--	--	--	--	--	--	--	--	--	37.45	38.70
26	--	--	--	--	--	--	--	--	--	--	37.59	38.73
27	--	--	--	--	--	--	--	--	--	--	37.75	38.77
28	--	--	--	--	--	--	--	--	--	--	37.78	38.77
29	--	--	--	--	--	--	--	--	--	--	37.80	38.83
30	--	--	--	--	--	--	--	--	--	--	37.84	38.83
31	--	--	--	--	--	--	--	--	--	35.28	37.84	--
Mean	--	--	--	--	--	--	--	--	--	--	36.60	38.36
Max.	--	--	--	--	--	--	--	--	--	--	37.84	38.83
Min.	--	--	--	--	--	--	--	--	--	--	35.36	37.80

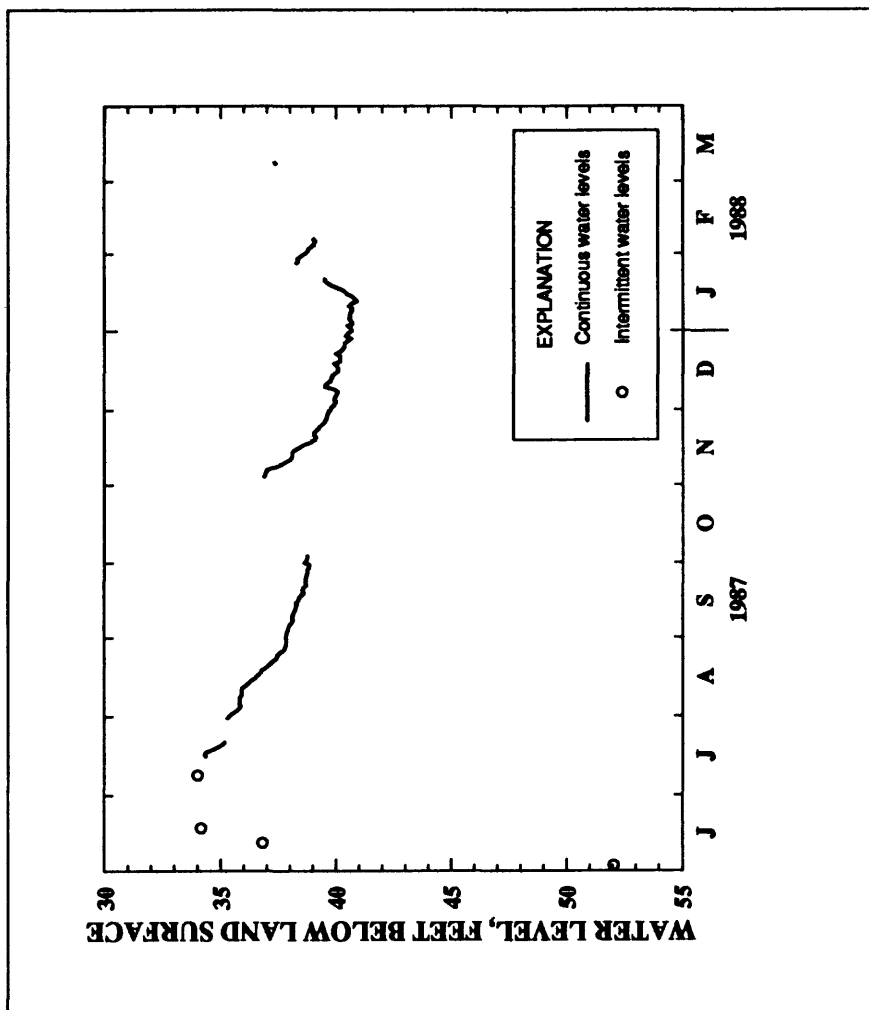


Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-24W-21 DDDD 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	38.65	--	39.77	40.68	38.65	--	--	--	--	--	--	--
2	38.73	--	39.81	40.64	38.79	--	--	--	--	--	--	--
3	38.77	--	39.93	40.52	38.82	--	--	--	--	--	--	--
4	38.76	36.86	40.00	40.70	38.96	--	--	--	--	--	--	--
5	--	36.91	39.93	40.67	39.06	--	--	--	--	--	--	--
6	--	36.96	39.97	40.56	39.11	--	--	--	--	--	--	--
7	--	37.01	40.04	40.62	38.99	--	--	--	--	--	--	--
8	--	37.23	40.09	40.60	--	37.39	--	--	--	--	--	--
9	--	37.55	39.95	40.68	--	37.31	--	--	--	--	--	--
10	--	37.79	39.53	40.70	--	--	--	--	--	--	--	--
11	--	38.00	39.57	40.56	--	--	--	--	--	--	--	--
12	--	38.09	39.74	40.67	--	--	--	--	--	--	--	--
13	--	38.09	39.81	40.89	--	--	--	--	--	--	--	--
14	--	38.11	39.84	40.81	--	--	--	--	--	--	--	--
15	--	38.21	39.96	40.67	--	--	--	--	--	--	--	--
16	--	38.43	40.08	40.46	--	--	--	--	--	--	--	--
17	--	38.60	40.09	40.37	--	--	--	--	--	--	--	--
18	--	38.90	40.04	40.15	--	--	--	--	--	--	--	--
19	--	39.06	39.91	39.84	--	--	--	--	--	--	--	--
20	--	39.14	40.16	39.65	--	--	--	--	--	--	--	--
21	--	39.07	40.16	39.51	--	--	--	--	--	--	--	--
22	--	39.06	40.18	39.54	--	--	--	--	--	--	--	--
23	--	39.20	39.99	--	--	--	--	--	--	--	--	--
24	--	39.29	40.20	--	--	--	--	--	--	--	--	--
25	--	39.43	40.30	--	--	--	--	--	--	--	--	--
26	--	39.51	40.36	--	--	--	--	--	--	--	--	--
27	--	39.56	40.37	--	--	--	--	--	--	--	--	--
28	--	39.59	40.49	38.29	--	--	--	--	--	--	--	--
29	--	39.63	40.63	38.37	--	--	--	--	--	--	--	--
30	--	39.68	40.43	38.35	--	--	--	--	--	--	--	--
31	--	--	40.50	38.47	--	--	--	--	--	--	--	--
Mean	--	--	40.06	--	--	--	--	--	--	--	--	--
Max.	--	--	40.63	--	--	--	--	--	--	--	--	--
Min.	--	--	39.53	--	--	--	--	--	--	--	--	--



**Figure 9.** Hydrograph of well 02N-24W-21 DDDD 1 (o on hydrograph indicates a point measurement).

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 4  
 Station number: 343724099434902 Local number: 02N-24W-21 DDDD 2  
 Location: Lat 34° 37' 24", long 99° 43' 07", hydrologic unit 11120202  
 Aquifer: 313VVCR  
 Altitude of land-surface datum: 1,625 ft  
 Well depth: 159 ft

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	--	36.89	--
2	--	--	--	--	--	--	--	--	--	--	37.01	--
3	--	--	--	--	--	--	--	--	--	--	37.14	--
4	--	--	--	--	--	--	--	--	--	--	37.30	--
5	--	--	--	--	--	--	--	--	--	--	--	--
6	--	--	--	--	--	--	--	--	--	--	--	--
7	--	--	--	--	--	--	--	--	--	--	--	--
8	--	--	--	--	--	--	--	--	--	--	--	--
9	--	--	--	--	--	--	--	--	35.02	35.20	--	--
10	--	--	--	--	--	--	--	--	--	--	--	--
11	--	--	--	--	--	--	--	--	--	--	--	--
12	--	--	--	--	--	--	--	--	37.03	--	--	--
13	--	--	--	--	--	--	--	--	--	--	--	--
14	--	--	--	--	--	--	--	--	--	--	--	--
15	--	--	--	--	--	--	--	--	--	--	--	--
16	--	--	--	--	--	--	--	--	--	35.89	--	--
17	--	--	--	--	--	--	--	--	--	35.85	--	--
18	--	--	--	--	--	--	--	--	35.21	35.92	--	--
19	--	--	--	--	--	--	--	--	--	36.00	--	--
20	--	--	--	--	--	--	--	--	--	36.08	--	--
21	--	--	--	--	--	--	--	--	--	36.13	--	--
22	--	--	--	--	--	--	--	--	--	36.15	--	--
23	--	--	--	--	--	--	--	--	--	36.13	--	--
24	--	--	--	--	--	--	--	--	--	36.15	--	--
25	--	--	--	--	--	--	--	--	--	36.26	--	--
26	--	--	--	--	--	--	--	--	--	36.35	--	--
27	--	--	--	--	--	--	--	--	--	36.41	--	--
28	--	--	--	--	--	--	--	--	--	36.48	--	--
29	--	--	--	--	--	--	--	--	--	36.56	--	--
30	--	--	--	--	--	--	--	--	--	36.67	--	--
31	--	--	--	--	--	--	--	--	--	36.81	--	--
Mean	--	--	--	--	--	--	--	--	--	--	--	--
Max.	--	--	--	--	--	--	--	--	--	--	--	--
Min.	--	--	--	--	--	--	--	--	--	--	--	--

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-24W-21 DDDD 2--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	40.40	--	40.78	--	--	--	--	--	--	--
2	--	--	40.41	--	40.91	--	--	--	--	--	--	--
3	--	--	--	--	40.92	--	--	--	--	--	--	--
4	--	37.94	--	--	40.97	--	--	--	--	--	--	--
5	--	37.92	--	--	--	--	--	--	--	--	--	--
6	--	37.95	--	--	--	--	--	--	--	--	--	--
7	--	37.98	--	--	--	--	--	--	--	--	--	--
8	--	38.19	--	--	--	39.73	--	--	--	--	--	--
9	--	38.45	40.53	--	--	39.67	--	--	--	--	--	--
10	--	38.72	40.84	--	--	39.38	--	--	--	--	--	--
11	--	38.85	40.82	--	--	39.38	--	--	--	--	--	--
12	--	38.89	40.98	--	--	39.83	--	--	--	--	--	--
13	--	38.90	41.01	--	40.95	39.85	--	--	--	--	--	--
14	--	38.92	41.01	--	40.92	39.97	--	--	--	--	--	--
15	--	39.00	41.14	--	40.92	40.05	--	--	--	--	--	--
16	--	39.22	--	--	--	40.18	--	--	--	--	--	--
17	--	39.39	--	--	--	40.19	--	--	--	--	--	--
18	--	39.68	--	--	--	40.19	--	--	--	--	--	--
19	--	39.82	--	--	--	--	--	--	--	--	--	--
20	--	39.88	--	--	--	--	--	--	--	--	--	--
21	--	39.79	--	--	--	--	--	--	--	--	--	--
22	--	39.78	--	--	--	--	--	--	--	--	--	--
23	--	39.90	--	--	--	--	--	--	--	--	--	--
24	--	39.98	--	--	--	--	--	--	--	--	--	--
25	--	40.14	--	--	--	--	--	--	--	--	--	--
26	--	40.19	--	--	--	--	--	--	--	--	--	--
27	--	40.24	--	--	--	--	--	--	--	--	--	--
28	--	40.24	--	40.67	--	--	--	--	--	--	--	--
29	--	40.29	--	40.59	--	--	--	--	--	--	--	--
30	--	40.33	--	40.65	--	--	--	--	--	--	--	--
31	--	--	--	40.83	--	--	--	--	--	--	--	--
Mean	--	--	--	--	--	--	--	--	--	--	--	--
Max.	--	--	--	--	--	--	--	--	--	--	--	--
Min.	--	--	--	--	--	--	--	--	--	--	--	--

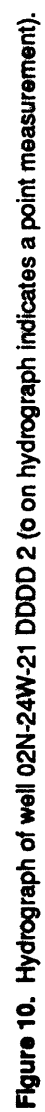


Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 6  
 Station number: 343855099581801 Local number: 02N-27W-24 AAAD 1  
 Location: Lat 34° 38' 55", long 99° 58' 18", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,715 ft  
 Well depth: 223.5 ft

Water Year, October 1985 to September 1986												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	98.49	86.54	90.87	97.43
2	--	--	--	--	--	--	--	--	98.25	86.61	91.22	97.58
3	--	--	--	--	--	--	--	--	98.06	86.66	91.67	97.70
4	--	--	--	--	--	--	--	--	97.46	86.70	91.73	97.85
5	--	--	--	--	--	--	--	--	94.72	86.83	91.91	97.80
6	--	--	--	--	--	--	--	--	92.88	86.98	92.14	97.67
7	--	--	--	--	--	--	--	--	91.77	87.08	92.40	97.66
8	--	--	--	--	--	--	--	--	90.58	87.15	92.64	97.49
9	--	--	--	--	--	--	--	--	89.56	87.21	92.85	97.25
10	--	--	--	--	--	--	--	--	88.88	87.28	93.14	97.08
11	--	--	--	--	--	--	--	--	88.42	87.36	93.39	97.12
12	--	--	--	--	--	--	--	--	87.94	87.55	93.56	97.20
13	--	--	--	--	--	--	--	--	87.72	87.81	93.77	97.21
14	--	--	--	--	--	--	--	--	87.54	87.95	93.94	96.95
15	--	--	--	--	--	--	--	--	87.38	87.97	94.12	96.11
16	--	--	--	--	--	--	--	--	87.32	88.10	94.30	95.48
17	--	--	--	--	--	--	--	--	87.34	88.26	94.58	94.95
18	--	--	--	--	--	--	--	--	87.20	88.41	94.85	94.55
19	--	--	--	--	--	--	--	--	87.10	88.49	95.00	94.24
20	--	--	--	--	--	--	--	--	87.09	88.70	95.23	94.02
21	--	--	--	--	--	--	--	--	86.93	88.86	95.52	93.81
22	--	--	--	--	--	--	--	--	86.85	89.04	95.67	93.62
23	--	--	--	--	--	--	--	--	86.77	89.23	95.87	93.43
24	--	--	--	--	--	--	--	--	86.63	89.42	96.04	93.27
25	--	--	--	--	--	--	--	--	86.52	89.49	96.26	93.35
26	--	--	--	--	--	--	--	--	86.45	89.68	96.46	93.39
27	--	--	--	--	--	--	--	--	86.44	89.86	96.64	93.47
28	--	--	--	--	--	--	--	--	86.34	90.07	96.88	93.49
29	--	--	--	--	--	--	--	99.78	86.36	90.27	97.01	93.48
30	--	--	--	--	--	--	--	99.33	86.40	90.48	97.12	93.63
31	--	--	--	--	--	--	--	98.86	--	90.68	97.27	--
Mean	--	--	--	--	--	--	--	--	89.38	88.28	94.32	95.61
Max.	--	--	--	--	--	--	--	--	98.49	90.68	97.27	97.85
Min.	--	--	--	--	--	--	--	--	86.34	86.54	90.87	93.27

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 02N-27W-24 AAAD 1--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	93.68	82.16	83.00	86.80	90.54	88.38	84.13	86.70	77.90	75.98	80.54	84.51
2	93.55	82.18	83.03	86.80	90.65	87.81	84.50	86.73	76.68	76.07	80.66	84.58
3	92.39	81.97	83.20	87.25	90.85	87.35	84.36	86.93	76.14	76.22	80.79	84.67
4	91.38	81.77	83.36	87.25	91.01	86.87	84.55	87.12	75.78	76.28	80.98	84.77
5	90.49	81.70	83.47	87.28	91.52	86.24	84.60	87.32	75.62	76.51	81.11	84.87
6	89.68	81.47	83.53	87.45	91.68	85.78	84.56	87.49	75.37	76.76	81.19	85.00
7	88.87	81.35	83.60	87.66	91.64	85.45	84.62	87.57	75.32	76.94	81.33	85.13
8	88.22	81.41	83.64	87.66	91.85	85.04	84.64	87.59	75.34	77.12	81.46	85.30
9	87.82	81.53	83.92	87.83	91.95	85.04	84.67	87.63	75.35	77.27	81.63	85.37
10	87.33	81.42	84.06	88.12	91.89	84.86	84.84	87.71	75.28	77.43	81.74	85.49
11	86.95	81.46	84.04	88.16	92.01	84.60	84.71	87.82	75.14	77.54	81.81	85.63
12	86.87	81.51	84.26	88.18	92.18	84.51	84.80	87.96	75.01	77.71	81.92	85.74
13	86.53	81.67	84.43	88.20	92.13	84.31	85.16	88.07	74.85	78.11	82.06	85.83
14	86.34	81.33	84.47	88.32	92.01	84.05	85.33	88.24	74.69	78.24	82.18	85.98
15	86.29	81.25	84.57	88.73	92.06	84.04	85.22	88.38	74.58	78.31	82.30	86.01
16	86.12	81.25	84.69	88.95	91.64	83.89	85.23	88.40	74.50	78.43	82.44	86.13
17	85.97	81.27	84.87	88.98	91.38	83.72	85.26	88.47	74.50	78.53	82.59	86.30
18	85.94	81.53	85.01	89.07	91.07	83.87	85.36	88.61	74.58	78.72	82.72	86.48
19	85.96	81.44	85.02	89.15	90.90	83.82	85.55	88.79	74.53	78.92	82.86	86.57
20	85.91	81.76	85.19	89.42	90.80	83.79	85.83	88.92	74.55	79.10	82.98	86.68
21	85.70	81.75	85.45	89.42	90.47	83.81	86.08	89.18	74.62	79.24	83.11	86.86
22	85.12	81.71	85.53	89.71	90.31	83.68	85.93	89.48	74.70	79.33	83.25	87.01
23	84.81	82.01	85.48	89.62	90.21	83.73	86.01	89.16	74.84	79.41	83.43	87.04
24	84.40	82.12	85.58	89.89	90.16	83.92	86.16	88.51	75.04	79.56	83.49	87.07
25	83.91	82.04	85.80	90.15	90.12	83.96	86.26	87.83	75.23	79.72	83.55	87.19
26	83.51	82.44	85.98	90.36	89.86	83.90	86.37	87.26	75.37	79.83	83.70	87.30
27	83.10	82.48	86.10	90.41	89.34	83.81	86.40	86.76	75.46	79.94	83.90	87.41
28	82.72	82.55	86.23	90.44	88.85	84.15	86.55	86.01	75.56	80.03	84.04	87.62
29	82.56	82.59	86.41	90.61	--	84.33	86.57	83.75	75.70	80.15	84.11	87.79
30	82.26	82.65	86.47	90.48	--	84.25	86.64	82.00	75.88	80.29	84.22	87.89
31	82.09	--	86.62	90.44	--	84.17	--	80.02	--	80.42	84.38	--
Mean	86.68	81.79	84.74	88.80	91.04	84.75	85.36	87.30	75.27	78.33	82.47	86.14
Max.	93.68	82.65	86.62	90.61	92.18	88.38	86.64	89.48	77.90	80.42	84.38	87.89
Min.	82.09	81.25	83.00	86.80	88.85	83.68	84.13	80.02	74.50	75.98	80.54	84.51

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-27W-24 AAAD 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	87.84	91.84	94.66	97.09	98.66	99.71	100.84	99.75	101.05	102.49	104.24	107.06
2	88.19	91.90	94.67	97.07	98.75	99.79	100.94	99.81	101.04	102.54	104.34	107.13
3	88.46	91.98	94.86	97.01	98.72	99.97	100.86	99.95	101.12	102.55	104.42	107.20
4	88.43	92.12	94.96	97.25	98.87	99.92	100.88	99.92	101.17	102.61	104.50	107.29
5	88.53	92.37	94.87	97.32	99.01	100.03	101.03	99.92	101.23	102.67	104.59	107.33
6	88.78	92.34	95.00	97.32	99.04	99.96	101.06	99.89	101.26	102.71	104.67	107.38
7	88.90	92.30	95.10	97.39	98.94	99.98	101.00	99.82	101.24	102.75	104.75	107.41
8	88.87	92.56	95.19	97.35	98.90	100.17	101.03	99.83	101.23	102.81	104.84	107.46
9	89.12	92.80	95.35	97.44	99.00	100.01	101.25	99.93	101.38	102.82	104.93	107.57
10	89.44	92.99	95.34	97.51	99.09	99.90	101.29	100.00	101.54	102.85	105.03	107.62
11	89.58	92.98	95.34	97.41	99.22	99.98	101.20	100.08	101.55	102.88	105.11	107.68
12	89.54	92.96	95.51	97.59	99.06	100.17	101.14	100.06	101.56	102.92	105.20	107.77
13	89.56	92.91	95.58	97.80	98.97	100.28	101.13	100.06	101.65	102.96	105.31	107.86
14	89.69	92.92	95.65	97.71	99.12	100.24	101.16	100.10	101.74	103.03	105.42	107.87
15	89.82	93.01	95.66	97.64	99.19	100.25	101.32	100.10	101.80	103.08	105.50	107.90
16	90.02	93.27	95.99	97.65	99.13	100.36	101.33	100.16	101.80	103.17	105.59	107.95
17	90.19	93.41	95.99	97.71	99.35	100.50	101.01	100.19	101.80	103.23	105.68	108.02
18	90.14	93.72	95.92	97.66	99.32	100.55	100.56	100.28	101.85	103.25	105.75	107.74
19	90.33	93.83	95.83	97.87	99.32	100.46	100.40	100.32	101.93	103.34	105.83	106.33
20	90.65	93.86	96.15	98.19	99.42	100.39	100.21	100.32	101.99	103.48	105.92	106.13
21	90.68	93.72	96.16	98.09	99.44	100.38	99.98	100.46	102.04	103.53	106.05	105.98
22	90.63	93.74	96.21	98.19	99.43	100.46	99.97	100.64	102.08	103.53	106.18	105.78
23	90.78	93.94	96.08	98.10	99.63	100.50	100.00	100.66	102.13	103.57	106.31	105.63
24	91.00	94.04	96.32	98.39	99.65	100.50	99.90	100.67	102.22	103.66	106.42	105.55
25	91.03	94.22	96.46	98.41	99.63	100.59	99.90	100.69	102.30	103.76	106.46	105.45
26	91.13	94.30	96.55	98.47	99.62	100.72	99.91	100.73	102.32	103.82	106.51	105.36
27	91.40	94.38	96.57	98.53	99.69	100.68	99.88	100.79	102.35	103.88	106.60	105.27
28	91.38	94.42	96.79	98.51	99.68	100.69	99.82	100.85	102.37	103.94	106.78	105.18
29	91.38	94.47	96.90	98.51	99.84	100.92	99.74	100.89	102.36	104.03	106.87	105.26
30	91.51	94.57	96.70	98.49	--	100.84	99.75	101.07	102.40	104.12	106.90	105.20
31	91.69	--	96.90	98.49	--	100.79	--	101.13	--	104.17	106.97	--
Mean	89.96	93.26	95.79	97.81	99.23	100.31	100.62	100.29	101.75	103.23	105.60	106.78
Max.	91.69	94.57	96.90	98.53	99.84	100.92	101.33	101.13	102.40	104.17	106.97	108.02
Min.	87.84	91.84	94.66	97.01	98.66	99.71	99.74	99.75	101.04	102.49	104.24	105.18



Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-27W-24 AAAD 1--Continued

Day	Water Year, October 1988 to September 1989											
	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	105.14	106.27	107.64	108.10	--	--	--	--	--	--	--	--
2	105.23	106.17	107.66	108.15	--	--	--	--	--	--	--	--
3	105.24	106.16	107.66	108.29	--	--	--	--	--	--	--	--
4	105.29	106.29	107.76	108.30	--	--	--	--	--	--	--	--
5	105.31	106.48	107.69	108.21	--	--	--	--	--	--	--	--
6	105.31	106.45	107.60	108.13	--	--	--	--	--	--	--	--
7	105.38	106.46	107.62	108.21	--	--	--	--	--	--	--	--
8	105.32	106.56	107.80	108.35	--	--	--	--	--	--	--	--
9	105.32	106.55	107.78	108.33	--	--	--	--	--	--	--	--
10	105.36	106.72	107.72	108.26	--	--	--	--	--	--	--	--
11	105.40	106.65	107.77	108.26	--	--	--	--	--	--	--	--
12	105.47	106.72	107.81	108.49	--	--	--	--	--	--	--	--
13	105.48	106.79	107.76	108.50	--	--	--	--	--	--	--	--
14	105.45	106.78	107.73	108.34	--	--	--	--	--	--	--	--
15	105.46	106.80	107.98	108.43	--	--	--	--	--	--	--	--
16	105.53	107.02	107.99	108.48	--	--	--	--	--	--	--	--
17	105.57	107.00	107.99	108.39	--	--	--	--	--	--	--	--
18	105.73	106.95	107.91	108.50	--	--	--	--	--	--	--	--
19	105.72	107.08	107.79	--	--	--	--	--	--	--	--	--
20	105.71	107.23	107.91	--	--	--	--	--	--	--	--	--
21	105.83	107.25	107.95	--	--	--	--	--	--	--	--	--
22	105.75	107.22	107.96	--	--	--	--	--	--	--	--	--
23	105.86	107.18	107.93	--	--	--	--	--	--	--	--	--
24	105.91	107.14	108.04	--	--	--	--	--	--	--	--	--
25	105.96	107.16	108.01	--	--	--	--	--	--	--	--	--
26	106.04	107.18	107.95	--	--	--	--	--	--	--	--	--
27	106.01	107.43	108.08	--	--	--	--	--	--	--	--	--
28	106.23	107.44	108.17	--	--	--	--	--	--	--	--	--
29	106.23	107.48	108.11	--	--	--	--	--	--	--	--	--
30	106.28	107.61	108.07	--	--	--	--	--	--	--	--	--
31	106.30	--	108.08	--	--	--	--	--	--	--	--	--
Mean	105.64	106.87	107.87	--	--	--	--	--	--	--	--	--
Max.	106.30	107.61	108.17	--	--	--	--	--	--	--	--	--
Min.	105.14	106.16	107.60	--	--	--	--	--	--	--	--	--

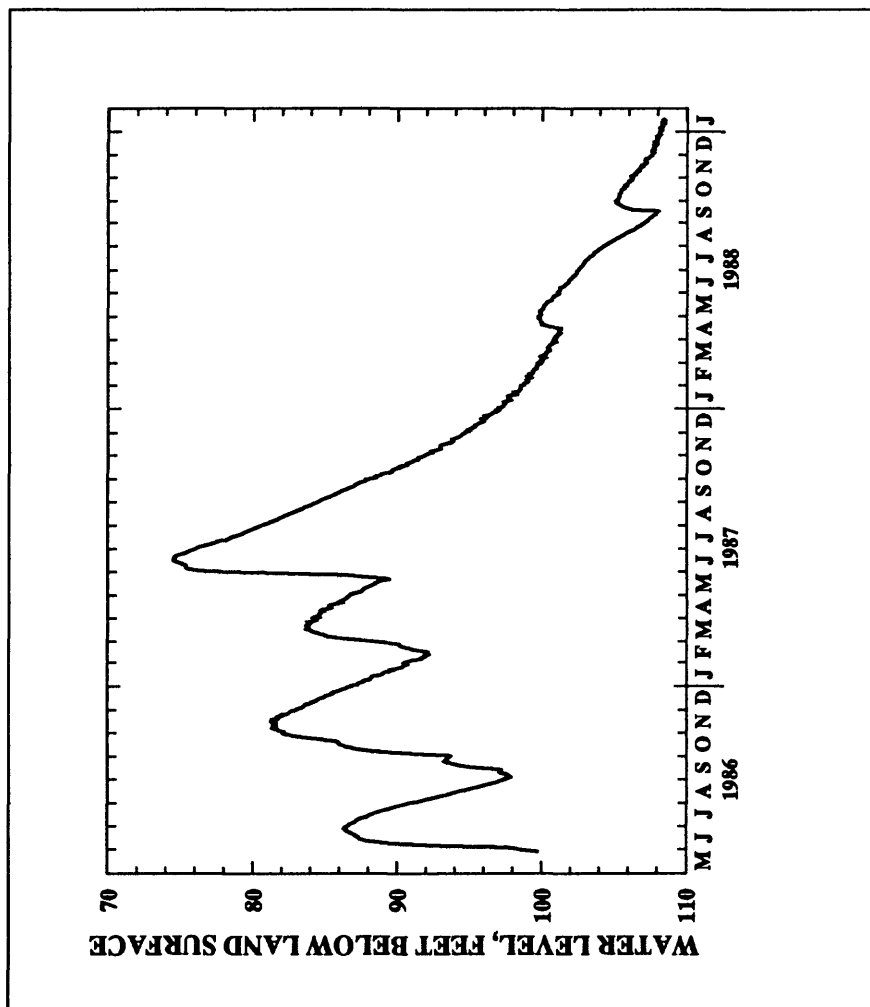


Figure 11. Hydrograph of well 02N-27W-24 AAAD 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 6  
 Station number: 344459099533201 Local number: 03N-26W-12 BCBA 1  
 Location: Lat 34° 44' 59", long 99° 53' 32", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,673 ft  
 Well depth: 275 ft

Water Year, October 1985 to September 1986												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	81.63	58.26	75.69	77.88
2	--	--	--	--	--	--	--	--	81.70	58.29	76.42	77.29
3	--	--	--	--	--	--	--	--	81.65	58.21	76.93	76.72
4	--	--	--	--	--	--	--	--	80.59	58.11	77.38	76.22
5	--	--	--	--	--	--	--	--	58.26	58.07	77.90	75.67
6	--	--	--	--	--	--	--	--	57.05	58.14	79.98	75.05
7	--	--	--	--	--	--	--	--	57.82	58.18	80.12	74.53
8	--	--	--	--	--	--	--	--	57.95	58.20	79.66	73.91
9	--	--	--	--	--	--	--	--	58.08	58.72	79.86	73.26
10	--	--	--	--	--	--	--	--	55.84	57.99	79.53	72.65
11	--	--	--	--	--	--	--	--	55.53	58.45	79.36	72.25
12	--	--	--	--	--	--	--	--	58.18	59.02	79.53	71.86
13	--	--	--	--	--	--	--	--	58.57	59.69	80.06	71.43
14	--	--	--	--	--	--	--	--	58.75	61.06	81.14	70.72
15	--	--	--	--	--	--	--	--	58.78	68.64	80.32	69.66
16	--	--	--	--	--	--	--	--	58.83	68.11	79.48	69.09
17	--	--	--	--	--	--	--	--	58.95	69.20	78.98	68.53
18	--	--	--	--	--	--	--	--	58.94	70.65	78.58	68.06
19	--	--	--	--	--	--	--	--	58.74	71.95	78.22	67.64
20	--	--	--	--	--	--	--	--	58.75	68.78	77.97	67.26
21	--	--	--	--	--	--	--	--	58.79	67.47	77.93	66.88
22	--	--	--	--	--	--	--	--	58.83	67.60	78.14	66.50
23	--	--	--	--	--	--	--	--	58.64	72.85	78.87	66.09
24	--	--	--	--	--	--	--	--	58.52	75.53	79.35	65.69
25	--	--	--	--	--	--	--	--	58.45	77.46	79.70	65.42
26	--	--	--	--	--	--	--	--	58.34	79.16	80.09	65.13
27	--	--	--	--	--	--	--	--	58.34	75.65	80.19	64.83
28	--	--	--	--	--	--	--	--	58.32	74.57	79.81	64.46
29	--	--	--	--	--	--	--	61.57	58.29	74.44	79.27	64.10
30	--	--	--	--	--	--	--	61.61	58.25	74.33	78.80	63.87
31	--	--	--	--	--	--	--	61.62	--	75.20	78.37	--
Mean	--	--	--	--	--	--	--	--	57.31	65.55	78.96	70.09
Max.	--	--	--	--	--	--	--	--	81.70	79.16	81.14	77.88
Min.	--	--	--	--	--	--	--	--	55.53	58.07	75.69	63.87

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 03N-26W-12 BCBA 1--Continued

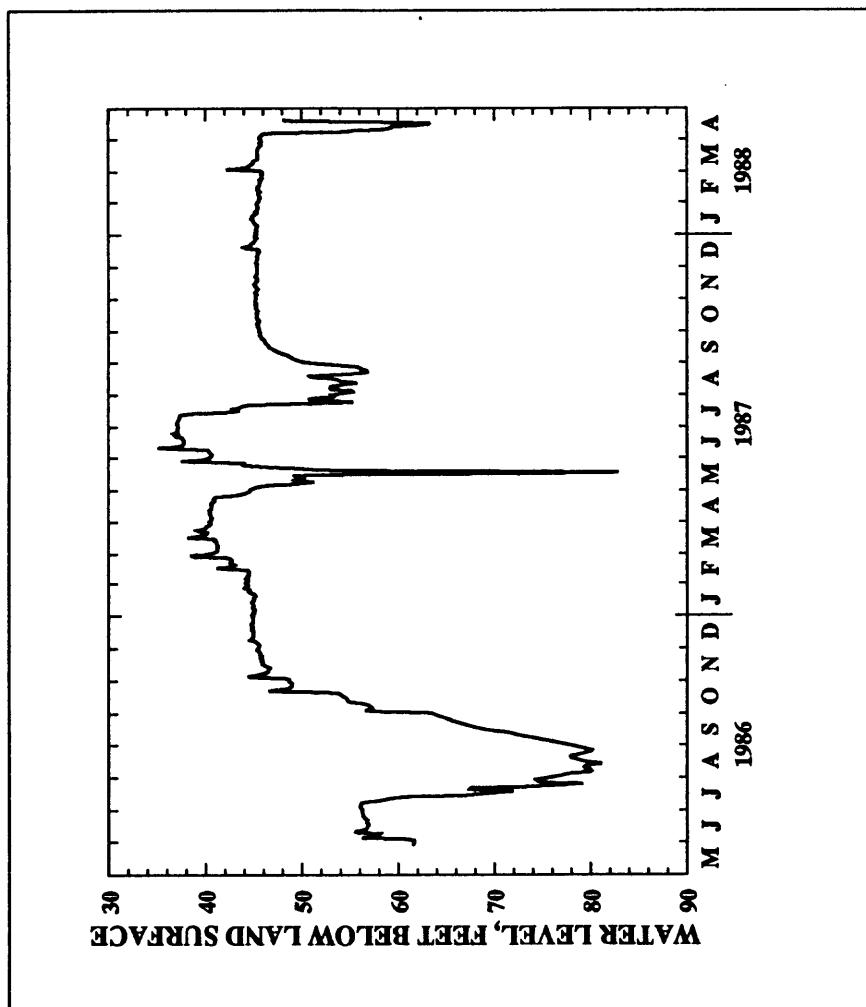
Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	63.61	48.76	45.42	44.94	44.23	39.94	40.38	44.63	40.34	37.18	53.11	50.55
2	62.97	48.71	45.48	44.78	44.12	40.60	40.59	44.65	40.49	37.12	53.96	49.97
3	57.54	48.45	45.56	44.89	44.29	40.99	40.60	44.97	40.65	37.12	54.71	49.64
4	56.61	45.70	45.61	45.05	44.41	41.24	40.63	45.23	40.67	37.06	55.33	49.34
5	57.19	44.41	45.55	44.99	44.40	41.26	40.68	45.67	40.56	37.06	55.22	49.11
6	57.32	45.20	45.39	44.99	44.16	41.23	40.56	46.52	40.45	37.11	53.13	48.94
7	57.29	45.65	45.25	45.13	44.24	41.24	40.50	49.05	40.37	37.15	53.03	48.73
8	57.11	46.07	45.10	45.08	44.36	41.20	40.49	50.37	40.32	37.24	53.40	48.59
9	56.98	46.42	44.65	44.86	44.49	41.30	40.43	51.25	40.23	37.28	52.97	48.25
10	56.70	46.50	44.79	44.90	44.42	41.26	40.48	49.63	37.32	37.32	53.82	47.91
11	56.16	46.57	44.80	45.00	44.45	41.16	40.42	49.25	35.15	37.33	54.34	47.66
12	55.07	46.58	44.92	44.97	44.56	41.18	40.40	49.50	36.84	37.35	55.74	47.41
13	54.81	46.71	44.96	44.89	44.49	41.14	40.55	50.28	37.45	37.63	55.27	47.20
14	54.74	46.40	44.92	44.80	44.35	40.95	40.64	50.24	37.68	38.73	54.00	47.04
15	54.74	46.13	44.91	44.92	42.36	41.01	40.67	49.15	37.75	41.81	53.90	46.81
16	54.60	45.96	44.95	45.01	41.18	40.80	40.65	51.59	37.74	43.19	53.42	46.66
17	54.37	45.86	44.94	45.00	42.26	38.22	40.61	75.22	37.74	43.55	52.82	46.58
18	54.17	45.95	44.94	44.96	42.80	38.98	40.59	82.85	37.77	42.64	51.07	46.50
19	54.02	45.83	44.74	45.05	43.02	39.66	40.63	71.43	37.70	43.35	50.91	46.37
20	53.82	45.93	44.75	45.20	42.77	39.96	40.78	54.01	37.64	43.64	52.89	46.27
21	52.38	45.88	44.87	45.09	42.57	40.17	40.95	50.78	37.57	43.89	54.80	46.21
22	46.58	45.71	44.88	45.07	42.65	40.20	40.89	49.72	36.98	44.46	56.16	46.18
23	47.14	45.83	44.76	44.69	42.77	39.40	40.85	46.89	36.87	47.93	56.83	46.04
24	48.24	45.87	44.71	44.50	42.72	39.17	40.94	45.60	37.12	53.71	56.85	45.89
25	48.68	45.66	44.79	44.62	42.58	39.74	41.19	43.99	36.74	55.33	56.62	45.81
26	48.93	45.69	44.89	44.63	42.11	40.03	42.74	43.83	37.05	52.96	56.17	45.73
27	49.01	45.68	44.92	44.30	38.91	40.00	43.55	43.94	37.14	50.89	56.09	45.65
28	48.98	45.63	44.93	44.02	38.47	40.21	43.99	41.54	37.12	50.86	55.79	45.68
29	49.03	45.53	44.93	44.13	--	40.47	44.25	37.56	37.11	51.40	54.43	45.70
30	48.90	45.35	44.89	44.42	--	40.54	44.53	39.25	37.16	53.33	53.15	45.66
31	48.75	--	44.84	44.44	--	40.46	--	40.03	--	53.20	51.65	--
Mean	53.76	46.15	45.00	44.82	43.15	40.44	41.17	49.63	38.19	43.19	54.24	47.27
Max.	63.61	48.76	45.61	45.20	44.56	41.30	44.53	82.85	40.67	55.33	56.85	50.55
Min.	46.58	44.41	44.65	44.02	38.47	38.22	40.38	37.56	35.15	37.06	50.91	45.65

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Ø3N-28W-12 BCBA 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	45.54	45.26	45.36	45.26	45.45	45.84	45.66	--	--	--	--	--
2	45.56	45.23	45.32	45.28	45.54	44.84	45.58	--	--	--	--	--
3	45.62	45.21	45.38	45.18	45.53	42.25	45.69	--	--	--	--	--
4	45.54	45.23	45.40	45.32	45.65	43.65	45.72	--	--	--	--	--
5	45.46	45.35	45.27	45.34	45.72	44.25	45.84	--	--	--	--	--
6	45.51	45.27	45.31	45.27	45.70	44.51	46.01	--	--	--	--	--
7	45.49	45.16	45.33	45.33	45.55	44.60	47.31	--	--	--	--	--
8	45.37	45.24	45.35	45.33	45.50	44.89	55.01	--	--	--	--	--
9	45.43	45.35	45.43	45.40	45.55	44.97	54.81	--	--	--	--	--
10	45.58	45.44	45.39	45.42	45.51	44.90	58.00	--	--	--	--	--
11	45.63	45.37	45.34	45.24	45.68	44.98	58.92	--	--	--	--	--
12	45.47	45.28	45.43	45.09	45.57	45.24	59.38	--	--	--	--	--
13	45.36	45.16	45.45	45.06	45.36	45.42	59.40	--	--	--	--	--
14	45.32	45.08	45.43	44.98	45.37	45.45	62.04	--	--	--	--	--
15	45.32	45.07	45.55	44.89	45.51	45.41	63.10	--	--	--	--	--
16	45.37	45.19	45.62	44.76	45.46	45.46	63.34	--	--	--	--	--
17	45.41	45.24	45.58	44.87	45.60	45.45	58.82	--	--	--	--	--
18	45.29	45.42	45.46	44.83	45.60	45.41	49.08	--	--	--	--	--
19	45.32	45.45	44.24	44.86	45.64	45.37	48.15	--	--	--	--	--
20	45.45	45.42	44.03	45.09	45.71	45.35	--	--	--	--	--	--
21	45.39	45.26	44.44	45.19	45.73	45.40	--	--	--	--	--	--
22	45.24	45.18	44.68	45.31	45.62	45.43	--	--	--	--	--	--
23	45.23	45.26	44.68	45.18	45.85	45.50	--	--	--	--	--	--
24	45.28	45.29	44.90	45.32	45.91	45.52	--	--	--	--	--	--
25	45.24	45.37	45.04	45.41	45.90	45.66	--	--	--	--	--	--
26	45.20	45.37	45.13	45.44	45.84	45.77	--	--	--	--	--	--
27	45.31	45.38	45.15	45.49	45.88	45.70	--	--	--	--	--	--
28	45.24	45.35	45.28	45.44	45.85	45.62	--	--	--	--	--	--
29	45.17	45.34	45.35	45.37	45.93	45.82	--	--	--	--	--	--
30	45.19	45.35	45.08	45.30	--	45.82	--	--	--	--	--	--
31	45.22	--	45.10	45.34	--	45.77	--	--	--	--	--	--
Mean	45.38	45.29	45.18	45.21	45.65	45.17	--	--	--	--	--	--
Max.	45.63	45.45	45.62	45.49	45.93	45.84	--	--	--	--	--	--
Min.	45.17	45.07	44.03	44.76	45.36	42.25	--	--	--	--	--	--



**Figure 12.** Hydrograph of well 03N-26W-12 BCBA 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 7  
 Station number: 344143099580601 Local number: 03N-26W-33 ABA 1  
 Location: Lat 34°41'43", long 99°58'06", hydrologic unit 11130101  
 Aquifer: 313BLIN  
 Altitude of land-surface datum: 1,840 ft  
 Well depth: 237 ft

Water Year, October 1982 to September 1983												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	61.60	78.52	110.52
2	--	--	--	--	--	--	--	--	--	61.61	79.17	109.22
3	--	--	--	--	--	--	--	--	--	61.56	80.10	109.00
4	--	--	--	--	--	--	--	--	--	61.58	82.06	110.76
5	--	--	--	--	--	--	--	--	--	61.66	84.35	110.56
6	--	--	--	--	--	--	--	--	--	61.79	86.53	111.15
7	--	--	--	--	--	--	--	--	64.06	82.09	90.83	106.99
8	--	--	--	--	--	--	--	--	64.06	82.36	93.34	--
9	--	--	--	--	--	--	--	--	64.03	82.65	94.62	--
10	--	--	--	--	--	--	--	--	63.93	83.10	95.59	--
11	--	--	--	--	--	--	--	--	63.71	83.63	96.47	--
12	--	--	--	--	--	--	--	--	63.39	84.95	97.07	--
13	--	--	--	--	--	--	--	--	63.16	86.39	97.43	--
14	--	--	--	--	--	--	--	--	63.07	86.73	97.98	--
15	--	--	--	--	--	--	--	--	62.92	86.88	98.38	--
16	--	--	--	--	--	--	--	--	62.81	87.84	98.88	--
17	--	--	--	--	--	--	--	--	62.62	88.43	99.49	--
18	--	--	--	--	--	--	--	--	62.20	89.14	107.46	--
19	--	--	--	--	--	--	--	--	62.05	89.84	102.29	--
20	--	--	--	--	--	--	--	--	61.93	70.54	102.33	--
21	--	--	--	--	--	--	--	--	61.86	71.18	102.30	--
22	--	--	--	--	--	--	--	--	61.78	71.62	101.09	--
23	--	--	--	--	--	--	--	--	61.71	72.56	100.88	--
24	--	--	--	--	--	--	--	--	61.61	73.76	102.55	100.56
25	--	--	--	--	--	--	--	--	61.53	75.36	102.92	--
26	--	--	--	--	--	--	--	--	61.45	75.76	104.59	--
27	--	--	--	--	--	--	--	--	61.36	76.36	105.96	--
28	--	--	--	--	--	--	--	--	61.29	77.16	106.56	--
29	--	--	--	--	--	--	--	--	61.30	78.13	109.97	--
30	--	--	--	--	--	--	--	--	61.45	77.93	110.69	98.96
31	--	--	--	--	--	--	--	--	--	78.10	111.93	--
Mean	--	--	--	--	--	--	--	--	--	68.46	97.49	--
Max.	--	--	--	--	--	--	--	--	--	78.13	111.93	--
Min.	--	--	--	--	--	--	--	--	--	61.56	78.52	--

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

03N-26W-33 ABA 1--Continued

Water Year, October 1983 to September 1984												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	70.34	65.77	--	--	--	--	--	--	--	--
2	--	--	70.11	65.89	--	59.71	--	--	--	--	--	--
3	--	--	69.95	65.52	--	--	--	--	--	--	--	--
4	--	--	69.75	65.35	--	--	58.49	--	--	--	--	--
5	--	--	69.62	65.20	--	--	--	--	--	--	--	--
6	--	--	69.53	65.07	--	--	--	--	--	--	--	--
7	--	--	69.32	64.97	--	--	--	--	--	--	--	--
8	--	--	69.17	64.82	--	--	--	--	--	--	--	--
9	--	--	68.97	64.69	--	--	--	--	--	--	--	--
10	--	--	68.74	64.66	--	--	--	--	--	--	--	--
11	--	--	68.63	64.46	--	--	--	69.64	--	--	--	--
12	--	--	68.45	64.41	--	--	--	--	--	--	--	--
13	--	--	68.26	64.41	--	--	--	--	--	--	--	--
14	--	--	68.10	64.40	--	--	--	--	--	--	--	--
15	--	--	67.99	64.40	--	--	--	--	--	--	--	--
16	--	--	67.92	64.40	--	--	--	--	--	--	--	--
17	--	72.63	67.78	64.41	--	--	--	--	--	--	--	--
18	--	70.36	67.69	64.41	--	--	--	--	--	--	--	--
19	--	72.27	67.50	64.41	--	--	--	--	--	--	--	--
20	--	72.09	67.31	63.50	--	--	--	--	--	--	--	--
21	--	71.83	67.21	--	--	--	--	--	--	--	--	--
22	--	71.73	67.10	--	--	--	--	--	--	--	98.02	--
23	--	71.59	66.95	--	--	--	--	--	--	--	--	--
24	--	71.47	66.93	--	--	--	--	--	--	--	--	--
25	--	71.26	66.74	--	--	--	--	68.84	--	--	--	--
26	--	71.13	66.49	--	--	--	--	--	--	--	--	--
27	--	70.92	66.28	--	--	--	--	--	--	--	--	--
28	--	70.78	66.24	--	--	--	--	--	--	--	--	--
29	--	70.62	66.21	--	--	--	--	--	--	--	--	--
30	--	70.51	66.05	--	--	--	--	--	--	--	--	--
31	--	--	65.88	--	--	--	--	--	--	--	--	--
Mean	--	--	67.97	--	--	--	--	--	--	--	--	--
Max.	--	--	70.34	--	--	--	--	--	--	--	--	--
Min.	--	--	65.88	--	--	--	--	--	--	--	--	--



Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 03N-26W-33 ABA 1--Continued

Water Year, October 1984 to September 1985												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	83.80	79.61	76.50	74.04	71.12	--	69.07	68.74	--	--
2	--	--	83.72	79.53	76.42	73.96	71.01	--	69.07	68.70	--	--
3	--	--	83.60	79.39	76.32	73.81	70.88	--	69.07	68.67	--	--
4	--	--	83.45	79.27	76.23	73.80	70.75	--	69.07	--	--	--
5	--	--	83.31	79.16	76.14	73.77	70.75	--	69.05	--	--	--
6	--	88.50	83.23	79.02	76.07	73.68	70.70	--	68.99	--	--	--
7	--	88.28	83.04	78.94	76.03	73.58	70.71	69.14	68.95	--	--	--
8	--	88.02	82.87	78.80	75.90	73.52	70.67	69.13	68.85	--	--	--
9	--	87.76	82.74	78.67	75.76	73.47	70.56	69.11	68.81	--	--	--
10	--	87.58	82.63	78.63	75.71	73.34	70.47	69.11	68.79	--	--	--
11	--	87.30	82.43	78.57	75.67	73.25	70.42	69.11	68.76	--	--	--
12	--	87.08	82.27	78.48	75.56	73.19	70.45	69.11	68.75	--	--	--
13	--	86.83	82.16	78.32	75.48	73.11	70.44	69.11	68.74	--	--	--
14	--	86.57	82.12	78.23	75.41	73.08	70.42	69.11	68.74	--	--	--
15	--	86.44	81.95	78.10	75.29	73.01	70.36	69.11	68.74	--	--	--
16	--	86.26	81.74	77.99	75.16	72.94	70.38	69.11	68.74	--	--	--
17	--	86.00	81.57	77.89	75.13	72.88	70.40	69.11	68.74	--	--	--
18	--	85.81	81.40	77.76	75.09	72.78	70.32	69.11	68.74	--	--	--
19	--	85.69	81.20	77.67	74.97	72.67	70.22	69.11	68.74	--	--	--
20	--	85.57	81.00	77.66	74.84	72.49	70.17	69.12	68.74	--	--	--
21	--	85.41	80.85	77.56	74.74	72.40	70.18	69.12	68.74	--	--	--
22	--	85.25	80.77	77.45	74.65	72.29	70.24	69.12	68.74	--	--	--
23	--	85.06	80.59	77.32	74.57	72.03	70.38	69.12	68.74	--	--	--
24	--	84.85	80.48	77.21	74.53	71.91	70.51	69.12	68.74	--	--	--
25	--	84.64	80.42	77.14	74.40	71.81	70.64	69.12	68.74	--	--	--
26	--	84.51	80.27	77.05	74.34	71.69	70.72	69.12	68.74	--	--	--
27	--	84.44	80.12	76.93	74.29	71.54	70.33	69.10	68.74	--	--	--
28	--	84.24	79.99	76.84	74.16	71.40	--	69.07	68.74	--	--	--
29	--	84.08	79.89	76.71	--	71.29	--	69.07	68.74	--	--	--
30	--	83.97	79.81	76.63	--	71.24	--	69.07	68.74	--	--	--
31	--	--	79.66	76.58	--	71.16	--	69.07	--	--	--	--
Mean	--	--	81.71	78.04	75.33	72.75	--	--	68.82	--	--	--
Max.	--	--	83.80	79.61	76.50	74.04	--	--	69.07	--	--	--
Min.	--	--	79.66	76.58	74.16	71.16	--	--	68.74	--	--	--

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

03N-26W-33 ABA 1--Continued

Water Year, October 1985 to September 1986												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	61.61	58.18	58.42	55.28	58.75	58.89	53.22	48.02	67.86	71.99
2	--	--	61.55	58.10	58.40	55.22	58.55	58.87	53.25	47.98	68.73	71.51
3	--	--	61.30	58.04	58.23	55.28	58.42	58.54	53.24	47.91	69.27	71.08
4	--	--	61.20	58.06	58.20	55.26	58.48	58.38	52.73	47.91	70.27	70.62
5	--	--	61.12	57.98	58.41	55.15	58.48	58.20	51.01	47.91	71.16	70.02
6	--	--	60.92	57.74	58.54	55.23	58.45	58.13	50.52	47.79	71.15	69.39
7	--	--	60.75	57.91	58.61	55.20	58.39	58.08	50.42	47.71	71.32	68.89
8	--	--	60.63	57.89	58.54	55.14	58.53	58.01	50.38	47.69	71.88	68.38
9	--	--	60.48	57.71	58.42	55.02	58.61	58.02	50.34	47.65	72.41	67.84
10	--	--	60.44	57.64	58.33	55.11	58.57	55.99	49.68	47.61	72.77	67.34
11	--	--	60.38	57.54	58.31	54.98	58.53	55.96	49.37	47.63	72.96	66.92
12	--	--	60.20	57.54	58.28	55.00	58.51	55.88	49.26	48.15	73.44	66.52
13	--	--	60.15	57.42	58.06	55.13	58.37	55.92	49.24	48.77	73.92	66.10
14	--	--	60.03	57.30	58.04	55.15	58.55	55.90	49.21	49.33	74.41	65.58
15	--	--	59.91	57.20	58.89	55.15	58.60	55.95	49.16	50.14	74.59	64.56
16	--	--	59.82	57.15	55.71	55.19	58.66	55.97	49.20	51.51	74.23	63.76
17	--	--	59.69	57.10	55.67	55.05	58.70	58.08	49.32	53.04	73.79	63.05
18	--	--	59.66	57.07	55.60	55.26	57.05	58.08	49.29	54.54	73.38	62.43
19	--	--	59.50	56.98	55.58	55.66	57.48	58.05	49.20	55.91	73.15	61.92
20	--	--	59.40	56.84	55.61	55.98	57.54	55.98	49.20	58.80	73.27	61.46
21	--	--	59.27	56.88	55.67	56.10	57.41	55.86	49.18	57.68	73.54	61.02
22	--	--	59.11	56.99	55.62	56.15	57.27	55.77	49.19	58.75	73.78	60.58
23	--	--	58.98	56.84	55.48	56.32	57.12	55.89	49.11	60.77	74.08	60.14
24	--	--	58.96	56.72	55.53	56.57	57.06	56.17	48.89	61.82	74.22	59.70
25	--	--	58.92	56.81	55.44	56.66	57.02	55.40	48.33	61.95	74.32	59.38
26	--	62.17	58.70	56.82	55.32	56.95	56.93	54.48	48.10	62.52	74.41	59.05
27	--	62.07	58.69	56.70	55.40	57.09	56.93	53.93	48.06	63.06	74.26	58.75
28	--	61.93	58.56	56.48	55.44	57.08	56.89	53.54	47.99	64.01	73.85	58.41
29	--	61.76	58.45	56.60	--	56.88	56.74	53.42	47.96	65.21	73.38	58.08
30	--	61.60	58.29	56.57	--	56.78	56.66	53.35	47.93	66.62	72.94	57.80
31	--	--	58.32	56.44	--	56.67	--	53.26	--	67.74	72.50	--
Mean	--	--	59.84	57.27	55.96	55.73	56.78	55.60	49.73	54.33	72.75	64.41
Max.	--	--	61.61	58.18	58.61	57.09	57.54	58.89	53.25	67.74	74.59	71.99
Min.	--	--	58.29	56.44	55.32	54.96	56.37	53.26	47.93	47.61	67.86	57.80

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 03N-26W-33 ABA 1--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	45.44	42.63	41.60	40.35	--	36.63	36.58	35.67	32.06	47.00	48.28
2	--	45.40	42.66	41.37	40.35	--	36.87	36.71	35.57	32.00	47.29	47.58
3	--	45.15	42.71	41.53	40.40	--	36.76	37.10	35.64	32.00	46.17	47.01
4	--	44.79	42.74	41.52	40.41	--	36.77	37.46	35.56	31.92	46.10	46.57
5	--	43.93	42.63	41.38	40.58	--	36.80	37.84	35.39	31.98	46.42	46.19
6	--	43.24	42.45	41.38	40.53	--	36.72	38.09	35.25	32.03	46.29	45.87
7	--	43.26	42.37	41.52	--	--	36.89	38.36	35.14	32.09	47.45	45.54
8	--	43.26	42.32	41.44	--	--	36.64	38.44	35.07	32.37	46.90	45.24
9	--	43.28	42.31	41.34	--	--	36.51	38.71	34.98	32.62	47.55	44.89
10	--	43.28	42.29	41.41	--	--	36.54	39.05	34.21	32.98	47.09	44.60
11	--	43.48	42.14	41.43	--	37.47	36.39	39.35	33.34	33.32	47.52	44.34
12	--	43.83	42.20	41.33	--	37.50	36.37	39.59	33.18	33.50	48.47	44.07
13	--	43.92	42.15	41.22	--	37.37	36.54	40.09	33.03	33.64	49.45	43.77
14	--	43.77	42.05	41.13	--	37.14	36.59	40.88	32.89	33.89	49.76	43.53
15	--	43.76	42.02	41.25	--	37.21	36.57	41.35	32.81	34.69	49.62	43.19
16	--	43.68	42.01	41.30	--	37.06	36.52	41.49	32.75	35.44	50.42	42.95
17	--	43.63	41.98	41.22	--	36.81	36.45	41.97	32.75	35.69	49.29	42.80
18	--	43.50	41.98	41.15	--	36.89	36.40	42.55	32.78	36.12	48.75	42.68
19	--	43.08	41.82	41.20	--	36.91	36.43	43.50	32.67	36.58	49.06	42.50
20	--	43.24	41.81	41.33	--	36.86	36.62	43.47	32.62	36.99	50.19	42.31
21	--	43.11	41.86	41.18	--	36.90	36.78	43.21	32.60	37.65	51.91	42.20
22	--	42.92	41.80	41.23	--	36.73	36.64	43.08	32.56	38.28	51.75	42.08
23	--	43.08	41.64	41.00	--	36.63	36.61	42.28	32.58	38.66	51.78	41.84
24	--	43.05	41.58	40.93	--	36.75	36.70	41.24	32.60	38.83	51.90	41.61
25	--	42.82	41.64	41.01	--	36.84	36.71	40.23	32.60	39.65	53.28	41.47
26	--	42.97	41.70	41.02	--	36.79	36.71	39.44	32.60	41.39	53.25	41.34
27	--	42.93	41.67	40.84	--	36.58	36.71	39.06	32.51	43.42	52.54	41.20
28	--	42.84	41.65	40.53	--	36.78	36.71	38.19	32.42	44.47	51.83	41.17
29	--	42.70	41.64	40.53	--	36.91	36.61	36.58	32.40	45.29	52.08	41.12
30	45.42	42.54	41.56	40.63	--	36.86	36.57	36.19	32.19	46.40	50.22	41.00
31	45.35	--	41.50	40.44	--	36.76	--	35.90	--	--	49.03	--
Mean	--	43.53	42.05	41.17	--	--	36.62	39.61	33.55	--	49.37	43.63
Max.	--	45.44	42.74	41.60	--	--	36.87	43.50	35.67	--	53.28	48.28
Min.	--	42.54	41.50	40.44	--	--	36.37	35.90	32.19	--	46.10	41.00

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 03N-26W-33 ABA 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	40.80	39.29	38.26	37.95	37.26	--	36.67	36.34	37.86	40.54	58.99	70.45
2	40.78	39.20	38.19	37.85	37.06	--	36.71	36.29	37.79	40.32	58.79	69.79
3	40.77	39.14	38.28	37.70	37.07	--	36.75	36.48	37.82	40.09	59.49	69.11
4	40.52	39.14	38.27	37.87	37.19	--	36.67	36.57	37.81	39.94	61.23	68.37
5	40.40	39.23	38.07	37.79	37.05	--	36.82	36.53	37.83	39.84	62.42	67.66
6	40.40	39.08	38.13	37.66	37.20	--	36.99	36.35	37.87	39.81	63.31	66.99
7	40.31	38.91	38.11	37.70	37.14	--	36.82	36.27	38.00	40.41	64.21	66.32
8	40.10	39.01	38.12	37.62	37.15	--	36.73	36.31	38.10	40.92	65.21	65.68
9	40.13	39.09	38.18	37.69	37.21	--	36.94	36.50	38.41	41.25	66.01	65.10
10	40.23	39.13	38.06	37.65	37.21	36.55	37.04	36.55	38.77	41.33	66.02	64.49
11	40.29	38.99	37.97	37.43	37.01	36.64	36.96	36.60	38.95	41.59	66.83	63.88
12	40.15	38.84	38.05	37.57	37.32	36.87	37.18	36.55	39.11	41.99	67.37	63.32
13	39.98	38.67	38.03	37.78	37.35	37.00	37.32	36.52	39.35	42.79	67.73	62.78
14	39.91	38.56	38.02	37.59	37.30	36.95	37.41	36.52	39.74	43.91	67.68	62.17
15	39.89	38.53	38.14	37.40	37.18	36.86	37.48	36.60	39.91	45.06	68.36	61.60
16	39.94	38.64	38.18	37.30	37.23	36.87	37.72	36.90	39.83	46.32	68.42	61.01
17	40.00	38.65	38.07	37.37	37.16	36.96	37.48	37.08	39.55	47.58	68.85	60.43
18	39.95	38.83	37.92	37.20	37.24	37.03	36.67	37.23	39.46	48.37	70.31	59.70
19	39.98	38.81	37.75	37.29	37.07	36.92	36.45	37.36	39.43	49.44	71.32	58.11
20	40.07	38.72	38.01	37.51	36.96	36.79	36.32	37.42	39.45	50.64	71.73	57.00
21	39.94	38.48	37.89	37.49	36.80	36.76	36.23	37.45	39.46	52.60	71.18	56.18
22	39.73	38.38	37.86	37.55	36.74	36.70	36.27	37.43	39.52	53.35	71.58	55.49
23	39.68	38.44	37.64	37.31	36.82	36.73	36.46	37.46	39.86	54.37	72.35	54.92
24	39.72	38.42	37.83	37.50	36.69	36.70	36.38	37.56	40.59	54.79	72.94	54.47
25	39.61	38.49	37.88	37.50	36.73	36.85	36.42	37.64	41.38	55.47	72.52	54.01
26	39.54	38.45	37.89	37.51	36.85	36.96	36.48	37.71	42.12	55.54	72.09	53.53
27	39.65	38.41	37.81	37.51	--	36.80	36.57	37.73	41.79	56.46	71.97	53.06
28	39.51	38.34	37.95	37.39	--	36.67	36.49	37.72	41.45	55.74	71.99	52.62
29	39.36	38.29	38.00	37.27	--	36.92	36.37	37.63	40.98	55.97	71.80	52.36
30	39.28	38.28	37.69	37.16	--	36.83	36.46	37.65	40.77	56.71	71.48	51.98
31	39.31	--	37.84	37.21	--	36.73	--	37.86	--	57.89	71.02	--
Mean	40.00	38.75	38.00	37.53	--	--	36.78	36.99	39.43	47.45	67.91	60.75
Max.	40.80	39.29	38.28	37.95	--	--	37.72	37.86	42.12	57.89	72.94	70.45
Min.	39.28	38.28	37.64	37.16	--	--	36.23	36.27	37.79	39.81	58.79	51.98

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 03N-26W-33 ABA 1--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	51.58	48.33	44.76	43.20	--	--	--	--	--	--	--	--
2	51.35	48.04	44.88	43.19	--	--	--	--	--	--	--	--
3	51.05	45.89	44.88	43.28	--	--	--	--	--	--	--	--
4	50.82	45.88	44.88	43.18	--	--	--	--	--	--	--	--
5	50.61	45.95	44.64	42.94	--	--	--	--	--	--	--	--
6	50.20	45.77	44.48	42.93	--	--	--	--	--	--	--	--
7	49.99	45.68	44.47	43.00	--	--	--	--	--	--	--	--
8	49.63	45.68	44.61	43.19	--	--	--	--	--	--	--	--
9	49.37	45.51	44.43	43.09	--	--	--	--	--	--	--	--
10	49.18	45.63	44.25	42.94	--	--	--	--	--	--	--	--
11	48.97	45.41	44.23	42.87	--	--	--	--	--	--	--	--
12	48.82	45.45	44.19	43.11	--	--	--	--	--	--	--	--
13	48.60	45.50	44.02	43.10	--	--	--	--	--	--	--	--
14	48.31	45.38	43.91	42.82	--	--	--	--	--	--	--	--
15	48.09	45.26	44.19	42.90	--	--	--	--	--	--	--	--
16	47.94	45.50	44.09	42.91	--	--	--	--	--	--	--	--
17	47.74	45.43	43.99	42.76	--	--	--	--	--	--	--	--
18	47.76	45.34	43.79	42.82	--	--	--	--	--	--	--	--
19	47.56	45.47	43.55	--	--	--	--	--	--	--	--	--
20	47.38	45.60	43.67	--	--	--	--	--	--	--	--	--
21	47.34	45.47	43.68	--	--	--	--	--	--	--	--	--
22	47.07	45.35	43.58	--	--	--	--	--	--	--	--	--
23	47.06	45.19	43.46	--	--	--	--	--	--	--	--	--
24	46.99	44.95	43.59	--	--	--	--	--	--	--	--	--
25	46.92	44.83	43.50	--	--	--	--	--	--	--	--	--
26	46.88	44.73	43.31	--	--	--	--	--	--	--	--	--
27	46.71	44.95	43.45	--	--	--	--	--	--	--	--	--
28	46.90	44.85	43.55	--	--	--	--	--	--	--	--	--
29	46.77	44.77	43.39	--	--	--	--	--	--	--	--	--
30	46.67	44.81	43.27	--	--	--	--	--	--	--	--	--
31	46.53	--	43.22	--	--	--	--	--	--	--	--	--
Mean	48.41	45.42	43.98	--	--	--	--	--	--	--	--	--
Max.	51.58	48.33	44.88	--	--	--	--	--	--	--	--	--
Min.	46.53	44.73	43.22	--	--	--	--	--	--	--	--	--

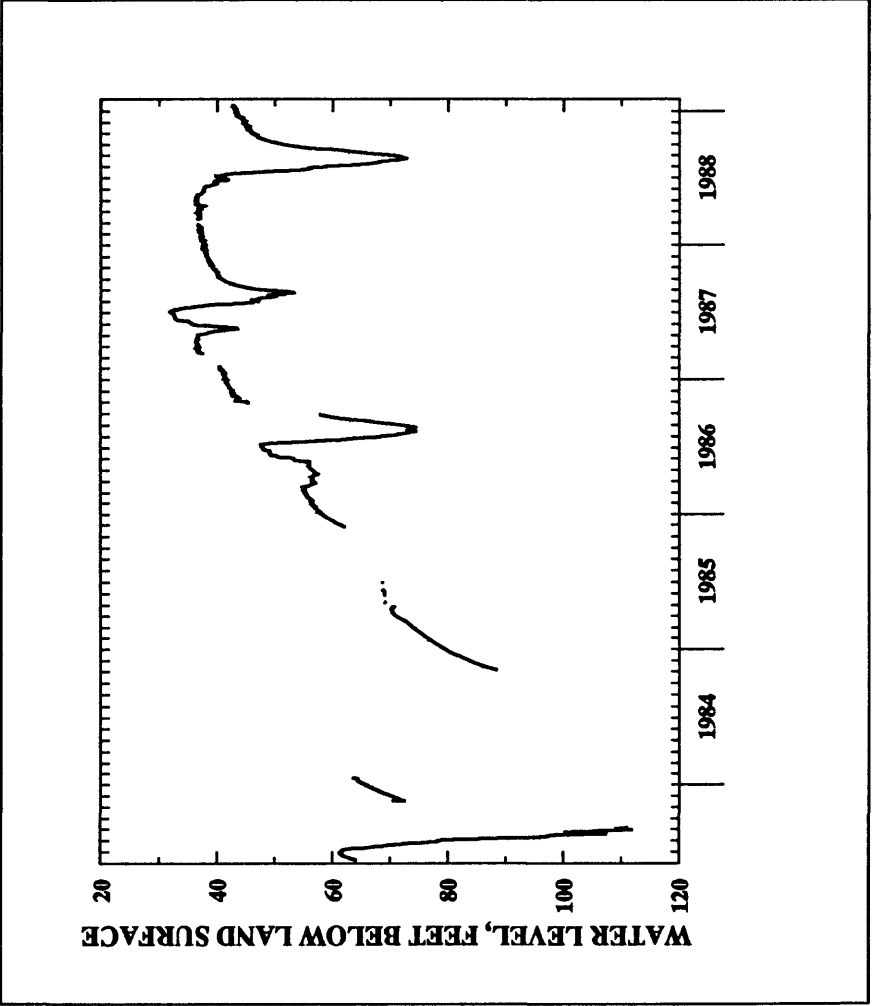


Figure 13. Hydrograph of well 03N-26W-33 ABA 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 8  
 Station number: 344750099522601 Local number: 04N-25W-30 BBAB 1  
 Location: Lat 34°47'50", long 99°52'26", hydrologic unit 11130101  
 Aquifer: 110SFRT  
 Altitude of land-surface datum: 1,819 ft  
 Well depth: 50 ft

## Water Year, October 1985 to September 1986

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	39.95	40.00	39.91	39.82
2	--	--	--	--	--	--	--	--	39.96	40.00	39.93	39.81
3	--	--	--	--	--	--	--	--	39.96	39.95	39.94	39.82
4	--	--	--	--	--	--	--	--	39.95	39.92	39.90	39.83
5	--	--	--	--	--	--	--	--	39.96	39.93	39.88	39.81
6	--	--	--	--	--	--	--	--	39.95	39.98	39.89	39.82
7	--	--	--	--	--	--	--	--	39.97	39.98	39.89	39.85
8	--	--	--	--	--	--	--	--	39.96	39.96	39.90	39.80
9	--	--	--	--	--	--	--	--	39.96	39.94	39.88	39.77
10	--	--	--	--	--	--	--	--	39.98	39.92	39.92	39.76
11	--	--	--	--	--	--	--	--	40.01	39.92	39.91	39.82
12	--	--	--	--	--	--	--	--	39.99	39.93	39.88	39.82
13	--	--	--	--	--	--	--	--	40.00	39.97	39.86	39.81
14	--	--	--	--	--	--	--	--	39.99	39.97	39.87	39.79
15	--	--	--	--	--	--	--	--	39.97	39.95	39.87	39.79
16	--	--	--	--	--	--	--	--	40.00	39.94	39.86	39.78
17	--	--	--	--	--	--	--	--	40.03	39.95	39.88	39.76
18	--	--	--	--	--	--	--	--	40.00	39.95	39.89	39.77
19	--	--	--	--	--	--	--	--	39.98	39.94	39.86	39.77
20	--	--	--	--	--	--	--	--	39.99	39.95	39.86	39.77
21	--	--	--	--	--	--	--	--	39.99	39.94	39.88	39.76
22	--	--	--	--	--	--	--	--	40.01	39.95	39.86	39.74
23	--	--	--	--	--	--	--	--	40.00	39.93	39.86	39.72
24	--	--	--	--	--	--	--	--	40.00	39.91	39.85	39.71
25	--	--	--	--	--	--	--	--	39.99	39.91	39.85	39.75
26	--	--	--	--	--	--	--	--	39.99	39.91	39.85	39.75
27	--	--	--	--	--	--	--	--	39.99	39.90	39.86	39.75
28	--	--	--	--	--	--	--	--	39.97	39.91	39.87	39.73
29	--	--	--	--	--	--	--	--	39.96	39.91	39.83	39.72
30	--	--	--	--	--	--	--	39.96	39.95	39.90	39.83	39.74
31	--	--	--	--	--	--	--	39.94	--	39.92	39.82	--
Mean	--	--	--	--	--	--	--	--	39.98	39.94	39.88	39.78
Max.	--	--	--	--	--	--	--	--	40.03	40.00	39.94	39.85
Min.	--	--	--	--	--	--	--	--	39.95	39.90	39.82	39.71

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 04N-25W-30 BBAB 1--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	39.72	39.42	38.71	38.28	38.03	37.90	37.67	37.52	37.36	37.18	36.91	36.68
2	39.69	39.37	38.71	38.17	38.03	37.88	37.75	37.50	37.39	37.17	36.90	36.66
3	39.71	39.30	38.70	38.31	38.03	37.91	37.68	37.56	37.45	37.16	36.90	36.65
4	39.77	39.30	38.69	38.24	38.04	37.90	37.70	37.59	37.41	37.13	36.92	36.64
5	39.76	39.29	38.63	38.17	38.08	37.82	37.70	37.59	37.37	37.15	36.89	36.63
6	39.74	39.24	38.59	38.21	38.05	37.82	37.68	37.58	37.35	37.15	36.87	36.63
7	39.70	39.25	38.59	38.23	38.00	37.80	37.66	37.56	37.35	37.14	36.87	36.63
8	39.69	39.26	38.57	38.17	38.04	37.78	37.64	37.54	37.35	37.14	36.86	36.64
9	39.73	39.28	38.62	38.15	37.98	37.85	37.60	37.50	37.33	37.12	36.87	36.60
10	39.68	39.22	38.58	38.18	37.95	37.84	37.65	37.49	37.32	37.11	36.84	36.60
11	39.69	39.19	38.53	38.16	37.97	37.81	37.58	37.50	37.33	37.10	36.82	36.60
12	39.73	39.26	38.56	38.12	37.97	37.80	37.61	37.50	37.33	37.11	36.82	36.60
13	39.66	39.19	38.52	38.08	37.90	37.73	37.66	37.49	37.31	37.14	36.82	36.57
14	39.67	39.08	38.49	38.08	37.86	37.71	37.65	37.51	37.30	37.09	36.80	36.58
15	39.68	39.07	38.49	38.13	37.97	37.76	37.63	37.50	37.29	37.06	36.80	36.54
16	39.64	39.06	38.47	38.11	37.97	37.70	37.61	37.46	37.28	37.05	36.81	36.56
17	39.62	39.03	38.46	38.06	37.98	37.70	37.58	37.45	37.29	37.03	36.80	36.57
18	39.62	39.10	38.45	38.05	37.96	37.76	37.58	37.45	37.30	37.06	36.79	36.58
19	39.62	38.98	38.41	38.08	37.95	37.75	37.60	37.45	37.25	37.06	36.78	36.55
20	39.59	39.08	38.43	38.10	37.95	37.72	37.66	37.43	37.25	37.05	36.78	36.55
21	39.54	38.97	38.43	38.02	37.88	37.73	37.67	37.48	37.25	37.03	36.77	36.57
22	39.52	38.94	38.39	38.05	37.89	37.65	37.59	37.50	37.25	37.01	36.77	36.56
23	39.54	39.00	38.34	37.97	37.86	37.70	37.60	37.45	37.26	37.00	36.78	36.51
24	39.51	38.93	38.34	38.01	37.88	37.76	37.62	37.41	--	37.01	36.72	36.49
25	39.49	38.88	38.36	38.03	37.88	37.78	37.61	37.41	37.25	37.00	36.71	36.50
26	39.48	38.89	38.36	38.03	37.84	37.73	37.60	37.40	37.24	36.98	36.73	36.49
27	39.46	38.79	38.33	37.97	37.82	37.66	37.60	37.41	37.21	36.96	36.75	36.48
28	39.44	38.75	38.31	37.97	37.85	37.76	37.58	37.41	37.20	36.95	36.73	36.53
29	39.45	38.70	38.31	38.13	--	37.77	37.54	37.42	37.20	36.95	36.70	36.52
30	39.39	38.69	38.26	38.12	--	37.72	37.54	37.40	37.21	36.94	36.70	36.49
31	39.39	--	38.27	38.01	--	37.70	--	37.38	--	36.93	36.71	--
Mean	39.61	39.08	38.48	38.11	37.95	37.77	37.63	37.48	--	37.06	36.80	36.57
Max.	39.77	39.42	38.71	38.31	38.08	37.91	37.75	37.59	--	37.18	36.92	36.68
Min.	39.39	38.69	38.26	37.97	37.82	37.65	37.54	37.38	--	36.93	36.70	36.48



Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 04N-25W-30 BBAB 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	36.45	36.35	36.25	36.36	36.36	36.39	36.54	36.72	36.95	37.10	37.20	37.35
2	36.53	36.32	36.24	36.28	36.36	36.38	36.58	36.74	36.93	37.10	37.22	37.37
3	36.51	36.32	36.29	36.27	36.36	36.47	36.58	36.82	36.97	37.08	37.24	37.37
4	36.42	36.35	36.26	36.35	36.43	36.46	36.56	36.84	36.96	37.11	37.24	37.36
5	36.46	36.37	36.20	36.30	36.45	36.50	36.67	36.81	36.97	37.13	37.24	37.34
6	36.46	36.30	36.26	36.27	36.37	36.44	36.69	36.73	36.96	37.12	37.24	37.35
7	36.44	36.28	36.23	36.30	36.34	36.43	36.59	36.72	36.92	37.13	37.23	37.32
8	36.39	36.36	36.27	36.28	36.33	36.51	36.59	36.76	36.91	37.14	37.25	37.34
9	36.47	36.37	36.26	36.31	36.37	36.45	36.71	36.86	37.02	37.11	37.26	37.39
10	36.51	36.38	36.22	36.29	36.38	36.37	36.71	36.86	37.04	37.11	37.26	37.38
11	36.47	36.32	36.24	36.19	36.41	36.45	36.65	36.88	36.99	37.11	37.25	37.36
12	36.39	36.28	36.26	36.35	36.34	36.54	36.65	36.84	36.97	37.12	37.26	37.41
13	36.38	36.25	36.25	36.35	36.28	36.58	36.63	36.83	37.01	37.14	37.27	37.41
14	36.39	36.24	36.25	36.28	36.37	36.52	36.65	36.80	37.06	37.15	37.29	37.38
15	36.39	36.27	36.30	36.21	36.35	36.51	36.69	36.80	37.04	37.15	37.26	37.38
16	36.43	36.31	36.31	36.23	36.32	36.53	36.67	36.86	37.01	37.17	37.29	37.40
17	36.40	36.31	36.26	36.26	36.41	36.59	36.61	36.83	36.98	37.16	37.29	37.41
18	36.35	36.40	36.21	36.19	36.36	36.59	36.68	36.83	37.01	37.15	37.28	37.32
19	36.41	36.35	36.21	36.28	36.38	36.54	36.67	36.83	37.03	37.19	37.27	37.41
20	36.45	36.31	36.33	36.34	36.41	36.50	36.65	36.86	37.05	37.22	37.27	37.42
21	36.37	36.23	36.24	36.32	36.38	36.51	36.62	36.88	37.04	37.19	37.29	37.41
22	36.34	36.25	36.26	36.34	36.35	36.50	36.68	36.88	37.03	37.14	37.31	37.38
23	36.37	36.28	36.18	36.25	36.49	36.53	36.77	36.90	37.06	37.14	37.34	37.40
24	36.40	36.28	36.29	36.37	36.47	36.53	36.69	36.92	37.06	37.19	37.33	37.44
25	36.32	36.30	36.28	36.33	36.45	36.58	36.74	36.93	37.08	37.20	37.29	37.44
26	36.38	36.29	36.29	36.38	36.41	36.63	36.78	36.91	37.06	37.20	37.29	37.41
27	36.40	36.28	36.26	36.35	36.45	36.52	36.79	36.88	37.07	37.20	37.31	37.38
28	36.32	36.25	36.35	36.32	36.42	36.51	36.75	36.88	37.06	37.20	37.38	37.38
29	36.32	36.25	36.32	36.28	36.47	36.64	36.72	36.86	37.03	37.23	37.35	37.44
30	36.33	36.25	36.21	36.25	--	36.57	36.78	36.89	37.05	37.23	37.31	37.40
31	36.36	--	36.33	36.31	--	36.55	--	36.93	--	37.20	37.31	--
Mean	36.41	36.30	36.26	36.30	36.39	36.51	36.67	36.84	37.01	37.16	37.28	37.38
Max.	36.53	36.40	36.35	36.38	36.49	36.64	36.79	36.93	37.08	37.23	37.38	37.44
Min.	36.32	36.23	36.18	36.19	36.26	36.37	36.54	36.72	36.91	37.08	37.20	37.32

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

## 04N-25W-30 BBAB 1--Continued

Day	Water Year, October 1988 to September 1989											
	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	37.38	37.19	37.22	37.12	--	--	--	--	--	--	--	--
2	37.44	37.12	37.19	37.12	--	--	--	--	--	--	--	--
3	37.42	37.12	37.20	37.20	--	--	--	--	--	--	--	--
4	37.43	37.19	37.25	37.11	--	--	--	--	--	--	--	--
5	37.41	37.25	37.15	37.05	--	--	--	--	--	--	--	--
6	37.39	37.17	37.09	37.08	--	--	--	--	--	--	--	--
7	37.43	37.20	37.15	37.15	--	--	--	--	--	--	--	--
8	37.33	37.21	37.24	37.22	--	--	--	--	--	--	--	--
9	37.35	37.18	37.15	37.14	--	--	--	--	--	--	--	--
10	37.35	37.28	37.13	37.11	--	--	--	--	--	--	--	--
11	37.36	37.15	37.18	37.12	--	--	--	--	--	--	--	--
12	37.36	37.20	37.18	37.25	--	--	--	--	--	--	--	--
13	37.33	37.18	37.09	37.20	--	--	--	--	--	--	--	--
14	37.27	37.14	37.12	37.09	--	--	--	--	--	--	--	--
15	37.27	37.14	37.28	37.19	--	--	--	--	--	--	--	--
16	37.29	37.28	37.18	37.17	--	--	--	--	--	--	--	--
17	37.27	37.18	37.18	37.11	--	--	--	--	--	--	--	--
18	37.35	37.13	37.08	37.19	--	--	--	--	--	--	--	--
19	37.28	37.19	37.03	--	--	--	--	--	--	--	--	--
20	37.25	37.28	37.15	--	--	--	--	--	--	--	--	--
21	37.29	37.22	37.13	--	--	--	--	--	--	--	--	--
22	37.18	37.17	37.12	--	--	--	--	--	--	--	--	--
23	37.27	37.12	37.07	--	--	--	--	--	--	--	--	--
24	37.23	37.09	37.18	--	--	--	--	--	--	--	--	--
25	37.25	37.09	37.11	--	--	--	--	--	--	--	--	--
26	37.24	37.11	37.08	--	--	--	--	--	--	--	--	--
27	37.21	37.25	37.18	--	--	--	--	--	--	--	--	--
28	37.31	37.18	37.19	--	--	--	--	--	--	--	--	--
29	37.28	37.21	37.12	--	--	--	--	--	--	--	--	--
30	37.27	37.24	37.10	--	--	--	--	--	--	--	--	--
31	37.25	--	37.11	--	--	--	--	--	--	--	--	--
Mean	37.31	37.18	37.15	--	--	--	--	--	--	--	--	--
Max.	37.44	37.28	37.28	--	--	--	--	--	--	--	--	--
Min.	37.18	37.09	37.03	--	--	--	--	--	--	--	--	--

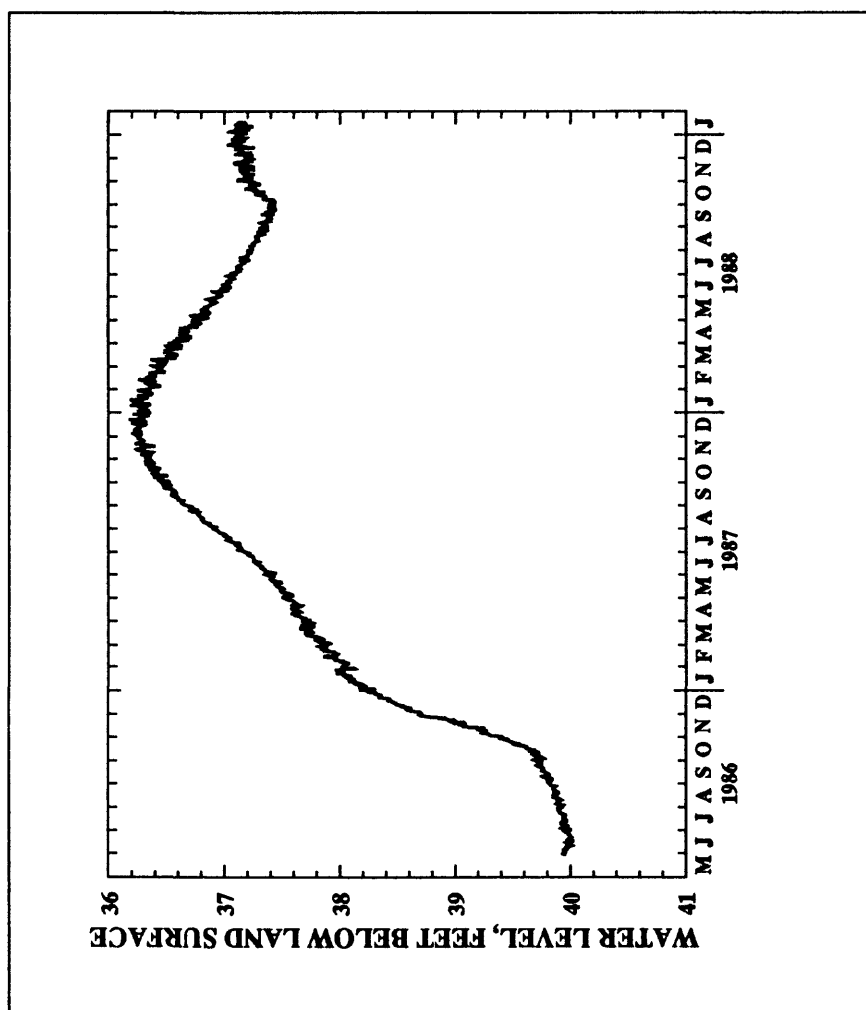


Figure 14. Hydrograph of well 04N-25W-30 BBAB 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA

Index number on location map: 9

Station number: 342544099433201, Local number: 01S-24W-33 BCCC 1

Location: Lat 34°25'44", long 99°43'32", hydrologic unit 11130101

Aquifer: 313VVCR

Altitude of land-surface datum: 1,477 ft

Well depth: 74 ft

## Water Year, October 1986 to September 1987

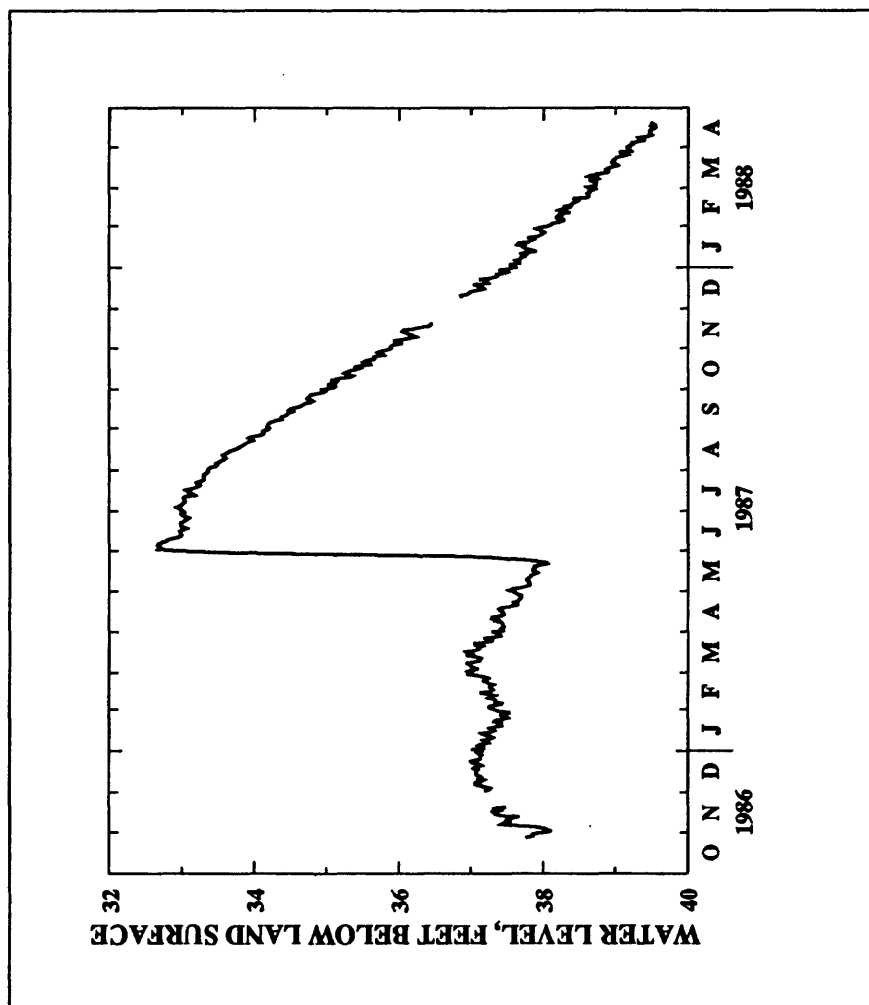
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	38.03	--	37.17	37.33	36.97	37.29	37.58	32.90	33.03	33.35	34.21
2	--	38.11	37.20	37.01	37.27	36.95	37.48	37.53	32.67	32.98	33.36	34.18
3	--	38.05	37.24	37.18	37.25	37.03	37.41	37.60	32.70	32.98	33.39	34.19
4	--	38.03	37.27	37.18	37.27	37.10	37.43	37.71	32.69	32.93	33.46	34.19
5	--	37.89	37.20	37.10	37.42	37.02	37.48	37.78	32.66	32.97	33.48	34.21
6	--	37.58	37.10	37.13	37.43	36.99	37.44	37.82	32.67	33.00	33.47	34.25
7	--	37.42	37.06	37.24	37.34	36.99	37.44	37.82	32.71	33.01	33.51	34.30
8	--	37.45	37.06	37.21	37.35	36.94	37.43	37.82	32.77	33.04	33.53	34.38
9	--	37.55	37.14	37.17	37.33	37.05	37.35	37.79	32.80	33.04	33.58	34.37
10	--	37.49	37.18	37.26	37.24	37.12	37.38	37.77	32.84	33.03	33.60	34.38
11	--	37.51	37.09	37.30	37.28	37.12	37.29	37.79	32.92	33.02	33.57	34.43
12	--	37.58	37.15	37.25	37.33	37.14	37.30	37.82	32.98	33.04	33.56	34.46
13	--	37.66	37.13	37.19	37.23	37.08	37.42	37.83	33.00	33.18	33.60	34.47
14	--	37.42	37.07	37.15	37.13	36.94	37.46	37.87	32.99	33.15	33.63	34.53
15	--	37.34	37.07	37.27	37.27	37.01	37.45	37.92	32.98	33.09	33.66	34.48
16	--	37.33	37.08	37.32	37.31	36.96	37.43	37.88	32.97	33.09	33.71	34.51
17	--	37.30	37.07	37.29	37.28	36.93	37.40	37.85	33.00	33.05	33.76	34.57
18	--	37.44	37.10	37.26	37.26	37.06	37.39	37.86	33.06	33.12	33.79	34.64
19	--	37.30	37.04	37.33	37.27	37.11	37.43	37.89	33.00	33.18	33.83	34.67
20	--	37.47	37.07	37.44	37.31	37.10	37.56	37.88	32.99	33.23	33.86	34.69
21	--	--	37.15	37.36	37.24	37.15	37.66	37.98	32.98	33.25	33.89	34.76
22	--	--	37.11	37.43	37.23	37.05	37.60	38.06	32.98	33.22	33.93	34.81
23	--	--	37.02	37.32	37.18	37.05	37.59	38.04	33.02	33.20	33.99	34.77
24	--	--	37.00	37.33	37.20	37.20	37.65	37.92	33.05	33.26	33.97	34.73
25	--	--	37.07	37.44	37.24	37.29	37.67	37.75	33.07	33.30	33.93	34.75
26	--	--	37.13	37.51	37.19	37.29	37.69	37.49	33.10	33.29	33.98	34.77
27	--	--	37.13	37.47	37.10	37.17	37.70	37.27	33.05	33.29	34.09	34.79
28	37.76	--	37.13	37.40	36.96	37.32	37.70	36.89	33.00	33.29	34.13	34.89
29	37.85	--	37.15	37.48	--	37.41	37.64	35.44	32.99	33.31	34.12	34.97
30	37.84	--	37.10	37.54	--	37.40	37.61	34.23	33.04	33.34	34.12	34.99
31	37.87	--	37.08	37.39	--	37.35	--	33.41	--	33.36	34.19	--
Mean	--	--	--	37.29	37.26	37.11	37.49	37.42	32.92	33.14	33.74	34.54
Max.	--	--	--	37.54	37.43	37.41	37.70	38.06	33.10	33.36	34.19	34.99
Min.	--	--	--	37.01	36.96	36.93	37.29	33.41	32.66	32.93	33.35	34.18

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

## 01S-24W-33 BCCC 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	34.95	35.89	--	37.61	38.05	38.65	39.18	--	--	--	--	--
2	35.04	35.88	--	37.59	38.11	38.61	39.21	--	--	--	--	--
3	35.14	35.89	--	37.53	38.12	38.73	39.24	--	--	--	--	--
4	35.03	35.93	--	37.67	38.22	38.73	39.23	--	--	--	--	--
5	35.03	36.05	--	37.66	38.28	38.74	39.31	--	--	--	--	--
6	35.13	36.00	--	37.62	38.28	38.70	39.41	--	--	--	--	--
7	35.15	35.93	--	37.68	38.18	38.64	39.35	--	--	--	--	--
8	35.08	36.04	--	37.68	38.18	38.78	39.32	--	--	--	--	--
9	35.17	36.15	--	37.74	38.25	38.73	39.44	--	--	--	--	--
10	35.32	36.24	36.87	37.76	38.23	38.63	39.50	--	--	--	--	--
11	35.38	36.20	36.86	37.67	38.36	38.68	39.47	--	--	--	--	--
12	35.28	36.15	36.95	37.73	38.28	38.82	39.48	--	--	--	--	--
13	35.24	36.09	36.97	37.90	38.21	38.90	39.47	--	--	--	--	--
14	35.27	36.05	37.00	37.84	38.26	38.90	39.48	--	--	--	--	--
15	35.32	36.07	37.11	37.76	38.34	38.87	39.54	--	--	--	--	--
16	35.40	36.20	37.17	37.72	38.28	38.90	39.55	--	--	--	--	--
17	35.46	36.27	37.14	37.74	38.39	38.96	39.49	--	--	--	--	--
18	35.39	36.42	37.09	37.64	38.39	39.03	39.53	--	--	--	--	--
19	35.46	36.43	37.03	37.66	38.42	39.00	39.49	--	--	--	--	--
20	35.61	36.46	37.23	37.80	38.47	38.95	--	--	--	--	--	--
21	35.60	--	37.20	37.82	38.49	38.96	--	--	--	--	--	--
22	35.52	--	37.22	37.89	38.41	38.97	--	--	--	--	--	--
23	35.56	--	37.12	37.78	38.60	39.00	--	--	--	--	--	--
24	35.66	--	37.26	37.92	38.63	39.01	--	--	--	--	--	--
25	35.65	--	37.33	37.96	38.63	39.09	--	--	--	--	--	--
26	35.66	--	37.37	37.99	38.61	39.16	--	--	--	--	--	--
27	35.79	--	37.36	38.02	38.65	39.10	--	--	--	--	--	--
28	35.76	--	37.47	37.98	38.64	39.05	--	--	--	--	--	--
29	35.71	--	37.53	37.95	38.71	39.21	--	--	--	--	--	--
30	35.75	--	37.39	37.90	--	39.19	--	--	--	--	--	--
31	35.83	--	37.61	37.96	--	39.16	--	--	--	--	--	--
Mean	35.40	--	--	37.78	38.37	38.90	--	--	--	--	--	--
Max.	35.83	--	--	38.02	38.71	39.21	--	--	--	--	--	--
Min.	34.95	--	--	37.53	38.05	38.61	--	--	--	--	--	--



**Figure 15.** Hydrograph of well 01S-24W-33 BCCC 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 10

Station number: 343410099364401 Local number: 01N-23W-10 BBBA 1

Location: Lat 34° 34' 10", long 99° 36' 44", hydrologic unit 11130101

Aquifer: 313VVCB

Altitude of land-surface datum: 1,432 ft

Well depth: 49 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	8.71	9.30	11.27	12.74	12.76	13.27	14.27	8.86	8.46	10.00	11.94
2	--	8.75	9.41	11.23	12.74	12.78	13.36	14.29	8.84	8.48	10.11	11.97
3	--	8.67	9.52	11.36	12.77	12.82	13.38	14.35	8.89	8.54	10.18	12.01
4	--	8.18	9.81	11.43	12.81	12.86	13.40	14.45	8.85	8.57	10.27	12.05
5	--	8.03	9.63	11.44	12.83	12.85	13.43	14.52	8.77	8.64	10.35	12.11
6	--	8.05	9.64	11.51	12.79	12.83	13.45	14.58	8.72	8.72	10.37	12.16
7	--	8.09	9.67	11.64	12.75	12.82	13.48	14.62	8.67	8.79	10.43	12.21
8	--	8.22	9.74	11.67	12.73	12.80	13.49	14.68	8.66	8.89	10.48	12.29
9	--	8.36	9.84	11.69	12.75	12.82	13.49	14.68	8.63	8.95	10.56	12.34
10	--	8.36	9.94	11.77	12.71	12.89	13.50	14.69	8.49	9.00	10.63	12.37
11	--	8.42	9.94	11.86	12.72	12.94	13.50	14.73	8.37	9.05	10.66	12.43
12	--	8.48	10.05	11.88	12.76	12.95	13.50	14.78	8.35	9.12	10.70	12.49
13	--	8.60	10.11	11.90	12.75	12.93	13.57	14.82	8.26	9.20	10.77	12.54
14	--	8.45	10.13	11.92	12.71	12.86	13.62	14.87	8.23	9.24	10.83	12.58
15	--	8.42	10.19	12.03	12.72	12.88	13.67	14.92	8.23	9.25	10.90	12.61
16	--	8.43	10.27	12.11	12.75	12.87	13.69	14.95	8.24	9.30	10.96	12.65
17	11.32	8.46	10.32	12.15	12.82	12.84	13.71	14.96	8.29	9.08	11.04	12.74
18	11.31	8.62	10.41	12.19	12.86	12.89	13.72	14.99	8.37	9.09	11.11	12.82
19	11.31	8.59	10.43	12.28	12.88	12.93	13.75	15.04	8.36	9.21	11.17	12.86
20	11.27	8.61	10.51	12.39	12.91	12.94	13.86	15.07	8.38	9.32	11.23	12.90
21	10.65	8.76	10.61	12.40	12.91	12.97	13.96	15.14	8.42	9.40	11.30	12.97
22	8.51	8.74	10.66	12.48	12.91	12.96	13.95	15.22	8.46	9.46	11.37	13.00
23	8.27	8.90	10.68	12.47	12.90	12.96	13.95	15.08	8.51	9.51	11.44	13.02
24	8.40	8.98	10.69	12.51	12.91	13.01	13.99	14.92	8.42	9.59	11.49	13.02
25	8.44	8.93	10.80	12.61	12.89	13.10	14.03	14.11	8.28	9.68	11.51	13.04
26	8.48	9.07	10.89	12.69	12.81	13.14	14.08	13.27	8.35	9.73	11.57	13.05
27	8.55	9.13	10.96	12.72	12.74	13.11	14.12	13.21	8.38	9.79	11.65	13.15
28	8.62	9.16	11.02	12.70	12.69	13.17	14.18	11.48	8.41	9.85	11.73	13.26
29	8.69	9.18	11.08	12.72	--	13.25	14.20	9.32	8.45	9.91	11.77	13.32
30	8.65	9.18	11.12	12.81	--	13.29	14.22	8.90	8.41	9.98	11.81	13.40
31	8.63	--	11.15	12.77	--	13.29	--	8.88	--	10.03	11.89	--
Mean	--	8.62	10.27	12.08	12.79	12.95	13.72	13.99	8.48	9.22	10.98	12.64
Max.	--	9.18	11.15	12.81	12.91	13.29	14.22	15.22	8.89	10.03	11.89	13.40
Min.	--	8.03	9.30	11.23	12.61	12.76	13.27	8.88	8.23	8.45	10.00	11.94

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

## 01N-23W-10 BBBA 1--Continued

Water Year, October 1987 to September 1988

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	13.42	12.92	13.98	15.20	15.38	16.00	15.11	15.27	15.93	16.60	17.09	18.10
2	13.47	13.00	13.98	15.22	15.46	15.80	15.13	15.25	15.93	16.61	17.20	18.11
3	13.56	13.06	14.05	15.20	15.48	14.47	15.18	15.30	15.93	16.62	17.32	18.12
4	13.57	13.13	14.11	15.28	15.63	14.33	15.16	15.36	15.94	16.64	17.34	18.12
5	13.58	13.23	14.10	15.30	15.58	14.53	15.22	15.38	15.94	16.65	17.35	18.12
6	13.66	13.24	14.15	15.29	15.60	14.62	15.33	15.36	15.94	16.71	17.37	18.12
7	13.70	13.21	14.22	15.32	15.54	14.63	15.33	15.34	16.04	16.77	17.37	18.12
8	13.71	13.25	14.27	15.33	15.54	14.72	15.33	15.34	16.11	16.78	17.38	18.12
9	13.76	13.30	14.34	15.37	15.58	14.74	15.41	15.42	16.14	16.71	17.46	18.13
10	13.87	13.38	14.36	15.41	15.57	14.71	15.50	15.46	16.19	16.69	17.51	18.13
11	13.94	13.40	14.39	15.38	15.65	14.72	15.51	15.50	16.22	16.71	17.52	18.13
12	13.95	13.39	14.47	15.43	15.63	14.80	15.52	15.52	16.24	16.72	17.54	18.13
13	13.95	13.37	14.51	15.54	15.59	14.87	15.53	15.53	16.26	16.73	17.57	18.13
14	13.98	13.36	14.55	15.51	15.60	14.89	15.55	15.53	16.29	16.75	17.58	18.14
15	14.02	13.35	14.64	15.48	15.66	14.88	15.60	15.53	16.34	16.82	17.61	18.14
16	14.10	13.39	14.71	15.43	15.65	14.90	15.63	15.57	16.35	16.89	17.64	18.15
17	14.17	13.46	14.72	15.40	15.67	14.92	15.49	15.59	16.37	16.89	17.65	18.15
18	14.17	13.58	14.72	15.30	15.68	14.98	15.10	15.60	16.37	16.89	17.69	18.26
19	14.21	13.62	14.70	15.27	15.68	14.98	15.12	15.61	16.38	16.98	17.72	18.34
20	14.33	13.65	14.78	15.30	15.69	14.95	15.10	15.64	16.40	17.05	17.75	18.32
21	14.36	13.61	14.82	15.31	15.70	14.94	15.07	15.67	16.46	17.07	17.77	18.32
22	14.36	13.59	14.84	15.33	15.70	14.94	15.08	15.69	16.51	17.07	17.79	18.32
23	14.41	13.65	14.80	15.27	15.70	14.95	15.14	15.70	16.52	17.07	17.84	18.32
24	14.44	13.69	14.87	15.32	15.70	14.96	15.15	15.72	16.54	17.07	17.88	18.30
25	14.47	13.78	14.94	15.36	15.70	15.01	15.18	15.72	16.56	17.08	17.90	18.30
26	14.48	13.79	14.98	15.36	15.70	15.05	15.18	15.72	16.57	17.08	17.91	18.30
27	14.58	13.84	14.99	15.40	15.89	15.04	15.25	15.73	16.59	17.08	17.92	18.30
28	14.60	13.86	15.06	15.38	15.94	15.00	15.26	15.73	16.59	17.08	17.97	18.29
29	14.59	13.89	15.12	15.34	15.99	15.10	15.24	15.73	16.59	17.09	18.01	18.29
30	14.58	13.92	15.06	15.31	--	15.12	15.27	15.73	16.59	17.09	18.03	18.29
31	13.35	--	15.12	15.33	--	15.11	--	15.79	--	17.09	18.07	--
Mean	14.04	13.46	14.59	15.34	15.65	14.92	15.29	15.55	16.29	16.87	17.64	18.20
Max	14.60	13.92	15.12	15.54	15.99	16.00	15.63	15.79	16.59	17.09	18.07	18.34
Min.	13.35	12.92	13.96	15.20	15.38	14.33	15.07	15.25	15.93	16.60	17.09	18.10



Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

## Ø1N-23W-1Ø BBBA 1--Continued

Day	Water Year, October 1988 to September 1989											
	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	18.29	18.51	19.39	19.95	--	--	--	--	--	--	--	--
2	18.29	18.51	19.45	19.96	--	--	--	--	--	--	--	--
3	18.29	18.51	19.45	20.00	--	--	--	--	--	--	--	--
4	18.29	18.57	19.47	20.03	--	--	--	--	--	--	--	--
5	18.29	18.64	19.48	20.02	--	--	--	--	--	--	--	--
6	18.29	18.68	19.48	20.02	--	--	--	--	--	--	--	--
7	18.29	18.71	19.49	20.03	--	--	--	--	--	--	--	--
8	18.30	18.80	19.59	20.10	--	--	--	--	--	--	--	--
9	18.30	18.81	19.64	20.14	--	--	--	--	--	--	--	--
10	18.30	18.88	19.64	20.14	--	--	--	--	--	--	--	--
11	18.30	18.92	19.65	20.14	--	--	--	--	--	--	--	--
12	18.31	18.94	19.67	20.15	--	--	--	--	--	--	--	--
13	18.31	18.98	19.68	20.16	--	--	--	--	--	--	--	--
14	18.31	18.99	19.68	20.16	--	--	--	--	--	--	--	--
15	18.31	18.99	19.73	20.16	--	--	--	--	--	--	--	--
16	18.31	19.06	19.79	20.17	--	--	--	--	--	--	--	--
17	18.32	19.10	19.79	20.17	--	--	--	--	--	--	--	--
18	18.34	19.10	19.79	20.23	--	--	--	--	--	--	--	--
19	18.41	19.11	19.77	--	--	--	--	--	--	--	--	--
20	18.44	19.13	19.78	--	--	--	--	--	--	--	--	--
21	18.46	19.15	19.80	--	--	--	--	--	--	--	--	--
22	18.46	19.15	19.80	--	--	--	--	--	--	--	--	--
23	18.46	19.15	19.80	--	--	--	--	--	--	--	--	--
24	18.46	19.15	19.81	--	--	--	--	--	--	--	--	--
25	18.47	19.15	19.82	--	--	--	--	--	--	--	--	--
26	18.48	19.15	19.82	--	--	--	--	--	--	--	--	--
27	18.48	19.23	19.86	--	--	--	--	--	--	--	--	--
28	18.49	19.29	19.93	--	--	--	--	--	--	--	--	--
29	18.50	19.29	19.94	--	--	--	--	--	--	--	--	--
30	18.50	19.32	19.94	--	--	--	--	--	--	--	--	--
31	18.50	--	19.94	--	--	--	--	--	--	--	--	--
Mean	18.37	18.97	19.71	--	--	--	--	--	--	--	--	--
Max.	18.50	19.32	19.94	--	--	--	--	--	--	--	--	--
Min.	18.29	18.51	19.39	--	--	--	--	--	--	--	--	--

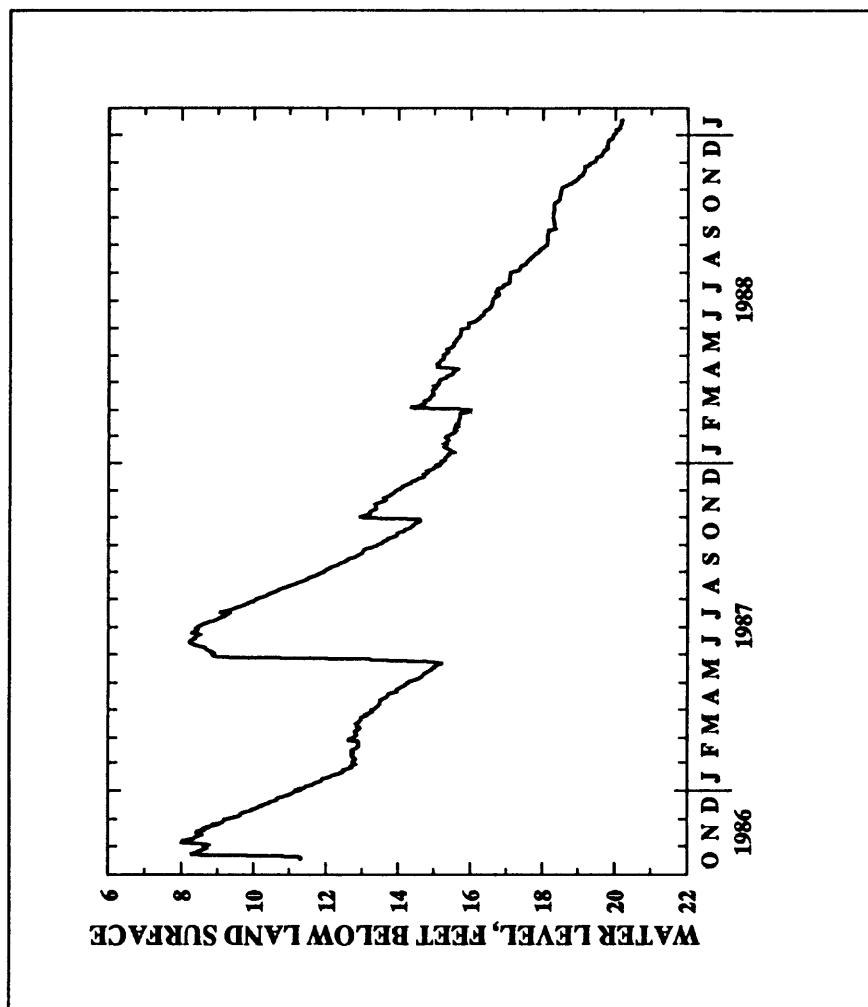


Figure 16. Hydrograph of well 01N-23W-10 BBBA 1.

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

Index number on location map: 11  
 Station number: 344204099385301. Local number: 03N-23W-28 DADA 1  
 Location: Lat 34°42'04", long 99°36'53", hydrologic unit 11120202  
 Aquifer: 313VVCR  
 Altitude of land-surface datum: 1,434 ft  
 Well depth: 73.5 ft

Water Year, October 1985 to September 1986												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	13.70	16.99	14.98
2	--	--	--	--	--	--	--	--	--	13.60	17.19	14.88
3	--	--	--	--	--	--	--	--	--	13.59	17.45	14.02
4	--	--	--	--	--	--	--	--	--	13.54	17.59	12.99
5	--	--	--	--	--	--	--	--	--	13.58	17.58	12.02
6	--	--	--	--	--	--	--	--	--	13.68	17.54	11.94
7	--	--	--	--	--	--	--	--	--	13.72	17.25	12.05
8	--	--	--	--	--	--	--	--	--	13.70	17.13	12.01
9	--	--	--	--	--	--	--	--	14.11	13.68	17.01	11.98
10	--	--	--	--	--	--	--	--	14.13	13.76	16.84	11.93
11	--	--	--	--	--	--	--	--	14.12	13.88	16.66	12.04
12	--	--	--	--	--	--	--	--	14.13	14.01	16.47	12.08
13	--	--	--	--	--	--	--	--	14.17	14.22	16.32	12.09
14	--	--	--	--	--	--	--	--	14.17	14.32	16.33	11.85
15	--	--	--	--	--	--	--	--	14.24	14.28	16.34	11.30
16	--	--	--	--	--	--	--	--	14.25	14.36	16.20	11.32
17	--	--	--	--	--	--	--	--	14.28	14.49	16.12	11.31
18	--	--	--	--	--	--	--	--	14.23	14.82	16.05	11.37
19	--	--	--	--	--	--	--	--	14.20	14.90	16.03	11.43
20	--	--	--	--	--	--	--	--	14.22	15.42	16.06	11.47
21	--	--	--	--	--	--	--	--	14.22	15.58	16.15	11.47
22	--	--	--	--	--	--	--	--	14.23	15.40	16.19	11.47
23	--	--	--	--	--	--	--	--	13.81	15.60	16.26	11.45
24	--	--	--	--	--	--	--	--	13.73	15.83	16.37	11.43
25	--	--	--	--	--	--	--	--	13.64	15.90	16.45	11.55
26	--	--	--	--	--	--	--	--	13.68	15.92	16.43	11.58
27	--	--	--	--	--	--	--	--	13.72	16.05	16.34	11.63
28	--	--	--	--	--	--	--	--	13.71	16.22	16.04	11.63
29	--	--	--	--	--	--	--	--	13.72	16.53	15.89	10.82
30	--	--	--	--	--	--	--	--	13.72	16.80	15.78	10.59
31	--	--	--	--	--	--	--	--	--	16.91	15.37	--
Mean	--	--	--	--	--	--	--	--	--	14.77	16.53	11.95
Max.	--	--	--	--	--	--	--	--	--	16.91	17.59	14.98
Min.	--	--	--	--	--	--	--	--	--	13.54	15.37	10.59

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

03N-23W-28 DADA 1--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	10.60	7.85	8.91	9.68	9.47	7.89	8.99	9.88	6.58	7.49	9.79	11.77
2	10.13	7.93	9.00	9.51	9.40	7.82	9.21	9.94	6.81	7.51	10.20	11.69
3	9.01	7.84	9.08	9.70	9.38	7.90	9.16	10.50	7.35	7.68	10.57	11.86
4	9.09	7.73	9.14	9.71	9.39	7.98	9.20	10.89	7.51	7.58	10.71	11.76
5	9.22	7.77	9.09	9.63	9.51	7.92	9.25	11.03	7.58	7.70	10.75	11.69
6	9.26	7.70	9.02	9.68	9.45	7.96	9.21	11.17	7.66	7.79	10.51	11.68
7	9.26	7.73	9.01	9.82	9.34	8.02	9.24	11.17	7.75	7.88	10.45	11.67
8	9.29	7.91	9.05	9.75	9.36	8.03	9.24	11.19	7.84	7.98	10.50	11.70
9	9.42	8.09	9.14	9.67	9.36	8.21	9.18	11.24	7.87	8.03	10.89	11.64
10	9.37	8.05	9.19	9.78	9.26	8.31	9.25	11.29	8.70	8.08	10.88	11.59
11	9.24	8.16	9.11	9.83	9.32	8.35	9.18	11.27	5.00	8.13	10.80	11.57
12	9.15	8.28	9.23	9.77	9.40	8.41	9.22	11.22	5.21	8.21	10.80	11.47
13	9.03	8.40	9.24	9.72	9.30	8.36	9.37	11.17	5.63	8.35	10.89	11.40
14	9.06	8.17	9.21	9.69	9.21	8.26	9.43	11.20	5.86	8.37	10.94	11.41
15	9.16	8.15	9.25	9.83	9.31	8.41	9.43	11.24	6.04	8.47	10.99	11.33
16	9.16	8.21	9.28	9.90	9.32	8.38	9.42	11.30	6.22	8.60	11.05	11.32
17	9.14	8.26	9.30	9.86	9.31	8.37	9.41	11.64	6.42	8.53	11.26	11.35
18	9.20	8.47	9.36	9.84	9.29	8.53	9.43	11.69	6.63	8.57	11.33	11.38
19	9.28	8.36	9.30	9.94	9.28	8.61	9.49	11.97	6.70	8.63	11.37	11.37
20	9.28	8.80	9.37	10.11	9.29	8.62	9.64	11.79	6.83	8.71	11.38	11.35
21	8.80	8.55	9.46	9.89	9.19	8.70	9.74	11.76	6.91	8.81	11.38	11.12
22	7.39	8.50	9.44	10.02	9.20	8.62	9.64	11.77	6.94	8.86	11.47	11.16
23	7.15	8.72	9.35	9.83	9.17	8.60	9.64	11.31	7.04	8.86	11.54	11.12
24	7.13	8.74	9.36	9.85	9.19	8.77	9.73	11.03	7.14	8.92	11.51	11.06
25	7.18	8.61	9.47	10.01	9.21	8.89	9.76	10.69	7.22	8.97	11.66	11.07
26	7.34	8.80	9.54	10.10	9.12	8.88	9.79	10.55	7.32	8.98	11.80	11.06
27	7.40	8.83	9.55	9.91	8.68	8.76	9.82	10.35	7.34	9.00	11.92	11.05
28	7.45	8.83	9.57	9.74	8.00	8.97	9.85	8.96	7.39	9.02	11.93	11.11
29	7.63	8.79	9.60	9.76	--	9.09	9.81	6.30	7.46	9.12	11.81	11.16
30	7.62	8.75	9.57	9.75	--	9.07	9.84	5.99	7.45	9.25	11.77	11.14
31	7.66	--	9.56	9.58	--	9.03	--	6.29	--	9.51	11.75	--
Mean	8.68	8.29	9.28	9.80	9.24	8.44	9.45	10.57	6.88	8.44	11.12	11.40
Max.	10.60	8.83	9.60	10.11	9.51	9.09	9.85	11.97	7.87	9.51	11.93	11.85
Min.	7.13	7.70	8.91	9.51	8.00	7.82	8.99	5.99	5.00	7.49	9.79	11.05

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

03N-23W-28 DADA 1--Continued

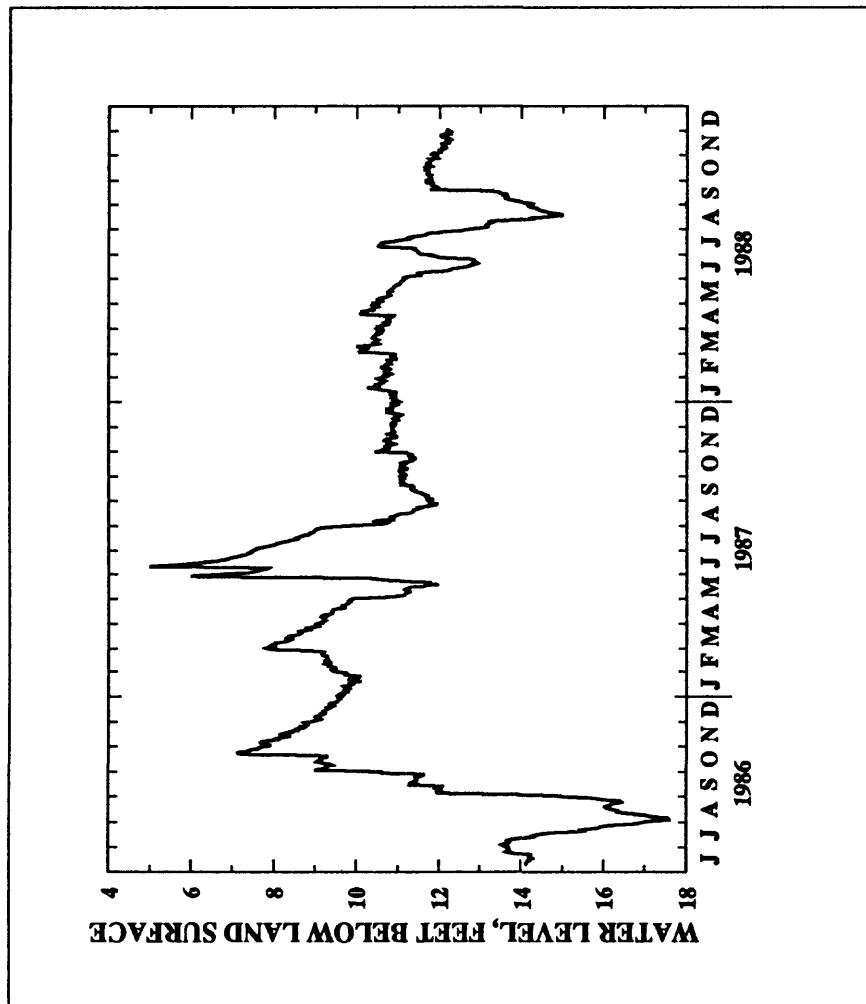
Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	11.08	10.56	10.88	11.02	10.66	10.84	10.48	10.39	11.18	11.57	12.72	14.24
2	11.14	10.61	10.85	10.97	10.72	10.56	10.52	10.39	11.15	11.53	12.87	14.26
3	11.21	10.65	10.93	10.85	10.68	10.05	10.58	10.55	11.21	11.48	13.09	14.12
4	11.08	10.70	10.94	10.96	10.80	10.13	10.55	10.62	11.30	11.47	13.16	14.00
5	11.06	10.81	10.82	10.93	10.84	10.19	10.68	10.60	11.57	11.46	13.14	13.88
6	11.12	10.74	10.88	10.87	10.81	10.17	10.79	10.50	11.52	11.43	13.13	13.80
7	11.11	10.66	10.90	10.91	10.67	10.10	10.67	10.52	11.44	11.41	13.15	13.69
8	11.01	10.77	10.91	10.88	10.67	10.31	10.65	10.58	11.53	11.41	13.20	13.63
9	11.09	10.86	10.98	10.94	10.73	10.25	10.81	10.73	11.73	11.10	13.25	13.65
10	11.21	10.92	10.92	10.93	10.68	10.00	10.81	10.76	12.10	10.56	13.18	13.63
11	11.22	10.85	10.89	10.79	10.84	10.21	10.74	10.80	12.24	10.53	13.32	13.60
12	11.11	10.78	10.98	10.85	10.70	10.42	10.75	10.76	12.28	10.55	13.72	13.64
13	11.05	10.71	10.97	10.97	10.59	10.51	10.73	10.75	12.31	10.57	14.05	13.64
14	11.06	10.67	10.94	10.84	10.66	10.46	10.76	10.74	12.46	10.58	14.25	13.55
15	11.07	10.68	11.05	10.74	10.75	10.41	10.87	10.75	12.63	10.59	14.22	13.47
16	11.12	10.79	11.08	10.58	10.66	10.44	10.89	10.84	12.71	10.78	14.54	13.43
17	11.18	10.84	11.02	10.50	10.79	10.47	10.43	10.82	12.78	10.92	14.75	13.40
18	11.10	10.97	10.90	10.32	10.75	10.51	10.08	10.83	12.86	11.03	14.92	12.94
19	11.16	10.97	10.70	10.27	10.77	10.45	10.13	10.85	12.91	11.17	15.00	11.78
20	11.34	10.92	10.83	10.45	10.83	10.39	10.13	10.87	12.85	11.29	14.90	11.94
21	11.36	10.79	10.79	10.49	10.82	10.41	10.13	10.90	12.89	11.33	14.76	11.97
22	11.35	10.76	10.82	10.57	10.71	10.41	10.21	10.91	12.85	11.30	14.65	11.96
23	11.43	10.84	10.71	10.43	10.95	10.44	10.38	10.93	12.83	11.42	14.60	11.92
24	11.36	10.84	10.87	10.58	10.95	10.44	10.34	10.98	12.84	11.58	14.51	11.84
25	11.27	10.91	10.87	10.64	10.91	10.56	10.39	11.03	12.77	11.68	14.43	11.84
26	11.26	10.90	10.87	10.63	10.85	10.62	10.44	11.05	12.27	11.69	14.40	11.80
27	11.37	10.88	10.85	10.68	10.89	10.51	10.52	11.06	11.99	11.72	14.38	11.76
28	11.29	10.85	10.97	10.61	10.86	10.46	10.48	11.08	11.95	11.99	14.36	11.72
29	11.22	10.85	11.02	10.56	10.95	10.66	10.41	11.09	11.87	12.11	14.22	11.81
30	11.21	10.86	10.81	10.51	--	10.61	10.47	11.13	11.83	12.48	14.18	11.78
31	10.45	--	10.91	10.57	--	10.54	--	11.16	--	12.60	14.20	--
Mean	11.16	10.80	10.90	10.70	10.78	10.40	10.53	10.81	12.16	11.33	13.98	12.96
Max.	11.43	10.97	11.08	11.02	10.95	10.84	10.89	11.16	12.91	12.60	15.00	14.26
Min.	10.45	10.56	10.70	10.27	10.59	10.00	10.08	10.39	11.15	10.53	12.72	11.72

Table 3.--Daily mean water-level measurements in recorder wells in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

Ø3N-23W-28 DADA 1--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	11.72	11.90	12.22	--	--	--	--	--	--	--	--	--
2	11.80	11.81	12.19	--	--	--	--	--	--	--	--	--
3	11.79	11.83	12.20	--	--	--	--	--	--	--	--	--
4	11.79	11.94	--	--	--	--	--	--	--	--	--	--
5	11.79	12.06	--	--	--	--	--	--	--	--	--	--
6	11.75	12.01	--	--	--	--	--	--	--	--	--	--
7	11.78	11.99	--	--	--	--	--	--	--	--	--	--
8	11.70	12.07	--	--	--	--	--	--	--	--	--	--
9	11.69	12.01	--	--	--	--	--	--	--	--	--	--
10	11.70	12.17	--	--	--	--	--	--	--	--	--	--
11	11.71	12.07	--	--	--	--	--	--	--	--	--	--
12	11.73	12.09	--	--	--	--	--	--	--	--	--	--
13	11.70	12.10	--	--	--	--	--	--	--	--	--	--
14	11.65	12.05	--	--	--	--	--	--	--	--	--	--
15	11.65	12.04	--	--	--	--	--	--	--	--	--	--
16												
18	11.70	12.26	--	--	--	--	--	--	--	--	--	--
17	11.67	12.19	--	--	--	--	--	--	--	--	--	--
18	11.80	12.12	--	--	--	--	--	--	--	--	--	--
19	11.76	12.20	--	--	--	--	--	--	--	--	--	--
20	11.72	12.27	--	--	--	--	--	--	--	--	--	--
21	11.79	12.24	--	--	--	--	--	--	--	--	--	--
22	11.67	12.16	--	--	--	--	--	--	--	--	--	--
23	11.75	12.10	--	--	--	--	--	--	--	--	--	--
24	11.76	12.04	--	--	--	--	--	--	--	--	--	--
25	11.77	12.04	--	--	--	--	--	--	--	--	--	--
26												
28	11.81	12.04	--	--	--	--	--	--	--	--	--	--
27	11.77	12.23	--	--	--	--	--	--	--	--	--	--
28	11.95	12.19	--	--	--	--	--	--	--	--	--	--
29	11.91	12.17	--	--	--	--	--	--	--	--	--	--
30	11.92	12.25	--	--	--	--	--	--	--	--	--	--
31	11.94	--	--	--	--	--	--	--	--	--	--	--
32												
Mean	11.76	12.09	--	--	--	--	--	--	--	--	--	--
Max.	11.95	12.27	--	--	--	--	--	--	--	--	--	--
Min.	11.65	11.81	--	--	--	--	--	--	--	--	--	--



**Figure 17.** Hydrograph of well 03N-23W-28 DADA 1.

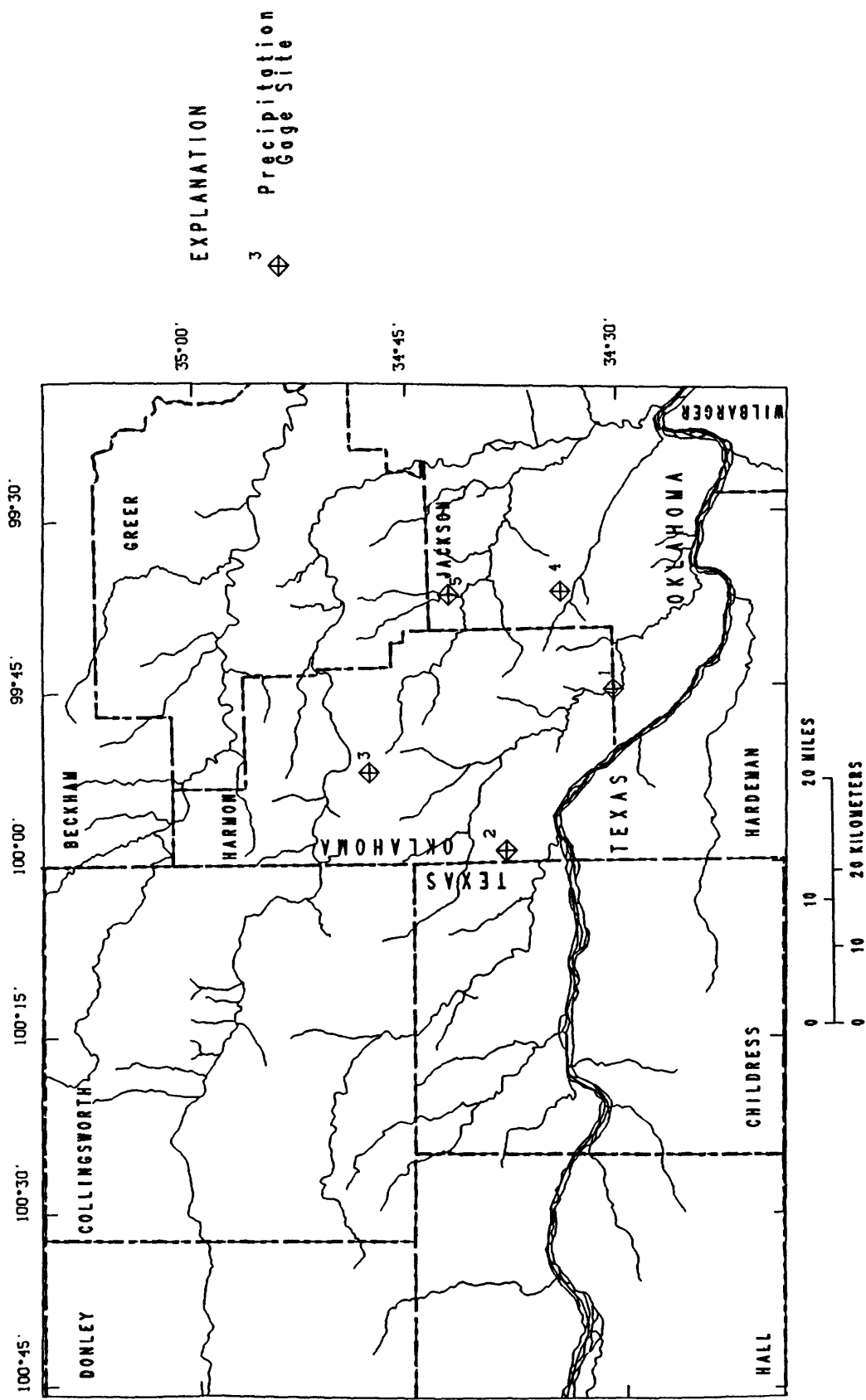


Figure 18. Location of precipitation gage sites in southwestern Oklahoma (index numbers on map refer to sites in table 4).



Table 4.--Daily precipitation measurements in southwestern Oklahoma

[Index number on location map refers to the number adjacent to the precipitation gage symbol in figure 20;  
ft, foot; -- no data]

## HARMON COUNTY, OKLAHOMA

Index number on location map: 1  
Station number: 343041099451002 Local number: 01N-24W-32 CBCC 2  
Location: Lat 34°30'31", long 99°45'10", hydrologic unit 11130101  
Altitude of land-surface datum: 1483 ft

## Water Year, October 1985 to September 1986

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	.00	--	--
2	--	--	--	--	--	--	--	--	--	.10	--	--
3	--	--	--	--	--	--	--	--	--	.00	--	--
4	--	--	--	--	--	--	--	--	--	.00	--	--
5	--	--	--	--	--	--	--	--	--	.00	--	--
6	--	--	--	--	--	--	--	--	--	.00	--	--
7	--	--	--	--	--	--	--	--	--	.00	--	--
8	--	--	--	--	--	--	--	--	--	.00	--	--
9	--	--	--	--	--	--	--	--	--	.00	--	--
10	--	--	--	--	--	--	--	--	--	.00	--	--
11	--	--	--	--	--	--	--	--	--	.80	--	--
12	--	--	--	--	--	--	--	--	--	.00	--	--
13	--	--	--	--	--	--	--	--	--	.00	--	--
14	--	--	--	--	--	--	--	--	--	.00	--	--
15	--	--	--	--	--	--	--	--	--	.00	--	--
16	--	--	--	--	--	--	--	--	--	.00	--	--
17	--	--	--	--	--	--	--	--	--	.00	--	--
18	--	--	--	--	--	--	--	--	--	.00	--	.00
19	--	--	--	--	--	--	--	--	--	.00	--	.00
20	--	--	--	--	--	--	--	--	--	1.10	--	.00
21	--	--	--	--	--	--	--	--	--	.70	--	.00
22	--	--	--	--	--	--	--	--	--	.00	--	.00
23	--	--	--	--	--	--	--	--	--	.00	--	.00
24	--	--	--	--	--	--	--	--	--	.00	--	.00
25	--	--	--	--	--	--	--	--	--	.00	--	.00
26	--	--	--	--	--	--	--	--	--	.00	--	.00
27	--	--	--	--	--	--	--	--	--	.00	--	.00
28	--	--	--	--	--	--	--	--	--	.00	--	.50
29	--	--	--	--	--	--	--	--	--	.00	--	3.90
30	--	--	--	--	--	--	--	--	--	.00	--	.10
31	--	--	--	--	--	--	--	--	--	--	--	--
Total	--	--	--	--	--	--	--	--	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

01N-24W-32 CBCC 2--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	1.20	.00	.00	.00	.00	.00	.00	.00	--	.00	--
2	3.40	.00	.00	.00	.00	.00	.00	.00	.00	--	.00	--
3	.30	.00	.00	.00	.00	.00	.00	.00	.00	--	.00	--
4	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00	--
5	.10	.00	.00	.00	.70	.00	.00	.00	.10	--	2.20	--
6	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00	--
7	.00	.00	.10	.00	.00	.00	.00	.10	.00	--	.00	--
8	.00	.00	.40	.50	.00	.00	.00	.00	.00	--	.00	--
9	.10	.00	.00	.10	.00	.00	.00	.00	.20	--	.00	--
10	.00	.00	.00	.00	.00	.00	.00	.00	5.80	--	.00	--
11	1.20	.00	.00	.00	.10	.00	.00	.00	.00	--	.00	--
12	.00	.00	.00	.00	.10	.00	.00	.00	.00	--	.00	--
13	.00	--	.00	--	.10	.00	.00	.00	.00	--	.00	--
14	.00	--	.00	--	.00	.00	.00	.00	.00	--	1.50	--
15	.00	--	.00	--	.90	.00	.00	.00	.00	--	.00	--
16	.00	--	.00	--	.00	.10	.00	.00	.00	--	.00	--
17	.10	--	.00	--	.00	.10	.00	.00	.00	--	.00	.00
18	.00	--	.10	--	.00	.00	.00	.00	.00	--	.00	.20
19	.00	.00	.00	--	.10	.00	.00	.50	.00	--	.00	.00
20	1.90	.00	.00	--	.10	.00	.00	.10	.20	--	.00	.60
21	.90	.00	.00	--	.00	.00	.00	.00	.00	--	.00	.00
22	.00	.00	.00	--	.10	.30	.00	.50	--	--	.00	.00
23	.00	.00	.00	--	.10	.40	.00	1.80	--	--	.00	.00
24	.00	.00	.00	--	.10	.00	.00	.10	--	--	.00	.00
25	.00	.40	.00	--	.00	.00	.00	.00	--	--	--	.00
26	.00	.00	.00	--	.20	.00	.00	.00	--	--	--	.00
27	.00	.00	.00	--	.60	.00	.00	1.40	--	--	--	.00
28	.00	.00	.00	--	.00	.00	.00	2.70	--	--	--	.80
29	.00	.00	.00	.00	--	.00	.00	.00	--	--	--	.00
30	.00	.00	.00	.00	--	.00	.00	.00	--	.00	--	.00
31	.00	--	.00	.50	--	.00	--	.00	--	.00	--	--
Total	8.00	--	0.60	--	3.20	0.90	0.00	7.00	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

01N-24W-32 CBCC 2--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	.00	--	.00	.00	.20	.00	.00	.10	--	--
2	.00	.00	--	--	.00	2.00	.00	.00	.00	.10	--	--
3	.00	.00	--	--	.00	.00	.00	.00	.00	.10	--	--
4	.00	.00	--	--	.00	.00	.00	.00	.00	.00	--	--
5	.00	.00	--	--	.00	--	.00	.00	.00	.00	--	--
6	.00	.00	--	--	.00	--	.00	.00	.00	.00	--	--
7	.00	.00	--	--	.00	--	.00	.00	.00	.00	--	--
8	.00	.00	--	--	.00	.00	.00	.00	.00	.00	--	--
9	.00	.00	--	--	.00	.00	.20	.00	.00	.10	--	--
10	.00	.00	.00	--	.00	.00	.00	.00	.00	.40	--	--
11	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	--	--
12	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	--	--
13	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	--	--
14	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	--	--
15	.00	.00	.20	--	.00	.00	.00	.00	.00	.00	--	--
16	.00	.00	.00	--	.00	.00	.30	.00	.00	.00	--	--
17	.00	.00	.00	--	.00	.10	2.10	.00	.00	.00	--	--
18	.00	.00	1.50	--	.00	.00	.00	.00	.00	.10	--	--
19	.00	.00	.40	--	.00	.00	.00	.10	.00	.10	--	--
20	.00	.00	.00	--	.00	.00	.00	.00	.00	--	--	--
21	.00	.00	.00	--	.00	.00	.00	.00	.00	--	--	--
22	--	.00	.00	--	.00	.00	.00	.00	.00	--	--	--
23	--	.00	.00	--	.00	.00	.00	.00	.00	--	--	--
24	--	.00	.00	--	.00	.00	.00	.00	.00	--	--	--
25	--	.00	.30	--	.00	.00	.00	.00	.00	--	--	--
26	--	.60	.00	--	.00	.00	.00	.00	1.50	--	--	--
27	--	.00	.10	.00	.00	.00	.00	.00	1.64	--	--	--
28	.00	.00	.20	.00	.00	.00	.00	.00	.20	--	--	--
29	.00	.00	.00	.00	.00	.00	.00	.00	.40	--	--	--
30	.70	.00	--	.00	--	.00	.00	.00	.00	--	--	--
31	.10	--	--	.00	--	.10	--	.10	--	--	--	--
Total	--	0.60	--	--	0.00	--	2.80	0.20	3.80	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 2  
 Station number: 343855099581802 Local number: 02N-27W-24 AAAD 2  
 Location: Lat 34 38'12", long 99 58'58", hydrologic unit 11130101  
 Altitude of land-surface datum: 1715 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	.00	.00	.00	.00	.00	.00	.00	.00
2	--	--	--	--	.00	.00	.00	.10	.00	.00	.00	.00
3	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
4	--	1.10	--	--	.00	.00	.00	.00	.00	.00	.00	.00
5	--	.00	--	--	.20	.00	.40	.00	.00	.00	.40	.00
6	--	.00	--	--	.00	.00	.00	.10	.00	.00	.00	.30
7	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
8	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
9	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
10	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
11	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
12	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.80
13	--	.00	--	--	.00	.00	.00	.00	.00	.00	.40	.00
14	--	.00	--	--	.00	.00	.00	.00	.00	.30	.90	.60
15	--	.00	--	--	1.70	.00	.00	.00	.00	.00	.00	.00
16	--	.00	--	--	.00	.40	.00	.00	.00	.00	.00	.00
17	--	.00	--	--	.00	.10	.00	.00	.00	.40	.00	.00
18	--	.00	--	--	.00	.00	.00	.00	.00	.00	.00	.00
19	--	.10	--	--	.20	.00	.00	.60	.00	.00	.00	.00
20	--	.00	--	--	.10	.00	.00	.10	.00	.00	.00	.50
21	--	.00	--	--	.00	.00	.10	.00	.00	.00	.00	.00
22	--	.10	--	--	.10	.30	.10	1.20	.00	.00	.00	.00
23	--	.00	--	--	.00	.40	.00	2.10	.00	.00	.00	.00
24	--	.00	--	--	.20	.00	.00	.10	.00	.00	.00	.00
25	--	.10	--	--	.00	.00	.00	1.00	.20	.00	.00	.00
26	--	.00	--	--	.30	.00	.00	.10	.00	.00	.00	.00
27	--	--	--	--	1.00	.00	.00	.50	.00	.00	.00	.00
28	--	--	--	--	.00	.00	.00	1.90	.00	.00	.00	.00
29	--	--	--	.00	--	.00	.00	.00	.90	.00	.00	.00
30	--	--	--	.00	--	.00	.00	.00	.00	.00	.00	.00
31	--	--	--	.10	--	.00	--	2.80	--	.00	.00	--
Total	--	--	--	--	3.80	1.20	0.60	10.60	1.10	0.70	1.70	2.20

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-27W-24 AAAD 2--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	.00	.00	.00	.00	.10	.00	.00	.30	.00	.80
2	.00	.00	.00	.00	.00	1.40	.00	.00	.00	.80	.10	1.00
3	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	.00	.20	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
8	.00	.00	.00	.30	.00	.00	.20	.00	.00	.20	.00	.00
9	.00	.00	.00	.00	.00	.00	.40	.00	.00	.02	.10	.00
10	.00	.00	.00	.00	.00	.10	.00	.00	.00	.48	.00	.00
11	.00	.00	.00	.00	.00	.00	.00	.00	.00	.10	.00	.00
12	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
13	.00	.00	.00	.00	.00	.00	.10	.00	.00	.00	.00	.40
14	.00	.00	.00	.00	.00	.00	.00	.00	.30	.00	.00	.00
15	.00	.00	.20	.00	.00	.00	.00	.00	.00	.00	.00	.30
16	.00	.00	.00	.00	.00	.10	2.70	.00	.80	.00	.00	.00
17	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.20
18	.00	.00	.00	.20	.00	.00	.00	.00	.00	.10	.10	3.20
19	.00	.00	1.10	.00	.00	.00	.00	.00	.00	.10	.00	.10
20	.00	.00	.00	.00	.00	.00	.00	.80	.00	.00	.00	.00
21	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
22	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	2.80
23	.20	.00	.30	.00	.00	.00	.00	.00	.00	.00	.00	.50
24	.10	.00	.00	.00	.00	.00	.00	.00	.00	.30	.00	.00
25	.00	.00	.10	.00	.00	.00	.00	.00	.10	.30	.00	.00
26	.00	.00	.00	.00	.00	.00	.00	.20	1.00	.00	.00	.00
27	.00	.00	.00	.00	.00	.00	.00	.00	.20	.00	.00	2.10
28	.00	.00	.40	.00	.00	.00	.00	.10	.60	.00	.20	.00
29	.00	.00	.00	.00	.00	.00	.20	.00	.00	.00	.05	.00
30	.40	.00	.00	.00	--	.00	.00	.00	.00	.00	.15	.10
31	.00	--	.00	.00	--	.40	--	.70	--	.00	.00	--
Total	0.70	0.20	2.10	0.50	0.00	2.00	3.70	1.80	2.80	2.70	0.70	11.50

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

02N-27W-24 AAAD 2--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	--	--	.00	--	--	--	--	--	--	--	--
2	.00	--	.00	.00	--	--	--	--	--	--	--	--
3	.00	--	.00	.00	--	--	--	--	--	--	--	--
4	.00	--	.00	.00	--	--	--	--	--	--	--	--
5	2.10	--	.00	.00	--	--	--	--	--	--	--	--
6	.00	--	.00	.00	--	--	--	--	--	--	--	--
7	.00	--	.70	.00	--	--	--	--	--	--	--	--
8	2.10	--	.10	.00	--	--	--	--	--	--	--	--
9	.00	--	.00	.00	--	--	--	--	--	--	--	--
10	.00	--	.20	.00	--	--	--	--	--	--	--	--
11	.00	--	.00	.00	--	--	--	--	--	--	--	--
12	.00	--	.00	.00	--	--	--	--	--	--	--	--
13	.10	--	.30	.00	--	--	--	--	--	--	--	--
14	.00	--	.00	.00	--	--	--	--	--	--	--	--
15	.00	--	.00	.00	--	--	--	--	--	--	--	--
16	.00	--	.00	.00	--	--	--	--	--	--	--	--
17	.00	--	.00	.00	--	--	--	--	--	--	--	--
18	.00	--	.00	.00	--	--	--	--	--	--	--	--
19	--	--	.00	--	--	--	--	--	--	--	--	--
20	--	--	.20	--	--	--	--	--	--	--	--	--
21	--	--	.00	--	--	--	--	--	--	--	--	--
22	--	--	.00	--	--	--	--	--	--	--	--	--
23	--	--	.00	--	--	--	--	--	--	--	--	--
24	--	--	.00	--	--	--	--	--	--	--	--	--
25	--	--	.00	--	--	--	--	--	--	--	--	--
26	--	--	.00	--	--	--	--	--	--	--	--	--
27	--	--	.00	--	--	--	--	--	--	--	--	--
28	--	--	.00	--	--	--	--	--	--	--	--	--
29	--	--	.00	--	--	--	--	--	--	--	--	--
30	--	--	.00	--	--	--	--	--	--	--	--	--
31	--	--	.00	--	--	--	--	--	--	--	--	--
Total	--	--	--	--	--	--	--	--	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

Index number on location map: 3  
 Station number: 344752099520801 Local number: 04N-25W-19 DCCC 1  
 Location: Lat 34° 47' 52", long 99° 52' 08", hydrologic unit 11130101  
 Altitude of land-surface datum: 1826 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
2	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
3	--	.20	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	--	1.10	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	--	.00	.00	.00	.40	.00	.10	.00	.00	.00	1.40	.00
6	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.20
7	--	.00	.10	.00	.00	.00	.00	.00	.00	.00	.00	.00
8	--	.00	.50	.10	.00	.00	.00	.00	.00	.00	.00	.00
9	--	.00	.00	.00	.00	.00	.00	.00	.30	.00	.00	.00
10	--	.00	.00	.00	.00	.00	.00	.00	.20	.00	.00	.00
11	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
12	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.70
13	--	.00	.00	.00	.00	.00	.00	.00	.00	.10	.40	.00
14	--	.00	.00	.00	.00	.10	.00	.00	.00	.20	.00	.60
15	--	.00	.00	.00	1.50	.00	.00	.00	.00	.00	.00	--
16	--	.00	.00	.00	.00	1.10	.00	.00	.00	.00	.00	--
17	--	.00	.00	.10	.00	.10	.00	.00	.30	.30	.00	--
18	--	.00	.10	.00	.00	.00	.00	.00	.00	.00	.00	--
19	--	.10	.00	.20	.00	.00	.00	.60	.00	.00	.00	.00
20	--	.00	.00	.00	.10	.00	.00	.20	.00	.00	.00	.00
21	--	.00	.00	.00	.00	.00	.00	.00	.80	.00	.00	.00
22	--	.00	.00	.00	.00	.20	.00	.30	.20	.00	.00	.00
23	--	.00	.00	.00	.10	.50	.30	1.50	.00	.00	.00	.00
24	--	.00	.00	.00	.10	.00	.00	.00	.70	.00	.00	--
25	--	.20	.00	.00	.00	.00	.00	.50	.00	.00	.00	--
26	--	.00	.00	.00	.40	.00	.00	.10	.00	.00	.50	--
27	--	.00	.00	.00	1.10	.00	.00	.40	.00	.00	.00	--
28	--	.00	.00	.00	.00	.20	.00	2.00	.00	.00	.00	--
29	--	.00	.00	.10	--	.00	.00	.00	.00	.00	.00	--
30	--	.00	.00	.00	--	.00	.00	.10	.00	.00	.20	--
31	--	--	.00	.40	--	.00	--	.00	--	.00	.00	--
Total	--	--	0.70	0.90	3.70	2.20	0.40	5.70	2.50	0.60	2.50	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## HARMON COUNTY, OKLAHOMA--Continued

04N-25W-19 DCCC 1--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	.00	.00	.00	.00	.00	.30	.00	.00	.00	.00	.20
2	--	.00	.00	.00	.00	2.80	.00	.00	.00	.00	.00	1.10
3	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
5	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
8	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
9	--	.00	.00	.00	.00	.00	.20	.00	.00	.82	.00	.00
10	--	.00	.00	.00	.00	.00	.00	.00	.00	.28	.00	.00
11	--	.00	.00	.20	.00	.00	.00	.00	.00	.00	.50	.00
12	--	.00	.00	.10	.00	.00	.00	.00	.00	.00	.00	.00
13	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
14	--	.00	.00	.00	.00	.00	.00	.00	1.50	.00	.00	.10
15	--	.00	.00	.00	.00	.00	.00	.00	.10	.00	.00	.30
16	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
17	--	.00	.20	.00	.00	.30	1.90	.00	.00	.00	.00	.00
18	--	.00	.60	.00	.00	.00	.00	.00	.00	.00	.00	7.40
19	--	.00	.50	.00	.00	.00	.00	.00	.00	.00	.00	.80
20	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
21	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
22	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
23	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
24	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
25	--	.00	.00	.00	.00	.00	.00	.00	.10	.00	.00	.00
26	--	.00	.00	.00	.00	.00	.00	.00	.70	.00	.00	.00
27	--	.10	.00	.00	.00	.00	.00	.00	.10	.00	.00	.00
28	--	.00	.20	.00	.00	.00	.00	.00	.40	.00	.10	.00
29	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
30	.90	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	.00
31	.00	--	.00	.00	--	.00	--	.70	--	.00	.20	--
Total	--	0.10	1.50	0.30	0.00	3.10	2.40	0.70	2.90	1.10	0.80	9.90



Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

HARMON COUNTY, OKLAHOMA--Continued  
04N-25W-19 DCCC 1--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	--	.00	--	--	--	--	--	--	--	--
2	.00	.00	.00	.30	--	--	--	--	--	--	--	--
3	.00	.00	.00	.00	--	--	--	--	--	--	--	--
4	.00	.10	.00	.00	--	--	--	--	--	--	--	--
5	.00	--	.00	.00	--	--	--	--	--	--	--	--
6	.00	--	.00	.00	--	--	--	--	--	--	--	--
7	.00	--	.40	.00	--	--	--	--	--	--	--	--
8	.00	--	.00	.00	--	--	--	--	--	--	--	--
9	.00	--	.00	.00	--	--	--	--	--	--	--	--
10	.00	--	.00	.00	--	--	--	--	--	--	--	--
11	.00	--	.00	.10	--	--	--	--	--	--	--	--
12	.00	--	.00	.00	--	--	--	--	--	--	--	--
13	.00	--	.00	.00	--	--	--	--	--	--	--	--
14	--	--	.10	.00	--	--	--	--	--	--	--	--
15	--	--	.00	.00	--	--	--	--	--	--	--	--
16	--	--	.00	.00	--	--	--	--	--	--	--	--
17	--	--	.00	.00	--	--	--	--	--	--	--	--
18	--	--	.00	.00	--	--	--	--	--	--	--	--
19	--	--	.00	--	--	--	--	--	--	--	--	--
20	.00	--	.00	--	--	--	--	--	--	--	--	--
21	.00	--	.00	--	--	--	--	--	--	--	--	--
22	.00	--	.00	--	--	--	--	--	--	--	--	--
23	.10	--	.00	--	--	--	--	--	--	--	--	--
24	.00	--	.00	--	--	--	--	--	--	--	--	--
25	.00	--	.00	--	--	--	--	--	--	--	--	--
26	.00	--	.00	--	--	--	--	--	--	--	--	--
27	.00	--	.00	--	--	--	--	--	--	--	--	--
28	.00	--	.00	--	--	--	--	--	--	--	--	--
29	.00	--	.00	--	--	--	--	--	--	--	--	--
30	.00	--	.00	--	--	--	--	--	--	--	--	--
31	.00	--	.00	--	--	--	--	--	--	--	--	--
Total	--	--	--	--	--	--	--	--	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA

Index number on location map: 4

Station number: 343410099364402, Local number: 01N-23W-10 BBBA 2

Location: Lat 34°34'10", long 99°36'44", hydrologic unit 11130101

Altitude of land-surface datum: 1432 ft

## Water Year, October 1986 to September 1987

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
2	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
3	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	--	.90	.00	.00	.60	.10	.00	.00	.00	.00	.00	.00
5	--	.00	.00	.00	.20	.00	.10	.00	.00	.00	.70	.00
6	--	.00	.10	.00	.00	.00	.10	.00	.00	.00	.00	.10
7	--	.00	.00	.10	--	.00	.00	.00	.00	.00	.00	.00
8	--	.00	.20	.50	--	.00	.00	.00	.00	.00	.00	.10
9	--	.00	.00	.10	--	.00	.00	.00	.40	.00	.00	.00
10	--	.00	.00	.00	--	.00	.00	.00	.60	.00	.00	.00
11	--	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	.00
12	--	.00	.00	.00	--	.10	.00	.00	.50	.60	.00	.50
13	--	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	.00
14	--	.00	.00	.00	--	.00	.00	.00	.00	.10	.20	.00
15	--	.00	.00	.00	--	.00	.00	.00	.00	.10	.00	.00
16	--	.00	.00	.20	--	.20	.00	.00	.00	.10	.00	.00
17	--	.00	.00	.00	--	.10	.00	.00	.10	1.10	.00	.00
18	--	.00	.10	--	.00	.00	.00	.10	.00	.00	.00	.20
19	--	.00	.00	--	.10	.00	.00	.50	.00	.00	.00	.00
20	--	.00	.00	--	.10	.00	.00	.10	.00	.00	.00	.90
21	--	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00
22	--	.00	.00	--	.10	.00	.00	.50	.00	.00	.00	.00
23	--	.10	.00	--	.00	.70	.00	2.90	.00	.00	.00	.00
24	--	.00	.00	--	.20	.00	.00	.10	1.20	.00	.00	.10
25	--	.60	.00	--	.00	.00	.00	1.30	.20	.00	.10	.00
26	--	.00	.00	--	.30	.00	.00	.00	.00	.00	.30	.00
27	--	.00	.00	--	.30	.00	.00	1.50	.00	.00	.00	.00
28	--	.00	.00	.00	.00	.00	.00	2.70	.00	.00	.00	.40
29	--	.00	.00	.00	--	.00	.10	.00	.70	.00	.00	.00
30	--	.00	.00	.00	--	.00	.00	.10	.10	.00	.00	.10
31	--	--	.00	.60	--	.00	--	.00	--	.00	.00	--
Total	--	--	0.40	--	--	1.20	0.30	9.80	3.80	2.00	1.30	2.40

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

01N-23W-10 BBBA 2--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	.00	.00	.00	.20	.30	.00	.00	.00	--	.20
2	.00	.00	.00	.30	.00	2.50	.00	.00	.00	.40	--	1.00
3	.00	.00	.00	.20	.00	.00	.00	.00	.00	.10	--	.10
4	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00
5	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00
6	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00
7	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.00
8	.00	.00	.00	.00	.00	.00	.00	.00	.00	.67	--	.00
9	.00	.00	.00	.00	.00	.00	.40	.00	.00	.43	--	.00
10	.00	.00	.00	.00	.00	.00	.00	.00	.00	.20	--	.00
11	.00	.00	.00	.20	.00	.00	.00	.00	.00	.00	--	.00
12	.00	.00	.00	.50	.00	.00	.10	.00	.00	.00	--	.00
13	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.10
14	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.10
15	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.30
16	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	.30
17	.00	.00	.00	.00	.00	.20	2.60	.00	.20	.00	--	.30
18	.00	.00	.40	.00	.00	.00	.00	.00	.10	.00	--	3.10
19	.00	.00	.50	.00	.00	.00	.00	.00	.00	.00	--	.00
20	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	--	.00
21	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	--	.00
22	.00	.00	.00	.00	.00	.00	.00	.00	.00	--	--	.00
23	1.10	.00	.00	.00	.00	.00	.00	.00	.00	--	--	.80
24	.20	.00	.00	.00	.00	.00	.00	.00	.00	--	--	.00
25	.00	.00	.40	.00	.00	.00	.00	.00	.43	--	--	.00
26	.00	.30	.40	.00	.00	.00	.00	.00	1.47	--	--	.10
27	.00	.00	.10	.00	.00	.00	.00	.00	.10	--	--	.00
28	.00	.00	.00	.00	.00	.00	.00	.00	.50	--	--	.00
29	.00	.00	.10	.00	.00	.00	.30	.00	.00	--	--	.00
30	2.00	.00	.30	.00	--	.00	.20	.00	.00	--	--	.00
31	.10	--	.00	.00	--	.20	--	.20	--	--	--	--
Total	3.40	0.30	2.20	1.20	0.00	3.10	3.90	0.20	2.80	--	--	6.40

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

01N-23W-10 BBBA 2--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.70	.10	.00	--	--	--	--	--	--	--	--
2	.00	.30	.00	.00	--	--	--	--	--	--	--	--
3	.10	.20	.00	.00	--	--	--	--	--	--	--	--
4	.00	.00	.00	.00	--	--	--	--	--	--	--	--
5	.00	.00	.00	.00	--	--	--	--	--	--	--	--
6	.10	.00	.00	.00	--	--	--	--	--	--	--	--
7	.00	.10	.40	.00	--	--	--	--	--	--	--	--
8	.00	.10	.00	.00	--	--	--	--	--	--	--	--
9	.00	.20	.00	.00	--	--	--	--	--	--	--	--
10	.00	.00	.20	.00	--	--	--	--	--	--	--	--
11	.00	.00	.10	.00	--	--	--	--	--	--	--	--
12	.00	.10	.40	.00	--	--	--	--	--	--	--	--
13	.00	.10	.10	.00	--	--	--	--	--	--	--	--
14	.00	.10	.00	.00	--	--	--	--	--	--	--	--
15	.00	.00	.20	.00	--	--	--	--	--	--	--	--
16	.00	.00	.00	.00	--	--	--	--	--	--	--	--
17	.00	.00	.00	.00	--	--	--	--	--	--	--	--
18	.00	.00	.00	.00	--	--	--	--	--	--	--	--
19	.10	.20	.40	--	--	--	--	--	--	--	--	--
20	.90	.30	.00	--	--	--	--	--	--	--	--	--
21	.30	.20	.20	--	--	--	--	--	--	--	--	--
22	.10	.00	.00	--	--	--	--	--	--	--	--	--
23	.10	.00	.00	--	--	--	--	--	--	--	--	--
24	.20	.00	.00	--	--	--	--	--	--	--	--	--
25	.10	.00	.00	--	--	--	--	--	--	--	--	--
26	.00	.00	.00	--	--	--	--	--	--	--	--	--
27	.10	.00	.00	--	--	--	--	--	--	--	--	--
28	.00	.00	.20	--	--	--	--	--	--	--	--	--
29	.00	.00	.00	--	--	--	--	--	--	--	--	--
30	.20	.00	.00	--	--	--	--	--	--	--	--	--
31	.20	--	.00	--	--	--	--	--	--	--	--	--
Total	2.50	2.60	2.30	--	--	--	--	--	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA

Index number on location map: 5  
 Station number: 344204099385302 Local number: 03N-23W-28 DADA 2  
 Location: Lat 34°42'04", long 99°36'53", hydrologic unit 11120202  
 Altitude of land-surface datum: 1434 ft

## Water Year, October 1985 to September 1986

Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	--	--	--	--	--	--	--	--	--	.10
2	--	--	--	--	--	--	--	--	--	--	--	.00
3	--	--	--	--	--	--	--	--	--	--	.00	1.40
4	--	--	--	--	--	--	--	--	--	--	.00	.80
5	--	--	--	--	--	--	--	--	--	--	.00	.60
6	--	--	--	--	--	--	--	--	--	--	--	.10
7	--	--	--	--	--	--	--	--	--	.00	1.80	.10
8	--	--	--	--	--	--	--	--	--	.00	.00	.00
9	--	--	--	--	--	--	--	--	--	--	.00	.00
10	--	--	--	--	--	--	--	--	--	--	.30	.00
11	--	--	--	--	--	--	--	--	--	.20	.00	.00
12	--	--	--	--	--	--	--	--	--	.00	.10	.00
13	--	--	--	--	--	--	--	--	--	.00	.00	.00
14	--	--	--	--	--	--	--	--	--	--	.00	.90
15	--	--	--	--	--	--	--	--	--	--	.60	.00
16	--	--	--	--	--	--	--	--	--	--	--	--
17	--	--	--	--	--	--	--	--	--	--	.00	.10
18	--	--	--	--	--	--	--	--	--	--	.00	.00
19	--	--	--	--	--	--	--	--	--	--	.00	--
20	--	--	--	--	--	--	--	--	--	--	.00	--
21	--	--	--	--	--	--	--	--	--	.70	.00	--
22	--	--	--	--	--	--	--	--	--	.00	.00	--
23	--	--	--	--	--	--	--	--	--	.20	.00	--
24	--	--	--	--	--	--	--	--	--	.00	.00	--
25	--	--	--	--	--	--	--	--	--	.00	.00	--
26	--	--	--	--	--	--	--	--	--	.00	.00	--
27	--	--	--	--	--	--	--	--	--	.00	2.20	--
28	--	--	--	--	--	--	--	--	--	.00	.00	--
29	--	--	--	--	--	--	--	--	--	.00	.00	--
30	--	--	--	--	--	--	--	--	--	.00	.00	--
31	--	--	--	--	--	--	--	--	--	.00	1.00	--
Total	--	--	--	--	--	--	--	--	--	--	--	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

03N-23W-28 DADA 2--Continued

Water Year, October 1986 to September 1987												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	--	--	.00	.00	.10	.00	.00	.00	1.90	.00	.00	.00
2	--	--	.00	.00	.00	.00	.00	.00	1.20	.00	.00	.00
3	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.40
5	--	--	.00	.00	.40	.00	.10	.00	.00	.00	.90	.00
6	--	--	.10	.00	.00	.00	.00	.00	.00	.00	.00	.00
7	--	--	.00	.00	.00	.00	.00	.00	.20	.00	.00	.20
8	--	--	.40	.50	.00	.00	.00	.00	.10	.00	.00	.60
9	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
10	--	--	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
11	--	--	.00	.00	.00	.00	.00	.00	--	.00	.00	.00
12	--	--	.00	.00	.00	.00	.00	.00	--	.10	.00	.00
13	--	--	.00	.00	.00	.00	.00	.00	--	.00	.30	.20
14	--	--	.00	.00	.00	.00	.00	.00	--	.00	.00	--
15	--	--	.00	.00	.80	.00	.00	.00	--	.00	.10	--
16	--	--	.00	.00	.00	.10	.00	.00	--	.00	.00	--
17	--	--	.00	.00	.00	.10	.00	.30	--	1.50	.00	--
18	--	.00	.00	.00	.00	.00	.00	.10	--	.00	.00	.00
19	--	.10	.00	.30	.10	.00	.00	.00	.00	.00	.00	.00
20	--	.00	.00	.00	.10	.00	.00	.40	.00	.00	.00	.00
21	--	.00	.00	--	.00	.00	--	2.40	.10	.00	.00	.00
22	--	.00	.00	--	.00	.20	.00	.00	.00	.00	.00	.00
23	--	.00	.00	--	.10	.60	.00	1.20	.00	.00	.00	.00
24	--	.00	.00	--	.10	.00	.00	.00	.00	.00	.00	.00
25	--	.50	.00	--	.10	.00	.00	1.60	.00	.00	.00	.00
26	--	.00	.00	--	.40	.00	.00	2.50	.00	.00	.00	.00
27	--	.00	.00	.00	.80	.00	.00	.00	.00	.00	.10	.00
28	--	.00	.00	.00	.00	.00	.00	.10	.00	.00	.00	.00
29	--	.00	.00	.00	--	.00	.00	.00	.80	.00	.00	.00
30	--	.00	.00	.00	--	.00	.00	.00	.00	.00	.10	.00
31	--	--	1.40	.40	--	.00	--	.40	--	.00	.00	--
Total	--	--	1.90	--	3.00	1.00	--	9.00	--	1.60	1.50	--

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

03N-23W-28 DADA 2--Continued

Water Year, October 1987 to September 1988												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	.00	.00	.00	.00	.00	.00	.00	.40	.00	.00
2	.00	.00	.00	.00	.00	2.60	.00	.00	.00	.00	.10	1.10
3	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00	.00
4	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00	.10
5	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00	.00
6	.00	.00	--	.10	.00	.00	.40	.00	--	.00	.00	.00
7	.00	.00	--	.10	.00	.00	.20	.00	--	.00	.00	.00
8	.00	.00	--	.00	.00	.00	.00	.00	.00	.82	.00	.00
9	.00	.00	.00	.00	.00	.00	.00	.00	.00	.73	.20	.00
10	.00	.00	.00	.30	.00	.00	.00	.00	.00	.65	.00	.00
11	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
12	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
13	.00	.00	.00	.00	.00	.00	.88	.00	.00	.00	.00	.50
14	.00	.00	.00	.00	.00	.00	1.90	.00	.00	.00	.00	.00
15	.00	.00	.10	--	.00	.00	.10	.00	.00	.00	.00	.00
16	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00
17	.00	.00	.00	--	.00	.20	.00	.00	.00	.00	.00	4.00
18	.00	.00	6.20	--	.00	.10	--	.00	.00	.00	.00	.00
19	.00	.00	.20	--	.00	.00	--	.10	.00	.00	.00	.00
20	.00	.00	.00	--	.00	.00	.00	.10	.00	.00	.10	.00
21	.00	.00	.00	--	.00	.00	.00	.00	.00	.00	.00	.00
22	.00	.00	.00	--	.00	.10	.00	.00	.00	.00	.00	.70
23	.60	.00	.00	--	.00	.10	.00	.00	.00	.00	.00	.00
24	.20	.00	.10	--	.00	.00	.00	.03	.00	.29	.00	.00
25	.00	.20	.20	--	.00	.00	.00	.00	2.98	.01	.00	.00
26	.00	.00	.20	--	.00	.00	.00	.00	1.32	.00	.00	.00
27	.00	.00	.00	--	.00	.00	.00	.00	.10	.00	.00	.10
28	.00	.00	.10	.00	.00	.00	.00	.00	.10	.00	.20	.10
29	.00	.00	.20	.00	.00	.30	.10	.20	.00	.00	--	.00
30	1.70	.00	.10	.00	--	.20	.00	.10	.80	.00	--	.00
31	.00	--	.00	.00	--	.00	--	.00	--	.00	--	--
Total	2.50	0.20	--	--	0.00	3.60	--	0.53	--	2.90	--	6.60

Table 4.--Daily precipitation measurements in southwestern Oklahoma--Continued

## JACKSON COUNTY, OKLAHOMA--Continued

03N-23W-28 DADA 2--Continued

Water Year, October 1988 to September 1989												
Day	Oct.	Nov.	Dec.	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.
1	.00	.00	--	--	--	--	--	--	--	--	--	--
2	.00	.00	--	--	--	--	--	--	--	--	--	--
3	.00	.10	--	--	--	--	--	--	--	--	--	--
4	.00	.00	--	--	--	--	--	--	--	--	--	--
5	.00	.00	--	--	--	--	--	--	--	--	--	--
6	.00	.00	--	--	--	--	--	--	--	--	--	--
7	.00	.00	--	--	--	--	--	--	--	--	--	--
8	.00	.00	--	--	--	--	--	--	--	--	--	--
9	.00	.00	--	--	--	--	--	--	--	--	--	--
10	.00	.00	--	--	--	--	--	--	--	--	--	--
11	.00	.00	--	--	--	--	--	--	--	--	--	--
12	.00	.00	--	--	--	--	--	--	--	--	--	--
13	.00	.00	--	--	--	--	--	--	--	--	--	--
14	.00	.00	--	--	--	--	--	--	--	--	--	--
15	.00	.00	--	--	--	--	--	--	--	--	--	--
16	--	.00	--	--	--	--	--	--	--	--	--	--
17	--	.00	--	--	--	--	--	--	--	--	--	--
18	--	.00	--	--	--	--	--	--	--	--	--	--
19	--	.10	--	--	--	--	--	--	--	--	--	--
20	.00	--	--	.00	--	--	--	--	--	--	--	--
21	.00	--	--	.00	--	--	--	--	--	--	--	--
22	.00	--	--	.00	--	--	--	--	--	--	--	--
23	.00	--	--	.00	--	--	--	--	--	--	--	--
24	.00	--	--	.00	--	--	--	--	--	--	--	--
25	.00	--	--	.30	--	--	--	--	--	--	--	--
26	.00	--	--	.00	--	--	--	--	--	--	--	--
27	.00	--	--	.30	--	--	--	--	--	--	--	--
28	.00	--	--	.60	--	--	--	--	--	--	--	--
29	.00	--	--	.00	--	--	--	--	--	--	--	--
30	.10	--	--	--	--	--	--	--	--	--	--	--
31	.00	--	--	--	--	--	--	--	--	--	--	--
Total	--	--	--	--	--	--	--	--	--	--	--	--



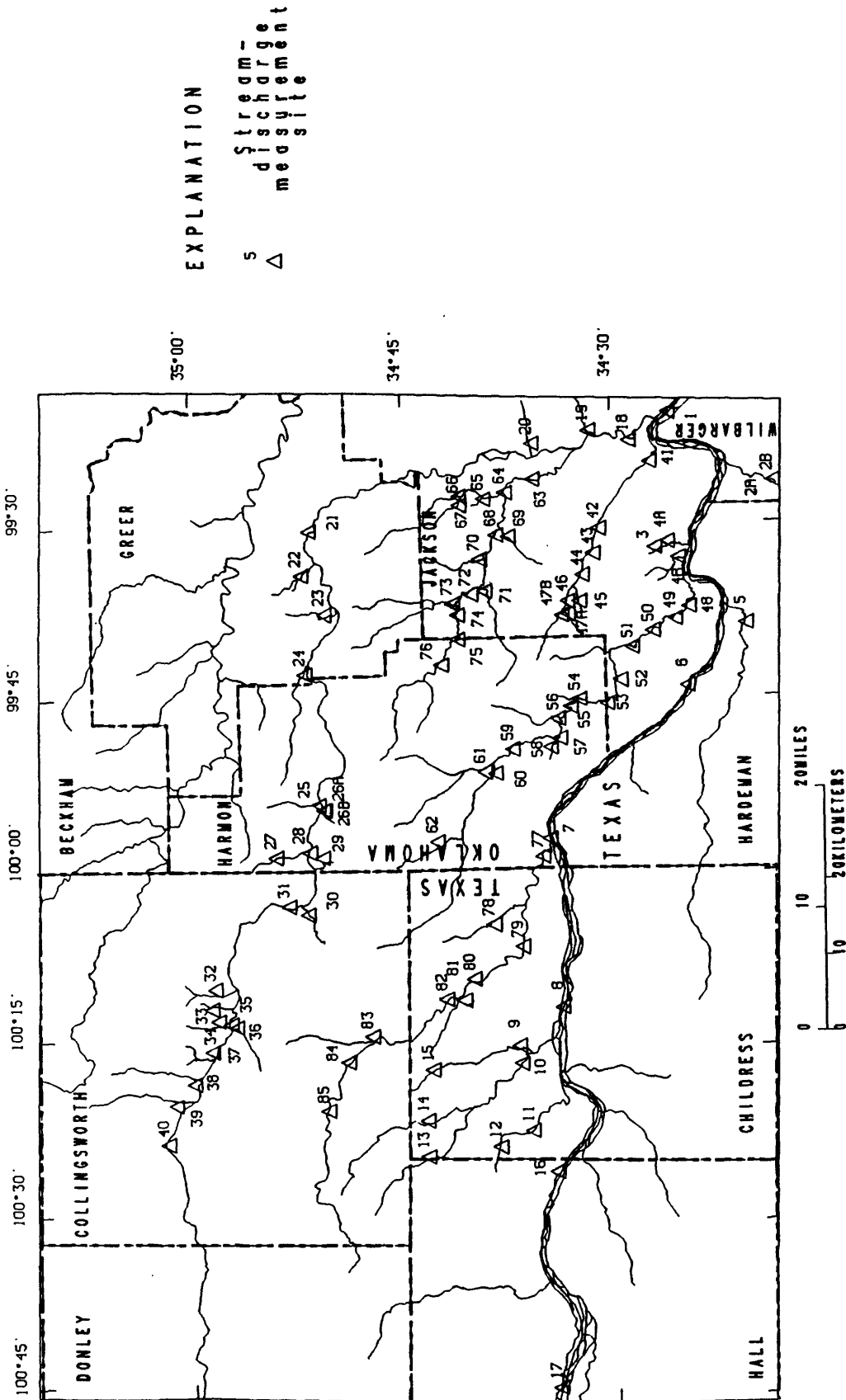


Figure 19. Location of low-flow stream-discharge measurement sites in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites in table 5).

Table 5.—*Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas*

[\*, probable noncontributing drainage area for surface runoff; †, natural drainage area interlaced by numerous canals, dikes and ditches, drainage area not determined; mi<sup>2</sup>, square mile; ft<sup>3</sup>/sec, cubic feet per second]

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
1	07301150	Red River near Elmer, Oklahoma	Lat 34°25'54", long 099°20'31", in NW 1/4 SW 1/4 NW 1/4 sec. 31, T. 1 S., R. 20 W., Jackson County, Oklahoma hydrologic unit 11130101, near U.S. Highway 283 bridge 3.5 miles south of Elmer.	16,469 *5,377	03-26-86 08-25-87 02-17-88	71.9 153. 523.
2A	07299732	Wanderers Creek near Odell, Texas	Lat 34°18'39", long 099°26'31", in Wilbarger County, Texas, hydrologic unit 11130101, near Texas Highway 91 bridge 2 miles south and 2.1 miles west of Odell, Texas.	156	03-25-86	2.91
2B	07299730	Tributary to Wanderers Creek near Odell, Texas	Lat 34°18'39", long 099°26'26", in Wilbarger County, Texas, hydrologic unit 11130101, near Texas Highway 91 bridge 2 miles south and 1.9 miles west of Odell, Texas.	0.39	08-25-87 02-17-88	no flow 0.03
3	07299720	Mule Creek near Eldorado, Oklahoma	Lat 34°27'00", long 099°32'10", in NE 1/4 NE 1/4 NE 1/4 sec. 30, T. 1 S., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11130101, near county road bridge 2.5 miles east, 1 mile south, 3.9 miles east of Eldorado.	3.84	08-25-87 02-17-88	no flow no flow
4A	07299722	Tributary to Mule Creek near Eldorado, Oklahoma	Lat 34°26'07", long 099°31'39", in NE 1/4 NE 1/4 NW 1/4 sec. 32, T. 1 S., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11130101, near county road bridge 2.5 miles east, 1 mile south, 4 miles east 1 mile south and 0.4 miles east of Eldorado.	2.36	08-25-87 02-17-88	no flow 0.16

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
48	07299718	Tributary to Red River near Eldorado, Oklahoma	Lat 34°25'16", long 099°33'05" in SE 1/4 SE 1/4 SE 1/4 sec. 36, T. 1 S., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, near county road bridge 2.5 miles east, 1 mile south, 2 miles east, 2 miles south, and 0.8 miles east of Eldorado.	7.63	03-26-86	0.03
5	07299580	Groesbeck Creek near Quanah, Texas	Lat 34°20'35", long 099°38'43", in Hardeman County, Texas, hydrologic unit 11130101, near county road bridge about 3.5 miles north, 5.5 miles east then 1 mile south of Quanah, Texas.	322	03-25-86 08-25-87 02-17-88	4.87 10.4 20.3
6	07299570	Red River near Quanah, Texas	Lat 34°24'48", long 099°44'07", in Hardeman County, Texas, hydrologic unit 11130101, near State Highways 6, 34, 44 bridge about 8 miles north of Quanah, Texas.	18,321 *4,769	03-26-86 08-26-87 02-17-88	6.66 11.8 37.3
7	07299565	Red River near Hollis, Oklahoma	Lat 34°34'43", long 099°57'26", in NE 1/4 NE 1/4 NW 1/4 sec. 8, T. 1 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120105, near State Highway 30 bridge 2.5 miles west and 7 miles south of Hollis.	8,154 *4,769	03-25-86 08-26-87 02-18-88	6.57 7.92 30.4
8	07299540	Prairie Dog Town Fork Red River near Childress, Texas	Lat 34°34'09", long 100°11'37", in Childress County, Texas, hydrologic unit 11120105, near U.S. Highway 62 and 83 bridge 10 miles north of Childress, Texas.	7,725 *4,769	08-26-87 02-18-88	45.7 13.5

<sup>1</sup>Drainage area published as 8,321 mi<sup>2</sup> by U.S. Army Corps of Engineers.

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
9	07299543	East Salt Creek near Childress, Texas	Lat 34°37'01", long 100°15'09", in Childress County, Texas, hydrologic unit 11120105, near county road bridge 2 miles north of U.S. Highway 283 bridge over the Prairie Dog Town Fork of Red River on U.S. Highway 283, then 2 miles west, 1 mile north and 2 miles west on county road.	21.1	08-26-87 02-18-88	no flow no flow
10	07299542	Salt Creek near Childress, Texas.	Lat 34°36'51", long 100°16'45", in Childress County, Texas, hydrologic unit 11120105, near county road bridge 2.6 miles north of U.S. Highway 83 bridge over Prairie Dog Town Fork of Red River on U.S. Highway 83, then 2 miles west, 1.2 mile north and about 3.5 miles west along curved county road.	113	08-26-87 02-18-88	1.46 0.56
11	07299512	Jonah Creek near Estelline, Texas	Lat 34°36'04", long 100°22'34", in Childress County, Texas, hydrologic unit 11120105, about 5.2 miles northeast of Estelline, Texas.	57.1	08-26-87 02-18-88	0.02 2.44
12	07299510	Jonah Creek near Newlin, Texas	Lat 34°38'24", long 100°23'58", in Childress County, Texas, hydrologic unit 11120105, near County Road 1619 bridge 2.5 miles east and about 3.5 miles north of Newlin, Texas.	46.3	08-26-87 02-18-88	0.09 1.62
13	07299541	Dry Salt Creek near Memphis, Texas	Lat 34°43'31", long 100°24'49", in Childress County, Texas, hydrologic unit 11120105, near Texas State Highway 256 bridge about 7 miles east of Memphis, Texas.	31.3	08-26-87 02-18-88	1.16 no flow
14	072995415	Wet Salt Creek near Memphis, Texas	Lat 34°43'32", long 100°21'41", in Childress County, Texas, hydrologic unit 11120105, near Texas State Highway 256 bridge about 10 miles east of Memphis, Texas.	38.9	08-26-87 02-18-88	no flow 0.57

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
15	072995425	East Salt Creek near Memphis, Texas	Lat 34°43'03", long 100°17'17", in Childress County, Texas, hydrologic unit 11120105, near Texas State Highway 256 bridge about 14.5 miles east of Memphis, Texas.	3.2	08-26-87 02-18-88	no flow no flow
16	072995505	Prairie Dog Town Fork Red River at Estelline, Texas	Lat 34°34'21", long 100°26'09", in Hall County, Texas, hydrologic unit 11120105, at U.S. Highway 287 bridge 2 miles north of Estelline, Texas.	7,293 *4,769	08-26-87 02-18-88	11.9 8.87
17	07299495	Prairie Dog Town Fork Red River near Lakeview, Texas	Lat 34°34'18", long 100°44'48", in Hall County, Texas, hydrologic unit 11120105, near Texas State Highway 657 bridge 2 miles west then about 7.5 miles south of Lakeview, Texas.	6,794 *4,769	08-26-87 02-18-88	0.41 2.40
18	07301110	Salt Fork Red River near Elmer, Oklahoma	Lat 34°28'44", long 099°22'55", in NE 1/4 NW 1/4 NE 1/4 sec. 15, T. 1 S., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11120202, at State Highway 5 bridge 1.7 miles west of Elmer.	1,878 * 209	03-25-86 08-25-87 02-17-88	37.8 116. 132.
19	07301105	Tributary to Salt Fork Red River near Elmer, Oklahoma	Lat 34°31'38", long 099°22'08", in SW 1/4 NW 1/4 SW 1/4 sec. 25, T. 1 N., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 2 miles north, 0.5 mile west then 1.4 miles north of Elmer.	**	03-26-86 08-25-87 02-16-88	0.83 12.0 1.74
20	07300600	Bitter Creek near Altus, Oklahoma	Lat 34°35'39", long 099°23'16", in NE 1/4 NE 1/4 NE 1/4 sec. 3, T. 1 N., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 3 miles south of the junction of U.S. Highways 62 and 283 in Altus and 3 miles west of the U.S. Highway 283.	**	03-25-86 08-25-87 02-16-88	7.19 4.69 14.2

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
21	07300500	Salt Fork Red River at Mangum, Oklahoma	Lat 34°51'30", long 099°30'30", in SE 1/2 SW 1/4 SE 1/4 sec. 34, T. 5 N., R. 22 W., Greer County, Oklahoma, hydrologic unit 11120202, at State Highway 34 bridge 0.5 miles south of Mangum.	1,566 * 209	03-24-86 08-25-87 02-17-88	20.0 5.69 65.4
22	07300495	Fish Creek near Mangum, Oklahoma	Lat 34°52'16", long 099°34'23", in NE 1/4 NE 1/4 SE 1/4 sec. 36, T. 5 N., R. 23 W., Greer County, Oklahoma, hydrologic unit 11120202 at county road bridge 3.4 miles west of Mangum.	5.3	08-25-87 02-17-88	0.30 0.58
23	07300485	Mulberry Creek near Mangum, Oklahoma	Lat 34°50'27", long 099°37'43", in SE 1/4 SW 1/4 SW 1/4 sec. 4, T. 4 N., R. 23 W., Greer County, Oklahoma, hydrologic unit 11120202, at county road bridge 7 miles west of junction State Highways 9 and 34, then 3 miles south, 1/2 mile west, 1 mile south and 0.2 mile east on county road.	9.3	03-24-86 08-25-87 02-17-88	0.69 1.94 1.68
24	07300470	Cave Creek near Reed, Oklahoma	Lat 34°52'04", long 099°42'56", in NW 1/4 SE 1/4 NE 1/4 sec. 34, T. 5 N., R. 24 W., Greer County, Oklahoma, hydrologic unit 11120202, at county road bridge 2 miles south and 1.4 miles west of Reed.	46.7	03-24-86 08-26-87 02-17-88	0.19 1.38 1.33
25	07300415	Horse Creek near Vinson, Oklahoma	Lat 34°51'07", long 099°54'14", in NE 1/4 SE 1/4 NW 1/4 sec. 2, T. 4 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, at county road bridge 0.4 miles east of State Highway 30 at a point 3.4 miles south of the junction of State Highways 9 and 30 about 2.9 miles west of Vinson.	9.4	08-26-87 02-17-88	no flow 0.60

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge (ft <sup>3</sup> /sec) in
25	07300415	Horse Creek near Vinson, Oklahoma	Lat 34°51'07", long 099°54'14", in NE 1/4 SE 1/4 NW 1/4 sec. 2, T. 4 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, at county road bridge 0.4 miles east of State Highway 30 at a point 3.4 miles south of the junction of State Highways 9 and 30 about 2.9 miles west of Vinson.	9.4	08-26-87 02-17-88	no flow 0.60
26A	07300400	Salt Fork Red River near Vinson, Oklahoma	Lat 34°50'44", long 099°54'44", in SE 1/4 NE 1/4 SE 1/4 sec. 3, T. 4 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, at State Highway 30 bridge 3.5 miles west and 3.9 miles south of Vinson.	1,421 * 209	08-26-87 02-17-88	17.3 41.4
26B	07300405	Tributary to Salt Fork Red River near Vinson, Oklahoma	Lat 34°50'40", long 099°54'43", in NE 1/4 SE 1/4 SE 1/4 sec. 3, T. 4 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, near State Highway 30 bridge 3.5 miles west and 3.9 miles south of Vinson.	0.26	03-28-86	0.09
27	07300150	Bear Creek near Vinson, Oklahoma	Lat 34°54'01", long 099°58'54", in NE 1/4 NW 1/4 NE 1/4 sec. 19, T. 5 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, at State Highway 9 bridge 6.9 miles west of Vinson.	7.24	08-26-87 02-17-88	0.35 1.25
28	07300145	Salt Fork Red River near Madge, Oklahoma	Lat 34°51'46", long 099°58'34", in NW 1/4 NW 1/4 SW 1/4 sec. 32, T. 5 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, 3 miles west of junction State Highways 9 and 30 on State Highway 9, then 1.3 miles south, 0.5 miles west and 1.5 miles south to the river.	1,388 * 209	03-24-86 08-26-87 02-17-88	17.4 23.8 56.9

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
29	07300140	Tributary to Salt Fork Red River near Madge, Oklahoma	Lat 34°50'42", long 099°58'54", in NW 1/4 SW 1/4 sec. 6, T. 4 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120202, at county road bridge 1.3 miles south of State Highway 30 bridge over Salt Fork Red River then 4 miles west miles and 1.3 north of State Highway 30 on a county road.	4.79	03-24-86 08-26-87 02-17-88	0.47 0.73 0.98
30	07300130	Sand Creek near Dodson, Texas	Lat 34°50'54", long 100°03'47", in Collingsworth County, Texas, hydrologic unit 11120202, at county road bridge 9 miles east of Wellington on Texas State Highway 203, then about 2.6 miles south on county road.	83.2	02-18-88	5.98
31	07300120	Salt Fork Red River near Dodson, Texas	Lat 34°53'15", long 100°03'03", in Collingsworth County, Texas, hydrologic unit 11120202, at Texas State Highway 203 bridge about 10.6 miles east of Wellington, Texas, or about 3 miles west of the state-line.	1,297	08-26-87 02-18-88	18.6 54.1
32	07300005	Panther Creek near Wellington, Texas	Lat 34°58'33", long 100°10'09", in Collingsworth County, Texas, hydrologic unit 11120202, at County Highway 3446 bridge about 3.2 miles east of U.S. Highway 83, 8 miles north of Wellington.	4.61	08-26-87 02-18-88	1.66 1.16
33	07300002	Tributary to Salt Fork Red River near Wellington, Texas	Lat 34°58'47", long 100°11'54", in Collingsworth County, Texas, hydrologic unit 11120202, at County road 3446 bridge about 2 miles east of U.S. Highway 83, 8 miles north of Wellington.	0.95	08-26-87 02-18-88	no flow no flow
34	07300001	Indian Creek near Wellington, Texas	Lat 34°58'21", long 100°12'56", in Collingsworth County, Texas, hydrologic unit 11120202, at County Highway 3446 bridge 0.25 miles east of U.S. Highway 83, 8 miles north of Wellington.	2.56	08-26-87 02-18-88	0.10 0.10



Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area in (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
35	07300000	Salt Fork Red River near Wellington, Texas	Lat 34°57'27", long 100°13'14", in Collingsworth County, Texas, hydrologic unit 11120202, at U.S. Highway 83 bridge 7.2 miles north of Wellington.	1,222	08-26-87 02-18-88	7.37 33.5
36	07299999	Cottonwood Creek near Wellington, Texas	Lat 34°57'02", long 100°13'28", in Collingsworth County, Texas, hydrologic unit 11120202, at county highway bridge west of U.S. Highway 83, 6.5 miles north of Wellington, or 0.4 miles south of U.S. Highway 83 bridge over Salt Fork Red River.	15.9	08-26-87 02-18-88	no flow 1.77
37	07299997	Tributary to Salt Fork Red River near Lutie, Texas	Lat 34°58'47", long 100°15'36", in Collingsworth County, Texas, hydrologic unit 11120202, at county road bridge 2.3 miles west of U.S. Highway 83 at a point about 1.5 miles north of U.S. Highway 83 bridge over Salt Fork Red River 7.2 miles north of Wellington.	12.8	08-26-87 02-18-88	no flow no flow
38	07299995	Lake Creek near Sannorwood, Texas	Lat 35°00'04", long 100°18'28", in Collingsworth County, Texas, hydrologic unit 11120202, at county road bridge 0.6 miles west of Sannorwood on Texas County Highway 1036, then south 3.5 miles on Texas County Highway 1548, then 0.9 miles west to bridge.	14.4	08-26-87 02-18-88	no flow no flow
39	07299990	Dozier Creek near Dozier, Texas	Lat 35°01'23", long 100°20'19", in Collingsworth County, Texas, hydrologic unit 11120202, at county road bridge 6 miles west of junction of U.S. Highway 83 and County Highway 1036 2 miles north of Lutie, then 2 miles south and 0.3 miles east to bridge, or 4 miles south and 0.3 miles east of Dozier.	16.6	08-26-87 02-18-88	0.13 0.74

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area, (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
40	07299985	Salt Fork Red River near Quail, Texas	Lat 35°01'58", long 100°23'42", in Collingsworth County, Texas, hydrologic unit 11120202, at County Highway 1547 bridge about 8.5 miles north of Quail, or about 3.4 miles south of Abra.	1,051	08-26-87 02-18-88	no flow 13.5
41	07299780	Gypsum Creek near Olustee, Oklahoma	Lat 34°27'16", long 099°24'44", in SW 1/4 NW 1/4 SW 1/4 sec. 21, T. 1 S., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11130101, at County road bridge 6.5 miles south of Olustee.	99.2	03-27-86 08-25-87 02-17-88	5.62 6.93 10.6
42	07299775	Gypsum Creek near Creta, Oklahoma	Lat 34°30'53", long 099°30'30", in SW 1/4 SW 1/4 NW 1/4 sec. 34, T. 1 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 5 miles southwest of Olustee on State Highway 6 and 44, then 1.5 miles south.	56.1	03-27-86 08-25-87 02-17-88	5.60 7.63 9.81
43	07299770	Gypsum Creek at Creta, Oklahoma	Lat 34°31'17", long 099°32'37", in SE 1/4 SE 1/4 SE 1/4 sec. 30, T. 1 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11130101, at State Highway 6 and 44 bridge at Creta.	34.6	03-27-86 08-25-87 02-17-88	4.99 7.38 8.51
44	07299768	Gypsum Creek near Prairie Hill, Oklahoma	Lat 34°32'08", long 099°34'32", in NE 1/4 NW 1/4 NW 1/4 sec. 25, T. 1 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge, 0.5 miles west of State Highway 34, 1.6 miles north of junction of State Highways 34, 6, and 44.	28.1	03-27-86 08-26-87 02-17-88	5.24 6.21 8.94

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
45	07299766	Tributary to Gypsum Creek near Eldorado, Oklahoma	Lat 34°32'21", long 099°36'49", in NW 1/4 SW 1/4 SW 1/4 sec. 22, T. 1 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 2 miles north, 1.3 miles east then 2.2 miles north of junction of State Highways 5, 6, and 44 at the northeast corner of Eldorado.	4.53	03-27-86 08-26-87 02-17-88	0.65 1.26 1.32
46	07299764	Gypsum Creek near Duke, Oklahoma	Lat 34°33'15", long 099°36'50", in NW 1/4 SW 1/4 SW 1/4 sec. 15, T. 1 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 3 miles west of State Highway 34 and 0.8 miles south, 3.6 miles north of junction State Highways 34, 6, and 44.	14.0	03-26-86 08-26-87 02-17-88	3.60 5.89 6.04
47A	07299762	Tributary to Gypsum Creek north of Eldorado, Oklahoma	Lat 34°33'16", long 099°37'51", in SW 1/4 NW 1/4 SW 1/4 sec. 16, T. 1 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge, 2 miles north, 0.3 miles east then 3.3 north of junction State Highways 5, 6, and 44 at the northeast corner of Eldorado.	2.12	03-27-86 08-26-87 02-17-88	0.52 0.92 1.40
47B	07299760	Gypsum Creek north of Eldorado, Oklahoma	Lat 34°33'41", long 099°37'52", in NE 1/4 SE 1/4 NE 1/4 sec. 17, T. 1 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge, 2 miles north, 0.3 miles east, then 3.7 miles north of junction State Highways 5, 6, and 44 at the northeast corner of Eldorado.	8.27	03-27-86	1.18
48	07299716	Sandy Creek southeast of Eldorado, Oklahoma	Lat 34°24'36", long 099°37'17", in NE 1/4 SE 1/4 SE 1/4 sec. 5, T. 2 S., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 4 miles south, 2 miles east then 0.3 miles north from southwest corner of Eldorado.	320	03-26-86 08-25-87 02-17-88	8.57 13.7 15.9

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
49	07299714	Sandy Creek south of Eldorado, Oklahoma	Lat 34°25'35", long 099°38'18", in SE 1/4 NE 1/4 SE 1/4 sec. 31, T. 1 S., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 3.7 miles south of State Highway 6 and 44 junction with county road at the northeast corner of Eldorado.	312	03-26-86 08-25-87 02-17-88	9.42 13.6 15.9
50	07299712	Sandy Creek at Eldorado, Oklahoma	Lat 34°27'10", long 099°39'21", in NE 1/4 SE 1/4 SE 1/4 sec. 24, T. 1 S., R. 24 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 1.1 mile south of junction of county road with State Highways 6 and 44 at southwest corner of Eldorado.	297	03-26-86 08-25-87 02-17-88	6.81 9.17 12.5
51	07299710	Sandy Creek near Eldorado, Oklahoma	Lat 34°28'45", long 099°40'42", in SE 1/4 SW 1/4 SE 1/4 sec. 11, T. 1 S., R. 24 W., Jackson County, Oklahoma, hydrologic unit 11130101, at State Highway 5 bridge 1.4 miles west of northwest corner of Eldorado.	280	03-26-86 08-25-87 02-17-88	4.32 10.9 10.1
52	072997095	Sandy Creek near Lincoln, Oklahoma	Lat 34°29'32", long 099°43'33", in NW 1/4 NW 1/4 NW 1/4 sec. 9, T. 1 S., R. 24 W., Jackson County, Oklahoma, hydrologic unit 11130101, at county road bridge 0.9 miles north of State Highway 5, 4 miles from northwest corner of Eldorado.	255	03-26-86 08-25-87 02-17-88	2.26 6.50 6.35
53	072997092	Sandy Creek at Lincoln, Oklahoma	Lat 34°30'55", long 099°45'33", in SE 1/4 SW 1/4 SE 1/4 sec. 31, T. 1 N., R. 24 W., Harmon County, Oklahoma, hydrologic unit 11130101, at State Highway 5 bridge 1 mile north of Lincoln.	235	03-25-86 08-26-87 02-17-88	1.92 4.11 5.31

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area in (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
54	07299709	Tributary to Sandy Creek near Lincoln, Oklahoma	Lat 34°32'27", long 099°45'11", in SW 1/4 NW 1/4 SW 1/4 sec. 20, T. 1 N., R. 24 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 1 mile east and 0.1 mile north of State Highway 5, 3 miles north of Lincoln.	6.32	03-25-86 08-26-87 02-17-88	0.05 0.76 0.60
55	072997087	Sandy Creek near Louis, Oklahoma	Lat 34°33'03", long 099°45'46", in SE 1/4 SE 1/4 SW 1/4 sec. 18, T. 1 N., R. 24 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 0.5 miles east of State Highway 5, 2 miles east and 1 mile south of Louis.	224	08-26-87 02-17-88	0.85 0.15
56	072997085	Tributary to Sandy Creek at Louis, Oklahoma	Lat 34°33'54", long 099°46'48", in SE 1/4 SE 1/4 SW 1/4 sec. 12, T. 1 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 1.6 miles east of Louis.	30.4	08-26-87 02-17-88	1.42 no flow
57	07299708	Sandy Creek at Louis, Oklahoma	Lat 34°33'54", long 099°48'35", in NW 1/4 NE 1/4 NE 1/4 sec. 15, T. 1 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 0.2 miles west of Louis.	195	08-26-87 02-17-88	0.73 no flow
58	072997075	Tributary to Sandy Creek near Louis, Oklahoma	Lat 34°34'29", long 099°49'26", in NW 1/4 SW 1/4 NW 1/4 sec. 10, T. 1 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 1.2 miles west and 0.7 miles north of Louis.	5.25	08-26-87 02-17-88	no flow no flow
59	07299707	Sandy Creek near Gould, Oklahoma	Lat 34°37'12", long 099°49'26", in SE 1/4 NE 1/4 NE 1/4 sec. 28, T. 2 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 3 miles west and 0.2 miles south of State Highway 5, 3 miles south of Gould.	169	08-26-87 02-17-88	0.27 0.02

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area, (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
60	07299706	West Fork Sandy Creek near Hollis, Oklahoma	Lat 34°38'24", long 099°51'33", in NE 1/4 SE 1/4 SE 1/4 sec. 18, T. 2 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 2.9 miles south of U.S. Highway 62 about 2.5 miles east of Hollis.	103	08-26-87 02-17-88	no flow no flow
61	072997065	East Fork Sandy Creek near Gould, Oklahoma	Lat 34°39'09", long 099°51'26", in SW 1/4 SW 1/4 SW 1/4 sec. 8, T. 2 N., R. 25 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 4.9 miles west of State Highway 5, 1 mile south of Gould.	58.4	08-26-87 02-17-88	no flow 0.09
62	07299705	Bitter Creek near Hollis, Oklahoma	Lat 34°42'40", long 099°57'35", in SW 1/4 NW 1/4 SW 1/4 sec. 20, T. 3 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11130101, at county road bridge 3 miles west of junction of State Highway 30 and U.S. Highway 62 in Hollis on U.S. Highway 62, 2.3 miles north of U.S. Highway 62.	10.4	08-26-87 02-17-88	no flow no flow
63	07301100	Turkey Creek at Olustee, Oklahoma	Lat 34°35'39", long 099°26'11", in NE 1/4 NW 1/4 NW 1/4 sec. 5, T. 1 N., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 3 miles north of Olustee on State Highway 6, then 0.9 mile west.	317	03-24-86 08-25-87 02-17-88	6.30 17.3 40.1
64	07301050	Turkey Creek near Altus, Oklahoma	Lat 34°37'31", long 099°27'23", in NW 1/4 SW 1/4 SW 1/4 sec. 19, T. 2 N., R. 21 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 0.7 mile south of U.S. Highway 62, 2.5 miles west of U.S. Highway 62 bridge over Salt Fork Red River at Altus.	309	03-25-86 08-25-87 02-17-88	8.44 18.3 27.2

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area, (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
65	07301040	Tributary to Horse Branch at Victory, Oklahoma	Lat 34°39'08", long 099°27'46", in NW 1/4 NW 1/4 NE 1/4 sec. 13, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 1.5 miles west of Victory.	0.23	03-25-86 08-25-87 02-17-88	0.51 no flow < 0.01
66	07301020	Horse Branch near Victory, Oklahoma	Lat 34°40'52", long 099°27'31", in NW 1/4 NE 1/4 NE 1/4 sec. 1, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 1 mile west, 2 miles north, and 0.1 mile west of Victory.	25.3	03-25-86 08-25-87 02-17-88	0.47 0.39 2.38
67	07301030	Tributary to Horse Branch northwest of Victory, Oklahoma	Lat 34°40'51", long 099°28'25", in NW 1/4 NW 1/4 NW 1/4 sec. 1, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 2 miles west and 2 miles north of Victory.	8.39	03-25-86 08-25-87 02-17-88	0.10 0.02 0.12
68	07300995	Turkey Creek near Prairie Hill, Oklahoma	Lat 34°38'14", long 099°30'59", in NW 1/4 NW 1/4 NE 1/4 sec. 21, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 0.4 mile west of junction with U.S. Highway 62, 3 miles east of the east side of Duke.	238	03-26-86 08-25-87 02-17-88	6.23 20.1 25.9
69	07300997	Tributary to Turkey Creek near Prairie Hill, Oklahoma	Lat 34°37'23", long 099°31'03", in NW 1/4 NW 1/4 NE 1/4 sec. 28, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 2 miles north and 1.5 miles east of Prairie Hill.	13.7	03-26-86 08-25-87 02-17-88	0.20 0.09 0.76
70	07300990	Spring Branch at Duke, Oklahoma	Lat 34°39'23", long 099°33'03", in SW 1/4 NW 1/4 SE 1/4 sec. 7, T. 2 N., R. 22 W., Jackson County, Oklahoma, hydrologic unit 11120202, at U.S. Highway 62 bridge near east edge of Duke.	14.0	03-26-86 08-25-87 02-17-88	0.54 1.53 2.95

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
71	07300985	Cottonwood Creek near Duke, Oklahoma	Lat 34°39'08", long 099°35'46", in NE 1/4 NE 1/4 NE 1/4 sec. 15, T. 2 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 2 miles west of Duke on U.S. Highway 62, then 1 mile south and 1 mile east.	54.5	03-26-86 08-26-87 02-17-88	0.48 2.15 2.02
72	07300980	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	Lat 34°40'00", long 099°36'05", in SE 1/4 SW 1/4 SE 1/4 sec. 3, T. 2 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11120202, at U.S. Highway 62 bridge 2.3 miles west of junction U.S. Highway 62 and State Highway 34, in Duke.	148	03-26-86 08-26-87 02-17-88	3.98 10.1 10.9
73	07300975	Tributary to Turkey Creek near Duke, Oklahoma	Lat 34°41'32", long 099°36'51", in SE 1/4 NE 1/4 NE 1/4 sec. 33, T. 3 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 3 miles west of junction U.S. Highway 62 and State Highway 34 in Duke, then 1.7 miles north.	56.5	08-26-87 02-17-88	1.37 1.94
74	07300970	Turkey Creek near Duke, Oklahoma	Lat 34°41'03", long 099°37'52", in NW 1/4 SW 1/4 SW 1/4 sec. 33, T. 3 N., R. 23 W., Jackson County, Oklahoma, hydrologic unit 11120202, at county road bridge 1.1 mile north of U.S. Highway 62, 3 miles west of junction U.S. Highway 62 and State Highway 34 in Duke.	84.8	03-26-86 08-26-87 02-17-88	2.34 10.5 10.3
75	07300965	Turkey Creek near Gould, Oklahoma	Lat 34°41'00", long 099°39'59", in NW 1/4 SW 1/4 SW 1/4 sec. 31, T. 3 N., R. 23 W., on Jackson-Harmon County-line, Oklahoma, hydrologic unit 11120202, at county road bridge 1.2 miles north of U.S. Highway 62 at the Jackson-Harmon County-line.	76.9	03-27-86 08-26-87 02-18-88	0.70 4.11 4.20

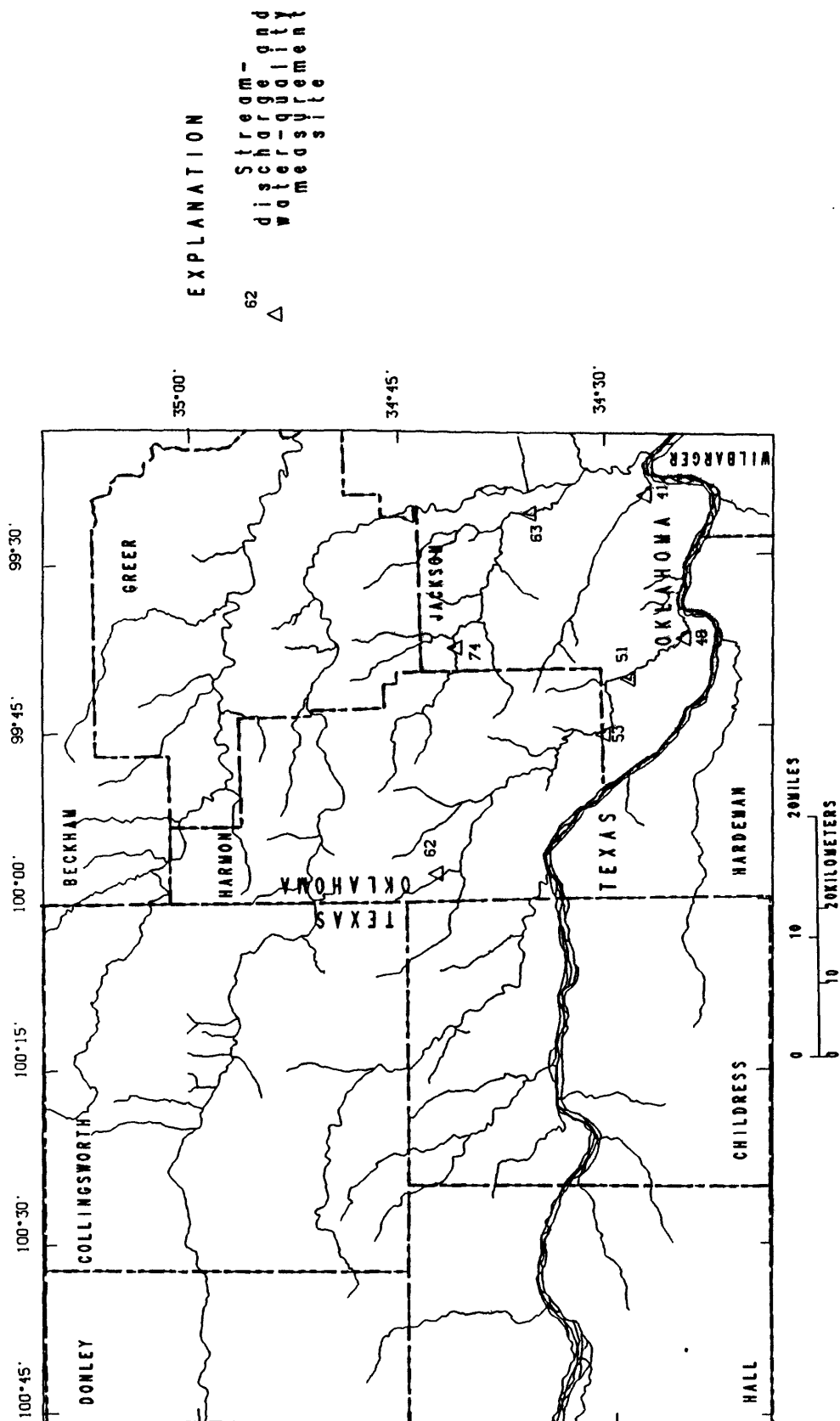


Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area, (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
76	07300960	Turkey Creek near McQueen, Oklahoma	Lat 34°42'18", long 099°42'06", in SE 1/4 SE 1/4 NE 1/4 sec. 27, T. 3 N., R. 24 W.; Harmon County, Oklahoma, hydrologic unit 11120202, at county road bridge 2.7 miles north of U.S. Highway 62 at McQueen.	51.5	08-26-87 02-18-88	0.97 0.26
77	07299560	Buck Creek near Hollis, Oklahoma	Lat 34°35'12", long 099°58'52", in NW 1/4 NW 1/4 SW 1/4 sec 6, T. 1 N., R. 26 W., Harmon County, Oklahoma, hydrologic unit 11120105, at county road bridge 2 miles west of Hollis on U.S. Highway 62, 6 miles south on State Highway 30, then 1 mile west and 0.5 mile south of county road.	274	08-25-87 02-17-88	no flow 9.61
78	07299553	Settlers Creek near Hollis, Oklahoma	Lat 34°38'42", long 100°04'43", in Childress County, Texas, hydrologic unit 11120105, at county road bridge 10 miles west of Hollis on U.S. Highway 62, then 2 miles south and 0.25 mile east to bridge.	13.3	08-25-87 02-17-88	no flow no flow
79	07299550	Buck Creek near Childress, Texas	Lat 34°36'42", long 100°06'38", in Childress County, Texas, hydrologic unit 11120105, at county road bridge 10 miles west of Hollis, Oklahoma, on U.S. Highway 62, then 3 miles south, 1 mile west and 1.5 miles south-southwest.	222	08-25-87 02-17-88	1.17 12.2
80	07299548	Buck Creek near Loco, Texas	Lat 34°40'09", long 100°09'24", in Childress County, Texas, hydrologic unit 11120105 at U.S. Highway 62 bridge about 14.5 miles west of Hollis, Oklahoma, or 1.8 miles east of junction U.S. Highways 62 and 83.	205	08-25-87 02-17-88	1.98 11.8

Table 5.—Low-flow stream-discharge measurements in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Stream name	Location	Drainage area, (mi <sup>2</sup> )	Measurement date	Discharge in (ft <sup>3</sup> /sec)
81	07299547	Twin Mill Branch near Loco, Texas	Lat 34°40'52", long 100°11'12", in Childress County, Texas, hydrologic unit 11120105, 1/4 mile east of U.S. Highway 83, 1.4 miles north of junction of U.S. Highways 62 and 83, then walk downstream to a point below the confluence of the south and west branches of the stream.	9.88	08-25-87 02-17-88	no flow no flow
82	07299545	Buck Creek at Loco, Texas	Lat 34°42'10", long 100°11'16", in Childress County, Texas, hydrologic unit 11120105, at U.S. Highway 83 bridge 1 mile north of junction of U.S. Highways 62 and 83 about 13.8 miles south of Wellington, Texas.	175	08-25-87 02-17-88	2.71 10.9
83	072995445	House Log Creek near Wellington, Texas	Lat 34°47'26", long 100°14'20", in Collingsworth County, Texas, hydrologic unit 11120105, at county road bridge 4 miles south of Wellington on U.S. Highway 83, then about 2.5 miles west on county road.	16.4	02-17-88	0.24
84	072995440	Buck Creek near Rolla, Texas	Lat 34°49'10", long 100°16'34", in Collingsworth County, Texas, hydrologic unit 11120105, at State Highway 338 bridge 4 miles west and 2.1 miles south of junction U.S. Highway 83 and State Highway 338 in Wellington.	103	08-25-87 02-17-88	no flow 4.02
85	072995435	Buck Creek near Quail, Texas	Lat 34°50'35", long 100°20'47", in Collingsworth County, Texas, hydrologic unit 11120105, at county road bridge 0.4 miles south of State Highway 338 at a point 8 miles west of junction State Highway 338 and U.S. Highway 83, in Wellington.	79.3	02-17-88	3.42



**Figure 20.** Location of miscellaneous stream-discharge and field water-quality measurement sites in southwestern Oklahoma (index numbers on map refer to sites in table 6).

Table 6.—Miscellaneous stream-discharge measurements and field water-quality properties in southwestern Oklahoma.

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; —, no data]

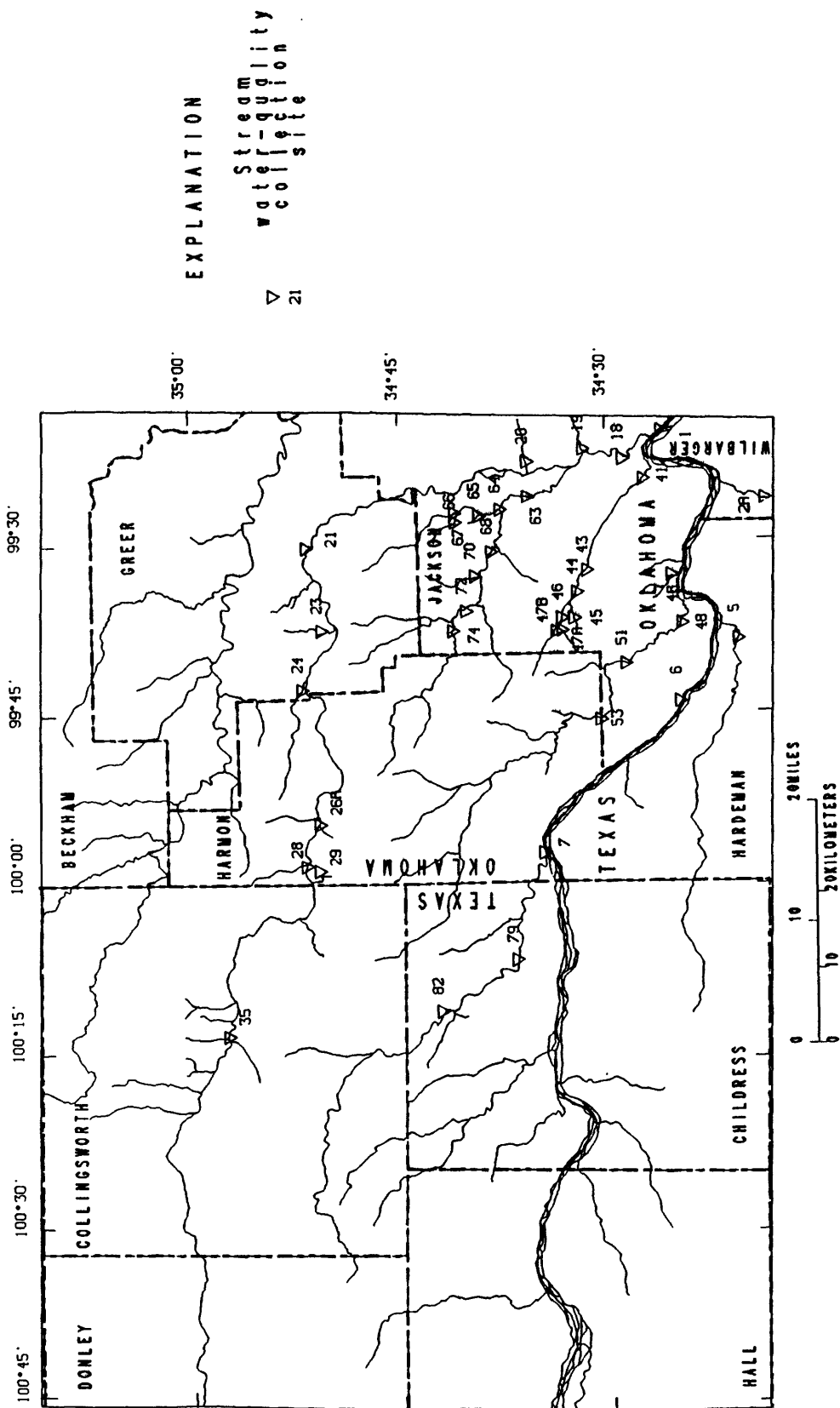
Index number on map	Station number	Date	Time	Station name	County (ft <sup>3</sup> /sec) (00061)	Specific con- duct- ance (us/cm) (00095)	pH (units) (00400)	Temper- ature	
								air (°C) (00020)	water (°C) (00010)
41	07299780	11-21-86	1240	Gypsum Creek near Olustee, Oklahoma	Jackson	18	10100	8.2	13.0
		02-09-87	1030	Gypsum Creek near Olustee, Oklahoma	Jackson	116	4170	8.2	7.0
		03-10-87	1815	Gypsum Creek near Olustee, Oklahoma	Jackson	9.9	1010	7.9	8.0
		04-22-87	1710	Gypsum Creek near Olustee, Oklahoma	Jackson	12	12600	7.6	19.0
		06-11-87	1210	Gypsum Creek near Olustee, Oklahoma	Jackson	953	912	7.3	23.0
		07-29-87	1625	Gypsum Creek near Olustee, Oklahoma	Jackson	6.2	10900	7.4	31.0
		09-17-87	1113	Gypsum Creek near Olustee, Oklahoma	Jackson	7.6	12500	7.8	22.0
		10-28-87	1010	Gypsum Creek near Olustee, Oklahoma	Jackson	8.5	12600	7.6	15.0
		12-09-87	0950	Gypsum Creek near Olustee, Oklahoma	Jackson	9.6	11800	7.8	7.0
		01-27-88	1410	Gypsum Creek near Olustee, Oklahoma	Jackson	12	10100	7.9	8.0
48	07299716	03-08-88	1100	Gypsum Creek near Olustee, Oklahoma	Jackson	17	9480	7.9	10.0
		11-20-86	1658	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	22	9460	8.1	16.0
		02-05-87	1810	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	78	6040	8.3	9.0
		03-10-87	1705	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	22	7630	7.6	10.0
		04-22-87	1610	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	15	10100	7.6	20.0
		06-11-87	1315	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	74	6750	7.4	24.0
		07-30-87	1015	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	18	9990	7.7	25.0
		09-17-87	1210	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	11	11000	7.6	22.5
		10-28-87	1130	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	15	8170	7.7	15.0
		12-09-87	1055	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	15	10700	7.6	9.0
51	07299710	01-27-88	1507	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	16	9340	7.8	9.5
		03-08-88	1240	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	21	8230	7.9	13.0
		11-19-86	1635	Sandy Creek near Eldorado, Oklahoma	Jackson	10	8980	7.9	15.0
		02-05-87	1620	Sandy Creek near Eldorado, Oklahoma	Jackson	205	2290	8.3	9.0
		03-10-87	1515	Sandy Creek near Eldorado, Oklahoma	Jackson	14	7420	7.6	11.0
		04-22-87	1300	Sandy Creek near Eldorado, Oklahoma	Jackson	8.8	10100	7.6	16.0
		06-11-87	1415	Sandy Creek near Eldorado, Oklahoma	Jackson	55	375	7.2	24.0
		07-30-87	1400	Sandy Creek near Eldorado, Oklahoma	Jackson	8.6	10000	7.8	28.0
		09-17-87	1418	Sandy Creek near Eldorado, Oklahoma	Jackson	7.7	—	31.0	24.0
		10-28-87	1430	Sandy Creek near Eldorado, Oklahoma	Jackson	9.9	9930	7.7	20.0
		12-09-87	1250	Sandy Creek near Eldorado, Oklahoma	Jackson	9.0	10600	7.6	10.5
		01-27-88	1643	Sandy Creek near Eldorado, Oklahoma	Jackson	11	9650	7.8	11.0
		03-08-88	1430	Sandy Creek near Eldorado, Oklahoma	Jackson	12	8410	7.8	13.0

Table 6.—Miscellaneous stream-discharge measurements and field water-quality properties in southwestern Oklahoma—Continued

Index number on location map	Station number	Date	Time	Station name	County (00061)	Stream flow, Specific			pH (units) (00400)	Temper- ature	
						instan- taneous (ft <sup>3</sup> /sec) (00061)	con- duce (us/cm) (00095)	ance		air (°C) (00020)	water (°C) (00010)
53	072997092	11-19-86	1400	Sandy Creek at Lincoln, Oklahoma	Harmon	4.0	8670	8.0	22.0	16.0	16.0
		02-05-87	1400	Sandy Creek at Lincoln, Oklahoma	Harmon	10	5440	7.5	10.0	9.0	9.0
		03-10-87	1415	Sandy Creek at Lincoln, Oklahoma	Harmon	3.8	8220	7.8	6.0	13.0	13.0
		04-22-87	1345	Sandy Creek at Lincoln, Oklahoma	Harmon	4.9	11700	7.7	21.0	—	—
		06-11-87	1530	Sandy Creek at Lincoln, Oklahoma	Harmon	555	458	6.6	31.0	25.0	25.0
		07-30-87	1314	Sandy Creek at Lincoln, Oklahoma	Harmon	6.6	10100	7.8	30.0	27.0	27.0
		09-17-87	1455	Sandy Creek at Lincoln, Oklahoma	Harmon	3.1	11700	7.9	31.0	27.0	27.0
		10-28-97	1515	Sandy Creek at Lincoln, Oklahoma	Harmon	3.9	10700	7.8	18.0	20.0	20.0
		12-09-87	1340	Sandy Creek at Lincoln, Oklahoma	Harmon	3.6	11100	7.6	14.0	10.0	10.0
		01-27-88	1713	Sandy Creek at Lincoln, Oklahoma	Harmon	4.6	10200	7.7	—	—	—
62	07299705	03-08-88	1508	Sandy Creek at Lincoln, Oklahoma	Harmon	6.3	8940	8.0	19.0	16.0	16.0
		11-11-86	1543	Bitter Creek near Hollis, Oklahoma	Harmon	0.2	6130	8.5	5.0	10.0	10.0
		01-28-87	1042	Bitter Creek near Hollis, Oklahoma	Harmon	2.5	5150	8.6	14.0	6.0	6.0
		03-11-87	1320	Bitter Creek near Hollis, Oklahoma	Harmon	0.36	4730	8.1	14.0	19.0	19.0
		04-23-87	1059	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		06-11-87	1640	Bitter Creek near Hollis, Oklahoma	Harmon	2.6	3110	7.8	31.0	31.0	31.0
		07-31-87	1144	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		09-18-87	1400	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		10-29-87	1531	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		12-10-87	1411	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
63	07301100	01-28-88	1430	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		03-09-88	1316	Bitter Creek near Hollis, Oklahoma	Harmon	no flow	—	—	—	—	—
		11-20-86	1320	Turkey Creek at Olustee, Oklahoma	Jackson	59	4920	8.2	23.0	13.0	13.0
		02-06-87	1235	Turkey Creek at Olustee, Oklahoma	Jackson	130	2820	8.3	—	8.0	8.0
		03-10-87	0915	Turkey Creek at Olustee, Oklahoma	Jackson	75	3920	7.7	5.0	9.0	9.0
		04-22-87	1825	Turkey Creek at Olustee, Oklahoma	Jackson	46	5670	7.7	24.0	19.0	19.0
		06-11-87	1045	Turkey Creek at Olustee, Oklahoma	Jackson	1690	1130	7.1	27.0	22.0	22.0
		07-29-87	1740	Turkey Creek at Olustee, Oklahoma	Jackson	26	5300	7.6	34.0	28.0	28.0
		09-17-87	1025	Turkey Creek at Olustee, Oklahoma	Jackson	19	5010	7.5	24.0	22.0	22.0
		10-28-87	0845	Turkey Creek at Olustee, Oklahoma	Jackson	24	4280	7.5	16.0	14.0	14.0
		12-09-87	0900	Turkey Creek at Olustee, Oklahoma	Jackson	32	5740	7.6	11.0	6.0	6.0
		01-27-88	1320	Turkey Creek at Olustee, Oklahoma	Jackson	28	5080	8.0	19.0	7.0	7.0
		03-08-88	0950	Turkey Creek at Olustee, Oklahoma	Jackson	61	3680	7.8	11.0	11.0	11.0

Table 6.—Miscellaneous stream-discharge measurements and field water-quality properties in southwestern Oklahoma—Continued

Index number on map	Station number	Date	Time	Station name	County (ft <sup>3</sup> /sec) (00061)	Stream flow, instan- taneous	Specific con- duct- ance (us/cm) (00095)	pH (units) (00400)	Temper- ature air (°C) (00020)	Temper- ature water (°C) (00010)
74	07300970	11-11-86	1125	Turkey Creek near Duke, Oklahoma	Jackson	18	4930	7.8	11.5	9.0
		01-27-87	1415	Turkey Creek near Duke, Oklahoma	Jackson	19	5880	7.9	19.0	9.5
		03-10-87	1145	Turkey Creek near Duke, Oklahoma	Jackson	22	4220	7.6	5.0	9.0
		04-22-87	1105	Turkey Creek near Duke, Oklahoma	Jackson	10	6680	7.5	21.0	15.0
		06-11-87	1810	Turkey Creek near Duke, Oklahoma	Jackson	479	1440	7.3	31.0	23.0
		07-30-87	1750	Turkey Creek near Duke, Oklahoma	Jackson	12	7100	7.6	38.0	28.0
		09-18-87	1140	Turkey Creek near Duke, Oklahoma	Jackson	6.9	6810	7.6	20.0	17.5
		10-29-87	1035	Turkey Creek near Duke, Oklahoma	Jackson	7.3	6840	7.5	32.0	16.5
		12-10-87	1000	Turkey Creek near Duke, Oklahoma	Jackson	8.2	6950	7.5	12.5	9.5
		01-28-88	1010	Turkey Creek near Duke, Oklahoma	Jackson	10	5440	7.5	—	10.0
		03-09-88	1017	Turkey Creek near Duke, Oklahoma	Jackson	14	5230	7.8	19.0	16.0



**Figure 21.** Location of stream water-quality collection sites sampled during low-flow periods in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites in table 7a).

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; mg/L, milligrams per liter; ug/L, micrograms per liter; USGS, U.S. Geological Survey; USGS, U.S. Geological Survey National Water Quality Laboratory; OSDH, Oklahoma State Department of Health Laboratory (now Oklahoma Department of Environmental Quality Laboratory); \*, dissolved constituent; \*\*, lab measurement; —, no data; <, less than; +, calculated]

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)
1	07301150	03-26-86	0930	Red River near Elmer, Oklahoma	Jackson	USGS	USGS	72
2A	07299732	03-25-86	1130	Wanderers Creek near Odell, Texas	Wilbarger	USGS	USGS	2.9
4B	07299718	03-26-86	1530	Tributary to Red River near Eldorado, Oklahoma	Jackson	USGS	USGS	0.03
5	07299580	03-25-86	1250	Groesbeck Creek near Quannah, Texas	Hardeman	USGS	USGS	4.9
6	07299570	03-26-86	1112	Red River near Quannah, Texas	Hardeman	USGS	USGS	6.7
7	07299565	08-26-87	0830	Red River near Quannah, Texas	Hardeman	USGS	OSDH	12
		02-17-88	1730	Red River near Quannah, Texas	Hardeman	USGS	OSDH	37
		03-25-86	1430	Red River near Hollis, Oklahoma	Harmon	USGS	USGS	6.6
		08-26-87	1130	Red River near Hollis, Oklahoma	Harmon	USGS	OSDH	7.9
		02-18-88	1030	Red River near Hollis, Oklahoma	Harmon	USGS	OSDH	30
18	07301110	03-25-86	1030	Salt Fork Red River near Elmer, Oklahoma	Jackson	USGS	USGS	38
19	07301105	03-26-86	0825	Tributary to Salt Fork Red River near Elmer, Oklahoma	Jackson	USGS	USGS	0.83
20	07300600	03-25-86	0945	Bitter Creek near Altus, Oklahoma	Jackson	USGS	USGS	7.2
21	07300500	03-24-86	1735	Salt Fork Red River at Mangum, Oklahoma	Greer	USGS	USGS	20
23	07300485	03-24-86	1245	Mulberry Creek near Mangum, Oklahoma	Greer	USGS	USGS	0.69
24	07300470	03-24-86	1320	Cave Creek near Reed, Oklahoma	Greer	USGS	USGS	0.19
26A	07300400	08-26-87	1130	Salt Fork Red River near Vinson, Oklahoma	Harmon	USGS	OSDH	17
28	07300145	02-18-88	1100	Salt Fork Red River near Vinson, Oklahoma	Harmon	USGS	OSDH	41
		03-24-86	1505	Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGS	17
		03-24-86	1535	Tributary to Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGS	0.47
35	07300000	08-26-87	1330	Salt Fork Red River near Wellington, Texas	Collingsworth	USGS	OSDH	7.4
41	07299780	03-27-86	1100	Gypsum Creek near Olustee, Oklahoma	Jackson	USGS	USGS	5.6
43	07299770	08-25-87	1217	Gypsum Creek near Olustee, Oklahoma	Jackson	USGS	USGS	6.9
		08-25-87	1218	Gypsum Creek near Olustee, Oklahoma	Jackson	USGS	OSDH	6.9
		08-25-87	1635	Gypsum Creek at Creta, Oklahoma	Jackson	USGS	OSDH	7.4
44	07299768	02-17-88	1215	Gypsum Creek at Creta, Oklahoma	Jackson	USGS	OSDH	8.5
45	07299766	08-26-87	0910	Gypsum Creek near Prairie Hill, Oklahoma	Jackson	USGS	OSDH	6.2
46	07299764	03-27-86	1315	Tributary to Gypsum Creek near Eldorado, Oklahoma	Jackson	USGS	USGS	0.65
47A	07299762	03-27-86	1140	Gypsum Creek near Duke, Oklahoma	Jackson	USGS	USGS	3.6
		03-27-86	1405	Tributary to Gypsum Creek north of Eldorado, Oklahoma	Jackson	USGS	USGS	0.52



Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)
47B	07299760	03-27-86	1409	Gypsum Creek north of Eldorado, Oklahoma	Jackson	USGS	USGSL	1.2
48	07299716	03-26-86	1305	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	USGS	USGSL	8.6
		08-25-87	1030	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	USGS	USGSL	14
		08-25-87	1031	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	USGS	OSDH	14
51	07299710	08-25-87	1315	Sandy Creek near Eldorado, Oklahoma	Jackson	USGS	OSDH	11
		02-17-88	1100	Sandy Creek near Eldorado, Oklahoma	Jackson	USGS	OSDH	10
53	072997092	03-25-86	1610	Sandy Creek at Lincoln, Oklahoma	Harmon	USGS	USGSL	1.9
		08-26-87	0850	Sandy Creek at Lincoln, Oklahoma	Harmon	USGS	OSDH	4.1
		02-17-88	1325	Sandy Creek at Lincoln, Oklahoma	Harmon	USGS	OSDH	5.3
63	07301100	03-24-86	1320	Turkey Creek at Olustee, Oklahoma	Jackson	USGS	USGSL	6.3
		08-25-87	0900	Turkey Creek at Olustee, Oklahoma	Jackson	USGS	OSDH	17
64	07301050	03-25-86	1331	Turkey Creek near Altus, Oklahoma	Jackson	USGS	USGSL	8.4
65	07301040	03-25-86	1540	Tributary to Horse Branch at Victory, Oklahoma	Jackson	USGS	USGSL	0.51
66	07301020	03-25-86	1640	Horse Branch near Victory, Oklahoma	Jackson	USGS	USGSL	0.47
67	07301030	03-25-86	1805	Tributary to Horse Branch northwest of Victory, Oklahoma	Jackson	USGS	USGSL	0.10
68	07300995	08-25-87	1430	Turkey Creek near Prairie Hill, Oklahoma	Jackson	USGS	OSDH	20
		02-17-88	1250	Turkey Creek near Prairie Hill, Oklahoma	Jackson	USGS	OSDH	26
70	07300990	03-26-86	1145	Spring Branch at Duke, Oklahoma	Jackson	USGS	USGSL	0.54
72	07300980	03-26-86	1625	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	Jackson	USGS	USGSL	4.0
74	07300970	08-26-87	1300	Turkey Creek near Duke, Oklahoma	Jackson	USGS	USGSL	10
		08-26-87	1301	Turkey Creek near Duke, Oklahoma	Jackson	USGS	USGSL	10
		02-17-88	1900	Turkey Creek near Duke, Oklahoma	Jackson	USGS	OSDH	10
79	07299550	08-25-87	1030	Buck Creek near Childress, Texas	Childress	USGS	USGSL	1.2
		08-25-87	1031	Buck Creek near Childress, Texas	Childress	USGS	USGSL	1.2
82	07299545	08-25-87	1830	Buck Creek at Loco, Texas	Childress	USGS	OSDH	2.7

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Specific conductance, field (us/cm) (00095)	pH, field (units) (00400)	Temperature, water (°C) (00010)	Hardness, total (mg/L) (00900)	Alkalinity, lab (mg/L) (90410)	Solids, residue at 105°C, total (mg/L) (00500)	Solids, residue at 180°C, dissolved (mg/L) (70300)	Calcium, total recoverable (mg/L) (*00915 00916)	Magnesium, total recoverable (mg/L) (*00925 00927)	Sodium, total recoverable (mg/L) (*00930 00929)	Sodium, adsorption ratio (00931)	Potassium, total recoverable (mg/L) (*00935 00937)
03-26-86	9740**	8.0	15.0	2200	137	—	6970	580*	180*	1700*	16	11*
03-25-86	3290**	7.8	16.0	1300	250	—	2570	290*	150*	300*	4	4.3*
03-26-86	6500	8.0	19.5	3000	182	—	5440	610*	350*	560*	4	17*
03-25-86	4500**	8.1	18.5	2000	157	—	3680	580*	130*	360*	4	7.8*
03-26-86	23000**	8.0	19.5	3200	139	—	16400	880*	250*	5200*	40	21*
08-26-87	18600	7.9	22.5	2800	105	13130	—	620	160	3300	31	18
02-17-88	22300	8.0	6.0	2900	135	16130	—	640	170	4100	37	20
03-25-86	31000**	8.0	22.5	3500	138	—	22900	1000*	250*	7400*	54	22*
08-26-87	23500	8.0	25.0	3200	95	17450	—	740	180	4800	41	17
02-18-88	29500	6.8	4.0	3500	122	21900	—	710	170	5800	51	22
03-25-86	4500	8.0	19.0	1800	151	—	3490	480*	150*	420*	4	6.9*
03-26-86	9200	7.7	13.0	2700	191	—	6150	550*	330*	1200*	10	4.2*
03-25-86	4700	7.7	15.5	1500	215	—	3400	320*	170*	520*	6	8.0*
03-24-86	3600	8.1	21.5	1700	117	—	3100	470*	120*	240*	3	6.0*
03-24-86	2000	7.9	23.0	1000	155	—	1600	340*	40*	34*	0.5	2.5*
03-24-86	3150	7.8	16.0	1800	108	—	2880	580*	90*	100*	1	4.7*
08-26-87	3370	7.9	26.0	1800	95	3110	—	460	93	170	2	6.6
02-18-88	2990	7.9	5.5	1900	161	2450	—	360	79	180	2	4.7
03-24-86	3100**	8.1	23.5	1500	114	—	2630	430*	100*	230*	3	5.0*
03-24-86	762**	7.8	19.0	260	236	—	495	73*	20*	62*	2	1.5*
08-26-87	3370	8.1	30.5	1800	105	2970	—	490	85	160	2	6.2
03-27-86	12500	7.8	20.0	3100	151	—	8800	840*	240*	1900*	15	13*
08-25-87	11900	7.7	27.0	—	105	9160	8430	760	210	1700	14	15*
08-25-87	11900	7.7	27.0	3000	100	8470	—	710	200	1600	14	5.3
08-25-87	11800	7.7	28.0	3000	119	8120	—	710	180	1500	13	14
02-17-88	11800	8.0	10.0	3300	163	8330	—	710	190	1500	13	14
08-26-87	11500	7.7	27.0	2800	145	8030	—	700	180	1500	13	14
03-27-86	6840**	8.1	20.0	2300	132	—	5210	700*	130*	820*	7	8.8*
03-27-86	14300	8.1	20.0	3200	135	—	9970	900*	240*	2400*	18	15*
03-27-86	18000	8.2	29.0	3700	114	—	12200	1000*	280*	2900*	21	18*

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Specific conductance, field (us/cm) (00095)	pH, field (units) (00400)	Temperature, water (°C) (00010)	Hardness, total (mg/L) (00900)	Alkalinity, lab (mg/L) (90410)	Solids, residue at 105°C, total (mg/L) (00500)	Solids, residue at 180°C, dissolved (mg/L) (70300)	Calcium, total recoverable (mg/L) (*00915 00916)	Magnesium, total recoverable (mg/L) (*00925 00927)	Sodium, total recoverable (mg/L) (*00930 00929)	Sodium adsorption ratio (00931)	Potassium, total recoverable (mg/L) (*00935 00937)
03-27-86	20000	8.1	22.0	3700	112	—	13700	1000*	300*	3500*	25	20*
03-26-86	13500	8.1	21.0	2800	156	—	9450	760*	210*	2300*	19	15*
08-25-87	11300	7.9	25.5	—	121	8130	7540	590	170	1500	13	13*
08-25-87	11300	7.9	25.5	2600	111	7770	—	650	160	1500	14	14
08-25-87	9560	8.2	28.0	2700	54	7250	—	590	160	1300	12	13
02-17-88	8700	7.7	9.5	3200	169	7490	—	670	150	1300	12	11
03-25-86	12500	8.3	22.0	2700	100	—	8240	800*	180*	1800*	15	13*
08-26-87	9900	7.5	22.0	2900	153	7550	—	700	160	1300	12	13
02-17-88	9300	7.9	14.0	3600	163	7740	—	670	150	1300	12	12
03-24-86	5480**	7.6	17.5	2300	157	—	4480	640*	180*	530*	5	8.9*
08-25-87	5560	6.8	24.0	2400	167	4490	—	600	140	460	4	11
03-25-86	5270	7.9	18.5	2100	148	—	4270	610*	150*	480*	5	8.9*
03-25-86	9320	8.2	20.0	3300	91	—	7390	740*	360*	1200*	9	9.5*
03-25-86	7930**	8.2	20.0	2900	96	—	6250	680*	300*	960*	8	9.1*
03-25-86	17800	8.3	19.5	4600	73	—	13100	1000*	500*	2900*	19	6.6*
08-25-87	5520	7.2	26.5	2300	162	4560	—	580	150	470	5	11
02-17-88	5550	8.0	9.5	2200	189	4440	—	570	140	440	4	10
03-26-86	3180	7.5	16.5	1900	178	—	2950	630*	80*	85*	0.8	5.5*
03-26-86	5950	7.9	19.5	2300	181	—	4800	640*	170*	620*	6	10*
08-26-87	7110	6.9	24.5	2500	161	5540	—	610	170	730	7	14
08-26-87	7110	6.9	24.5	—	185	5770	5550	630	170	780	7	12*
02-17-88	7070	7.9	12.0	2000	174	4580	—	590	170	710	7	13
08-25-87	3890	8.1	28.5	2100	107	4740	—	530	130	190	2	6.6
08-25-87	3890	8.1	28.5	—	102	3550	3450	530	130	180	2	5.5*
08-25-87	3670	8.1	29.0	2000	110	3290	—	510	110	160	2	5.1

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Bicar- bonate, incre- mental titra- tion, lab (mg/L) (90440)	Car- bonate, incre- mental titra- tion, lab (mg/L) (90445)	Sulfate dis- solved (mg/L) (00945)	Chlo- ride, dis- solved (mg/L) (00940)	Fluo- ride, dis- solved (mg/L) (+00950 00951)	Bromide, dis- solved (mg/L) (71870)	Iodide, dis- solved (mg/L) (71865)	Silica, dis- solved (mg/L) (00955)	Nitro- gen, nitrite+ nitrate, (mg/L) (*00631 00630)	Nitro- gen, ammonia total (mg/L) (00610)	Phos- phorus, ortho, total (mg/L) (70507)	Alum- inum, total recoverable (ug/L) (01105)	Anti- mony, total (ug/L) (01097)	Arsenic, total (ug/L) (*01000 01002)
03-26-86	167+	0+	1900	2500	0.50*	2.2	—	6.3	0.690*	—	—	—	—	1*
03-25-86	305+	0+	1100	380	1.0*	1.1	—	5.9	1.20*	—	—	—	—	2*
03-26-86	222+	0+	2400	890	0.50*	2.1	—	0.80	0.400*	—	—	—	—	<1*
03-25-86	192+	0+	1600	660	0.40*	0.88	—	3.3	1.30*	—	—	—	—	1*
03-26-86	170+	0+	3100	7800	0.50*	3.0	—	13	0.680*	—	—	—	—	2*
08-26-87	128	0	2500	6100	0.6	2.4	0.049	—	<0.500	<0.100	0.092	1400	<350	<60
02-17-88	165	0	2400	5100	0.7	1.2	0.028	—	0.800	<0.100	0.110	1600	<350	<60
03-25-86	168+	0+	3600	12000	0.60*	2.7	—	13	0.260*	—	—	—	—	2*
08-26-87	116	0	2500	8800	0.6	2.1	0.043	—	<0.500	<0.100	0.056	2600	<350	<60
02-18-88	149	0	2700	8300	0.8	1.1	0.029	—	<0.500	<0.100	0.140	810	<350	<60
03-25-86	184+	0+	1600	620	0.50*	1.2	—	5.8	0.510*	—	—	—	—	2*
03-26-86	233+	0+	1800	2100	0.90*	3.5	—	2.2	5.10*	—	—	—	—	1*
03-25-86	262+	0+	1200	790	0.70*	2.2	—	6.8	3.30*	—	—	—	—	3*
03-24-86	143+	0+	1500	310	0.60*	0.56	—	12	0.310*	—	—	—	—	1*
03-24-86	190+	0+	790	28	0.50*	0.14	—	15	7.50*	—	—	—	—	1*
03-24-86	132+	0+	1600	120	0.40*	0.09	—	4.2	1.50*	—	—	—	—	1*
08-26-87	116	0	1600	250	0.5	0.22	0.012	—	<0.500	<0.100	0.030	890	<350	<10
02-18-88	196	0	1200	260	0.7	1.4	0.044	—	1.00	<0.100	<0.005	470	<350	<60
03-24-86	139+	0+	1300	280	0.60*	0.28	—	15	0.780*	—	—	—	—	1*
03-24-86	288+	0+	110	17	0.60*	0.87	—	28	4.80*	—	—	—	—	3*
08-26-87	128	0	1500	250	0.5	0.25	0.008	—	1.50	<0.100	0.032	<300	<350	<10
03-27-86	184+	0+	2300	3500	0.40*	4.5	—	6.6	1.70*	—	—	—	—	1*
08-25-87	128+	0+	2200	3000	0.40*	0.04	0.033	8.4	2.30	<0.250	<0.010	2000	<1	<2
08-25-87	122	0	2100	3100	0.4	4.3	0.051	—	2.20	<0.100	0.039	2500	<350	<60
08-25-87	145	0	2100	2900	0.4	3.4	0.047	—	2.80	<0.100	0.024	<300	<350	<60
02-17-88	199	0	2000	2800	0.4	3.2	0.042	—	2.30	<0.100	0.040	<300	<350	<60
08-26-87	177	0	2000	2900	0.4	3.3	0.044	—	2.90	<0.100	<0.005	4900	<350	<60
03-27-86	161+	0+	1800	1300	0.40*	1.6	—	12	3.00*	—	—	—	—	1*
03-27-86	165+	0+	2200	4100	0.40*	4.6	—	11	2.30*	—	—	—	—	1*
03-27-86	139+	0+	2600	5400	0.40*	2.0	—	11	2.20*	—	—	—	—	1*

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Bicar- bonate, incre- mental titra- tion, lab (mg/L) (90440)	Car- bonate, incre- mental titra- tion, lab (mg/L) (90445)	Sulfate dis- solved (mg/L) (00945)	Chlo- ride, dis- solved (mg/L) (00940)	Fluo- ride, dis- solved (mg/L) (*00950 00951)	Bromide, dis- solved (mg/L) (71870)	Iodide, dis- solved (mg/L) (71865)	Silica, dis- solved (mg/L) (00355)	Nitro- gen, nitrite, total (mg/L) (*00631 00630)	Nitro- gen, ammonia total (mg/L) (00610)	Phos- phorus, ortho, total (mg/L) (70507)	Alum- inum, total reco- verable (ug/L) (01105)	Anti- mony, total (ug/L) (01097)	Arsenic, total (ug/L) (*01000 01002)
03-27-86	137+	0+	2800	6500	0.40*	8.2	—	8.9	0.730*	—	—	—	—	1*
03-26-86	190+	0+	2100	3800	0.50*	4.6	—	8.4	2.50*	—	—	—	—	1*
08-25-87	148+	0+	2400	2600	0.50*	2.2	0.034	8.8	3.10	<0.210	<0.020	1100	<1	<2
08-25-87	135	0	2000	2800	0.5	2.3	0.045	—	2.80	<0.100	<0.005	1000	<350	<60
08-25-87	66	0	2000	2400	0.5	1.4	0.034	—	2.20	0.111	<0.005	1100	<350	<60
02-17-88	206	0	2000	2400	0.5	2.3	0.043	—	3.40	<0.100	0.040	1200	<350	<60
03-25-86	122+	0+	2100	3000	0.40*	1.1	—	8.7	2.20*	—	—	—	—	2*
08-26-87	187	0	2000	2500	0.5	1.1	0.037	—	3.20	0.111	<0.005	2200	<350	<60
02-17-88	199	0	2000	2600	0.5	3.2	0.032	—	3.70	0.160	0.040	<300	<350	<60
03-24-86	192+	0+	1900	880	0.03*	1.6	—	5.7	2.60*	—	—	—	—	1*
08-25-87	204	0	1900	830	0.4	1.2	0.027	—	4.50	<0.100	<0.005	1400	<350	<10
03-25-86	181	0	1900	800	0.30*	1.2	—	6.2	2.60*	—	—	—	—	1*
03-25-86	111+	0+	2500	2400	0.50*	8.6	—	0.20	0.440*	—	—	—	—	<1*
03-25-86	117+	0+	2300	1700	0.50*	5.1	—	0.50	0.970*	—	—	—	—	<1*
03-25-86	89+	0+	2900	5900	0.80*	22	—	5.0	15*	—	—	—	—	<1*
08-25-87	198	0	1800	850	0.4	1.4	0.030	—	4.00	<0.100	<0.005	2800	<350	<10
02-17-88	231	0	1900	650	0.4	0.27	0.009	—	4.20	<0.100	0.040	510	<350	<60
03-26-86	217+	0+	1400	200	0.30*	0.49	—	15	4.60*	—	—	—	—	1*
03-26-86	221+	0+	2000	940	0.40*	1.4	—	5.3	1.90*	—	—	—	—	1*
08-26-87	196+	0+	2000	1300	0.4	1.7	0.035	—	2.10	0.111	<0.005	800	<350	<10
08-26-87	226+	0+	2200	1300	0.40*	1.8	0.026	12	2.50	0.210	0.010	670	<1	<1
02-17-88	212	0	1500	1200	0.3	0.29	0.007	—	2.40	<0.100	0.050	550	<350	<60
08-25-87	131+	0+	1800	330	0.6	0.31	0.015	—	<0.500	<0.100	<0.005	<300	<350	<10
08-25-87	124+	0+	1900	330	0.60*	0.40	0.010	20	<0.100	0.150	<0.010	60	1	2
08-25-87	134	0	1700	300	0.7	0.29	0.009	—	3.50	<0.100	<0.005	<300	<350	<10

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

[illegible]

Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Barium,			Beryllium,			Boron,			Cadmium,			Chromium,			Cobalt,			Copper,			Iron,			Lead,			Lithium,			Manganese,			Mercury,			Molybdenum,			Nickel,					
	total	recov- erable	(ug/L) (01007)	total	recov- erable	(ug/L) (01012)	total	recov- erable	(ug/L) (01020) (*01022) (01022)	total	recov- erable	(ug/L) (01025) (*01027) (01027)	total	recov- erable	(ug/L) (01030) (*01034) (01034)	total	recov- erable	(ug/L) (01037) (01037)	total	recov- erable	(ug/L) (01042) (01042)	total	recov- erable	(ug/L) (01046) (*01045) (01045)	total	recov- erable	(ug/L) (01049) (*01049) (01051)	total	recov- erable	(ug/L) (01132) (01132)	total	recov- erable	(ug/L) (01055) (01055)	total	recov- erable	(ug/L) (71900) (71900)	total	recov- erable	(ug/L) (01062) (01062)	total	recov- erable	(ug/L) (01067) (01067)			
03-27-86	—	—	—	—	—	—	1900*	3.0*	—	—	—	30*	—	—	—	—	—	—	—	—	—	50*	—	—	<1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
03-26-86	—	—	—	—	—	—	920*	2.0*	—	—	—	20*	—	—	—	—	—	—	—	—	—	40*	—	—	1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
08-25-87	300	—	—	<10	—	—	960*	<10	—	<60	—	<1	<10	—	—	<3	—	<60	—	<3	—	620	—	—	<5	150	—	—	—	—	—	—	140	—	—	—	140	—	—	<0.10	—	<5	<100	—	<100
08-25-87	90	—	—	<10	—	—	770	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	690	—	—	<45	—	—	—	—	—	—	140	—	—	—	140	—	—	<0.50	—	<25	<25	<25	<25	
08-25-87	90	—	—	<10	—	—	800	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	590	—	—	<45	—	—	—	—	—	—	180	—	—	—	180	—	—	<0.50	—	<25	<25	<25	<25	
02-17-88	40	—	—	<10	—	—	710	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	660	—	—	<45	—	—	—	—	—	—	460	—	—	—	460	—	—	<0.50	—	<100	—	<25	<25	
03-25-86	—	—	—	—	—	—	910*	3.0*	—	—	—	20*	—	—	—	—	—	—	—	—	—	50*	—	—	<1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
08-26-87	90	—	—	<10	—	—	750	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	1400	—	—	<45	—	—	—	—	—	—	510	—	—	—	510	—	—	<0.50	—	<100	—	<25	<25	
02-17-88	30	—	—	<10	—	—	710	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	160	—	—	<45	—	—	—	—	—	—	360	—	—	—	360	—	—	<0.50	—	<100	—	<25	<25	
03-24-86	—	—	—	—	—	—	1300*	2.0*	—	—	—	10*	—	—	—	—	—	—	—	—	—	50*	—	—	1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
08-25-87	50	—	—	<10	—	—	1200	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	840	—	—	<45	—	—	—	—	—	—	72	—	—	—	72	—	—	<0.50	—	<100	—	<25	<25	
03-25-86	—	—	—	—	—	—	1200*	1.0*	—	—	—	10*	—	—	—	—	—	—	—	—	—	40*	—	—	1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
03-25-86	—	—	—	—	—	—	1200*	1.0*	—	—	—	20*	—	—	—	—	—	—	—	—	—	40*	—	—	1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
03-25-86	—	—	—	—	—	—	1200*	2.0*	—	—	—	20*	—	—	—	—	—	—	—	—	—	70*	—	—	<1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
08-25-87	70	—	—	<10	—	—	1200	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	1800	—	—	<45	—	—	—	—	—	—	87	—	—	—	87	—	—	<0.50	—	<100	—	<25	<25	
02-17-88	30	—	—	<10	—	—	1000	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	320	—	—	<45	—	—	—	—	—	—	260	—	—	—	260	—	—	<0.50	—	<100	—	<25	<25	
03-26-86	—	—	—	—	—	—	430*	1.0*	—	—	—	<10*	—	—	—	—	—	—	—	—	—	20*	—	—	<1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
03-26-86	—	—	—	—	—	—	1700*	2.0*	—	—	—	20*	—	—	—	—	—	—	—	—	—	50*	—	—	<1*	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	
08-26-87	40	—	—	<10	—	—	1700	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	570	—	—	<45	—	—	—	—	—	—	170	—	—	—	170	—	—	<0.50	—	<100	—	<25	<25	
08-26-87	<100	—	—	<10	—	—	2000*	10	—	<50	—	<40	<40	—	—	3	—	<50	—	3	—	410	—	—	<5	220	—	—	—	—	—	190	—	—	190	—	—	—	<0.50	—	6	—	100		
02-17-88	30	—	—	<10	—	—	1500	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	360	—	—	<45	—	—	—	—	—	—	300	—	—	300	—	—	<0.50	—	<100	—	<25	<25		
08-25-87	40	—	—	<10	—	—	450	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	100	—	—	<45	—	—	—	—	—	—	120	—	—	120	—	—	<0.50	—	<100	—	<25	<25		
08-25-87	200	—	—	<10	—	—	510*	<10	—	<50	—	<10	<10	—	—	1	—	<50	—	1	—	120	—	—	<5	110	—	—	—	—	—	120	—	—	120	—	—	<0.50	—	4	—	<100	—	<100	
08-25-87	30	—	—	<10	—	—	390	<5	—	<100	—	<10	<10	—	—	<10	—	<100	—	<10	—	40	—	—	<45	—	—	—	—	—	—	24	—	—	24	—	—	<0.50	—	<100	—	<25	<25		

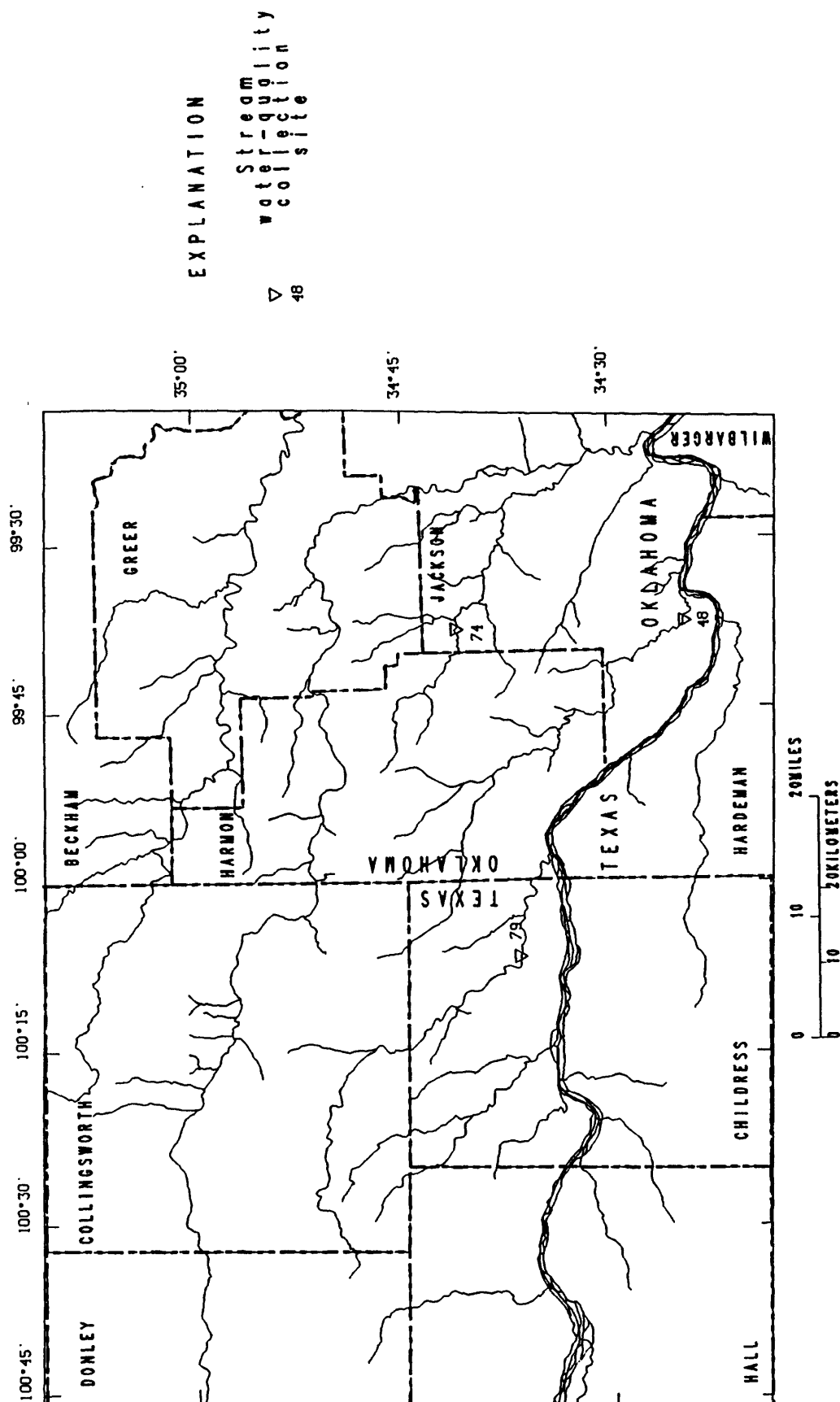
Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Selenium, total (ug/L) (*01145 01147)	Silver, total reco- verable (ug/L) (01077)	Stron- tium, total reco- verable (ug/L) (01082)	Thal- lium, total (ug/L) (01059)	Vana- dium, dis- solved (ug/L) (01085)	Zinc, total reco- verable (ug/L) (01092)	Cyanide total (mg/L) (00720)
03-26-86	7*	—	—	—	—	—	—
03-25-86	11*	—	—	—	—	—	—
03-26-86	31*	—	—	—	—	—	—
03-25-86	13*	—	—	—	—	—	—
03-26-86	5*	—	—	—	—	—	—
08-26-87	<70	<7	8400	<200	<100	<5	<0.010
02-17-88	<70	<7	9100	<200	<100	7	<0.010
03-25-86	4*	—	—	—	—	—	—
08-26-87	<70	<7	10000	<200	<100	<5	<0.010
02-18-88	<70	<7	11000	<200	<100	<5	<0.010
03-25-86	6*	—	—	—	—	—	—
03-26-86	35*	—	—	—	—	—	—
03-25-86	8*	—	—	—	—	—	—
03-24-86	5*	—	—	—	—	—	—
03-24-86	5*	—	—	—	—	—	—
03-24-86	8*	—	—	—	—	—	—
08-26-87	<5	<7	4100	<200	<100	<5	<0.010
02-18-88	<70	<7	3300	<200	<100	<5	<0.010
03-24-86	6*	—	—	—	—	—	—
03-24-86	3*	—	—	—	—	—	—
08-26-87	<5	<7	4100	<200	<100	<5	<0.010
03-27-86	19*	—	—	—	—	—	—
08-25-87	<18	<1	8800	—	<28	30	—
08-25-87	<70	<7	9600	<200	<100	20	<0.010
08-25-87	<70	<7	9300	<200	<100	<5	<0.010
02-17-88	<70	<7	9200	<200	<100	<5	<0.010
08-26-87	<70	<7	8900	<200	<100	<5	<0.010
03-27-86	16*	—	—	—	—	—	—
03-27-86	20*	—	—	—	—	—	—
03-27-86	28*	—	—	—	—	—	—



Table 7a.—Common ion, trace, and nutrient chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Selenium, total (ug/L) (*01145 01147)	Silver, total recoverable (ug/L) (01077)	Strontium, total recoverable (ug/L) (01082)	Thallium, total (ug/L) (01059)	Vanadium, dissolved (ug/L) (01085)	Zinc, total recoverable (ug/L) (01092)	Cyanide total (mg/L) (00720)
03-27-86	18*	—	—	—	—	—	—
03-26-86	18*	—	—	—	—	—	—
08-25-87	<18	<1	7000	—	<18	<20	—
08-25-87	<70	<7	7400	<200	<100	<5	<0.010
08-25-87	<70	<7	8300	<200	<100	<5	<0.010
02-17-88	<70	<7	8200	<200	<100	<5	<0.010
03-25-86	16*	—	—	—	—	—	—
08-26-87	<70	<7	8200	<200	<100	<5	<0.010
02-17-88	<70	<7	8000	<200	<100	<5	<0.010
03-24-86	15*	—	—	—	—	—	—
08-25-87	<5	<7	6500	<200	<100	<5	<0.010
03-25-86	15*	—	—	—	—	—	—
03-25-86	13*	—	—	—	—	—	—
03-25-86	10*	—	—	—	—	—	—
03-25-86	88*	—	—	—	—	—	—
08-25-87	9	<7	6500	<200	<100	6	<0.010
02-17-88	<70	<7	6400	<200	<100	7	<0.010
03-26-86	14*	—	—	—	—	—	—
03-26-86	16*	—	—	—	—	—	—
08-26-87	7	<7	7100	<200	<100	10	<0.010
08-26-87	<1	<1	6400	—	28	10	—
02-17-88	<70	<7	7400	<200	<100	10	<0.010
08-25-87	5	<7	5300	<200	<100	<5	<0.010
08-25-87	1	<1	4500	—	4	<10	—
08-25-87	6	<7	4900	<200	<100	<5	<0.010



**Figure 22.** Location of stream water-quality collection sites sampled during low-flow periods and analyzed for organic chemicals in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites in table 7b).

Table 7b.—Organic chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; ug/L, micrograms per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological Survey National Water Quality Laboratory; <, less than]

Index number on location map	Station number	Date	Time	Station name	Agency collecting sample		Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)	Specific conductance (us/cm) (00095) (00010)	pH, field water temperature (°C) (00010)	
					County	Agency				
48	07299716	08-25-87	1030	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	USGS	14	11300	7.9	25.5
74	07300970	08-26-87	1300	Turkey Creek near Duke, Oklahoma	Jackson	USGS	10	7110	6.9	24.5
79	07299550	08-25-87	1030	Buck Creek near Childress, Texas	Childress	USGS	1.2	3890	8.1	28.5

Date	Aldrin, total (ug/L) (39330)		Atrazine, total (ug/L) (39630)		Chlor-dane, total (ug/L) (39350)		Cyanazine, total (ug/L) (81757)		DDD, total (ug/L) (39360)		DDD, recoverable (ug/L) (39365)		DDT, total (ug/L) (39370)		DDT, recoverable (ug/L) (39370)		Dieldrin, total (ug/L) (39380)		Endosulfan, total (ug/L) (39388)	
	2,4-DP total (ug/L) (82183)	2,4,5-T total (ug/L) (39740)	total (ug/L) (77825)	recoverable (ug/L) (77825)	total (ug/L) (82184)	recoverable (ug/L) (82184)	total (ug/L) (39350)	recoverable (ug/L) (39350)	total (ug/L) (81757)	recoverable (ug/L) (81757)	total (ug/L) (39365)	recoverable (ug/L) (39365)	total (ug/L) (39370)	recoverable (ug/L) (39370)	total (ug/L) (39380)	recoverable (ug/L) (39380)	total (ug/L) (39388)	recoverable (ug/L) (39388)		
08-25-87	<0.010	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010		
08-26-87	<0.010	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010		
08-25-87	<0.010	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010		

Table 7b.—Organic chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas—Continued

Date	Endrin, unfil- tered recov- erable (ug/L) (39390)	Ethion, total (ug/L) (39398)	Hepta- chlor, total (ug/L) (39410)	Hepta- chlor, epoxide total (ug/L) (39420)	Lindane total (ug/L) (39340)	Mala- thion, total (ug/L) (39530)	Meth- oxy- chlor, total (ug/L) (39480)	Methyl para- thion, total (ug/L) (39600)	Methyl tri- thion, total (ug/L) (39790)	Metola- chlor whole water, total, recov- erable (ug/L) (82612)	Metri- buzin whole water, total, recov- erable (ug/L) (82611)	Naphtha- lenes, chlor- onated unfil- tered recov- erable (ug/L) (39250)
08-25-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	0.100	<0.100	<0.010
08-26-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	0.110	<0.01	0.100	<0.100	<0.100
08-25-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	0.100	<0.100	<0.100

Date	Para- thion, total (ug/L) (39540)	PCB, total (ug/L) (39516)	Per- thane total (ug/L) (39034)	Prome- tone total (ug/L) (39056)	Prome- tryne total (ug/L) (39057)	Pro- pazine total (ug/L) (39024)	Silvex, total (ug/L) (39760)	Sima- zine total (ug/L) (39055)	Sime- tryne total (ug/L) (39054)	Tox- aphene, total (ug/L) (39400)	Tri- flura- lin total recov- erable (ug/L) (39030)	Tri- thion, total recov- erable (ug/L) (39786)
08-25-87	0.020	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
08-26-87	0.210	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
08-25-87	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010

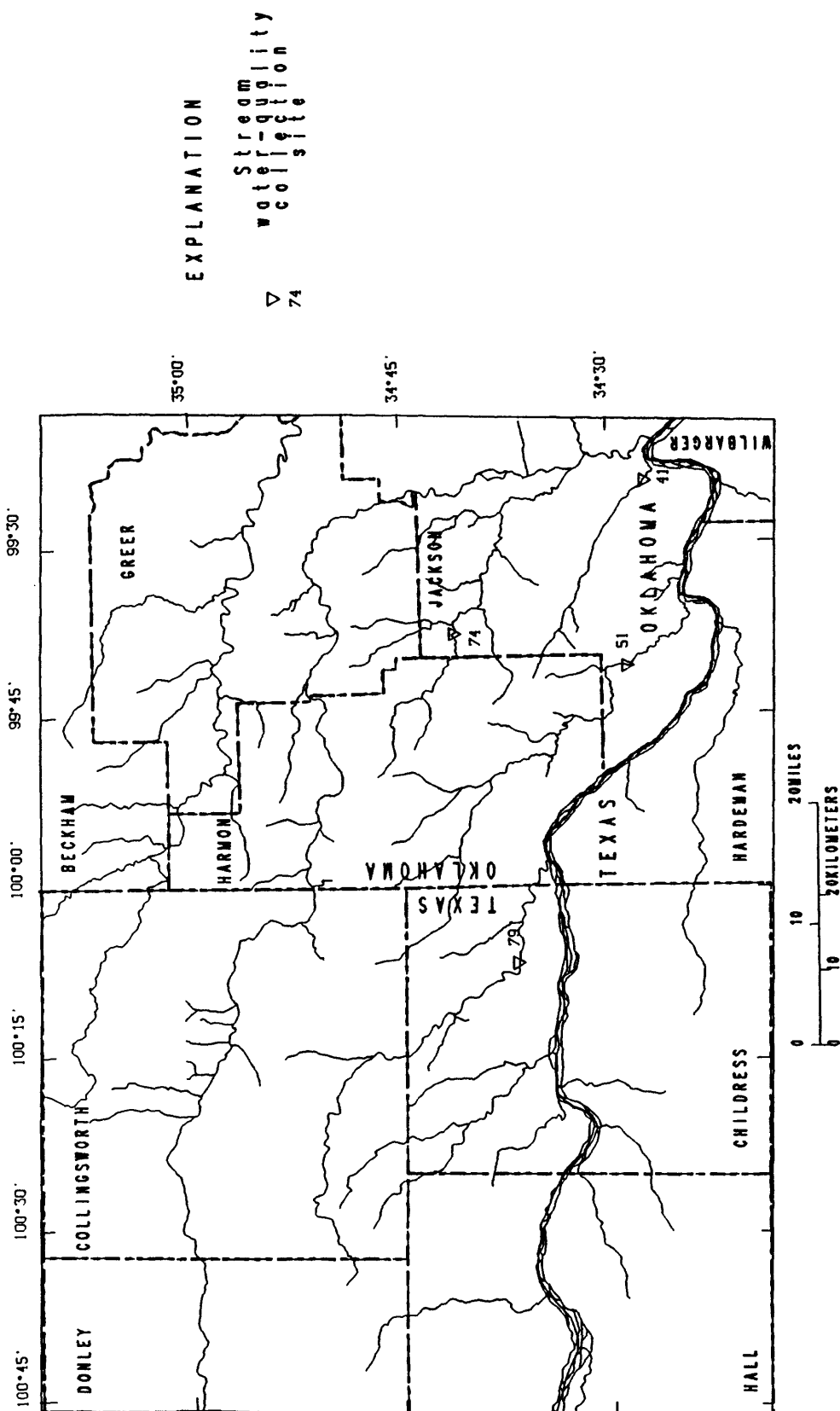


Figure 23. Location of stream water-quality collection sites sampled during low-flow periods and analyzed for radionuclides in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites on table 7c).

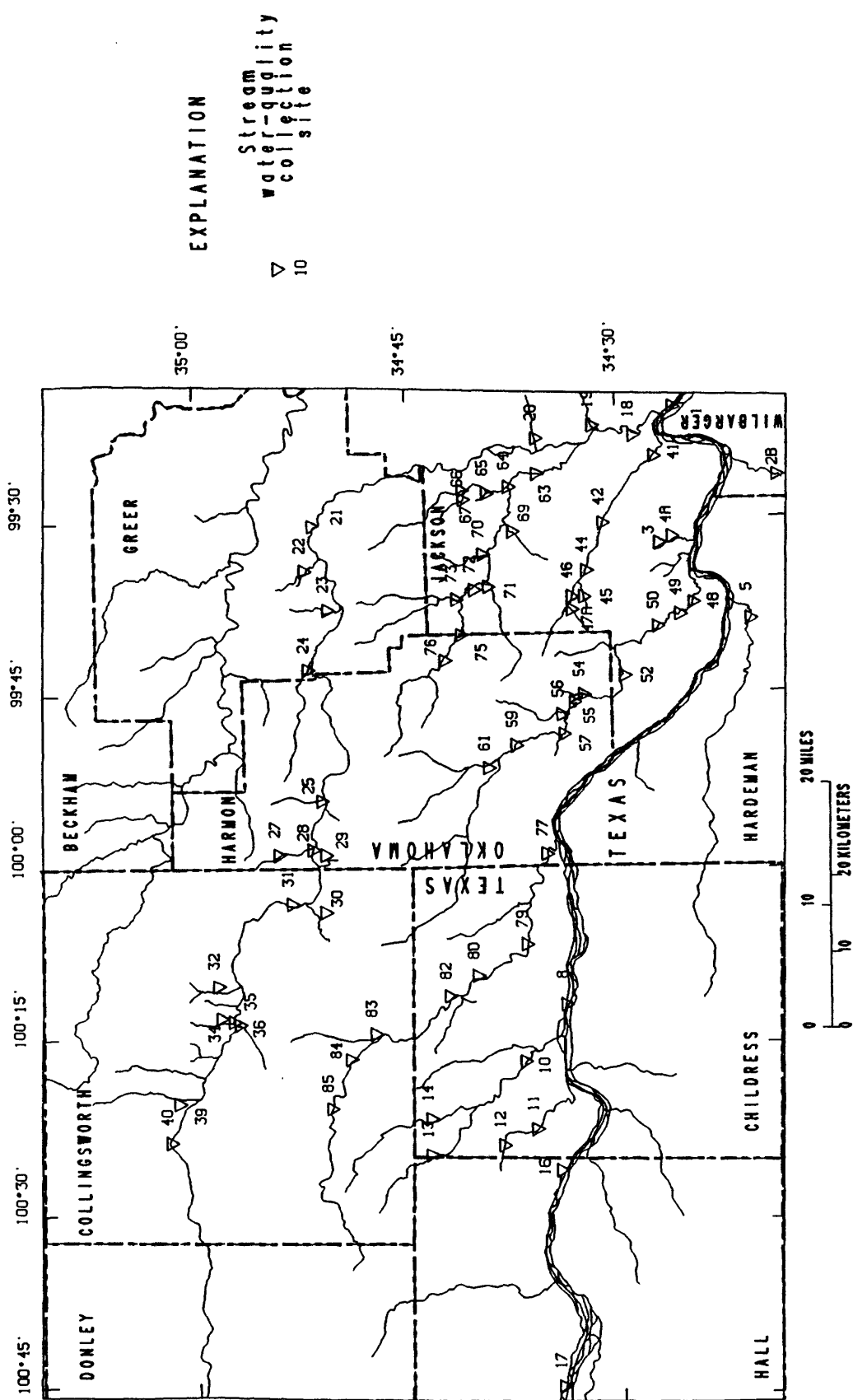
Table 7c.—*Radionuclide chemical analyses of water collected from streams during low-flow periods in southwestern Oklahoma and northwestern Texas*

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; ug/L, micrograms per liter; pci/L, picocuries per liter; U-Nat, uranium-natural; Sr/Y-90, strontium/yttrium-90; USGS, U.S. Geological Survey; OSDHRL, Oklahoma State Department of Health Radiochemistry Laboratory (now Oklahoma Department of Environmental Quality Radiochemistry Laboratory)]

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)	Specific conductance (us/cm) (00095)	pH, field (units) (00400)	Temperature water (°C) (00010)
41	07299780	08-25-87	1217	Gypsum Creek near Olustee, Oklahoma	Jackson	USGS	OSDHRL	6.9	11900	7.7	27.0
51	07299710	08-25-87	1315	Sandy Creek near Eldorado, Oklahoma	Jackson	USGS	OSDHRL	11	9560	8.2	28.0
74	07300970	08-26-87	1300	Turkey Creek near Duke, Oklahoma	Jackson	USGS	OSDHRL	10	7110	6.9	24.5
79	07299550	08-25-87	1030	Buck Creek near Childress, Texas	Childress	USGS	OSDHRL	1.2	3890	8.1	28.5

Date	Gross alpha, dis-solved (ug/L as U-Nat) (80030)	Gross beta, dis-solved (pci/L as Sr/Y-90) (80050)	Radium -226, dis-solved, plan-chet count (pci/L) (09510)	Uranium natural dis-solved (ug/L) (22703)
08-25-87	6.7	26	0.2	2.9
08-25-87	46	3.9	0.1	4.5
08-26-87	14	29	0.1	5.8
08-25-87	4.2	2.1	0.1	4.5



**Figure 24.** Location of stream water-quality collection sites sampled during low-flow periods, with field water-quality measurements and bromide and chloride analyses in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites in table 7d).

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; mg/L, milligrams per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological Survey National Water Quality Laboratory; -, no data]

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)
1	07301150	08-25-87	1030	Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	153
2B	07299730	02-17-88	0900	Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	523
3	07299720	02-17-88	0930	Tributary to Wanderers Creek near Odell, Texas	Wilbarger	USGS	USGSL	0.03
4A	07299722	02-17-88	1030	Mule Creek near Eldorado, Oklahoma	Jackson	USGS	USGS	no flow
		02-17-88	1230	Tributary to Mule Creek near Eldorado, Oklahoma	Jackson	USGS	USGSL	0.16
5	07299580	08-25-87	1500	Groesbeck Creek near Quannah, Texas	Hardeman	USGS	USGSL	10
		02-17-88	1530	Groesbeck Creek near Quannah, Texas	Hardeman	USGS	USGSL	20
8	07299540	08-26-87	1400	Prairie Dog Town Fork Red River near Childress, Texas	Childress	USGS	USGSL	46
		02-18-88	0830	Prairie Dog Town Fork Red River near Childress, Texas	Childress	USGS	USGSL	13
10	07299542	08-26-87	1500	Salt Creek near Childress, Texas	Childress	USGS	USGSL	1.5
		02-18-88	1430	Salt Creek near Childress, Texas	Childress	USGS	USGSL	0.56
11	07299512	08-26-87	1550	Jonah Creek near Estelline, Texas	Childress	USGS	USGSL	0.02
		02-18-88	1430	Jonah Creek near Estelline, Texas	Childress	USGS	USGSL	2.4
12	07299510	08-26-87	1615	Jonah Creek near Newlin, Texas	Childress	USGS	USGSL	0.09
		02-18-88	1500	Jonah Creek near Newlin, Texas	Childress	USGS	USGSL	1.6
13	07299541	08-26-87	1743	Dry Salt Creek near Memphis, Texas	Childress	USGS	USGSL	1.2
14	072995415	02-18-88	0947	Wet Salt Creek near Memphis, Texas	Childress	USGS	USGSL	0.57
16	07299505	08-26-87	1644	Prairie Dog Town Fork Red River at Estelline, Texas	Hall	USGS	USGSL	12
		02-18-88	1225	Prairie Dog Town Fork Red River at Estelline, Texas	Hall	USGS	USGSL	8.9
17	07299495	08-26-87	1524	Prairie Dog Town Fork Red River near Lakeview, Texas	Hall	USGS	USGSL	0.41
		02-18-88	1105	Prairie Dog Town Fork Red River near Lakeview, Texas	Hall	USGS	USGSL	2.4
18	07301110	08-25-87	1400	Salt Fork Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	116
		02-17-88	0910	Salt Fork Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	132
19	07301105	08-25-87	1500	Tributary to Salt for Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	12
		02-16-88	1750	Tributary to Salt for Red River near Elmer, Oklahoma	Jackson	USGS	USGSL	1.7
20	07300600	08-25-87	1545	Bitter Creek near Altus, Oklahoma	Jackson	USGS	USGSL	4.7
		02-16-88	1650	Bitter Creek near Altus, Oklahoma	Jackson	USGS	USGSL	14
21	07300500	08-25-87	1730	Salt Fork Red River at Mangum, Oklahoma	Greer	USGS	USGSL	5.7
		02-17-88	1055	Salt Fork Red River at Mangum, Oklahoma	Greer	USGS	USGSL	65



Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)
22	07300495	08-25-87	1830	Fish Creek near Mangum, Oklahoma	Greer	USGS	USGSL	0.30
		02-17-88	1150	Fish Creek near Mangum, Oklahoma	Greer	USGS	USGSL	0.58
23	07300485	08-25-87	1900	Mulberry Creek near Mangum, Oklahoma	Greer	USGS	USGSL	1.9
		02-17-88	1240	Mulberry Creek near Mangum, Oklahoma	Greer	USGS	USGSL	1.7
24	07300470	08-26-87	0830	Cave Creek near Reed, Oklahoma	Greer	USGS	USGSL	1.4
		02-17-88	1400	Cave Creek near Reed, Oklahoma	Greer	USGS	USGSL	1.3
25	07300415	02-17-88	1515	Horse Creek near Vinson, Oklahoma	Harmon	USGS	USGSL	0.60
27	07300150	08-26-87	1400	Bear Creek near Vinson, Oklahoma	Harmon	USGS	USGSL	0.35
		02-17-88	1820	Bear Creek near Vinson, Oklahoma	Harmon	USGS	USGSL	1.2
28	07300145	08-26-87	1300	Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGSL	24
		02-17-88	1725	Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGSL	57
29	07300140	08-26-87	1520	Tributary to Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGSL	0.73
		02-17-88	1640	Tributary to Salt Fork Red River near Madge, Oklahoma	Harmon	USGS	USGSL	0.98
30	07300130	02-18-88	1400	Sand Creek near Dodson, Texas	Collingsworth	USGS	USGSL	6.0
31	07300120	08-26-87	1130	Salt Fork Red River near Dodson, Texas	Collingsworth	USGS	USGSL	19
		02-18-88	1245	Salt Fork Red River near Dodson, Texas	Collingsworth	USGS	USGSL	54
32	07300005	08-26-87	1420	Panther Creek near Wellington, Texas	Collingsworth	USGS	USGSL	1.7
		02-18-88	1000	Panther Creek near Wellington, Texas	Collingsworth	USGS	USGSL	1.2
34	07300001	02-18-88	0900	Indian Creek near Wellington, Texas	Collingsworth	USGS	USGSL	0.10
35	07300000	02-18-88	0940	Salt Fork Red River near Wellington, Texas	Collingsworth	USGS	USGSL	34
36	07299999	02-18-88	1030	Cottonwood Creek near Wellington, Texas	Collingsworth	USGS	USGSL	1.8
39	07299990	02-18-88	0930	Dozier Creek near Dozier, Texas	Collingsworth	USGS	USGSL	0.74
40	07299985	02-18-88	1030	Salt Fork Red River near Quail, Texas	Collingsworth	USGS	USGSL	14
41	07299780	02-17-88	1043	Gypsum Creek near Olustee, Oklahoma	Collingsworth	USGS	USGSL	11
42	07299775	08-25-87	1540	Gypsum Creek near Creta, Oklahoma	Jackson	USGS	USGSL	7.6
		02-17-88	1143	Gypsum Creek near Creta, Oklahoma	Jackson	USGS	USGSL	9.8
44	07299768	02-17-88	1230	Gypsum Creek near Prairie Hill, Oklahoma	Jackson	USGS	USGSL	8.9
45	07299766	08-26-87	0954	Tributary to Gypsum Creek near Eldorado, Oklahoma	Jackson	USGS	USGSL	1.3
		02-17-88	1309	Tributary to Gypsum Creek near Eldorado, Oklahoma	Jackson	USGS	USGSL	1.3

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Station number	Date	Time	Station name	County	Agency collecting sample	Agency analyzing sample	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)
46	07299764	08-26-87	1047	Gypsum Creek near Duke, Oklahoma	Jackson	USGS	USGSL	5.9
		02-17-88	1315	Gypsum Creek near Duke, Oklahoma	Jackson	USGS	USGSL	6.0
47A	07299762	08-26-87	1139	Tributary to Gypsum Creek north of Eldorado, Oklahoma	Jackson	USGS	USGSL	0.92
		02-17-88	1344	Tributary to Gypsum Creek north of Eldorado, Oklahoma	Jackson	USGS	USGSL	1.4
48	07299716	02-17-88	0710	Sandy Creek southeast of Eldorado, Oklahoma	Jackson	USGS	USGSL	16
49	07299714	08-25-87	1230	Sandy Creek south of Eldorado, Oklahoma	Jackson	USGS	USGSL	14
		02-17-88	0830	Sandy Creek south of Eldorado, Oklahoma	Jackson	USGS	USGSL	16
50	07299712	08-25-87	1400	Sandy Creek at Eldorado, Oklahoma	Jackson	USGS	USGSL	9.2
		02-17-88	0945	Sandy Creek at Eldorado, Oklahoma	Jackson	USGS	USGSL	12
52	072997095	08-26-87	1625	Sandy Creek near Lincoln, Oklahoma	Jackson	USGS	USGSL	6.5
		02-17-88	1155	Sandy Creek near Lincoln, Oklahoma	Jackson	USGS	USGSL	6.4
54	07299709	08-26-87	1005	Tributary to Sandy Creek near Lincoln, Oklahoma	Harmon	USGS	USGSL	0.76
		02-17-88	1425	Tributary to Sandy Creek near Lincoln, Oklahoma	Harmon	USGS	USGSL	0.60
55	072997087	08-26-87	1050	Sandy Creek near Louis, Oklahoma	Harmon	USGS	USGSL	0.85
		02-17-88	1430	Sandy Creek near Louis, Oklahoma	Harmon	USGS	USGSL	0.15
56	072997085	08-26-87	1140	Tributary to Sandy Creek at Louis, Oklahoma	Harmon	USGS	USGSL	1.4
57	07299708	08-26-87	1350	Sandy Creek at Louis, Oklahoma	Harmon	USGS	USGSL	0.73
59	07299707	08-26-87	1445	Sandy Creek near Gould, Oklahoma	Harmon	USGS	USGSL	0.27
		02-17-88	1535	Sandy Creek near Gould, Oklahoma	Harmon	USGS	USGSL	0.02
61	072997065	02-17-88	1600	East Fork Sandy Creek near Gould, Oklahoma	Harmon	USGS	USGSL	0.09
63	07301100	02-17-88	0820	Turkey Creek at Olustee, Oklahoma	Jackson	USGS	USGSL	40
64	07301050	08-25-87	1055	Turkey Creek near Altus, Oklahoma	Jackson	USGS	USGSL	18
		02-17-88	1010	Turkey Creek near Altus, Oklahoma	Jackson	USGS	USGSL	27
65	07301040	02-17-88	1116	Tributary to Horse Branch at Victory, Oklahoma	Jackson	USGS	USGS	no flow
66	07301020	08-25-87	1145	Horse Branch near Victory, Oklahoma	Jackson	USGS	USGSL	0.39
67	07301030	02-17-88	1041	Horse Branch near Victory, Oklahoma	Jackson	USGS	USGSL	2.4
		08-25-87	1155	Tributary to Horse Branch northwest of Victory, Oklahoma	Jackson	USGS	USGSL	0.02
		02-17-88	1105	Tributary to Horse Branch northwest of Victory, Oklahoma	Jackson	USGS	USGSL	0.12
69	07300997	08-25-87	1600	Tributary to Turkey Creek near Prairie Hill, Oklahoma	Jackson	USGS	USGSL	0.09
		02-17-88	1330	Tributary to Turkey Creek near Prairie Hill, Oklahoma	Jackson	USGS	USGSL	0.76

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index num- ber on loca- tion map	Station number	Date	Time	Station name	County	Agency col- lecting sample	Agency analyzing sample	Stream- flow, instan- taneous (ft <sup>3</sup> /sec) (00061)
70	07300990	08-25-87	1740	Spring Branch at Duke, Oklahoma	Jackson	USGS	USGSL	1.5
		02-17-88	1441	Spring Branch at Duke, Oklahoma	Jackson	USGS	USGSL	3.0
71	07300985	03-26-86	1420	Cottonwood Creek near Duke, Oklahoma	Jackson	USGS	USGSL	0.48
		08-26-87	0845	Cottonwood Creek near Duke, Oklahoma	Jackson	USGS	USGSL	2.2
		02-17-88	1530	Cottonwood Creek near Duke, Oklahoma	Jackson	USGS	USGSL	2.0
72	07300980	08-26-87	0915	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	Jackson	USGS	USGSL	10
		02-17-88	1655	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	Jackson	USGS	USGSL	11
73	07300975	08-26-87	1100	Tributary to Turkey Creek near Duke, Oklahoma	Jackson	USGS	USGSL	1.4
		02-17-88	1755	Tributary to Turkey Creek near Duke, Oklahoma	Jackson	USGS	USGSL	1.9
75	07300965	08-26-87	1450	Turkey Creek near Gould, Oklahoma	Jackson	USGS	USGSL	4.1
76	07300960	02-18-88	0928	Turkey Creek near Gould, Oklahoma	Jackson	USGS	USGSL	4.2
		08-26-87	1520	Turkey Creek near McQueen, Oklahoma	Harmon	USGS	USGSL	0.97
		02-18-88	0958	Turkey Creek near McQueen, Oklahoma	Harmon	USGS	USGSL	0.26
77	07299560	02-17-88	0830	Buck Creek near Hollis, Oklahoma	Harmon	USGS	USGSL	9.6
79	07299550	02-17-88	1000	Buck Creek near Childress, Texas	Childress	USGS	USGSL	12
80	07299548	08-25-87	1545	Buck Creek near Loco, Texas	Childress	USGS	USGSL	2.0
		02-17-88	1100	Buck Creek near Loco, Texas	Childress	USGS	USGSL	12
82	07299545	02-17-88	1230	Buck Creek at Loco, Texas	Childress	USGS	USGSL	11
83	072995445	02-17-88	1330	House Log Creek near Wellington, Texas	Collingsworth	USGS	USGSL	0.24
84	072995440	02-17-88	1430	Buck Creek near Rolla, Texas	Collingsworth	USGS	USGSL	4.0
85	072995435	02-17-88	1615	Buck Creek near Quail, Texas	Collingsworth	USGS	USGSL	3.4

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index number on location map	Date	Time	Station name	Specific conductance (us/cm) (00095)	pH, field (units) (00400)	Temperature air (°C) (00020)	Temperature water (°C) (00010)	Chloride, dissolved (mg/L) (00940)	Bromide, dissolved (mg/L) (71870)
1	08-25-87	1030	Red River near Elmer, Oklahoma	8350	—	30.0	25.0	1800	1.3
2B	02-17-88	0900	Red River near Elmer, Oklahoma	9900	7.3	—	8.0	—	—
3	02-17-88	0930	Tributary to Wanderers Creek near Odell, Texas	1200	7.6	14.0	6.0	—	—
4A	02-17-88	1030	Mule Creek near Eldorado, Oklahoma	5500	7.1	10.0	9.0	—	—
	02-17-88	1230	Tributary to Mule Creek near Eldorado, Oklahoma	5200	7.2	—	8.0	—	—
5	08-25-87	1500	Groesbeck Creek near Quanah, Texas	4360	—	36.0	28.0	650	0.95
	02-17-88	1530	Groesbeck Creek near Quanah, Texas	4240	7.7	—	7.0	—	—
8	08-26-87	1400	Prairie Dog Town Fork Red River near Childress, Texas	33900	—	25.0	28.0	11000	3.1
	02-18-88	0830	Prairie Dog Town Fork Red River near Childress, Texas	22600	8.1	—	7.0	—	—
10	08-26-87	1500	Salt Creek near Childress, Texas	31700	—	—	29.0	8300	3.1
	02-18-88	1430	Salt Creek near Childress, Texas	20400	7.9	—	8.0	—	—
11	08-26-87	1550	Jonah Creek near Estelline, Texas	6230	—	—	27.0	960	0.12
	02-18-88	1430	Jonah Creek near Estelline, Texas	3150	8.1	—	10.0	—	—
12	08-26-87	1615	Jonah Creek near Newlin, Texas	5310	—	—	25.0	380	1.2
	02-18-88	1500	Jonah Creek near Newlin, Texas	3000	8.0	—	12.0	—	—
13	08-26-87	1743	Dry Salt Creek near Memphis, Texas	1150	—	25.0	27.0	51	0.022
14	02-18-88	0947	Wet Salt Creek near Memphis, Texas	3170	—	8.0	8.0	—	—
16	08-26-87	1644	Prairie Dog Town Fork Red River at Estelline, Texas	9460	—	25.0	27.0	2200	0.68
	02-18-88	1225	Prairie Dog Town Fork Red River at Estelline, Texas	13600	—	11.0	8.0	—	—
17	08-26-87	1524	Prairie Dog Town Fork Red River near Lakeview, Texas	13600	—	29.0	29.0	50	0.95
	02-18-88	1105	Prairie Dog Town Fork Red River near Lakeview, Texas	19500	—	9.5	7.0	—	—
18	08-25-87	1400	Salt Fork Red River near Elmer, Oklahoma	3280	—	—	30.0	510	1.1
	02-17-88	0910	Salt Fork Red River near Elmer, Oklahoma	4600	—	—	6.0	—	—
19	08-25-87	1500	Tributary to Salt for Red River near Elmer, Oklahoma	2590	—	—	29.0	230	0.70
	02-16-88	1750	Tributary to Salt for Red River near Elmer, Oklahoma	7270	—	—	13.0	—	—
20	08-25-87	1545	Bitter Creek near Altus, Oklahoma	2990	—	—	28.0	530	1.3
	02-16-88	1650	Bitter Creek near Altus, Oklahoma	5420	—	—	14.0	—	—
21	08-25-87	1730	Salt Fork Red River at Mangum, Oklahoma	3310	—	—	32.0	260	0.48
	02-17-88	1055	Salt Fork Red River at Mangum, Oklahoma	3030	—	—	7.0	—	—

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

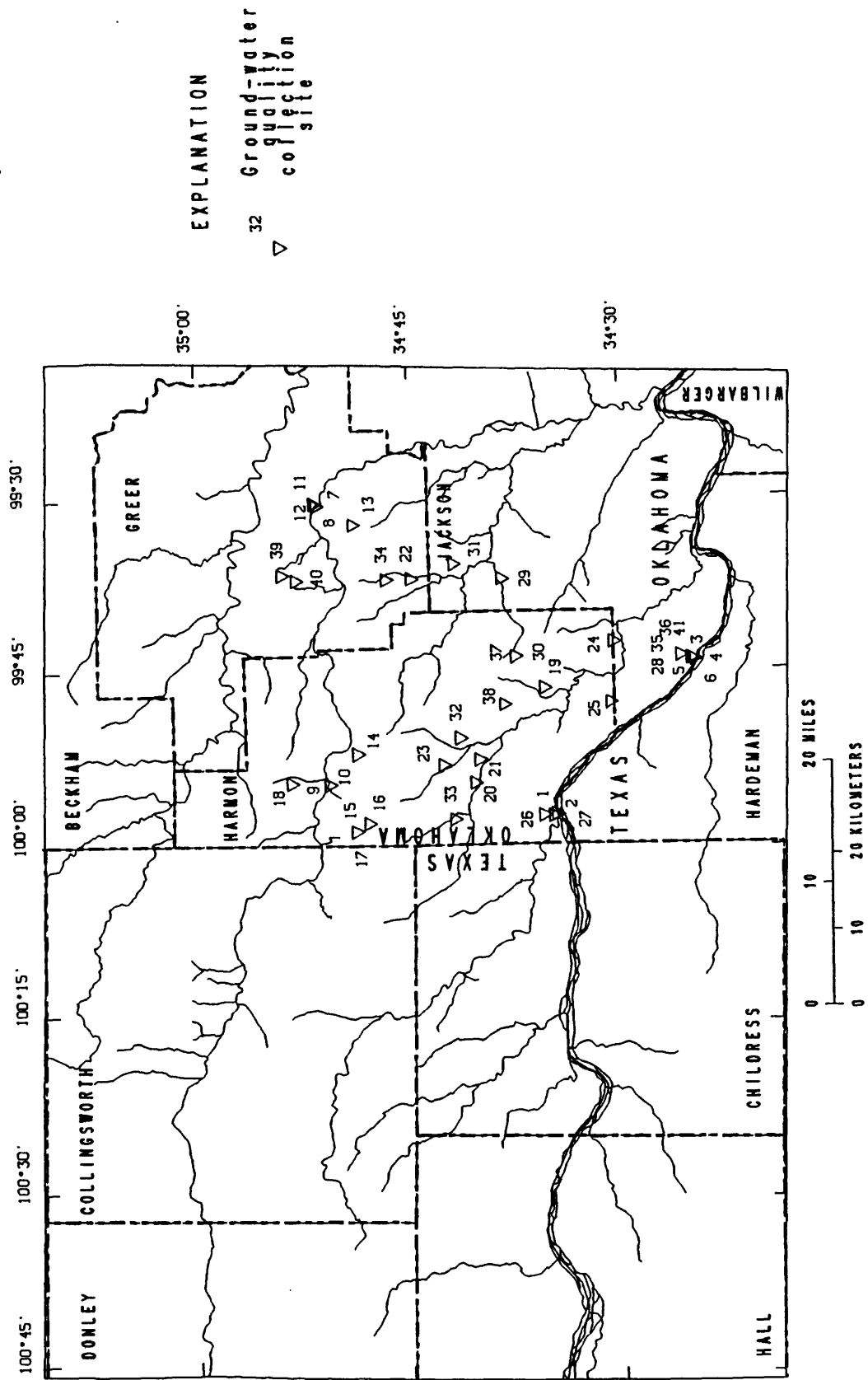
Index num- ber on loca- tion map	Date	Time	Station name	Spe- cific con- duct- ance ( $\mu\text{S}/\text{cm}$ ) (00095)	pH, field (units) (00400)	Temper- ature air ( $^{\circ}\text{C}$ ) (00020)	Temper- ature water ( $^{\circ}\text{C}$ ) (00010)	Chlo- ride, dis- solved (mg/L) (00940)	Bromide, dis- solved (mg/L) (71870)
22	08-25-87	1830	Fish Creek near Mangum, Oklahoma	3500	—	—	26.5	56	0.51
23	02-17-88	1150	Fish Creek near Mangum, Oklahoma	3230	—	—	8.0	—	—
23	08-25-87	1900	Mulberry Creek near Mangum, Oklahoma	1510	—	—	21.5	79	0.18
24	02-17-88	1240	Mulberry Creek near Mangum, Oklahoma	1710	—	—	—	—	—
24	08-26-87	0830	Cave Creek near Reed, Oklahoma	2890	—	—	22.5	—	0.11
25	02-17-88	1400	Cave Creek near Reed, Oklahoma	3420	—	—	7.0	—	—
27	08-26-87	1400	Bear Creek near Vinson, Oklahoma	3610	—	—	11.0	—	—
27	02-17-88	1820	Bear Creek near Vinson, Oklahoma	2380	—	—	24.5	31	0.090
28	08-26-87	1300	Salt Fork Red River near Madge, Oklahoma	3050	—	—	8.0	—	—
29	02-17-88	1725	Salt Fork Red River near Madge, Oklahoma	2990	—	—	11.5	—	—
29	08-26-87	1520	Tributary to Salt Fork Red River near Madge, Oklahoma	782	—	—	25.0	20	0.15
30	02-17-88	1640	Tributary to Salt Fork Red River near Madge, Oklahoma	803	—	—	13.0	—	—
30	02-18-88	1400	Sand Creek near Dodson, Texas	2800	—	31.0	7.5	—	—
31	08-26-87	1130	Salt Fork Red River near Dodson, Texas	3180	—	—	25.0	190	0.17
32	02-18-88	1245	Salt Fork Red River near Dodson, Texas	3060	—	21.0	9.0	—	—
32	08-26-87	1420	Panther Creek near Wellington, Texas	2830	—	—	23.0	40	0.17
34	02-18-88	1000	Panther Creek near Wellington, Texas	2850	—	4.0	7.0	—	—
35	02-18-88	0900	Indian Creek near Wellington, Texas	2740	—	3.5	4.0	—	—
35	02-18-88	0940	Salt Fork Red River near Wellington, Texas	2920	—	—	4.0	—	—
36	02-18-88	1030	Cottonwood Creek near Wellington, Texas	1010	—	—	7.0	—	—
39	02-18-88	0930	Dozier Creek near Dozier, Texas	2480	—	—	5.5	—	—
40	02-18-88	1030	Salt Fork Red River near Quail, Texas	1960	—	—	5.0	—	—
41	02-17-88	1043	Gypsum Creek near Olustee, Oklahoma	11800	—	9.0	8.0	—	—
42	08-25-87	1540	Gypsum Creek near Creta, Oklahoma	11600	—	36.5	28.0	3500	3.6
44	02-17-88	1143	Gypsum Creek near Creta, Oklahoma	11500	—	—	10.0	—	—
45	02-17-88	1230	Gypsum Creek near Prairie Hill, Oklahoma	11700	—	—	11.0	—	—
45	08-26-87	0954	Tributary to Gypsum Creek near Eldorado, Oklahoma	6330	—	24.0	20.0	1200	1.4
45	02-17-88	1309	Tributary to Gypsum Creek near Eldorado, Oklahoma	6410	—	—	15.0	—	—

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index num- ber on loca- tion map	Date	Time	Station name	Spe- cific con- duct- ance (us/cm (00095)	pH, field (units) (00400)	Temper- ature air (°C) (00020)	Temper- ature water (°C) (00010)	Chlo- ride, dis- solved (mg/L) (00940)	Bromide, dis- solved (mg/L) (71870)
46	08-26-87	1047	Gypsum Creek near Duke, Oklahoma	14900	—	26.0	20.5	4300	4.5
02-17-88	1315	Gypsum Creek near Duke, Oklahoma	15000	—	—	—	13.5	—	—
47A	08-26-87	1139	Tributary to Gypsum Creek north of Eldorado, Oklahoma	19200	—	26.0	21.0	5500	6.1
02-17-88	1344	Tributary to Gypsum Creek north of Eldorado, Oklahoma	18400	—	—	—	—	—	—
48	02-17-88	0710	Sandy Creek southeast of Eldorado, Oklahoma	8710	—	—	6.5	—	—
49	08-25-87	1230	Sandy Creek south of Eldorado, Oklahoma	11600	—	—	26.0	2900	2.0
02-17-88	0830	Sandy Creek south of Eldorado, Oklahoma	8950	—	4.5	—	4.5	—	—
50	08-25-87	1400	Sandy Creek at Eldorado, Oklahoma	9350	—	—	26.5	2600	1.4
02-17-88	0945	Sandy Creek at Eldorado, Oklahoma	8040	—	—	—	8.5	—	—
52	08-26-87	1625	Sandy Creek near Lincoln, Oklahoma	9650	—	—	28.0	3100	1.4
02-17-88	1155	Sandy Creek near Lincoln, Oklahoma	9580	—	—	—	10.0	—	—
54	08-26-87	1005	Tributary to Sandy Creek near Lincoln, Oklahoma	7180	—	—	24.0	1700	1.5
02-17-88	1425	Tributary to Sandy Creek near Lincoln, Oklahoma	6670	—	—	—	12.5	—	—
55	08-26-87	1050	Sandy Creek near Louis, Oklahoma	8330	—	—	24.5	1600	1.6
02-17-88	1430	Sandy Creek near Louis, Oklahoma	4080	—	—	—	10.0	—	—
56	08-26-87	1140	Tributary to Sandy Creek at Louis, Oklahoma	6450	—	—	24.0	1600	1.8
57	08-26-87	1350	Sandy Creek at Louis, Oklahoma	5420	—	—	25.0	1100	0.85
59	08-26-87	1445	Sandy Creek near Gould, Oklahoma	3270	—	—	25.0	230	0.40
02-17-88	1535	Sandy Creek near Gould, Oklahoma	2150	—	—	—	7.0	—	—
61	02-17-88	1600	East Fork Sandy Creek near Gould, Oklahoma	3170	—	—	12.0	—	—
63	02-17-88	0820	Turkey Creek at Olustee, Oklahoma	5580	—	19.0	7.5	—	—
64	08-25-87	1055	Turkey Creek near Altus, Oklahoma	2660	—	31.0	25.5	980	1.3
02-17-88	1010	Turkey Creek near Altus, Oklahoma	5520	—	—	18.0	8.5	—	—
65	02-17-88	1116	Tributary to Horse Branch at Victory, Oklahoma	16400	—	19.0	6.0	—	—
66	08-25-87	1145	Horse Branch near Victory, Oklahoma	5430	—	31.0	26.5	840	2.5
02-17-88	1041	Horse Branch near Victory, Oklahoma	5750	—	—	—	6.0	—	—
67	08-25-87	1155	Tributary to Horse Branch northwest of Victory, Oklahoma	17300	—	31.0	29.5	5500	20
02-17-88	1105	Tributary to Horse Branch northwest of Victory, Oklahoma	16700	—	—	19.0	8.0	—	—
69	08-25-87	1600	Tributary to Turkey Creek near Prairie Hill, Oklahoma	4040	—	32.0	30.0	400	1.5
02-17-88	1330	Tributary to Turkey Creek near Prairie Hill, Oklahoma	4220	—	—	21.0	10.0	—	—

Table 7d.—Low-flow stream-discharge measurements, field water-quality properties, and bromide and chloride chemical analyses in southwestern Oklahoma and northwestern Texas—Continued

Index num- ber on loca- tion map	Date	Time	Station name	Spe- cific con- duc- tance ( $\mu\text{S}/\text{cm}$ ) (00095)	pH, field (units) (00400)	Temper- ature air ( $^{\circ}\text{C}$ ) (00020)	Temper- ature water ( $^{\circ}\text{C}$ ) (00010)	Chlo- ride, dis- solved ( $\text{mg}/\text{L}$ ) (00940)	Bromide, dis- solved ( $\text{mg}/\text{L}$ ) (71870)
70	08-25-87	1740	Spring Branch at Duke, Oklahoma	3450	—	32.0	25.5	270	0.11
71	02-17-88	1441	Spring Branch at Duke, Oklahoma	4320	—	—	13.5	—	—
	03-26-86	1420	Cottonwood Creek near Duke, Oklahoma	5180	8.2	—	22.0	—	—
	08-26-87	0845	Cottonwood Creek near Duke, Oklahoma	5620	—	26.0	23.0	940	1.4
	02-17-88	1530	Cottonwood Creek near Duke, Oklahoma	5320	—	30.0	12.5	—	—
72	08-26-87	0915	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	6890	—	31.0	22.5	260	1.6
73	02-17-88	1655	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	6250	—	—	12.0	—	—
	08-26-87	1100	Tributary to Turkey Creek near Duke, Oklahoma	3730	—	28.0	21.0	29	0.45
	02-17-88	1755	Tributary to Turkey Creek near Duke, Oklahoma	3580	—	—	12.5	—	—
	08-26-87	1450	Turkey Creek near Gould, Oklahoma	7580	—	32.0	26.0	1500	1.7
76	02-18-88	0928	Turkey Creek near Gould, Oklahoma	8010	—	19.0	8.0	—	—
	08-26-87	1520	Turkey Creek near McQueen, Oklahoma	11600	—	31.0	29.0	1500	2.5
	02-18-88	0958	Turkey Creek near McQueen, Oklahoma	14300	—	23.0	4.5	—	—
	02-17-88	0830	Buck Creek near Hollis, Oklahoma	3050	—	2.0	5.0	—	—
79	02-17-88	1000	Buck Creek near Childress, Texas	3190	—	3.0	6.5	—	—
80	08-25-87	1545	Buck Creek near Loco, Texas	3550	—	—	31.5	—	—
82	02-17-88	1100	Buck Creek near Loco, Texas	3030	—	8.0	8.5	—	—
	02-17-88	1230	Buck Creek at Loco, Texas	2850	—	9.0	10.5	—	—
	02-17-88	1330	House Log Creek near Wellington, Texas	1060	—	9.5	10.0	—	—
	02-17-88	1430	Buck Creek near Rolla, Texas	2030	—	11.0	14.0	—	—
85	02-17-88	1615	Buck Creek near Quail, Texas	1650	—	11.5	11.5	—	—



**Figure 25.** Location of ground-water quality collection sites in southwestern Oklahoma and northwestern Texas (index numbers on map refer to sites in table 8a).



Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas

[110RRVT, Red River terrace aquifer; 110SFRT, Salt Fork Red River terrace aquifer; 110SFTA, Salt Fork Red River terrace and alluvial aquifer; 111RRA, Red River alluvial aquifer; 111SFRR, Salt Fork Red River alluvial aquifer; 310WTRS, Whitehorse Group; 313BLIN, Blaine Gypsum (or Formation); 313CLGR, Collingsworth Gypsum Bed of the Elm Fork Member; 313EMFK, Elm Fork Member of Blaine Gypsum (or Formation); 313FLRP, Flowerpot Shale; 313VVCR, Van Vactor Member of Blaine Gypsum (or Formation); us/cm, microsiemens per centimeter; °C, degrees Celsius; mg/L, milligrams per liter; ug/L, micrograms per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological Survey National Water Quality Laboratory; OSDH, Oklahoma State Department of Health Laboratory (now Oklahoma Department of Environmental Quality Laboratory; OWRB, Oklahoma Water Resources Board; \*, dissolved constituent; -, no data; <, less than; >, greater than; +, calculated]

Index number on location map	Station number	Date	Time sampled	Geo-logic unit or aquifer	Station name	County	State	Agency collecting sample	Agency analyzing sample	Depth of well (feet)	Specific conductance, field (us/cm) (00095)	pH, field (units) (00400)	Temperature, water (°C) (00010)
1	34344099573101	07-21-87	1600	111RRVA	01N-26W-05 CDCD 1	Harmon	Oklahoma	USGS	OSDH	40	7110	7.3	26.5
2	343447099572701	07-21-87	1000	111RRVA	01N-26W-08 BAAB 1	Harmon	Oklahoma	USGS	OSDH	26	15300	7.4	21.5
3	342500099440301	07-31-87	1515	111RRVA	02S-24W-05 ACBC 1	Jackson	Oklahoma	USGS	OSDH	47	38100	7.4	28.5
4	342454099440501	07-30-87	1730	111RRVA	02S-24W-05 BDDD 1	Jackson	Oklahoma	USGS	OSDH	50	44500	7.7	30.5
5	342542099434804	06-23-87	1430	110RRVT	01S-24W-32 DBAA 4	Jackson	Oklahoma	USGS	OSDH	55	1110	7.5	27.5
6	342444099441001	07-30-87	1930	110RRVT	02S-24W-05 CADB 1	Hardeman	Texas	USGS	OSDH	27	7610	7.3	24.0
7	345124099303901	09-02-87	1715	111SFRR	04N-22W-04 AAAA 1	Greer	Oklahoma	USGS	OSDH	53	4690	7.7	15.5
8	345123099304101	09-03-87	1030	111SFRR	04N-22W-04 AAAA 2	Greer	Oklahoma	USGS	OSDH	56	3930	7.8	19.0
9	345039099544401	09-01-87	1700	111SFRR	04N-26W-02 CCBF 1	Harmon	Oklahoma	USGS	OSDH	22	1500	7.9	25.0
10	345037099544401	09-01-87	1700	111SFRR	04N-26W-02 CCBC 1	Harmon	Oklahoma	USGS	OSDH	16	6070	7.9	20.0
11	345134099302901	09-02-87	1500	111SFRR	05N-22W-34 DCAB 1	Greer	Oklahoma	USGS	OSDH	40	5340	7.8	20.5
12	345132099303001	09-02-87	1430	111SFRR	05N-22W-34 DCAC 1	Greer	Oklahoma	USGS	OSDH	44	5460	7.4	24.5
13	344847099321801	11-20-87	1800	110SFRT	04N-22W-17 CDC 1	Greer	Oklahoma	USGS	OSDH	80	568	7.8	16.5
14	344841099521001	10-01-87	1150	110SFTA	04N-25W-19 BAA 1	Harmon	Oklahoma	OWRB	OSDH	230	550	7.1	21.5
15	344844099584902	07-23-87	1300	110SFTA	04N-26W-19 BBBA 2	Harmon	Oklahoma	USGS	OSDH	70	407	8.0	32.5
16	344753099580701	11-10-87	0940	110SFTA	04N-26W-19 DDC 1	Harmon	Oklahoma	USGS	OSDH	117	660	7.5	16.0
17	344844099584901	07-23-87	1800	310WTRS	04N-26W-19 BBBA 1	Harmon	Oklahoma	USGS	OSDH	145	2350	7.4	25.0
18	345320099543601	11-10-87	0820	310WTRS	05N-26W-23 DDBB 1	Harmon	Oklahoma	USGS	OSDH	115	2980	7.3	17.5
19	343524099463001	11-19-87	1230	313BLIN	01N-25W-01 ADB 1	Harmon	Oklahoma	USGS	OSDH	145	4170	7.1	17.0
20	344021099543602	08-19-87	1145	313BLIN	02N-26W-02 CBA 2	Harmon	Oklahoma	OWRB	OSDH	189	2100	6.4	22.5

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Index num- ber on loca- tion map	Station number	Date	Time sampled	Geo- logic unit or aquifer	Station name	County	State	Agency col- lecting sample	Agency ana- lyzing sample	Depth of well (feet)	Specific con- duct- ance, field (us/cm) (00095)	pH, field (units) (00400)	Temper- ature water (°C) (00010)
21	344000099523901	11-18-87	1600	313BLIN	02N-26W-12 AAAA 1	Harmon	Oklahoma	USGS	OSDH	200	4060	7.4	13.0
22	344445099370001	11-20-87	0830	313BLIN	03N-23W-09 DAB 1	Greer	Oklahoma	USGS	USGSL	125	3540	7.5	17.0
		11-20-87	0831	313BLIN	03N-23W-09 DAB 1	Greer	Oklahoma	USGS	OSDH	125	3540	7.5	17.0
23	344235099530501	11-18-87	1400	313BLIN	03N-26W-25 ABB 1	Harmon	Oklahoma	USGS	OSDH	200	3460	7.3	17.5
24	343020099422001	11-17-87	1230	313VOCR	01N-24W-34 DCC 1	Harmon	Oklahoma	USGS	USGS	94	11400	7.1	16.5
		11-17-87	1231	313VOCR	01N-24W-34 DCC 1	Harmon	Oklahoma	USGS	OSDH	94	11400	7.1	16.5
25	343042099474701	11-11-87	1000	313VOCR	01N-25W-35 DBA1	Harmon	Oklahoma	USGS	OSDH	72	9160	7.4	15.0
26	343530099572501	09-17-87	1050	313VOCR	01N-26W-05 BAD 1	Harmon	Oklahoma	OWRB	OSDH	100	5500	6.7	22.5
27	343436099572201	07-22-87	1130	313VOCR	01N-26W-08 BADD 1	Hardeman	Texas	USGS	OSDH	70	33600	7.3	24.5
28	342542099434801	06-16-87	1500	313VOCR	01S-24W-32 DBAA 1	Jackson	Oklahoma	USGS	OSDH	80	3150	8.1	30.0
29	343820099370201	11-20-87	1230	313VOCR	02N-23W-16 ABD 1	Jackson	Oklahoma	USGS	OSDH	99	6610	7.1	18.5
30	343724099434902	06-09-87	1830	313VOCR	02N-24W-21 DDD 2	Harmon	Oklahoma	USGS	OSDH	159	8360	7.8	20.5
31	344144099354501	11-16-87	1600	313VOCR	03N-23W-35 BBBB 1	Jackson	Oklahoma	USGS	OSDH	94	3940	7.6	16.0
32	344123099505101	10-01-87	1340	313VOCR	03N-25W-32 ACD 1	Harmon	Oklahoma	OWRB	OSDH	156	3200	6.8	21.5
33	344149099574901	10-01-87	1040	313VOCR	03N-26W-29 CCB 1	Harmon	Oklahoma	OWRB	OSDH	110	2850	6.8	20.0
34	344630099370201	10-01-87	1520	313VOCR	04N-23W-33 DAB 1	Greer	Oklahoma	OWRB	OSDH	155	2400	6.6	21.0
35	342500099440302	08-12-87	1345	313CLGR	02S-24W-05 ACBC 2	Jackson	Oklahoma	USGS	OSDH	70	49500	7.2	28.5
36	342542099434803	06-23-87	2000	313EMFK	01S-24W-32 DBAA 3	Jackson	Oklahoma	USGS	OSDH	179	18200	6.9	30.5
37	343724099434901	06-12-87	1230	313EMFK	02N-24W-21 DDDD 1	Harmon	Oklahoma	USGS	OSDH	266	25100	7.2	23.5
38	343812099475501	08-19-87	1330	313EMFK	02N-25W-23 BAA 1	Harmon	Oklahoma	OWRB	OSDH	185	2900	6.7	21.5
39	345353099363501	08-20-87	1200	313EMFK	05N-23W-22 AADB 2	Greer	Oklahoma	USGS	OSDH	118	3080	7.1	23.0
		08-20-87	1201	313EMFK	05N-23W-22 AADB 2	Greer	Oklahoma	USGS	USGSL	118	3080	7.1	23.0
40	345254099370301	11-20-87	1600	313EMFK	05N-23W-27 BDA 1	Greer	Oklahoma	USGS	OSDH	127	2880	7.3	18.0
41	342542099434802	06-16-87	1730	313FLRP	01S-24W-32 DBAA 2	Jackson	Oklahoma	USGS	OSDH	239	>200000	8.7	21.0

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Hard- ness total (mg/L) (00900)	Alka- linity lab (mg/L) (90410)	Solids, residue at 105°C, total (mg/L) (00500)	Calcium total recov- erable (mg/L) (00916)	Magne- sium, total recov- erable (mg/L) (00927)	Sodium, total recov- erable (mg/L) (00929)	Sodium ad- sorp- tion ratio (00931)	Potas- sium, total recov- erable (mg/L) (*00935 00937)	Bicar- bonate, incre- mental, titra- tion, lab (mg/L) (90440)	Car- bonate, incre- mental, titra- tion, lab (mg/L) (90445)	Sul- fate dis- solved (mg/L) (00945)	Chlo- ride, dis- solved (mg/L) (00940)	Fluo- ride, total dissolved (mg/L) (*00950 71870)	Iodide, dis- solved (mg/L) (71865)	
07-21-87	2200	218	5240	480	130	940	10	11	265	0	1900	1500	0.7	0.40	0.031
07-21-87	3100	185	10960	670	180	2400	21	14	226	0	12000	4300	0.7	0.77	0.042
07-31-87	4900	90	20420	1000	420	5900	42	31	110	0	2500	12000	0.4	19	0.530
07-30-87	5500	<15	30710	1000	480	8100	57	72	<18	0	3600	15000	0.5	23	0.730
06-23-87	300	291	801	73	36	110	3	5.0	355	0	79	770	0.6	0.020	0.007
07-30-87	1200	248	4690	260	100	1100	15	12	302	0	1300	1600	0.6	2.1	0.110
09-02-87	2300	222	4060	580	160	340	3	11	271	0	1700	740	0.6	1.7	0.052
09-03-87	1900	224	3430	430	160	<280	3	11	273	0	1600	540	0.6	1.7	0.049
09-01-87	440	293	5230	100	39	150	3	8.0	357	0	530	48	0.6	0.11	0.024
09-01-87	2500	492	5480	390	330	650	6	8.0	600	0	2600	480	0.7	0.72	0.065
09-02-87	1600	259	4190	360	130	640	7	18	316	0	1500	1000	0.5	2.9	0.057
09-02-87	2200	220	4570	480	170	520	5	15	268	0	1900	860	0.4	2.5	0.042
11-20-87	250	244	334	59	20	30	0.9	27	298	0	30	<10	0.4	1.4	0.030
10-01-87	220	237	429	67	16	44	2	2.0	289	0	<20	15	0.5	0.010	0.010
07-23-87	170	190	373	47	10	31	1	3.0	232	0	31	<10	0.4	0.080	<0.002
11-10-87	300	206	407	78	12	22	0.6	1.9	251	0	65	10	0.3	0.010	<0.010
07-23-87	940	168	2940	280	39	240	4	12	206	0	1200	17	0.4	0.040	0.016
11-10-87	1600	119	2710	500	76	30	0.3	2.8	145	0	1800	16	0.7	0.010	0.010
11-19-87	2100	167	3300	580	97	210	2	7.0	204	0	2600	500	0.4	1.4	0.034
08-19-87	2200	226	3460	570	140	130	1	5.0	276	0	2000	210	0.5	0.44	0.014

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Hard- ness total (mg/L) (00900)	Alka- linity lab (mg/L) (90410)	Solids, residue at 105°C, total (mg/L) (00500)	Calcium total recov- erable (mg/L) (00916)	Magne- sium, total recov- erable (mg/L) (00927)	Sodium, total recov- erable (mg/L) (00929)	Sodium ad- sorp- tion ratio (00931)	Potas- sium, total recov- erable (mg/L) (*00935 00937)	Bicar- bonate, incre- mental, titra- tion, lab (mg/L) (90440)	Car- bonate, incre- mental, titra- tion, lab (mg/L) (90445)	Sul- fate dis- solved (mg/L) (00945)	Chlo- ride, dis- solved (mg/L) (00940)	Fluo- ride, total dissolved (mg/L) (*00950 00951)	Iodide, dis- solved (mg/L) (71865)	
11-18-87	2200	210	3570	500	140	180	2	7.3	256	0	2800	300	0.6	2.3	0.045
11-20-87	—	220	3340	470	110	150	2	4.2*	268+	0+	1700	170	0.50*	0.39	0.005
11-20-87	2000	215	3180	520	110	140	1	5.3	262	0	2900	160	0.5	3.5	0.047
11-18-87	2000	197	3100	550	110	120	1	5.9	240	0	2700	150	0.6	3.3	0.044
11-17-87	—	163	8220	630	160	1500	14	11.0*	199	0	2100	2600	0.50*	0.46	0.022
11-17-87	2800	156	7640	650	150	1400	13	12	190	0	3500	2500	0.6	0.25	0.008
11-11-87	2400	180	6920	650	160	1000	9	12	220	0	2000	1800	0.4	0.11	0.027
09-17-87	3500	202	5600	660	280	560	5	7.0	246	0	2000	1700	0.6	0.76	0.023
07-22-87	3700	113	22870	770	210	6100	51	22	138	0	2700	11000	0.6	2.7	0.054
06-16-87	1700	205	3080	590	56	150	2	5.0	250	0	1500	110	0.4	0.030	0.004
11-20-87	2500	187	4960	590	140	570	5	10	228	0	2900	1200	0.3	1.2	0.027
06-09-87	2400	119	6620	560	180	1000	10	20	145	0	2100	1600	0.5	1.7	0.060
11-16-87	2300	191	3360	580	140	160	2	7.5	233	0	2900	360	0.4	4.3	0.051
10-01-87	2100	226	3570	540	140	210	2	6.0	276	0	1800	300	0.6	0.030	0.017
10-01-87	2200	214	3700	560	180	200	2	8.0	261	0	1900	310	0.7	0.070	0.016
10-01-87	2000	250	3000	580	120	69	0.7	5.0	305	0	1600	68	0.5	0.010	0.010
08-12-87	6300	124	35630	1200	560	10000	61	130	151	0	3500	18000	0.5	29	0.660
06-23-87	60000	<15	233600	2800	9600	41000	84	814	<18	0	3500	110000	<0.1	40	4.3
06-12-87	3900	103	17460	830	270	4000	31	32	126	0	2700	3000	0.4	3.6	0.101
08-19-87	2400	242	4280	600	180	310	3	7.0	295	0	2000	470	0.5	0.63	0.018
08-20-87	2100	197	3160	580	110	67	0.7	6.0	240	0	1900	160	0.4	0.40	<0.002
08-20-87	—	99	3160	540	110	64	0.7	5.7*	121+	0+	1700	160	0.50*	0.39	0.002
11-20-87	1600	165	2430	440	68	120	1	5.0	201	0	1600	170	0.4	1.1	0.037
06-16-87	23000	31	161600	2000	3200	83000	270	440	38	0	2000	190000	<0.1	90	5.6

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Silica, dis- solved (mg/L) (00955)	Nitro- gen, nitrate (mg/L) (00631)	Nitro- gen, ammonia (mg/L) (00610)	Phos- phorus, ortho, total (mg/L) (70507)	Alum- inum, total reco- verable (ug/L) (01105)	Anti- mony, total (ug/L) (01097)	Arsenic total (ug/L) (01002)	Barium, total reco- verable (ug/L) (01007)	Beryl- lium, total reco- verable (ug/L) (01012)	Boron, total reco- verable (ug/L) (01022)	Cadmium total reco- verable (ug/L) (01027)	Chro- mium, total reco- verable (ug/L) (01034)	Cobalt, total reco- verable (ug/L) (01037)	Copper, total reco- verable (ug/L) (01042)
07-21-87	—	1.60	0.113	<0.005	1400	<350	<60	70	<10	550	<5	<10	<100	<10
07-21-87	—	0.800	<0.100	0.035	890	<350	<60	50	<10	760	<5	<10	<100	<10
07-31-87	—	0.900	0.226	0.101	7000	<1400	<240	200	<40	1200	<20	<40	<400	<40
07-30-87	—	<0.500	0.846	0.044	21000	<1400	<240	200	<40	1900	<20	<40	<400	<40
06-23-87	—	<0.500	<0.100	0.024	8100	<350	<10	300	<10	230	<5	<10	<100	<10
07-30-87	—	7.70	0.113	0.033	940	<350	<60	40	<10	810	<5	<10	<100	<10
09-02-87	—	<0.500	<0.100	0.189	3800	<350	<60	60	<10	650	<5	<10	<100	<10
09-03-87	—	<0.500	<0.100	0.092	300	<350	<60	10	<10	960	<5	<10	<100	<10
09-01-87	—	0.500	0.332	0.073	<300	<350	<60	100	<10	250	<5	<10	<100	<10
09-01-87	—	4.80	<0.100	0.155	8000	<350	<60	70	<10	820	<5	13	<100	<10
09-02-87	—	<0.500	<0.100	0.065	720	<350	<60	80	<10	2000	<5	<10	<100	<10
09-02-87	—	<0.500	0.221	0.044	510	<350	<60	70	<10	1300	<5	<10	<100	<10
11-20-87	—	8.70	<0.100	0.018	<300	<350	<10	100	<10	100	<5	23	<100	<10
10-01-87	—	6.10	0.113	<0.005	<300	<350	<10	100	<10	340	<5	25	<100	20000
07-23-87	—	4.80	<0.100	0.034	5900	<350	<10	300	<10	<100	<5	10	<100	<10
11-10-87	—	9.50	0.113	0.047	<300	<350	<10	100	<10	<100	<5	<10	<100	<10
07-23-87	—	3.30	0.169	0.020	6400	<350	<10	70	<10	270	<5	<10	<100	<10
11-10-87	—	0.900	<0.100	<0.005	<300	<350	<10	<10	<10	210	<5	<10	<100	<10
11-19-87	—	5.80	0.110	<0.005	300	<350	<10	10	<10	430	<5	<10	<100	<10
08-19-87	—	15.6	0.336	0.040	<300	<350	<60	<10	<10	570	<5	<10	<100	<10

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Silica, dissolved (mg/L) (00955)	Nitro-gen, nitrate, total (mg/L) (00631)	Nitro-gen, ammonia, total (mg/L) (00610)	Phos-phorus, ortho, total (mg/L) (70507)	Alum-inum, total recoverable (ug/L) (01105)	Anti-mony, total (ug/L) (01097)	Arsenic total (ug/L) (01002)	Barium, total recoverable (ug/L) (01007)	Beryl-lium, total recoverable (ug/L) (01012)	Boron, total recoverable (ug/L) (01022)	Cadmium total recoverable (ug/L) (01027)	Chro-mium, total recoverable (ug/L) (01034)	Cobalt, total recoverable (ug/L) (01037)	Copper, total recoverable (ug/L) (01042)
11-18-87	—	10.2	0.220	<0.005	<300	<350	<10	<10	<10	760	<5	<10	<100	<10
11-20-87	16	8.10	0.110	<0.010	50	<1	2	100	<10	690	<10	3	<50	3
11-20-87	—	8.00	0.165	0.016	<300	<350	<10	<10	<10	620	<5	<10	<100	<10
11-18-87	—	10.5	0.110	<0.005	<300	<350	<10	10	<10	830	<5	<10	<100	<10
11-17-87	15	4.20	0.150	<0.010	170	<1	<1	200	<10	990	<10	4	<80	4
11-17-87	—	4.00	0.275	<0.005	<300	<350	<60	10	<10	770	<5	14	<100	10
11-11-87	—	9.50	<0.100	0.030	880	<350	<10	20	<10	750	<5	<10	<100	<10
09-17-87	—	7.60	<0.100	0.466	<300	<350	<10	10	<10	800	<5	<10	<100	<10
07-22-87	—	2.50	<0.100	0.066	340	<350	<60	10	<10	680	<5	<10	<100	<10
06-16-87	—	6.90	<0.100	0.029	670	<350	<10	20	<10	310	<5	<10	<100	<10
11-20-87	—	7.70	<0.100	<0.005	<300	<350	<10	10	<10	960	<5	<10	<100	<10
06-09-87	—	<0.500	0.111	0.480	4800	<350	<10	70	<10	3600	<5	<10	<100	<10
11-16-87	—	5.50	0.220	<0.005	<300	<350	<10	10	<10	1100	<5	<10	<100	<10
10-01-87	—	10.2	<0.100	0.005	<300	<350	<10	<10	<10	1400	<5	<10	<100	<10
10-01-87	—	6.60	<0.100	<0.005	<300	<350	<10	10	<10	1400	<5	<10	<100	<10
10-01-87	—	6.80	<0.100	<0.005	<300	<350	<10	<10	<10	730	<5	<10	<100	37
08-12-87	—	<0.500	0.846	0.140	4100	<1400	<240	70	<40	2600	<20	<40	<400	<40
06-23-87	—	<0.500	15.2	0.364	51000	<2800	<480	500	<80	9000	<40	<80	<800	<80
06-12-87	—	<0.500	0.333	0.133	710	<350	<10	30	<10	4200	<5	<10	<100	<10
08-19-87	—	7.00	0.224	0.052	<300	<350	<60	10	<10	1500	<5	<10	<100	<10
08-20-87	—	10.0	0.392	<0.005	<300	<350	<10	<10	<10	620	<5	<10	<100	<10
08-20-87	14	9.40	0.120	<0.010	40	<1	<1	<100	<10	640	—	<30	—	4
11-20-87	—	7.80	0.220	<0.005	<300	<350	<10	<10	<10	330	<5	18	<100	<10
06-16-87	—	<0.50	14.1	0.810	5300	<2800	<480	200	<80	5100	<40	<80	<800	<80

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Iron, total recov- erable (ug/L) (01045)	Lead, total recov- erable (ug/L) (01051)	Lithium total recov- erable (ug/L) (01132)	Manga- nese, total recov- erable (ug/L) (01055)	Mercury total recov- erable (ug/L) (71900)	Molyb- denum, total recov- erable (ug/L) (01062)	Nickel, total recov- erable (ug/L) (01067)	Selenium, total recov- erable (ug/L) (01147)	Silver, total recov- erable (ug/L) (01077)	Stron- tium, total recov- erable (ug/L) (01082)	Thal- lium, total recov- erable (ug/L) (01059)	Vana- dium, dis- solved (ug/L) (01085)	Zinc, total recov- erable (ug/L) (01092)	Cyanide total (mg/L) (00720)
07-21-87	1100	<45	—	94	<0.50	<100	<25	<70	<7	5600	<200	<100	240	<0.010
07-21-87	1100	<45	—	160	<0.50	<100	<25	<70	<7	8600	<200	<100	120	<0.010
07-31-87	5300	<180	—	1200	<0.50	<400	<100	<280	<28	12000	<800	<400	120	<0.010
07-30-87	14000	<180	—	770	<0.50	<400	<100	<280	<28	13000	<800	<400	140	<0.010
06-23-87	5600	<30	—	110	<0.50	<100	<25	<5	<7	680	<200	<100	100	<0.010
07-30-87	690	<45	—	92	<0.50	<100	<25	<70	<7	2900	<200	<100	40	<0.010
09-02-87	4800	<45	—	650	<0.50	<100	<25	<70	<7	6600	<200	<100	20	<0.010
09-03-87	1900	<45	—	260	<0.50	<100	<25	<70	<7	5900	<200	<100	<5	<0.010
09-01-87	290	<45	—	210	<0.50	<100	<25	<70	<7	920	<200	<100	50	<0.010
09-01-87	10000	<45	—	1400	<0.50	<100	<25	<70	<7	4700	<200	<100	50	<0.010
09-02-87	1800	<45	—	240	<0.50	<100	<25	<70	<7	6200	<200	<100	10	<0.010
09-02-87	1000	<45	—	670	<0.50	<100	<25	<70	<7	6500	<200	<100	70	<0.010
11-20-87	120	<45	—	<10	<0.50	<100	<25	<5	<7	260	<200	<100	<5	<0.010
10-01-87	3400	1600	—	80	<0.50	<100	100	<5	<7	390	<200	<100	610	<0.010
07-23-87	5000	<45	—	78	<0.50	<100	<25	<5	<7	170	<200	<100	30	<0.010
11-10-87	10	<45	—	<10	<0.50	<100	<25	<5	<7	250	<200	<100	10	<0.010
07-23-87	3600	<45	—	160	<0.50	<100	<25	<5	<7	1700	<200	<100	300	<0.010
11-10-87	140	<45	—	<10	<0.50	<100	<25	<5	<7	3900	<200	<100	<5	<0.010
11-19-87	80	<45	—	<10	<0.50	<100	<25	<5	<7	6200	<200	<100	<5	<0.010
08-19-87	10	<45	—	<10	<0.50	<100	<25	<70	<7	5100	<200	<100	<5	<0.010

Table 8a.—Common ion, trace, and nutrient chemical analyses of ground-water from selected wells in southwestern Oklahoma and northwestern Texas—Continued

Date	Iron, total recov- erable (ug/L) (01045)	Lead, total recov- erable (ug/L) (01051)	Lithium total recov- erable (ug/L) (01132)	Manga- nese, total recov- erable (ug/L) (01055)	Mercury total recov- erable (ug/L) (71900)	Molyb- denum, total recov- erable (ug/L) (01062)	Nickel, total recov- erable (ug/L) (01067)	Sele- nium, total recov- erable (ug/L) (01147)	Silver, total recov- erable (ug/L) (01077)	Stron- tium, total recov- erable (ug/L) (01082)	Thal- lium, total recov- erable (ug/L) (01059)	Vana- dium, dis- solved (ug/L) (01085)	Zinc, total recov- erable (ug/L) (01092)	Cyanide total (mg/L) (00720)
11-18-87	270	<45	—	<10	<0.50	<100	<25	6	<7	6100	<200	<100	1100	<0.010
11-20-87	330	<5	100	<20	<0.10	3	<100	<1	<1	5100	—	2	<10	<0.010
11-20-87	1200	<45	—	<10	<0.50	<100	<25	<5	<7	4700	<200	<100	10	<0.010
11-18-87	220	<45	—	<10	<0.50	<100	<25	<5	<7	5700	<200	<100	10	<0.010
11-17-87	170	<5	170	20	<0.10	<4	<100	<1	<1	8500	—	<31	100	<0.010
11-17-87	170	<45	—	16	<0.50	<100	<25	<70	7	8200	<200	<100	10	<0.010
11-11-87	1100	<45	—	21	<0.50	<100	<25	14	<7	7900	<200	<100	50	<0.010
09-17-87	100	<45	—	<10	<0.50	<100	<25	<5	<7	9200	<200	<100	<5	<0.010
07-22-87	420	<45	—	270	<0.50	<100	<25	<70	<7	11000	<200	<100	30	<0.010
06-16-87	460	<30	—	120	<0.50	<100	<25	<5	<7	3600	<200	<100	130	<0.010
11-20-87	100	<45	—	<10	<0.50	<100	<25	<5	<7	6900	<200	<100	10	<0.010
06-09-87	2300	<30	—	110	<0.50	<100	<25	<5	<7	16000	<200	<100	700	<0.010
11-16-87	80	<45	—	<10	<0.50	<100	<25	<5	<7	6900	<200	<100	20	<0.010
10-01-87	440	<45	—	<10	<0.50	<100	<25	8	<7	6400	<200	<100	5	<0.010
10-01-87	1200	<45	—	14	<0.50	<100	<25	30	<7	7900	<200	<100	6	<0.010
10-01-87	740	<45	—	<10	<0.50	<100	<25	<5	<7	5900	<200	<100	7	<0.010
08-12-87	2600	<180	—	760	<0.50	<400	<100	<280	<28	16000	<800	<400	40	<0.010
06-23-87	47000	<240	—	7900	<0.50	<800	<200	<560	<56	110000	<1600	<800	950	<0.010
06-12-87	350	<30	—	230	<0.50	<100	<25	<5	<7	27000	<200	<100	220	<0.010
08-19-87	50	<45	—	<10	<0.50	<100	<25	<70	<7	8000	<200	<100	<5	<0.010
08-20-87	440	<45	—	<10	<0.50	<100	<25	15	<7	5500	<200	<100	190	<0.010
08-20-87	440	<5	120	20	0.20	3	—	34	<1	4600	—	2	210	<0.010
11-20-87	490	<45	—	38	<0.50	<100	<25	<5	<7	3600	<200	<100	10	<0.010
06-16-87	7900	<240	—	3300	<0.50	<800	<200	<560	<56	100000	<1600	<800	100	<0.010



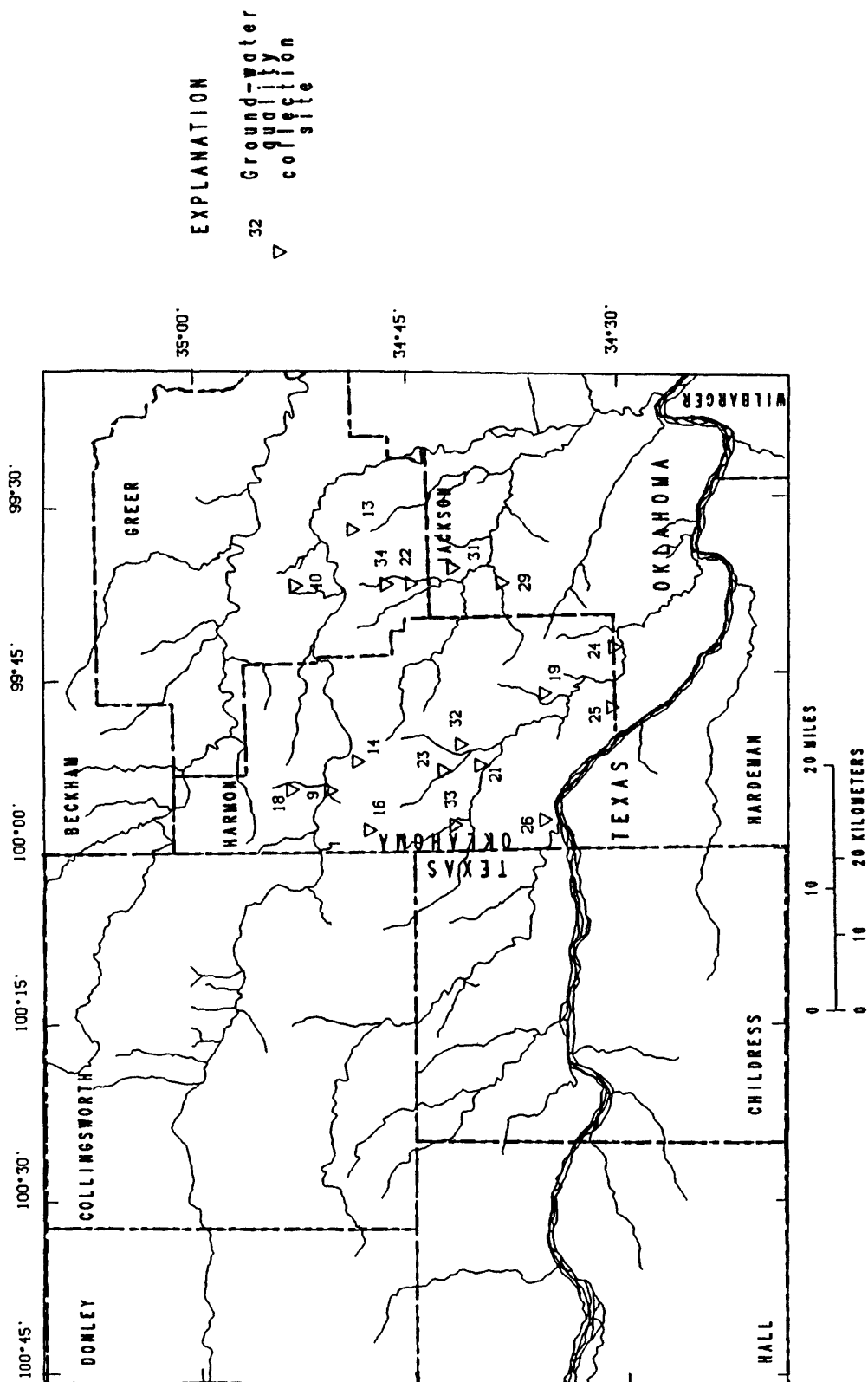


Figure 26. Location of ground-water quality collections sites analyzed for organic chemicals in southwestern Oklahoma (Index numbers on map refer to sites in table 8b).

Table 8b.—Organic chemical analyses of ground-water from selected wells in southwestern Oklahoma.

[110SFRT, Salt Fork Red River terrace aquifer; 110SFTA, Salt Fork Red River terrace and alluvial aquifer; 111SFRR, Salt Fork Red River terrace aquifer; 310WTRS, Whitehorse Group; 313BLIN, Blaine Gypsum (or Formation); 313EMFK, Elm Fork Member of (Blaine Gypsum or Formation); 313WOCR, Van Vactor Member of Blaine Gypsum (or Formation); ug/cm, microsiemens per centimeter; °C, degrees Celsius; ug/L, micrograms per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological Survey National Quality Laboratory; OWRB, Oklahoma Water Resources Board; <, less than]

Index num- ber on loca- tion map	Station number	Date	Time sampled	Geo- logic unit or aquifer	Station name	County	State	Agency col- lecting sample	Agency analyzing sample	Depth of well (feet)	Spe- cific con- duct- ance (us/cm) (00095)	pH, field (units) (00400)	Temper- ature water (°C) (0010)
9	345039099544401	09-01-87	1700	111SFRR	04N-26W-02 CCB 1	Harmon	Oklahoma	USGS	USGSL	22	1500	7.9	25.0
13	344847099321801	11-20-87	1800	110SFRT	04N-22W-17 CDC 1	Greer	Oklahoma	USGS	USGSL	80	568	7.8	16.5
14	344841099521001	10-01-87	1150	110SFTA	04N-25W-19 BAA 1	Harmon	Oklahoma	OWRB	USGSL	230	550	7.1	21.5
16	344753099580701	11-10-87	0940	110SFTA	04N-26W-19 DDC 1	Harmon	Oklahoma	USGS	USGSL	117	660	7.5	16.0
18	345320099543601	11-10-87	0820	310WTRS	05N-26W-23 DDB 1	Harmon	Oklahoma	USGS	USGSL	115	2980	7.3	17.5
19	343524099463001	11-19-87	1230	313BLIN	01N-25W-01 ADB 1	Harmon	Oklahoma	USGS	USGSL	145	4170	7.1	17.0
21	344000099523901	11-18-87	1600	313BLIN	02N-26W-12 AAAA 1	Harmon	Oklahoma	USGS	USGSL	200	4060	7.4	13.0
22	344445099370001	11-20-87	0830	313BLIN	03N-23W-09 DAB 1	Greer	Oklahoma	USGS	USGSL	125	3540	7.5	17.0
23	344235099530501	11-18-87	1400	313BLIN	03N-26W-25 ABB 1	Harmon	Oklahoma	USGS	USGSL	200	3460	7.3	17.5
24	343020099422001	11-17-87	1230	313WOCR	01N-24W-34 DCC 1	Harmon	Oklahoma	USGS	USGSL	94	11400	7.1	16.5
25	343042099474701	11-11-87	1000	313WOCR	01N-25W-35 DDBA 1	Harmon	Oklahoma	USGS	USGSL	72	9160	7.4	15.0
26	343530099572501	09-17-87	1050	313WOCR	01N-26W-05 BAD 1	Harmon	Oklahoma	OWRB	USGSL	100	5500	6.7	22.5
29	343820099370201	11-20-87	1230	313WOCR	02N-23W-16 ABD 1	Jackson	Oklahoma	USGS	USGSL	99	6610	7.1	18.5
31	344144099354501	11-16-87	1600	313WOCR	03N-23W-35 BBBB 1	Jackson	Oklahoma	USGS	USGSL	94	3940	7.6	16.0
32	344123099505101	10-01-87	1340	313WOCR	03N-25W-32 ACD 1	Harmon	Oklahoma	OWRB	USGSL	156	3200	6.8	21.5
33	344149099574901	10-01-87	1040	313WOCR	03N-26W-29 CCB 1	Harmon	Oklahoma	OWRB	USGSL	110	2850	6.8	20.0
34	344630099370201	10-01-87	1520	313WOCR	04N-23W-33 DAB 1	Greer	Oklahoma	OWRB	USGSL	155	2400	6.6	21.0
40	345254099370301	11-20-87	1600	313EMFK	05N-23W-27 BDA 1	Greer	Oklahoma	USGS	USGSL	127	2880	7.3	18.0

Table 8b.—Organic chemical analyses of ground-water from selected wells in southwestern Oklahoma—Continued

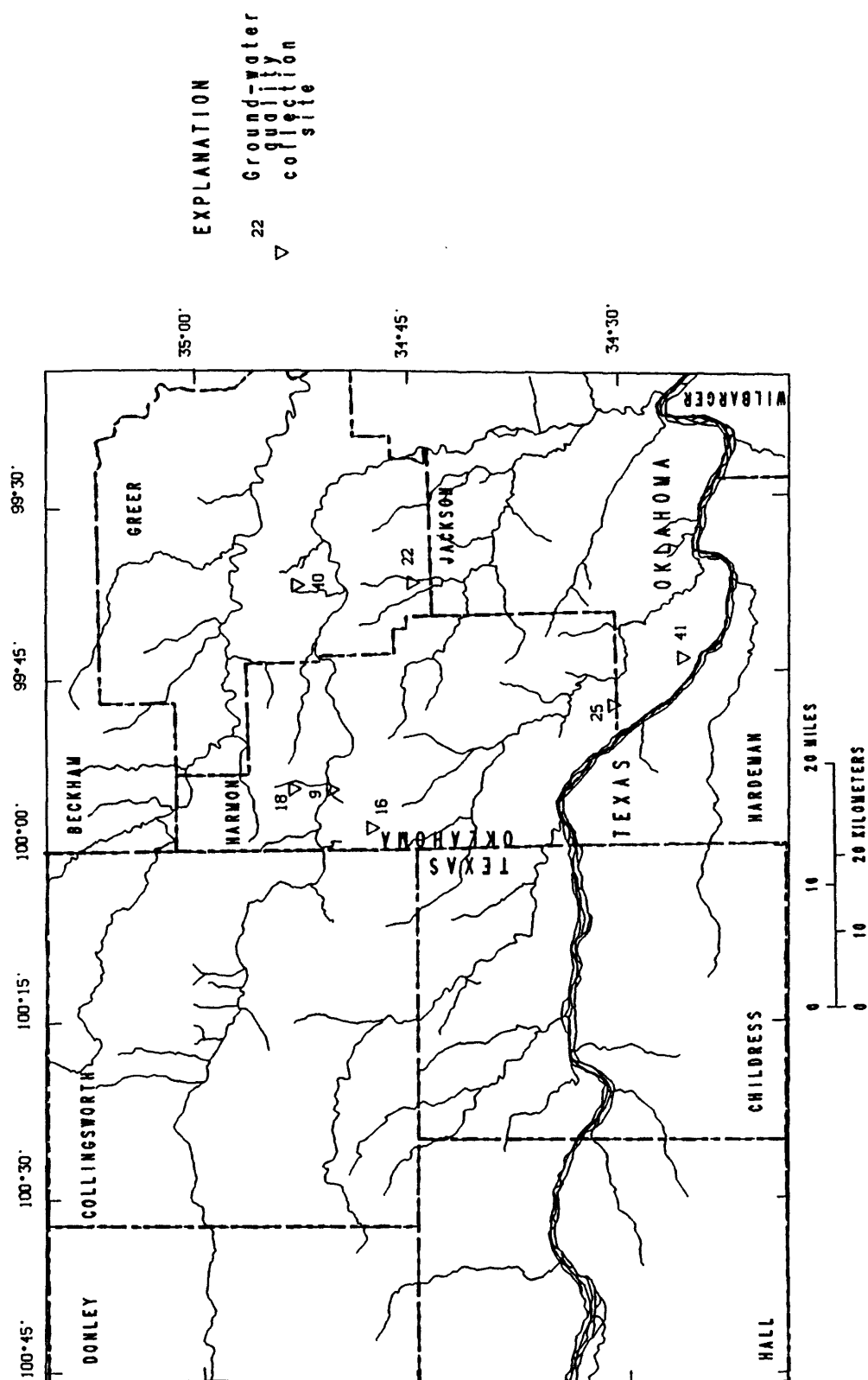
Date	2,4-D, 2,4-DP, 2,4,5-T, total (ug/L) (39730)	2,4-DP, 2,4,5-T, total (ug/L) (39740)	Ald- chlor, total (ug/L) (77825)	Aldrin, total (ug/L) (39330)	Ame- tryne, total (ug/L) (82184)	Atra- zine, unfil- tered, recov- erable total (ug/L) (39630)	Chlor- dane, unfil- tered total (ug/L) (39350)	Cyan- azine, total (ug/L) (81757)	DDD, unfil- tered, recov- erable total (ug/L) (39360)	DDE, total (ug/L) (39365)	DDT, unfil- tered, recov- erable total (ug/L) (39370)	Di- azinon, total (ug/L) (39570)	Di- drin, total (ug/L) (39380)
09-01-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-20-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
10-01-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-10-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-10-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-19-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-18-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-20-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-18-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-17-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-11-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
09-17-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-20-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-16-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
10-01-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
10-01-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
10-01-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010
11-20-87	<0.010	<0.010	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.010	<0.010	<0.010	<0.010	<0.010

Table 8b.—Organic chemical analyses of ground-water from selected wells in southwestern Oklahoma—Continued

Date	Endo- sulfan, total (ug/L) (39388)	Endrin, unfil- tered recov- erable (ug/L) (39390)	Ethion, total (ug/L) (39398)	Hepta- chlor, epoxide, total (ug/L) (39410)	Hepta- chlor total (ug/L) (39420)	Lindane, total (ug/L) (39340)	Mala- thion, total (ug/L) (39530)	Meth- oxy- chlor, total (ug/L) (39480)	Methyl para- thion, total (ug/L) (39600)	Methyl tri- thion, total (ug/L) (39790)	Metola- chlor, water whole total recov- erable (ug/L) (82612)	Metri- buzin, water whole total recov- erable (ug/L) (82611)	Mirex, total (ug/L) (39755)
09-01-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-20-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
10-01-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-10-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-10-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-19-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-18-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-20-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-18-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-17-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-11-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
09-17-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-20-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-16-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
10-01-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
10-01-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
10-01-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010
11-20-87	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010	<0.01	<0.100	<0.100	<0.010

Table 8b.—Organic chemical analyses of ground-water from selected wells in southwestern Oklahoma—Continued

Date	Naph- tha- lenes, poly- onated total (ug/L) (39250)	Para- thion, total (ug/L) (39540)	PCB, total (ug/L) (39516)	Per- thane, total (ug/L) (39034)	Prone- thone, total (ug/L) (39056)	Prome- thryne, total (ug/L) (39057)	Pro- pazine, total (ug/L) (39024)	Silvex, total (ug/L) (39760)	Sima- zine, total (ug/L) (39055)	Sime- tryne, total (ug/L) (39054)	Tox- aphene, total (ug/L) (39400)	Tri- flura- lin, total (ug/L) (39030)	Tri- thion, total (ug/L) (39786)
09-01-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-20-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
10-01-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-10-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-10-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-19-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-18-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-20-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-18-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	0.200	<0.100	<1.00	<0.100	<0.010
11-17-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-11-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
09-17-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-20-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-16-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
10-01-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
10-01-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
10-01-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010
11-20-87	<0.100	<0.010	<0.100	<0.100	<0.100	<0.100	<0.100	<0.010	<0.100	<0.100	<1.00	<0.100	<0.010



**Figure 27.** Location of ground-water quality collection sites analyzed for radionuclides in southwestern Oklahoma (index numbers on map refer to sites in table 8c).

Table 8c.—Radionuclide chemical analyses of ground-water from selected wells in southwestern Oklahoma

[110SFTA, Salt Fork River terrace and alluvial aquifer; 111SFRR, Salt Fork Red River alluvial aquifer; 310WTRS, Whitehorse Group; 313BLIN, Blaine Gypsum (or Formation); 313EMFK, Elm Fork Member of (Blaine Gypsum or Formation); 313FLRP, Flowerpot Shale; 313VOCR, Van Vactor Member of Blaine Gypsum (or Formation); us/cm, microsieams per centimeter; °C, degrees Celsius; ug/L, micrograms per liter; U-Nat, uranium-natural; Cs-137, Cesium-137; Sr/Y-90, strontium/yttrium-90; pci/L, picocuries per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological National Water Quality Laboratory; OSDHRC, Oklahoma State Department of Health Radiochemistry Laboratory (now Oklahoma Department of Environmental Quality Radiochemical Laboratory; <, less than; >, greater than]

Index number on location map	Station number	Date	Time sampled	Geo-logic unit or aquifer	Station name	County	State	Agency collecting sample	Agency analyzing sample	Depth of well (feet) (72008)	Specific conductance (us/cm) (00095)	pH, field (units) (00400)	Temperature water (°C) (00010)
9	34503909544401	09-01-87	1700	111SFRR	04N-26W-02 C0BB 1	Harmon	Oklahoma	USGS	OSDHR	22	1500	7.9	25.0
16	34475309580701	11-10-87	0940	110SFTA	04N-26W-19 D0C 1	Harmon	Oklahoma	USGS	OSDHR	117	660	7.5	16.0
18	34532009543601	11-10-87	0820	310WTRS	05N-26W-23 D0BB 1	Harmon	Oklahoma	USGS	OSDHR	115	2980	7.3	17.5
22	34444509370001	11-20-87	0830	313BLIN	03N-23W-09 DAB 1	Greer	Oklahoma	USGS	USGSL	125	3540	7.5	17.0
		11-20-87	0831	313BLIN	03N-23W-09 DAB 1	Greer	Oklahoma	USGS	OSDHR	125	3540	7.5	17.0
25	343042099474701	11-11-87	1000	313VOCR	01N-25W-35 D0BA 1	Harmon	Oklahoma	USGS	OSDHR	72	9160	7.4	15.0
40	345254099370301	11-20-87	1600	313EMFK	05N-23W-27 BDA 1	Greer	Oklahoma	USGS	USGSL	127	2880	7.3	18.0
		11-20-87	1601	313EMFK	05N-23W-27 BDA 1	Greer	Oklahoma	USGS	OSDHR	127	2880	7.3	18.0
41	342542099434802	06-16-87	1730	313FLRP	01S-24W-32 DBAA 2	Jackson	Oklahoma	USGS	OSDHR	239	>200000	8.7	21.0

Date	Gross alpha, dis-solved (ug/L) (80030)	Gross alpha, suspen-ded total (ug/L) as U-Nat (80040)	Gross beta, dis-solved (pci/L) as Cs-137 (03515)	Gross beta, suspen-ded total (pci/L) as Cs-137 (03516)	Gross beta, dis-solved (pci/L) as Sr/Y-90 (80050)	Gross beta, suspen-ded total (pci/L) as Sr/Y-90 (80060)	Radium -226, beta, dis-solved, Uranium, planchet natural, count dissolved (ug/L) (22703)
09-01-87	1.1	—	—	—	11	—	0.4
11-10-87	0.5	—	—	—	1.7	—	0.3
11-10-87	18	—	—	—	0.6	—	0.2
11-20-87	13	<0.4	4.5	0.7	3.4	0.7	<0.4
11-20-87	2.5	—	—	—	1.7	—	0.3
11-11-87	3.0	—	—	—	34	—	0.5
11-20-87	1.9	<0.4	6.0	<0.4	4.1	<0.4	<0.4
11-20-87	1.5	—	—	—	0.5	—	0.0
06-16-87	180	—	—	—	140	—	5.0
							1.4

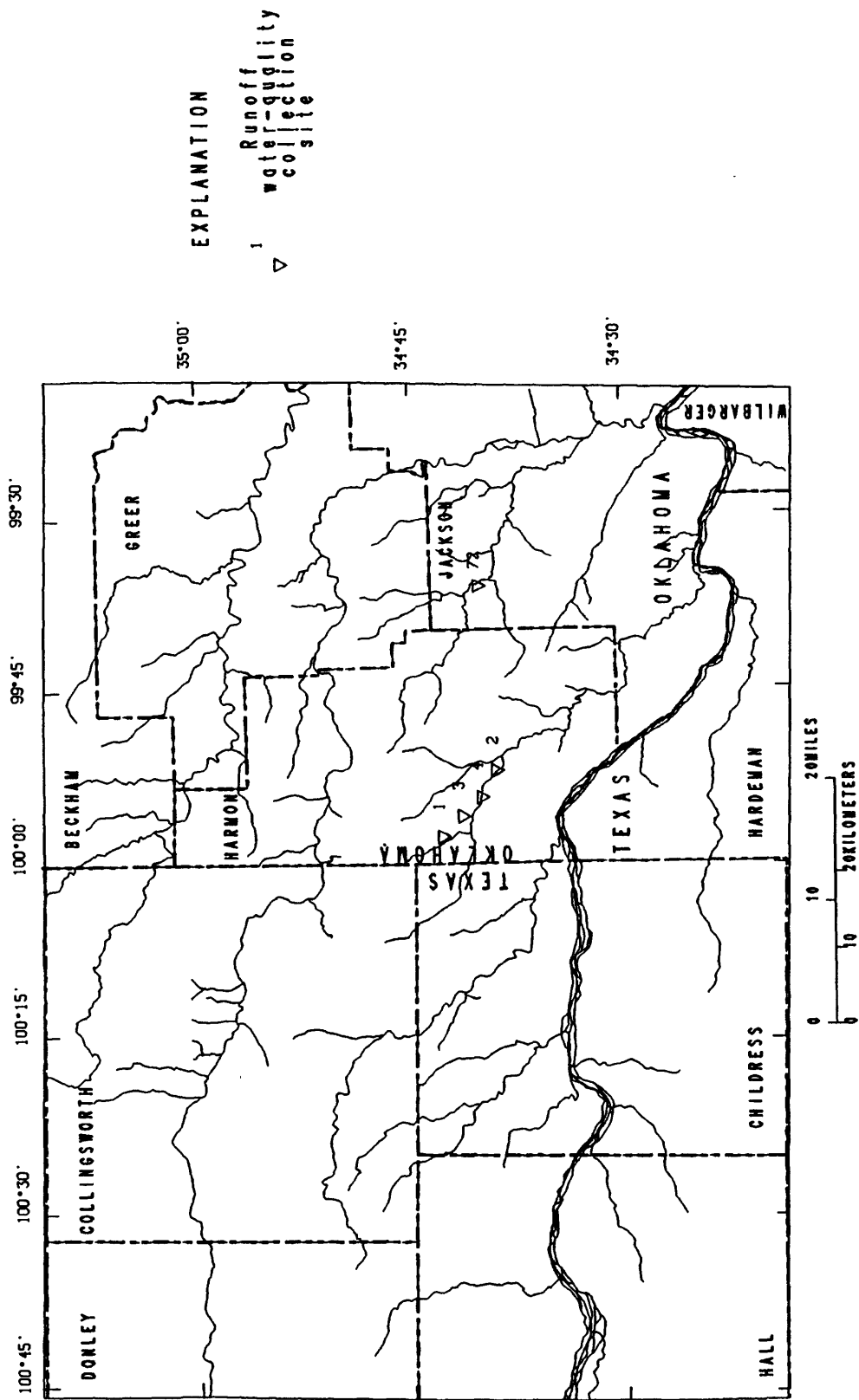


Figure 28. Location of runoff-water collection sites in southwestern Oklahoma (index numbers on map refer to sites in table 9a).



Table 9a.—Common ion, trace, and nutrient chemical analyses of runoff water in southwestern Oklahoma

[ft<sup>3</sup>/sec, cubic feet per second; us/cm, microsiemens per centimeter; °C, degrees Celsius; mg/L, milligrams per liter; ug/L, micrograms per liter; USGS, U.S. Geological Survey; USGSL, U.S. Geological Survey National Water Quality Laboratory; OSDH, Oklahoma State Department of Health Laboratory (now Oklahoma Department of Environmental Quality Laboratory); \*, dissolved constituent; \*\*, field measurement; —, no data, <, less than]

Index number on location map	Station number	Date	Time	Station name	County	State	Agency collecting sample
1	344244099573902	05-27-86	1730	Bitter Ck diversion into recharge well nr Hollis	03N-26W-20 CCDA 2	Harmon Oklahoma	USGS
2	343856099520201	05-27-86	1840	West Fk Sandy Ck nr diversion into sinkhole nr Gould	02N-25W-18 ABCC 1	Harmon Oklahoma	USGS
3	344119099555302	05-28-87	1410	Diversion into recharge well west of Hollis, Oklahoma	03N-26W-33 DAAB 1	Harmon Oklahoma	USGS
4	34400099541701	05-28-87	1515	West Fork Sandy Creek at Hollis, Oklahoma	02N-26W-10 AAAA 1	Harmon Oklahoma	USGS
72	344005099360701	05-28-87	1800	Turkey Creek at U.S. Highway 62 near Duke, Oklahoma	02N-23W-33 DCD 1	Jackson Oklahoma	USGS

Date	Stream-flow, instantaneous (ft <sup>3</sup> /sec) (00061)	Specific conductance, field (us/cm) (00095)	pH, field (units) (00400)	Temperature, water (°C) (00010)	Hardness, total (mg/L) (00900)	Alkalinity, lab (mg/L) (90410)	Solids, residue at 105°C, total (mg/L) (00500)	Calcium, total recoverable (mg/L) (*00915)	Magnesium, total recoverable (mg/L) (*00925)	Sodium, total recoverable (mg/L) (*00930)	Sodium adsorption ratio (00931)	Potassium, total recoverable (mg/L) (*00935)	Bicarbonate, incremental titration, lab (mg/L) (*99440)	Carbonate, incremental titration, lab (mg/L) (*99445)
05-27-86	1.9	2510	8.2	—	1300	172**	2670*	210*	190*	240*	3	14*	210**	0**
05-27-86	10	206	8.0	—	87	76**	153*	27*	4.7*	8.8*	0.4	8.8*	93**	0**
05-28-87	—	130	7.6	16.0	36	89	185	11	14	<10	<0.5	13	109	0
05-28-87	—	168	7.9	16.0	190	<15	229	52	71	<10	<0.2	9.5	<18	<20
05-28-87	—	393	7.8	17.0	230	<15	251	71	62	21	0.4	10	<18	94

Table 9a.—Common ion, trace, and nutrient chemical analyses of runoff water in southwestern Oklahoma—Continued

Date	Chloride, dissolved (mg/L)		Fluoride, dissolved (mg/L)		Bromide, dissolved (mg/L)		Iodide, dissolved (mg/L)		Silica, dissolved (mg/L)		Nitrogen, nitrate, total (mg/L)		Nitrogen, ammonia, total (mg/L)		Phosphorus, ortho, total (mg/L)		Aluminum, total (ug/L)		Antimony, total (ug/L)		Arsenic, total (ug/L)		Barium, total (ug/L)		Beryllium, total (ug/L)		Boron, total (ug/L)		Cadmium, total (ug/L)		Chromium, total (ug/L)	
	(00940)	(00951)	(00950)	(71870)	(71865)	(00955)	(00631)	(00610)	(70507)	(01105)	(01097)	(01000)	(01002)	(01007)	(01012)	(01022)	(01025)	(01030)	(01034)													
05-27-86	140	0.30*	0.27	—	—	9.6	<0.100*	—	—	—	—	5*	200*	<2*	930*	<3.0*	<10*															
05-27-86	5.4	0.20*	<0.010	—	—	10	0.300*	—	—	—	—	5*	75*	<0.5*	50*	<1.0*	<10*															
05-28-87	<10	<0.1	0.15	<0.001	—	—	<0.500	0.229	0.520	24000	<350	10	210	<10	<100	<5	16															
05-28-87	10	<0.1	0.40	<0.001	—	—	<0.500	0.400	0.287	125000	<350	<13	1200	<10	<100	<5	100															
05-28-87	26	<0.1	<0.010	<0.001	—	—	<0.500	0.343	0.170	86000	<350	<25	900	<10	180	<5	73															

Date	Cobalt, total (ug/L)		Copper, total (ug/L)		Iron, total (ug/L)		Lead, total (ug/L)		Lithium, dissolved (ug/L)		Manganese, total (ug/L)		Mercury, total (ug/L)		Molybdenum, total (ug/L)		Nickel, total (ug/L)		Selenium, total (ug/L)		Silver, total (ug/L)		Strontium, total (ug/L)		Thallium, total (ug/L)		Vanadium, dissolved (ug/L)		Zinc, total (ug/L)		Cyanide, total (mg/L)	
	(01035)	(01037)	(01040)	(01042)	(01045)	(01045)	(01049)	(01051)	(01130)	(01130)	(01055)	(01055)	(01055)	(01055)	(01060)	(01062)	(01067)	(01067)	(01145)	(01077)	(01080)	(01082)	(01059)	(01085)	(01085)	(01090)	(01092)	(01090)	(01092)	(01090)	(01092)	
05-27-86	<9*	<30*	<9*	<30*	85*	<30*	43	<30*	—	—	—	—	—	—	<30*	<30*	—	—	1*	—	—	3100*	—	—	—	<18	27*	—	—	—	—	
05-27-86	<3*	20*	85*	<10*	—	<10*	7	<10*	—	—	—	—	—	—	<10*	<10*	—	—	<1*	—	—	140*	—	—	—	9	15*	—	—	—	—	
05-28-87	<100	<10	14000	44	77000	<10	—	44	250	<100	27	<5	<7	<100	<100	107	107	38	<5	<7	<7	<100	<200	<200	<200	150	250	<0.010	<0.010	<0.010	<0.010	
05-28-87	<100	79	77000	74	56000	<30	—	<30	—	—	1500	<0.50	<0.50	<100	<100	79	79	37	37	<7	<7	440	<200	<200	<200	110	180	<0.010	<0.010	<0.010	<0.010	

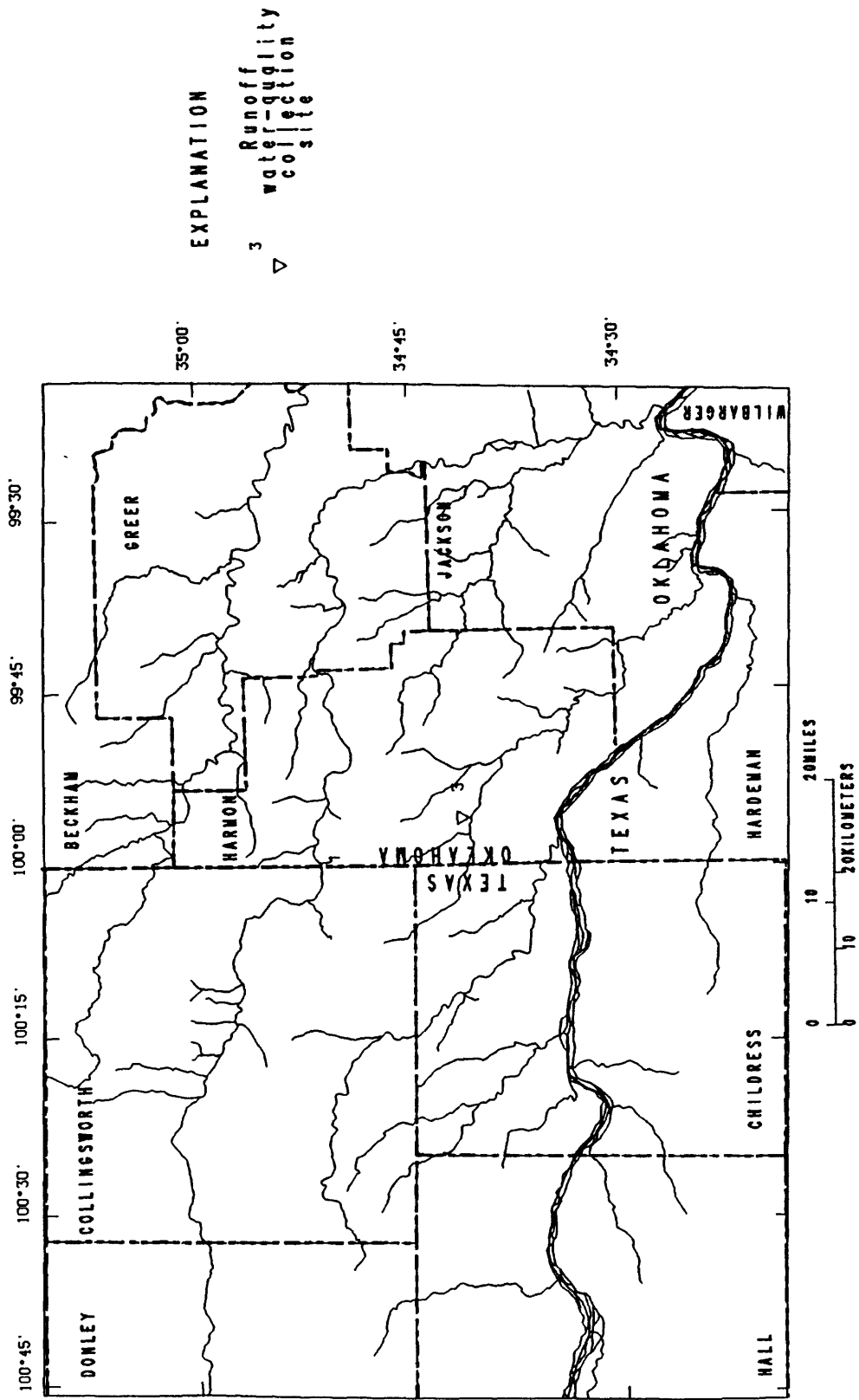


Figure 29. Location of runoff-water collection site analyzed for radionuclides in southwestern Oklahoma (index number on map refers to site in table 9b).

