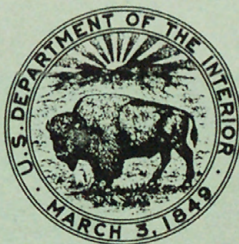


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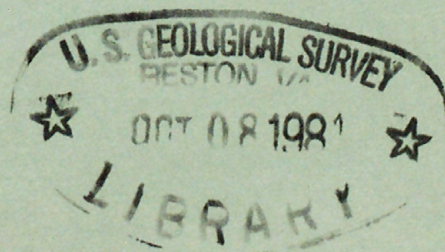
UNITED STATES  
DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY

GROUND-WATER LEVELS IN ARKANSAS, SPRING 1981



Open-File Report 81-1114

Prepared in cooperation with the  
ARKANSAS GEOLOGICAL COMMISSION









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By Joe Edds

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Open-file report  
(United States  
Geological Survey)

Little Rock, Arkansas

September 1981

319120

UNITED STATES DEPARTMENT OF THE INTERIOR

JAMES G. WATT, Secretary

GEOLOGICAL SURVEY

Doyle G. Frederick, Acting Director

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## METRIC CONVERSION TABLE

The following factors can be used to convert the inch-pound unit in this report to the equivalent International System (SI) metric unit.

| <u>Multiply inch--pound unit</u> | <u>By</u> | <u>To obtain SI unit</u> |
|----------------------------------|-----------|--------------------------|
| foot                             | 0.3048    | meter                    |
| mile                             | 1.609     | kilometer                |

# GROUND-WATER LEVELS IN ARKANSAS, SPRING 1981

---

By Joe Edds

---

## INTRODUCTION

This report contains records of water-level measurements from wells in Arkansas that comprise the statewide observation-well network maintained by the U.S. Geological Survey, in cooperation with the Arkansas Geological Commission. The observation-well network is designed to provide data for evaluation of the regional trend of water-level changes in each of the principal water-bearing formations (aquifers) that are tapped by wells in the State.

Water-level measurements listed in the report were made during March, April, and May 1981. The data are listed by aquifer, then by county. For additional information on the hydrologic properties of the aquifer, the reader is referred to the selected references section of the report.

Also included in the report are potentiometric-surface maps and water-level hydrographs for the alluvial aquifer and the Sparta Sand aquifer--two important aquifers in Arkansas for water availability and use. The "Sparta Sand" aquifer, as termed in this report, also includes a water-bearing unit in northeastern Arkansas that is variously termed locally as the "Memphis aquifer" or the "500-foot" sand.

The potentiometric-surface maps (figs. 1 and 2), prepared from data in tables 1 and 4, indicate the direction of downgradient movement of water in the alluvial aquifer and the Sparta Sand aquifer. For example, the potentiometric surface for the Sparta Sand (fig. 2) indicates that water moves from surrounding areas toward centers of potentiometric-surface lows in



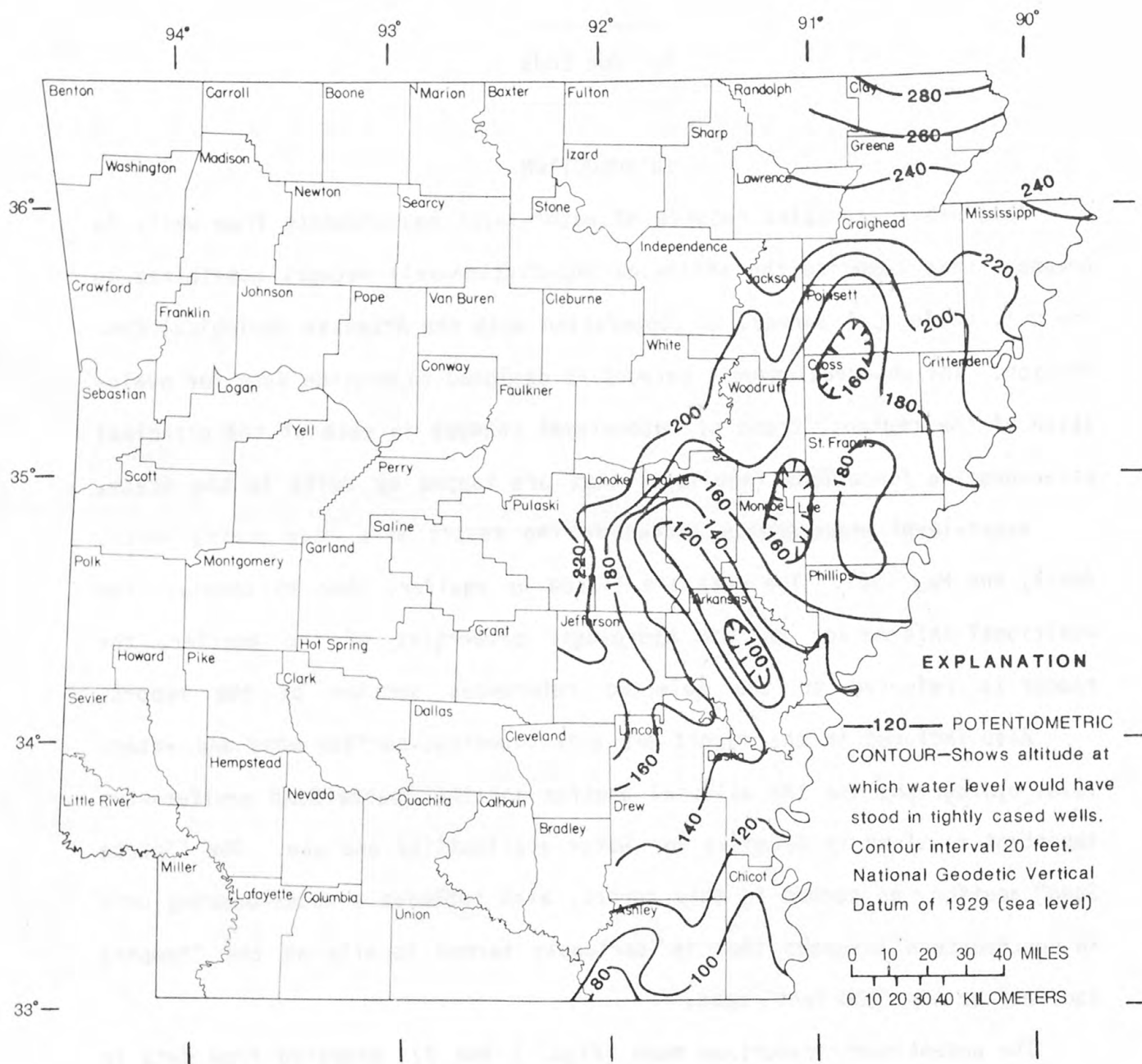


Figure 1.--Potentiometric surface of the alluvial aquifer in Arkansas, spring 1981.

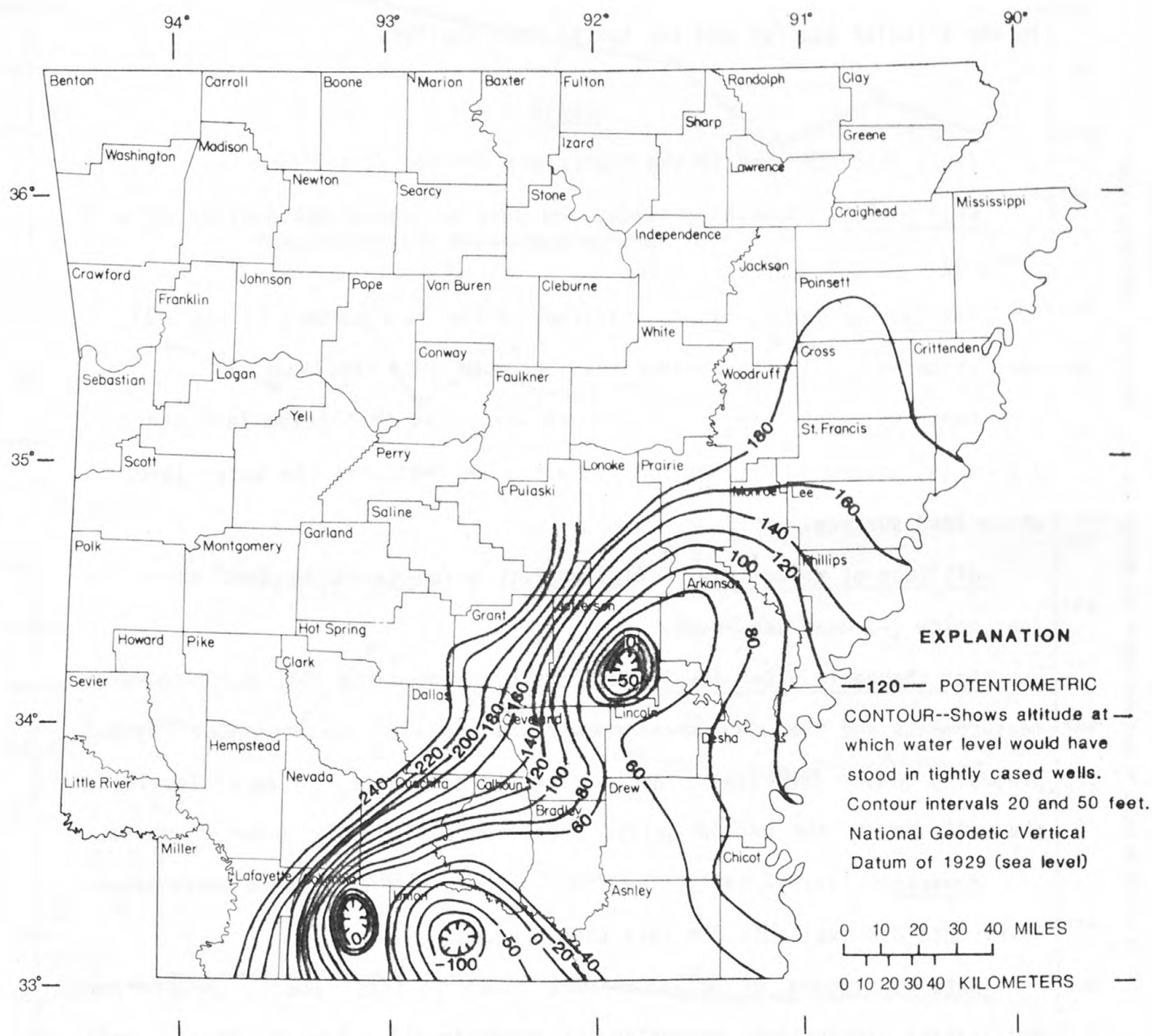


Figure 2.--Potentiometric surface of the Sparta Sand in Arkansas, spring 1981.



Columbia, Union, and Jefferson Counties. The water-level hydrographs (figs. 3 and 4) show long-term trends in water levels in selected wells completed in the alluvial aquifer and the Sparta Sand aquifer.

#### DATA

Table headings used in the report are defined as follows:

Well number: Township, range, and section number designation of well (fig. 5).

Altitude of land surface: Altitude of the land surface at the well, in feet above National Geodetic Vertical Datum of 1929 (sea level).

Depth to water: Measured depth to water, in feet below land surface. A plus (+) preceding the depth-to-water value indicates the water level is above land surface.

Altitude of water level: Altitude of water level in feet above, or feet below (-) mean sea level.

Net change in water level: Difference between the 1981 depth-to-water measurements and the 1977 measurements and the 1980 measurements. Symbol preceding number indicates a decline (-) or a rise (+) in water levels in the well during the period unless specified differently under "Remarks."

Remarks: (Year)--1981, time interval for net-change value where water-level data are available for less than 5 years.

Data for depths of wells are not given in this report. However, a qualitative distinction generally is made locally for describing well depths. Thus, wells tapping the alluvial aquifer are considered to be "shallow wells," whereas wells tapping other aquifers are considered to be "deep wells."

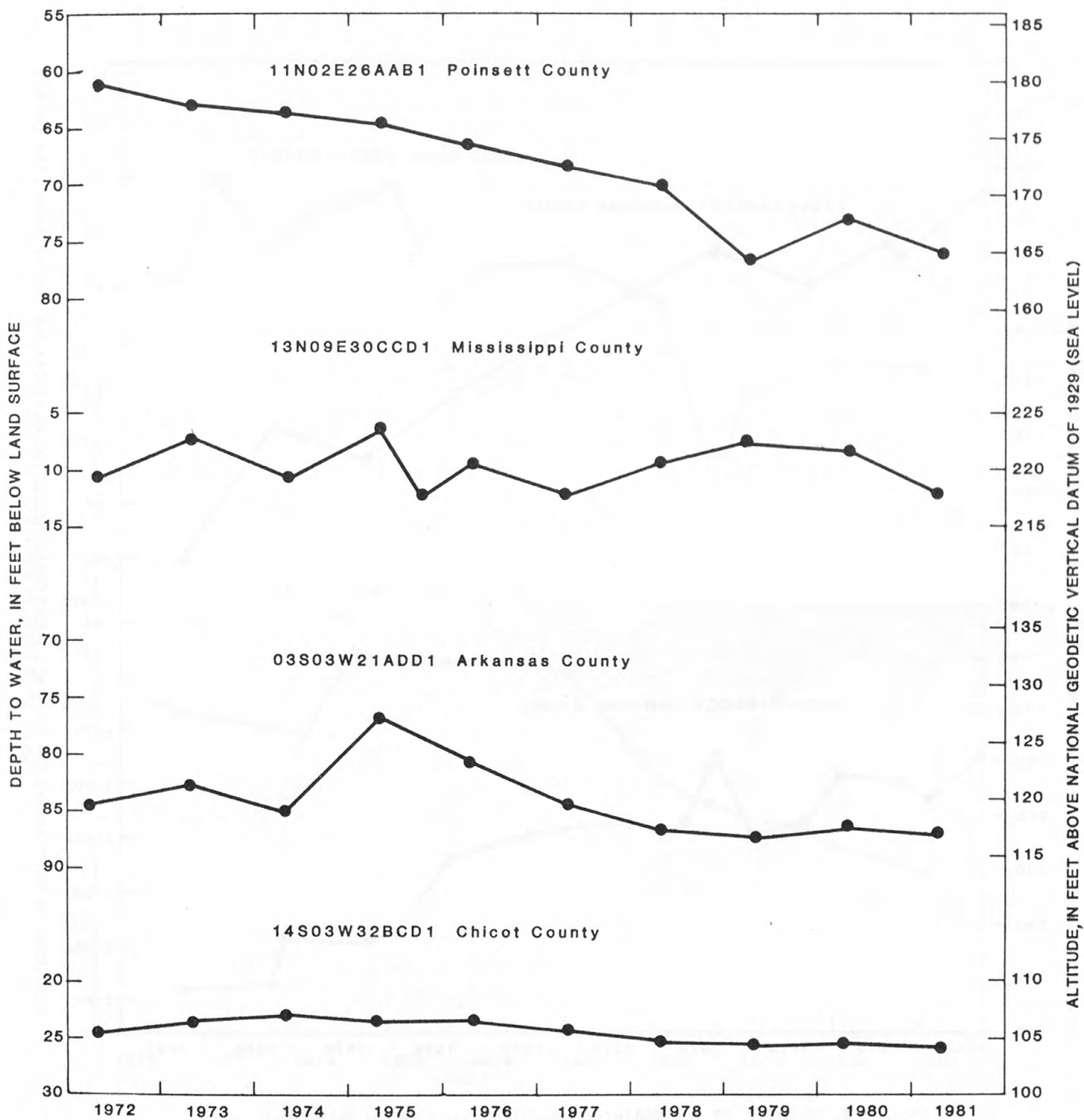


Figure 3.—Water-level hydrographs for selected wells completed in the alluvial aquifer.



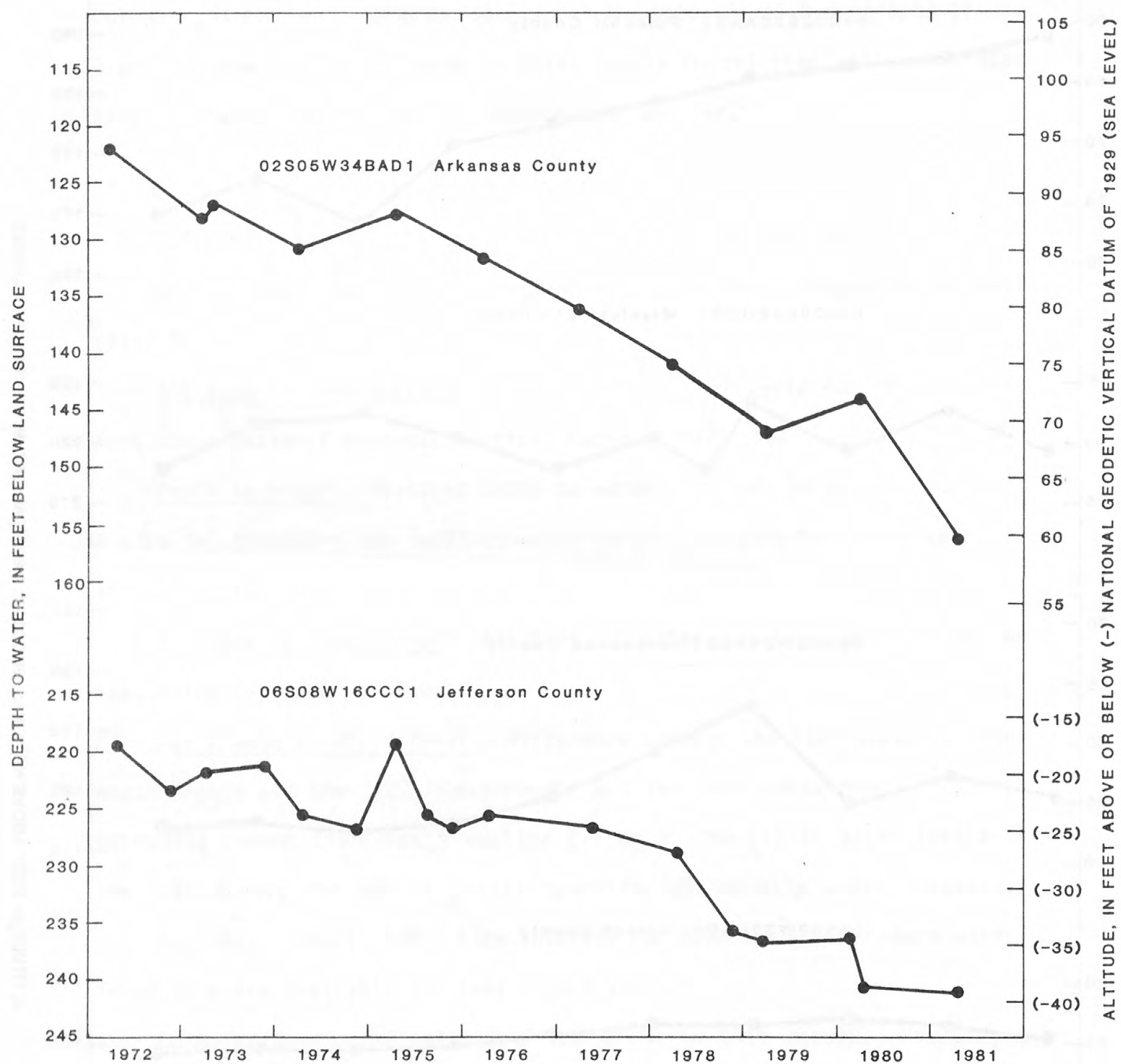


Figure 4, sheet 1 of 2.—Water-level hydrographs for selected wells completed in the Sparta Sand.

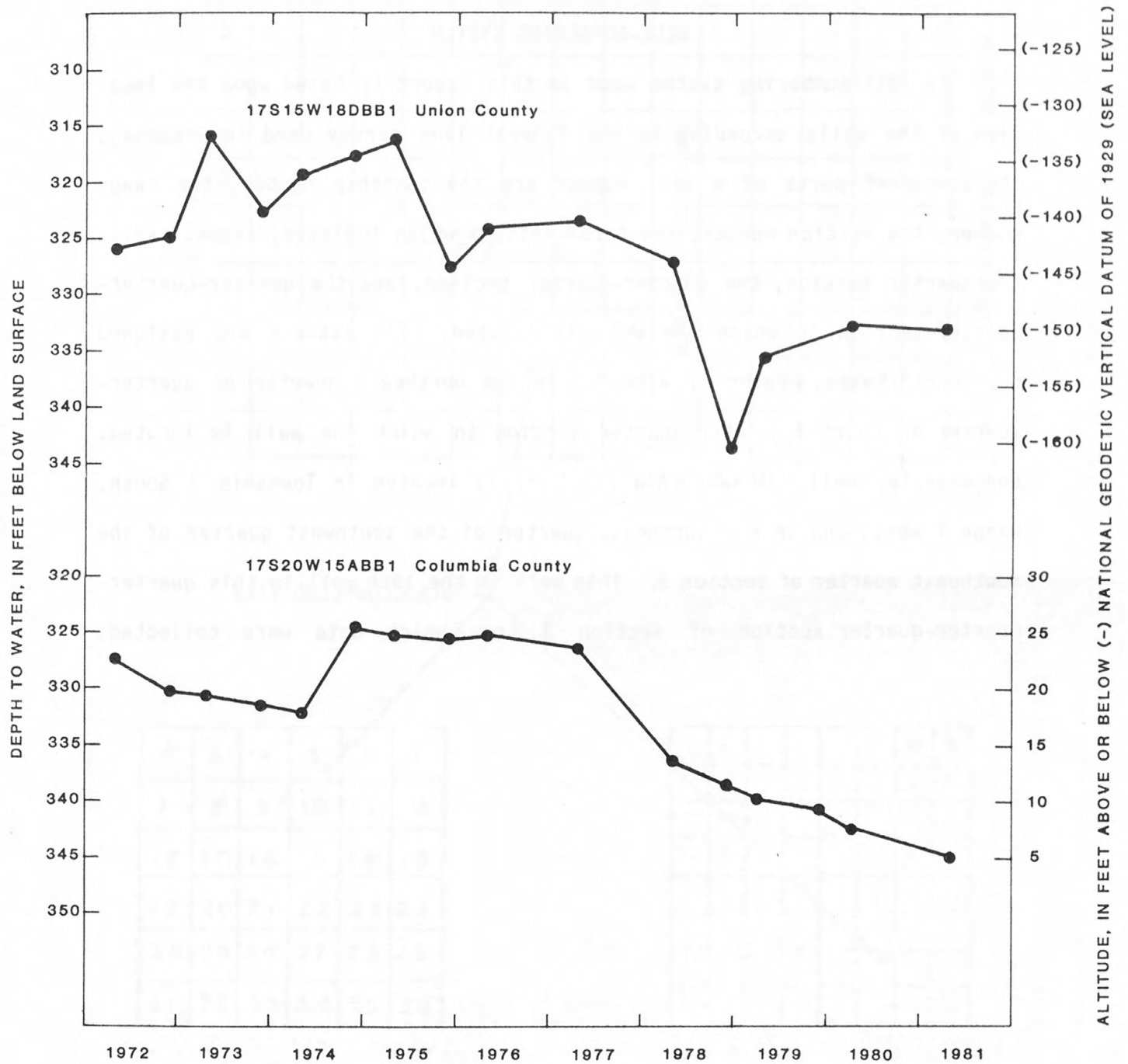


Figure 4, sheet 2 of 2.--Water-level hydrographs for selected wells completed in the Sparta Sand.

## WELL-NUMBERING SYSTEM

The well-numbering system used in this report is based upon the location of the wells according to the federal land survey used in Arkansas. The component parts of a well number are the township number, the range number, the section number, and three letters which indicate, respectively, the quarter section, the quarter-quarter section, and the quarter-quarter-quarter section in which the well is located. The letters are assigned counterclockwise, beginning with "A" in the northeast quarter or quarter-quarter or quarter-quarter-quarter section in which the well is located. For example, well 03S04W03DCA16 (fig. 5) is located in Township 3 South, Range 4 West, and in the northeast quarter of the southwest quarter of the southeast quarter of section 3. This well is the 16th well in this quarter-quarter-quarter section of section 3 from which data were collected.



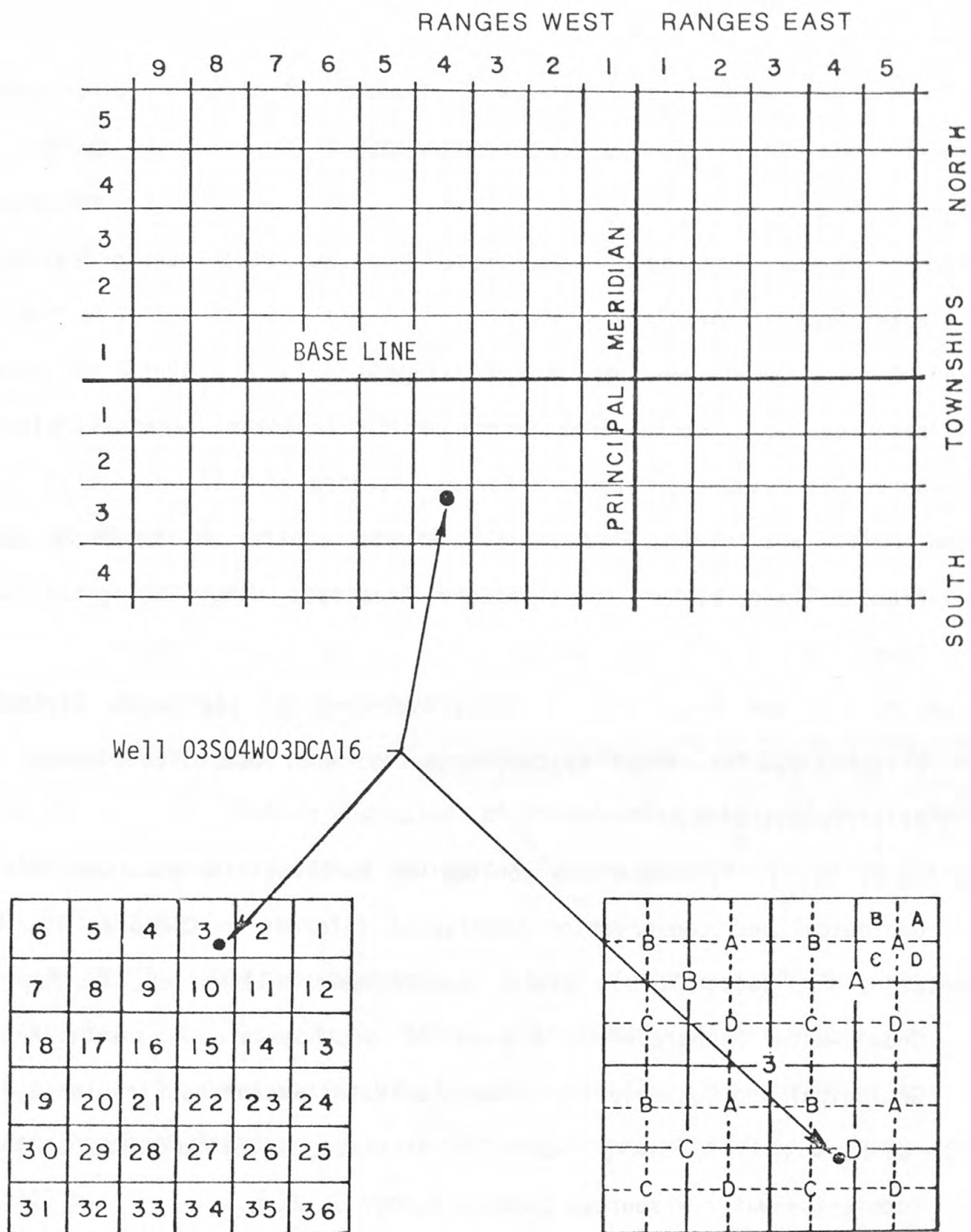


Figure 5.--Well-numbering system.

#### SELECTED REFERENCES

- Albin, D. R., Hines, M. S., and Stephens, J. W., 1967, Water resources of Jackson and Independence Counties, Arkansas: U.S. Geological Survey Water-Supply Paper 1839-G, 29 p.
- Baker, R. C., Hewitt, F. A., and Billingsley, G. A., 1948, Ground-water resources of El Dorado area, Union County, Arkansas: Arkansas University Bureau of Research, Research Series 14, 39 p.
- Broom, M. E., and Lyford, F. P., 1981, Alluvial aquifer of the Cache and St. Francis River basins, northeastern Arkansas: U.S. Geological Survey Open-File Report 81-476, 48 p.
- Broom, M. E., and Reed, J. E., 1973, Hydrology of the Bayou Bartholomew alluvial aquifer-stream system, Arkansas: U.S. Geological Survey open-file report, 91 p.
- Caplan, W. M., 1957, Subsurface geology of northwestern Arkansas: Arkansas Geological and Conservation Commission Information Circular 19, 14 p.
- Counts, H. B., Tait, D. B., Klein, Howard, and Billingsley, G. A., 1955, Ground-water resources in a part of southwestern Arkansas: Arkansas Geological and Conservation Commission Water Resources Circular 2, 35 p.
- Halberg, H. N., 1977, Use of water in Arkansas, 1975: Arkansas Geological Commission Water Resources Summary Number 9, 28 p.
- Halberg, H. N., and Reed, J. E., 1964, Ground-water resources of eastern Arkansas in the vicinity of U.S. Highway 70: U.S. Geological Survey Water-Supply Paper 1770-V, 38 p.
- Hines, M. S., Plebuch, R. O., and Lamonds, A. G., 1972, Water resources of Clay, Greene, Craighead, and Poinsett Counties, Arkansas: U.S. Geological Survey Hydrologic Investigations Atlas HA-377.

- Hosman, R. L., Long, A. T., Lambert, T. W., and others, 1968, Tertiary aquifers in the Mississippi embayment: U.S. Geological Survey Professional Paper 448-D, 29 p.
- Lamonds, A. G., 1971, Hydrology of Horseshoe Lake, Arkansas: U.S. Geological Survey open-file report, 77 p.
- Lamonds, A. G., Hines, M. S., and Plebuch, R. O., 1969, Water resources of Randolph and Lawrence Counties, Arkansas: U.S. Geological Survey Water-Supply Paper 1879-B, 45 p.
- Ludwig, A. H., 1972, Water resources of Hempstead, Lafayette, Little River, Miller, and Nevada Counties, Arkansas: U.S. Geological Survey Water-Supply Paper 1998, 41 p.
- Plebuch, R. O., 1961, Fresh-water aquifers of Crittenden County, Arkansas: Arkansas Geological Commission Water Resources Circular 8, 65 p.
- Ryling, R. W., 1960, Nature and extent of ground-water supply of Mississippi County, Arkansas: Arkansas Geological Commission Water Resources Circular 7, 87 p.
- Sniegocki, R. T., 1964, Hydrogeology of a part of the Grand Prairie region, Arkansas: U.S. Geological Survey Water-Supply Paper 1615-B, 72 p.
- Stephenson, L. W., and Crider, A. F., 1916, Geology and ground waters of northeastern Arkansas: U.S. Geological Survey Water-Supply Paper 399, 315 p.
- Westerfield, P. W., 1977, Well records, water-level measurement, logs of test holes, and chemical analyses of ground water in the Cache River alluvial aquifer-stream system, northeast Arkansas, 1946-76: U.S. Geological Survey Open-File Report 77-402, 166 p.



Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land |        | Net change in<br>water level |         | Remarks                             |
|-----------------|--|--------------------------------|--------|------------------------------|---------|-------------------------------------|
|                 |  | Date                           | Feet   | 1980-81                      | 1977-81 |                                     |
| ARKANSAS COUNTY |  |                                |        |                              |         |                                     |
| 02S03W09DCD1    | 211                                      | 3-26                           | 72.63  | -3.03                        | -2.32   |                                     |
| 02S04W11DBB1    | 213                                      | 3-26                           | 94.90  | -2.43                        | -3.68   |                                     |
| 02S05W04BBB1    | 221                                      | 3-27                           | 116.68 | -1.69                        | -2.60   |                                     |
| 03S02W18DCC1    | 203                                      | 3-25                           | 72.70  | -3.49                        | 1.78    |                                     |
| 03S02W27ABB1    | 197                                      | 3-25                           | 60.77  | -2.72                        | 1.59    |                                     |
| 03S03W01DBB1    | 205                                      | 3-25                           | 71.93  | -5.01                        | 2.83    |                                     |
| 03S03W21ADD1    | 204                                      | 3-25                           | 87.20  | -1.04                        | -2.65   |                                     |
| 03S04W03DCA16   | 205                                      | 3-25                           | 96.65  | -.03                         | -.37    |                                     |
| 03S05W03BBB1    | 216                                      | 3-26                           | 104.74 | -.77                         | -.74    | U.S. Geological Survey<br>recorder. |
| 03S06W29BAB1    | 196                                      | 3-26                           | 36.02  | -1.57                        | -1.39   |                                     |
| 03S06W35ADD1    | 190                                      | 3-26                           | 46.66  | -7.10                        | -2.29   |                                     |
| 04S01W04ACC1    | 199                                      | 3-25                           | 57.44  | -11.35                       | -6.32   | White River Refuge.                 |
| 04S01W30AAA1    | 188                                      | 3-25                           | 53.65  | -2.76                        | -2.25   |                                     |
| 04S02W11AAA1    | 195                                      | 3-25                           | 61.65  | -1.76                        | -1.70   |                                     |
| 04S02W29CCC1    | 191                                      | 3-25                           | 78.13  | -1.98                        | -1.49   |                                     |
| 04S03W17ADD1    | 200                                      | 3-25                           | 98.15  | -1.64                        | -2.39   |                                     |
| 04S03W32BCB1    | 192                                      | 3-23                           | 97.90  | -2.83                        | -3.35   |                                     |
| 04S04W02ABB1    | 200                                      | 3-25                           | 104.32 | -1.77                        | -2.92   |                                     |
| 04S05W16CDC1    | 201                                      | 3-26                           | 73.42  | -2.02                        | -1.70   |                                     |
| 04S05W24DAA1    | 198                                      | 3-25                           | 93.06  | -.39                         | +.79    |                                     |
| 04S06W15DBB1    | 190                                      | 3-26                           | 27.42  | -1.97                        | -2.34   | 1979-81.                            |
| 05S01W16BAB1    | 183                                      | 3-25                           | 51.46  | -11.01                       | -1.73   |                                     |
| 05S01W18BCC1    | 187                                      | 3-25                           | 57.92  | -----                        | -2.69   |                                     |
| 05S02W16ABD1    | 190                                      | 3-24                           | 73.75  | -.76                         | -2.00   |                                     |
| 05S03W30DDA1    | 193                                      | 3-24                           | 102.66 | -12.38                       | -11.36  |                                     |
| 05S04W07CCC1    | 193                                      | 3-24                           | 79.93  | -2.68                        | -1.29   |                                     |
| 05S04W32BBA1    | 191                                      | 3-24                           | 69.37  | -8.31                        | -1.71   |                                     |
| 05S05W15ADD1    | 193                                      | 3-24                           | 51.95  | -2.46                        | -.66    |                                     |
| 05S06W02DDD1    | 182                                      | 3-26                           | 18.94  | -2.01                        | -.30    |                                     |
| 05S06W07DDC1    | 180                                      | 4- 1                           | 10.80  | -3.38                        | -1.65   |                                     |
| 06S02W06BBA1    | 189                                      | 3-24                           | 78.88  | -2.58                        | -2.49   |                                     |
| 06S02W23DCD1    | 188                                      | 3-23                           | 63.49  | -8.29                        | -4.04   |                                     |
| 06S03W10BBA1    | 184                                      | 3-23                           | 79.08  | -1.72                        | -.79    |                                     |

Table 1.--Measurements of water levels made in 1981 in wells completed in the alluvial aquifer--Continued

| Well number                | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>surface |       | Net change in<br>water level<br>(feet) |         | Remarks                             |
|----------------------------|--|---|-------|--|---------|-------------------------------------|
|                            |  | Date                                      | Feet  | 1980-81                                | 1977-81 |                                     |
| ARKANSAS COUNTY--Continued |  |   |       |  |         |                                     |
| 06S03W27AAA1               | 183                                      | 3-23                                      | 64.90 | -2.78                                  | -3.21   |                                     |
| 06S04W18CBB1               | 190                                      | 3-24                                      | 37.50 | -1.54                                  | -.20    |                                     |
| 07S02W04BBB1               | 176                                      | 3-23                                      | 50.22 | -6.29                                  | -3.89   |                                     |
| 07S02W17BBA1               | 183                                      | 3-23                                      | 52.01 | -6.57                                  | -2.88   |                                     |
| 07S03W18CCD1               | 186                                      | 3-23                                      | 41.00 | -2.51                                  | +1.33   |                                     |
| 07S04W01DDD1               | 186                                      | 3-23                                      | 45.47 | -.73                                   | -.42    |                                     |
| 08S02W08ACA1               | 179                                      | 3-23                                      | 45.79 | -9.33                                  | -3.88   |                                     |
| 08S03W05ABB1               | 178                                      | 3-23                                      | 21.67 | -2.33                                  | -1.28   |                                     |
| ASHLEY COUNTY              |  |   |       |  |         |                                     |
| 16S06W27BAB1               | 182                                      | 4- 8                                      | 76.50 | -0.88                                  | -1.62   |                                     |
| 17S04W03ABB1               | 124                                      | 4- 9                                      | 20.07 | -5.44                                  | -4.69   |                                     |
| 17S04W21ABA1               | 117                                      | 4- 9                                      | 18.00 | -4.68                                  | -5.90   |                                     |
| 17S06W01ADD1               | 182                                      | 4- 8                                      | 80.05 | -1.46                                  | -1.25   |                                     |
| 17S06W35CAC1               | 179                                      | 4- 8                                      | 70.97 | -4.50                                  | -5.36   |                                     |
| 17S07W05CDD1               | 185                                      | 4- 8                                      | 84.52 | +2.08                                  | -1.80   |                                     |
| 18S08W01DBA1               | 183                                      | 4- 8                                      | 86.90 | -----                                  | -2.92   |                                     |
| 18S08W28DDD2               | 163                                      | 4- 9                                      | 88.11 | -.02                                   | +1.87   | U.S. Geological Survey<br>recorder. |
| 19S04W06BAB2               | 110                                      | 4-20                                      | 13.17 | -1.05                                  | +1.17   |                                     |
| 19S06W07BCC1               | 135                                      | 4- 8                                      | 30.98 | -.65                                   | -.44    |                                     |
| CHICOT COUNTY              |  |   |       |  |         |                                     |
| 13S03W34CBD1               | 131                                      | 4- 1                                      | 17.70 | -2.56                                  | +1.45   |                                     |
| 14S03W12AAC1               | 136                                      | 4- 2                                      | 25.39 | -1.04                                  | +.08    |                                     |
| 14S03W32BCD1               | 130                                      | 4- 1                                      | 26.37 | -1.27                                  | -2.18   |                                     |
| 15S03W24AAA1               | 115                                      | 4- 1                                      | 18.59 | -.81                                   | -.68    |                                     |
| 17S02W10AAA1               | 114                                      | 4- 1                                      | 17.33 | -1.13                                  | -1.23   |                                     |
| 18S01W19DAB1               | 110                                      | 4- 2                                      | 11.79 | -.56                                   | +1.92   |                                     |
| 19S01W15BBC1               | 114                                      | 4- 2                                      | 17.87 | -2.12                                  | +2.92   |                                     |
| 19S01W21AAA1               | 110                                      | 4- 2                                      | 20.08 | -.02                                   | -1.84   |                                     |
| 19S03W18BBA1               | 102                                      | 4- 2                                      | 17.34 | -2.27                                  | -5.07   |                                     |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number       | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                                     |
|-------------------|--|--|-------|--|---------|---|
|                   |  | Date   | Feet  | 1980-81                                | 1977-81 |   |
| CLAY COUNTY       |  |  |       |  |         |   |
| 18N08E03DAB1      | 262                                      | 3-26   | 9.05  | -1.91                                  | +0.25   |   |
| 19N04E19AAA1      | 282                                      | 3-26   | 22.35 | -3.10                                  | -3.34   |   |
| 19N08E01BBA1      | 270                                      | 3-26   | 8.90  | -3.58                                  | -1.06   |   |
| 20N05E34DBA1      | 285                                      | 3-26   | 15.55 | -3.55                                  | -4.45   |   |
| 21N05E17ABB1      | 300                                      | 3-26   | 18.90 | -4.62                                  | -2.60   |   |
| 21N06E31BBA1      | 289                                      | 3-26   | 9.38  | -5.13                                  | -4.33   |   |
| 21N08E36ABB1      | 283                                      | 3-26   | 5.72  | -5.65                                  | -3.59   |   |
| CRAIGHEAD COUNTY  |  |  |       |  |         |   |
| 13N02E35DAA1      | 250                                      | 3-25   | 75.05 | -2.92                                  | -5.00   | U.S. Geological Survey<br>recorder.         |
| 13N03E09BAA1      | 267                                      | 3-25   | 76.65 | -2.59                                  | -6.41   |   |
| 13N05E21BDD1      | 226                                      | 5-20   | 12.43 | -----                                  | -.71    | Bay public supply.                          |
| 13N07E20BBA1      | 223                                      | 3-24   | 4.60  | -2.54                                  | -.60    | U.S. Army Corps of En-<br>gineers recorder. |
| 14N02E18BDD1      | 242                                      | 3-25   | 29.12 | -2.90                                  | -5.42   |   |
| 14N04E22CBD1      | 256                                      | 3-24   | 40.38 | -1.53                                  | -5.38   | Jonesboro public sup-<br>ply.               |
| 14N04E28BDD1      | 254                                      | 3-24   | 42.10 | -1.87                                  | -7.10   | Do.   |
| 14N05E24DCC1      | 238                                      | 3-24   | 14.90 | -.87                                   | -2.60   |   |
| 14N06E20CCD1      | 226                                      | 3-24   | 5.15  | -1.05                                  | -1.68   |   |
| 14N07E26DAB1      | 227                                      | 3-24   | 7.57  | -2.61                                  | -.57    |   |
| 15N03E19ADA1      | 262                                      | 3-25   | 28.10 | -2.97                                  | -4.26   |   |
| 15N06E20DDD1      | 234                                      | 3-25   | 8.00  | -----                                  | -----   | New well.                                   |
| 15N07E21DAA1      | 236                                      | 3-24   | 10.14 | -1.76                                  | -.77    |   |
| CRITTENDEN COUNTY |  |  |       |  |         |   |
| 05N07E28CBA1      | 201                                      | 4- 8   | 16.76 | -4.34                                  | +1.16   |   |
| 06N07E13BAA1      | 205                                      | 4- 8   | 12.52 | -3.12                                  | +.76    |   |
| 07N07E31CCC1      | 207                                      | 4- 8   | 19.00 | -2.46                                  | -.31    |   |



Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number                  | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                             |
|------------------------------|--|--|-------|--|---------|-------------------------------------|
|                              |  | Date   | Feet  | 1980-81                                | 1977-81 |                                     |
| CRITTENDEN COUNTY--Continued |  |  |       |  |         |                                     |
| 08N07E14DAA1                 | 215                                      | 4- 8   | 17.80 | -0.78                                  | +0.90   |                                     |
| 09N06E11DAD1                 | 217                                      | 4- 8   | 26.57 | -.58                                   | -.33    |                                     |
| CROSS COUNTY                 |  |  |       |  |         |                                     |
| 06N04E01BBB1                 | 205                                      | 4- 8   | 30.80 | -1.45                                  | -0.25   |                                     |
| 07N01E05CDA1                 | 217                                      | 4- 9   | 50.88 | -2.07                                  | -4.03   |                                     |
| 07N03E05ADA1                 | 254                                      | 4- 7   | 90.35 | -2.48                                  | -5.50   |                                     |
| 07N04E07ABC1                 | 222                                      | 4- 8   | 43.58 | -1.08                                  | -.58    |                                     |
| 07N05E01BCB1                 | 212                                      | 4- 8   | 30.85 | -1.15                                  | +.35    |                                     |
| 08N03E09DAD1                 | 258                                      | 4- 7   | 91.73 | -1.03                                  | -5.06   |                                     |
| 09N01E33BBA1                 | 225                                      | 4- 9   | 55.10 | -2.16                                  | -4.82   |                                     |
| 09N01E36BAB1                 | 226                                      | 4- 9   | 63.15 | -2.21                                  | -9.37   |                                     |
| 09N03E17DDC1                 | 248                                      | 4- 7   | 88.00 | -4.89                                  | -11.65  |                                     |
| 09N05E32BDB1                 | 210                                      | 4- 8   | 23.60 | -1.40                                  | +.23    |                                     |
| DESHA COUNTY                 |  |  |       |  |         |                                     |
| 09S02W26DDC1                 | 149                                      | 4- 1   | 13.65 | -3.77                                  | -3.61   | U.S. Geological Survey<br>recorder. |
| 09S03W17DCB1                 | 155                                      | ----   | ----- | -----                                  | -----   | No measurement.                     |
| 09S04W06BBC1                 | 162                                      | ----   | ----- | -----                                  | -----   | Do.                                 |
| 10S03W26DAC1                 | 155                                      | 4- 1   | 31.02 | -1.47                                  | -3.32   |                                     |
| 11S03W31BBA1                 | 148                                      | 3-31   | 20.25 | -3.85                                  | -3.55   |                                     |
| 12S01W31AAB1                 | 135                                      | 4- 1   | 19.09 | -6.44                                  | -6.32   |                                     |
| 12S01W33BAA1                 | 135                                      | 4- 1   | 13.23 | -2.53                                  | +.79    |                                     |
| 12S03W16BBC1                 | 148                                      | 4-20   | 17.83 | -----                                  | -2.30   |                                     |
| DREW COUNTY                  |  |  |       |  |         |                                     |
| 11S05W08CCC1                 | 185                                      | 3-25   | 30.75 | +1.45                                  | +5.28   |                                     |
| 12S04W27CCC1                 | 148                                      | ----   | ----- | -----                                  | -----   | No measurement.                     |
| 12S06W15ADC2                 | 199                                      | 3-25   | 55.03 | -1.51                                  | -1.09   |                                     |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number            | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land |       | Net change in<br>water level<br>(feet) |         | Remarks      |
|------------------------|--|--------------------------------|-------|--|---------|--------------|
|                        |  | land surface<br>Date           | Feet  | 1980-81                                | 1977-81 |              |
| DREW COUNTY--Continued |  |                                |       |  |         |              |
| 13S04W33ABA1           | 140                                      | 3-25                           | 16.70 | -7.85                                  | -2.13   |              |
| 14S05W20BAA1           | 173                                      | 3-25                           | 37.40 | -.69                                   | +.76    |              |
| GREENE COUNTY          |  |                                |       |  |         |              |
| 16N06E02CAB1           | 256                                      | 3-25                           | 23.20 | -3.58                                  | -8.92   | 1979-81.     |
| 16N06E03CCC1           | 258                                      | 3-25                           | 37.75 | -9.07                                  | -4.63   |              |
| 16N06E28ABB1           | 251                                      | 3-25                           | 19.03 | -3.65                                  | -2.11   |              |
| 17N03E02CDD1           | 266                                      | 3-26                           | 14.09 | -3.79                                  | -3.84   | 1979-81.     |
| 17N04E30CDC1           | 265                                      | 3-26                           | 18.50 | -3.11                                  | -5.75   |              |
| 18N07E20BBA1           | 257                                      | 3-26                           | 9.13  | -2.88                                  | -1.12   |              |
| INDEPENDENCE COUNTY    |  |                                |       |  |         |              |
| 12N04W34CBB1           | 231                                      | 4- 2                           | 29.19 | -6.94                                  | -6.08   |              |
| 14N03W14DBB1           | 230                                      | 3-27                           | 6.90  | -3.80                                  | -6.20   |              |
| JACKSON COUNTY         |  |                                |       |  |         |              |
| 09N01W22ADD1           | 215                                      | 3-27                           | 42.65 | -4.17                                  | -5.75   |              |
| 09N02W32CBB1           | 220                                      | 3-27                           | 22.97 | -1.86                                  | -.47    |              |
| 10N02W27BBB1           | 224                                      | 3-27                           | 17.72 | -2.56                                  | -1.73   |              |
| 10N03W30ABB1           | 222                                      | 4- 2                           | 29.35 | -----                                  | -5.60   | 1976-77, 81. |
| 11N03W30CBA1           | 223                                      | 4- 2                           | 22.31 | -4.71                                  | -2.99   |              |
| 12N02W25ABB2           | 232                                      | 3-27                           | 18.20 | -3.22                                  | -3.90   |              |
| 12N03W35BCA1           | 220                                      | 3-27                           | 19.03 | -----                                  | -4.39   | 1980-81.     |
| 13N01W20AAA1           | 242                                      | 3-27                           | 18.22 | -2.29                                  | -4.14   |              |
| JEFFERSON COUNTY       |  |                                |       |  |         |              |
| 03S07W16AAA1           | 190                                      | 4- 1                           | 34.81 | -3.24                                  | -6.50   |              |
| 03S08W19CBA1           | 214                                      | 4- 2                           | 34.08 | -7.34                                  | -7.92   |              |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number                 | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                                       |
|-----------------------------|--|--|-------|--|---------|---|
|                             |  | Date   | Feet  | 1980-81                                | 1977-81 |   |
| JEFFERSON COUNTY--Continued |  |  |       |  |         |   |
| 03S08W24BBC1                | 202                                      | 4- 1   | 33.97 | -2.32                                  | -4.44   |   |
| 03S09W06DDA1                | 225                                      | 4- 1   | 32.00 | -1.61                                  | -1.82   |   |
| 03S09W31DDA1                | 218                                      | 4- 2   | 23.74 | -2.19                                  | + .76   |   |
| 04S07W17CCB1                | 200                                      | 4- 1   | 36.18 | -3.64                                  | -3.00   |   |
| 04S09W16BCC1                | 215                                      | 4- 2   | 22.78 | +1.30                                  | -1.67   |   |
| 05S06W31CAA1                | 189                                      | 4- 1   | 13.79 | + .76                                  | + .74   |   |
| 05S07W19BCC1                | 199                                      | 4- 1   | 21.19 | -2.80                                  | -3.27   |   |
| 06S05W15BCA1                | 177                                      | 4- 1   | 14.60 | -2.86                                  | -1.71   |   |
| 06S06W23AAD1                | 189                                      | 4- 1   | 18.58 | -2.33                                  | -1.75   |   |
| 06S08W24DCC1                | 200                                      | 3-24   | 18.78 | -2.73                                  | -3.47   |   |
| 07S08W06BAA1                | 202                                      | 3-26   | 14.32 | -4.32                                  | -2.35   |   |
| LAFAYETTE COUNTY            |  |  |       |  |         |   |
| 16S25W25CAC1                | 224                                      | 4- 2   | 17.48 | -1.86                                  | -7.93   |   |
| 19S25W06ABD1                | 216                                      | 4- 2   | 14.87 | - .58                                  | -2.56   |   |
| LAWRENCE COUNTY             |  |  |       |  |         |   |
| 15N01W11DDD1                | 256                                      | ----   | ----- | -----                                  | -----   | No measurement.                               |
| 16N01E03DDB1                | 264                                      | 3-26   | 28.10 | -4.01                                  | -7.35   |   |
| LEE COUNTY                  |  |  |       |  |         |   |
| 01N03E02BBC1                | 236                                      | 3-17   | 45.28 | -10.28                                 | -2.02   | University of Arkansas<br>Experiment Station. |
| 01N03E35BBA1                | 202                                      | 3-17   | 9.76  | -7.56                                  | -1.76   |   |

Table 1.--Measurements of water levels made in 1981 in wells completed in the alluvial aquifer--Continued

| Well number           | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                      |
|-----------------------|--|--|--------|--|---------|------------------------------|
|                       |  | Date   | Feet   | 1980-81                                | 1977-81 |                              |
| LEE COUNTY--Continued |  |  |        |  |         |                              |
| 02N01E23BAA2          | 202                                      | 3-17   | 33.98  | -1.54                                  | -1.37   | Marianna public<br>supply 3. |
| 02N03E14CCC3          | 232                                      | 3-17   | 57.62  | -7.00                                  | -.80    |                              |
| 02N04E16ADC1          | 195                                      | 3-17   | 20.93  | -2.37                                  | -.32    |                              |
| 03N02E29DAD1          | 205                                      | 3-17   | 28.48  | -6.49                                  | -1.83   |                              |
| 03N04E34CDD1          | 195                                      | 3-17   | 22.97  | -5.50                                  | -1.37   |                              |
| LINCOLN COUNTY        |  |  |        |  |         |                              |
| 07S06W28CBB1          | 180                                      | 3-24   | 28.74  | -3.22                                  | -4.71   |                              |
| 07S07W29DDD1          | 187                                      | 3-24   | 21.32  | -1.90                                  | -7.38   |                              |
| 08S06W02ACB1          | 181                                      | 3-24   | 30.23  | -3.74                                  | -4.29   |                              |
| 08S06W21BBC1          | 180                                      | 3-24   | 29.47  | -2.93                                  | -5.50   |                              |
| 08S07W09BBB1          | 190                                      | 3-24   | 22.24  | +.18                                   | -5.07   |                              |
| 10S05W06DCC1          | 175                                      | 3-24   | 21.45  | +6.40                                  | -.50    |                              |
| LITTLE RIVER COUNTY   |  |  |        |  |         |                              |
| 13S29W05ABD1          | 330                                      | 3-24   | 36.06  | -11.08                                 | +8.49   | 1980-81.                     |
| 13S32W09CCC1          | 313                                      | 3-24   | 5.47   | -----                                  | -1.55   |                              |
| LONOKE COUNTY         |  |  |        |  |         |                              |
| 01N07W29BBB1          | 225                                      | 3-31   | 99.00  | -8.90                                  | -12.56  |                              |
| 01N08W09CCB1          | 235                                      | 3-31   | 92.60  | -1.95                                  | -2.21   |                              |
| 01N09W27CCA1          | 229                                      | 3-31   | 51.18  | -2.91                                  | -4.82   |                              |
| 02N07W22DDD1          | 223                                      | 5-21   | 98.52  | -----                                  | -1.73   |                              |
| 02N08W04BBB1          | 243                                      | 3-31   | 93.95  | -----                                  | -5.95   |                              |
| 02N08W30CAB1          | 245                                      | 4-24   | 105.96 | -3.24                                  | -6.41   | Recorder.                    |
| 02N09W02BCB1          | 255                                      | 4-24   | 94.66  | -2.77                                  | -5.00   |                              |



Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number              | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land |                      | Net change in<br>water level<br>(feet) |         | Remarks         |
|--------------------------|--|--------------------------------|----------------------|--|---------|-----------------|
|                          |  | Date                           | land surface<br>Feet | 1980-81                                | 1977-81 |                 |
| LONOKE COUNTY--Continued |  |                                |                      |  |         |                 |
| 02N09W17CCB1             | 253                                      | 4-24                           | 71.59                | -2.74                                  | -6.26   | Remington Arms. |
| 02N09W32ABB1             | 236                                      | 3-31                           | 50.12                | -2.35                                  | -2.77   |                 |
| 02N10W23BCA1             | 242                                      | 3-27                           | 33.06                | -2.84                                  | -3.48   |                 |
| 03N07W15CAD1             | 227                                      | 3-30                           | 63.54                | -1.84                                  | + .92   | 1978-81.        |
| 03N07W31CDD2             | 243                                      | 3-30                           | 100.80               | -2.60                                  | -9.91   |                 |
| 03N07W35CDC1             | 233                                      | 3-30                           | 103.52               | -7.12                                  | -11.16  |                 |
| 03N08W21CDC1             | 249                                      | 3-31                           | 87.95                | -3.05                                  | -4.86   |                 |
| 03N09W31CBC2             | 257                                      | 4-14                           | 58.18                | + .45                                  | +6.33   |                 |
| 03N10W34ABB1             | 257                                      | 4-14                           | 63.78                | +7.22                                  | +1.93   |                 |
| 04N08W15BCB2             | 225                                      | 3-31                           | 23.06                | -3.36                                  | -2.63   |                 |
| 01S07W14ADA1             | 209                                      | 3-31                           | 78.38                | -10.13                                 | -12.00  |                 |
| 01S08W22CBB1             | 212                                      | 3-31                           | 49.37                | -1.98                                  | -5.47   |                 |
| 01S10W01ACB1             | 236                                      | 3-30                           | 34.45                | -3.95                                  | -4.30   |                 |
| 02S07W10CCB1             | 201                                      | 3-30                           | 43.00                | -3.94                                  | -7.02   |                 |
| 02S08W13BBB1             | 200                                      | 3-30                           | 34.47                | -2.77                                  | -4.64   |                 |
| 02S09W12CCC1             | 221                                      | 3-30                           | 40.01                | -1.71                                  | -3.70   |                 |
| MILLER COUNTY            |  |                                |                      |  |         |                 |
| 15S26W34AAA1             | 230                                      | 4- 2                           | 8.92                 | -2.40                                  | -2.95   |                 |
| MISSISSIPPI COUNTY       |  |                                |                      |  |         |                 |
| 11N09E34BBB1             | 235                                      | 3-23                           | 14.18                | -3.33                                  | -2.08   | Crain Co.       |
| 12N08E08BCB1             | 225                                      | 3-23                           | 8.78                 | -2.98                                  | -1.56   |                 |
| 12N09E34CDC1             | 230                                      | 3-23                           | 14.25                | -3.98                                  | -2.45   |                 |
| 12N10E11ADA1             | 239                                      | 3-23                           | 17.92                | -10.74                                 | -2.74   |                 |
| 13N09E30CCD1             | 230                                      | 3-23                           | 12.50                | -4.24                                  | -.51    |                 |
| 14N08E12DAB1             | 235                                      | 3-24                           | 7.17                 | -2.58                                  | + .62   |                 |
| 14N10E18ABC1             | 236                                      | 3-24                           | 13.20                | -2.82                                  | -.50    |                 |
| 14N11E03BCB1             | 247                                      | 3-24                           | 8.48                 | -4.08                                  | -1.40   |                 |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number                   | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                                      |
|-------------------------------|--|--|-------|--|---------|--|
|                               |  | Date   | Feet  | 1980-81                                | 1977-81 |  |
| MISSISSIPPI COUNTY--Continued |  |  |       |  |         |  |
| 14N12E05DCB1                  | 250                                      | 3-24   | 14.47 | -6.00                                  | -0.87   | Leachville public sup-<br>ply 2.<br>1980-81. |
| 15N08E08DBC2                  | 236                                      | 3-24   | 9.85  | -1.30                                  | +.25    |  |
| 16N09E21BBB1                  | 244                                      | 3-24   | 7.60  | -.75                                   | -.75    |  |
| 16N11E23AAD1                  | 255                                      | 3-24   | 14.20 | -2.43                                  | +.20    |  |
| MONROE COUNTY                 |  |  |       |  |         |  |
| 01N01W21CDC1                  | 180                                      | 3-18   | 20.63 | -2.22                                  | -3.12   | Brinkley test hole 1.                        |
| 01N03W24BBB1                  | 185                                      | 3-19   | 22.65 | -1.56                                  | -.22    |  |
| 01N04W33BBB2                  | 218                                      | 3-27   | 88.25 | -.95                                   | -.61    |  |
| 02N02W20BBC1                  | 188                                      | 3-19   | 31.10 | -1.55                                  | -2.70   |  |
| 03N01W20ABA1                  | 189                                      | 3-19   | 33.20 | -1.61                                  | -1.40   |  |
| 03N02W32BBC1                  | 191                                      | 3-19   | 29.36 | -1.75                                  | -1.60   |  |
| 04N02W30BBB1                  | 185                                      | 3-19   | 15.14 | -1.60                                  | -1.80   |  |
| 04N03W36BAC1                  | 180                                      | 3-19   | 12.23 | -2.02                                  | -.72    |  |
| 01S01W13CDD1                  | 178                                      | 3-18   | 9.52  | -4.44                                  | -.37    |  |
| 01S02W11BCC1                  | 180                                      | 3-18   | 12.67 | -2.94                                  | -.63    |  |
| 01S04W01BAB1                  | 210                                      | 3-27   | 72.32 | -3.07                                  | -2.11   |  |
| 02S02W01BCA1                  | 171                                      | 3-18   | 11.88 | -3.16                                  | +.29    |  |
| 03S01W03DAB1                  | 166                                      | 3-18   | 13.61 | -3.77                                  | -.89    |  |
| 03S01W36BBD1                  | 163                                      | 3-18   | 21.98 | -4.64                                  | -2.38   |  |
| PHILLIPS COUNTY               |  |  |       |  |         |  |
| 02S01E28CCB1                  | 174                                      | 3-18   | 12.53 | -2.52                                  | -0.28   | U.S. Geological Survey<br>recorder.          |
| 02S03E15ACD1                  | 174                                      | 3-17   | 12.42 | -5.12                                  | +1.29   |  |
| 03S04E20CAB1                  | 174                                      | 3-17   | 13.90 | -2.43                                  | +.22    |  |
| 04S02E06BAA1                  | 157                                      | 3-18   | 12.80 | -3.09                                  | -.30    |  |
| 05S02E18BDA1                  | 156                                      | 3-17   | 14.09 | -3.16                                  | +7.56   |  |
| 06S01E28AAA1                  | 151                                      | 3-17   | 14.83 | -3.66                                  | +1.82   |  |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks   |
|-----------------|--|--|--------|--|---------|---|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| POINSETT COUNTY |  |  |        |  |         |   |
| 10N03E14DAA1    | 270                                      | 4- 7   | 108.70 | -5.45                                  | -10.75  | No measurement.   |
| 10N01E27BAB1    | 233                                      | ----   | -----  | -----                                  | -----   |   |
| 10N05E10BCD1    | 207                                      | 4- 9   | 10.78  | -3.02                                  | -1.16   |   |
| 10N05E15BDD1    | 207                                      | 4- 9   | 15.24  | -2.70                                  | -2.84   | Arkansas State Highway<br>and Transportation<br>Department. |
| 10N06E11AAA1    | 212                                      | 4- 9   | 12.84  | -1.29                                  | -.32    |   |
| 10N07E22AAC1    | 215                                      | 4- 9   | 19.65  | -1.05                                  | -1.00   |   |
| 11N01E21CBC1    | 230                                      | 4- 7   | 53.90  | -3.77                                  | -8.86   | Weiner public supply.                                       |
| 11N02E05BDA1    | 245                                      | 4- 7   | 75.10  | -2.32                                  | -7.03   |   |
| 11N02E26AAB1    | 241                                      | 4- 7   | 76.15  | -3.00                                  | -7.93   |   |
| 11N03E22DDD1    | 245                                      | 4- 7   | 77.06  | -5.21                                  | -5.74   |   |
| 11N07E22ADD1    | 218                                      | 4- 9   | 18.10  | -.20                                   | -1.80   |   |
| 12N01E18AAB1    | 241                                      | 4- 7   | 33.30  | -2.40                                  | -5.08   |   |
| 12N04E18CCC1    | 245                                      | 4- 7   | 67.10  | -2.30                                  | -1.35   |   |
| 12N05E34ABA1    | 215                                      | 4- 9   | 8.22   | -3.39                                  | -.92    |   |
| PRAIRIE COUNTY  |  |  |        |  |         |   |
| 01N05W16AAA1    | 218                                      | 3-30   | 104.64 | -4.34                                  | -8.19   | Biscoe public supply.                                       |
| 01N05W20DCC1    | 212                                      | 3-30   | 98.50  | -2.87                                  | -4.45   |   |
| 01N06W18CDD1    | 223                                      | 3-27   | 99.85  | -2.35                                  | -5.45   |   |
| 01N06W28DCC1    | 224                                      | 3-27   | 99.23  | -2.18                                  | -5.20   | 1978-81   |
| 02N04W02BCB1    | 188                                      | 3-19   | 21.41  | -3.97                                  | -.15    |   |
| 02N04W32CCB1    | 221                                      | 3-27   | 80.92  | -4.12                                  | -2.50   |   |
| 02N05W05BBB1    | 221                                      | 3-30   | 77.22  | -.02                                   | -3.44   |   |
| 02N05W13AAB1    | 223                                      | 3-27   | 75.26  | -2.28                                  | -7.80   |   |
| 02N05W29ddb1    | 228                                      | 3-27   | 90.44  | +12.86                                 | +14.49  |   |
| 02N06W22BCD1    | 236                                      | 3-27   | 112.53 | -2.18                                  | -3.50   |   |
| 03N04W03AAC1    | 187                                      | 3-19   | 22.89  | -2.48                                  | +1.04   |   |
| 03N05W03DBB1    | 207                                      | 3-30   | 55.25  | -5.75                                  | -4.67   |   |
| 03N06W01BCB1    | 216                                      | 3-30   | 67.68  | -1.18                                  | -3.88   |   |
| 04N04W07ADC1    | 195                                      | 3-19   | 25.68  | -4.37                                  | -.88    |   |
| 04N05W07CDC1    | 212                                      | 3-30   | 59.96  | -1.46                                  | -3.37   |   |
| 04N05W21DDD1    | 205                                      | 3-30   | 55.26  | -5.16                                  | -4.11   |   |

Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number               | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                           |
|---------------------------|--|--|--------|--|---------|-----------------------------------|
|                           |  | Date   | Feet   | 1980-81                                | 1977-81 |                                   |
| PRAIRIE COUNTY--Continued |  |  |        |  |         |                                   |
| 04N06W21BCC1              | 220                                      | 3-30   | 59.06  | -.01                                   | +1.73   |                                   |
| 04N07W01CCC1              | 212                                      | 3-30   | 45.00  | -1.20                                  | -3.16   |                                   |
| 05N05W14DCA1              | 205                                      | 3-30   | 36.72  | -5.92                                  | -2.12   |                                   |
| 01S05W14BBC1              | 211                                      | 3-27   | 100.90 | -.20                                   | +.30    |                                   |
| 01S06W13DCD1              | 224                                      | 5-27   | 108.42 | -.70                                   | -5.44   |                                   |
| 02S06W14BAB2              | 201                                      | 3-30   | 65.57  | -2.07                                  | -3.31   |                                   |
| PULASKI COUNTY            |  |  |        |  |         |                                   |
| 01N10W17BAC1              | 246                                      | 4- 1   | 13.44  | -2.30                                  | +0.08   |                                   |
| 02N10W05BCC1              | 239                                      | 4- 1   | 21.68  | +2.92                                  | +.96    | Jacksonville public<br>supply 10. |
| 01S10W07BDC1              | 240                                      | 4- 1   | -----  | -----                                  | -----   | No measurement.                   |
| 02S10W16CCA1              | 231                                      | 4- 1   | 19.12  | -3.22                                  | -.85    |                                   |
| RANDOLPH COUNTY           |  |  |        |  |         |                                   |
| 18N01E34AAC1              | 266                                      | 3-26   | 13.89  | -1.55                                  | -2.61   |                                   |
| 19N02E09DCA1              | 267                                      | 3-26   | 14.22  | -6.16                                  | -7.44   |                                   |
| ST. FRANCIS COUNTY        |  |  |        |  |         |                                   |
| 04N01E13DDA1              | 208                                      | 3-16   | 45.78  | -1.69                                  | -3.16   |                                   |
| 04N02E03DDD3              | 210                                      | 3-16   | 30.90  | -1.62                                  | -.53    | Arkansas Power &<br>Light Co.     |
| 04N03E21DAD1              | 236                                      | 3-16   | 49.16  | -6.73                                  | +1.12   |                                   |
| 04N05E22BBB1              | 200                                      | 3-16   | 27.46  | -1.53                                  | +.05    |                                   |
| 04N05E34DBA1              | 209                                      | 3-16   | 55.88  | -1.93                                  | -3.05   |                                   |
| 05N04E08DDD1              | 203                                      | 3-16   | 30.20  | -2.50                                  | -.12    |                                   |
| 05N06E34CAB1              | 200                                      | 3-16   | 21.49  | +.35                                   | -.68    |                                   |
| 06N01E33ACA1              | 211                                      | 3-16   | 45.33  | -2.71                                  | -3.88   |                                   |
| 06N02E24AAA1              | 232                                      | 3-16   | 54.27  | -1.82                                  | -3.77   |                                   |
| 06N05E22ACC1              | 200                                      | 3-16   | 24.15  | -1.28                                  | -.59    |                                   |



Table 1.--Measurements of water levels made in 1981 in wells completed in the  
alluvial aquifer--Continued

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks         |
|-----------------|--|--|-------|--|---------|-----------------|
|                 |  | Date   | Feet  | 1980-81                                | 1977-81 |                 |
| WHITE COUNTY    |  |  |       |  |         |                 |
| 05N07W09AAA1    | 205                                      | 4- 1   | 14.09 | -7.59                                  | -2.59   |                 |
| 05N07W10CCC1    | 203                                      | 4- 1   | 13.20 | -1.40                                  | -.22    |                 |
| 05N08W23DCB1    | 211                                      | 4- 1   | 11.92 | -2.92                                  | -3.07   | 1976-81.        |
| 06N06W34BAA1    | 216                                      | 4- 1   | 42.85 | -3.55                                  | -4.48   |                 |
| 06N07W17DCC1    | 217                                      | 4- 1   | 16.76 | -8.56                                  | -9.07   | 1978-81.        |
| 07N05W29CAB1    | 215                                      | ----   | ----- | -----                                  | -----   | No measurement. |
| 07N06W19CAB1    | 224                                      | 4- 1   | 5.67  | -3.27                                  | -3.02   |                 |
| 08N05W01ABA1    | 218                                      | 4- 1   | 16.20 | -4.00                                  | -1.85   |                 |
| 09N04W01ABC1    | 215                                      | 4- 2   | 30.58 | -----                                  | -11.26  | 1976-81.        |
| WOODRUFF COUNTY |  |  |       |  |         |                 |
| 05N01W16BCC1    | 211                                      | 4-10   | 50.40 | -1.76                                  | -3.80   |                 |
| 05N02W20DCB1    | 192                                      | 4-10   | 12.75 | -2.85                                  | -1.08   |                 |
| 05N04W12DBA1    | 186                                      | 4-10   | 3.76  | -.64                                   | +1.32   |                 |
| 06N01W06BAB1    | 202                                      | 4-10   | 19.38 | -2.20                                  | -2.36   |                 |
| 06N01W33ADB1    | 216                                      | 4-10   | 50.48 | -1.24                                  | -3.58   |                 |
| 07N02W17CBD1    | 196                                      | 4-10   | 8.08  | -1.50                                  | -1.15   |                 |
| 08N03W31AAD1    | 212                                      | 4-10   | 19.86 | -2.36                                  | -.73    |                 |

Table 2.--Measurements of water levels made in 1981 in wells completed in the  
Cockfield Formation

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                      |
|-----------------|--|--|-------|--|---------|------------------------------|
|                 |  | Date   | Feet  | 1980-81                                | 1977-81 |                              |
| ARKANSAS COUNTY |  |  |       |  |         |                              |
| 08S02W04ACA1    | 165                                      | 3-23   | 62.39 | +3.58                                  | -0.07   |                              |
| ASHLEY COUNTY   |  |  |       |  |         |                              |
| 15S04W26CBC1    | 128                                      | 4-20   | 31.72 | -1.57                                  | -3.63   | Town of Boydell.             |
| 15S07W32CBA2    | 188                                      | 4-15   | 86.29 | -1.22                                  | -2.64   | Fountain Hill public supply. |
| 17S04W10BCD2    | 125                                      | 4- 9   | 26.35 | -2.67                                  | -3.59   | Portland public supply 2.    |
| 17S06W07ADA1    | 174                                      | 4- 8   | 72.50 | -5.55                                  | -4.44   | Hamburg Industrial Park.     |
| 18S04W19DAA1    | 116                                      | 4- 9   | 24.25 | -5.95                                  | -5.65   | Parkdale public supply.      |
| 18S08W04BBC1    | 149                                      | 4- 9   | 64.70 | +15.82                                 | +18.67  | N. Crossett public supply 2. |
| 19S05W12CAC1    | 115                                      | 4- 9   | 26.79 | -2.94                                  | -6.90   | Wilmot public supply.        |
| BRADLEY COUNTY  |  |  |       |  |         |                              |
| 14S09W04AAC1    | 162                                      | 4-16   | 74.10 | -12.01                                 | -1.19   | 1979-81.                     |
| 14S10W31DBA1    | 193                                      | 4-15   | 85.00 | -2.63                                  | -5.52   | Hermitage public supply.     |
| 15S12W11CAB1    | 155                                      | 4-16   | 21.40 | -3.60                                  | -.19    |                              |
| 16S10W11DCB1    | 152                                      | 4-15   | 49.57 | +.62                                   | -.67    | Vick School.                 |
| 16S11W11ACA1    | 141                                      | 4-15   | 28.67 | -2.92                                  | -.82    |                              |
| CALHOUN COUNTY  |  |  |       |  |         |                              |
| 14S13W01AAA1    | 212                                      | 3-23   | 10.18 | -2.76                                  | -1.99   |                              |

Table 2.--Measurements of water levels made in 1981 in wells completed in the  
Cockfield Formation

| Well number      | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                        |
|------------------|--|--|--------|--|---------|--------------------------------|
|                  |  | Date   | Feet   | 1980-81                                | 1977-81 |                                |
| CHICOT COUNTY    |  |  |        |  |         |                                |
| 14S03W05BBA1     | 139                                      | 4- 1   | 63.96  | -1.76                                  | -4.73   | Dermott public supply.         |
| 15S03W21ABA1     | 122                                      | 4- 1   | 25.89  | -.89                                   | -.54    |                                |
| 16S02W02BDC2     | 120                                      | 4- 1   | 31.83  | -6.54                                  | -6.56   | Lake Village public<br>supply. |
| 18S02W25ABB3     | 135                                      | 4- 2   | 42.50  | -3.40                                  | -2.67   | Eudora public supply 3.        |
| 18S03W14CCC1     | 98                                       | 4- 2   | 10.60  | -1.22                                  | -.18    |                                |
| CLEVELAND COUNTY |  |  |        |  |         |                                |
| 08S11W02BCB1     | 245                                      | 4-16   | 118.50 | +7.15                                  | +15.99  | Highway rest area.             |
| 10S12W12BDD1     | 220                                      | 3-26   | 102.70 | -1.75                                  | -5.26   | Kingsland public sup-<br>ply.  |
| DREW COUNTY      |  |  |        |  |         |                                |
| 12S08W34BBB1     | 158                                      | 3-26   | 79.67  | -1.72                                  | -6.69   |                                |
| 13S05W35ABB1     | 170                                      | 3-25   | 79.00  | -2.77                                  | -6.91   |                                |
| 14S07W26BAB1     | 230                                      | 3-25   | 113.05 | -.89                                   | -7.18   |                                |
| LINCOLN COUNTY   |  |  |        |  |         |                                |
| 10S05W06CAC1     | 170                                      | 3-24   | 97.47  | +0.32                                  | -6.20   |                                |
| UNION COUNTY     |  |  |        |  |         |                                |
| 17S15W36BAA1     | 260                                      | 3-25   | 45.10  | -4.56                                  | -2.61   | Cities Service Co.             |

Table 3.--Measurements of water levels made in 1981 in wells completed in the  
Cook Mountain Formation

| Well number  | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks |
|--------------|--|--|-------|--|---------|---------|
|              |  | Date   | Feet  | 1980-81                                | 1977-81 |         |
| UNION COUNTY |  |  |       |  |         |         |
| 17S13W17DDC1 | 225                                      | 3-25   | 42.78 | -2.78                                  | +2.32   |         |
| 17S14W10DCB1 | 180                                      | 3-25   | 92.26 | -2.05                                  | -1.86   |         |
| 17S14W15ABA1 | 180                                      | 3-25   | 92.83 | -1.06                                  | -1.10   |         |
| 19S15W01CCA1 | 182                                      | 3-24   | 65.59 | -1.10                                  | -2.26   |         |

Table 4.--Measurements of water levels made in 1981 in wells completed in the Sparta Sand

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                             |
|-----------------|--|--|--------|--|---------|-------------------------------------|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |                                     |
| ARKANSAS COUNTY |  |  |        |  |         |                                     |
| 02S04W06CDB1    | 212                                      | 3-26   | 136.81 | -13.16                                 | -19.01  | U.S. Geological Survey<br>recorder. |
| 02S04W23DAA1    | 208                                      | 3-26   | 125.75 | -13.54                                 | -17.82  |                                     |
| 02S05W34BDA1    | 216                                      | 3-26   | 156.00 | -12.18                                 | -20.60  |                                     |
| 03S04W02CCB1    | 202                                      | 3-25   | 130.28 | -12.87                                 | -18.61  | Almyra public supply.               |
| 03S04W26CDA1    | 203                                      | 3-25   | 133.50 | -14.05                                 | -19.88  |                                     |
| 03S04W33BAA1    | 201                                      | 3-25   | 134.39 | -13.06                                 | -16.50  |                                     |
| 03S05W02AAB1    | 210                                      | 3-25   | 151.97 | -13.58                                 | -20.87  |                                     |
| 03S05W13BDC1    | 210                                      | 3-26   | 151.40 | -16.45                                 | -23.94  |                                     |
| 03S05W15CBB1    | 206                                      | 3-26   | 146.93 | -13.06                                 | -20.31  | Humphrey public supply.             |
| 03S05W18CAB1    | 196                                      | 3-26   | 140.49 | -13.66                                 | -20.34  |                                     |
| 03S06W21ACC1    | 195                                      | 3-26   | 134.70 | -12.16                                 | -19.33  |                                     |
| 03S06W30BBB1    | 191                                      | 3-26   | 133.34 | -13.37                                 | -20.42  |                                     |
| 04S01W04ACC2    | 199                                      | 3-25   | 92.18  | -6.58                                  | -7.92   |                                     |
| 04S04W11BCC1    | 198                                      | 3-23   | 132.16 | -11.81                                 | -18.65  |                                     |
| 04S04W19CBB1    | 195                                      | 3-25   | 135.82 | -13.29                                 | -20.55  |                                     |
| 04S04W22DAA1    | 195                                      | 3-23   | 132.02 | -12.21                                 | -17.72  |                                     |
| 04S05W01BAA1    | 196                                      | 3-26   | 138.95 | -12.80                                 | -19.58  |                                     |
| 04S05W36DCC1    | 196                                      | 3-25   | 135.88 | -11.15                                 | -16.25  |                                     |
| 05S03W04ADB1    | 187                                      | 3-23   | 116.85 | -9.72                                  | -15.49  | DeWitt public supply.               |
| 05S04W26ACA1    | 188                                      | 3-24   | 115.55 | -9.06                                  | -13.98  |                                     |
| 05S05W36DAA1    | 180                                      | 3-24   | 118.33 | -9.35                                  | -15.81  |                                     |
| 06S02W06ABB1    | 181                                      | 3-24   | 96.97  | -6.75                                  | -11.53  |                                     |
| 06S02W22CDB1    | 186                                      | 3-23   | 91.95  | -5.49                                  | -9.53   |                                     |
| 07S02W28ABA1    | 181                                      | 3-25   | 86.76  | -5.11                                  | -8.51   | 1979-81.                            |
| 07S03W06ABC1    | 185                                      | 3-23   | 107.47 | -6.57                                  | -12.35  | Gillett public supply.              |
| 08S02W01CBA1    | 165                                      | 3-23   | 65.92  | -3.15                                  | -4.99   | Lock and Dam 1.                     |
| 08S03W04DBD1    | 176                                      | 3-23   | 91.28  | -4.14                                  | -9.72   | Arkansas Post National<br>Memorial. |
| 08S03W-Tr 2299  | 175                                      | 3-23   | 89.72  | -2.55                                  | -7.97   | Moore's Bayou recrea-<br>tion area. |
| 08S03W-Tr 2404  | 168                                      | 3-23   | 78.57  | -4.51                                  | -11.22  | Notrebes Bend recrea-<br>tion area. |



Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number      | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                            |
|------------------|--|--|--------|--|---------|------------------------------------|
|                  |  | Date   | Feet   | 1980-81                                | 1977-81 |                                    |
| BRADLEY COUNTY   |  |  |        |  |         |                                    |
| 13S09W06ACA1     | 208                                      | 4-15   | 145.85 | -3.77                                  | -4.07   | Warren public supply.              |
| 13S11W17BCD1     | 250                                      | 3-16   | 176.02 | -1.50                                  | -3.41   | Banks public supply.               |
| 16S12W21CAA1     | 100                                      | 3-15   | 58.95  | -2.32                                  | -9.26   |                                    |
| CALHOUN COUNTY   |  |  |        |  |         |                                    |
| 12S12W32DAA1     | 176                                      | 3-23   | 91.43  | -9.24                                  | +2.31   | Tinsman public supply,<br>1979-81. |
| 13S13W32CDA1     | 208                                      | 3-23   | 163.60 | -3.70                                  | -9.93   | Hampton public supply.             |
| 14S13W12CCB1     | 205                                      | 3-23   | 159.57 | -7.37                                  | -9.30   | Harrell public supply.             |
| CLEVELAND COUNTY |  |  |        |  |         |                                    |
| 09S11W01DCA1     | 230                                      | 3-26   | 169.58 | -4.71                                  | -18.96  | Rison public supply.               |
| 09S11W01DDA2     | 266                                      | 3-26   | 197.60 | -1.21                                  | -15.79  | Do.                                |
| 10S09W23CDC1     | 220                                      | 3-25   | 143.48 | -.63                                   | -3.53   | Highway 15 water user.             |
| COLUMBIA COUNTY  |  |  |        |  |         |                                    |
| 16S20W18ACD1     | 337                                      | 3-31   | 255.63 | -0.68                                  | -6.65   | McNeil public supply 2.            |
| 16S21W14CBB1     | 281                                      | 3-31   | 207.81 | -4.32                                  | -18.92  | Waldo public supply.               |
| 16S21W15CBC1     | 288                                      | 3-31   | 201.51 | -.94                                   | -21.89  | Do.                                |
| 16S21W35CCD1     | 275                                      | 3-31   | 297.89 | -4.60                                  | -21.87  | Magnolia public supply<br>9.       |
| 17S19W15ABD1     | 325                                      | 4- 1   | 280.12 | -1.78                                  | -7.88   | Village Corp.                      |
| 17S19W30ABB1     | 248                                      | 3-31   | 203.55 | -1.36                                  | -3.76   | City of Magnolia, 1978-<br>-81.    |
| 17S20W15ABB1     | 350                                      | 4- 1   | 344.87 | -2.24                                  | -18.36  | Carter Oil Co.                     |
| 17S20W17CDA1     | 325                                      | 3-31   | 333.00 | -23.46                                 | -1.81   | Magnolia public supply<br>8.       |
| 17S21W01BBC1     | 305                                      | 3-31   | 327.04 | -22.67                                 | -24.10  | Southern Arkansas<br>University 3. |
| 17S21W11DCC2     | 303                                      | 3-31   | 327.83 | +4.35                                  | -4.63   | Magnolia public supply<br>2.       |

Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number                | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                           |
|----------------------------|--|--|--------|--|---------|-----------------------------------|
|                            |  | Date   | Feet   | 1980-81                                | 1977-81 |                                   |
| COLUMBIA COUNTY--Continued |  |  |        |  |         |                                   |
| 18S19W17ACC1               | 288                                      | 4- 1   | 241.29 | -2.24                                  | -5.12   | Hiwan Oil & Gas Co.               |
| 18S20W06DDC1               | 300                                      | 4- 1   | 294.24 | -.52                                   | -6.14   | Magnolia Country Club.            |
| 18S20W18ABD1               | 276                                      | 4- 1   | 290.57 | +10.69                                 | -5.96   | Bromet Co.                        |
| 18S21W09AAA1               | 310                                      | 4- 1   | 275.04 | -19.57                                 | +8.76   | Arkla. Gas Co.                    |
| 18S22W08ACB1               | 250                                      | 4- 1   | 46.90  | +.12                                   | -1.27   |                                   |
| 19S20W08DAD1               | 320                                      | 4- 1   | 247.89 | -.29                                   | +12.30  | Emerson public supply<br>1.       |
| 19S20W09CAC1               | 332                                      | 4- 1   | 259.09 | -.30                                   | -3.00   | Emerson public supply<br>2.       |
| 19S21W16DBB1               | 284                                      | 4- 1   | 174.09 | -1.50                                  | +8.30   |                                   |
| 19S23W11CDA1               | 248                                      | 4- 1   | 52.47  | -.87                                   | -1.32   | Taylor public supply.             |
| CROSS COUNTY               |  |  |        |  |         |                                   |
| 06N04E06ACA1               | 358                                      | 4-10   | 184.50 | -4.40                                  | -7.76   | Village Creek State<br>Park.      |
| 07N03E16CCC3               | 253                                      | 4-10   | 77.75  | +5.45                                  | -3.30   | Wynne public supply 3.            |
| 07N05E03BCD2               | 211                                      | 4- 8   | 30.18  | -2.60                                  | -1.78   | Parkin public supply<br>2.        |
| 09N01E16CAC1               | 234                                      | 4- 9   | 64.20  | -2.48                                  | -5.06   | Hickory Ridge public<br>supply 1. |
| 09N03E22AAD1               | 278                                      | 4- 7   | 102.84 | -1.09                                  | -6.04   | Cherry Valley public<br>supply 1. |
| 09N04E30DCA1               | 429                                      | 4- 7   | 256.10 | -7.00                                  | -13.60  | Vanndale-Birdeye.                 |
| DALLAS COUNTY              |  |  |        |  |         |                                   |
| 07S14W31AAA1               | 330                                      | 4-10   | 114.18 | -5.73                                  | -2.62   | Carthage public supply.           |
| 09S13W35CCD1               | 200                                      | 5- 5   | 59.63  | -2.29                                  | -4.24   |                                   |
| 10S13W34ACA2               | 272                                      | 4-10   | 140.19 | -3.40                                  | -5.76   | Fordyce public supply.            |

Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number  | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                            |
|--------------|--|--|--------|--|---------|------------------------------------|
|              |  | Date   | Feet   | 1980-81                                | 1977-81 |                                    |
| DESHA COUNTY |  |  |        |  |         |                                    |
| 09S02W26AAC1 | 153                                      | 4- 2   | 58.48  | -5.53                                  | -11.05  | Watson public supply.              |
| 09S04W08DDA1 | 163                                      | 3-31   | 85.73  | -3.43                                  | -11.62  | Arkansas State Police.             |
| 09S04W28DDD1 | 165                                      | 3-31   | 84.18  | -1.75                                  | -5.58   | Dumas public supply.               |
| 10S02W26CCC2 | 148                                      | 4- 1   | 57.50  | -4.98                                  | -12.21  | U.S. Fish and Wildlife<br>Service. |
| 11S02W03CCA1 | 139                                      | 4- 1   | 44.87  | + .23                                  | -7.59   |                                    |
| 12S03W34DAD1 | 147                                      | 3-31   | 64.69  | -4.45                                  | -5.24   | McGehee public supply<br>3.        |
| DREW COUNTY  |  |  |        |  |         |                                    |
| 11S04W25DAA1 | 148                                      | 3-25   | 66.13  | -3.20                                  | -6.48   | Tillar public supply.              |
| 11S06W11DBC1 | 203                                      | 3-25   | 128.44 | -2.58                                  | -9.11   |                                    |
| 12S06W32DAD1 | 212                                      | 3-26   | 159.05 | + .70                                  | -6.02   | Former Prisoner of War<br>Camp.    |
| 13S05W36ACB1 | 169                                      | 3-25   | 77.18  | +1.91                                  | -5.70   | Collins public supply.             |
| 15S04W12DDA1 | 125                                      | 3-25   | 49.99  | -2.39                                  | -4.50   |                                    |
| GRANT COUNTY |  |  |        |  |         |                                    |
| 03S14W20ADB1 | 320                                      | 3-14   | 25.83  | +0.35                                  | +2.36   |                                    |
| 04S14W14ADC1 | 310                                      | 4-14   | 80.55  | -1.10                                  | -1.57   |                                    |
| 05S13W03CDA4 | 281                                      | 4-14   | 114.63 | - .35                                  | -18.16  | Sheridan public supply<br>2.       |
| 05S13W03DBC1 | 260                                      | 4-14   | 80.92  | - .44                                  | -4.31   | Sheridan public supply<br>3.       |
| 05S14W06DCC1 | 293                                      | 4-14   | 83.92  | - .20                                  | + .76   | Prattsville public sup-<br>ply.    |
| 05S15W05ABD1 | 232                                      | 4-14   | 14.30  | - .61                                  | + .19   | Poyen public supply.               |
| 06S11W05ACA1 | 280                                      | 4-13   | 177.34 | +8.06                                  | -10.51  | Center Grove public<br>supply.     |
| 06S15W26ACA1 | 280                                      | 4-13   | 62.58  | -2.58                                  | - .03   | Leola public supply.               |

Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number      | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks   |
|------------------|--|--|--------|--|---------|---|
|                  |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| JEFFERSON COUNTY |  |  |        |  |         |   |
| 03S08W19BBD1     | 215                                      | 4- 2   | 154.00 | -13.36                                 | -24.98  | Tucker Prison.  |
| 03S10W17DBA1     | 217                                      | 3-23   | 92.90  | -3.28                                  | -8.05   | Tar Camp recreation<br>area.                              |
| 03S10W32DAB1     | 226                                      | 3-23   | 116.37 | -5.41                                  | -11.90  | Lock and Dam 5 recrea-<br>tion area.                      |
| 03S11W22ABC1     | 310                                      | 4- 9   | 161.37 | -3.99                                  | -10.69  | Redfield public supply.                                   |
| 03S11W25ADC4     | 311                                      | 3-23   | 185.95 | +3.35                                  | -14.12  | Arkansas Power & Light<br>Co. White Bluff test<br>hole 3. |
| 04S07W17BCC1     | 200                                      | 4- 1   | 154.48 | -9.43                                  | -17.73  | Wabbaseka public sup-<br>ply.                             |
| 04S08W30AAD1     | 212                                      | 4- 2   | 194.92 | -14.55                                 | -24.73  | Pine Bluff Arsenal.<br>Do.                                |
| 04S10W22BDD1     | 244                                      | 3-23   | 170.60 | +2.02                                  | -9.47   |   |
| 04S10W29ADB1     | 268                                      | 3-23   | 189.08 | -7.66                                  | -16.36  | Jefferson public sup-<br>ply.                             |
| 04S11W14BAD1     | 400                                      | 4- 9   | 288.63 | -4.25                                  | -9.42   |   |
| 05S08W29BDD1     | 195                                      | 4- 1   | 250.59 | -9.95                                  | -19.74  | U.S. Army Corps of En-<br>gineers recreation<br>area.     |
| 05S08W30ADB1     | 221                                      | 3-27   | 282.36 | -11.26                                 | -13.17  | Lock and Dam 4.   |
| 05S08W30CBA1     | 207                                      | 3-27   | 281.05 | -7.92                                  | -17.94  | International Paper Co.<br>7.                             |
| 05S09W19BAA1     | 227                                      | 3-23   | 216.29 | -1.62                                  | -12.14  | Dierks Paper Co. 2.                                       |
| 05S09W19BAD1     | 220                                      | 3-23   | 244.70 | -5.92                                  | -13.40  | Dierks Paper Co. 1.                                       |
| 05S09W24DBD1     | 208                                      | 3-27   | 264.47 | -7.93                                  | -18.47  | International Paper Co.<br>10.                            |
| 05S09W35AAB1     | 205                                      | 3-27   | 271.59 | -6.40                                  | -20.86  | International Paper Co.<br>5.                             |
| 05S10W16DBD1     | 300                                      | 3-23   | 245.71 | -4.92                                  | -12.32  | Whitehall public supply<br>1.                             |
| 06S06W20CAA1     | 193                                      | 4- 1   | 143.19 | -5.89                                  | -15.19  | Lock and Dam 3.   |
| 06S07W33DDD1     | 195                                      | 3-24   | 165.20 | -6.43                                  | -16.40  | Linwood School.   |
| 06S08W10CAC1     | 203                                      | 3-27   | 250.69 | -4.04                                  | -24.18  | International Paper Co.<br>1.                             |
| 06S08W16CCC1     | 202                                      | 3-27   | 241.50 | -5.76                                  | -19.71  | International Paper Co.<br>3.                             |
| 06S08W25ADC1     | 203                                      | 3-27   | 202.97 | -4.03                                  | -15.64  | International Paper Co.<br>2.                             |
| 06S09W17CCA1     | 234                                      | 3-23   | 254.66 | -.97                                   | -20.33  | General Water Works.                                      |

Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number                 | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                          |
|-----------------------------|--|--|--------|--|---------|----------------------------------|
|                             |  | Date   | Feet   | 1980-81                                | 1977-81 |                                  |
| JEFFERSON COUNTY--Continued |  |  |        |  |         |                                  |
| 07S07W24BAB1                | 188                                      | 3-24   | 141.45 | -5.37                                  | -16.68  | Tamo public supply.              |
| 07S09W35CCB1                | 270                                      | 3-31   | 224.06 | -10.89                                 | -11.04  | Highway 15 public sup-<br>ply.   |
| LAFAYETTE COUNTY            |  |  |        |  |         |                                  |
| 19S25W13CAB1                | 255                                      | 4- 2   | 38.23  | +1.03                                  | +2.96   |                                  |
| 20S23W05ADB1                | 242                                      | 4- 2   | 39.60  | +1.02                                  | +.80    |                                  |
| LEE COUNTY                  |  |  |        |  |         |                                  |
| 02N03E14CCC4                | 232                                      | 3-17   | 65.56  | -3.04                                  | -1.11   | Marianna public supply<br>4.     |
| 03N03E28CDB1                | 207                                      | 3-17   | 46.58  | -3.10                                  | -5.68   | Marianna public supply<br>5.     |
| 03N05E19ADA1                | 200                                      | 3-17   | 26.37  | -1.58                                  | -.17    |                                  |
| LINCOLN COUNTY              |  |  |        |  |         |                                  |
| 06S06W34DBA1                | 187                                      | 3-24   | 133.97 | -2.93                                  | -11.94  | Huffs Island recreation<br>area. |
| 07S07W30CDC1                | 208                                      | 3-24   | 154.04 | -4.83                                  | -13.32  | Tarry public supply.             |
| 08S05W03BAA2                | 180                                      | 3-24   | 113.14 | -4.53                                  | -12.47  | Cummins Prison.                  |
| 08S05W35ACC1                | 165                                      | 3-24   | 93.13  | -4.55                                  | -12.08  | Gould public supply.             |
| 08S08W35DBB1                | 240                                      | 3-24   | 186.20 | -6.15                                  | -14.86  | Yorktown public supply.          |
| 09S07W07DAD1                | 300                                      | 3-26   | 239.95 | -6.07                                  | -11.85  | Star City public sup-<br>ply.    |
| 09S08W05CBB2                | 265                                      | 3-24   | 168.61 | +3.52                                  | +17.46  | Glendale School                  |
| 10S05W05ABC1                | 171                                      | 3-24   | 96.68  | -3.06                                  | -9.11   |                                  |



Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks   |
|-----------------|--|--|--------|--|---------|---|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| LONOKE COUNTY   |  |  |        |  |         |   |
| 02S08W16BDA1    | 216                                      | 3-31   | 100.87 | -6.02                                  | -11.34  | Coy public supply.  |
| MONROE COUNTY   |  |  |        |  |         |   |
| 03N02W12CBC1    | 186                                      | 3-19   | 24.74  | -2.40                                  | -2.37   | U.S. Geological Survey<br>test well.  |
| 01S02W22DBB1    | 181                                      | ----   | -----  | -----                                  | -----   | No measurement.   |
| OUACHITA COUNTY |  |  |        |  |         |   |
| 11S15W27ABD1    | 200                                      | 3-23   | 71.93  | -1.36                                  | -7.62   | International Paper Co.<br>1B.<br>Arkansas State Highway<br>and Transportation<br>Co.<br>Smackover Country Club.<br>Stephens public supply. |
| 12S16W12ADB1    | 159                                      | 3-23   | 26.31  | -1.58                                  | -3.70   |   |
| 12S18W19CDC1    | 235                                      | 3-24   | 46.96  | -2.56                                  | -2.12   |   |
| 13S16W08CAA1    | 122                                      | 3-23   | 25.78  | -6.34                                  | -3.75   |   |
| 14S17W02ABB1    | 120                                      | 3-24   | 121.42 | +6.72                                  | -18.37  |   |
| 14S17W05CAD1    | 157                                      | 3-23   | 39.90  | +7.76                                  | -1.77   |   |
| 15S16W23DAC1    | 170                                      | 3-24   | 125.67 | -3.57                                  | -.58    |   |
| 15S19W10DCC1    | 210                                      | 3-24   | 70.62  | -1.62                                  | -5.25   |   |
| PHILLIPS COUNTY |  |  |        |  |         |   |
| 01S02E32DDC1    | 211                                      | 3-18   | 65.29  | -0.27                                  | -2.89   | Marvell public supply.  |
| 02S04E02DBA1    | 250                                      | 3-17   | 108.29 | -3.40                                  | +2.60   | West Helena public<br>supply 9.   |
| 02S05E04CDC1    | 183                                      | 3-17   | 25.39  | -3.39                                  | -1.13   | Helena Swimming Pool.   |
| 02S05E16BCB1    | 180                                      | 3-17   | 54.32  | -8.50                                  | -2.02   | Helena Cotton Oil Co.   |
| 02S05E29CCC1    | 179                                      | 3-17   | 56.75  | -4.45                                  | +11.43  | Gardinier-Big River<br>Inc.   |
| 03S03E30DAA1    | 172                                      | 3-17   | 34.69  | -4.35                                  | -2.35   | Lakeview-Wabash public<br>supply.   |
| 04S02E25CCC1    | 166                                      | 3-17   | 32.52  | -3.89                                  | -4.94   | Elaine public supply.   |

Table 4.--Measurements of water levels made in 1981 in wells completed in the  
Sparta Sand--Continued

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                                |
|-----------------|--|--|--------|--|---------|--|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |  |
| POINSETT COUNTY |  |  |        |  |         |  |
| 10N01E15DBB1    | 232                                      | 4- 7   | 65.36  | -3.41                                  | -7.21   | Fisher public supply.                  |
| 11N03E25ACC1    | 273                                      | 4- 7   | 101.90 | -3.12                                  | -7.55   | Harrisburg public sup-<br>ply 3.       |
| PRAIRIE COUNTY  |  |  |        |  |         |  |
| 01N05W19CDC1    | 212                                      | 3-30   | 120.32 | -10.67                                 | -16.34  |  |
| 01N06W02ABB1    | 223                                      | 3-27   | 101.02 | -7.87                                  | -10.16  |  |
| 02N04W19ACB1    | 211                                      | 3-27   | 81.66  | -3.11                                  | -9.15   |  |
| 02N06W20BCB1    | 236                                      | 3-27   | 113.94 | -2.44                                  | -4.88   |  |
| 02N06W21DAD1    | 235                                      | 3-27   | 102.97 | -3.57                                  | -5.29   |  |
| 01S05W06BCB1    | 220                                      | 3-27   | 131.06 | -10.06                                 | -16.51  |  |
| 01S05W20ABB1    | 220                                      | 3-27   | 135.32 | -10.52                                 | -14.64  |  |
| 01S06W11DBD1    | 226                                      | 3-27   | 145.37 | -----                                  | -20.97  |  |
| PULASKI COUNTY  |  |  |        |  |         |  |
| 01N11W24ACD1    | 237                                      | 4- 1   | 11.78  | ----                                   | -2.85   | Willow Beach recreation<br>area.       |
| 01N11W35BAC1    | 235                                      | 5- 8   | 11.37  | -1.31                                  | -.88    | D. D. Terry West recre-<br>ation area. |
| 02S11W02BCA1    | 220                                      | 5- 8   | 22.57  | -7.26                                  | -.64    | Wrightsville recreation<br>area.       |
| 02S11W29AAA1    | 245                                      | 5- 8   | 32.75  | -.85                                   | -4.43   | Hensley-Woodson public<br>supply.      |
| UNION COUNTY    |  |  |        |  |         |  |
| 16S14W15CAB1    | 94                                       | 3-26   | 132.22 | -2.18                                  | -8.36   | Calion public supply.                  |
| 16S15W21BCC2    | 192                                      | 3-24   | 276.23 | -3.30                                  | -11.99  | Norphlet public supply<br>2.           |
| 16S16W02ABC1    | 124                                      | 3-24   | 155.98 | -2.72                                  | -7.06   | Smackover public supply<br>5.          |

Table 4.--Measurements of water levels made in 1981 in wells completed in the Sparta Sand--Continued

| Well number             | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>surface |        | Net change in<br>water level<br>(feet) |         | Remarks                                     |
|-------------------------|--|---|--------|--|---------|---|
|                         |  | Date                                      | Feet   | 1980-81                                | 1977-81 |   |
| UNION COUNTY--Continued |  |   |        |  |         |   |
| 17S12W31AAA1            | 230                                      | 3-25                                      | 224.12 | +1.27                                  | +0.88   | New London Water Asso-<br>ciation, 1978-81. |
| 17S13W31BAC1            | 225                                      | 3-25                                      | 284    | -1.00                                  | -3.00   | Lawson-Urbana.                              |
| 17S15W18DBB1            | 183                                      | 3-25                                      | 333.43 | -.67                                   | -9.71   | Monsanto detector well<br>8 (recorder).     |
| 17S15W29CDC1            | 220                                      | 3-25                                      | 380.90 | +1.97                                  | -6.46   | El Dorado public supply<br>13.              |
| 17S15W31DDB1            | 272                                      | 3-26                                      | 433.51 | +2.58                                  | -6.72   | Lion Oil Refining 8.                        |
| 17S15W34AAA1            | 244                                      | 3-25                                      | 377.60 | -9.38                                  | +9.38   |   |
| 17S16W24BAC1            | 220                                      | 3-25                                      | 355.92 | +11.46                                 | -5.00   | El Dorado public supply<br>17.              |
| 17S18W28BDD1            | 298                                      | 3-26                                      | 289.89 | -1.32                                  | -6.29   | Marysville Water Dis-<br>trict Association. |
| 18S15W07BAD2            | 260                                      | 3-26                                      | 335.83 | -2.12                                  | -4.66   | K. Buchanan 2.                              |
| 18S15W08ABA1            | 200                                      | 3-26                                      | 350.24 | -2.96                                  | +10.95  | Gay Oil Co.                                 |
| 18S15W33ADA1            | 253                                      | 3-24                                      | 366.88 | -4.11                                  | -18.66  | Faircrest public sup-<br>ply, 1978-81.      |
| 18S16W11DAB1            | 270                                      | 3-26                                      | 413.54 | +.79                                   | +1.12   | Parker Chapel public<br>supply, 1978-81.    |
| 18S17W13ACC1            | 220                                      | 3-26                                      | 304.35 | -5.93                                  | -8.87   | Kin Ark Oil Co.                             |
| 18S17W18BBD1            | 270                                      | 3-26                                      | 302.69 | -.25                                   | -20.99  | Shuler No. 3.                               |
| 18S17W22BDD1            | 280                                      | 3-26                                      | 339.48 | -3.56                                  | -8.56   | U.S. Geological Survey<br>recorder.         |
| 19S10W19CCB2            | 100                                      | 3-25                                      | 87.28  | +.51                                   | -1.77   | Huttig public supply 1.                     |
| 19S11W25AAA2            | 125                                      | 3-25                                      | 131.79 | -2.19                                  | -2.82   | Huttig public supply 2.                     |
| 19S16W35DDC1            | 175                                      | 3-24                                      | 208.60 | -.19                                   | +2.57   | Junction City public<br>supply 2.           |
| WOODRUFF COUNTY         |  |   |        |  |         |   |
| 05N02W31DCB3            | 193                                      | 4-10                                      | 15.70  | -2.30                                  | +4.12   | Cotton Plant public<br>supply.              |

Table 5.--Measurements of water levels made in 1981 in wells completed in the Cane River Formation

| Well number      | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                            |
|------------------|--|--|--------|--|---------|------------------------------------|
|                  |  | Date   | Feet   | 1980-81                                | 1977-81 |                                    |
| COLUMBIA COUNTY  |  |  |        |  |         |                                    |
| 16S21W16BCA2     | 320                                      | 3-31   | 107.63 | -0.47                                  | +1.47   | Waldo public supply.               |
| DALLAS COUNTY    |  |  |        |  |         |                                    |
| 09S17W28ADB1     | 172                                      | 4-10   | 117.23 | -5.25                                  | -13.15  | Sparkman public supply.            |
| LAFAYETTE COUNTY |  |  |        |  |         |                                    |
| 16S23W10DCA2     | 293                                      | 4- 2   | 62.89  | +12.90                                 | -3.79   | Arkansas Power & Light<br>Co.      |
| 19S25W13CDB2     | 255                                      | 4- 1   | 102.45 | +17.22                                 | +13.80  | Bradley public supply,<br>1978-81. |

Table 6.--Measurements of water levels made in 1981 in wells completed in the Carrizo Sand

| Well number       | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                 |
|-------------------|--|--|--------|--|---------|-------------------------|
|                   |  | Date   | Feet   | 1980-81                                | 1977-81 |                         |
| HOT SPRING COUNTY |  |  |        |  |         |                         |
| 06S17W34ABB1      | 364                                      | 4-15   | 101.36 | -2.28                                  | -7.29   | Texas Eastern.          |
| JEFFERSON COUNTY  |  |  |        |  |         |                         |
| 05S08W19DCD1      | 205                                      | 3-27   | 21.62  | -0.79                                  | -3.15   | International Paper Co. |



Table 7.--Measurements of water levels made in 1981 in wells completed in the Wilcox Group, including the "1,400-foot" sand

| Well number       | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                             |
|-------------------|--|--|-------|--|---------|-------------------------------------|
|                   |  | Date   | Feet  | 1980-81                                | 1977-81 |                                     |
| CLAY COUNTY       |  |  |       |  |         |                                     |
| 19N07E23DCC1      | 280                                      | 3-26   | 16.60 | -3.35                                  | -----   | Rector old public sup-<br>ply 1.    |
| CRAIGHEAD COUNTY  |  |  |       |  |         |                                     |
| 13N07E14BBA2      | 221                                      | 3-24   | 17.89 | -1.24                                  | -7.49   | Caraway public supply.              |
| 14N06E27ACB2      | 227                                      | 3-24   | 21.60 | -1.78                                  | -7.45   | Lake City public sup-<br>ply 2.     |
| 14N07E17DCB1      | 232                                      | 3-24   | 22.05 | -1.68                                  | -6.85   | Black Oak public sup-<br>ply.       |
| CRITTENDEN COUNTY |  |  |       |  |         |                                     |
| 04N07E23BCD1      | 200                                      | 4- 8   | 12.37 | -4.72                                  | +0.99   | Snowden Plantation.                 |
| 04N07E36ADB1      | 201                                      | 4- 8   | 19.50 | -.42                                   | -.90    | Surf Club Inc.,<br>1978-81.         |
| 05N07E01ABB1      | 207                                      | 4- 8   | 34.58 | -2.84                                  | -12.94  | Midway Water Associa-<br>tion.      |
| 05N07E29ACC1      | 200                                      | 4- 8   | 28.07 | -2.45                                  | -12.02  |                                     |
| 06N09E18BBB1      | 210                                      | 4- 8   | 56.95 | +1.58                                  | -21.00  | West Memphis public<br>supply 1.    |
| 07N07E14CCC1      | 223                                      | 4- 8   | 45.90 | -1.37                                  | -12.70  | Crawfordsville public<br>supply.    |
| 07N08E24CAB1      | 221                                      | 3-16   | 47.78 | -----                                  | -16.53  | Marion public supply<br>1, 1974-81. |
| 08N06E33CBD1      | 215                                      | 4- 8   | 32.40 | -2.80                                  | -10.38  | Earle public supply.                |
| 09N08E29ADD1      | 220                                      | 4- 8   | 38.70 | -2.40                                  | -11.20  | Turrell public supply.              |
| CROSS COUNTY      |  |  |       |  |         |                                     |
| 09N05E07ACB1      | 205                                      | 4- 8   | 19.55 | -5.15                                  | -9.45   | Delta Farms.                        |

Table 7.--Measurements of water levels made in 1981 in wells completed in the Wilcox Group, including the "1,400-foot" sand

| Well number        | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks  |
|--------------------|--|--|--------|--|---------|--|
|                    |  | Date   | Feet   | 1980-81                                | 1977-81 |  |
| GREENE COUNTY      |  |  |        |  |         |  |
| 17N06E31DCB1       | 285                                      | 3-25   | 109.95 | -11.25                                 | -21.55  | Paragould public sup-<br>ply 1.                    |
| LEE COUNTY         |  |  |        |  |         |  |
| 01N04E09DCC1       | 204                                      | 3-17   | 25.72  | -2.31                                  | -7.10   | U.S. Geological Survey<br>test well.               |
| LONOKE COUNTY      |  |  |        |  |         |  |
| 04N09W28CCD1       | 325                                      | 4-14   | 46.74  | -3.57                                  | -5.00   | E. M. Cherry well.                                 |
| MISSISSIPPI COUNTY |  |  |        |  |         |  |
| 10N08E17ADD1       | 225                                      | 3-23   | 30.94  | -1.87                                  | -4.86   |  |
| 11N08E10AAC1       | 220                                      | 3-23   | 21.55  | -7.51                                  | -11.65  | Dyess public supply.                               |
| 11N09E33AAB1       | 237                                      | 3-23   | 39.13  | -1.13                                  | -9.23   | Bassett public supply.                             |
| 11N10E20ADA1       | 235                                      | 3-23   | 35.61  | -2.79                                  | -9.51   | Wilson public supply.                              |
| 12N09E11DBB1       | 230                                      | 3-23   | 24.98  | -1.34                                  | -8.38   | Keiser public supply.                              |
| 12N11E17CDD1       | 245                                      | 3-23   | 43.08  | -1.73                                  | -8.57   | Anderson Clayton.                                  |
| 13N11E08DDA1       | 245                                      | 3-29   | 30.20  | -.50                                   | -1.39   | Luxora public supply,<br>1978-81.                  |
| 13N11E08DDD1       | 245                                      | 3-23   | 33.90  | -1.75                                  | -8.20   | Luxora public supply                               |
| 14N09E01DDA1       | 238                                      | 3-24   | 14.22  | -2.20                                  | -1.23   |  |
| 14N11E20CCA1       | 240                                      | 3-24   | 25.66  | -1.88                                  | -3.58   | Burdette public sup-<br>ply, 1979-81.              |
| 15N08E08DBC1       | 236                                      | 3-24   | 10.16  | -1.36                                  | -.46    | Leachville public sup-<br>ply.                     |
| 15N09E31ACD1       | 240                                      | 3-24   | 25.50  | -1.95                                  | -8.00   | Manila public supply.                              |
| 15N10E01ADD1       | 248                                      | 3-24   | 19.70  | +.79                                   | -2.21   | Gosnell public supply.                             |
| 15N11E15BDC1       | 255                                      | 3-24   | 44.70  | -----                                  | -----   | New well. Blytheville<br>public supply 4,<br>1981. |

Table 7.--Measurements of water levels made in 1981 in wells completed in the Wilcox Group, including the "1,400-foot" sand

| Well number                   | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks                           |
|-------------------------------|--|--|-------|--|---------|-----------------------------------|
|                               |  | Date   | Feet  | 1980-81                                | 1977-81 |                                   |
| MISSISSIPPI COUNTY--Continued |  |  |       |  |         |                                   |
| 15N11E17ADB1                  | 252                                      | 3-24   | 31.88 | -1.13                                  | -4.98   |                                   |
| 16N11E27CBA1                  | 251                                      | 3-24   | 15.75 | -1.75                                  | -4.42   | Yarbro public supply.             |
| POINSETT COUNTY               |  |  |       |  |         |                                   |
| 10N07E16CBB2                  | 218                                      | 4- 9   | 34.29 | -1.59                                  | -10.34  | Tyronza public supply<br>3.       |
| 11N06E35CDA3                  | 215                                      | 4- 9   | 33.05 | -2.30                                  | -16.83  | Marked Tree public sup-<br>ply 3. |
| 11N07E03BDD1                  | 216                                      | 4- 9   | 15.45 | -.33                                   | -3.15   | Lepanto public supply<br>2.       |
| 12N05E13BBB1                  | 222                                      | 4- 9   | 27.00 | -1.18                                  | -8.90   | Trumann public supply.            |
| ST. FRANCIS COUNTY            |  |  |       |  |         |                                   |
| 04N06E21BAD2                  | 201                                      | 3-16   | 25.32 | -2.28                                  | -8.72   | Hughes public supply 2.           |

Table 8.--Measurements of water levels made in 1981 in wells completed in the  
Nacatoch Sand

| Well number              | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                                      |
|--------------------------|--|--|--------|--|---------|--|
|                          |  | Date   | Feet   | 1980-81                                | 1977-81 |  |
| CLARK COUNTY             |  |  |        |  |         |  |
| 08S19W09ACC1             | 177                                      | 3-30   | +5.00  | -0.90                                  | -1.30   |  |
| 09S20W16DDC1             | 232                                      | 3-30   | 89.31  | -4.69                                  | -36.53  | Arkla Chemical Corp.                         |
| 09S21W28CBA1             | 305                                      | 3-30   | -----  | -----                                  | -----   | No measurement. Gurdon<br>Highway rest area. |
| CLAY COUNTY              |  |  |        |  |         |  |
| 19N07E23DCB1             | 290                                      | 3-26   | 25.64  | -0.86                                  | -2.69   | Rector public supply 1.                      |
| 20N08E10ABC1             | 340                                      | 3-25   | 60.62  | -.15                                   | -2.62   |  |
| 20N08E11BAC2             | 290                                      | 3-25   | 14.20  | +1.01                                  | +1.10   | Piggott public supply<br>2.                  |
| 20N08E28BDC1             | 286                                      | 3-25   | 11.92  | +.53                                   | -7.17   | Greenway public supply.                      |
| 21N06E23DAC1             | 300                                      | 3-26   | 18.32  | -----                                  | -3.92   | McDougal public supply.                      |
| 21N09E18DBA1             | 295                                      | 3-25   | 2.78   | -1.78                                  | -3.13   | St. Francis public sup-<br>ply.              |
| GREENE COUNTY            |  |  |        |  |         |  |
| 18N06E14CCD1             | 292                                      | 3-26   | -----  | -----                                  | -----   | No measurement. Lafa<br>Water District.      |
| DUNKLIN COUNTY, MISSOURI |  |  |        |  |         |  |
| 21N09E04DDD1             | 305                                      | 3-26   | 10.40  | +2.35                                  | -2.11   | Campbell, Mo., public<br>supply.             |
| HEMPSTEAD COUNTY         |  |  |        |  |         |  |
| 12S24W33CBD1             | 340                                      | 3-31   | 194.73 | +4.33                                  | +35.53  |  |
| 13S25W35DDC1             | 373                                      | 3-31   | 192.70 | -3.25                                  | -5.07   |  |

Table 8.--Measurements of water levels made in 1981 in wells completed in the  
Nacatoch Sand--Continued

| Well number   | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                      |
|---------------|--|--|--------|--|---------|------------------------------|
|               |  | Date   | Feet   | 1980-81                                | 1977-81 |                              |
| MILLER COUNTY |  |  |        |  |         |                              |
| 14S28W13CCB1  | 266                                      | 3-24   | 27.90  | -0.60                                  | -0.25   |                              |
| NEVADA COUNTY |  |  |        |  |         |                              |
| 11S22W08DAC2  | 306                                      | 3-31   | 107.35 | -5.56                                  | +23.11  | Prescott public supply<br>4. |
| 12S22W03CAA1  | 233                                      | 3-26   | 21.17  | -1.37                                  | -3.21   |                              |



Table 9.--Measurements of water levels made in 1981 in wells completed in the  
Tokio Formation

| Well number      | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                      |
|------------------|--|--|--------|--|---------|------------------------------|
|                  |  | Date   | Feet   | 1980-81                                | 1977-81 |                              |
| HEMPSTEAD COUNTY |  |  |        |  |         |                              |
| 09S23W33CDA1     | 270                                      | 3-30   | +1.40  | -0.50                                  | -0.80   |                              |
| 09S26W18CBB1     | 424                                      | 3-26   | 20.86  | -2.23                                  | 0.0     |                              |
| 12S24W06CDC1     | 355                                      | 3-31   | 189.88 | -6.07                                  | -9.50   | Hope public supply 5.        |
| 12S24W06DAD1     | 355                                      | 3-31   | 185.36 | +4.11                                  | -21.88  | Hope public supply 2.        |
| HOWARD COUNTY    |  |  |        |  |         |                              |
| 09S28W20DAC1     | 480                                      | 3-26   | 12.08  | -2.34                                  | -5.52   |                              |
| 11S28W02CDA1     | 309                                      | 3-26   | 22.96  | -.79                                   | -.94    |                              |
| NEVADA COUNTY    |  |  |        |  |         |                              |
| 11S22W08DAC1     | 305                                      | 3-31   | 170.33 | -10.64                                 | -49.18  | Prescott public supply<br>1. |

Table 10.--Measurements of water levels made in 1981 in wells completed in the Trinity Group or Pike Gravel

| Well number   | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |       | Net change in<br>water level<br>(feet) |         | Remarks   |
|---------------|--|--|-------|--|---------|---|
|               |  | Date   | Feet  | 1980-81                                | 1977-81 |   |
| PIKE COUNTY   |  |  |       |  |         |   |
| 08S25W17ABC1  | 360                                      | 3-26   | 3.71  | +0.02                                  | +0.04   |   |
| SEVIER COUNTY |  |  |       |  |         |   |
| 08S31W26BAA1  | 475                                      | 3-25   | 7.03  | -1.00                                  | -4.44   | Trinity Group.                                  |
| 09S30W23BDC4  | 432                                      | 3-26   | 78.48 | -.53                                   | +1.64   | Lockesburg public sup-<br>ply 4; Trinity Group. |
| 09S30W23BDD1  | 440                                      | 3-25   | 80.58 | +.70                                   | -4.46   | Lockesburg public sup-<br>ply; Trinity Group.   |

Table 11.--Measurements of water levels made in 1981 in wells completed in the  
Atoka Formation or Jackfork Sandstone

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks   |
|-----------------|--|--|--------|--|---------|---|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| CLEBURNE COUNTY |  |  |        |  |         |   |
| 09N09W34DCC1    | 620                                      | 4-20   | 113.50 | +3.09                                  | +8.79   | Atoka Formation.  |
| PIKE COUNTY     |  |  |        |  |         |   |
| 07S25W18BBB1    | 563                                      | 3-26   | 15.59  | +2.35                                  | -1.46   | U.S. Army Corps of<br>Engineers; Jackfork<br>Sandstone. |

Table 12.--Measurements of water levels made in 1981 in wells completed in the  
Cotter Dolomite

| Well number  | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land |        | Net change in<br>water level |         | Remarks               |
|--------------|--|--------------------------------|--------|------------------------------|---------|-----------------------|
|              |  | land surface                   |        | (feet)                       |         |                       |
|              |  | Date                           | Feet   | 1980-81                      | 1977-81 |                       |
| IZARD COUNTY |  |                                |        |                              |         |                       |
| 18N09W15ACA1 | 820                                      | 4-21                           | 140.20 | -31.24                       | -41.22  | Oxford public supply. |

Table 13.--Measurements of water levels made in 1981 in wells completed in the  
Everton Formation

| Well number   | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks               |
|---------------|--|--|--------|--|---------|-----------------------|
|               |  | Date   | Feet   | 1980-81                                | 1977-81 |                       |
| NEWTON COUNTY |  |  |        |  |         |                       |
| 16N21W34ABC1  | 880                                      | 4-22   | 63.55  | +0.16                                  | -3.72   | Jasper public supply. |
| SHARP COUNTY  |  |  |        |  |         |                       |
| 15N05W06DDD1  | 645                                      | 4-21   | 111.17 | +78.68                                 | +102.73 |                       |



Table 14.--Measurements of water levels made in 1981 in wells completed in the  
Roubidoux Formation

| Well number    | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks  |
|----------------|--|--|--------|--|---------|--|
|                |  | Date   | Feet   | 1980-81                                | 1977-81 |  |
| BENTON COUNTY  |  |  |        |  |         |  |
| 18N33W01DDD1   | 1,210                                    | 4-24   | 215.70 | -15.24                                 | -21.87  | U.S. Army Corps of<br>Engineers.                               |
| 19N28W11BAD1   | 1,260                                    | 4-23   | 191.63 | -----                                  | +0.02   |  |
| 19N29W18BBB1   | 1,345                                    | 5-21   | 203.89 | -----                                  | -17.18  | Sulphur Springs public<br>supply.                              |
| 21N33W23ACA1   | 1,036                                    | 4-24   | 149.55 | -27.85                                 | -34.96  |  |
| CARROLL COUNTY |  |  |        |  |         |  |
| 19N23W04BAC1   | 1,375                                    | 5-20   | 241.90 | +4.49                                  | +5.77   | Green Forest public<br>supply.                                 |
| 21N26W17BCC1   | 1,010                                    | 4-23   | 105.00 | -8.25                                  | +1.50   | Holiday Island public<br>supply l.                             |
| FULTON COUNTY  |  |  |        |  |         |  |
| 20N09W18ACB1   | 960                                      | 4-21   | 107.18 | -----                                  | -14.58  | New well. Viola public<br>supply, 1978-81.                     |
| MARION COUNTY  |  |  |        |  |         |  |
| 19N15W20DBB1   | 630                                      | 4-21   | 96.60  | +2.18                                  | -11.19  | Flippin public supply.   |
| 19N16W33CCB1   | 840                                      | 4-21   | 219.80 | +73.80                                 | +114.18 | Yellville public sup-<br>ply.                                  |
| NEWTON COUNTY  |  |  |        |  |         |  |
| 15N21W13BDD1   | 2,135                                    | ----   | -----  | -----                                  | -----   | No measurement. Mock-<br>ing Bird Hill public<br>supply, 1981. |

Table 14.--Measurements of water levels made in 1981 in wells completed in the  
Roubidoux Formation--Continued

| Well number     | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                            |
|-----------------|--|--|--------|--|---------|------------------------------------|
|                 |  | Date   | Feet   | 1980-81                                | 1977-81 |                                    |
| RANDOLPH COUNTY |  |  |        |  |         |                                    |
| 20N02E06AAC1    | 485                                      | 4-20   | 137.55 | -55.33                                 | -55.33  | Maynard public supply,<br>1980-81. |
| SHARP COUNTY    |  |  |        |  |         |                                    |
| 19N04W15BAA1    | 590                                      | 4-20   | 49.50  | -9.62                                  | -13.26  | Ozark Acres public sup-<br>ply.    |

Table 15.--Measurements of water levels made in 1981 in wells completed in the  
Gunter Sandstone Member of the Van Buren Formation

| Well number    | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks                                 |
|----------------|--|--|--------|--|---------|---|
|                |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| BAXTER COUNTY  |  |  |        |  |         |   |
| 19N13W16BAB1   | 740                                      | 4-21   | 107.91 | -14.36                                 | +7.58   | Mountain Home public<br>supply.         |
| BENTON COUNTY  |  |  |        |  |         |   |
| 18N30W12CCC1   | 1,310                                    | 4-24   | 276.36 | -11.64                                 | -15.34  | Columbia Union Or-<br>chards.           |
| 18N30W13DBA1   | 1,390                                    | 5-20   | 349.77 | -3.10                                  | -9.15   | Columbia Union Or-<br>chards.           |
| 19N29W07DAB1   | 1,220                                    | 4-23   | 124.48 | -4.44                                  | -12.51  | Rogers public supply.                   |
| 20N33W14DBC1   | 1,230                                    | 4-24   | 372.75 | +35.96                                 | -2.86   | Gravette public sup-<br>ply.            |
| BOONE COUNTY   |  |  |        |  |         |   |
| 18N19W19BCD1   | 1,150                                    | 4-22   | 197.69 | -0.73                                  | -19.27  | Bellefonte public sup-<br>ply.          |
| 18N19W33BBB1   | 1,300                                    | 4-22   | 477.43 | -20.60                                 | +18.48  | Valley Springs Rural<br>Water District. |
| CARROLL COUNTY |  |  |        |  |         |   |
| 19N23W08ADC1   | 1,325                                    | 4-23   | 207.40 | -34.58                                 | +24.77  | Green Forest public<br>supply.          |
| 20N26W16DCD1   | 1,200                                    | 5-20   | 208.75 | -----                                  | -----   | Eureka Springs public<br>supply.        |
| 21N26W15BAA1   | 1,102                                    | 4-23   | 112.80 | -.32                                   | -2.33   | Holiday Island, No. 2.                  |
| FULTON COUNTY  |  |  |        |  |         |   |
| 19N06W23ADA1   | 682                                      | 4-20   | 217.88 | +7.84                                  | -1.09   | Cherokee Village.                       |
| 20N08W27ABD1   | 660                                      | 4-21   | 25.26  | +17.12                                 | -9.96   | Salem public supply.                    |

Table 15.--Measurements of water levels made in 1981 in wells completed in the  
Gunter Sandstone Member of the Van Buren Formation--Continued

| Well number       | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks   |
|-------------------|--|--|--------|--|---------|---|
|                   |  | Date   | Feet   | 1980-81                                | 1977-81 |   |
| MARION COUNTY     |  |  |        |  |         |   |
| 19N16W32ADA1      | 950                                      | 4-21   | 480.70 | -8.67                                  | -6.61   | Summit public supply.   |
| NEWTON COUNTY     |  |  |        |  |         |   |
| 17N20W21BCA1      | 1,344                                    | 4-22   | 436.00 | -25.30                                 | +56.25  | Marble Falls Estate<br>public supply.   |
| SHARP COUNTY      |  |  |        |  |         |   |
| 18N06W10DCC1      | 655                                      | 4-21   | 127.23 | +0.15                                  | +2.66   | Ash Flat public supply.   |
| STONE COUNTY      |  |  |        |  |         |   |
| 15N12W02BCA1      | 985                                      | 5-20   | 441.20 | -----                                  | -24.63  | Fifty-Six public sup-<br>ply.   |
| WASHINGTON COUNTY |  |  |        |  |         |   |
| 15N31W17BBC1      | 1,228                                    | 4-24   | 153.60 | -4.40                                  | -3.26   | U.S. Forest Service<br>Lake Weddington.<br>White River Rural Water<br>District. |
| 15N31W30CAB1      | 1,175                                    | 5-21   | 215.10 | -6.28                                  | -3.47   |   |
| 16N32W09ABD1      | 1,135                                    | 4-24   | 114.00 | -2.81                                  | -8.35   |   |
| 17N29W09ABD1      | 1,481                                    | 5-22   | 492.55 | -41.21                                 | -50.87  |   |

Table 16.--Measurements of water levels made in 1981 in wells completed in the Potosi-Eminence Dolomite

| Well number    | Altitude<br>of land<br>surface<br>(feet) | Depth to wa-<br>ter below land<br>land surface |        | Net change in<br>water level<br>(feet) |         | Remarks  |
|----------------|--|--|--------|--|---------|--|
|                |  | Date   | Feet   | 1980-81                                | 1977-81 |  |
| BENTON COUNTY  |  |  |        |  |         |  |
| 20N29W13BCA1   | 1,430                                    | 4-23   | 361.80 | -9.45                                  | +6.78   | Benton County Water Dis-<br>trict public supply. |
| BOONE COUNTY   |  |  |        |  |         |  |
| 20N18W20CCD1   | 882                                      | 4-22   | 246.53 | -----                                  | -20.95  | Diamond City public<br>supply 2.                 |
| CARROLL COUNTY |  |  |        |  |         |  |
| 20N26W23ACA1   | 1,296                                    | 4-23   | 464.00 | +5.00                                  | -121.25 | Eureka Springs public<br>supply.                 |









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