**Table 13.**--Chemical analyses of water from test holes

| Test hole | Location | Date of sample | Time | Discharge (gal/min) | Depth to top of interval sampled (ft) | Depth to bottom of interval sampled (ft) | Water temperature (°C) | Specific conductance (µmho/cm) | pH (units) | Milligrams per liter: Dissolved oxygen | Hardness as $CaCO_3$ | Noncarbonate hardness as $CaCO_3$ | Dissolved calcium (Ca) | Dissolved magnesium (Mg) | Dissolved sodium (Na) | Sodium adsorption ratio | Dissolved potassium (K) | Bicarbonate as $HCO_3$ | Carbonate as $CO_3$ | Alkalinity as $CaCO_3$ | Dissolved carbon dioxide ($CO_2$) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | (D-11-24)7acd-1 | 7-18-76 | 1600 | 1.0 | 1,888 | 2,650 | 26.5 | 10,300 | 8.2 | -- | 45 | 0 | 8.5 | 5.3 | 2,300 | 153 | 9.5 | 1,180 | -- | 968 | 12 |
| | | 7-19-76 | 1000 | 3.3 | 1,507 | 1,622 | 26.0 | 2,070 | 8.8 | -- | 10 | 0 | 2.3 | 1.0 | 480 | 67 | 1.4 | 574 | 24 | 511 | 1.6 |
| | | 7-19-76 | 1200 | 8.1 | 1,080 | 1,285 | 26.0 | 2,070 | 8.7 | -- | 9 | 0 | 2.2 | .9 | 480 | 69 | 1.6 | 607 | 19 | 530 | 2.1 |
| | | 7-20-76 | 0900 | 6.0 | 750 | 950 | 25.0 | 1,970 | 8.6 | -- | 13 | 0 | 3.2 | 1.2 | 450 | 54 | 1.8 | 602 | 12 | 514 | 2.5 |
| | | 11-11-76 | 1200 | 4.0 | 1,092 | 1,158 | 21.5 | 1,800 | -- | -- | 4 | 0 | 1.1 | .3 | 360 | 83 | .8 | 611 | -- | 501 | -- |
| | | 11-12-76 | 1200 | 2.0 | 1,250 | 1,260 | 22.0 | 1,720 | -- | -- | 4 | 0 | 1.3 | .2 | 350 | 76 | .7 | 481 | -- | 395 | -- |
| | | 3-23-79 | 1600 | 10 | 1,092 | 1,576 | 25.0 | 1,800 | 9.0 | -- | 5 | 0 | 1.3 | .5 | 390 | 74 | .9 | -- | -- | 430 | -- |
| 2 | (D-13-23)26bdc-1 | 6-29-77 | 1730 | .0 | .0 | 40 | 15.0 | 9,000 | 8.7 | -- | 27 | 0 | 3.4 | 4.5 | 2,300 | 193 | 3.8 | 2,430 | 200 | 2,330 | 9.1 |
| | | 7- 7-78 | 0830 | 11 | 40 | 1,290 | 18.5 | 1,130 | 7.2 | -- | 320 | 120 | 54 | 44 | 190 | 4.7 | .7 | 240 | 0 | 200 | 24 |
| 3 | (D-13-21)10ada-1 | 3-22-78 | 0500 | 211 | 250 | 1,092 | 16.5 | 900 | 8.1 | -- | 100 | 0 | 17 | 15 | 190 | 8.1 | .9 | 280 | -- | 230 | 3.6 |
| 4 | (D-12-24)19dbc-1 | 3-26-78 | 0800 | 10 | 100 | 800 | 10.0 | 4,000 | 9.2 | -- | 360 | 0 | 15 | 79 | 760 | 17 | 4.6 | 1,270 | -- | 1,040 | 1.3 |
| | | 3-28-78 | 1850 | 42 | 800 | 1,402 | 22.0 | 1,300 | 8.6 | -- | 19 | 0 | 4.5 | 1.8 | 340 | 34 | 1.0 | 370 | -- | 300 | 1.5 |
| 5 | (D-11-25)26aab-1 | 5-23-78 | 1610 | 12 | 117 | 798 | 16.5 | 3,680 | 7.4 | 0.0 | 910 | 510 | 130 | 140 | 690 | 10 | 1.9 | 490 | 0 | 400 | 31 |
| 6 | (D-12-22)1bbb-1 | 4- 3-78 | 1000 | 76 | 135 | 764 | 18.0 | 10,900 | 9.2 | -- | 1,300 | 0 | 6.6 | 300 | 3,100 | 38 | 10 | 1,200 | 1,250 | 3,070 | 3.8 |
| | | 4- 7-78 | 1545 | 125 | 1,000 | 1,497 | 23.5 | 1,370 | -- | -- | 14 | 0 | 4.5 | .7 | 360 | 42 | 1.5 | 620 | -- | 509 | -- |
| | | 5- 5-78 | 1240 | 15 | 135 | 860 | 23.5 | 1,350 | 9.0 | -- | 6 | 0 | 1.7 | .4 | 360 | 65 | .8 | 700 | 15 | 599 | 1.2 |

| Test hole | Location | Date of sample | Milligrams per liter: Total sulfide (S) | Dissolved sulfate ($SO_4$) | Dissolved chloride (Cl) | Dissolved fluoride (F) | Dissolved bromide (Br) | Dissolved silica ($SiO_2$) | Dissolved solids, residue at 180 °C | Dissolved solids, sum of constituents | Nitrogen: Dissolved nitrate as N | Dissolved nitrate as $NO_3$ | Dissolved nitrite as N | Dissolved nitrite as $NO_2$ | Dissolved $NO_2 + NO_3$ as N | Dissolved ammonia as N | Dissolved ammonia as $NH_4$ | Ammonia + organic total as N | Total phosphorus as P | Total phosphorus as $PO_4$ | Dissolved orthophosphate as P | Dissolved orthophosphate as $PO_4$ |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | (D-11-24)7acd-1 | 7-18-76 | -- | 270 | 2,900 | 4.9 | 12 | 10 | 6,110 | 6,120 | 0.00 | 0.00 | 0.00 | 0.00 | 0.00 | 12 | 15 | 11 | 0.16 | 0.49 | -- | -- |
| | | 7-19-76 | -- | 440 | 59 | 2.0 | .4 | 13 | 1,340 | 1,310 | .00 | .00 | .00 | .00 | .00 | .76 | .98 | .84 | .05 | .15 | 0.06 | 0.18 |
| | | 7-19-76 | -- | 380 | 110 | 2.1 | .6 | 13 | 1,320 | 1,310 | .00 | .00 | .00 | .00 | .00 | .79 | 1.0 | 1.3 | .06 | .18 | .05 | .15 |
| | | 7-20-76 | -- | 350 | 92 | 2.2 | .4 | 13 | 1,260 | 1,230 | .00 | .00 | .00 | .00 | .00 | .79 | 1.0 | 1.5 | .06 | .18 | .07 | .21 |
| | | 11-11-76 | -- | 250 | 38 | 1.4 | -- | 12 | -- | 965 | -- | -- | -- | -- | .01 | -- | -- | -- | -- | -- | .00 | .00 |
| | | 11-12-76 | -- | 360 | 13 | .9 | -- | 11 | -- | 974 | -- | -- | -- | -- | .01 | -- | -- | -- | -- | -- | .01 | .03 |
| | | 3-23-79 | 7.7 | 390 | 22 | 1.1 | -- | 12 | -- | 1,080 | -- | -- | -- | -- | .03 | -- | -- | -- | -- | -- | -- | -- |
| 2 | (D-13-23)26bdc-1 | 6-29-77 | -- | 39 | 980 | 110 | -- | 9.2 | -- | 4,920 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 7- 7-78 | .2 | 470 | 12 | .3 | .1 | 8.9 | 927 | 906 | .38 | 1.7 | .01 | .03 | .39 | .01 | .01 | .24 | .01 | .03 | .01 | .03 |
| 3 | (D-13-21)10ada-1 | 3-22-78 | -- | 270 | 9.3 | .2 | -- | 10 | -- | 651 | -- | -- | -- | -- | .08 | -- | -- | -- | -- | -- | .00 | .00 |
| 4 | (D-12-24)19dbc-1 | 3-26-78 | -- | 820 | 39 | .4 | -- | 6.3 | -- | 2,350 | -- | -- | -- | -- | .20 | -- | -- | -- | -- | -- | .00 | .00 |
| | | 3-28-78 | -- | 400 | 7.4 | .5 | -- | 8.1 | -- | 948 | -- | -- | -- | -- | .02 | -- | -- | -- | -- | -- | .00 | .00 |
| 5 | (D-11-25)26aab-1 | 5-23-78 | .0 | 1,800 | 33 | .8 | .2 | 19 | 3,030 | 3,070 | .01 | .04 | .00 | .00 | .01 | .69 | .89 | .90 | .03 | .09 | .00 | .00 |
| 6 | (D-12-22)1bbb-1 | 4- 3-78 | -- | 4,300 | 280 | 2.2 | -- | 12 | -- | 9,870 | -- | -- | -- | -- | .05 | -- | -- | -- | -- | -- | -- | -- |
| | | 4- 7-78 | -- | 260 | 13 | 1.2 | -- | 12 | -- | 959 | -- | -- | -- | -- | .00 | -- | -- | -- | -- | -- | .01 | .03 |
| | | 5- 5-78 | -- | 150 | 32 | 1.9 | -- | 13 | -- | 921 | -- | -- | -- | -- | .03 | -- | -- | -- | -- | -- | .03 | .09 |

| Test hole | Location | Date of sample | Micrograms per liter: Dissolved aluminum (Al) | Dissolved arsenic (As) | Dissolved barium (Ba) | Dissolved boron (B) | Dissolved cadmium (Cd) | Dissolved chromium (Cr) | Dissolved copper (Cu) | Dissolved iron (Fe) | Dissolved lead (Pb) | Dissolved lithium (Li) | Dissolved manganese (Mn) | Dissolved mercury (Hg) | Dissolved molybdenum (Mo) | Dissolved selenium (Se) | Dissolved strontium (Sr) | Dissolved vanadium (V) | Dissolved zinc (Zn) | Dissolved organic carbon (mg/L as C) | Gross beta, dissolved (pCi/L as Cs-137) | Gross beta, dissolved (pCi/L as Sr/Yt-90) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| 1 | (D-11-24)7acd-1 | 7-18-76 | 280 | 3 | 300 | 3,200 | 1 | 0 | 2 | 160 | 5 | 530 | 30 | 0.0 | 8 | 0 | 1,200 | 1.4 | 80 | -- | -- | -- |
| | | 7-19-76 | 30 | 1 | 0 | 310 | 0 | 0 | 0 | 70 | 5 | 100 | 90 | .0 | 1 | 0 | 220 | .0 | 20 | -- | -- | -- |
| | | 7-19-76 | 140 | 1 | 0 | 380 | 0 | 0 | 1 | 130 | 4 | 110 | 10 | .0 | 0 | 0 | 200 | .0 | 20 | -- | -- | -- |
| | | 7-20-76 | 10 | 1 | 0 | 430 | 1 | 0 | 2 | 140 | 13 | 110 | 10 | .0 | 0 | 0 | 180 | .0 | 40 | -- | -- | -- |
| | | 11-11-76 | -- | -- | -- | 370 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 11-12-76 | -- | -- | -- | 140 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 3-23-79 | 50 | -- | -- | 200 | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| 2 | (D-13-23)26bdc-1 | 6-29-77 | -- | -- | -- | 70,000 | -- | -- | -- | 140 | -- | -- | 8 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 7- 7-78 | 0 | 1 | 200 | 170 | 1 | 10 | 0 | 1,600 | 5 | 40 | 20 | .0 | 2 | 0 | 3,800 | .0 | 30 | 2.4 | <3.4 | <3.1 |
| 3 | (D-13-21)10ada-1 | 3-22-78 | -- | -- | -- | 630 | -- | -- | -- | 40 | -- | -- | 10 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| 4 | (D-12-24)19dbc-1 | 3-26-78 | -- | -- | -- | 1,800 | -- | -- | -- | 40 | -- | -- | 60 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 3-28-78 | -- | -- | -- | 130 | -- | -- | -- | 2,100 | -- | -- | 60 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| 5 | (D-11-25)26aab-1 | 5-23-78 | 0 | 5 | 0 | 770 | 1 | 0 | 5 | 2,100 | 4 | 260 | 700 | .0 | 11 | 0 | 6,800 | .0 | 300 | 3.9 | <8.5 | -- |
| 6 | (D-12-22)1bbb-1 | 4- 3-78 | -- | -- | -- | 12,000 | -- | -- | -- | 730 | -- | -- | 40 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 4- 7-78 | -- | -- | -- | 250 | -- | -- | -- | 170 | -- | -- | 20 | -- | -- | -- | -- | -- | -- | -- | -- | -- |
| | | 5- 5-78 | -- | -- | -- | 460 | -- | -- | -- | 10 | -- | -- | 10 | -- | -- | -- | -- | -- | -- | -- | -- | -- |