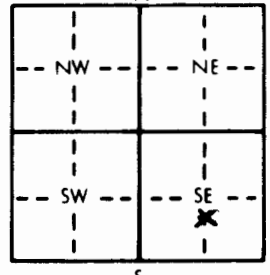


1 LOCATION OF WATER WELL: County: Grant Fraction: N¹/₂ 1/4 S¹/₂ 1/4 SE 1/4 Section Number: 20 Township Number: T 29 S Range Number: R 38 EW

Distance and direction from nearest town or city street address of well if located within city?
3 miles SE of Cognac, KS

2 WATER WELL OWNER: ARCO Oil & Gas Co.
 RR#, St. Address, Box #: P.O. Box 1610
 City, State, ZIP Code: Midland, TX 79702
 Board of Agriculture, Division of Water Resources
 Application Number: 900546

3 LOCATE WELL'S LOCATION WITH AN "X" IN SECTION BOX:

 4 DEPTH OF COMPLETED WELL: 320 ft. ELEVATION:
 Depth(s) Groundwater Encountered 1. 160 ft. 2. _____ ft. 3. _____ ft.
 WELL'S STATIC WATER LEVEL: 160 ft. below land surface measured on mo/day/yr 11-26-90
 Pump test data: Well water was 210 ft. after 1 hours pumping 110 gpm
 Est. Yield 110 gpm: Well water was _____ ft. after _____ hours pumping _____ gpm
 Bore Hole Diameter: 11 in. to 320 ft., and _____ in. to _____ ft.
 WELL WATER TO BE USED AS: 5 Public water supply 8 Air conditioning 11 Injection well
 1 Domestic 3 Feedlot 6 Oil field water supply 9 Dewatering 12 Other (Specify below)
 2 Irrigation 4 Industrial 7 Lawn and garden only 10 Monitoring well
 Was a chemical/bacteriological sample submitted to Department? Yes _____ No X _____; If yes, mo/day/yr sample was submitted
 Water Well Disinfected? Yes X No

5 TYPE OF BLANK CASING USED:
 1 Steel 3 RMP (SR) 5 Wrought iron 8 Concrete tile CASING JOINTS: Glued X Clamped _____
2 PVC 4 ABS 6 Asbestos-Cement 9 Other (specify below) Welded _____
 7 Fiberglass Threaded _____
 Blank casing diameter: 6 in. to 320 ft., Dia _____ in. to _____ ft., Dia _____ in. to _____ ft.
 Casing height above land surface: 24 in., weight _____ lbs./ft. Wall thickness or gauge No. .032
 TYPE OF SCREEN OR PERFORATION MATERIAL:
 1 Steel 3 Stainless steel 5 Fiberglass 7 PVC 10 Asbestos-cement
 2 Brass 4 Galvanized steel 6 Concrete tile 9 ABS 11 Other (specify) _____
 12 None used (open hole)
 SCREEN OR PERFORATION OPENINGS ARE:
 1 Continuous slot 3 Mill slot 5 Gauzed wrapped 8 Saw cut 11 None (open hole)
 2 Louvered shutter 4 Key punched 6 Wire wrapped 9 Drilled holes
 7 Torch cut 10 Other (specify) _____
 SCREEN-PERFORATED INTERVALS: From 240 ft. to 320 ft., From _____ ft. to _____ ft.
 From _____ ft. to _____ ft., From _____ ft. to _____ ft.
 GRAVEL PACK INTERVALS: From 200 ft. to 320 ft., From _____ ft. to _____ ft.
 From _____ ft. to _____ ft., From _____ ft. to _____ ft.

6 GROUT MATERIAL: 1 Neat cement 2 Cement grout 3 Bentonite 4 Other hole plug
 Grout Intervals: From 1 ft. to 20 ft., From _____ ft. to _____ ft., From _____ ft. to _____ ft.
 What is the nearest source of possible contamination:
 1 Septic tank 4 Lateral lines 7 Pit privy 10 Livestock pens 14 Abandoned water well
 2 Sewer lines 5 Cess pool 8 Sewage lagoon 11 Fuel storage 15 Oil well/Gas well
 3 Watertight sewer lines 6 Seepage pit 9 Feedyard 12 Fertilizer storage 16 Other (specify below)
 13 Insecticide storage
 Direction from well? Southwest How many feet? 85

FROM	TO	LITHOLOGIC LOG	FROM	TO	PLUGGING INTERVALS
0	16	Brown Clay			
16	28	Brown to yellow clay			
28	101	Yellow Clay			
101	140	Brown Clay			
140	163	Sandy Clay			
163	177	Clay			
177	188	Sandy Clay			
188	214	Sand and Gravel			
214	221	Sandy Clay			
221	247	Gravel w/Clay			
247	250	Clay			
250	310	Sandy Clay w/Sand			
310	320	Clay			

7 CONTRACTOR'S OR LANDOWNER'S CERTIFICATION: This water well was 1 constructed, (2) reconstructed, or (3) plugged under my jurisdiction and was completed on (mo/day/year) 11-26-90 and this record is true to the best of my knowledge and belief. Kansas Water Well Contractor's License No. KWWCL-430 This Water Well Record was completed on (mo/day/yr) 11-26-90 under the business name of Howard Drlg.Co. Box 806 Beaver, OK 73932 by (signature) *Howard Drlg. Co.*

INSTRUCTIONS: Use typewriter or ball point pen. PLEASE PRESS FIRMLY and PRINT clearly. Please fill in blanks, underline or circle the correct answers. Send top three copies to Kansas Department of Health and Environment, Bureau of Water, Topeka, Kansas 66620-7320. Telephone: 913-296-5545. Send one to WATER WELL OWNER and retain one for your records.