



00278513

Well: #44-35 Gillham

Location: 812' FEL and 662' FSL Section 35, T. 12 N., R. 53 W.  
Logan County, Colorado

Operator: Holly Resources Corporation

Contractor: Exeter Drilling Company

Elevations: 4568 Gr.; 4576 KB

Casing: Ran 4 joints of 8-5/8", 136.8', set at 146.87 KB  
with 90 sacks regular cement, 50-50 Pozmix, 3%  
CaCl<sub>2</sub>. Plug down 2:00 p.m., April 4, 1969.

Well History: 4/4/69 Moved in, set surface.  
4/5/69 Drilling @ 2350'.  
4/6/69 Drilling @ 4936'.  
4/7/69 Tripping for bit @ 5253'.  
4/8/69 Drilling @ 5397'. Total depth of 5401'  
reached this date.  
4/9/69 Plugged and abandoned.

Drill Stem Tests: DST #1 - 5360 - 5366. "J" sand  
Open 10 min., shut-in 30 min., open 120 min.,  
shut-in 60 min.  
Opened with weak blow, which continued throughout  
test.  
Recovered 50' very slightly oil-cut mud  
350' gas in pipe

Flow pressures	54	67
Shut-in pressures	1067	1013
Hydrostatic pressures	2910	2841

Cores: None.

Logs: Schlumberger I-ES, Bore Hole Compensated  
Sonic-Gamma Ray, Compensated Formation  
Density Log, and Microlog.

**Log Formation Tops:**

Niobrara	4408	
Carlile	4772	
Greenhorn	4990	
Bentonite	5132	
"D" Sand	5228	-652
"J" Sand	5348	-772
Total Depth	5401	5400 Driller

**Mud:** On the morning of April 7, 1969, the mud had the following properties:

Weight	9.9 #/gal.
Viscosity	54 API Funnel
Water Loss	4.9 cc in 30"
Filter Cake	2/32"

Bit Record:	No.	Size	Make	Type	Depth Out	Feet	Hours
	1	7-7/8	Sec.	S-3	3154	3006	18-3/4
	2	7-7/8	Reed	YT3A	4772	1618	20
	3	7-7/8	Smith	DT	5253	481	13
	4	7-7/8	HTC	OWV	5370	117	12-1/4
	5	7-7/8	HTC	OSC	5400	30	4

Deviation Surveys:	Depth	Degrees from Vertical
	514	1/4°
	1027	3/4°
	1506	3/4°
	2015	3/4°
	2526	3/4°
	3154	1-1/4°
	3662	1°
	4170	1°
	4772	1/2°
	5253	1/2°

**Sample Description:**

5200 - 5228 Shale, black.

5228 - 5238 Sandstone, fine-grained, gray to white, very good porosity, friable, clear subrounded quartz grains, little cementation, wet, no show, no fluorescence.

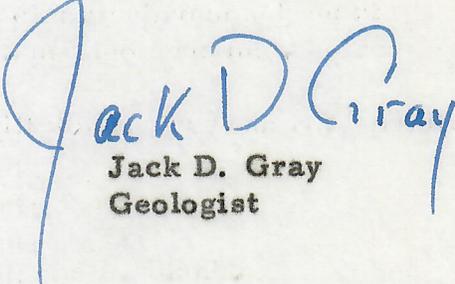
5238

- 5238 - 5244 Sandstone, very fine-grained, gray to white, clay-filled, friable, low porosity, wet, no show, no fluorescence.
- 5244 - 5247 Shale, black.
- 5247 - 5253 Sandstone, very fine-grained, gray to white, silty, clay-filled, mushy, wet, no show, no fluorescence.
- 5253 - 5255 Shale, black.
- 5255 - 5276 Sandstone, fine-grained, white, good porosity, clay matrix, friable, clear subrounded quartz grains, wet, no show, no fluorescence.
- 5276 - 5308 Shale, tan, black; siltstone, gray, hard; pyrite.
- 5308 - 5326 Shale, black.
- 5326 - 5348 Siltstone, gray, hard; shale, black.
- 53 5348 - 5356 Sandstone, very fine-grained, silty, shaly, clay-filled, tight, no show.
- 5356 - 5359 Shale, black.
- 5359 - 5369 Sandstone, fine-grained, white, good porosity, friable, good bright yellow fluorescence, good eather-cut fluorescence, faint stain.
- 5369 - 5384 Shale, black.
- 5384 - 5401 Sandstone, white, fine-grained, friable, good porosity, clear subrounded quartz grains, some silica and clay matrix, heavy mineral inclusions, wet, no show, no fluorescence.

**Discussion:**

This well was drilled in an attempt to extend the J-2 production at the 1-well Winchester field, NW/4 NE/4 Sec. 2-11N-53W. The J-2 section in this hole had strong sample shows and appeared

to be permeable from sample examination. However, log characteristics indicated the sand to be relatively impermeable and this interpretation was borne out by the drill stem test recovery. No shows were noted in any other zones in the hole, and the well was plugged and abandoned in the surface casing only with the verbal permission of the Colorado Oil & Gas Conservation Commission.

  
Jack D. Gray  
Geologist

11 April 1969