

CITIES SERVICE GAS COMPANY
McLouth Storage Field

C-1913
R-1914

Well (Longwell # 4 - Bankers Life)

Location: SW NE SW 3-103-20E
Leavenworth County, Kansas

Elevation: 1066'

T.D. 1456' (by records)
1460' (sand line)

Casing Record: 7" set 1405'

McLouth Sand: 1406' to 1450'

Date Started: 5-27-60
Ended: 6-26-60

By: Horn 72 Star Rig

Record:

The casing in this well was tested to determine if it was suitable to be equipped for a pressure observation well in the Steenstry area of McLouth Storage Field - Moved on location, rigged up and pulled 1442' rods and 2" tubing - Ran 6" tools to 1460' T.D. - Ran baler and found fluid at approximately 800' then ran gamma ray log and collar locator log - Ran 2" x 7" hookwall packer on 2" tubing and made the following water pressure tests:

Packer at 1384' and 100# water pressure, pressure dropped 50# in 10minutes
Repressured to 100# water pressure and ruptured the casing.

The packer slid down the hole about 1' when the slips in the braden head did not hold so was eventually reset at 1386' - At atmospheric pressure the well took water at the rate of 10 gal/min. - When trying to pull packer it hung up at 1382' - Packer was eventually freed leaving 4 slips and 2 friction springs in the hole - Ran 6" tools to 1460' then strung in the baler to 1439' where it stopped - Cleaned out black shale cavings from 1439' to 1460' T.D. - Ran 2" tubing to bottom then pumped in 30 sacks cement - Fill up from 1460' to 1427' S.L.M. - Ran 2" tubing to 1426' then pumped in 50 sacks cement - Pulled 2" tubing up to 1354' and hooked on to annulus and reverse circulated approximately 10 sacks cement - Fill up 1427' to 1421' S.L.M. - Ran 2" tubing to 1420' and pumped in 25 sacks cement then pulled 2" tubing to 1330' - Hooked on to 7"

(Longwell # 4 - Bankers Life) continued

casing and pumped into annulus - Circulated about 10 sacks cement out the 2" tubing -

Pulled the rest of the 2" tubing - Tore down rig and moved off - Top of cement at

1350' S.L.M.

Material Used: 105 Sacks Cement

Material Reclaimed: 1442' Sucker Rods
1442' 2" Tubing
6.14' Working Barrel
1 Shear Pole

Well (Longwell # 4 - Bankers Life)

Plugged By: Horn 72 Star Rig

Dates:

Started: 5-27-60

Ended: 6-26-60

Elevation: 1066'

Material Reclaimed

1442' 2" Tubing
1442' Sucker Rods
6.14' Working Barrel
1 Shear Pole

Material Used

105 Sacs Cement

12-1/4" hole 38'

10-1/4" hole 955'

Top of Cement 1350' S.L.M.

8-1/4" hole 1405'

7" Casing shoe at 1405'

6-1/4" hole 1460'

Total Depth 1460' (Sand line)

Mr. R. T. Gaut
Office

March 18, 1960

Subject: Cities Service Gas Company
McLouth Storage Field,
(Longwell #4-Bankers Life)
SW NE SW 3-10S-20E.,
Leavenworth County, Kansas

The casing in the above described well should be tested to determine if it is suitable to be equipped for pressure observation in the Steenstry area of the McLouth field. If testing indicates the condition of the well is not suitable for repair, a recommendation to plug the well will be issued.

PERTINENT DATA:

Ground Level Elevation: 1,066'

*Casing:

<u>Size</u>	<u>Ran</u>	<u>Pulled</u>	<u>Weight</u>	<u>Thread</u>	<u>Amount Cement</u>	<u>Top Cement</u>
10 3/4"	38'	38'				
8 5/8"	955'	955'				
7"	1,405'		20#		15 Sacks	1,257' (calculated)

Hole Sizes: 12 1/4" to 38', 10 1/4" to 955', 8 1/4" to 1,405',
6 1/4" to 1,456' T.D.

Shot Record: Shot 60 quarts from 1,426' - 1,446'

Initial Production: 40 BOPD, 26° gravity

Producing Horizon: McLouth sand from 1,406' to 1,450'

Drilled Hole Below Casing: 6 1/4" open hole from 1,406' to 1,456' total depth
1,406' - 1,434' oil sand
1,434' - 1,440' brown sand
1,440' - 1,446' dark brown sand
1,446' - 1,450' light brown sand
1,450' - 1,456' sandy shale

RECOMMENDATION:

Reclaim present single sheave shear pole.
Pull rods and pump.
Pull tubing.
Run Collar Locator Log and Gamma Ray Log.

Test casing with water as follows:

Use 2" test tubing and packer. Set packer in bottom joint and pressure to 100# on annulus. Reset packer at 1,050' and test at 250# pressure. Reset packer at 700' and test at 400# pressure. Reset packer at 350' and test with 500# pressure. These surface pressures and test depths result in test pressures ranging from 550# to 700#.

Install full opening valve on the casing. Bail well dry and shut in for observation.

If the casing leaks, plug the well; a plugging recommendation will be written when necessary.

Necessary Equipment: Company cable tool rig.
Company logging truck.

Necessary Materials from Stock: 1 - 7", 500#, Full Opening Gate.
1 - 7", 20#, x 12" Nipple

Necessary Materials to be Purchased:

- 2 - 7", 8 rd. thd. Bell Nipples.
- 1 - 6", Series 30, Slip-on Flange, bored to slip on 7", complete with Bolts and Washers.
- 1 - 6" x 2", Series 30, Slip-on Reducing Flange.
- 1 - 2" x 4", T.O.E. Nipple.
- 1 - 2", 500#, Gate.
- 1 - 2" x 1/4" Swage
- 1 - 1/4" Valve.
- 1 - 1/4" Bull Plug.

Floyd Hentschel, Jr.
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