



Home Office: Wichita, Kansas 67201  
P. O. Box 1599 (316) 838-0601

Company Cameron C. Funk & Co. Lease & Well No. Caldwell #1  
Elevation 3413 Kelly Bushing Formation Fort Scott Effective Pay - Ft. Ticket No. 23544  
Date 2-12-76 Sec. 34 Twp. 20S Range 38W County Wichita, State Kansas  
Test Approved by \_\_\_\_\_ Western Representative Marvin Printz  
Formation Test No. 1 O.K. ☒ Misrun ☐ Interval Tested From 4508' to 4600' Total Depth 4600'  
Size Main Hole 77/8 Rat Hole ☐ Conv. ☐ B.T. ☒ Damaged ☐ Yes ☒ No Conv. ☒ B.T. ☐ Damaged ☐ Yes ☒ No  
Top Packer Depth 4503 Ft. Size 6 3/4 Bottom Packer Depth 4508 Ft. Size 6 3/4  
Straddle ☐ Conv. ☐ B.T. ☐ Damaged ☐ Yes ☐ No Packer Depth ☐ Ft. Size ☐  
Tool Size 5 1/2 OD Tool Joint Size 4 1/2 FH Anchor Length 92 Ft. Size 5 1/2 OD Surface Choke Size 3/4 In. Bottom Choke Size 3/4 In.  
RECORDERS Depth 4533 Ft. Clock No. 10412 Depth 4536 Ft. Clock No. 6893  
Top Make Kuster Cap. 4200 No. 3354 ~~Inside~~ Outside Bottom Make Kuster Cap. 4150 No. 2604 ~~Inside~~ Outside  
Below Straddle: Depth ☐ Rec. No. ☐ Clock No. ☐ ~~Inside~~ Outside Depth ☐ Ft. Rec. No. ☐ Clock No. ☐ ~~Inside~~ Outside  
Time Set Packer 11:47 A. M  
Tool Open I.F.P. From 11:50A M. to 12:05P M. - Hr. 15 Min. From (B) 38 P.S.I. To (C) 38 P.S.I.  
Tool Closed I.C.I.P. From 12:05P M. to 1:05P M. - Hr. 60 Min (D) 1154 P.S.I.  
Tool Open F.F.P. From 1:05P M. to 1:25P M. - Hr. 20 Min. From (E) 40 P.S.I. To (F) 40 P.S.I.  
Tool Closed F.C.I.P. From 1:25P M. to 2:25P M. - Hr. 60 Min. (G) not available P.S.I.  
Initial Hydrostatic Pressure (A) 2227 P.S.I. Final Hydrostatic Pressure (H) 2220 P.S.I. Maximum Temp. 113

#### INFORMATION

BLOW Tool opened with a weak blow for 12 minutes in initial flow period. no blow in final flow period.

Did Well Flow ☐ Yes ☒ No Recovery Total Ft. 25' of oil spotted mud.

Reversed Out ☐ Yes ☒ No Mud Type starch Viscosity 49 Weight 9.7 Water Loss 8.0 cc. Chlorides ☐

EXTRA EQUIPMENT: Type Circ. Sub. pin Safety Joint yes Jars: Size ☐ In. Make WTC Ser. No. 408

Dual Packer yes Did Packers Hold? yes Did Tool Plug? no Where? ☐ ☐ ☐

DRILLING CONTRACTOR Sage Drlg. Co. Length Drill Pipe 3616 Ft. I.D. Drill Pipe 3.8 In. Tool Joint Size 4 1/2 FH In.

Length Weight Pipe 713 Ft. I.D. Weight Pipe 2.7 In. Tool Joint Size 4 1/2 XH In. Length Drill Collars 150 Ft. I.D. Drill Collars 2.5 In.

Tool Joint Size 4H-90 In. Length D.S.T. Tool 121 Ft.

Remarks: By-passed tool 15 minutes into final flow period.

Did not receive F.C.I.P. (trapped hydrostic pressure.)

# WESTERN TESTING CO., INC.

## Pressure Data

Date 2-12-76 Test Ticket No. 23544  
 Recorder No. 3354 Capacity 4200 Location 4533 Ft.  
 Clock No. 10412 Elevation 3413 Kelly Bushing Well Temperature 113 °F

| Point                          | Pressure             |                            | Time Given | Time Computed |
|--------------------------------|----------------------|----------------------------|------------|---------------|
| A Initial Hydrostatic Mud      | 2227 P.S.I.          | Open Tool                  | 11:47 A.M. |               |
| B First Initial Flow Pressure  | 38 P.S.I.            | First Flow Pressure        | 15 Mins.   | 15 Mins.      |
| C First Final Flow Pressure    | 38 P.S.I.            | Initial Closed-in Pressure | 60 Mins.   | 60 Mins.      |
| D Initial Closed-in Pressure   | 1154 P.S.I.          | Second Flow Pressure       | 20 Mins.   | 18 Mins.      |
| E Second Initial Flow Pressure | 40 P.S.I.            | Final Closed-in Pressure   | 60 Mins.   | - Mins.       |
| F Second Final Flow Pressure   | 40 P.S.I.            |                            |            |               |
| G Final Closed-in Pressure     | not available P.S.I. |                            |            |               |
| H Final Hydrostatic Mud        | 2220 P.S.I.          |                            |            |               |

### PRESSURE BREAKDOWN

| First Flow Pressure         |           | Initial Shut-In             |             | Second Flow Pressure        |           | Final Shut-In               |        |
|-----------------------------|-----------|-----------------------------|-------------|-----------------------------|-----------|-----------------------------|--------|
| Breakdown: <u>3</u> Inc.    |           | Breakdown: <u>20</u> Inc.   |             | Breakdown: <u>3</u> Inc.    |           | Breakdown: <u>-</u> Inc.    |        |
| of <u>5</u> mins. and a     |           | of <u>3</u> mins. and a     |             | of <u>5</u> mins. and a     |           | of <u>3</u> mins. and a     |        |
| final inc. of <u>0</u> Min. |           | final inc. of <u>0</u> Min. |             | final inc. of <u>0</u> Min. |           | final inc. of <u>0</u> Min. |        |
| Point Mins.                 | Press.    | Point Minutes               | Press.      | Point Minutes               | Press.    | Point Minutes               | Press. |
| P 1 <u>0</u>                | <u>38</u> | <u>0</u>                    | <u>38</u>   | <u>0</u>                    | <u>40</u> | NOT AVAILABLE               |        |
| P 2 <u>5</u>                | <u>38</u> | <u>3</u>                    | <u>51</u>   | <u>5</u>                    | <u>40</u> |                             |        |
| P 3 <u>10</u>               | <u>38</u> | <u>6</u>                    | <u>97</u>   | <u>10</u>                   | <u>40</u> |                             |        |
| P 4 <u>15</u>               | <u>38</u> | <u>9</u>                    | <u>211</u>  | <u>15</u>                   | <u>40</u> |                             |        |
| P 5                         |           | <u>12</u>                   | <u>384</u>  | <u>18</u>                   | <u>40</u> |                             |        |
| P 6                         |           | <u>15</u>                   | <u>540</u>  |                             |           |                             |        |
| P 7                         |           | <u>18</u>                   | <u>669</u>  |                             |           |                             |        |
| P 8                         |           | <u>21</u>                   | <u>768</u>  |                             |           |                             |        |
| P 9                         |           | <u>24</u>                   | <u>844</u>  |                             |           |                             |        |
| P10                         |           | <u>27</u>                   | <u>906</u>  |                             |           |                             |        |
| P11                         |           | <u>30</u>                   | <u>954</u>  |                             |           |                             |        |
| P12                         |           | <u>33</u>                   | <u>994</u>  |                             |           |                             |        |
| P13                         |           | <u>36</u>                   | <u>1026</u> |                             |           |                             |        |
| P14                         |           | <u>39</u>                   | <u>1053</u> |                             |           |                             |        |
| P15                         |           | <u>42</u>                   | <u>1075</u> |                             |           |                             |        |
| P16                         |           | <u>45</u>                   | <u>1095</u> |                             |           |                             |        |
| P17                         |           | <u>48</u>                   | <u>1112</u> |                             |           |                             |        |
| P18                         |           | <u>51</u>                   | <u>1127</u> |                             |           |                             |        |
| P19                         |           | <u>54</u>                   | <u>1140</u> |                             |           |                             |        |
| P20                         |           | <u>57</u>                   | <u>1150</u> |                             |           |                             |        |
|                             |           | <u>60</u>                   | <u>1154</u> |                             |           |                             |        |

THI# 23544

I

USIDE





Home Office: Wichita, Kansas 67201  
P. O. Box 1599 (316) 838-0601

Company Cameron C. Funk & Co. Lease & Well No. Caldwell #1  
Elevation 3413 Kelly Bushing Formation Morrow Sand Effective Pay \_\_\_\_\_ Ft. Ticker No. 23545  
Date 2-13-76 Sec. 34 Twp. 20S Range 30W County Wichita State KS  
Test Approved by \_\_\_\_\_ Western Representative Marvin Printz

Formation Test No. #2 O.K. ☒ Misrun ☐ Interval Tested From 4766' to 4800' Total Depth 4800'  
Size Main Hole 7 7/8 Rat Hole ☐ Conv. ☐ B.T. ☒ Damaged ☐ Yes ☒ No Conv. ☒ B.T. ☐ Damaged ☐ Yes ☒ No  
Top Packer Depth 4761 Ft. Size 6 3/4 Bottom Packer Depth 4766 Ft. Size 6 3/4  
Straddle ☐ Conv. ☐ B.T. ☐ Damaged ☐ Yes ☐ No Packer Depth \_\_\_\_\_ Ft. Size \_\_\_\_\_  
Tool Size 5 1/2 OD Tool Joint Size 4 1/2 FH Anchor Length 34 Ft. Size 5 1/2 OD Surface Choke Size 3/4 In. Bottom Choke Size 3/4 In.

RECORDERS Depth 4795 Ft. Clock No. 10412 Depth 4798 Ft. Clock No. 6893  
Top Make Kuster Cap. 4200 No. 3354 <sup>Inside</sup> ~~Outside~~ Bottom Make Kuster Cap. 4150 No. 2604 <sup>Inside</sup> ~~Outside~~  
Below Straddle: Depth \_\_\_\_\_ Rec. No. \_\_\_\_\_ Clock No. \_\_\_\_\_ <sup>Inside</sup> ~~Outside~~ Depth \_\_\_\_\_ Ft. Rec. No. \_\_\_\_\_ Clock No. \_\_\_\_\_ <sup>Inside</sup> ~~Outside~~

Time Set Packer 7:07P. M  
Tool Open I.F.P. From 7:10P M. to 7:25P M. - Hr. 15 Min. From (B) 101 P.S.I. To (C) 167 P.S.I.  
Tool Closed I.C.I.P. From 7:25P M. to 8:25P M. 1 Hr. - Min (D) 678 P.S.I.  
Tool Open F.F.P. From 8:25P M. to 9:25P M. 1 Hr. - Min. From (E) 274 P.S.I. To (F) 435 P.S.I.  
Tool Closed F.C.I.P. From 9:25P M. to 10:55P M. 1 Hr. 30 Min. (G) 673 P.S.I.  
Initial Hydrostatic Pressure (A) 2354 P.S.I. Final Hydrostatic Pressure (H) 2309 P.S.I. Maximum Temp. \_\_\_\_\_

#### INFORMATION

BLOW Strong blow throughout test

Did Well Flow ☐ Yes ☒ No Recovery Total Ft. 90' gas free oil (34 degree gravity corrected) 300' slightly mud cut gassy oil, 420' gassy mud cut oil, (10% mud, 3% water, 87% oil) 180' gas free oil (2% mud, 2% water, 96% oil) 240' heavy oil & gas cut mud.

Reversed Out ☐ Yes ☒ No Mud Type Starch Viscosity 44 Weight 9.4 Water Loss 8.0 cc. Chlorides \_\_\_\_\_

EXTRA EQUIPMENT: Type Circ. Sub. Pin Safety Joint Yes Jars: Size 4 1/2 In. Make WTC Ser. No. 408

Dual Packer Yes Did Packers Hold? Yes Did Tool Plug? No Where? \_\_\_\_\_

DRILLING CONTRACTOR Sage Drilling Co. Length Drill Pipe? 3816 Ft. I.D. Drill Pipe 3.8 In. Tool Joint Size 4 1/2 FH In.

Length Weight Pipe 713 Ft. I.D. Weight Pipe 2.7 In. Tool Joint Size 4 1/2 XH In. Length Drill Collars 210 Ft. I.D. Drill Collars 2.5 In.

Tool Joint Size 4" H90 Length D.S.T. Tool 61 Ft.

Remarks:

Read outside recorder

# WESTERN TESTING CO., INC.

## Pressure Data

Date 2-13-76 Test Ticket No. 23545  
 Recorder No. 2604 Capacity 4150 Location 4798 Ft.  
 Clock No. 6893 Elevation 3413 Kelly Bushing Well Temperature - °F

| Point                          | Pressure    |                            | Time Given | Time Computed |
|--------------------------------|-------------|----------------------------|------------|---------------|
| A Initial Hydrostatic Mud      | 2354 P.S.I. | Open Tool                  | 7:07 P.    | M             |
| B First Initial Flow Pressure  | 101 P.S.I.  | First Flow Pressure        | 15 Mins.   | 15 Mins.      |
| C First Final Flow Pressure    | 167 P.S.I.  | Initial Closed-in Pressure | 60 Mins.   | 60 Mins.      |
| D Initial Closed-in Pressure   | 678 P.S.I.  | Second Flow Pressure       | 60 Mins.   | 62 Mins.      |
| E Second Initial Flow Pressure | 274 P.S.I.  | Final Closed-in Pressure   | 90 Mins.   | 90 Mins.      |
| F Second Final Flow Pressure   | 435 P.S.I.  |                            |            |               |
| G Final Closed-in Pressure     | 673 P.S.I.  |                            |            |               |
| H Final Hydrostatic Mud        | 2309 P.S.I. |                            |            |               |

### PRESSURE BREAKDOWN

| First Flow Pressure         |            | Initial Shut-In             |            | Second Flow Pressure        |            | Final Shut-In               |            |
|-----------------------------|------------|-----------------------------|------------|-----------------------------|------------|-----------------------------|------------|
| Breakdown: <u>3</u> Inc.    |            | Breakdown: <u>20</u> Inc.   |            | Breakdown: <u>12</u> Inc.   |            | Breakdown: <u>30</u> Inc.   |            |
| of <u>5</u> mins. and a     |            | of <u>3</u> mins. and a     |            | of <u>5</u> mins. and a     |            | of <u>3</u> mins. and a     |            |
| final inc. of <u>0</u> Min. |            | final inc. of <u>0</u> Min. |            | final inc. of <u>0</u> Min. |            | final inc. of <u>0</u> Min. |            |
| Point Mins.                 | Press.     | Point Minutes               | Press.     | Point Minutes               | Press.     | Point Minutes               | Press.     |
| P 1 <u>0</u>                | <u>101</u> | <u>0</u>                    | <u>167</u> | <u>0</u>                    | <u>274</u> | <u>0</u>                    | <u>435</u> |
| P 2 <u>5</u>                | <u>112</u> | <u>3</u>                    | <u>454</u> | <u>5</u>                    | <u>276</u> | <u>3</u>                    | <u>565</u> |
| P 3 <u>10</u>               | <u>130</u> | <u>6</u>                    | <u>553</u> | <u>10</u>                   | <u>287</u> | <u>6</u>                    | <u>602</u> |
| P 4 <u>15</u>               | <u>167</u> | <u>9</u>                    | <u>605</u> | <u>15</u>                   | <u>300</u> | <u>9</u>                    | <u>620</u> |
| P 5                         |            | <u>12</u>                   | <u>631</u> | <u>20</u>                   | <u>323</u> | <u>12</u>                   | <u>633</u> |
| P 6                         |            | <u>15</u>                   | <u>645</u> | <u>25</u>                   | <u>345</u> | <u>15</u>                   | <u>642</u> |
| P 7                         |            | <u>18</u>                   | <u>653</u> | <u>30</u>                   | <u>365</u> | <u>18</u>                   | <u>648</u> |
| P 8                         |            | <u>21</u>                   | <u>659</u> | <u>35</u>                   | <u>378</u> | <u>21</u>                   | <u>652</u> |
| P 9                         |            | <u>24</u>                   | <u>664</u> | <u>40</u>                   | <u>394</u> | <u>24</u>                   | <u>655</u> |
| P10                         |            | <u>27</u>                   | <u>666</u> | <u>45</u>                   | <u>403</u> | <u>27</u>                   | <u>658</u> |
| P11                         |            | <u>30</u>                   | <u>671</u> | <u>50</u>                   | <u>412</u> | <u>30</u>                   | <u>659</u> |
| P12                         |            | <u>33</u>                   | <u>672</u> | <u>55</u>                   | <u>420</u> | <u>33</u>                   | <u>661</u> |
| P13                         |            | <u>36</u>                   | <u>673</u> | <u>60</u>                   | <u>430</u> | <u>36</u>                   | <u>662</u> |
| P14                         |            | <u>39</u>                   | <u>674</u> | <u>62</u>                   | <u>435</u> | <u>39</u>                   | <u>665</u> |
| P15                         |            | <u>42</u>                   | <u>677</u> |                             |            | <u>42</u>                   | <u>665</u> |
| P16                         |            | <u>45</u>                   | <u>677</u> |                             |            | <u>45</u>                   | <u>666</u> |
| P17                         |            | <u>48</u>                   | <u>678</u> |                             |            | <u>48</u>                   | <u>667</u> |
| P18                         |            | <u>51</u>                   | <u>678</u> |                             |            | <u>51</u>                   | <u>668</u> |
| P19                         |            | <u>54</u>                   | <u>678</u> |                             |            | <u>54</u>                   | <u>669</u> |
| P20                         |            | <u>57</u>                   | <u>678</u> |                             |            | <u>57</u>                   | <u>669</u> |
|                             |            | <u>60</u>                   | <u>678</u> |                             |            | <u>60</u>                   | <u>669</u> |
|                             |            |                             |            |                             |            | <u>63</u>                   | <u>671</u> |
|                             |            |                             |            |                             |            | <u>66</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>69</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>72</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>75</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>78</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>81</u>                   | <u>672</u> |
|                             |            |                             |            |                             |            | <u>84</u>                   | <u>673</u> |
|                             |            |                             |            |                             |            | <u>87</u>                   | <u>673</u> |
|                             |            |                             |            |                             |            | <u>90</u>                   | <u>673</u> |

TAT# 23545

⑤

①

④

⑥

⑦

⑧

⑨

②

③