

Company Imperial Oil Company Lease & Well No. Lemon #2-7
 Elevation 2070 Kelly Bushing Formation Kansas City Effective Pay - Ft. Ticket No. 13025
 Date 9/ 15/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
 Test Approved by Peter J. Stubbs Western Representative Rod Tritt
 Formation Test No. 1 Interval Tested from 4137 ft. to 4160 ft. Total Depth 4160 ft.
 Packer Depth 4132 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
 Packer Depth 4137 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
 Depth of Selective Zone Set -
 Top Recorder Depth (Inside) 4141 ft. Recorder Number 2606 Cap. 4150
 Bottom Recorder Depth (Outside) 4144 ft. Recorder Number 4332 Cap. 4200
 Below Straddle Recorder Depth -- ft. Recorder Number - Cap. -
 Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.
 Mud Type drispac Viscosity 44 Weight Pipe Length 1260 I. D. 3 1/2 in.
 Weight 9.3 Water Loss 12.0 cc. Drill Pipe Length 2850 I. D. 3.8 in.
 Chlorides 17,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 OD in.
 Jars: Make WTC Serial Number 409 Anchor Length 23 ft. Size 5 1/2 OD in.
 Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.
 Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 FH in.

Blow: Strong blow throughout test. GAS to surface in twenty minutes into final flow period. See attached sheet for gas measurements.

Recovered 120 ft. of heavy oil and gas cut mud
 Recovered 60 ft. of muddy oil
 Recovered 110 ft. of oil 32° corrected
 Recovered 10 ft. of water Chlorides 63,000 ppm
 Recovered ft. of

Remarks:

Time Set Packer(s) 5:35 ~~P.M.~~ ^{A.M.} Time Started Off Bottom 9:35 ~~P.M.~~ ^{A.M.} Maximum Temperature 123°
 Initial Hydrostatic Pressure 2052 P.S.I. (A)
 Initial Flow Period 60 Minutes (B) 25 P.S.I. to (C) 52 P.S.I.
 Initial Closed In Period 60 Minutes (D) 1039 P.S.I.
 Final Flow Period 60 Minutes (E) 113 P.S.I. to (F) 123 P.S.I.
 Final Closed In Period 63 Minutes (G) 940 P.S.I.
 Final Hydrostatic Pressure 2031 P.S.I. (H)

GAS FLOW REPORT

Date 9/15/81 Ticket 13025 Company Imperial Oil Company
 Well Name and No. Lemon #2-7 Dst No. 1 Interval Tested 4137'-4160'
 County Pratt State Kansas Sec. 7 Twp. 27S Rg. 15W

Time Gauge Pre-Flow	Time Gauge in Min.	P.S.I. on Merla Orifice Well Tester	P.S.I. on Pitot Tester	P.S.I. on Side Static Tester	P.S.I. on U-Tube Tester	Description of Flow
PRE FLOW						

7:35 AM

SECOND FLOW

20 min			1/4" orifice	Gas to surface
30 min.	5" of water		1/4" orifice	3,710 CFPD
40 min.	6" of water		1/4" orifice	4,100 CFPD
50 min.	6" of water		1/4" orifice	4,100 CFPD
60 min.	6" of water		1/4" orifice	4,100 CFPD

GAS BOTTLE

Serial No. ---- Date Bottle Filled --- Date to be Invoiced 9/15/81

Requisition and Provisions for high pressure stainless steel gas bottles. Western Testing Co., Inc. shall not be liable for damage of any kind to property or personnel of the one whom gas bottle is filled or for any loss suffered or sustained directly or indirectly through the use of these bottles. By signing of this ticket showing receipt of a gas testing bottle, the undersigned agrees for himself and as agent for operator, to return this bottle to Western Testing Co., Inc. within thirty (30) days free of charge, or be invoiced in the amount of \$75.00 (total charge). Should valve or seal plug be missing or damaged beyond repair, operator shall be invoiced for repairs at our invoiced price.

All charges subject to 1% per month, equal to 12% interest per annum after 30 days from date of invoice. Any expense incurred for collection will be added to the original amount.

COMPANY'S NAME Imperial Oil Company

Authorized by Peter J. Stubbs

WESTERN TESTING CO., INC.

Pressure Data

Date 9/15/81 Recorder No. 2606 Capacity 4150 Test Ticket No. 13025
 Location 4141 Ft. Clock No. - Elevation 2070 Kelly Bushing Well Temperature 123 °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	<u>2052</u> P.S.I.	Open Tool	<u>5:35A</u> M	
B First Initial Flow Pressure	<u>25</u> P.S.I.	First Flow Pressure	<u>60</u> Mins.	<u>60</u> Mins.
C First Final Flow Pressure	<u>52</u> P.S.I.	Initial Closed-in Pressure	<u>60</u> Mins.	<u>60</u> Mins.
D Initial Closed-in Pressure	<u>1039</u> P.S.I.	Second Flow Pressure	<u>60</u> Mins.	<u>60</u> Mins.
E Second Initial Flow Pressure	<u>113</u> P.S.I.	Final Closed-in Pressure	<u>60</u> Mins.	<u>63</u> Mins.
F Second Final Flow Pressure	<u>123</u> P.S.I.			
G Final Closed-in Pressure	<u>940</u> P.S.I.			
H Final Hydrostatic Mud	<u>2031</u> P.S.I.			

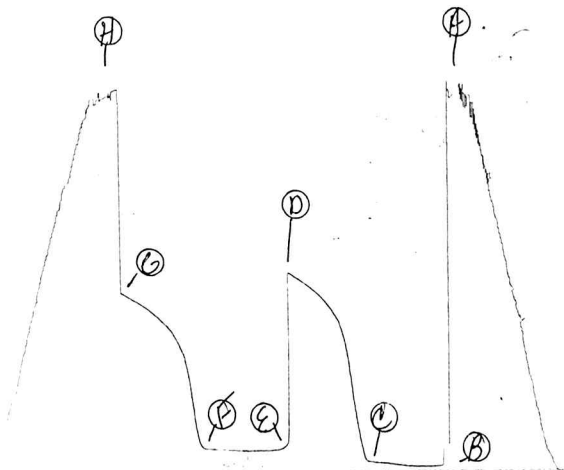
PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>12</u> Inc.		Breakdown: <u>20</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>21</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>25</u>	<u>0</u>	<u>52</u>	<u>0</u>	<u>113</u>	<u>0</u>	<u>123</u>
P 2 <u>5</u>	<u>25</u>	<u>3</u>	<u>110</u>	<u>5</u>	<u>113</u>	<u>3</u>	<u>150</u>
P 3 <u>10</u>	<u>25</u>	<u>6</u>	<u>204</u>	<u>10</u>	<u>113</u>	<u>6</u>	<u>227</u>
P 4 <u>15</u>	<u>25</u>	<u>9</u>	<u>320</u>	<u>15</u>	<u>113</u>	<u>9</u>	<u>345</u>
P 5 <u>20</u>	<u>25</u>	<u>12</u>	<u>467</u>	<u>20</u>	<u>113</u>	<u>12</u>	<u>475</u>
P 6 <u>25</u>	<u>25</u>	<u>15</u>	<u>597</u>	<u>25</u>	<u>113</u>	<u>15</u>	<u>562</u>
P 7 <u>30</u>	<u>27</u>	<u>18</u>	<u>693</u>	<u>30</u>	<u>113</u>	<u>18</u>	<u>626</u>
P 8 <u>35</u>	<u>31</u>	<u>21</u>	<u>750</u>	<u>35</u>	<u>114</u>	<u>21</u>	<u>672</u>
P 9 <u>40</u>	<u>36</u>	<u>24</u>	<u>798</u>	<u>40</u>	<u>115</u>	<u>24</u>	<u>709</u>
P10 <u>45</u>	<u>43</u>	<u>27</u>	<u>829</u>	<u>45</u>	<u>116</u>	<u>27</u>	<u>740</u>
P11 <u>50</u>	<u>46</u>	<u>30</u>	<u>861</u>	<u>50</u>	<u>118</u>	<u>30</u>	<u>765</u>
P12 <u>55</u>	<u>48</u>	<u>33</u>	<u>884</u>	<u>55</u>	<u>120</u>	<u>33</u>	<u>784</u>
P13 <u>60</u>	<u>52</u>	<u>36</u>	<u>911</u>	<u>60</u>	<u>123</u>	<u>36</u>	<u>807</u>
P14		<u>39</u>	<u>931</u>			<u>39</u>	<u>823</u>
P15		<u>42</u>	<u>948</u>			<u>42</u>	<u>842</u>
P16		<u>45</u>	<u>967</u>			<u>45</u>	<u>858</u>
P17		<u>48</u>	<u>982</u>			<u>48</u>	<u>873</u>
P18		<u>51</u>	<u>998</u>			<u>51</u>	<u>886</u>
P19		<u>54</u>	<u>1010</u>			<u>54</u>	<u>898</u>
P20		<u>57</u>	<u>1025</u>			<u>57</u>	<u>911</u>
		<u>60</u>	<u>1039</u>			<u>60</u>	<u>923</u>
						<u>63</u>	<u>940</u>

2606 DST#1

TKT #13025

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Company Imperial Oil Company Lease & Well No. Lemon #2-7
Elevation 2070 Kelly Bushing Formation Kansas City Effective Pay - Ft. Ticket No. 11026
Date 9/ 16/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
Test Approved by Peter J. Stubbs Western Representative Rod Tritt
Formation Test No. 2 Interval Tested from 4160 ft. to 4215 ft. Total Depth 4215 ft.
Packer Depth 4155 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
Packer Depth 4160 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
Depth of Selective Zone Set -
Top Recorder Depth (Inside) 4164 ft. Recorder Number 2606 Cap. 4150
Bottom Recorder Depth (Outside) 4167 ft. Recorder Number 4332 Cap. 4200
Below Straddle Recorder Depth -- ft. Recorder Number - Cap. -
Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.
Mud Type drispac Viscosity 40 Weight Pipe Length 1260 I. D. 2 1/2 in.
Weight 9.3 Water Loss 9.6 cc. Drill Pipe Length 2903 I. D. 3.8 in.
Chlorides 20,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 OD in.
Jars: Make WTC Serial Number 409 Anchor Length 55 ft. Size 5 1/2 OD in.
Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.
Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 FH in.

Strong blow on initial flow period. Weak blow on final flow period. No gas to surface.
Blow: _____

Recovered 2600 ft. of gas in pipe
Recovered 120 ft. of very heavy oil and gas cut mud
Recovered 80 ft. of water cut oily mud
Recovered 120 ft. of muddy oil cut water Chlorides 68,000 ppm
Recovered _____ ft. of _____
Remarks: _____

Time Set Packer(s) 3:50 A.M. Time Started Off Bottom 8:50 A.M. Maximum Temperature 126°
Initial Hydrostatic Pressure _____ (A) 2083 P.S.I.
Initial Flow Period _____ Minutes 55 (B) 58 P.S.I. to (C) 80 P.S.I.
Initial Closed In Period _____ Minutes 87 (D) 1358 P.S.I.
Final Flow Period _____ Minutes 60 (E) 127 P.S.I. to (F) 148 P.S.I.
Final Closed In Period _____ Minutes 99 (G) 1321 P.S.I.
Final Hydrostatic Pressure _____ (H) 1978 P.S.I.

WESTERN TESTING CO., INC.

Pressure Data

Date 9/16/81 Test Ticket No. 11026
Recorder No. 2606 Capacity 4150 Location 4164 Ft.
Clock No. - Elevation 2070 Kelly Bushing Well Temperature 126 °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2083 P.S.I.	Open Tool	3:50A	M
B First Initial Flow Pressure	58 P.S.I.	First Flow Pressure	60 Mins.	55 Mins.
C First Final Flow Pressure	80 P.S.I.	Initial Closed-in Pressure	90 Mins.	87 Mins.
D Initial Closed-in Pressure	1358 P.S.I.	Second Flow Pressure	60 Mins.	60 Mins.
E Second Initial Flow Pressure	127 P.S.I.	Final Closed-in Pressure	90 Mins.	99 Mins.
F Second Final Flow Pressure	148 P.S.I.			
G Final Closed-in Pressure	1321 P.S.I.			
H Final Hydrostatic Mud	1978 P.S.I.			

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>29</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>33</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>58</u>	<u>0</u>	<u>80</u>	<u>0</u>	<u>127</u>	<u>0</u>	<u>148</u>
P 2 <u>5</u>	<u>58</u>	<u>3</u>	<u>381</u>	<u>5</u>	<u>127</u>	<u>3</u>	<u>312</u>
P 3 <u>10</u>	<u>58</u>	<u>6</u>	<u>750</u>	<u>10</u>	<u>127</u>	<u>6</u>	<u>568</u>
P 4 <u>15</u>	<u>58</u>	<u>9</u>	<u>915</u>	<u>15</u>	<u>127</u>	<u>9</u>	<u>780</u>
P 5 <u>20</u>	<u>58</u>	<u>12</u>	<u>990</u>	<u>20</u>	<u>127</u>	<u>12</u>	<u>888</u>
P 6 <u>25</u>	<u>59</u>	<u>15</u>	<u>1052</u>	<u>25</u>	<u>127</u>	<u>15</u>	<u>967</u>
P 7 <u>30</u>	<u>62</u>	<u>18</u>	<u>1095</u>	<u>30</u>	<u>128</u>	<u>18</u>	<u>1019</u>
P 8 <u>35</u>	<u>66</u>	<u>21</u>	<u>1128</u>	<u>35</u>	<u>131</u>	<u>21</u>	<u>1056</u>
P 9 <u>40</u>	<u>70</u>	<u>24</u>	<u>1161</u>	<u>40</u>	<u>135</u>	<u>24</u>	<u>1087</u>
P10 <u>45</u>	<u>73</u>	<u>27</u>	<u>1184</u>	<u>45</u>	<u>136</u>	<u>27</u>	<u>1116</u>
P11 <u>50</u>	<u>77</u>	<u>30</u>	<u>1207</u>	<u>50</u>	<u>141</u>	<u>30</u>	<u>1141</u>
P12 <u>55</u>	<u>80</u>	<u>33</u>	<u>1224</u>	<u>55</u>	<u>145</u>	<u>33</u>	<u>1161</u>
P13		<u>36</u>	<u>1238</u>	<u>60</u>	<u>148</u>	<u>36</u>	<u>1180</u>
P14		<u>39</u>	<u>1253</u>			<u>39</u>	<u>1195</u>
P15		<u>42</u>	<u>1265</u>			<u>42</u>	<u>1207</u>
P16		<u>45</u>	<u>1275</u>			<u>45</u>	<u>1217</u>
P17		<u>48</u>	<u>1286</u>			<u>48</u>	<u>1230</u>
P18		<u>51</u>	<u>1295</u>			<u>51</u>	<u>1240</u>
P19		<u>54</u>	<u>1303</u>			<u>54</u>	<u>1249</u>
P20		<u>57</u>	<u>1311</u>			<u>57</u>	<u>1257</u>
		<u>60</u>	<u>1317</u>			<u>60</u>	<u>1264</u>

WESTERN TESTING CO., INC.

Pressure Data

Date 9/16/81

Test Ticket No. 11026

Recorder No. 2606 Capacity 4150 Location 4164 Ft.

Clock No. - Elevation 2070 Kelly Bushing Well Temperature 126 °F

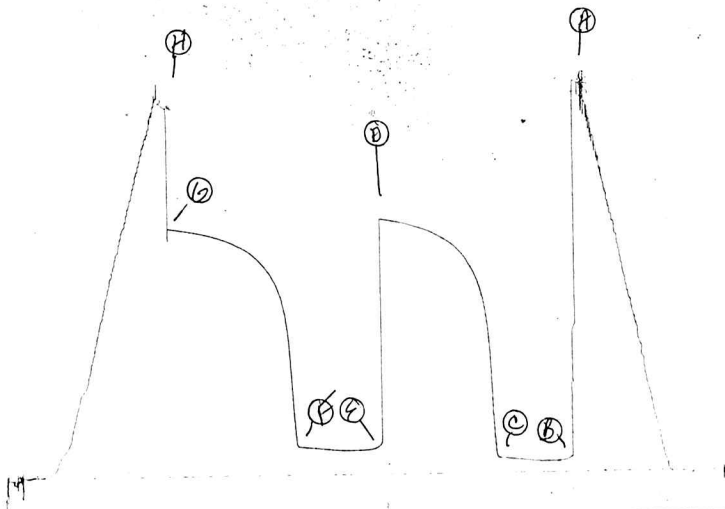
Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	<u>2083</u> P.S.I.	Open Tool	<u>3:50A</u> M	
B First Initial Flow Pressure	<u>58</u> P.S.I.	First Flow Pressure	<u>60</u> Mins	<u>55</u> Mins.
C First Final Flow Pressure	<u>80</u> P.S.I.	Initial Closed-in Pressure	<u>90</u> Mins	<u>87</u> Mins.
D Initial Closed-in Pressure	<u>1358</u> P.S.I.	Second Flow Pressure	<u>60</u> Mins	<u>60</u> Mins.
E Second Initial Flow Pressure	<u>127</u> P.S.I.	Final Closed-in Pressure	<u>90</u> Mins	<u>99</u> Mins.
F Second Final Flow Pressure	<u>148</u> P.S.I.			
G Final Closed-in Pressure	<u>1321</u> P.S.I.			
H Final Hydrostatic Mud	<u>1978</u> P.S.I.			

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>29</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>33</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>63</u>	<u>1322</u>			<u>63</u>	<u>1271</u>
P 2		<u>66</u>	<u>1329</u>			<u>66</u>	<u>1277</u>
P 3		<u>69</u>	<u>1336</u>			<u>69</u>	<u>1283</u>
P 4		<u>72</u>	<u>1340</u>			<u>72</u>	<u>1289</u>
P 5		<u>75</u>	<u>1345</u>			<u>75</u>	<u>1293</u>
P 6		<u>78</u>	<u>1348</u>			<u>78</u>	<u>1298</u>
P 7		<u>81</u>	<u>1352</u>			<u>81</u>	<u>1301</u>
P 8		<u>84</u>	<u>1356</u>			<u>84</u>	<u>1306</u>
P 9		<u>87</u>	<u>1358</u>			<u>87</u>	<u>1309</u>
P10						<u>90</u>	<u>1312</u>
P11						<u>93</u>	<u>1316</u>
P12						<u>96</u>	<u>1319</u>
P13						<u>99</u>	<u>1321</u>
P14							
P15							
P16							
P17							
P18							
P19							
P20							

2606 DST #2

TKT # 11026
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Company Imperial Oil Company Lease & Well No. Lemon #2-7
Elevation 2070 Kelly Bushing Formation Kansas City Effective Pay - Ft. Ticket No. 11027
Date 9/16/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
Test Approved by Peter J. Stubbs Western Representative Rod Tritt

Formation Test No. 3 Interval Tested from 4215 ft. to 4244 ft. Total Depth 4244 ft.

Packer Depth 4210 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Packer Depth 4215 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Depth of Selective Zone Set -

Top Recorder Depth (Inside) 4219 ft. Recorder Number 2606 Cap. 4150

Bottom Recorder Depth (Outside) 4222 ft. Recorder Number 4332 Cap. 4200

Below Straddle Recorder Depth - ft. Recorder Number - Cap. -

Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.

Mud Type drispac Viscosity 40 Weight Pipe Length 1260 I. D. 2 1/2 in.

Weight 9.2 Water Loss 9.6 cc. Drill Pipe Length 2924 I. D. 3.8 in.

Chlorides 20,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 OD in.

Jars: Make WTC Serial Number 409 Anchor Length 29 ft. Size 5 1/2 OD in.

Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.

Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 FH in.

Blow: Strong blow throughout test. Gas to surface at start of final flow period. See attached sheet for gas measurements.

Recovered 300 ft. of gassy heavy oil

Recovered 120 ft. of muddy gassy oil

Recovered ft. of

Recovered ft. of

Recovered ft. of

Remarks:

Time Set Packer(s) 10:20 ~~A.M.~~ P.M. Time Started Off Bottom 3:20 ~~A.M.~~ P.M. Maximum Temperature 126°

Initial Hydrostatic Pressure 2125 (A) P.S.I.

Initial Flow Period 55 Minutes (B) 81 P.S.I. to (C) 114 P.S.I.

Initial Closed In Period 87 Minutes (D) 759 P.S.I.

Final Flow Period 60 Minutes (E) 173 P.S.I. to (F) 189 P.S.I.

Final Closed In Period 90 Minutes (G) 638 P.S.I.

Final Hydrostatic Pressure 2105 (H) P.S.I.

GAS FLOW REPORT

Date 9/16/81 Ticket 11027 Company Imperial Oil Company
 Well Name and No. Lemon #2-7 Dst No. 3 Interval Tested 4215'-4244'
 County Pratt State Kansas Sec. 7 Twp. 27S Rg. 15W

Time Gauge Pre-Flow	Time Gauge in Min.	P.S.I. on Merla Orifice Well Tester	P.S.I. on Pitot Tester	P.S.I. on Side Static Tester	P.S.I. on U-Tube Tester	Description of Flow
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PRE FLOW

SECOND FLOW

Gas to surface

10 min.	7" of water	1/4" orifice	4,450 CFPD
20 min.	5" of water	1/4" orifice	3,710 CFPD
30 min.	4" of water	1/4" orifice	3,710 CFPD
40 min.	4" of water	1/4" orifice	3,710 CFPD
50 min.	4" of water	1/4" orifice	3,710 CFPD
60 min.	4" of water	1/4" orifice	3,710 CFPD

GAS BOTTLE

Serial No. ---- Date Bottle Filled ---- Date to be Invoiced 9/16/81

Requisition and Provisions for high pressure stainless steel gas bottles. Western Testing Co., Inc. shall not be liable for damage of any kind to property or personnel of the one whom gas bottle is filled or for any loss suffered or sustained directly or indirectly through the use of these bottles. By signing of this ticket showing receipt of a gas testing bottle, the undersigned agrees for himself and as agent for operator, to return this bottle to Western Testing Co., Inc. within thirty (30) days free of charge, or be invoiced in the amount of \$75.00 (total charge). Should valve or seal plug be missing or damaged beyond repair, operator shall be invoiced for repairs at our invoiced price.

All charges subject to 1% per month, equal to 12% interest per annum after 30 days from date of invoice. Any expense incurred for collection will be added to the original amount.

COMPANY'S NAME Imperial Oil Company

Authorized by Peter J. Stubbs

WESTERN TESTING CO., INC.

Pressure Data

Date 9/16/81 Recorder No. 2606 Capacity 4150 Test Ticket No. 11027
 Clock No. - Elevation 2070 Kelly Bushing Location 4219 Ft. 126 F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2125	P.S.I.	10:20P	M
B First Initial Flow Pressure	81	P.S.I.	60	Mins. 55
C First Final Flow Pressure	114	P.S.I.	90	Mins. 87
D Initial Closed-in Pressure	759	P.S.I.	60	Mins. 60
E Second Initial Flow Pressure	173	P.S.I.	90	Mins. 90
F Second Final Flow Pressure	189	P.S.I.		
G Final Closed-in Pressure	638	P.S.I.		
H Final Hydrostatic Mud	2105	P.S.I.		

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>29</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 0	81	0	114	0	173	0	189
P 2 5	81	3	156	5	173	3	218
P 3 10	81	6	245	10	173	6	281
P 4 15	81	9	329	15	173	9	333
P 5 20	81	12	412	20	173	12	381
P 6 25	86	15	467	25	173	15	416
P 7 30	89	18	506	30	174	18	446
P 8 35	95	21	539	35	176	21	467
P 9 40	102	24	562	40	178	24	483
P10 45	106	27	583	45	180	27	500
P11 50	111	30	599	50	183	30	512
P12 55	114	33	616	55	186	33	525
P13		36	628	60	189	36	535
P14		39	643			39	546
P15		42	655			42	554
P16		45	665			45	562
P17		48	674			48	568
P18		51	684			51	575
P19		54	693			54	583
P20		57	701			57	589
		60	709			60	593

WESTERN TESTING CO., INC.

Pressure Data

Date 9/16/81 Recorder No. 2606 Capacity 4150 Test Ticket No. 11027
 Location 2070 Kelly Bushing Well Temperature 126 F.
 Clock No. - Elevation -

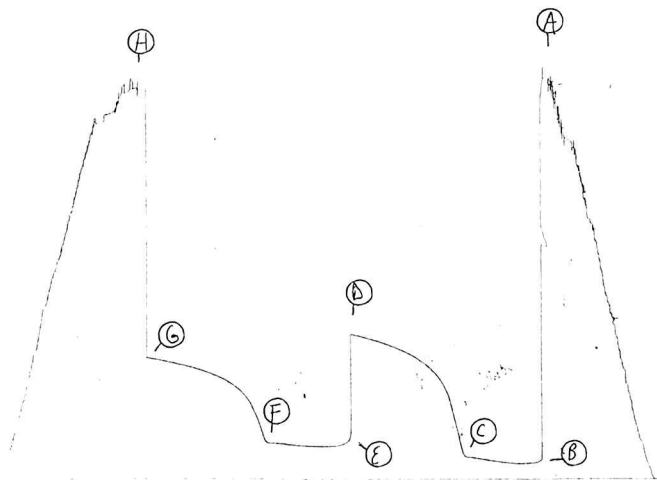
Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2125	P.S.I.	10:20P	M
B First Initial Flow Pressure	81	P.S.I.	60	55 Mins.
C First Final Flow Pressure	114	P.S.I.	90	87 Mins.
D Initial Closed-in Pressure	759	P.S.I.	60	60 Mins.
E Second Initial Flow Pressure	173	P.S.I.	90	90 Mins.
F Second Final Flow Pressure	189	P.S.I.		
G Final Closed-in Pressure	638	P.S.I.		
H Final Hydrostatic Mud	2105	P.S.I.		

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>29</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		63	715			63	599
P 2		66	724			66	604
P 3		69	729			69	609
P 4		72	734			72	614
P 5		75	740			75	617
P 6		78	746			78	626
P 7		81	753			81	627
P 8		84	756			84	631
P 9		87	759			87	636
P10						90	638
P11							
P12							
P13							
P14							
P15							
P16							
P17							
P18							
P19							
P20							

2600 USF #3

TKT # 11027
I



Company Imperial Oil Company Lease & Well No. Lemon #2-7
Elevation 2070 Kelly Bushing Formation B-Kansas City-Marmaton Effective Pay - Ft. Ticket No. 11028
Date 9/ 18/81 Sec. 7 Twp 27S Range 15W County Pratt State Kansas
Test Approved by Peter J. Stubbs Western Representative Rod Tritt

Formation Test No. 4 Interval Tested from 4249 ft. to 4410 ft. Total Depth 4410 ft.

Packer Depth 4245 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Packer Depth 4249 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Depth of Selective Zone Set -

Top Recorder Depth (Inside) 4253 ft. Recorder Number 2606 Cap 4150

Bottom Recorder Depth (Outside) 4256 ft. Recorder Number 4332 Cap 4200

Below Straddle Recorder Depth - ft. Recorder Number - Cap -

Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.

Mud Type drispac Viscosity 45 Weight Pipe Length 1260 I. D. 2 1/2 in.

Weight 9.3 Water Loss 14.4 cc. Drill Pipe Length 3090 I. D. 3.8 in.

Chlorides 16,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 OD in.

Jars: Make WIC Serial Number 409 Anchor Length 126 + 35 ft. Size 5 1/2 OD + 4 1/2 OD in.

Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.

Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 FH in.

Blow: Weak blow decreasing to no blow in twenty minutes on initial flow period. Very weak blow for fifteen minutes ; died on final flow period.

60 slightly oil cut mud
Recovered 60 ft. of

Recovered ft. of

Recovered ft. of

Recovered ft. of

Recovered ft. of

Remarks:

Time Set Packer(s) 11:25 A.M. Time Started Off Bottom 2:25 A.M. Maximum Temperature 128°

Initial Hydrostatic Pressure 2188 P.S.I. (A)

Initial Flow Period 30 Minutes (B) 39 P.S.I. to (C) 39 P.S.I.

Initial Closed In Period 54 Minutes (D) 717 P.S.I.

Final Flow Period 30 Minutes (E) 60 P.S.I. to (F) 60 P.S.I.

Final Closed In Period 60 Minutes (G) 318 P.S.I.

Final Hydrostatic Pressure 2083 P.S.I. (H)

WESTERN TESTING CO., INC.

Pressure Data

Date 9/18/81 Test Ticket No. 11028

Recorder No. 2606 Capacity 4150 Location 4253 Ft.

Clock No. ---- Elevation 2070 Kelly Bushing Well Temperature 128 °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2188	P.S.I.	11:25A	
B First Initial Flow Pressure	39	P.S.I.	30	30
C First Final Flow Pressure	39	P.S.I.	60	54
D Initial Closed-in Pressure	717	P.S.I.	30	30
E Second Initial Flow Pressure	60	P.S.I.	60	60
F Second Final Flow Pressure	60	P.S.I.		
G Final Closed-in Pressure	318	P.S.I.		
H Final Hydrostatic Mud	2083	P.S.I.		

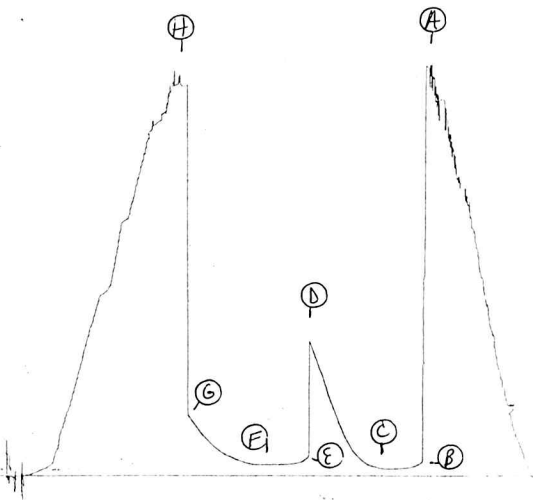
PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>6</u> Inc.		Breakdown: <u>18</u> Inc.		Breakdown: <u>6</u> Inc.		Breakdown: <u>20</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>39</u>	<u>0</u>	<u>39</u>	<u>0</u>	<u>60</u>	<u>0</u>	<u>60</u>
P 2 <u>5</u>	<u>39</u>	<u>3</u>	<u>45</u>	<u>5</u>	<u>60</u>	<u>3</u>	<u>60</u>
P 3 <u>10</u>	<u>39</u>	<u>6</u>	<u>50</u>	<u>10</u>	<u>60</u>	<u>6</u>	<u>60</u>
P 4 <u>15</u>	<u>39</u>	<u>9</u>	<u>58</u>	<u>15</u>	<u>60</u>	<u>9</u>	<u>60</u>
P 5 <u>20</u>	<u>39</u>	<u>12</u>	<u>69</u>	<u>20</u>	<u>60</u>	<u>12</u>	<u>62</u>
P 6 <u>25</u>	<u>39</u>	<u>15</u>	<u>83</u>	<u>25</u>	<u>60</u>	<u>15</u>	<u>67</u>
P 7 <u>30</u>	<u>39</u>	<u>18</u>	<u>106</u>	<u>30</u>	<u>60</u>	<u>18</u>	<u>73</u>
P 8 _____		<u>21</u>	<u>133</u>			<u>21</u>	<u>81</u>
P 9 _____		<u>24</u>	<u>166</u>			<u>24</u>	<u>89</u>
P10 _____		<u>27</u>	<u>208</u>			<u>27</u>	<u>101</u>
P11 _____		<u>30</u>	<u>256</u>			<u>30</u>	<u>106</u>
P12 _____		<u>33</u>	<u>314</u>			<u>33</u>	<u>119</u>
P13 _____		<u>36</u>	<u>368</u>			<u>36</u>	<u>133</u>
P14 _____		<u>39</u>	<u>435</u>			<u>39</u>	<u>150</u>
P15 _____		<u>42</u>	<u>496</u>			<u>42</u>	<u>168</u>
P16 _____		<u>45</u>	<u>562</u>			<u>45</u>	<u>191</u>
P17 _____		<u>48</u>	<u>620</u>			<u>48</u>	<u>214</u>
P18 _____		<u>51</u>	<u>676</u>			<u>51</u>	<u>241</u>
P19 _____		<u>54</u>	<u>717</u>			<u>54</u>	<u>268</u>
P20 _____						<u>57</u>	<u>297</u>
						<u>60</u>	<u>318</u>

2606 DST #4

TKT # 11028

I



Company Imperial Oil Company Lease & Well No. Lemon #2-7
Elevation 2070 Kelly Bushing Formation Cherokee -Mississippi Effective Pay - Ft. Ticket No. 11029
Date 9/19/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
Test Approved by Peter J. Stubbs Western Representative Rod Tritt
Formation Test No. 5 Interval Tested from 4429 ft. to 4516 ft. Total Depth 4516 ft.
Packer Depth 4424 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
Packer Depth 4429 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
Depth of Selective Zone Set -
Top Recorder Depth (Inside) 4433 ft. Recorder Number 2606 Cap. 4150
Bottom Recorder Depth (Outside) 4436 ft. Recorder Number 4332 Cap. 4200
Below Straddle Recorder Depth - ft. Recorder Number - Cap. -
Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.
Mud Type drispac Viscosity 45 Weight Pipe Length 1260 I. D. 2 1/2 in.
Weight 9.5 Water Loss 12.0 cc. Drill Pipe Length 3203 I. D. 3.8 in.
Chlorides 18,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 OD in.
Jars: Make WTC Serial Number 409 Anchor Length 87 ft. Size 5 1/2 OD in.
Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.
Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 FH in.

Blow: Strong blow throughout test.

Recovered 62 ft. of oil specked drilling mud (trace of oil on top of tool)

Recovered ft. of

Recovered ft. of

Recovered ft. of

Recovered ft. of

Remarks:

Time Set Packer(s) 12:20 A.M. Time Started Off Bottom 6:20 P.M. Maximum Temperature ?
Initial Hydrostatic Pressure (A) 2240 P.S.I.
Initial Flow Period Minutes 55 (B) 44 P.S.I. to (C) 44 P.S.I.
Initial Closed In Period Minutes 120 (D) 967 P.S.I.
Final Flow Period Minutes 60 (E) 60 P.S.I. to (F) 60 P.S.I.
Final Closed In Period Minutes 117 (G) 950 P.S.I.
Final Hydrostatic Pressure (H) 2188 P.S.I.

WESTERN TESTING CO., INC.

Pressure Data

Date 9/19/81 Test Ticket No. 11029
Recorder No. 2606 Capacity 4150 Location 4433 Ft.
Clock No. -- Elevation ---- Well Temperature -- °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2240 P.S.I.	Open Tool	12:20P	M
B First Initial Flow Pressure	44 P.S.I.	First Flow Pressure	60 Mins.	55 Mins.
C First Final Flow Pressure	44 P.S.I.	Initial Closed-in Pressure	120 Mins.	120 Mins.
D Initial Closed-in Pressure	967 P.S.I.	Second Flow Pressure	60 Mins.	60 Mins.
E Second Initial Flow Pressure	60 P.S.I.	Final Closed-in Pressure	120 Mins.	117 Mins.
F Second Final Flow Pressure	60 P.S.I.			
G Final Closed-in Pressure	950 P.S.I.			
H Final Hydrostatic Mud	2188 P.S.I.			

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>40</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>39</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>44</u>	<u>0</u>	<u>44</u>	<u>0</u>	<u>60</u>	<u>0</u>	<u>60</u>
P 2 <u>5</u>	<u>44</u>	<u>3</u>	<u>48</u>	<u>5</u>	<u>60</u>	<u>3</u>	<u>75</u>
P 3 <u>10</u>	<u>44</u>	<u>6</u>	<u>60</u>	<u>10</u>	<u>60</u>	<u>6</u>	<u>100</u>
P 4 <u>15</u>	<u>44</u>	<u>9</u>	<u>77</u>	<u>15</u>	<u>60</u>	<u>9</u>	<u>127</u>
P 5 <u>20</u>	<u>44</u>	<u>12</u>	<u>94</u>	<u>20</u>	<u>60</u>	<u>12</u>	<u>156</u>
P 6 <u>25</u>	<u>44</u>	<u>15</u>	<u>114</u>	<u>25</u>	<u>60</u>	<u>15</u>	<u>193</u>
P 7 <u>30</u>	<u>44</u>	<u>18</u>	<u>137</u>	<u>30</u>	<u>60</u>	<u>18</u>	<u>220</u>
P 8 <u>35</u>	<u>44</u>	<u>21</u>	<u>164</u>	<u>35</u>	<u>60</u>	<u>21</u>	<u>250</u>
P 9 <u>40</u>	<u>44</u>	<u>24</u>	<u>193</u>	<u>40</u>	<u>60</u>	<u>24</u>	<u>281</u>
P10 <u>45</u>	<u>44</u>	<u>27</u>	<u>220</u>	<u>45</u>	<u>60</u>	<u>27</u>	<u>308</u>
P11 <u>50</u>	<u>44</u>	<u>30</u>	<u>248</u>	<u>50</u>	<u>60</u>	<u>30</u>	<u>339</u>
P12 <u>55</u>	<u>44</u>	<u>33</u>	<u>277</u>	<u>55</u>	<u>60</u>	<u>33</u>	<u>368</u>
P13		<u>36</u>	<u>308</u>	<u>60</u>	<u>60</u>	<u>36</u>	<u>398</u>
P14		<u>39</u>	<u>333</u>			<u>39</u>	<u>427</u>
P15		<u>42</u>	<u>364</u>			<u>42</u>	<u>456</u>
P16		<u>45</u>	<u>393</u>			<u>45</u>	<u>485</u>
P17		<u>48</u>	<u>421</u>			<u>48</u>	<u>514</u>
P18		<u>51</u>	<u>452</u>			<u>51</u>	<u>539</u>
P19		<u>54</u>	<u>483</u>			<u>54</u>	<u>564</u>
P20		<u>57</u>	<u>512</u>			<u>57</u>	<u>593</u>
		<u>60</u>	<u>543</u>			<u>60</u>	<u>616</u>

WESTERN TESTING CO., INC.

Pressure Data

Date 9/19/81 Test Ticket No. 11029
 Recorder No. 2606 Capacity 4150 Location 4433 Ft.
 Clock No. --- Elevation ----- Well Temperature --- °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2240 P.S.I.	Open Tool	12:20P	M
B First Initial Flow Pressure	44 P.S.I.	First Flow Pressure	60 Mins.	55 Mins.
C First Final Flow Pressure	44 P.S.I.	Initial Closed-in Pressure	120 Mins.	120 Mins.
D Initial Closed-in Pressure	967 P.S.I.	Second Flow Pressure	60 Mins.	60 Mins.
E Second Initial Flow Pressure	60 P.S.I.	Final Closed-in Pressure	120 Mins.	117 Mins.
F Second Final Flow Pressure	60 P.S.I.			
G Final Closed-in Pressure	950 P.S.I.			
H Final Hydrostatic Mud	2188 P.S.I.			

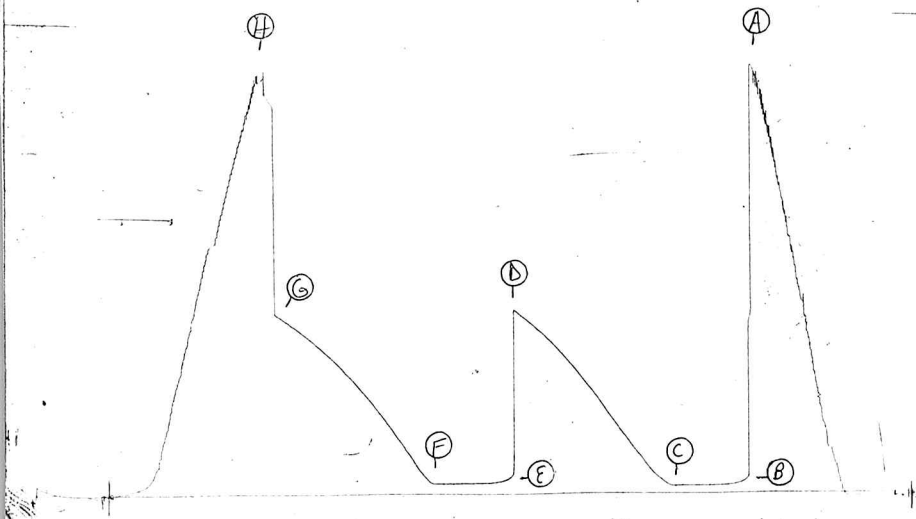
PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>11</u> Inc.		Breakdown: <u>40</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>39</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		63	570			63	637
P 2		66	595			66	659
P 3		69	622			69	682
P 4		72	651			72	703
P 5		75	676			75	724
P 6		78	699			78	742
P 7		81	726			81	763
P 8		84	748			84	780
P 9		87	771			87	798
P10		90	794			90	817
P11		93	813			93	834
P12		96	838			96	850
P13		99	854			99	869
P14		102	873			102	884
P15		105	894			105	899
P16		108	911			108	913
P17		111	929			111	929
P18		114	948			114	942
P19		117	960			117	950
P20		120	967				

2606 DST#5

TKT # 11029

I



Company Imperial Oil Company Lease & Well No. Lemon #2-7
Elevation 2070 Formation Kinderhook Effective Pay - Ft. Ticket No. 11030
Date 9/20/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
Test Approved by Peter J. Stubbs Western Representative Rod Tritt-Richard Howell

Formation Test No. 6 Interval Tested from 4513 ft. to 4566 ft. Total Depth 4566 ft.

Packer Depth 4508 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Packer Depth 4513 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Depth of Selective Zone Set -

Top Recorder Depth (Inside) 4517 ft. Recorder Number 2606 Cap. 4150

Bottom Recorder Depth (Outside) 4520 ft. Recorder Number 4332 Cap. 4200

Below Straddle Recorder Depth - ft. Recorder Number - Cap. -

Drilling Contractor Red Tiger Drlg. Rig#6 Drill Collar Length - I. D. - in.

Mud Type drispac Viscosity 46 Weight Pipe Length 1260 I. D. 2 1/2 in.

Weight 9.5 Water Loss 13.6 cc. Drill Pipe Length 3256 I. D. 3.8 in.

Chlorides 15,000 P.P.M. Test Tool Length 28 ft. Tool Size 5 1/2 in.

Jars: Make WTC Serial Number 409 Anchor Length 22 5 1/2 + 31 4 1/2 ft. Size 5 1/2 & 4 1/2 in.

Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.

Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 in.

Blow: Initial flow blow was weak and died in twenty minutes. Final flow period blow was very weak; died in ten minutes.

Recovered 50 ft. of oil cut mud (slightly)

Recovered - ft. of -

Recovered - ft. of -

Recovered - ft. of -

Recovered - ft. of -

Remarks: -

Time Set Packer(s) 12:00 A.M. Time Started Off Bottom 4:30 P.M. Maximum Temperature 128°

Initial Hydrostatic Pressure 2314 (A) 45 P.S.I.

Initial Flow Period 36 Minutes (B) 36 P.S.I. to (C) 36 P.S.I.

Initial Closed In Period 44 Minutes (D) 45 P.S.I.

Final Flow Period 36 Minutes (E) 36 P.S.I. to (F) 36 P.S.I.

Final Closed In Period 60 Minutes (G) 87 P.S.I.

Final Hydrostatic Pressure 2251 (H) 87 P.S.I.

WESTERN TESTING CO., INC.

Pressure Data

Date 9/20/81 Test Ticket No. 11030
 Recorder No. 2606 Capacity 4150 Location 4517 Ft.
 Clock No. -- Elevation 2070 Kelly Bushing Well Temperature 128 °F

Point	Pressure		Time Given 12:00P	Time Computed
A Initial Hydrostatic Mud	2314	P.S.I.		
B First Initial Flow Pressure	36	P.S.I.	45	45
C First Final Flow Pressure	36	P.S.I.	90	84
D Initial Closed-in Pressure	44	P.S.I.	45	45
E Second Initial Flow Pressure	36	P.S.I.	90	87
F Second Final Flow Pressure	36	P.S.I.		
G Final Closed-in Pressure	60	P.S.I.		
H Final Hydrostatic Mud	2251	P.S.I.		

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>9</u> Inc.		Breakdown: <u>28</u> Inc.		Breakdown: <u>9</u> Inc.		Breakdown: <u>29</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>36</u>	<u>0</u>	<u>36</u>	<u>0</u>	<u>36</u>	<u>0</u>	<u>36</u>
P 2 <u>5</u>	<u>36</u>	<u>3</u>	<u>36</u>	<u>5</u>	<u>36</u>	<u>3</u>	<u>37</u>
P 3 <u>10</u>	<u>36</u>	<u>6</u>	<u>36</u>	<u>10</u>	<u>36</u>	<u>6</u>	<u>38</u>
P 4 <u>15</u>	<u>36</u>	<u>9</u>	<u>36</u>	<u>15</u>	<u>36</u>	<u>9</u>	<u>39</u>
P 5 <u>20</u>	<u>36</u>	<u>12</u>	<u>36</u>	<u>20</u>	<u>36</u>	<u>12</u>	<u>39</u>
P 6 <u>25</u>	<u>36</u>	<u>15</u>	<u>36</u>	<u>25</u>	<u>36</u>	<u>15</u>	<u>40</u>
P 7 <u>30</u>	<u>36</u>	<u>18</u>	<u>36</u>	<u>30</u>	<u>36</u>	<u>18</u>	<u>41</u>
P 8 <u>35</u>	<u>36</u>	<u>21</u>	<u>36</u>	<u>35</u>	<u>36</u>	<u>21</u>	<u>42</u>
P 9 <u>40</u>	<u>36</u>	<u>24</u>	<u>36</u>	<u>40</u>	<u>36</u>	<u>24</u>	<u>42</u>
P10 <u>45</u>	<u>36</u>	<u>27</u>	<u>36</u>	<u>45</u>	<u>36</u>	<u>27</u>	<u>43</u>
P11		<u>30</u>	<u>36</u>			<u>30</u>	<u>44</u>
P12		<u>33</u>	<u>37</u>			<u>33</u>	<u>45</u>
P13		<u>36</u>	<u>37</u>			<u>36</u>	<u>46</u>
P14		<u>39</u>	<u>37</u>			<u>39</u>	<u>47</u>
P15		<u>42</u>	<u>37</u>			<u>42</u>	<u>48</u>
P16		<u>45</u>	<u>37</u>			<u>45</u>	<u>49</u>
P17		<u>48</u>	<u>38</u>			<u>48</u>	<u>50</u>
P18		<u>51</u>	<u>38</u>			<u>51</u>	<u>51</u>
P19		<u>54</u>	<u>38</u>			<u>54</u>	<u>52</u>
P20		<u>57</u>	<u>38</u>			<u>57</u>	<u>53</u>
		<u>60</u>	<u>39</u>			<u>60</u>	<u>54</u>

WESTERN TESTING CO., INC.

Pressure Data

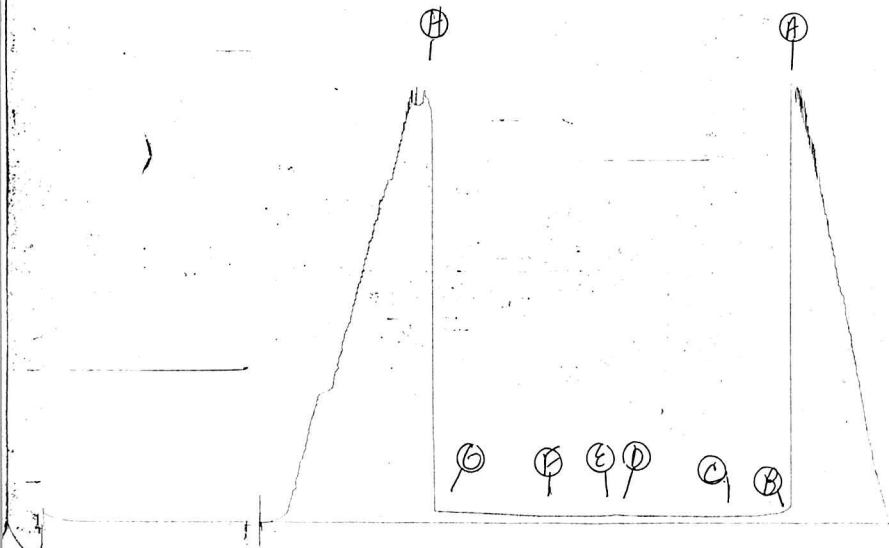
Date 9/20/81 Recorder No. 2606 Capacity 4150 Test Ticket No. 11030
 Clock No. -- Elevation 2070 Kelly Bushing Location 4517 Ft. 128
 Well Temperature °F

Point	Pressure	Time Given	Time Computed
A Initial Hydrostatic Mud	2314 P.S.I.	12:00P	M
B First Initial Flow Pressure	36 P.S.I.	45 Mins.	45 Mins.
C First Final Flow Pressure	36 P.S.I.	90 Mins.	84 Mins.
D Initial Closed-in Pressure	44 P.S.I.	45 Mins.	45 Mins.
E Second Initial Flow Pressure	36 P.S.I.	90 Mins.	87 Mins.
F Second Final Flow Pressure	36 P.S.I.		
G Final Closed-in Pressure	60 P.S.I.		
H Final Hydrostatic Mud	2251 P.S.I.		

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>9</u> Inc.		Breakdown: <u>28</u> Inc.		Breakdown: <u>9</u> Inc.		Breakdown: <u>29</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		63	40			63	55
P 2		66	40			66	55
P 3		69	40			69	56
P 4		72	40			72	56
P 5		74	41			75	57
P 6		78	42			78	58
P 7		81	43			81	59
P 8		84	44			84	60
P 9						87	60
P10							
P11							
P12							
P13							
P14							
P15							
P16							
P17							
P18							
P19							
P20							

TRF # 11030
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Company Imperial Oil Company Lease & Well No. Lemon #2-7
 Elevation 2070 Formation Viola Effective Pay - Ft. Ticket No. 11031
 Date 9/22/81 Sec. 7 Twp. 27S Range 15W County Pratt State Kansas
 Test Approved by Peter J. Stubbs Western Representative Rod Tritt-Richard Howell
 Formation Test No. 7 Interval Tested from 4605 ft. to 4615 ft. Total Depth 4615 ft.
 Packer Depth 4600 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
 Packer Depth 4605 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.
 Depth of Selective Zone Set -
 Top Recorder Depth (Inside) 4587 ft. Recorder Number 2606 Cap. 4150
 Bottom Recorder Depth (Outside) 4590 ft. Recorder Number 4332 Cap. 4200
 Below Straddle Recorder Depth - ft. Recorder Number - Cap. -
 Drilling Contractor Red Tiger Drlg. Rig #6 Drill Collar Length - I. D. - in.
 Mud Type drispac Viscosity 57 Weight Pipe Length 1260 I. D. 2 1/2 in.
 Weight 9.6 Water Loss 12.8 cc. Drill Pipe Length 3307 I. D. 3.8 in.
 Chlorides 16,000 P.P.M. Test Tool Length 38 ft. Tool Size 5 1/2 in.
 Jars: Make WTC Serial Number 409 Anchor Length 10 ft. Size 5 1/2 in.
 Did Well Flow? No Reversed Out No Surface Choke Size 3/4 in. Bottom Choke Size 3/4 in.
 Main Hole Size 7 7/8 in. Tool Joint Size 4 1/2 in.

Blow: Initial flow period weak and building to strong in forty minutes. Final flow period weak and building to strong in forty minutes.

Recovered 150 ft. of heavy oil cut mud and gas
 Recovered 30 ft. of oil and gas cut watery mud
 Recovered 60 ft. of oil and gas cut muddy water Chlorides 67,000 ppm
 Recovered 800 ft. of gas in pipe
 Recovered - ft. of -

Remarks: -

Time Set Packer(s) 10:10 ~~A.M.~~ P.M. Time Started Off Bottom 2:10 ~~A.M.~~ P.M. Maximum Temperature 132°
 Initial Hydrostatic Pressure (A) 2303 P.S.I.
 Initial Flow Period Minutes 60 (B) 21 P.S.I. to (C) 43 P.S.I.
 Initial Closed In Period Minutes 60 (D) 1532 P.S.I.
 Final Flow Period Minutes 60 (E) 94 P.S.I. to (F) 104 P.S.I.
 Final Closed In Period Minutes 57 (G) 1530 P.S.I.
 Final Hydrostatic Pressure (H) 2244 P.S.I.

WESTERN TESTING CO., INC.

Pressure Data

Date 9/22/81 Test Ticket No. 11031
 Recorder No. 2606 Capacity 4150 Location 4587 Ft.
 Clock No. -- Elevation 2070 Well Temperature 132 °F

Point	Pressure		Time Given	Time Computed
A Initial Hydrostatic Mud	2303 P.S.I.	Open Tool	10:10P	M
B First Initial Flow Pressure	21 P.S.I.	First Flow Pressure	60 Mins.	60 Mins.
C First Final Flow Pressure	43 P.S.I.	Initial Closed-in Pressure	60 Mins.	60 Mins.
D Initial Closed-in Pressure	1532 P.S.I.	Second Flow Pressure	60 Mins.	60 Mins.
E Second Initial Flow Pressure	94 P.S.I.	Final Closed-in Pressure	60 Mins.	57 Mins.
F Second Final Flow Pressure	104 P.S.I.			
G Final Closed-in Pressure	1530 P.S.I.			
H Final Hydrostatic Mud	2244 P.S.I.			

PRESSURE BREAKDOWN

First Flow Pressure		Initial Shut-In		Second Flow Pressure		Final Shut-In	
Breakdown: <u>12</u> Inc.		Breakdown: <u>20</u> Inc.		Breakdown: <u>12</u> Inc.		Breakdown: <u>19</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 0	21	0	43	0	94	0	104
P 2 5	21	3	813	5	94	3	960
P 3 10	21	6	1184	10	94	6	1240
P 4 15	21	9	1348	15	94	9	1365
P 5 20	22	12	1406	20	94	12	1408
P 6 25	23	15	1446	25	94	15	1444
P 7 30	24	18	1471	30	94	18	1465
P 8 35	28	21	1485	35	94	21	1483
P 9 40	31	24	1498	40	95	24	1496
P10 45	35	27	1506	45	96	27	1503
P11 50	38	30	1513	50	98	30	1509
P12 55	41	33	1516	55	101	33	1514
P13 60	43	36	1521	60	104	36	1519
P14		39	1524			39	1525
P15		42	1527			42	1524
P16		45	1529			45	1526
P17		48	1530			48	1527
P18		51	1531			51	1528
P19		54	1532			54	1529
P20		57	1532			57	1530
		60	1532				

2606 DST#8

TKT # 11031
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