Home Office: Wichita, Kansas 67201
P.O. Box 1599 (316) 262-5861

Company A. Scott Ritchie Lease & Well No. Schmidt #1

Elevation 1449 Kelly Bushing Formation Burgess Sand Effective Pay - Ft. Ticket No. 8180

Date 5/24/81 Sec. 13 Twp. 22S Range 3E County Marion State Kansas

Test Approved by George Mueller Western Representative Allen Edgington

Formation Test No. 1 Interval Tested from 2475 ft. to 2513 ft. Total Depth 2513 ft.

Packer Depth 2470 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Packer Depth 2475 ft. Size 6 3/4 in. Packer Depth - ft. Size - in.

Depth of Selective Zone Set -

Top Recorder Depth (Inside) 2503 ft. Recorder Number 5666 Cap. 3950

Bottom Recorder Depth (Outside) 2508 ft. Recorder Number 3354 Cap. 4200

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

Drilling Contractor White & Ellis Drlg. Rig #3 Drill Collar Length 123 I. D. 2¼ in.

Mud Type chemical Viscosity 40 Weight Pipe Length - I. D. - in.

Weight 9.5 Water Loss 12 cc. Drill Pipe Length 2355 I. D. 3.8 in.

Chlorides 1,000 P.P.M. Test Tool Length 20 ft. Tool Size 4½OD in.

Jars: Make No Serial Number - Anchor Length 38 ft. Size 4½OD 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 4½XH in.

Blow: Few bubbles.

Recovered 5 ft. of drilling mud

Recovered ft. of

Recovered ft. of

Recovered ft. of

Recovered ft. of

Remarks:

Time Set Packer(s) 3:00 ~~A.M.~~ P.M. Time Started Off Bottom 5:00 ~~A.M.~~ P.M. Maximum Temperature 99°

Initial Hydrostatic Pressure (A) 1281 P.S.I.

Initial Flow Period Minutes 30 (B) 40 P.S.I. to (C) 38 P.S.I.

Initial Closed In Period Minutes 27 (D) 611 P.S.I.

Final Flow Period Minutes 30 (E) 58 P.S.I. to (F) 44 P.S.I.

Final Closed In Period Minutes 30 (G) 581 P.S.I.

Final Hydrostatic Pressure (H) 1266 P.S.I.

WESTERN TESTING CO., INC.
Pressure Data

Date 5/24/81 Test Ticket No. 8180

Recorder No. 5666 Capacity 3950 Location 2505 Ft.

Clock No. - Elevation 1449 Kelly Bushing Well Temperature 99 °F

Point		Pressure			Time Given	Time Computed
A	Initial Hydrostatic Mud	1281 P.S.I.		Open Tool	3:00P M	
B	First Initial Flow Pressure	40 P.S.I.		First Flow Pressure	30 Mins.	30 Mins.
C	First Final Flow Pressure	38 P.S.I.		Initial Closed-in Pressure	30 Mins.	27 Mins.
D	Initial Closed-in Pressure	611 P.S.I.		Second Flow Pressure	30 Mins.	30 Mins.
E	Second Initial Flow Pressure	58 P.S.I.		Final Closed-in Pressure	30 Mins.	30 Mins.
F	Second Final Flow Pressure	44 P.S.I.				
G	Final Closed-in Pressure	581 P.S.I.				
H	Final Hydrostatic Mud	1266 P.S.I.				

PRESSURE BREAKDOWN

First Flow Pressure
Breakdown: 6 Inc. of 5 mins. and a final inc. of 0 Min.

Point Mins.	Press.
P 1 0	40
P 2 5	38
P 3 10	38
P 4 15	38
P 5 20	38
P 6 25	38
P 7 30	38
P 8	
P 9	
P10	
P11	
P12	
P13	
P14	
P15	
P16	
P17	
P18	
P19	
P20	

Initial Shut-In
Breakdown: 9 Inc. of 3 mins. and a final inc. of 0 Min.

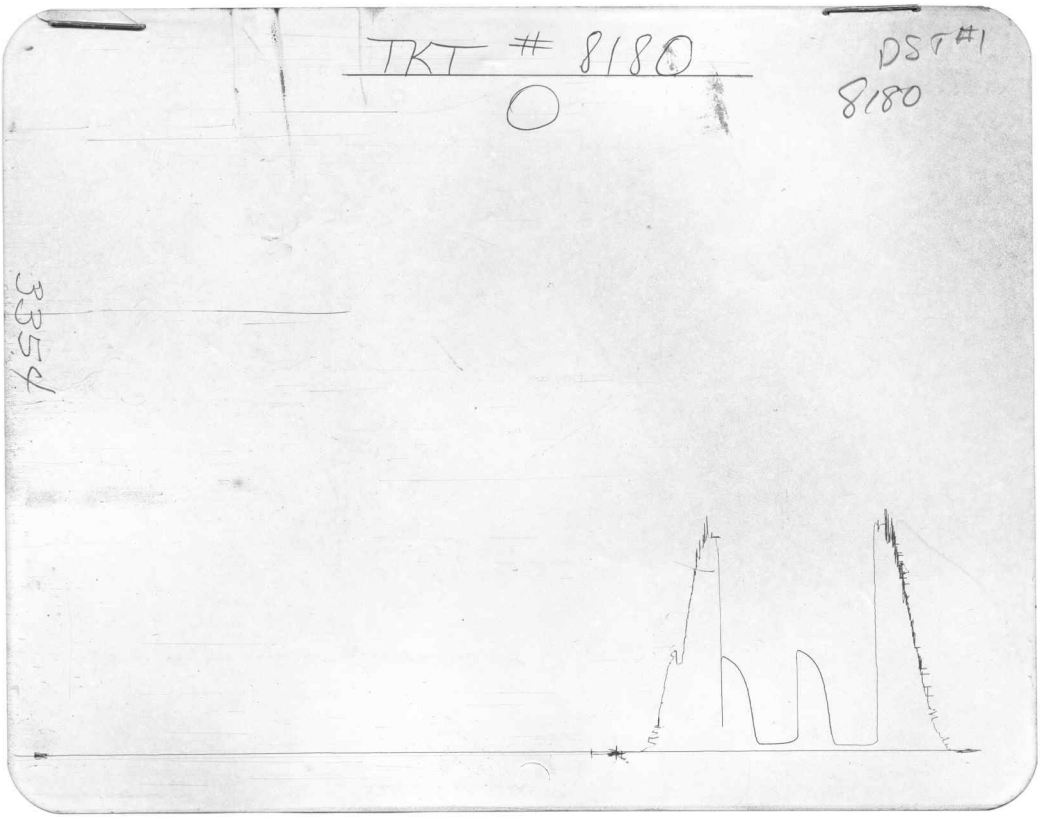
Point Minutes	Press.
0	38
3	114
6	311
9	438
12	506
15	545
18	572
21	589
24	601
27	611

Second Flow Pressure
Breakdown: 6 Inc. of 5 mins. and a final inc. of 0 Min.

Point Minutes	Press.
0	58
5	47
10	44
15	44
20	44
25	44
30	44

Final Shut-In
Breakdown: 10 Inc. of 3 mins. and a final inc. of 0 Min.

Point Minutes	Press.
0	44
3	54
6	207
9	359
12	444
15	495
18	528
21	546
24	564
27	574
30	581



This is an actual photograph of recorder chart.

POINT		PRESSURE Field Reading	Office Reading	
(A)	Initial Hydrostatic Mud	1235	1281	PSI
(B)	First Initial Flow Pressure	40	40	PSI
(C)	First Final Flow Pressure	40	38	PSI
(D)	Initial Closed-in Pressure	570	611	PSI
(E)	Second Initial Flow Pressure	50	58	PSI
(F)	Second Final Flow Pressure	40	44	PSI
(G)	Final Closed-in Pressure	540	581	PSI
(H)	Final Hydrostatic Mud	1185	1266	PSI

COMPANY A. SCOTT RITCHIE LEASE AND WELL NO. SCHMIDT #1 SEC. 13 TWP. 22S RGE. 3E TEST NO. 1 DATE 5/24/81

Home Office: Wichita, Kansas 67201
P.O. Box 1599 (316) 262-5861

Company A. Scott Ritchie Lease & Well No. Schmidt #1

Elevation 1449 Kelly Bushing Formation Mississippi Effective Pay - Ft. Ticket No. 8181

Date 5/25/81 Sec. 13 Twp. 22S Range 3E County Marion State Kansas

Test Approved by George N.Mueller Western Representative Allen Edgington

Formation Test No. 2 Interval Tested from 2517 ft. to 2532 ft. Total Depth 2532 ft.

Packer Depth 2512 ft. Size 6 3/4in. Packer Depth - ft. Size - in.

Packer Depth 2517 ft. Size 6 3/4in. Packer Depth - ft. Size - in.

Depth of Selective Zone Set -

Top Recorder Depth (Inside) 2524 ft. Recorder Number 5666 Cap. 3950

Bottom Recorder Depth (Outside) 2527 ft. Recorder Number 3354 Cap. 4200

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

Drilling Contractor White & Ellis Drlg. Rig #3 Drill Collar Length 123 I. D. 2¼ in.

Mud Type chemical Viscosity 42 Weight Pipe Length - I. D. - in.

Weight 9.5 Water Loss 12.0 cc. Drill Pipe Length 2386 I. D. 3.8 in.

Chlorides 1,000 P.P.M. Test Tool Length 20 ft. Tool Size 4½OD in.

Jars: Make - Serial Number - Anchor Length 15 ft. Size 4½OD in.

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

Main Hole Size 77/8 in. Tool Joint Size 4½XH in.

Blow: Strong throughout test.

Recovered 1300 ft. of salt water

Recovered ft. of

Recovered ft. of

Recovered ft. of

Recovered ft. of

Remarks:

Time Set Packer(s) 2:45 A.M. ~~P.M.~~ Time Started Off Bottom 6:15 A.M. P.M. Maximum Temperature 100°

Initial Hydrostatic Pressure			(A)	1270	P.S.I.	
Initial Flow Period	Minutes 30		(B)	122 P.S.I.	to (C) 452	P.S.I.
Initial Closed In Period	Minutes 63		(D)	688	P.S.I.	
Final Flow Period	Minutes 55		(E)	509 P.S.I.	to (F) 662	P.S.I.
Final Closed In Period	Minutes 60		(G)	690	P.S.I.	
Final Hydrostatic Pressure			(H)	1235	P.S.I.	

WTC-1

WESTERN TESTING CO., INC.

Pressure Data

Date 5/25/81 Test Ticket No. 8181

Recorder No. 5666 Capacity 3950 Location 2524 Ft.

Clock No. - Elevation 1449 Kelly Bushing Well Temperature 100 °F

Point		Pressure	
A	Initial Hydrostatic Mud	1270	P.S.I.
B	First Initial Flow Pressure	122	P.S.I.
C	First Final Flow Pressure	452	P.S.I.
D	Initial Closed-in Pressure	688	P.S.I.
E	Second Initial Flow Pressure	509	P.S.I.
F	Second Final Flow Pressure	662	P.S.I.
G	Final Closed-in Pressure	690	P.S.I.
H	Final Hydrostatic Mud	1235	P.S.I.

	Time Given	Time Computed
Open Tool	2:45A M	
First Flow Pressure	30 Mins.	30 Mins.
Initial Closed-in Pressure	60 Mins.	63 Mins.
Second Flow Pressure	60 Mins.	55 Mins.
Final Closed-in Pressure	60 Mins.	60 Mins.

PRESSURE BREAKDOWN

First Flow Pressure
Breakdown: 6 Inc.
of 5 mins. and a
final inc. of 0 Min.

Point Mins.	Press.
P 1 0	122
P 2 5	173
P 3 10	246
P 4 15	307
P 5 20	365
P 6 25	415
P 7 30	452
P 8	
P 9	
P10	
P11	
P12	
P13	
P14	
P15	
P16	
P17	
P18	
P19	
P20	

Initial Shut-In
Breakdown: 21 Inc.
of 3 mins. and a
final inc. of 0 Min.

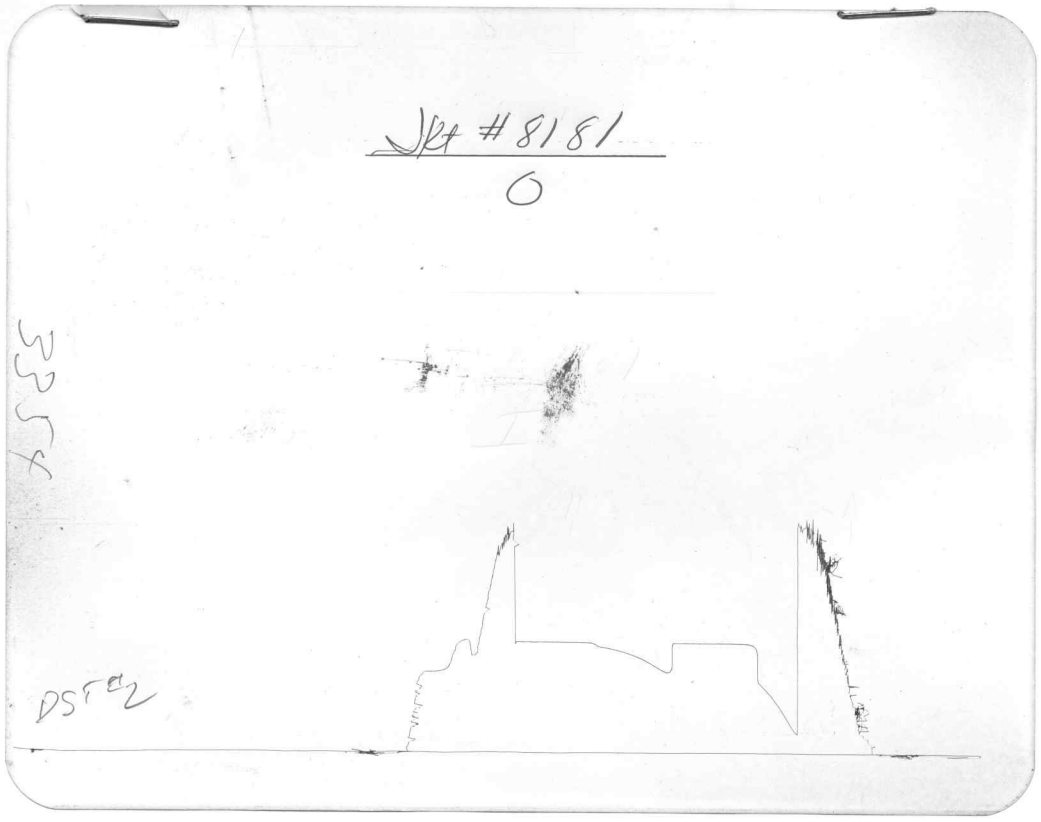
Point Minutes	Press.
0	452
3	667
6	677
9	680
12	682
15	684
18	684
21	684
24	684
27	685
30	686
33	686
36	686
39	686
42	686
45	686
48	686
51	686
54	686
57	686
60	687
63	688

Second Flow Pressure
Breakdown: 11 Inc.
of 5 mins. and a
final inc. of 0 Min.

Point Minutes	Press.
0	509
5	509
10	530
15	551
20	578
25	596
30	613
35	628
40	639
45	648
50	656
55	662

Final Shut-In
Breakdown: 20 Inc.
of 3 mins. and a
final inc. of 0 Min.

Point Minutes	Press.
0	662
3	679
6	683
9	686
12	687
15	688
18	688
21	688
24	688
27	688
30	688
33	689
36	690
39	690
42	690
45	690
48	690
51	690
54	690
57	690
60	690



This is an actual photograph of recorder chart.

POINT		PRESSURE Field Reading	Office Reading	
(A)	Initial Hydrostatic Mud	1265	1270	PSI
(B)	First Initial Flow Pressure	110	122	PSI
(C)	First Final Flow Pressure	420	452	PSI
(D)	Initial Closed-in Pressure	650	688	PSI
(E)	Second Initial Flow Pressure	470	509	PSI
(F)	Second Final Flow Pressure	620	662	PSI
(G)	Final Closed-in Pressure	650	690	PSI
(H)	Final Hydrostatic Mud	1235	1235	PSI

COMPANY A. SCOTT RITCHIE LEASE AND WELL NO. SCHMIDT #1 SEC. 13 TWP. 22S RGE. 3E TEST NO. 2 DATE 5/25/81