



DIAMOND TESTING
 P.O. Box 157
 HOISINGTON, KANSAS 67544
 (800) 542-7313
DRILL-STEM TEST TICKET
 FILE: brownt1-12dst4

TIME ON: 9-27 17:47
 TIME OFF: 9-28 01:48

Company Mull Drilling Co Inc Lease & Well No. Brown Trust #1-12
 Contractor Duke Drilling - Rig #4 Charge to Mull Drilling Co Inc
 Elevation 2945 KB Formation Lsg 'L' - Marm Effective Pay -- Ft. Ticket No. S0385
 Date 9-27-13 Sec. 12 Twp. 16 S Range 32 W County Scott State KANSAS
 Test Approved By Kevin Kessler Diamond Representative Jacob McCallie

Formation Test No. 4 Interval Tested from 4250 ft. to 4350 ft. Total Depth 4350 ft.
 Packer Depth 4245 ft. Size 6 3/4 in. Packer depth -- ft. Size 6 3/4 in.
 Packer Depth 4250 ft. Size 6 3/4 in. Packer depth -- ft. Size 6 3/4 in.

Depth of Selective Zone Set _____

Top Recorder Depth (Inside) 4231 ft. Recorder Number 8471 Cap. 10,000 P.S.I.
 Bottom Recorder Depth (Outside) 4347 ft. Recorder Number 3851 Cap. 5,700 P.S.I.
 Below Straddle Recorder Depth _____ ft. Recorder Number _____ Cap. _____ P.S.I.

Mud Type CHEMICAL Viscosity 58 Drill Collar Length -- ft. I.D. 2 1/4 in.
 Weight 9.3 Water Loss 6.4 cc. Weight Pipe Length -- ft. I.D. 2 7/8 in.
 Chlorides 3,000 P.P.M. Drill Pipe Length 4217 ft. I.D. 3 1/2 in.
 Jars: Make STERLING Serial Number 3 Test Tool Length 33 ft. Tool Size 3 1/2-IF in.
 Did Well Flow? NO Reversed Out NO Anchor Length 100 (38.5') ft. Size 4 1/2-FH in.
 Main Hole Size 7 7/8 Tool Joint Size 4 1/2 XH in. Surface Choke Size 1 in. Bottom Choke Size 5/8 in.

Blow: 1st Open: 1/2" Blow- Built to 2 1/2" in 5 min **NOBB**
 2nd Open: 1/4" Blow- Built to BB in 40 1/2 min **NOBB**

Recovered 123 ft. of WCM 22% W 78% M
 Recovered 126 ft. of SLMCW 82% W 18% M
 Recovered 249 ft. of TOTAL FLUID

Recovered _____ ft. of <u>PH: 7</u>	
Recovered _____ ft. of <u>RW: .3 @ 55 degrees F</u>	Price Job
Recovered _____ ft. of <u>Chlorides: 26,000 ppm</u>	Other Charges
Remarks: _____	Insurance
<u>Tool Sample: 60% W 30% M</u>	Total

Time Set Packer(s) 7:27 PM A.M. P.M. Time Started Off Bottom 11:02 PM A.M. P.M. Maximum Temperature 121

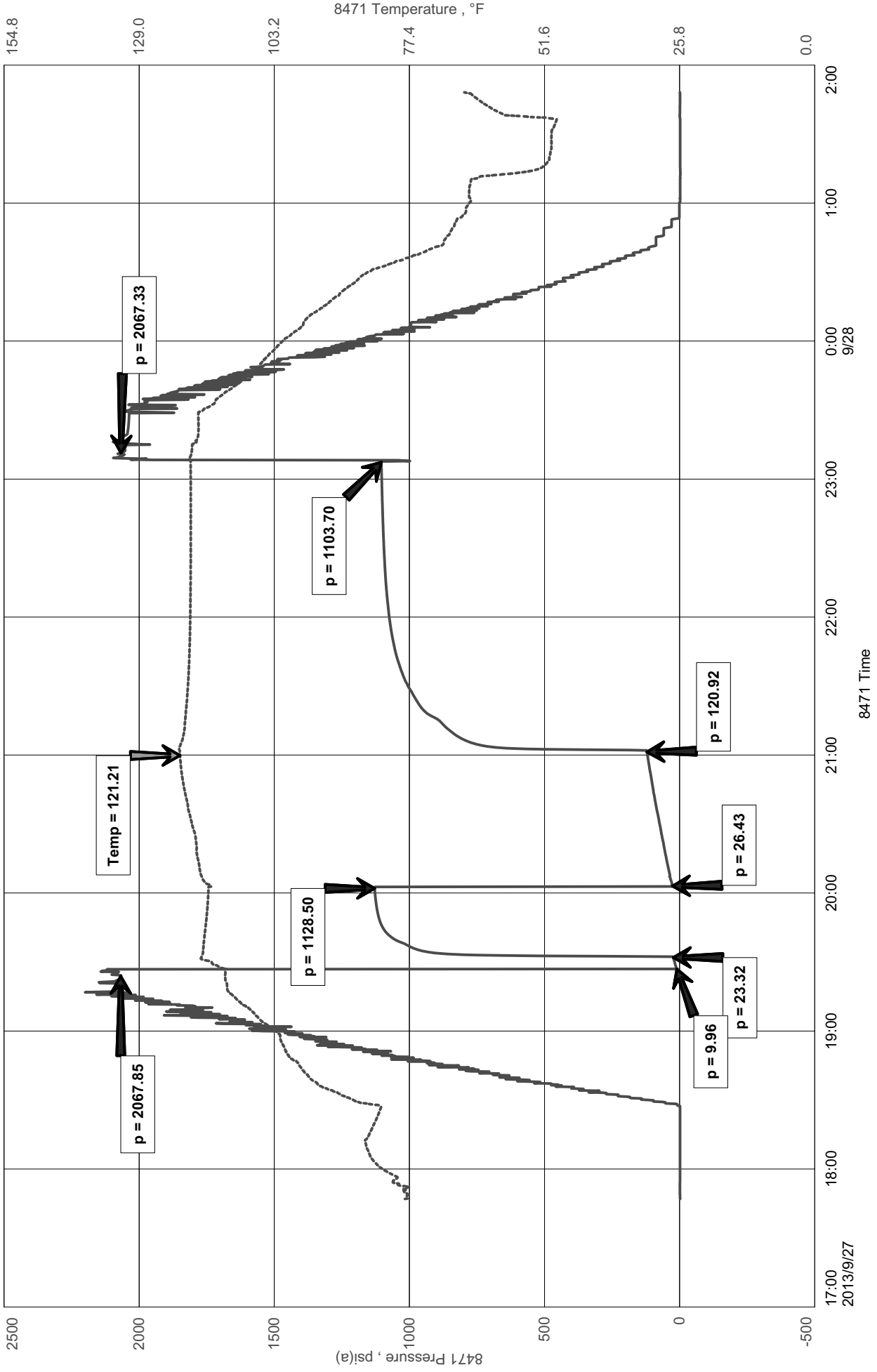
Initial Hydrostatic Pressure..... (A) 2068 P.S.I.
 Initial Flow Period..... Minutes 5 (B) 10 P.S.I. to (C) 23 P.S.I.
 Initial Closed In Period..... Minutes 30 (D) 1129 P.S.I.
 Final Flow Period..... Minutes 60 (E) 26 P.S.I. to (F) 121 P.S.I.
 Final Closed In Period..... Minutes 120 (G) 1104 P.S.I.
 Final Hydrostatic Pressure..... (H) 2067 P.S.I.

Diamond Testing shall not be liable for damages of any kind to the property or personnel of the one for whom a test is made or for any loss suffered or sustained, directly or indirectly, through the use of its equipment, or its statement or opinion concerning the result of any test. Tools lost or damaged in the hole shall be paid for at cost by the party for whom the test is made.

Mull Drilling Co. Inc.
DST #4 Lan 'L'-Marm 4250-4350'
Start Test Date: 2013/09/27
Final Test Date: 2013/09/28

Brown Trust #1-12
Formation: DST #4 Lan 'L'-Marm 4250-4350'
Pool: Wildcat
Job Number: S0385

Brown Trust #1-12



Diamond Testing

General information Report

General Information

Company Name Mull Drilling Co. Inc.

Contact	Mark Shreve	Job Number	S0385
Well Name	Brown Trust #1-12	Representative	Jacob McCallie
Unique Well ID	DST #4 Lan 'L'-Marm 4250-4350'	Well Operator	Mull Drilling Co. Inc.
Surface Location	SEC 12-16S-32W Scott County	Report Date	2013/09/27
Well License Number		Prepared By	Jacob McCallie
Field	Wildcat		
Well Type	Vertical		

Test Type	Drill Stem Test		
Formation	DST #4 Lan 'L'-Marm 4250-4350'		
Well Fluid Type	06 Water	Start Test Time	17:47:00
		Final Test Time	01:48:00
Start Test Date	2013/09/27		
Final Test Date	2013/09/28		
Gauge Name	8471		
Gauge Serial Number			

Test Results

RECOVERED:
123' WCM 22% W 78% M
126' SLMCW 82% W 18% M

PH: 7
RW: .3 @ 55 degrees F
Chlorides: 26,000 ppm

TOOL SAMPLE:
60% W 30% M