



## DRILL STEM TEST REPORT

Prepared For: **S.Gary Jr&Assoc.inc.**

1515 Wynkoop, Ste.700  
Denver Co. 80202

ATTN: Clayton Camozzi

**36-15s-16 Ellis**

**Boxberger 4-36**

Start Date: 2011.06.18 @ 19:27:05

End Date: 2011.06.19 @ 02:11:50

Job Ticket #: 042645                      DST #: 3

Trilobite Testing, Inc  
PO Box 362 Hays, KS 67601  
ph: 785-625-4778 fax: 785-625-5620



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TESTING, INC.**

# DRILL STEM TEST REPORT

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Test Start: 2011.06.18 @ 19:27:05

## GENERAL INFORMATION:

Formation: **LKC"I,J,K"**

Deviated: No Whipstock: ft (KB)

Time Tool Opened: 21:07:30

Time Test Ended: 02:11:50

Test Type: Conventional Bottom Hole

Tester: Andy Carreira

Unit No: 39

**Interval: 3360.00 ft (KB) To 3430.00 ft (KB) (TVD)**

Reference Elevations: 1935.00 ft (KB)

Total Depth: 3430.00 ft (KB) (TVD)

1927.00 ft (CF)

Hole Diameter: 7.88 inches Hole Condition: Fair

KB to GR/CF: 8.00 ft

**Serial #: 8352 Outside**

Press @ RunDepth: 42.94 psig @ 3367.00 ft (KB)

Capacity: 8000.00 psig

Start Date: 2011.06.18

End Date:

2011.06.19

Last Calib.:

2011.06.19

Start Time:

19:27:05

End Time:

02:11:50

Time On Btm:

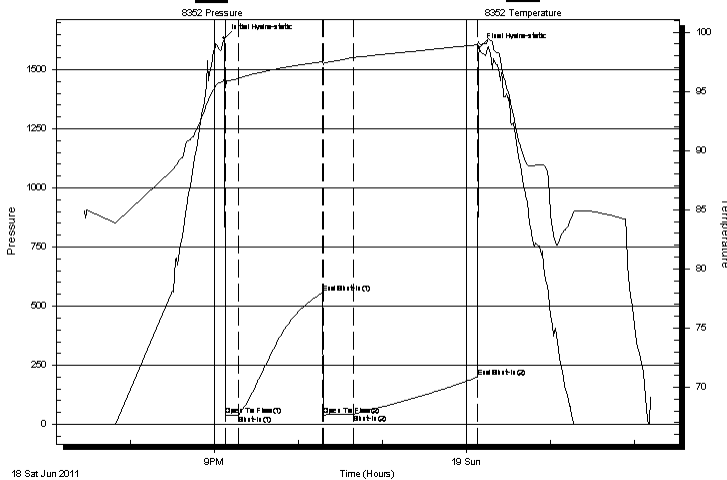
2011.06.18 @ 21:06:40

Time Off Btm:

2011.06.19 @ 00:08:59

**TEST COMMENT:** IF:(10min) Weak, Surface Blow  
IS:(60min) No Return  
FF:(20min) No Blow  
FS:(90min) No Return

Pressure vs. Time



## PRESSURE SUMMARY

Time (Min.)	Pressure (psig)	Temp (deg F)	Annotation
0	1632.29	96.06	Initial Hydro-static
1	37.21	95.34	Open To Flow (1)
11	38.82	96.12	Shut-In(1)
71	557.28	97.51	End Shut-In(1)
71	40.42	97.27	Open To Flow (2)
93	42.94	97.87	Shut-In(2)
182	200.93	98.94	End Shut-In(2)
183	1593.83	99.02	Final Hydro-static

## Recovery

Length (ft)	Description	Volume (bbl)
10.00	Mud w / slight oil specks in tool	0.05

## Gas Rates

Choke (inches)	Pressure (psig)	Gas Rate (Mcf/d)







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**TOOL DIAGRAM**

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Test Start: 2011.06.18 @ 19:27:05

## Tool Information

Drill Pipe:	Length: 3302.00 ft	Diameter: 3.80 inches	Volume: 46.32 bbl	Tool Weight:	3000.00 lb
Heavy Wt. Pipe:	Length: 0.00 ft	Diameter: 0.00 inches	Volume: 0.00 bbl	Weight set on Packer:	24000.00 lb
Drill Collar:	Length: 31.00 ft	Diameter: 2.25 inches	Volume: 0.15 bbl	Weight to Pull Loose:	50000.00 lb
			<u>Total Volume: 46.47 bbl</u>	Tool Chased	0.00 ft
Drill Pipe Above KB:	10.00 ft			String Weight: Initial	46000.00 lb
Depth to Top Packer:	3360.00 ft			Final	46000.00 lb
Depth to Bottom Packer:	ft				
Interval between Packers:	70.00 ft				
Tool Length:	107.00 ft				
Number of Packers:	2	Diameter: 6.75 inches			

Tool Comments:

## Tool Description

Tool Description	Length (ft)	Serial No.	Position	Depth (ft)	Accum. Lengths
Recorder	0.00	8650	Fluid	3323.00	
Change Over Sub	1.00			3324.00	
Blank Spacing	5.00			3329.00	
Shut In Tool	5.00			3334.00	
Sampler	4.00			3338.00	
Hydraulic tool	5.00			3343.00	
Jars	5.00			3348.00	
Safety Joint	3.00			3351.00	
Packer	5.00			3356.00	37.00 Bottom Of Top Packer
Packer	4.00			3360.00	
Stubb	1.00			3361.00	
Perforations	5.00			3366.00	
Change Over Sub	1.00			3367.00	
Recorder	0.00	8017	Inside	3367.00	
Recorder	0.00	8352	Outside	3367.00	
Drill Pipe	31.00			3398.00	
Change Over Sub	1.00			3399.00	
Perforations	28.00			3427.00	
Bullnose	3.00			3430.00	70.00 Bottom Packers & Anchor

**Total Tool Length: 107.00**



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**FLUID SUMMARY**

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Job Ticket: 042645

**DST#: 3**

ATTN: Clayton Camozzi

Test Start: 2011.06.18 @ 19:27:05

## Mud and Cushion Information

Mud Type: Gel Chem

Cushion Type:

Oil API:

deg API

Mud Weight: 9.00 lb/gal

Cushion Length:

ft

Water Salinity:

ppm

Viscosity: 60.00 sec/qt

Cushion Volume:

bbbl

Water Loss: 7.20 in<sup>3</sup>

Gas Cushion Type:

Resistivity: ohm.m

Gas Cushion Pressure:

psig

Salinity: 5700.00 ppm

Filter Cake: inches

## Recovery Information

Recovery Table

Length ft	Description	Volume bbl
10.00	Mud w / slight oil specks in tool	0.049

Total Length: 10.00 ft      Total Volume: 0.049 bbl

Num Fluid Samples: 0

Num Gas Bombs: 0

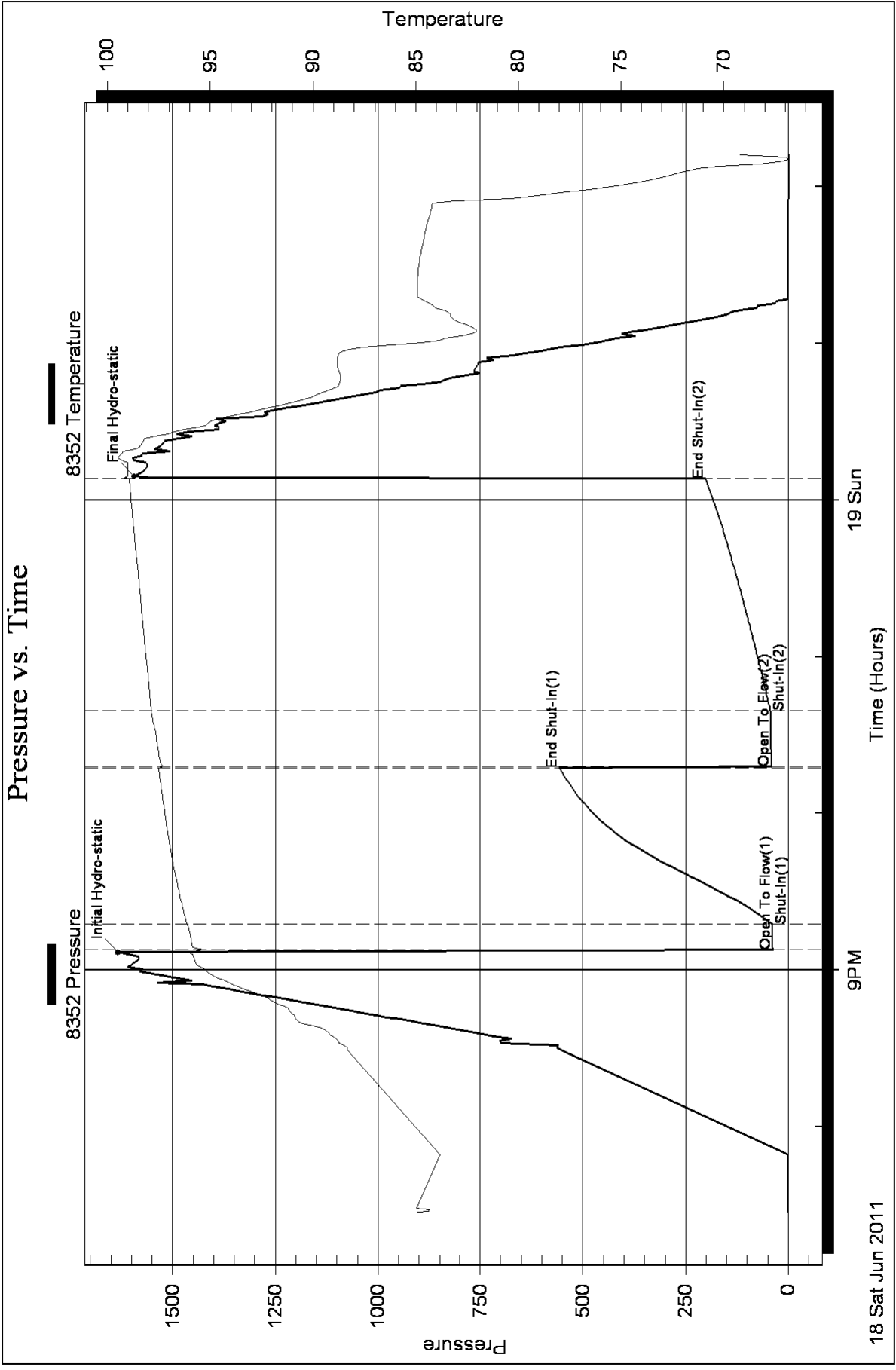
Serial #:

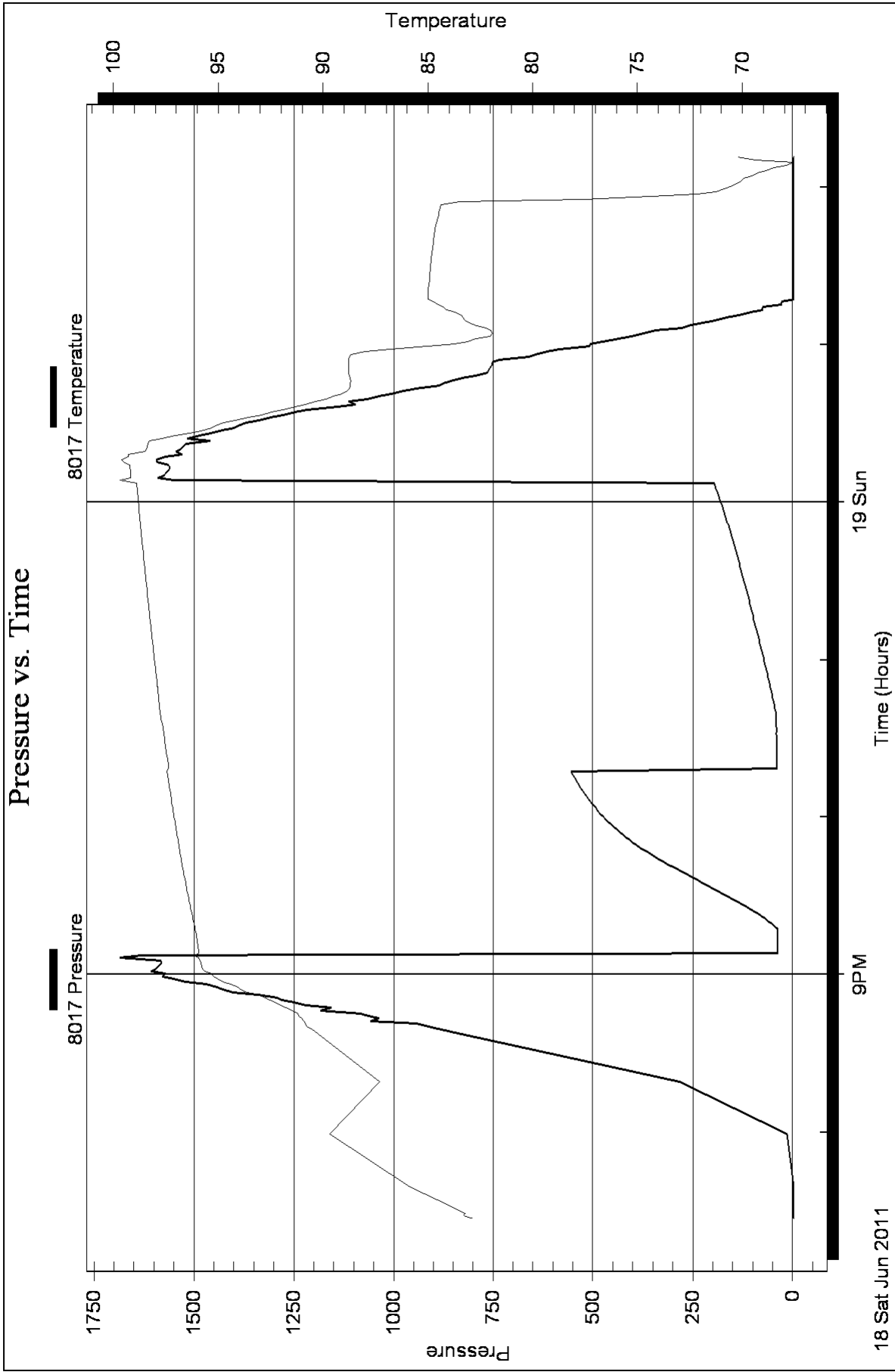
Laboratory Name:

Laboratory Location:

Recovery Comments: Sampler Data- mud=1500ml pressure=65lbs

### Pressure vs. Time







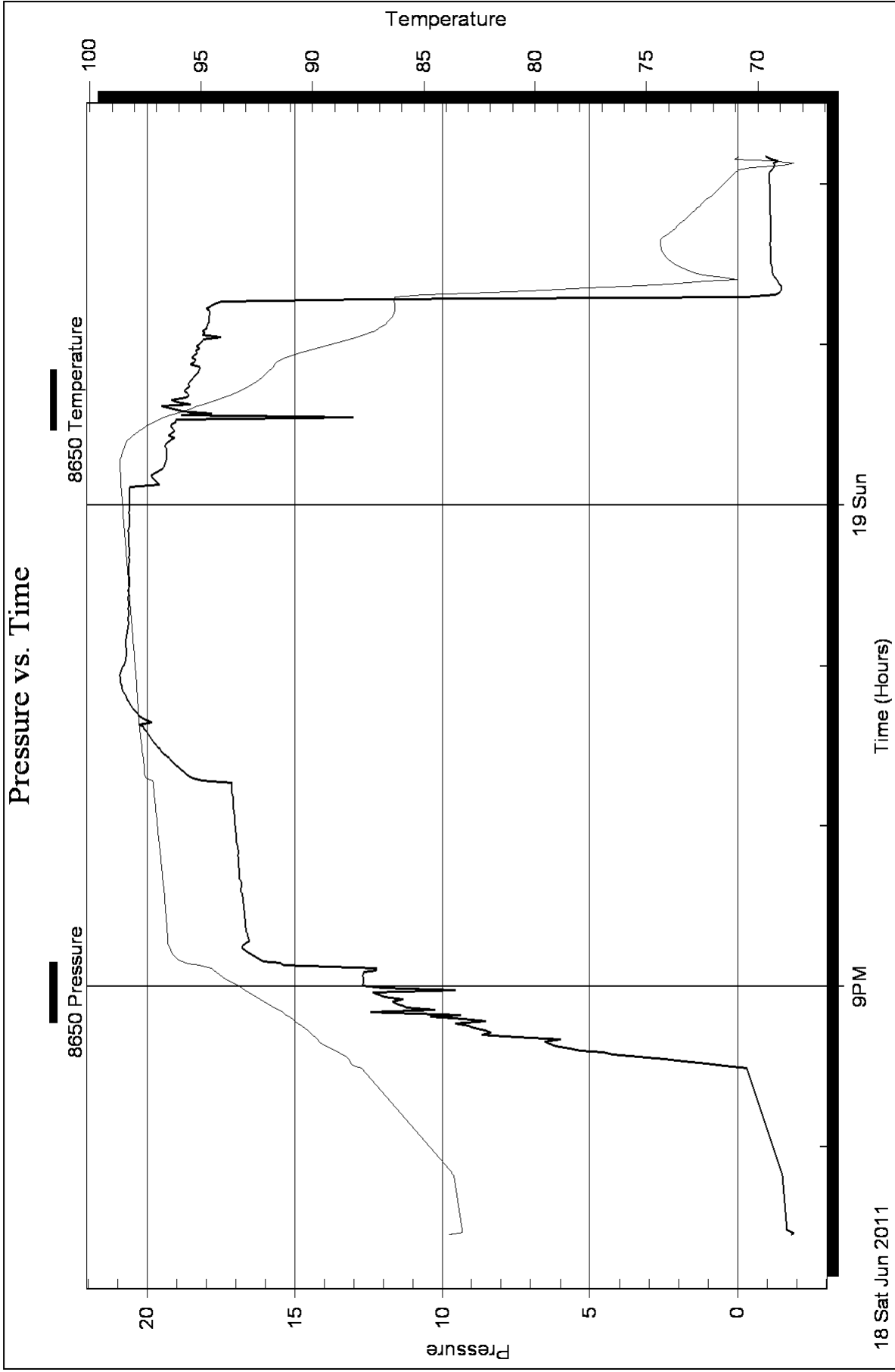
Serial #: 8650

Fluid

S.Gary Jr&Assoc.inc.

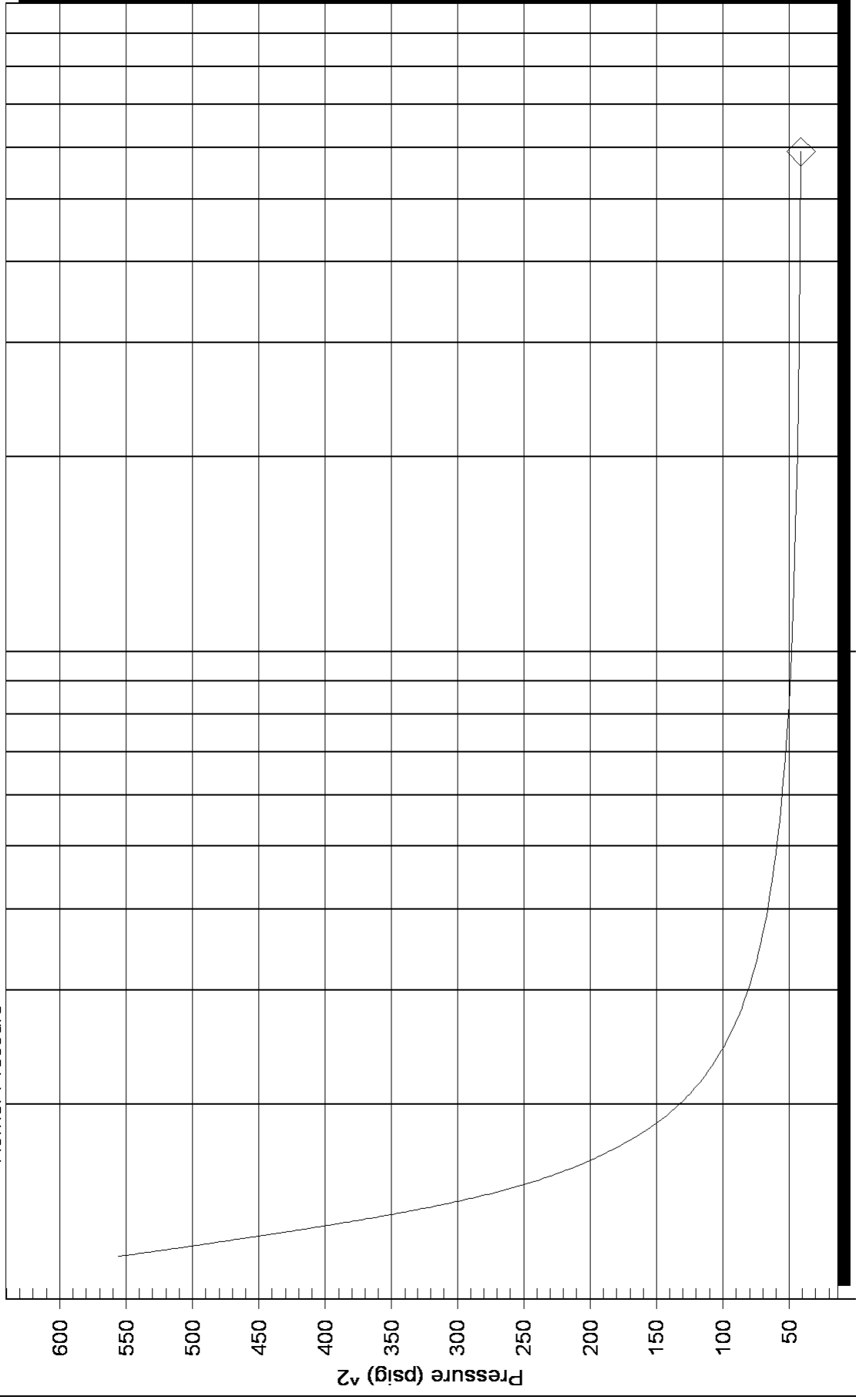
36-15s-16 Ellis

DST Test Number: 3



### Homer Plot

Horner Pressure



Horner Time:  $(T_{wf} + dt) / dt$

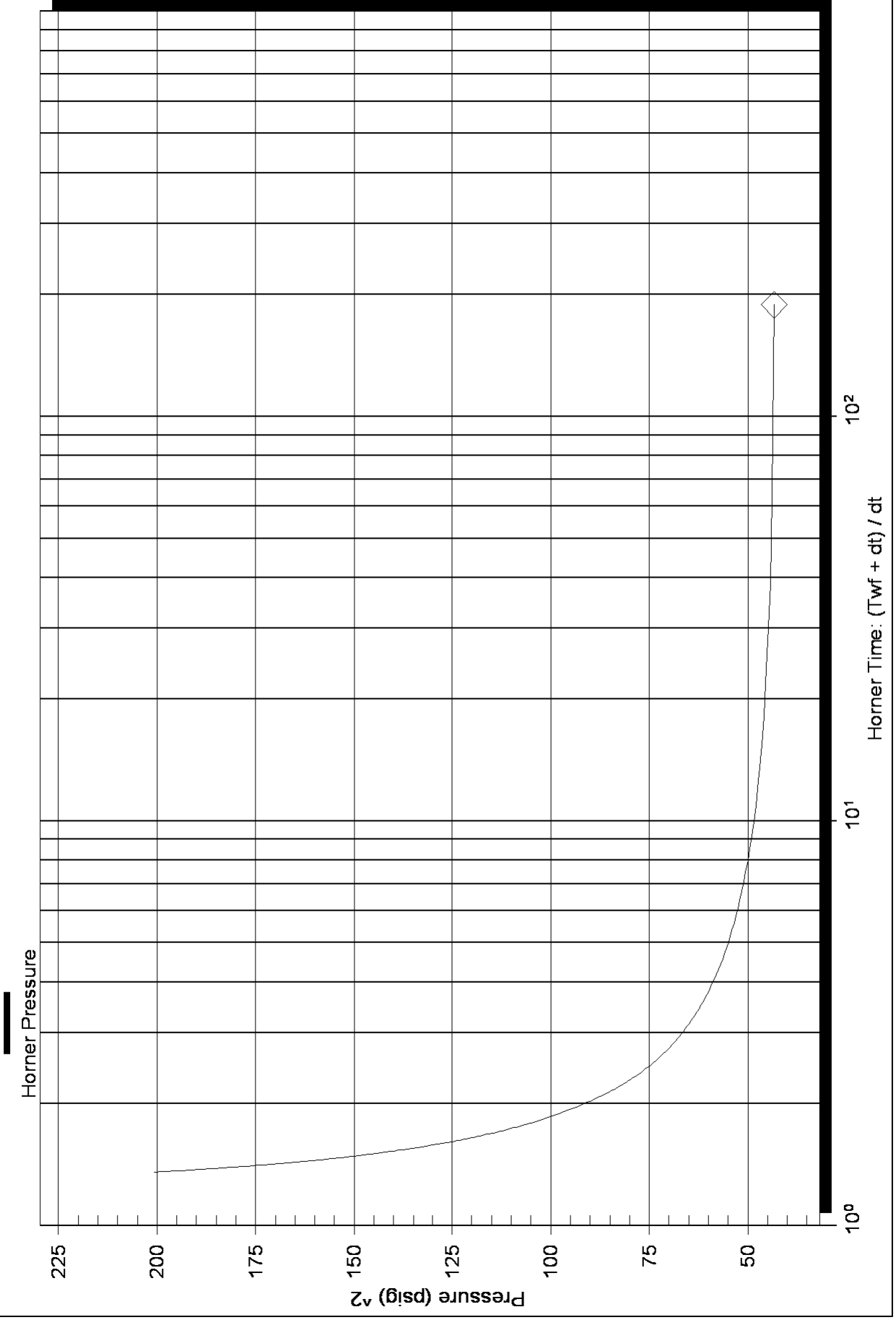
Slope (m) : kpa/log cycle

P\* :

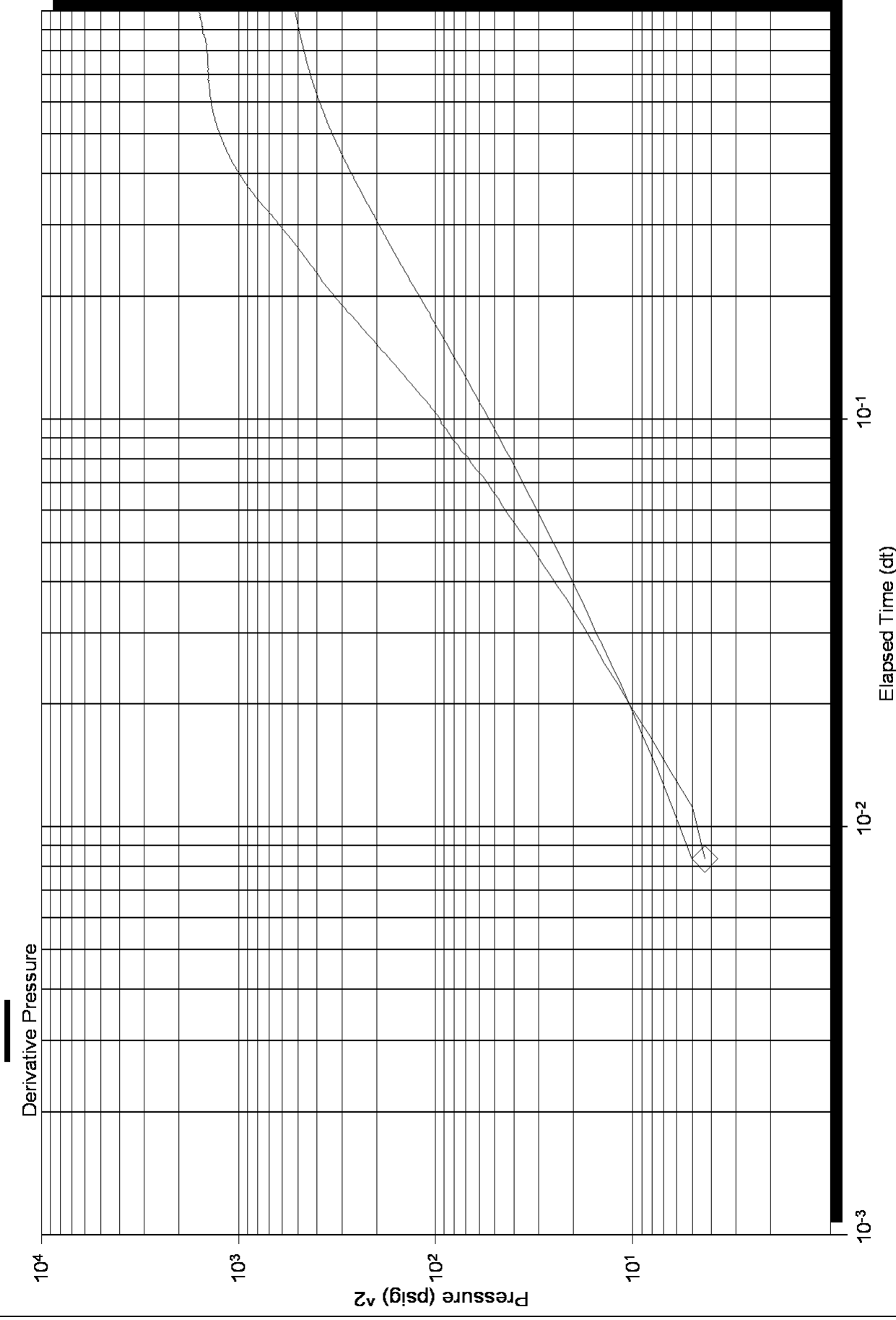
Serial Number: 8352 (Outside)

Flow Cycle: 1

### Homer Plot



# Log-Log and Pseudo-Derivative



# Log-Log and Pseudo-Log-Derivative

