

**DIAMOND TESTING, LLC**  
P.O. Box 157  
**HOISINGTON, KANSAS 67544**  
(620) 653-7550 • (800) 542-7313  
molz24dst1

Company Chieftain Oil Company, Inc. Lease & Well No. Molz No. 24  
Elevation 1386 GL Formation Misener Effective Pay      Ft. Ticket No. K163  
Date 9-1-14 Sec. 11 Twp. 35S Range 12W County Barber State Kansas  
Test Approved By David Barker Diamond Representative Jason McLemore

Formation Test No. 1 Interval Tested from 5,171 ft. to 5,204 ft. Total Depth 5,204 ft.  
Packer Depth 5,166 ft. Size 6 3/4 in. Packer Depth      ft. Size      in.  
Packer Depth 5,171 ft. Size 6 3/4 in. Packer Depth      ft. Size      in.  
Depth of Selective Zone Set      ft.

Top Recorder Depth (Inside) 5,152 ft. Recorder Number 5513 Cap. 5,000 psi.  
Bottom Recorder Depth (Outside) 5,153 ft. Recorder Number 5588 Cap. 6,000 psi.  
Below Straddle Recorder Depth      ft. Recorder Number      Cap.      psi.

Drilling Contractor Fossil Drilling, Inc. - Rig 2 Drill Collar Length 148 ft. I.D. 2 1/4 in.  
Mud Type Chemical Viscosity 54 Weight Pipe Length      ft. I.D.      in.  
Weight 9.5 Water Loss 12.0 cc. Drill Pipe Length 4,991 ft. I.D. 3 in.  
Chlorides 3,800 P.P.M. Test Tool Length 32 ft. Tool Size 3 1/2-IF in.  
Jars: Make Sterling Serial Number 6 Anchor Length 33 ft. Size 4 1/2-FH in.  
Did Well Flow? No Reversed Out No Surface Choke Size 1 in. Bottom Choke Size 5/8 in.  
Main Hole Size 7 7/8 in. Tool Joint Size 4-FH in.

Blow: 1st Open: Hit bridge 4 stands off bottom. Pulled tool.  
2nd Open: N/A

Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Remarks MISRUN!

Time Set Packer(s)      Time Started off Bottom      Maximum Temperature       
Initial Hydrostatic Pressure.....(A)      P.S.I.  
Initial Flow Period.....Minutes 0 (B)      P.S.I. to (C)      P.S.I.  
Initial Closed In Period.....Minutes 0 (D)      P.S.I.  
Final Flow Period.....Minutes 0 (E)      P.S.I. to (F)      P.S.I.  
Final Closed In Period.....Minutes 0 (G)      P.S.I.  
Final Hydrostatic Pressure.....(H)      P.S.I.



**JASON MCLEMORE**

**CELL # 620-617-0527**

**General Information**

Company Name	Chieftain Oil and Gas	Job Number	K163
Contact	Ron Molz	Representative	Jason McLemore
Well Name	Molz #24	Well Operator	Chieftain Oil and Gas
Unique Well ID	DST #1 Misener 5171-5204	Prepared By	Jason McLemore
Surface Location	11-35s-12w-Barber	Qualified By	Dave Barker
Field	Wildcat	Test Unit	6
Well Type	Vertical		

**Test Information**

Test Type	Drill Stem Test	Representative	Jason McLemore
Formation	Misener	Well Operator	Chieftain Oil and Gas
Well Fluid Type	01 Oil	Report Date	2014/09/01
Test Purpose (AEUB)	Initial Test	Prepared By	Jason McLemore

Start Test Date	2014/09/01	Start Test Time	07:46:00
Final Test Date	2014/09/01	Final Test Time	12:17:00

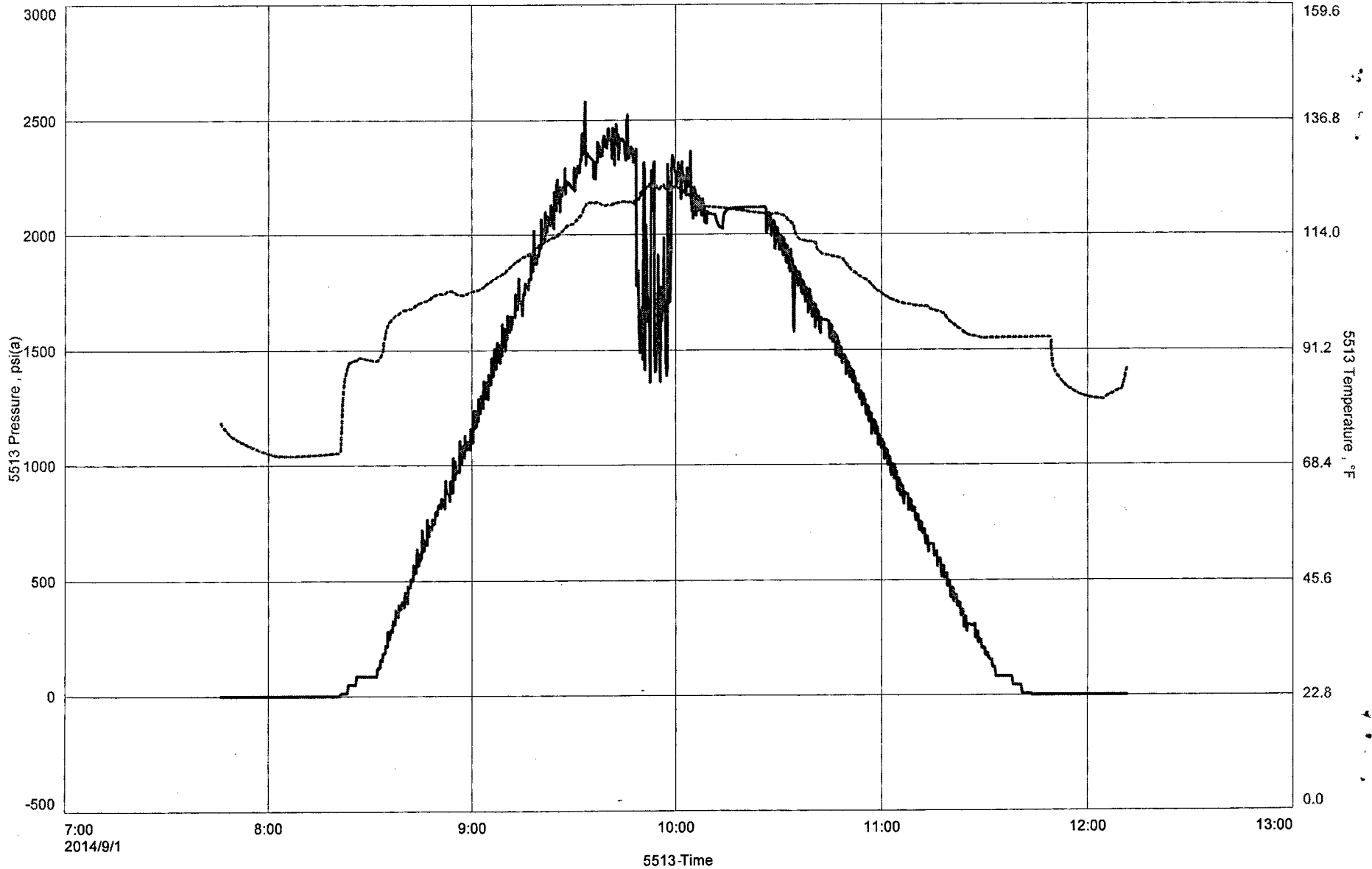
**Test Results**

Hit bridge 4 stands off bottom. Pulled tool.

Chieftain Oil and Gas  
DST #1 Misener 5171-5204  
Start Test Date: 2014/09/01  
Final Test Date: 2014/09/01

Molz #24  
Formation: Misener  
Pool: Wildcat  
Job Number: K163

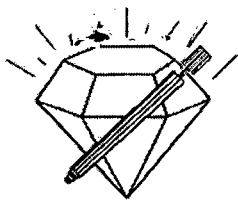
# Molz #24



# NOMENCLATURE

<b>b</b>	== Approximate Radius of Investigation .....	Feet
<b>b<sup>1</sup></b>	== Approximate Radius of Investigation (Net Pay Zone h <sup>1</sup> ) .....	Feet
<b>D.R.</b>	== Damage Ratio .....	—
<b>EI</b>	== Elevation .....	Feet
<b>GD</b>	== B.T. Gauge Depth (From Surface Reference) .....	Feet
<b>h</b>	== Interval Tested .....	Feet
<b>h<sup>1</sup></b>	== Net Pay Thickness .....	Feet
<b>K</b>	== Permeability .....	md
<b>K<sup>1</sup></b>	== Permeability (From Net Pay Zone h <sup>1</sup> ) .....	md
<b>m</b>	== Slope Extrapolated Pressure Plot (Psi <sup>2</sup> /cycle Gas) .....	psi/cycle
<b>OF<sup>1</sup></b>	== Maximum Indicated Flow Rate .....	MCF/D
<b>OF<sup>2</sup></b>	== Minimum Indicated Flow Rate .....	MCF/D
<b>OF<sup>3</sup></b>	== Theoretical Open Flow Potential with/Damage Removed Max. ....	MCF/D
<b>OF<sup>4</sup></b>	== Theoretical Open Flow Potential with/Damage Removed Min. ....	MCF/D
<b>P<sup>S</sup></b>	== Extrapolated Static Pressure .....	Psig.
<b>P<sup>F</sup></b>	== Final Flow Pressure .....	Psig.
<b>P<sup>PT</sup></b>	== Potentiometric Surface (Fresh Water*) .....	Feet
<b>Q</b>	== Average Adjusted Production Rate During Test .....	bbls/day
<b>Q<sup>1</sup></b>	== Theoretical Production w/Damage Removed .....	bbls/day
<b>Q<sup>g</sup></b>	== Measured Gas Production Rate .....	MCF/D
<b>R</b>	== Corrected Recovery .....	bbls
<b>r<sup>w</sup></b>	== Radius of Well Bore .....	Feet
<b>t</b>	== Flow Time .....	Minutes
<b>t<sup>o</sup></b>	== Total Flow Time .....	Minutes
<b>T</b>	== Temperature Rankine .....	°R
<b>Z</b>	== Compressibility Factor .....	—
<b>u</b>	== Viscosity Gas or Liquid .....	CP
<b>Log</b>	== Common Log	

\* Potentiometric Surface Reference to Rotary Table When Elevation Not Given, Fresh Water Corrected to 100° F.



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molz24dst2

Company Chieftain Oil Company, Inc. Lease & Well No. Molz No. 24  
Elevation 1386 GL Formation Misener Effective Pay      Ft. Ticket No. K164  
Date 9-1-14 Sec. 11 Twp. 35S Range 12W County Barber State Kansas  
Test Approved By David Barker Diamond Representative Jason McLemore

Formation Test No. 2 Interval Tested from 5,171 ft. to 5,204 ft. Total Depth 5,204 ft.  
Packer Depth 5,166 ft. Size 6 3/4 in. Packer Depth      ft. Size      in.  
Packer Depth 5,171 ft. Size 6 3/4 in. Packer Depth      ft. Size      in.  
Depth of Selective Zone Set      ft.

Top Recorder Depth (Inside) 5,152 ft. Recorder Number 5513 Cap. 5,000 psi.  
Bottom Recorder Depth (Outside) 5,153 ft. Recorder Number 5588 Cap. 6,000 psi.  
Below Straddle Recorder Depth      ft. Recorder Number      Cap.      psi.

Drilling Contractor Fossil Drilling, Inc. - Rig 2 Drill Collar Length 148 ft I.D. 2 1/4 in.  
Mud Type Chemical Viscosity 54 Weight Pipe Length      ft I.D.      in.  
Weight 9.5 Water Loss 12.0 cc. Drill Pipe Length 4,991 ft I.D. 3 in.  
Chlorides 3,800 P.P.M. Test Tool Length 32 ft Tool Size 3 1/2-IF in.  
Jars: Make Sterling Serial Number 6 Anchor Length 33 ft. Size 4 1/2-FH in.  
Did Well Flow? No Reversed Out No Surface Choke Size 1 in. Bottom Choke Size 5/8 in.  
Main Hole Size 7 7/8 in. Tool Joint Size 4-FH in.

Blow: 1st Open: 16 ft. of fill on bottom. Operator opted to look at it on the log. Pulled tool

2nd Open: N/A

Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of       
Recovered      ft. of     

Remarks MISRUN!

Time Set Packer(s)      Time Started off Bottom      Maximum Temperature       
Initial Hydrostatic Pressure.....(A)      P.S.I.  
Initial Flow Period.....Minutes 0 (B)      P.S.I. to (C)      P.S.I.  
Initial Closed In Period.....Minutes 0 (D)      P.S.I.  
Final Flow Period.....Minutes 0 (E)      P.S.I. to (F)      P.S.I.  
Final Closed In Period.....Minutes 0 (G)      P.S.I.  
Final Hydrostatic Pressure.....(H)      P.S.I.



**JASON MCLEMORE**

**CELL # 620-617-0527**

**General Information**

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Contact	Ron Molz	Representative	Jason McLemore
Well Name	Molz #24	Well Operator	Chieftain Oil and Gas
Unique Well ID	DST #2 Misener 5171-5204	Prepared By	Jason McLemore
Surface Location	11-35s-12w-Barber	Qualified By	Dave Barker
Field	Wildcat	Vertical Test Unit	6
Well Type			

**Test Information**

Test Type	Drill Stem Test	Representative	Jason McLemore
Formation	Misener	Well Operator	Chieftain Oil and Gas
Well Fluid Type	01 Oil	Report Date	2014/09/02
Test Purpose (AEUB)	Initial Test	Prepared By	Jason McLemore
Start Test Date	2014/09/01	Start Test Time	19:56:00
Final Test Date	2014/09/02	Final Test Time	02:00:00

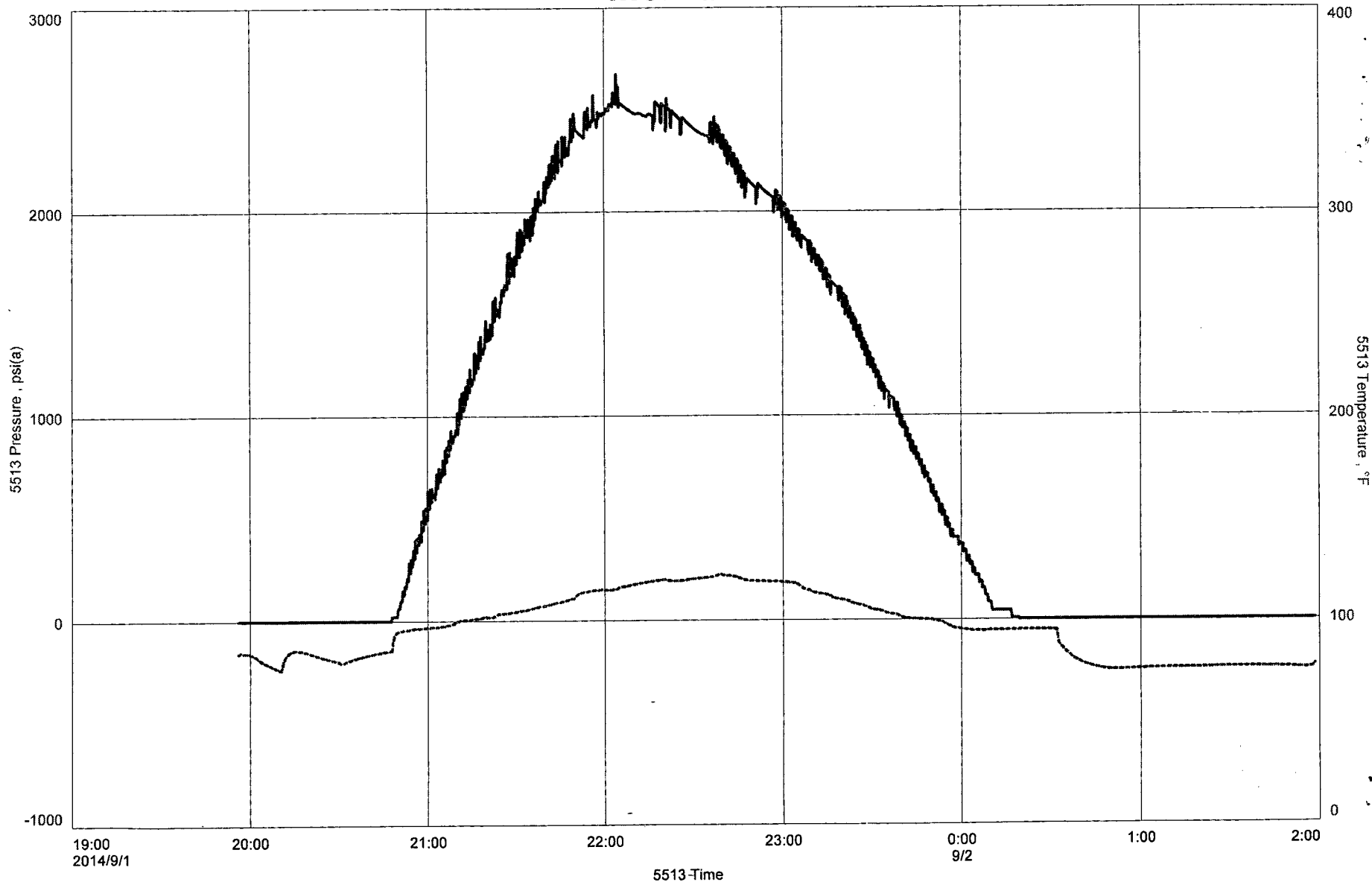
**Test Results**

16' of fill on bottom. Operator opted to look at it on the log. Pulled tool.

Chieftain Oil and Gas  
DST #2 Misener 5171-5204  
Start Test Date: 2014/09/01  
Final Test Date: 2014/09/02

Molz #24  
Formation: Misener  
Pool: Wildcat  
Job Number: K164

# Molz #24



## NOMENCLATURE

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<b>D.R.</b>	== Damage Ratio .....	—
<b>EI</b>	== Elevation .....	Feet
<b>GD</b>	== B.T. Gauge Depth (From Surface Reference).....	Feet
<b>h</b>	== Interval Tested .....	Feet
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<b>P<sup>S</sup></b>	== Extrapolated Static Pressure .....	Psig.
<b>P<sup>F</sup></b>	== Final Flow Pressure .....	Psig.
<b>P<sup>OT</sup></b>	== Potentiometric Surface (Fresh Water*) .....	Feet
<b>Q</b>	== Average Adjusted Production Rate During Test .....	bbls/day
<b>Q<sup>1</sup></b>	== Theoretical Production w/Damage Removed .....	bbls/day
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<b>Log</b>	== Common Log	

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