



**COMPENSATED
DENSITY/NEUTRON
LOG**

Company RONS OIL OPERATIONS, INC.
Well NICKELSON #15-1
Field HOLLY SOUTH EAST
County GRAHAM
State KANSAS

Company RONS OIL OPERATIONS, INC.
Well NICKELSON #15-1
Field HOLLY SOUTH EAST
County GRAHAM State KANSAS

Location: 403' FNL & 960' FEL
API #: 15-085-24131-0000
SEC 15 TWP 9S RGE 24W
Permanent Datum GROUND LEVEL Elevation 2499
Log Measured From KELLY BUSHING 5' A.G.L.
Drilling Measured From KELLY BUSHING

Other Services
DIL
Elevation
K.B. 2504
D.F. 2502
G.L. 2499

Date	4/23/17
Run Number	ONE
Depth Driller	4105
Depth Logger	4105
Bottom Logged Interval	4081
Top Log Interval	3500
Casing Driller	8 5/8" @ 304
Casing Logger	304
Bit Size	7 7/8
Type Fluid in Hole	CHEMICAL MUD
Density / Viscosity	9.0/48
PH / Fluid Loss	9.0/7.2
Source of Sample	FLOWLINE
Rm @ Meas. Temp	1.30 @ 75F
Rmt @ Meas. Temp	0.97 @ 75F
Rmc @ Meas. Temp	1.56 @ 75F
Source of Rmf / Rmc	MEASUREMENT
Rm @ BHT	0.83 @ 117F
Time Circulation Stopped	2 HOURS
Time Logger on Bottom	
Maximum Recorded Temperature	117F
Equipment Number	3802
Location	HAYS, KANSAS
Recorded By	JASON CAPPELLUCCI
Witnessed By	CHRIS BEAN

<<< Fold Here >>>

All interpretations are opinions based on inferences from electrical or other measurements and we cannot and do not guarantee the accuracy or correctness of any interpretation, and we shall not, except in the case of gross or willful negligence on our part, be liable or responsible for any loss, costs, damages, or expenses incurred or sustained by anyone resulting from any interpretation made by any of our officers, agents or employees. These interpretations are also subject to our general terms and conditions set out in our current Price Schedule.

Comments

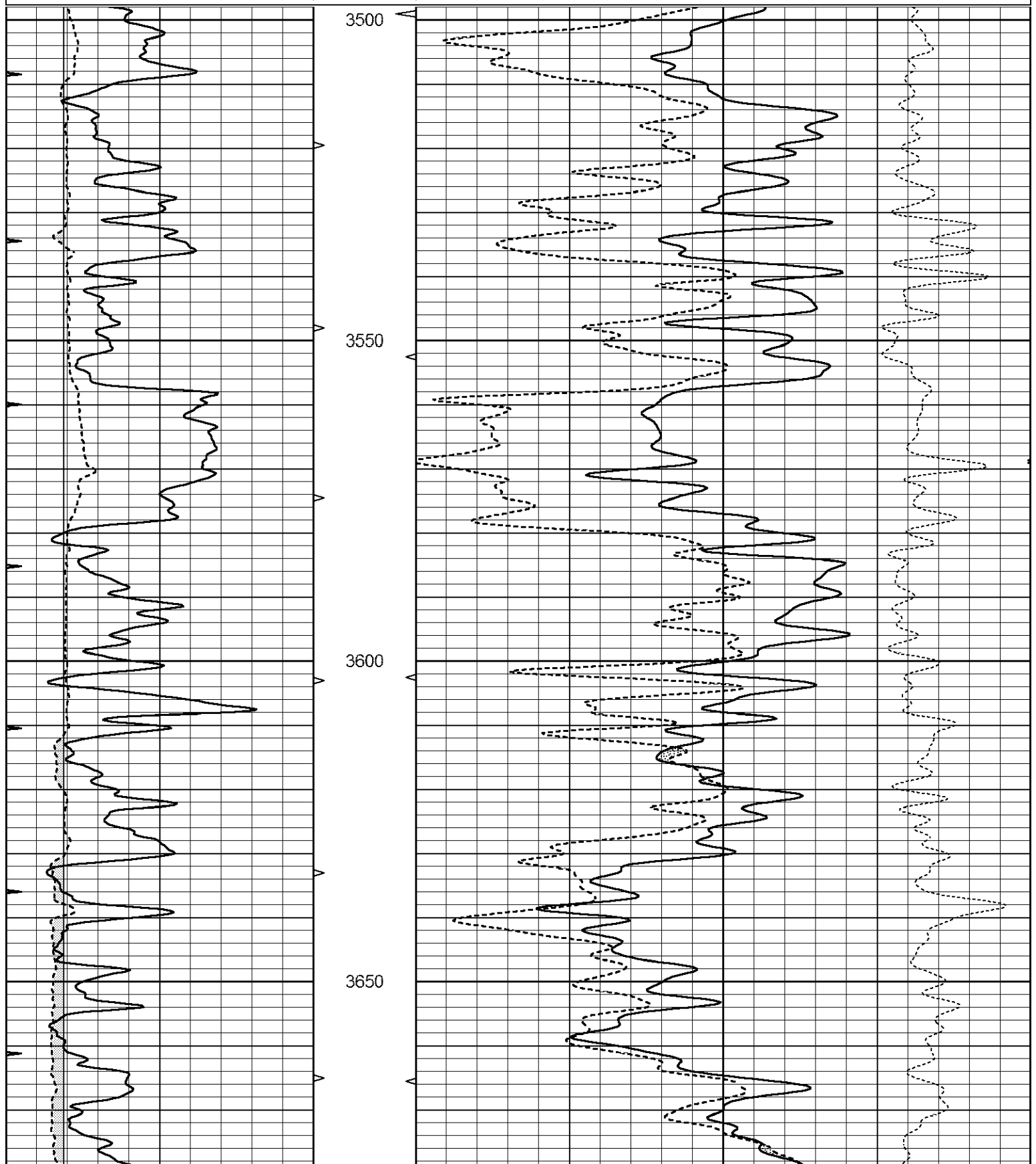
THANK YOU FOR USING ELI WIRELINE SERVICES, HAYS, KS. (785) 628-6395
DIRECTIONS
WAKEENEY, KS. - NORTH TO REDLINE RD. - 6 WEST TO 200 RD.
3 NORTH - WEST INTO

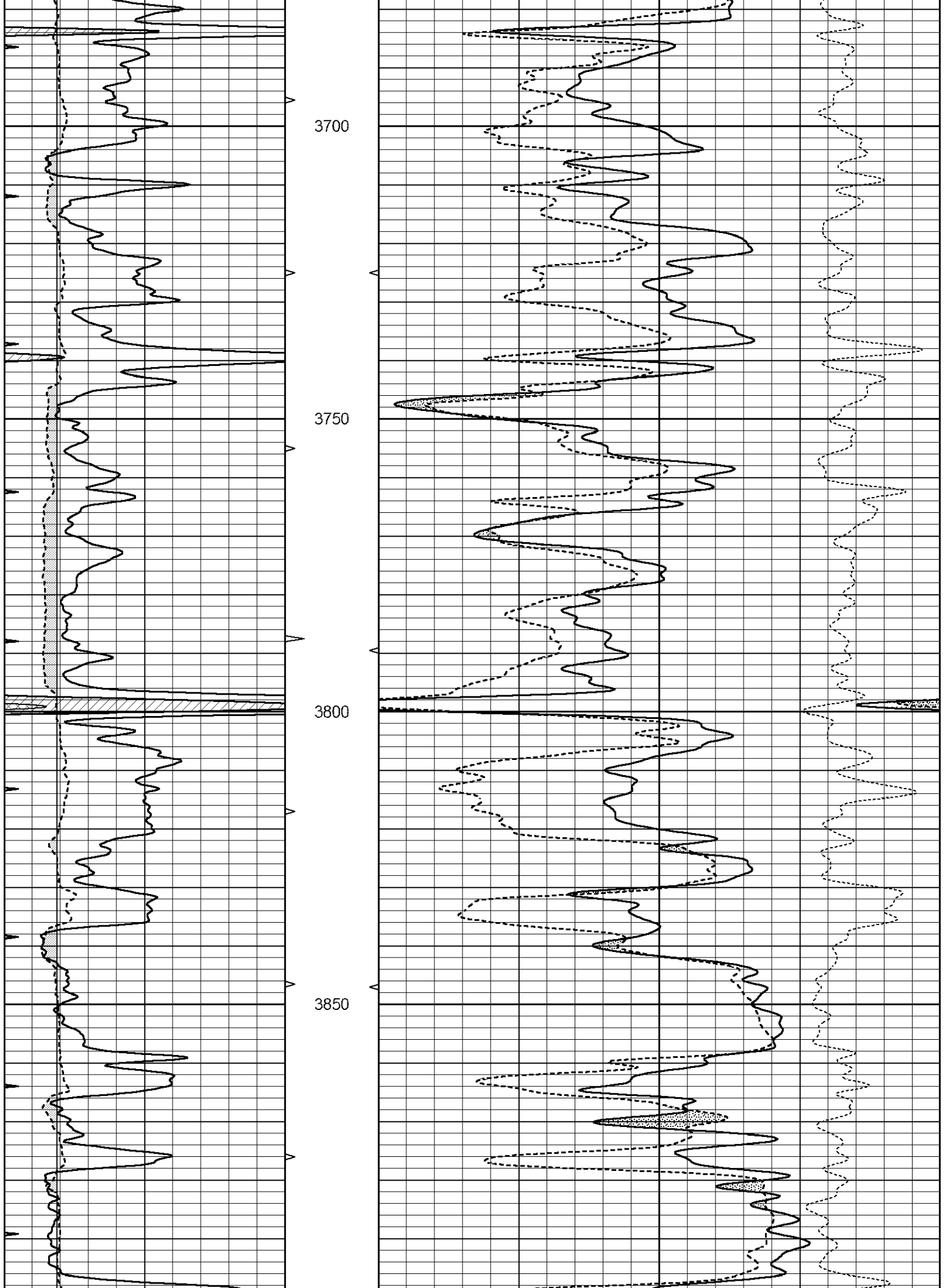


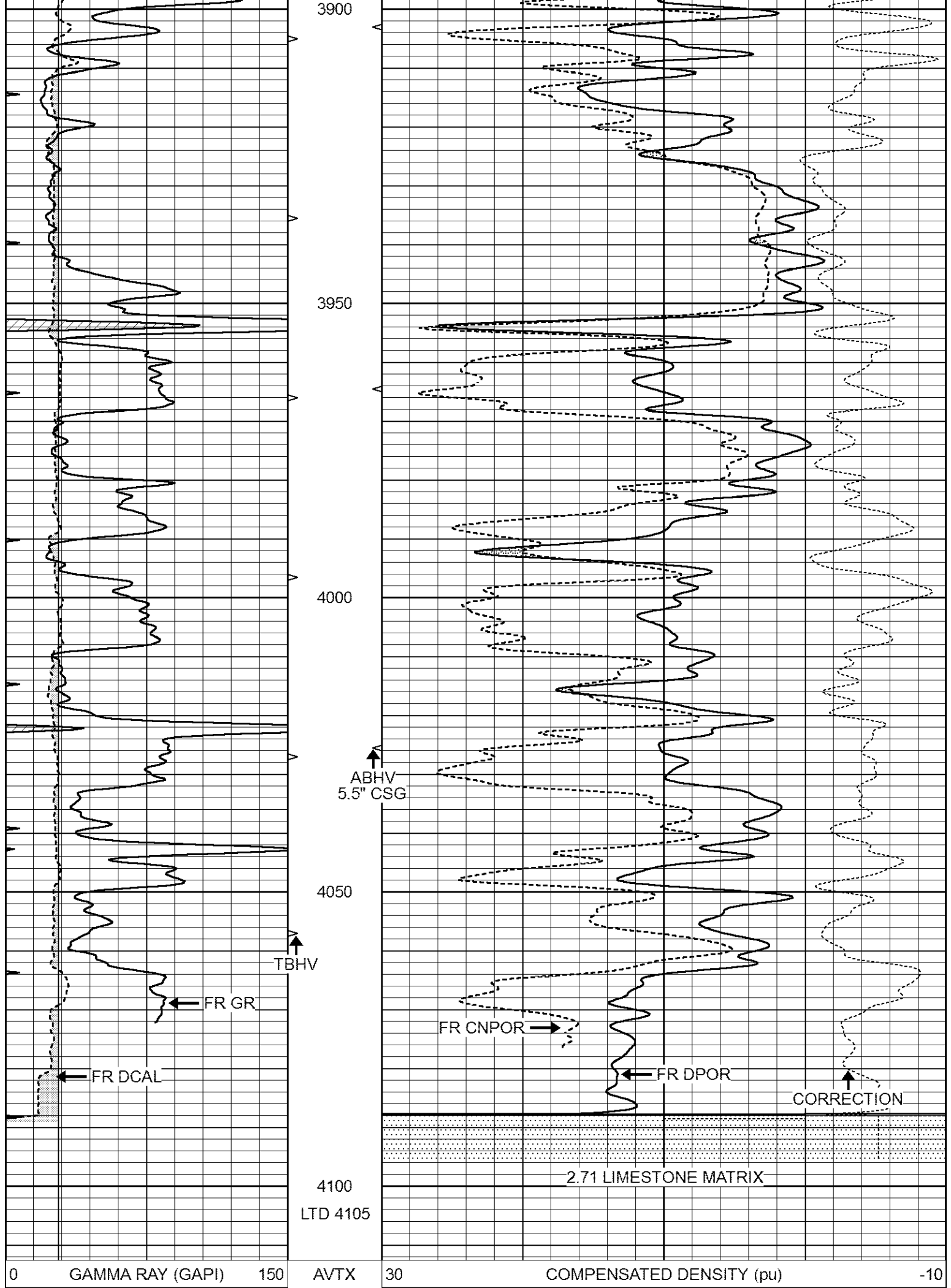
MAIN SECTION

Database File 1137ddn8.db
 Dataset Pathname pass3.1
 Presentation Format _den_neu
 Dataset Creation Sun Apr 23 07:39:58 2017
 Charted by Depth in Feet scaled 1:240

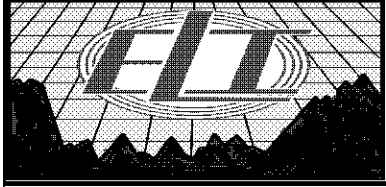
0	GAMMA RAY (GAPI)	150	AVTX	30	COMPENSATED DENSITY (pu)	-10
6	CALIPER (in)	16	10 (ft3)	0	COMPENSATED NEUTRON (pu)	-10
0	MINMK	20	BVTX		-0.25 CORRECTION (g/cc)	0.25
			0 (ft3)	10		







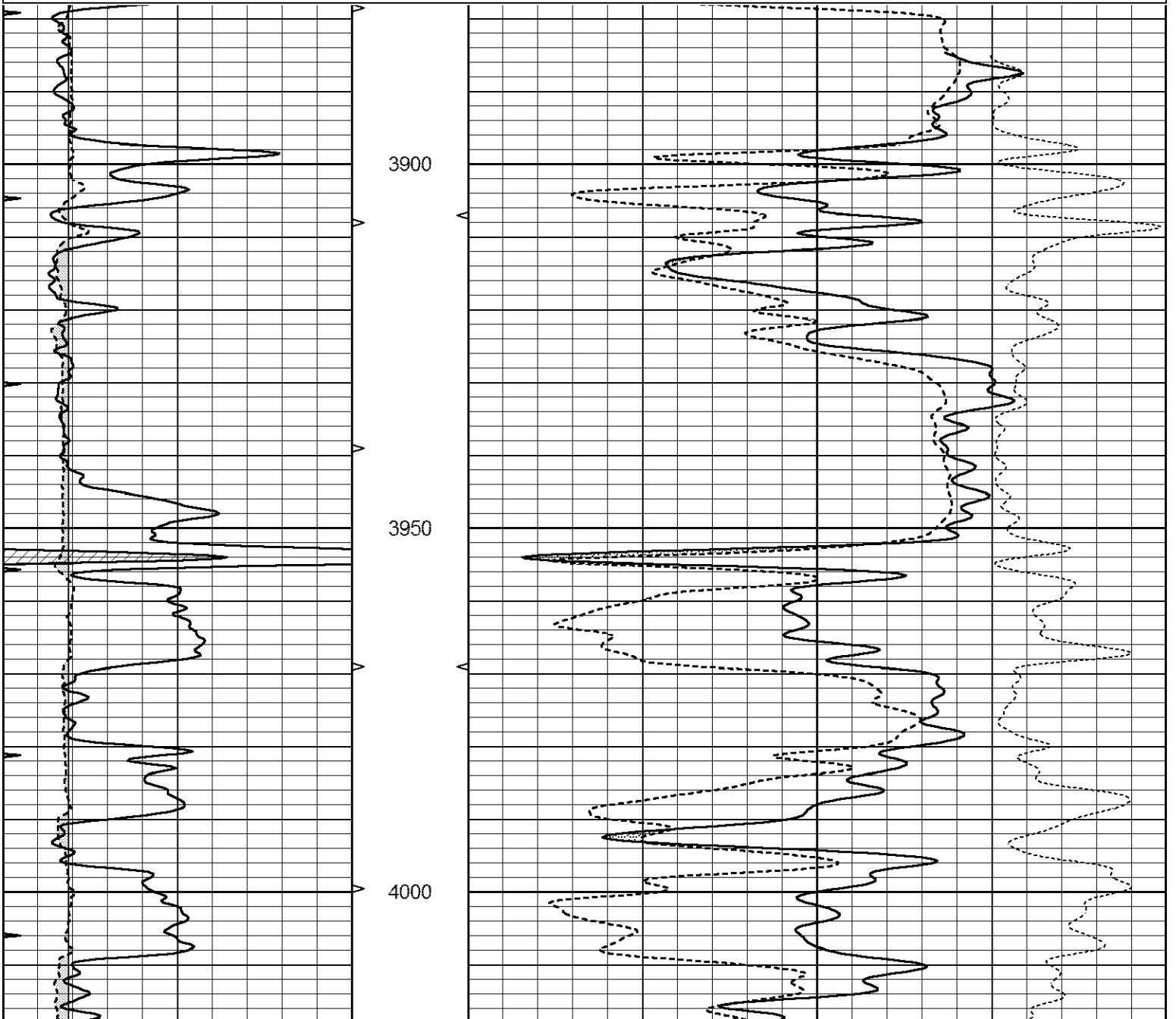
6	CALIPER (in)	16	10 (ft3)	0	30	COMPENSATED NEUTRON (pu)	-10
0	MINMK	20	BVTX			-0.25 CORRECTION (g/cc)	0.25
			0 (ft3)	10			

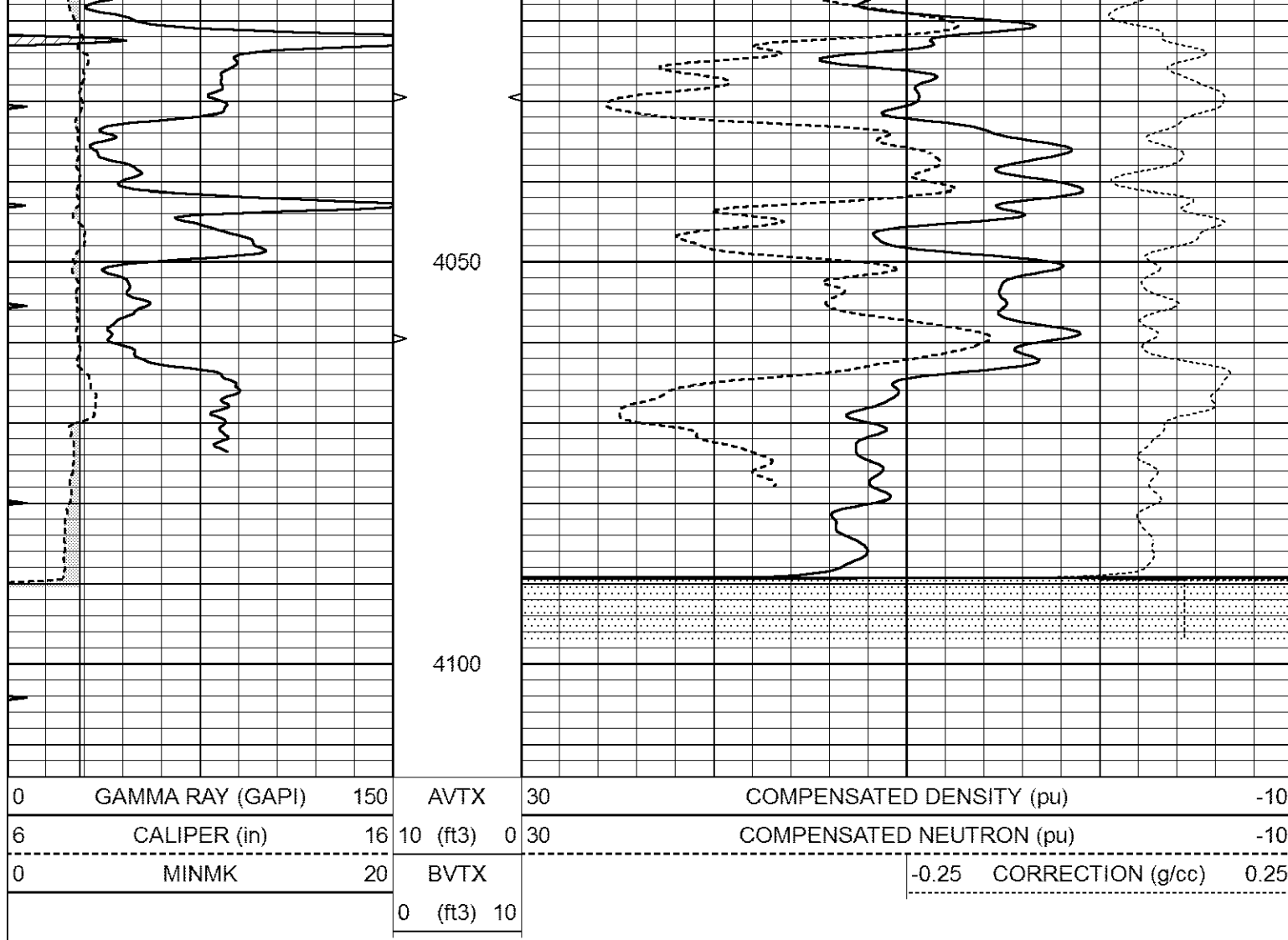


REPEAT SECTION

Database File 1137ddn8.db
 Dataset Pathname pass2.1
 Presentation Format _den_neu
 Dataset Creation Sun Apr 23 07:27:02 2017
 Charted by Depth in Feet scaled 1:240

0	GAMMA RAY (GAPI)	150	AVTX	30	COMPENSATED DENSITY (pu)	-10	
6	CALIPER (in)	16	10 (ft3)	0	30	COMPENSATED NEUTRON (pu)	-10
0	MINMK	20	BVTX			-0.25 CORRECTION (g/cc)	0.25
			0 (ft3)	10			





Calibration Report

Database File 1137ddn8.db
 Dataset Pathname pass3.1
 Dataset Creation Sun Apr 23 07:39:58 2017

Dual Induction Calibration Report

Serial-Model: FW1410-55-Probe
 Surface Cal Performed: Thu Mar 12 09:27:11 2015
 Downhole Cal Performed: Thu Mar 12 09:29:20 2015
 After Survey Verification Performed: Thu Mar 12 09:29:20 2015

Surface Calibration

Loop:	Readings			References			Results	
	Air	Loop	V	Air	Loop	mmho/m	m	b
Deep	0.011	0.656	V	1.000	400.000	mmho/m	618.595	-5.524
Medium	-0.000	0.731	V	1.000	464.000	mmho/m	632.856	1.197
Internal:	Zero	Cal		Zero	Cal		m	b
Deep	0.007	0.649	V	0.000	400.000	mmho/m	623.784	-4.595
Medium	0.004	0.743	V	0.000	464.000	mmho/m	627.284	-2.251

Downhole Calibration

Readings			References			Results	
Zero	Cal		Zero	Cal		m'	b'

Deep	-0.824	395.917	mmho/m	-0.976	397.550	mmho/m	1.004	-0.149
Medium	3.565	471.327	mmho/m	3.468	471.590	mmho/m	1.001	-0.099
LL3		7.503	V		1500.000	Ohm-m		
		0.001	V		20.000	Ohm-m		
		-7.481	V		3745.000	mmho-m		

After Survey Verification								
	Readings			Targets			Results	
	Zero	Cal		Zero	Cal		m'	b'
Deep	0.000	0.000	mmho/m	-0.824	395.917	mmho/m	1.000	0.000
Medium	0.000	0.000	mmho/m	3.565	471.327	mmho/m	1.000	0.000
LL3		0.000	Ohm-m		1500.000	Ohm-m		
		0.000	Ohm-m		20.000	Ohm-m		
		0.000	mmho-m		3745.000	mmho-m		

Litho Density Calibration Report
Serial: 140704
Model: V4_10P
Source Number: 74GBq-19

Master Calibration				Performed: Wed Feb 11 18:53:41 2015			
	Background	Aluminum		Magnesium			
Window 1	613.01	6027.40		27508.60	cps		
Window 2	48.21	1424.77		7132.66	cps		
Window 4	266.48	1373.19		5767.15	cps		
Window 5	622.07	10090.30		18937.90	cps		
Window 6	49.07	1682.84		3271.18	cps		
Window 8	298.04	3248.38		5980.58	cps		
Bulk Density	-	2.6020		1.6830	g/cc		
Pe	-	3.0000		2.5070	b/e		
LS Alpha:	: -1.8451	SS Alpha:	: -0.7542	LS CPE:		: 1.0882	
LS Beta:	: 138648.8473	SS Beta:	: 21960.9250	SS CPE:		: 1.5181	

Before Survey Background Counts Verification			Performed: Wed Dec 31 18:00:00 1969		
Window 1	0.00	cps			
Window 2	0.00	cps			
Window 4	0.00	cps			
Window 5	0.00	cps			
Window 6	0.00	cps			
Window 8	0.00	cps			

After Survey Background Counts Verification			Performed: Wed Dec 31 18:00:00 1969		
Window 1	0.00	cps			
Window 2	0.00	cps			
Window 4	0.00	cps			
Window 5	0.00	cps			
Window 6	0.00	cps			
Window 8	0.00	cps			

Lithodensity Caliper Calibration				Performed: Wed Feb 11 18:53:41 2015			
Results	Readings		References (in)		Gain	Offset	
	Low	High	Low	High			
	5123.0	9461.6	8.5	11.0	0.0	1.4	

Before Survey Caliper Verification

Performed:

Reference

Reading

Caliper (in)

After Survey Caliper Verification

Performed:

Reference

Reading

Caliper (in)

Compensated Neutron Calibration Report

Serial Number: 080621PMC
Tool Model: NABORS

PRE-SURVEY VERIFICATION

Detector	Readings	Measured	Target
Short Space	cps		
Long Space	cps	pu	pu

POST-SURVEY VERIFICATION

Detector	Readings	Measured	Target
Short Space	cps		
Long Space	cps	pu	pu

Gamma Ray Calibration Report

Serial Number: 070558
 Tool Model: Probe1
 Performed: Wed Jun 29 08:29:10 2016

Calibrator Value: 1.0 GAPI

Background Reading: 0.0 cps
 Calibrator Reading: 1.0 cps

Sensitivity: 0.3000 GAPI/cps