217-22655

Tucker WIRELINE SERVICES

COMPENSATED NEUTRON PEL DENSITY LOG

File No. : TUL-56632
Company : RUNNING FOXES PETROLEUM INC.
Well : EMMERSON #4-6A
Field :
County : VERNON
State : MISSOURI
Country : USA

Location : PERMIT #22655
330' FNL & 1239' FWL

Sect : 06 Twp : 36N Rge : 33W

RECEIVED
JUN 20 2011
Mo Oil & Gas Council

6/8/12

Recorded By : R. FRANKLIN
Witnessed By : C. COUNTS

Date : DEC 09 2010
Run No. : 1

Elevations :
KB :
DF :
GL : 877.00 FT

Permanent Datum : GL
Drilling Measured From : GL
Log Measured From : GL
Above Permanent Datum : 0.000 FT

Depth--Driller : 441.0 FT
Depth--Logger : 440.0 FT
Bottom Log Interval :
Top Log Interval :

Casing Depth--Driller : 20.0 FT
Casing Depth--Logger : 20.0 FT
Casing Diameter : 8.625 IN

Bit Size :
Unit No. :
Location : TUL SA

Additional Services
PIT

The customer is hereby warned that by providing the log data herein, T. W. S. does not agree to provide any interpretation of log data, conversion of log data to physical rock parameters or recommendations. T. W. S. does not guarantee or warrant either expressly or impliedly, the accuracy of any interpretation of log data, conversion of log data to physical rock parameters or recommendations which may be given by T. W. S. personnel. Any interpretation, conversion or recommendation is not part of the consideration for the agreement between the parties and is not part of any part of the charge by T. W. S. for its services. Any user of the log data is warned that said user is not entitled to rely on intepretations, conversions or recommendations as aforesaid.

Run Number 1

Depth To Fluid : 0.0 FT
Fluid Type In Hole : FRESH / NATIVE
Density : 0.000 SG
Viscosity : 0.000 SEC
pH : 0.000
Fluid Loss : 0.000
Salinity : 0.000 KPPM

RM Source : MEASURED
RM : 10.000 OHMM at 40 F
RM at BHT : 6.100 OHMM at 70 F

RMF Source : CALCULATED
RMF : 8.500 OHMM at 40 F
RMF at BHT : 5.180 OHMM at 70 F

RMC Source : CALCULATED
RMC : 11.500 OHMM at 40 F
RMC at BHT : 7.000 OHMM at 70 F

Max Recorded Temp. : 70 F
Time Circulation Stopped :
Operating Rig Time, Hrs. : 1.5

- Source Serial Numbers -

Gamma 2991GW
Neutron N-1046

- Sonde Serial Numbers -

GRTB GRT-BC-41
CNT CNP-AA-112
LDTNG LDP-DA-66
PIT_B PIT-CA-069

Casing Strings

Size (IN)	Weight (LB/FT)	Bottom (FT)
8.625	24.00	20.00

- Comments -

ALL PRESENTATIONS AS PER CUSTOMER REQUEST.

GRT, CNT, LDT, AND PIT RUN IN COMBINATION.
CALIPERS ORIENTED ON THE X-Y AXIS.
PHIN IS CALIPER CORRECTED.
2.71 G/CC USED TO CALCULATE POROSITY.
ANNULAR HOLE VOLUME CALCULATED USING 2.875" PRODUCTION CASING.

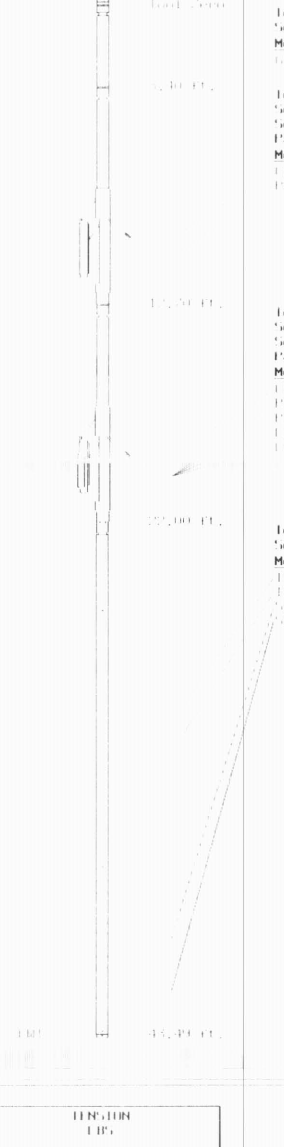
GRT: GRP.
CNT: CLCNIN, PHIN, PHINLS.
LDT: PERL, LCDEN, PECLN, CLLDIN, LDENN, PORLLS.
PIT: ILD, ILM, CIRD, SFLAEC, SPU.

OPERATORS:
S. DAVIS
M. GARNER

THANK YOU FOR USING TUCKER WIRELINE SERVICES!

Tool String Schematic

Total Tool Length 43.49 ft.
Maximum Outside diameter 4.00 in.
Net Weight in Air 343.00 lbs.



Measure Point	Stack Offset	Tool Offset	Bottom Offset
GRP	2.00	2.00	41.49

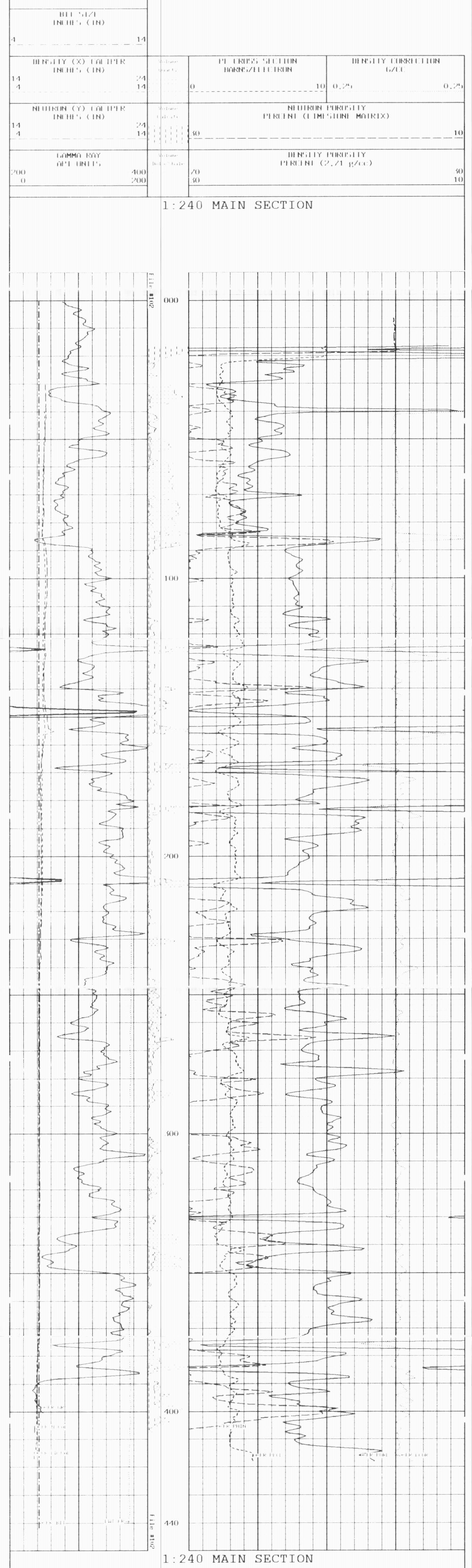
Measure Point	Stack Offset	Tool Offset	Bottom Offset
FFDN	9.40	6.00	34.09
FNDN	10.24	6.84	33.25

Measure Point	Stack Offset	Tool Offset	Bottom Offset
FFLD	18.70	6.00	24.79
PEL	19.70	7.00	23.79
PES	20.10	7.40	23.39
FDHD	19.70	7.00	23.79
FDHP	19.70	7.00	23.79

Measure Point	Stack Offset	Tool Offset	Bottom Offset
ILD	30.99	8.99	12.50
ILM	32.10	10.10	11.39
SFLU	39.49	17.49	4.00
SP	42.60	20.60	0.88

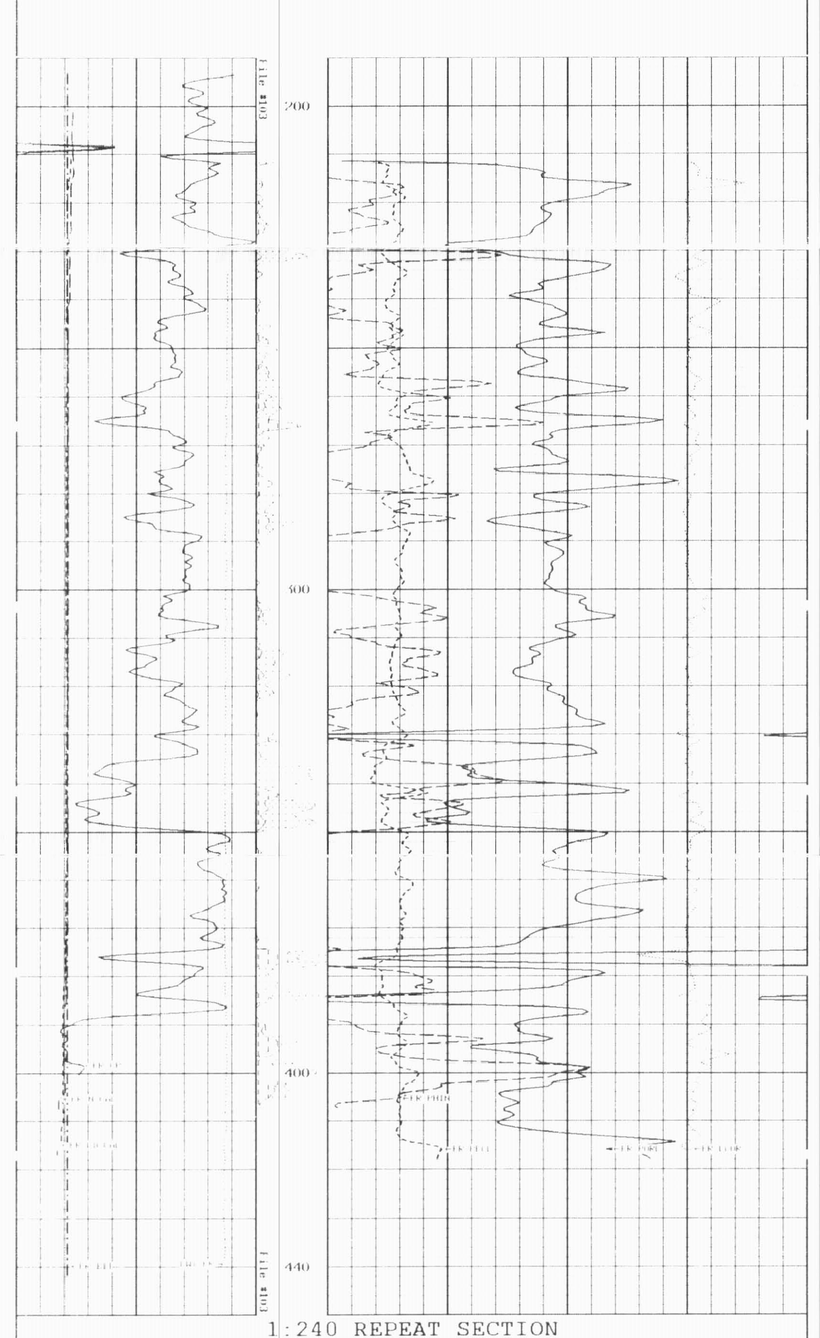
TENSION LBS 10000 0
BIT SIZE INCHES (IN) 4 14
DENSITY (X) CALIPER INCHES (IN) 14 24 / 4 14
NEUTRON (Y) CALIPER INCHES (IN) 14 24 / 4 14
GAMMA RAY API UNITS 200 400 / 0 200
PE CROSS SECTION BARNS/ELECTRON 0 10
DENSITY CORRECTION G/CC 0.25 0.25
NEUTRON POROSITY PERCENT (LIMESTONE MATRIX) 30 10
DENSITY POROSITY PERCENT (2.71 g/cc) 70 30 / 30 10

1:240 MAIN SECTION



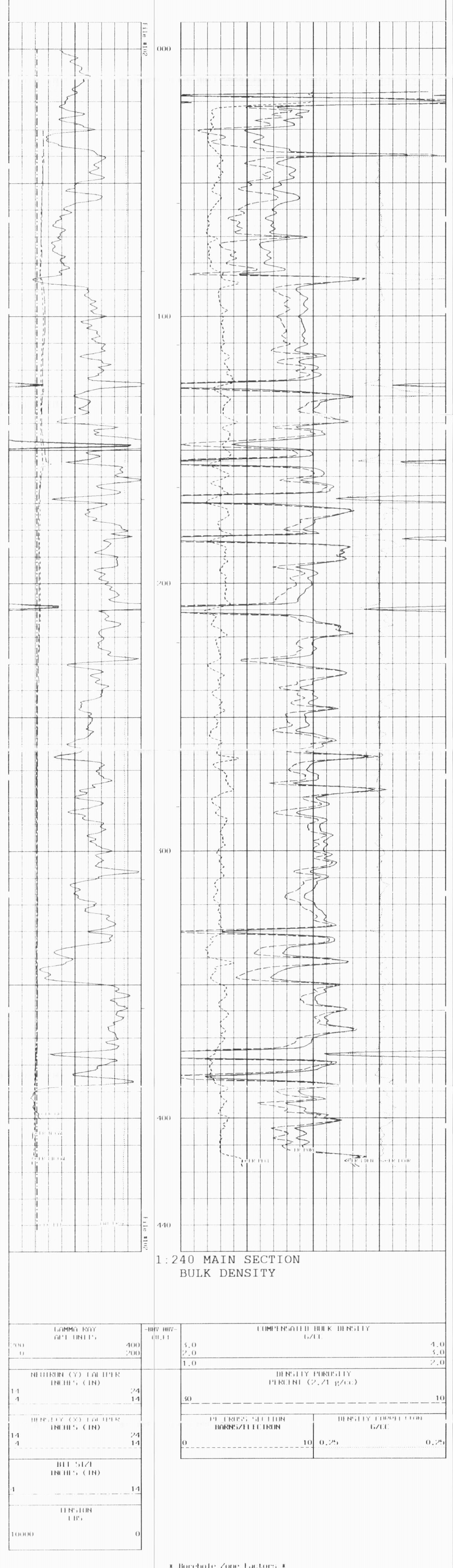
1:240 MAIN SECTION

1:240 REPEAT SECTION



1:240 REPEAT SECTION

1:240 MAIN SECTION
BULK DENSITY



1:240 MAIN SECTION
BULK DENSITY

GAMMA RAY API UNITS 200 400 / 0 200
COMPENSATED BULK DENSITY G/CC 3.0 4.0 / 2.0 3.0 / 1.0 2.0
NEUTRON (Y) CALIPER INCHES (IN) 14 24 / 4 14
DENSITY POROSITY PERCENT (2.71 g/cc) 30 10
DENSITY (X) CALIPER INCHES (IN) 14 24 / 4 14
PE CROSS SECTION BARNS/ELECTRON 0 10
DENSITY CORRECTION G/CC 0.25 0.25
BIT SIZE INCHES (IN) 4 14
TENSION LBS 10000 0

* Borehole Zone Factors *

Zone 1 99999.0 to 0.0 ft
Limestone

* Calibration Summary *

Shop Calibration GRTB
Shop Calibration CNT
Shop Calibration LDTNG