

Jeff Christian

PETROLEUM GEOLOGIST

Wichita, Kansas

GEOLOGIST'S REPORT

DRILLING TIME AND SAMPLE LOG

OPERATOR MURFFIN DRILLING COMPANY

LEASE DORIS #1-22

LOCATION 430' FSL & 2200' FEL

SEC. 22 TWP. 4 S. RNG. 31 W.

COUNTY RAWLINS STATE KANSAS

FIELD DAISY API 15-153-2028

CONTRACTOR DRILLING STARTED 07/13/2013 COMPLETED 07/20/2013

MUD DISPLACED 3431' DRILLING TIME KEPT FROM 3640' SAMPLES EXAMINED FROM 3640' GEOLOGICAL SUPERVISION FROM 3620'

RIG NO. 2 MUD TYPE CHEMICAL

RTD TO RTD TO RTD

ON/OFF

ELECTRICAL SURVEYS: DIPOLER:

MEI BICS

REMARKS

Surface 8.5/8' @ 225' Production SWOW

GL 22008' MEASUREMENTS FROM KB

ELEVATIONS KB 2219'

RECOVERY: 103' total fluid

IFP: 38-51# FSIP: 1295#

IHP: 2009# FHP: 1863#

BHT: 119 deg. F

Pipe Strap @ 3995': 3.21' strap short dev. 3/4 deg.

DST # 2 3992' to 3995'

30°-60°-30°-60°

IF: Blow Built to 1 1/4"

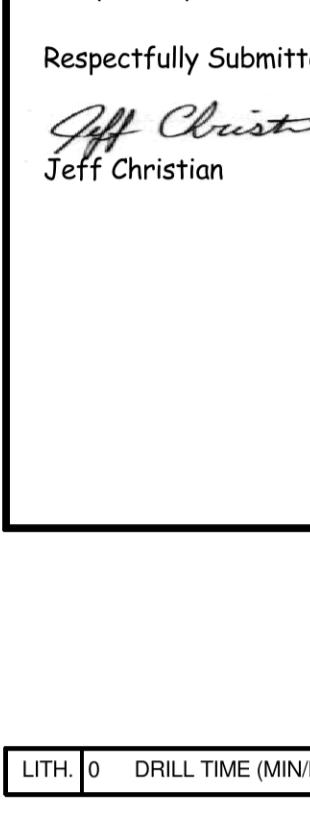
RECOVERY: 53' total fluid

IFP: 21-33# ISIP: 1303#

FIP: 19-35# FSIP: 1236#

IHP: 1919# FHP: 1863#

RTD: 119 deg. F



DATE	7:00 AM DEPTH	REMARKS
7/13/13	MIRT	SPUD 3:45 pm; DO plug @ 3:30 am
7/14/13	660'	DRLG dev. 3/4 deg. @ 225'
7/15/13	2905'	DRLG
7/16/13	3841'	DRLG
7/17/13	4014'	CFS
7/18/13	4035'	THI after DST # 3
7/19/13	4180'	TOH for DST # 5
7/20/13	4475'	DRLG RTD 4538' @ 11:30 am dev. 3/4 deg. FINISHED LOGGING @ 8:30 pm

