

APR NO. 15- 063-21,414

Form ACO-1 (7-91)

Operator Name National Petroleum Reserves, Inc Lease Name Ziegenbalg Well # 2Sec. 1 Twp. 15S Rge. 30☐ East
☒ WestCounty Gove

INSTRUCTIONS: Show important tops and base of formations penetrated. Detail all cores. Report all drill stem tests giving interval tested, time tool open and closed, flowing and shut-in pressures, whether shut-in pressure reached static level, hydrostatic pressures, bottom hole temperature, fluid recovery, and flow rates if gas to surface during test. Attach extra sheet if more space is needed. Attach copy of log.

Drill Stem Tests Taken ☒ Yes ☐ No
(Attach Additional Sheets.)Samples Sent to Geological Survey ☐ Yes ☒ NoCores Taken ☐ Yes ☒ NoElectric Log Run ☒ Yes ☐ No
(Submit Copy.)

List All E.Logs Run:

☐ Log Formation (Top), Depth and Datum ☐ Sample

Name	Top	Datum
Anhydrite	2044	+584
Heebner	3650	-1022
Toronto	3672	-1044
Lansing	3688	-1060
Marmaton	4036	-1408
Myrick Station	4154	-1526
Ft. Scott	4187	-1559
Miss. Lm.	4285	-1657
Miss. Dol.	4317	-1689

CASING RECORD

☐ New ☒ Used

Report all strings set-conductor, surface, intermediate, production, etc.

Purpose of String	Size Hole Drilled	Size Casing Set (In O.D.)	Weight Lbs./Ft.	Setting Depth	Type of Cement	# Sacks Used	Type and Percent Additives
Surface	12 1/4"	8 5/8"	20#	281'	common	195	2% cc 3%
Production	7 7/8"	5 1/2"	12#	4350'	60/40 poz	410	2% cc 3% gel

ADDITIONAL CEMENTING/SQUEEZE RECORD

Purpose:	Depth Top Bottom	Type of Cement	#Sacks Used	Type and Percent Additives
☐ Perforate				
☐ Protect Casing				
☐ Plug Back TD				
☐ Plug Off Zone				

Shots Per Foot	PERFORATION RECORD - Bridge Plugs Set/Type Specify Footage of Each Interval Perforated	Acid. Fracture, Shot, Cement Squeeze Record (Amount and Kind of Material Used)	Depth
2	4162-69	2000 gal 15% DSFE	4169

TUBING RECORD	Size	Set At	Packer At	Liner Run
	2 7/8"	4178'	none	☐ Yes ☒ No

Date of First, Resumed Production, SWD or Inj.	Producing Method
12-10-91	☐ Flowing ☒ Pumping ☐ Gas Lift ☐ Other (Explain)

Estimated Production Per 24 Hours	Oil Bbls.	Gas tscm	Water Bbls.	Gas-Oil Ratio	Gravity
	63		2		38

Disposition of Gas:

☐ Vented ☐ Sold ☒ Used on Lease
(If vented, submit ACO-18.)

METHOD OF COMPLETION

☐ Open Hole ☒ Perf. ☐ Dually Comp. ☐ Commingled
☐ Other (Specify) _____

Production Interval

4162-4169