

ENERVEST OPERATING, LLC

Jicarilla Apache Tribal 125 # 17 (As Completed)

TYPE	Dakota/Gallup	RIG	TBD	DATE	17-Dec-2013
FIELD		COUNTY	Rio Arriba	ELEVATION	7085'
GAS/OIL	Gas/Oil	MUD	LSND	BHT/BHP	166 deg- 1757 psi
LOCATION	737' FNL & 1032' FWL Unit D, Sec 25, T25N, R4W			Lat: 36.37600, Long: 107.20942 (NAD 83)	

COMMENTS: OBJECTIVE FORMATION: Dakota

NOTES: Vertical hole, no directional tools were run. Totco surveys only

				DEPTH					
				TVD					

Surface Section

12 1/4" Hole >
9-5/8", 36#, J-55, LT&C

525'

Cement to surface

Production Section

7 7/8" Hole to TD

Tubing:

Prod Tbg; 2 3/8" 4.7 # J-55 tbg set @ 7944'

TAC @ 6507'

SN @ 7874'

4' perf sub

2 jts 2 3/8" MA

Bull plug

Rods/pump:

1 1/4" x 26' polish rod w/ 14' liner

112- 7/8" guided rods

189 - 3/4" guided rods

12 - 1 1/2" sinker bars

2" x 1 1/2" x 20' RWBC pump

1" x 6' dip tube

Ojo Alamo >

2898'

2933'

< < Stage Collar Cementing Tool

Kirtland >

3144'

Fruitland Coal >

3349'

Pictured Cliffs >

3435'

Lewis Shale >

3519'

Csg Marker Jt @ 5174'-5194'

Chacra >

4328'

4836'

< < Stage Collar Cementing Tool

Cliffhouse >

5098'

Menefee >

5144'

Point Lookout >

5628'

Mancos >

5773'

Mancos (Regulatory) >>

6128'

Gallup >

6772'

Greenhorn >

7567'

Graneros Shale >

7629'

Dakota >

7655'

Upper Dakota; 12-2-13; perms: 7658-7757'; 23 holes. Acid bd and balls. Frac with 118000 gal 2% KCl slickwater and 96864# 20/40 mesh sand @ 50 bpm.

Lower Dakota; 12-2-13; perms: 7795-7858, 30 holes. Acid b/d and balls. Frac with 134000 gal 2% KCl slickwater and 110236# 20/40 sand @ 60 bpm.

Stage 3: 10 bbl spacer, Lead of 914 cu ft, 429 sx Premium Lite + 3% CaCl2 + 0.25 pps Cello Flake + 5 pps LCM-1 + 8% gel+ 0.4% SMS + 0.4% FL-52A @ 12.1, yld 2.13 and Tail of 69 cu ft, 50 sx Type III + 1% CaCl2+ 0.25 pps Cello Flake + 0.2% FL-52A @ 14.6 ppg, yld 1.38. 25 bbl cmt returns

Stage 2: 10 bbl spacer, Lead of 577 cu ft, 271 sx Premium Lite + 3% CaCl2 + 0.25 pps Cello Flake + 5 pps LCM-1 + 8% gel+ 0.4% SMS + 0.4% FL-52A @ 12.1, yld 2.13 and Tail of 69 cu ft, 50 sx Type III + 1% CaCl2+ 0.25 pps Cello Flake + 0.2% FL-52A @ 14.6 ppg, yld 1.38. 25 bbl cmt returns

Stage 1: 30 bbl Seal Bond +, 1060 cu ft, 525 sx Premium Lite HS FM + 0.3% R-3+ 2% KCl+ 0.25 pps Cello-Flake+ 0.3% CD-32+ 5 pps LCM-1+ 1% FL-52A @ 12.5 ppg, 2.02 yld 20 bbl cmt returns

Logs: Quad Combo w/ Dipole sonic
28 rotary sidewall cores in Gallup and Dakota

RCVD JAN 23 '14
OIL CONS. DIV.
DIST. 3

4-1/2", 11.6#, N-80 LT&C - Surface to 7998'

TD = 7999'

FC = 7955'

PBTD = 7968' CBL log depth

AFE #	CO-1303-256	REGULATORY	Bart Trevino	(713) 495 5355
EV #	37308.001	ENGINEER	R Trueheart / L Diede	(713) 495 1561 / (505) 334 8867
API #	30-039-31185	GEOLOGIST	G Kowalczyk	(713) 495 6590

AV