

UNITED STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT

1. Type of Well GAS	5. Lease Number SF-079266
2. Name of Operator MERIDIAN OIL	6. If Indian, All. or Tribe Name
3. Address & Phone No. of Operator PO Box 4289, Farmington, NM 87499 (505) 326-9700	7. Unit Agreement Name
4. Location of Well, Footage, Sec., T, R, M 1500' FSL, 1800' FWL Sec.26, T-26-N, R-6-W, NMPM	8. Well Name & Number Vaughn #12
	9. API Well No.
	10. Field and Pool Basin Dakota
	11. County and State Rio Arriba Co, NM

<u>  x  </u>	Notice of Intent	<u>      </u>	Abandonment	<u>      </u>	Change of Plans
		<u>      </u>	Recompletion	<u>      </u>	New Construction
<u>      </u>	Subsequent Report	<u>      </u>	Plugging Back	<u>      </u>	Non-Routine Fracturing
		<u>      </u>	Casing Repair	<u>      </u>	Water Shut off
<u>      </u>	Final Abandonment	<u>      </u>	Altering Casing	<u>      </u>	Conversion to Injection
		<u>  x  </u>	Other -Add Mesa Verde & commingle		

It is intended to open the Mesa Verde formation and commingle with the Dakota in this well. Commingling application is being made with the New Mexico Oil Conservation Division. Commingling will not occur until at least three months after Mesa Verde production data is acquired. After this three month test, an allocation formula will be submitted for approval. Attached is the proposed procedure and wellbore diagram.

**RECEIVED**  
APR 28 1993  
OIL CONT. DIV.  
DIST. 3

RECEIVED  
SLM  
JUL 20 01 3: 01  
GOVERNMENT OF INDIA

Date 223 1993

**NMOC**

**Vaughn # 12**  
**Mesaverde Completion Procedure & Commingle with Dakota**  
**T26NR06WSec26K**

---

Prior to Moving on Location. Comply with all BLM, NMOCD, & MOI rules and regulations. Verify Commingle Application Approval. Dig Reserve & Blow Pit. Install & Test Rig Anchors. **Always Hold Safety Meetings.**

---

1. Move on Location. Blow down 2-3/8" tubing. ND WH. NU BOP & Test rams. TIH & tag fill. TOOH w/2-3/8". Spot Six (6) - 400bbl tanks & Fill w/ filtered 2% KCl water.
2. w/wireline Run 4-1/2" 11.6# gauge ring to 5400'. Note DV @ 5408'. PU 4-1/2" RBP & PKR combination on 2-3/8" tubing. TIH & set RBP @ 5350'. Dump 1 sx sand on RBP down tubing. Fill hole w/ 2% KCl water. Pressure Test tubing to 3800psi. Test RBP & casing in two stages # 1 to 2000 psi. Hold 5 min, then # 2 to 3800 psi. Hold & record pressure for 10 min. TOOH.
3. Run GR-CCL-CBL from 5350' to surface. Assure bond from 5350' to 4950'. Advise Engineering.
4. NU Treesaver. Test Casing & WH to 3800 psi. ND Treesaver.
5. w/ wireline. Perforate First Stage with 3-1/8" HSC select fire (Owen 10gr charge, 0.38" Dp, Lp 17"). Perforate bottom up underneath a packoff as follows 19 holes 1 SPF @:  
  
5226', 5228', 5230', 5232', 5234', 5236', 5238', 5240', 5262', 5264', 5273', 5275', 5284', 5286',  
5288', 5290', 5334', 5336', 5338' Correlate perms w/ attached GR log section.
6. TIH with PKR on 2-3/8". Set PKR 150' above perforations. Breakdown perforations with 400 gallons 15% HCl inhibited acid(surf 1gal/1000) & 50 bbls (2100gal) of filtered 2% KCl at 6 to 8 BPM. Ball-off with 38 7/8" RCN 1.1 spec grav ball sealers. Unseat PKR. Knock balls off perforations. TOOH.
7. With Treesaver installed. Frac First Stage as per attached schedule. 35 BPM 1ppg to 2ppg stages with 133,900 gal 70Q foam, 30# linear gel, & 121,000# 20/40 Arizona sand. Flush with 2% KCl water. Max pressure 3800 psi. Strip out w/ Treesaver under pressure. Shut Blind rams. ND Treesaver.
8. w/ lubricator, run 4-1/2" RBP. Set RBP @ 5210'. Dump 1 sx sand on RBP.
9. Fill hole. Should be full because of liquid flush. w/ Treesaver test 4-1/2" casing & RBP to 3800 psi. Hold & record pressure 10 min.
10. w/ wireline. Perforate Second Stage with 3-1/8" HSC select fire (Owen 10gr charge, 0.38" Dp, Lp 17"). Perforate bottom up under a packoff as follows 17 holes 1 SPF @:  
  
5116', 5118', 5120', 5122', 5124', 5129', 5131', 5133', 5135', 5166', 5168', 5170', 5176', 5178',  
5182', 5184', 5186' Correlate perms w/ attached GR log section.
11. TIH with PKR on 2-3/8". Set PKR 150' above perforations. Breakdown perforations with 400 gallons 15% HCl inhibited acid(surf 1gal/1000) & 50 bbls (2100gal) of filtered 2% KCl at 6 to 8 BPM. Ball-off with 34 7/8" RCN 1.1 spec grav ball sealers. Unseat PKR. Knock balls off perforations. TOOH.

12. With Treesaver installed. Frac Second Stage as per attached schedule. 35 BPM 1ppg to 2 ppg stages with 133,900 gal 70Q foam, 30# linear gel, & 121,000# 20/40 Arizona sand. Max pressure 3800 psi. Flush with 2% KCl.
13. Wait on gel to break 3hrs. Flow back second stage. When rates & pressures allow remove Treesaver. TIH w/ retrieving head. Clean out to RBP. Obtain a gauge prior to releasing RBP.
14. TOOH w/ RBP. Flow & gauge well. TIH & clean out to RBP @ 5350'. Blow well and obtain gauges. TOOH.
15. Run after-frac Gamma Ray log in 4-1/2" csg.
16. TIH w/ production string as follows. One jt 2-3/8" openended, one 4' perforated sub, one 'F' nipple, & remaining 2-3/8". Land tubing @ 5200'.
17. ND BOP. NU WH. Rig Down & move off location. Obtain final 1 hr gauge up tubing.
18. Rig up Tefteller. Run 7 day btm hole pressure bomb in SN. SI 7 days. Retrieve bomb.
19. Production Operations will first deliver well to EPNG.
20. After 3 months production. The RBP will be recovered and the well commingled in the Mesaverde and Dakota.

Approved:

\_\_\_\_\_  
J. A. Howieson  
Drilling Superintendent

**Suggested Vendors:**

Stimulation Services	Halliburton	325-3575
Perforating	Basin Perforators	327-5244
Treesaver	Wellhead Isolation Tools	599-5609
Pressure Bomb	Tefteller	325-1731
Radioactive Tagging	Protechnics	326-7133
Water Filtering	Blakley Oilfield Service	326-6934
Packers & Bridge Plugs	Baker Service Tools	325-0216
Engineering	T. E. Mullins	326-9546-W
		325-9361-H

*LEM*

## BASIN DAKOTA

## CURRENT

**PROPOSED**

