

APPROACH OPERATING, LLC.  
OPERATIONS PLAN  
SENA # 2

I. Location: LAT 36°39'25.02004N Date: June 18, 2008  
LONG 106°30'42.51613W  
Rio Arriba County, NM

Field: Wildcat Elec: GL 7823.36'

Surface:

II. Drilling  
A. Contractor: TBD  
B. Mud Program:

The surface hole will be drilled with a air, if possible, or fresh water mud.

The production hole will be drilled with air or air/mist.

C. Minimum Blowout Control Specifications:

Double ram type 3000 psi working pressure BOP with a rotating head. See the attached for details on the BOP equipment. All ram type preventers and related equipment will be hydraulically tested at nipple-up and after any use under pressure to 1500 psi.

The blind ram will be hydraulically activated and checked for operational readiness each time pipe is pulled out of the hole. All check of the BOP stack and equipment will be noted on the daily drilling report. The BOP equipment will include a kelly cock, floor safety valve, and choke manifold all rated to 2000 psi.

No over pressured zones are expected in this well. No H2S zones expected, but compliance packs will be on location.

III. Logging program: Induction / GR, sonic and density-neutron logs at TD.

NMOCD Case Nos. 14134 and 14141  
June 20, 2008  
Approach Operating LLC  
Ex. No. 9

IV. Materials

A. Casing Program:

Hole Size	Depth	Casing Size	Wt & Grade
12-1/4"	350'	9-5/8"	32.3# H-40
8-3/4"	2000'	4-1/2"	10.5# J-55

B. Float Equipment

- a. Surface Casing: Notched collar on bottom and 3 centralizers on the bottom 3 joints.
- b. Production Casing: 4-1/2" whirler type cement nosed guide shoe and a float collar on top of the shoe joint. Centralized with bow spring centralizers

V. Cementing:

- Surface Casing: 9-5/8" 32.3 lb/ft H-40 set to 350'.

Cement 0-350'

Fluid 1: Water Based Spacer

Water

lbm/gal

Fluid Density: 8.330

Fluid Volume: 10 bbl

Fluid 2: Lead Cement

Premium Cement

lbm/gal

94 lbm/sk Premium Cement (Cement)

0.125 lbm/sk Poly-E-Flake (Lost Circulation Additive)

Gal/sk

2 % Calcium Chloride (Accelerator)

Fluid Weight 15.600

Slurry Yield: 1.180 ft<sup>3</sup>/sk

Total Mixing Fluid: 5.238

Top of Fluid: 0 ft

Calculated Fill: 350 ft

Volume: 42.139 bbl

Calculated Sacks: 200.503 sks

Proposed Sacks: 205 sks

Fluid 3: Water Based Spacer

Water Displacement

lbm/gal

Fluid Density: 8.330

Fluid Volume:

23.966 bbl

- Production Casing: 4-1/2" 10.5 lb/ft J-55 casing set to TD.

Cement

Fluid Instructions

Fluid 1: Water Based Spacer

Water

lbm/gal

Fluid Density: 8.330

Fluid Volume: 20 bbl

Fluid 2: Lead Cement

50/50 Poz Premium

0.4 % Halad(R)-344 (Low Fluid Loss Control)

0.125 lbm/sk Poly-E-Flake (Lost Circulation Additive)

Gal/sk

5 lbm/sk Gilsonite (Lost Circulation Additive)

Fluid Weight 13 lbm/gal

Slurry Yield: 1.436 ft<sup>3</sup>/sk

Total Mixing Fluid: 6.193

Top of Fluid: 0 ft

Calculated Fill: 2000 ft

Volume: 156.266 bbl

Calculated Sacks: 610.982 sks

Proposed Sacks: 615 sks

Fluid 3: Water Based Spacer

Water Displacement

lbm/gal

Fluid Density: 8.330

Fluid Volume: 31.197 bbl

## MULTI-POINT SURFACE USE PLAN

### 1. Existing Roads:

When existing roads are used to access the proposed location they will be maintained in the same or better condition than presently found.

### 2. Planned Access Roads:

Some new access road will have to be constructed. If existing access road is also used, it will be maintained in at least the current condition and will be upgraded where necessary to provide uninterrupted access to the proposed well.

### 3. Location of Existing Wells:

Attached map (Plat # 1) shows existing wells within one mile radius of the proposed well.

### 4. Location of Production Facilities:

In the event of production, production facilities will be located on the drill pad. The actual placement of this equipment will be determined when the well's production characteristics can be evaluated after completion.

To protect livestock and wildlife, equipment will be fenced. Any tanks will be enclosed by a dike.

Upon completion of drilling, the location and surrounding area will be cleared of all debris.

### 5. Water Supply:

Water for drilling and completion will be purchased from local sources.

### 6. Source of Construction Materials:

No additional construction materials will be required to build.

### 7. Methods of Handling Waste Disposal:

- a. The drill cuttings, fluids and completion fluids will be placed in the steel tanks. Upon completion, the pad will be leveled, contoured and reseeded with the appropriate seed mixture.
- b. All garbage and trash will be placed in a metal trash basket. It will be hauled off and dumped in an approved land fill upon completion of

operations.

- c. Portable toilets will be provided and maintained during drilling operations. See Plat 3 for location.

8. Ancillary Facilities:

Ancillary facilities are to be based on well productivity. .

9. Well Site Layout:

A plat of the drill pad with location of drilling equipment and rig orientations also attached.

10. Plans for Restoration of Surface:

When the well is abandoned the location and access road will be cleaned and restored to the original topographical contours as much as possible. The area will be reseeded with appropriate seed mixture.

If the well is productive, areas not used in production will be contoured and seeded with stipulated seed mixture. Production equipment will be painted to blend with the natural color of the landscape.

11. Lessee's or Operator's Representative:

Glenn W. Reed, Executive Vice President – Engineering & Operations  
Approach Resources  
6500 West Freeway, Suite 800  
Fort Worth, Texas 76116  
Phone: (817) 989-9000

---

Glenn W. Reed  
Executive Vice President – Engineering & Operations

# Approach Resources

## Well Control Equipment Schematic for 3K Service

Attachment to Drilling Technical Program

**Exhibit #1**  
**Typical BOP setup**

