

Montana Board of Oil and Gas Conservation Environmental Assessment

Operator: Enerplus Resources (USA) Corporation
Well Name/Number: Peabody- Steve 35-3-HLID3
Location: NE NW Section 35 T24N R56E
County: Richland, MT; Field (or Wildcat) Wildcat

Air Quality

(possible concerns)

Long drilling time: No, 30-40 days drilling time.

Unusually deep drilling (high horsepower rig): Triple derrick rig 900 HP, Bakken horizontal MD 19,913'/TVD 10,402'.

Possible H₂S gas production: Slight

In/near Class I air quality area: No

Air quality permit for flaring/venting (if productive): Yes, DEQ air quality permit required under rule 75-2-211.

Mitigation:

Air quality permit (AQB review)

Gas plants/pipelines available for sweet gas

Special equipment/procedures requirements

Other: _____

Comments: Existing pipeline for gas in the area.

Water Quality

(possible concerns)

Salt/oil based mud: Yes to long string oil based drilling fluids. Surface casing hole to be drilled with freshwater and freshwater mud.

High water table: No

Surface drainage leads to live water: No, small unnamed ephemeral tributary to Three Buttes Creek lies about 1/8 of a mile to the west of this location.

Water well contamination: No, all water wells are about at least 1 mile distance from this well location. Surface hole will be drilled with freshwater and steel casing cemented from 2,343' to surface.

Porous/permeable soils: No, silty sandy bentonitic soils.

Class I stream drainage: No, Class I stream drainages.

Mitigation:

Lined reserve pit

Adequate surface casing

Berms/dykes, re-routed drainage

Closed mud system

Off-site disposal of solids/liquids (in approved facility)

Other: _____

Comments: Require 2,343'+/- surface casing well below freshwater zones in adjacent water wells.

Also, covering Fox Hills aquifer. Adequate surface casing and BOP equipment to prevent problems in and around freshwater drainages.

Soils/Vegetation/Land Use

(possible concerns)

Stream crossings: None

High erosion potential: No, location has a moderate cut, up to 28.4' and a moderate fill, up to 13.0'

required.

Loss of soil productivity: None, location to be restored after drilling well, if nonproductive. If productive unused portion of drillsite will be reclaimed.

Unusually large wellsite: No, large well site 450'X310'

Damage to improvements: Slight

Conflict with existing land use/values: Slight

Mitigation

- Avoid improvements (topographic tolerance)
- Exception location requested
- Stockpile topsoil
- Stream Crossing Permit (other agency review)
- Reclaim unused part of wellsite if productive
- Special construction methods to enhance reclamation
- Other _____

Comments: Existing county road #131. A short access road of about 101', will be constructed from the county road, #131 into this location. Oil based muds will be recycled. Completion fluids will be hauled to a commercial disposal, cuttings will be disposed of in a lined pit. Pit will be solidified with subsoil in the lined pit and clean cover and top soil put over the solidified pit contents. No concerns.

Health Hazards/Noise

(possible concerns)

Proximity to public facilities/residences: Nearest residences are 3/8 of a mile to the west and 1 mile to the southeast of this location.

Possibility of H2S: Slight

Size of rig/length of drilling time: Triple drilling rig 30 to 40 days drilling time.

Mitigation:

- Proper BOP equipment
- Topographic sound barriers
- H2S contingency and/or evacuation plan
- Special equipment/procedures requirements
- Other: _____

Comments: Adequate surface casing cemented to surface with working BOP stack should mitigate any problems. Distance sufficient to mitigate noise.

Wildlife/recreation

(possible concerns)

Proximity to sensitive wildlife areas (DFWP identified): None identified.

Proximity to recreation sites: None identified.

Creation of new access to wildlife habitat: No

Conflict with game range/refuge management: No

Threatened or endangered Species: None identified.

Mitigation:

- Avoidance (topographic tolerance/exception)
- Other agency review (DFWP, federal agencies, DSL)
- Screening/fencing of pits, drillsite
- Other: _____

Comments: Private surface lands. No concerns.

Historical/Cultural/Paleontological

(possible concerns)

Proximity to known sites: None identified.

Mitigation

 avoidance (topographic tolerance, location exception)

 other agency review (SHPO, DSL, federal agencies)

 Other: _____

Comments: Private surface lands. No concerns.

Social/Economic

(possible concerns)

 Substantial effect on tax base

 Create demand for new governmental services

 Population increase or relocation

Comments: No concerns. Development well in this spacing unit.

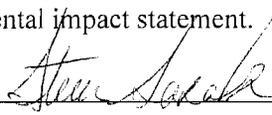
Remarks or Special Concerns for this site

TVD 10,402'/ MD 19,913' Bakken Formation single lateral horizontal well . Additional well to this spacing unit.

Summary: Evaluation of Impacts and Cumulative effects

No long term impacts expected, some short term impacts will occur. This is the third well in this spacing unit.

I conclude that the approval of the subject Notice of Intent to Drill (does/**does not**) constitute a major action of state government significantly affecting the quality of the human environment, and (does/**does not**) require the preparation of an environmental impact statement.

Prepared by (BOGC): Steven Sasaki 

(title): Chief Field Inspector

Date: December 20, 2007

Other Persons Contacted:

Montana Bureau of Mines and Geology, Groundwater Information Center website

(Name and Agency)

Richland County water wells

(subject discussed)

December 20, 2007

(date)

If location was inspected before permit approval:

Inspection date: _____

Inspector: _____

Others present during inspection: _____