

**Montana Board of Oil and Gas Conservation
Environmental Assessment**

Operator: Decker Operating Company, LLC
Well Name/Number: MRFU 1579-1
Location: SE SE Section 15 T37N R29E
County: Phillips, MT; **Field (or Wildcat)** Wildcat

Air Quality

(possible concerns)

Long drilling time: No, 2 to 3 days drilling time.

Unusually deep drilling (high horsepower rig): No, small single derrick drilling rig to drill to 1630' TD.

Possible H2S gas production: None anticipated.

In/near Class I air quality area: No Class I air quality area.

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

Mitigation:

Air quality permit (AQB review)

Gas plants/pipelines available for sour gas

Special equipment/procedures requirements

Other: _____

Comments: No special concerns – using small rig to drill to 1630 'TD.

Water Quality

(possible concerns)

Salt/oil based mud: No, freshwater and freshwater mud system.

High water table: No high water table anticipated.

Surface drainage leads to live water: No, unnamed ephemeral tributary drainages to Cottonwood Coulee, about 1/8 of a mile to the southeast and northwest from this location.

Water well contamination: No, water well listed within 1 mile from this location in any direction. Spring noted on topographic sheet about 1/2 of a mile to the north from this location in Cottonwood Coulee drainage.

Porous/permeable soils: No, silty 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: 170' of surface casing cemented to surface adequate to protect freshwater zones. Also, fresh water mud systems to be used.

Soils/Vegetation/Land Use

(possible concerns)

Stream crossings: None, crossing only ephemeral drainages.

High erosion potential: No, cut up to 0.0' and a small fill, up to 9.0', required.
Loss of soil productivity: No, location will be restored after drilling, if nonproductive. If productive unused portion of drillsite will be reclaimed.
Unusually large wellsite: No, small drillsite for a double derrick drilling rig, 250'X250' location size required.
Damage to improvements: Slight, surface use appears to be cultivated land.
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: Access will be over existing county gravel roads and existing ranch trails. About 1000' of new access will be built from an existing ranch trail into this location. Drilling fluids will be allowed to dry in the earthen pit. Mud solids and cuttings will be mixed buried in the earthen pits. No special concerns

Health Hazards/Noise

(possible concerns)

Proximity to public facilities/residences: No, residences within 1 mile of this location in any direction.

Possibility of H2S: None anticipated.

Size of rig/length of drilling time: Small drilling rig/short 2 to 3 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 and operational BOP should mitigate any concerns. No concerns

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: Threatened or endangered species listed Pallid Sturgeon, Whooping Crane, Black-Footed Ferret and the Piping Plover. Proposed species is Mountain Plover. Candidate for listing is the Greater Sage Grouse and Sprague's Pipit. NH tracker website lists species of concern as the Baird's Sparrow, Sprague's Pipit, Ferruginous Hawk, Chestnut-collared Longspur, McCown's Longspur and the Sharp Tailed Grouse.

Mitigation:

- Avoidance (topographic tolerance/exception)

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

Comments: Location falls within a cultivated field on private surface lands. None of the species listed will be impacted by the drilling of this well.

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 cultivated surface lands. No concerns.

Social/Economic

(possible concerns)

- Substantial effect on tax base
- Create demand for new governmental services
- Population increase or relocation

Comments: Wildcat gas well. No concerns.

Remarks or Special Concerns for this site

Well is a 1630' Phillips Formation wildcat gas test.

Summary: Evaluation of Impacts and Cumulative effects

No long term impacts expected. Some short term impacts are expected.

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): /s/Steven Sasaki
(title:) Chief Field Inspector
Date: January 25, 2011

Other Persons Contacted:

Montana Bureau of Mines and Geology, GWIC website
(Name and Agency)
Phillips County water wells
(subject discussed)
January 25, 2011
(date)

US Fish and Wildlife, Region 6 website
(Name and Agency)
ENDANGERED, THREATENED, PROPOSED AND CANDIDATE SPECIES
MONTANA COUNTIES, Phillips County, Montana
(subject discussed)
January 25, 2011
(date)

Montana Natural Heritage Program Website (FWP)
(Name and Agency)
Heritage State Rank= S1, S2, S3, T37N R29E
(subject discussed)
January 25, 2011
(date)

If location was inspected before permit approval:
Inspection date: _____
Inspector: _____
Others present during inspection: _____