

**United States Department of the Interior
Bureau of Land Management**

**Section 390
Categorical Exclusion for
Oil and Gas Development
for
Federal Well 1-23-8-101 MV
Walter Fees, Jr. and Son Oil & Gas, LLC**

Grand Junction Field Office
2815 H Road
Grand Junction, Colorado 81506

DOI-BLM-CO-130-2012-0040-CX (390)

June 2013



LEGAL DESCRIPTION:

T. 8 S., R. 101 W., sec. 23, NWSE
Sixth Principal Meridian
Mesa County, Colorado

FEDERAL LEASE:

COC-65959

APPLICANT:

Walter S. Fees Jr. & Son Oil and Gas, LLC
2516 Foresight Circle, Room 10
Grand Junction CO 81505

PURPOSE AND NEED: The purpose of the Proposed Action is to permit Fees to discover and produce fluid minerals from the valid federal oil and gas lease issued to them by the BLM. The need for the Proposed Action is established under the Mineral Leasing Act of 1920 (MLA) and the Federal Land Policy and Management Act of 1976 (FLPMA), which establish the BLM's responsibility to respond to drilling applications. The MLA, as amended (30 USC 181 et seq.), authorizes the BLM to issue oil and gas leases for the exploration of oil and gas and permit the development of those leases. Existing leases are binding legal contracts that allow development by the lease holder. Approved BLM applications to drill typically authorize an applicant to construct and drill proposed wells, access, associated pipeline and well facility construction and any necessary rights-of-way. The FLPMA authorizes the BLM to issue right-of-way grants for access to public lands.

If permitted, this APD approval would include appropriate mitigation consistent with the goals, objectives and decisions of the Grand Junction Resource Area Resource Management Plan (RMP) (BLM, 1987); as well as with applicable policies, regulations and laws.

PLAN CONFORMANCE REVIEW:

The Proposed Action is subject to and has been reviewed for conformance with (43 CFR 1610.5, BLM 1617.3) the following plan:

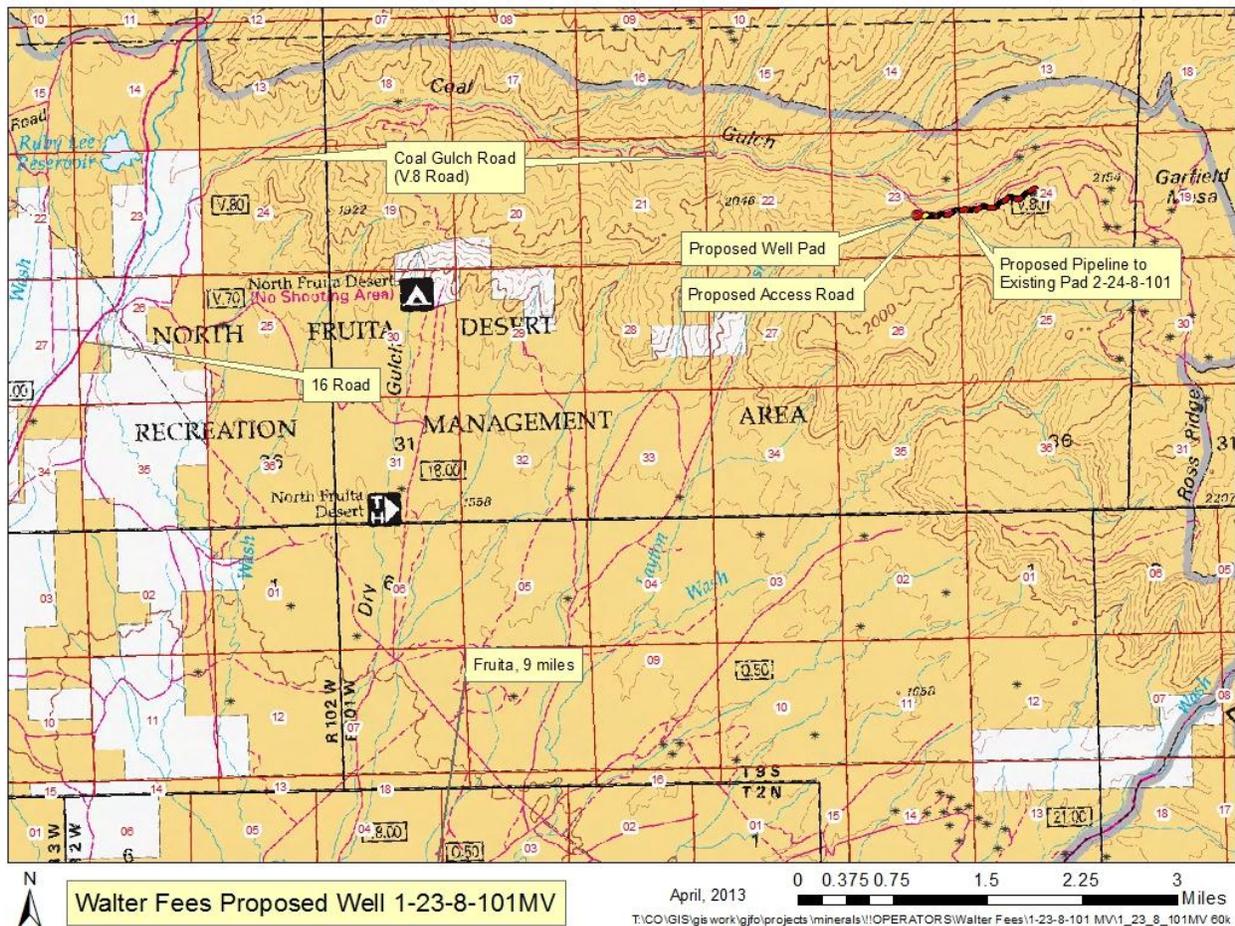
Name of Plan: GRAND JUNCTION Resource Management Plan

Date Approved: JANUARY, 1987

Decision Number/Page: Page 2-7, 2-40

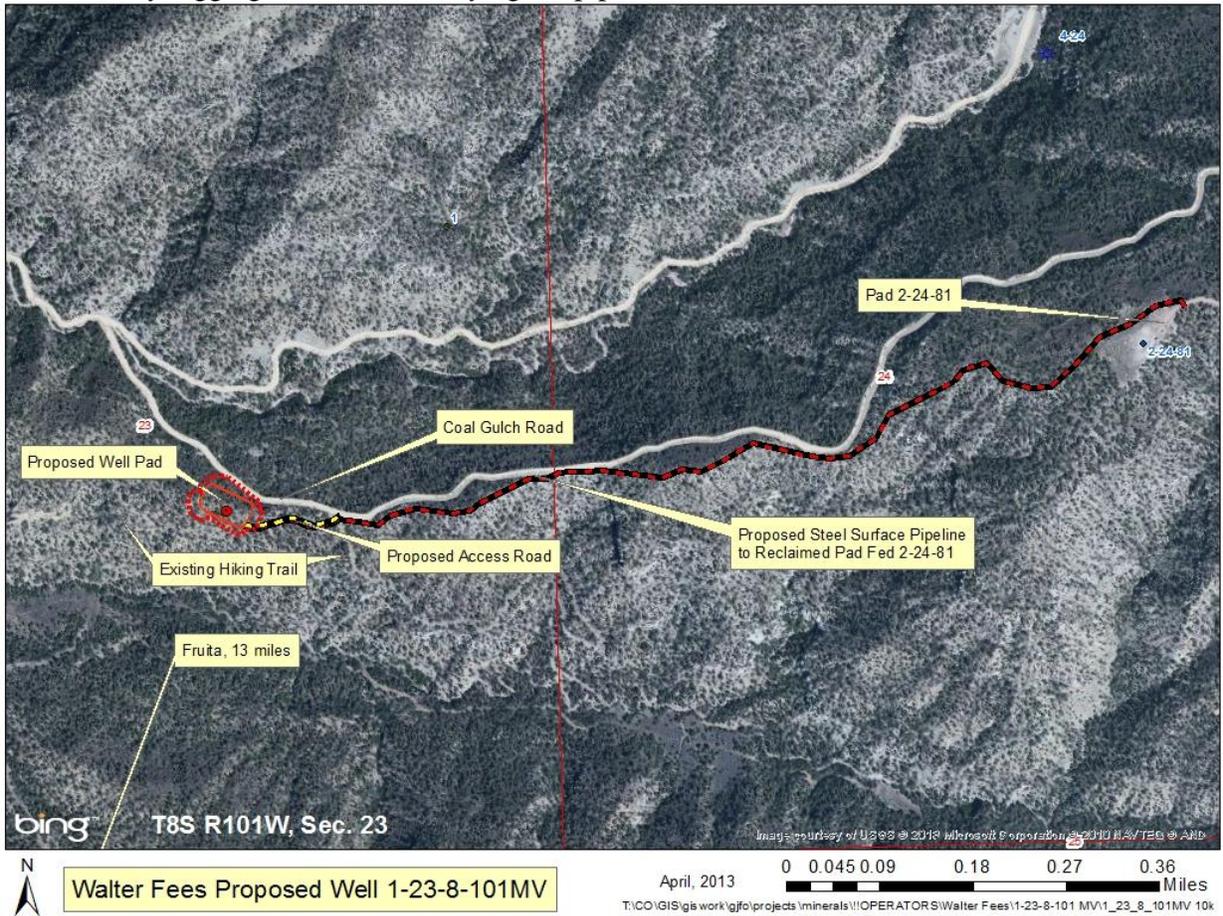
Decision Language: The Grand Junction Resource Management Plan (RMP) and Record of Decision describe management decisions based on resource and geographic pieces of land called emphasis areas (USDI 1987; page 2-40). The RMP Oil and Gas Management objective is "To make federal oil and gas resources available for lease, except where prohibited by law or where administrative action is justified in the national interest; to make public land available for economically and environmentally sound exploration and development projects; to avoid health and safety hazards; to protect important, sensitive resource values from unacceptable impacts; and to minimize the impacts to lessees from sensitive resource protection and hazard avoidance."

PROJECT DESCRIPTION/ PROPOSED ACTION: Walter S. Fees Jr. & Son Oil and Gas (Fees) submitted to BLM an Application for Permit to Drill (APD) for a single vertical well and pad, access road and pipeline on May 23, 2012. The APD was complete on March 11, 2013. An onsite inspection was conducted on May 24, 2012. During the onsite, Mr. Walter Fees agreed to avoid the existing BLM back country hiking trail that runs between the bottom of the fill slope of the proposed pad and the steep drop nearby to the south of it. As agreed at the onsite, pad corners would be rounded to minimize cuts and fills. Existing trees would be left in place around the exterior boundary of the pad to anchor fill dirt on steep slopes and reduce visual impacts. At the onsite, operator agreed to minimize the disturbance width of the 500 foot long access road/pipeline alignment; the road would have a running surface no wider than 14 feet and two water relief structures.



About 2 acres would be disturbed by initial construction of the pad, of which about 0.4 acres would remain as long term disturbance. A 50-foot by 500-foot construction disturbance is proposed, to build a primitive access road that would have a gas-gathering pipeline buried beside it, which would disturb about 0.6 acres. The gas gathering pipeline, proposed as 2-4" steel pipe, would run across undisturbed vegetation and ground surface for about a mile (5,350 feet) to an adjacent plugged well Federal 2-24-81, where it would connect to an existing buried pipeline. Temporary installation disturbance of 20 feet wide for the surface line would result in about 2.5 acres of surface disturbance. Total proposed short term disturbance for pad, access and pipeline would be about 5.1 acres, of which 2.8 acres would occur within lease COC-065959 and 2.3 acres would occur off lease. The subject lease has approximately 8.6 acres of current disturbance due to the County road.

Following interim reclamation of the pad, about 1 acre of long-term surface disturbance would be expected to remain for the productive life of the well (about 20 years); 0.4 acres of pad surface and about 0.6 acres of access road. All long-term disturbance would lie within the boundaries of lease COC-065959. Pipeline disturbance is generally considered to be short-term, since it is typically completely reclaimed immediately after installation. If the proposed surface pipeline installation is approved, surface disturbance would be created by heavy equipment laying out and connecting pipe, rather than by digging a trench and burying the pipe after installation.



Approximately 400 feet or 0.18 acres of the pipeline disturbance described above would occur within the subject lease (COC-065959). The area of the pipeline that might be installed off-lease would disturb about 2.3 acres; this off-lease section of pipeline would require a right-of-way grant, for which the operator would later apply to the BLM, should the well prove productive.

The well would access federal mineral estate from federal surface. Maps above show the location of the proposed pad, road and pipeline within the general project area, along Coal Gulch Road (Mesa County Road V.8) and in a more detailed aerial view. The map below shows the adjacent recreation trail, which BLM has scheduled for improvement in 2013. The table below gives the lease stipulations associated with lease COC-065959, in the project area. The attached Surface Use Plan of Operations (Attachment A) describes the construction, operation and reclamation of project activities, in detail. Surveyed plats and maps are contained in the APD package.

Across lease COC-065959, where the well, road and pipeline are proposed, roughly 1.4 acres of disturbance exist, mostly as roads and trails. The proposal, including the pipeline (if the operator applies for it), would disturb about 5.1 acres.

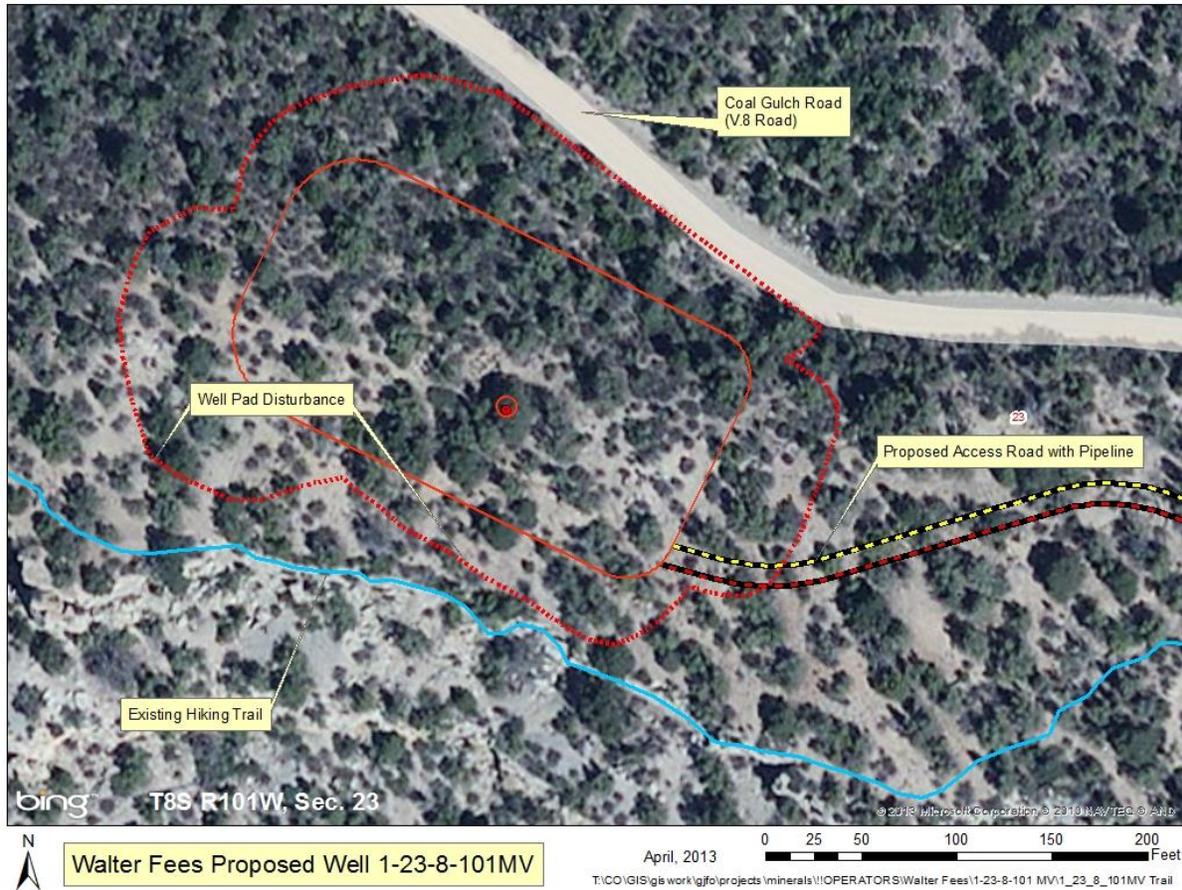


Table 1 Applicable Lease Stipulations

LEASE NUMBER & LEGAL DESCRIPTION	STIPULATIONS
COC-65959, All Lands	Endangered Species Act Stipulation CO-34
COC-65959 T.8S, R. 101W Sec. 22: NW, N2S2, SESW, SWSE Sec. 23: W2NE, NW, N2SW, NWSE Sect. 27: Lot 1	Deer & Elk Winter Range Stipulation GJ-12DA Timing Limitation May 1 thru December 1
T.8S, R. 101W Sec. 22: NW, NWSW, E2SE Sect. 23: W2NE, W2, NWSE, S2SE, Sec. 26: N2, N2S2, SWSW Sec. 27: E2NW, N2SE	Scenic and Natural Values Stipulation GJ-2GN Hunter/Garvey Benches (Visual Resource Management)
All Lands, Lease COC-65959	Scenic and Natural Values Stipulation GJ-2IG Hunter/Garvey Benches (Recreation)

This proposed action, for the purpose of exploration and development of a federal oil and gas lease, qualifies for Categorical Exclusion No. 1 under the *Energy Policy Act of 2005*:

Individual surface disturbances of less than five acres so long as the total surface disturbance on the lease is not greater than 150 acres and site-specific analysis in a document prepared pursuant to the NEPA has been previously completed.

REVIEW OF EXISTING NEPA DOCUMENTS:

The Cumulative Impacts section in BLM-CO-130-2005-001-EA includes the reasonable expectation of additional development, a scenario that encompasses proposed well 1-23-8-101 MV. Both actions are very similar; both are located beside V.8 Road, in the Coal Gulch area of the Bookcliffs, in Mesa County Colorado, about a mile apart.

Name of Document: BLM-CO-130-2005-001-EA
 Federal Well 5-24-8-101, Lease COC-57983
 Walter Fees Jr. and Son Oil & Gas, LLC

Date Approved: November 26, 2004

COMPLIANCE WITH NEPA: The proposed action qualifies as a categorical exclusion under Section 390, based on the qualifying criteria listed below.

CATEGORICAL EXCLUSION REVIEW: Pursuant to Section 390 of the Energy Policy Act of 2005, the following criteria apply:

Qualifying Criteria (check all that apply)	YES	NO
1. Individual surface disturbances of less than five (5) acres, so long as the total surface disturbance on the lease is not greater than 150 acres and site-specific analysis in a document prepared pursuant to NEPA has been previously completed.	X	
a. The action will disturb less than 5 acres; if more than one action is proposed for a lease, each activity is counted separately and each may disturb up to five acres.	X	
b. The current un-reclaimed surface disturbance readily visible on the entire leasehold is not greater than 150 acres, including the proposed action.	X	
c. This categorical exclusion includes the requirement of a site-specific NEPA document. A site specific NEPA analysis may be an EA/EIS for exploration and/or development, for a specific MDP, for a multi-well or a single well permit approval.	X	

Qualifying Criteria (check all that apply)	YES	NO
2. Drilling an oil and gas location or well pad at a site where drilling has occurred within five (5) years prior to the date of spudding the well.		X
3. Drilling an oil or gas well within a developed field for which an approved land use plan or environmental document prepared pursuant to NEPA analyzed a reasonably foreseeable activity, so long as the plan or document was approved within five (5) years prior to the date of spudding the well.		X
a. The proposed APD is within a developed oil or gas field. A developed field is defined as any field in which a confirmation well has been completed.		X
b. There is an existing NEPA document (including that supporting a land use plan) that contains a reasonably foreseeable development scenario encompassing this action.		X
c. The NEPA document was finalized or supplemented within five years of spudding the new well.		X
4. Placement of a pipeline in an approved right-of-way corridor, so long as the corridor was approved within five (5) years prior to the date of placement of the pipeline.		X
a. The placement of a pipeline in an existing corridor of any type. The term “right-of-way corridor” in Section 390 is not limited to those authorized under 43 CFR 2800, but is a more generalized term that applies to any type of corridor or right-of-way (whether on or off lease) approved under any authority or vehicle of the BLM, including Sundry Notices.		X
b. Placement of the pipeline within five years of placement approval (or amendment) of the most recent date of a Decision (NEPA or permit authorization).		X
5. Maintenance of a minor activity, other than any construction or major renovation of a building or facility.		X

INTERDISCIPLINARY REVIEW

Resources	Not Present	No Impact	Potential Impacts	Mitigate Impacts	BLM Staff Initial/Date	Comments
PHYSICAL RESOURCES						
Air and Climate (<i>C. Ewing</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>		
Water (<i>N. Dieterich</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	ND 5/28/13	
Soils (<i>N. Dieterich</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	ND 5/28/13	
Geological and Mineral Resources (<i>D.S. Gerwe</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	DSG 5/22/12	No impacts to unique geology. Possibly impact coal resources.
BIOLOGICAL RESOURCES						
Special Status Plants (<i>J.Toolen</i>)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	JT 6/7/12	Not known or likely
Special Status Wildlife (<i>J.Toolen</i>)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	JT 6/5/12	Not known or likely
Migratory Birds (<i>J.Toolen</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	JT 6/5/12	Depends on timing
Other Important Wildlife Habitat (<i>J.Toolen</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	JT 6/5/12	Winter ranges for Elk and Mule deer
Vegetation, Forestry (<i>S. Clark</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	SC 5/31/12	
Invasive/Non-native Species (weeds) (<i>M.Taber</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	MT 5/23/12	
Wetlands/Riparian Zones (<i>C. Stark</i>)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	CRS 6/11/12	
HERITAGE RESOURCES AND HUMAN ENV.						
Cultural or Historical Tribal & American Indian Religious Concerns (<i>A. Laforge</i>)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	ALR 5/14/2013	No impact pending tribal consultation.
Paleontological (<i>D.S. Gerwe</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	DSG 5/22/12	
Visual Resources (<i>C. Pipkin, J. Christiansen</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	CPP 6/11/12 JESC 5/2013	Hide as possible. Low-profile equipment. Yuma Green paint. Reveg fill slopes
Social/Economic (<i>C. Ewing</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	CE 5/21/12	PA may have social effects. No Action may have economic effects
Transportation & Access (<i>C. Pipkin</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	CPP 6/11/12	
Wastes, Hazardous/Solid (<i>A. Kraus</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	AK 5/24/12	Standard COA
LAND RESOURCES						
Recreation (<i>C. Pipkin</i>)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	CPP 6/11/12	SNV lease stip(Rec). Improve old trail.
Special Designations (<i>C. Pipkin</i>)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	CPP 6/11/12	
Wilderness and Wilderness Characteristics (<i>C. Pipkin</i>)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	CPP 6/11/12	
Range Management (<i>S. Clark</i>)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	SC 5/31/12	
Wild Horse and Burros (<i>C. Ventling</i>)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	CLV 5/22/12	
Land Tenure, ROW, Other Uses	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	JESC 5/2013	
Fire/Fuels	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	JP 5/29/12 JESC 5/2013	Keep woody veg away from heat producers. Shred veg. leave roots.

INTERDISCIPLINARY TEAM REMARKS:

Cultural Resources

A records search of the general project area, and a Class III inventory of the Area of Potential Effect (APE), as defined in the National Historic Preservation Act (NHPA), was completed by Grand River Institute, a Colorado BLM permitted cultural resource contracting firm, and the Bureau of Land Management (GJFO CRIR 1112-11 and 1012-03). Conditions of the existing cultural environment are incorporated by these references but the following briefly summarizes cultural resources in the APE. A prehistoric open camp, 5ME18721 and a historic inscription isolated find, 5ME18141 were found by the surveys. The prehistoric open camp (5ME18721) is recommended as not eligible for the National Register of Historic Places under Criteria A-D. No further cultural work is expected. The project inventory and evaluation is in compliance with the NHPA, the Colorado State Protocol Agreement, and other federal law, regulation, policy, and guidelines regarding cultural resources.

Environmental Consequences/Mitigation: No historic properties (significant cultural resources) will be affected by the proposed action, though the two recorded resources are likely to be destroyed. If there are any cultural resources in the area that are unknown to the agency or subsurface, the attached Standard Conditions of Approval (Attachment C) should provide unknown cultural resources with appropriate protection.

Native American Religious Concerns

American Indian religious concerns are legislatively considered under several acts and Executive Orders, namely the American Indian Religious Freedom Act of 1978 (PL 95-341), the Native American Graves Environmental Assessment Protection and Repatriation Act of 1990 (PL 101-601), and Executive Order 13007 (1996; Indian Sacred Sites). In summary, these require, in concert with other provisions such as those found in the NHPA and ARPA, that the federal government carefully and proactively take into consideration traditional and religious Native American culture and life and ensure, to the degree possible, that access to sacred sites, the treatment of human remains, the possession of sacred items, the conduct of traditional religious practices, and the preservation of important cultural properties are considered and not unduly infringed upon. In some cases, these concerns are directly related to “historic properties” and “archaeological resources”. In some cases elements of the landscape without archaeological or other human material remains may be involved. Identification of these concerns is normally completed during the land use planning efforts, reference to existing studies, or via direct consultation.

Two cultural resources were located during the field inventory, though neither resources is of a type previously identified as a concern by tribes. If the project area holds special significance for Native Americans for traditional or religious purposes and the project would not alter or limit any access if there were traditional uses that are not known to the agency. Native American Indian consultation was conducted for the proposed undertaking with the following tribes: The Ute Indian Tribe of the Uintah and Ouray Reservation, the Southern Ute Indian Tribe, and the Ute Mountain Ute Tribe. If new information is provided by Native Americans during the EA process, additional or edited terms and conditions for mitigation may have to be negotiated or enforced to protect resource values. **ALR 5/13/2013**

Threatened & Endangered Plants

There are no known or potentially expected occurrences of Threatened, Endangered, or BLM sensitive plants in area.

JT 5/30/2013

TES Animals and Critical habitat; Wildlife and Fisheries

The action area does not contain any known or likely occurrences of Threatened or Endangered wildlife.

BLM sensitive species that may occur in the action area include golden eagle and midget faded rattlesnake.

The action area does not contain habitat for sage grouse. Birds of conservation concern for whom habitat exists in the action area include Brewers sparrow, Gray Vireo, Juniper Titmouse, and Pinion Jay. Raptor surveys were conducted in July 2012, one unoccupied nest was located within 0.25 miles of the disturbance area. If construction activities occur between February 1 and August 15, 2013 then this nest will need to be revisited to determine if it is still unoccupied. If construction activities are to occur more than two years after surveys have been conducted the surveys will be considered outdated and will need to be conducted again. Avoidance of impacts to raptors through surveys and subsequent activity buffers as well as avoidance of habitat alternation during the peak nesting season of migratory birds (May 15 to July 15 annually) is expected to minimize impacts to nesting birds. Impacts to other special status species are expected to be negligible.

The action area includes mule deer migration pattern areas, as well as overall winter range and critical winter range for mule deer. The existing access to site passes through mule deer winter concentration area and severe winter range, and elk severe winter range. The pad and new access would be built in an area protected by Deer & Elk Winter Range Stipulation GJ-12DA, which imposes a Timing Limitation of May 1 thru December 1. The existing County road is currently open year round to recreational use. Well maintenance is not expected to increase traffic through winter range. Traffic on the county and new access roads would increase during construction and drilling activities, however these activities will be limited to outside the winter season, therefore impacts to wintering wildlife are expected to be negligible. **HLP 5/29/2013**

Paleontology/Geology

- No impacts to unique geology.
- Possible impact to coal resources. Needs downhole COA for cementing thru coal resource.
- Potential impacts to subsurface paleontological resources. **DSG 5/22/2012**

Soils/Water:

- Project is proposed along and just below the edge of an east-west trending ridge, in steep country. The project disturbance is proposed where slopes range from 10 to 40%. Soil runoff class and water erosion hazard are *very high*; these soils would be very vulnerable to erosion if the vegetation was removed. Reclamation potential is *fair*.
- Proposed site-specific, adaptive erosion control (storm water BMPs) and revegetation techniques like pocking steep slopes should reduce erosion and restore soil productivity.

- Proposed water control structures along the new access road would also minimize erosion and sediment that might otherwise move off the road.
- Leaving vegetation in place as much as possible, like the proposal to anchor fill slopes by leaving existing trees and shrubs in place, as well as shredding vegetation to maintain root systems, are appropriate design features.
- A BLM-approved construction monitor with authority to direct and stop construction operations should be on site during vegetation removal and pad construction.
- Proper compaction of fills slopes and subsequent testing would ensure stability for rig/equipment weight and erosion prevention on the site.
- A pre-construction inspection with BLM personnel, construction staff and the approved monitor should be held at the site. Pre-construction storm water BMPS, construction control and limit-of-disturbance stakes should be placed before pre-construction inspection, and maintained in place throughout construction, to ensure compliance with approved permit. **JESC 5/2013, N. Dieterich 6/2013**

Fire and Fuels

- Area vegetation consists mainly of large woody vegetation like mature juniper trees and shrubs such as serviceberry and mountain mahogany. Smaller understory vegetation is fairly sparse with large and small cured litter (juniper foliage and scattered limbs). Fuel moisture on this south facing slope tends to be relatively low, making it susceptible to ignition; a wildland fire that started in the area could burn a large region.
- Any heat-producing equipment installed on the pad should be kept away from fuels by a distance of at least twice the height of the fuels. (20 foot trees need to be at least 40 feet away from heat-producing equipment.)
- Vegetation removed for pad construction and pipeline installation may be shredded in place or used on reclamation. As much as possible fill areas should have root systems left intact. This would support interim reclamation regrowth from them and safeguard existing native seedbanks, while stabilizing slopes and soils. **JESC 5/2013**

Recreation/VRM

- Scenic and Natural Values lease stipulations apply (Hunter Garvey Benches).
- Hide in terrain as possible. Use low-profile equipment. Paint Yuma Green. Revegetate fill slopes. Retain vegetative buffer of approximately 10 feet interior of limit of disturbance. **JESC 5/2013**

Recreation/Trails

The proposed pad location overlaps the east end of an existing back country hiking trail proposed for upgrading to a single-track trail. It would be open to motorcycles, bicycles, equestrians and hikers. BLM desires accommodation of a route around the proposed pad, and the operator agreed to this at the onsite inspection. **CPP 6/11/2012**

DECISION:

I have reviewed this document and have decided to approve the APD for Federal Well 1-23-8-101 MV, as described above and with attached Conditions of Approval.

No pipeline right-of-way is approved with this Decision; the operator specified that the APD was not intended to apply for the ROW required for the off-lease portion of the gas-gathering pipeline. However, on-lease pipeline construction between the well and the lease boundary east of the pad (about 270 feet) is approved. Pipeline construction is not approved as far as existing county road V.8, which lies off-lease. This NEPA document, DOI-BLM-CO-130-2012-0040-CX (390), involves the pipeline proposal and may later inform a Decision regarding right-of-way approval, if a right-of-way is requested.

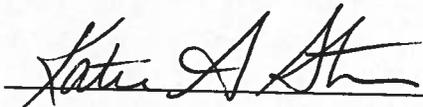
The project is categorically excluded from documentation in an EA or EIS under Section 390 of the Energy Policy Act of 2005.

RATIONALE:

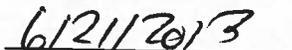
This action is listed in the Instruction Memorandum Number 2005-247 as an action that may be categorically excluded under Section 390 of the Energy Policy Act of 2005. I have evaluated the action relative to the five qualifying criteria listed above and have determined that, as it does not represent an exception, it is therefore categorically excluded from further environmental analysis. The action meets the qualifying criteria for 390 CX Number Three.

Existing NEPA document BLM-CO-130-2005-001-EA (for nearby Fees Federal well 5-24-8-101) contains a Cumulative Impacts section that mentions the reasonable expectation of additional area development, a scenario that encompasses proposed well 1-23-8-101 MV.

This decision addresses the purpose and need by approving well operations within existing and valid lease rights. Environmental impacts will be mitigated by using the attached Conditions of Approval. Impacts to wildlife will be mitigated through the lease stipulation GJ-12DA for winter timing limits, and a potential timing limit for activities based on observation of the inactive nest near the location. Coal resources will be protected through verified cementing and casing of the coal producing zones of the well bore. Impacts to soils will be mitigated through the proposed measures of anchoring toe slopes with vegetation buffers, and surface erosion control and reclamation techniques like pocking. Impacts to soils will be further mitigated with additional Conditions of Approval for a preconstruction meeting, leaving root systems intact, construction monitoring and verified compaction of fill slopes. Impacts to scenic values and recreation resources will be mitigated through low profile equipment, environmental colored paint, strategic placement of equipment, vegetative buffer on toe slopes and construction monitoring.



Katie A. Stevens, Field Manager



Date

Grand Junction Field Office

Administrative Review or Appeal Opportunities

This decision is effective upon the date the decision or approval by the authorized officer. Under regulations addressed in 43 CFR Subpart 3165, any party adversely affected has the right to appeal this decision. An informal review of the technical or procedural aspects of the decision may be requested of this office before initiating a formal review request. You have the right to request a State Director review of this decision. You must request a State Director review prior to filing an appeal to the Interior Board of Land Appeals (IBLA) (43CFR 3165.4).

If you elect to request a State Director Review, the request must be received by the BLM Colorado State Office, 2850 Youngfield Street, Lakewood, Colorado 80215, no later than 20 business days after the date the decision was received or considered to have been received. The request must include all supporting documentation unless a request is made for an extension of the filing of supporting documentation. For good cause, such extensions may be granted. You also have the right to appeal the decision issued by the State Director to the IBLA.

Contact Person

For additional information, contact Julia Christiansen, Natural Resource Specialist, Grand Junction Field Office, 2815 H Road, Grand Junction, CO 81504; Phone 970-244-3093.

MITIGATION MEASURES:

- Attachment A: Surface Use Plan of Operations
- Attachment B: Conditions of Approval

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

TOWNSHIP 8 SOUTH, RANGE 101 WEST 6TH P.M.

Section 23: 1,809' FSL 1,660' FEL

Mesa County, Colorado

Lease No. COC-065959

1. DIRECTIONS TO LOCATION:

From Fruita, Colorado proceed west on Highway 6&50 for approximately 1.25 miles then turn right (north) on Mesa County 16 Road. Proceed north on Mesa County 16 Road approximately 12.5. Turn right (east) on Mesa County Road V and 8/10. Cross Big Salt Wash and proceed east on Mesa County Road V and 8/10 approximately 8 3/10 miles. Turn right travel westerly 470 feet to the propose location.

2. EXISTING ROADS:

FIGURES #4 and 5 are topographic maps of the area adjacent to the proposed location and show the existing access roads. Mesa County Roads 16 and V and 8/10 and existing right-of-way will be used as access to the location. We do not plan to change, alter or improve upon any existing state or county roads. The existing roads will be maintained in the same conditions that are now present.

3. PLANNED ACCESS ROAD TO BE CONSTRUCTED OR RECONSTRUCTED:

Proposed access roads shown on Exhibit 4A

- A. The access road will be construction in a 50 foot wide construction easement that will become a permanent right-of-way with an 18-20 foot road running surface. This construction easement width is requested to accomidate passing and shoulder construction. The road will be insloped, crowned and ditched and/or sloped and dipped as needed. The proposed length of new access road is approximately 470 feet.
- B. Maximum Grade - The average grade will be 10% or less, where ever possible. The 10% grade will only be exceeded in areas where physical terrain or unusual circumstances require it.
- C. No turnouts are planned at this time.
- D. The access road will be built to the Gold Book standards.
- E. No low water crossings are planned. No culverts are planned at this time.
- F. Surface Materials will consist of native soil whenever possible. If any additional surface materials are required they will preferably be purchased from a local contractor having a permitted source of materials in the area. None are anticipated at this time.
- G. There will be no fences, gates or cattle guards needed for the access road.
- H. Road Maintenance - During the drilling and production phase of the operation, the road surface and shoulders will be kept in a safe condition and will be maintained in accordance with the original construction standards.
- I. The access road will be maintained as necessary to prevent soil erosion and accommodate year round traffic.
- J. The access road radius is designed to adequately accomidate an air drilling rig.

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

4. LOCATION OF EXISTING WELLS (SEE ATTACHED FIGURE #8):
 - A. There are no water wells within a one-mile radius of this location.
 - B. There are 2 dry holes within a one-mile radius:
Federal #2-24-8-101 T8S R101W Section 24: NESE Dakota
Govt #1 T8S R101W Section 24: NWNW Mesaverde
 - C. There are no disposal wells within a one-mile radius of this location.
 - D. There is 1 producing well within a one-mile radius of this location:
Federal 4-24 T8S R101W Section 24: NENW Dakota
 - E. There are no shut-in wells within a one-mile radius of this location.
 - F. There are no injection wells within a one-mile radius of this location.
 - G. There are no monitoring or observation wells within a one-mile radius of this location.
 - H. There are 10 coal core wells within one mile of this location:
Dorchester #F55-82 T8S R101W Section 24: NESE Cameo Coal
Dorchester #F70-82 T8S R101W Section 24: SESW Cameo Coal
Dorchester #CM4-80 T8S R101W Section 24: SWNW Cameo Coal
Dorchester #BC6A-71 T8S R101W Section 24: SWNW Cameo Coal
Dorchester #F-65-82 T8S R101W Section 13: SESE Cameo Coal
Dorchester #F41-81 T8S R101W Section 22: SWNW Cameo Coal
Dorchester #SC4A-67 T8S R101W Section 22: SWNW Cameo Coal
Dorchester #F42-81 T8S R101W Section 22: SWNE Cameo Coal
Dorchester #BC5A-71 T8S R101W Section 22: SWNE Cameo Coal
Dorchester #F11-81 T8S R101W Section 26: NENE Cameo Coal
5. LOCATION OF EXISTING AND/OR PROPOSED FACILITIES BY OPERATOR:
 - A. There are no existing facilities in place at this time.
 - B. The pipeline location information is included in Exhibits 2, 4A and 4B of the supporting materials and an electronic shapefile included with this application also provides this information.
 - C. The pipeline will be located above ground until it reaches the access road. Please see Exhibit 5 for a map of the access road.
6. LOCATION AND TYPE OF WATER SUPPLY:
 - A. Drilling and completion water source will be CS Pump No 1 Station, Mack, Colorado under private water appropriation.
 - B. Fresh water will be pumped out of the Ute Water Conservancy District water tap at Mack, Colorado and transported by truck over approved access roads.
 - C. No water wells are to be drilled for this location.
 - D. Anticipated quantities of water for construction, dust mitigation, drilling, completion and reclamation is estimated at 250 bbls.
7. SOURCE OF CONSTRUCTION MATERIALS:
 - A. Surface and subsoil materials in the immediate area will be utilized.
 - B. No construction or surfacing materials will be taken from Federal/Indian lands.

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

- C. Any materials to be used which are under BLM jurisdiction shall be approved in advance, as per CFR 36102-3.
 - D. Native (onsite) materials will be used for construction.
8. METHODS OF HANDLING WASTE DISPOSAL:
- A. Cutting not in the flare pit will be deposited into a steel mud tank. Cuttings in mud tank will be solidified with sawdust. Cuttings will be moved from the mud tank to a cutting pile. Cuttings will be managed and tested per COGCC regulations. Once drilling is finished the cuttings that comply with Table 910-1 of the COGCC rules will be buried on location and reclaimed. Cuttings that do not comply with these rules will be removed for proper treatment and/or disposal. The BLM will be notified of method of off-site disposal and volumes.
 - B. The completion pit, cuttings pile and flare pit will be constructed on the well pad and will not be located in natural drainages where a flood hazard exists or surface runoff will destroy or damage the pit walls. All pits will be constructed so as not to leak, break or allow the discharge of liquids there from.
 - C. In the event fluids are produced, any oil will be retained in tankage until sold and any water produced will be retained until its quality can be determined. The quality and quantity will determine the method of disposal. The BLM will be notified of the method of disposal and volumes.
 - D. All trash and other solid waste including cans, cable, etc., will be contained in a portable trash cage. The trash cage will be disposed of in an approved sanitary landfill as needed/or upon completion of operations. No trash will be put in reserve pit.
 - E. All waste will be disposed of at an approved disposal facility. No bores holes will be used for disposal of waste materials.
 - F. Self-contained chemical toilets will be provided for human waste disposal. The toilet holding tanks will be pumped and the contents disposed of in an approved sewage disposal facility on an as need basis and on completion of the operation.
 - G. Garbage will be managed to avoid conflict with wildlife, including black bears. All garbage and trash will be stored in a totally enclosed trash container and removed and deposited in an approved sanitary landfill within one week following termination of drilling operations. No garbage or trash will be disposed of in the cuttings pit. The wellsite and access road will be kept free of trash and debris at all times.
 - H. Walter Fees will comply with those standards set forth by CERCLA and RICRA for the disposal of hazardous waste materials from oil and gas development. Also, hazardous substances specifically listed by the EPA as a hazardous waste or demonstrating a characteristic of a hazardous waste will not be used in drilling, testing, or completion operations.
 - I. Liquid hydrocarbons and produced water production during construction operations will be confined to flowback tanks for a period not to exceed 90 days. All waste water will be removed from the proposed site and trucked to Danish Flats, a licensed and approved commercial disposal facility located in Utah.

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

9. ANCILLARY FACILITIES:
 - A. We anticipate no need for ancillary facilities with the exception of one trailer to be located on the drill site for a workers' operation building.
10. WELLSITE LAYOUT:
 - A. The well site and rig layout diagram are attached to this report as FIGURES #5.
 - B. Available topsoil will be removed from the location and stockpiled. If ground frost prevents the segregation and removal of the topsoil from less desirable subsoil material, waiting until ground frost is out of the soil may be necessary. Location of the soil stockpiles will be located on the north side of location.
 - C. A blow line will be located 100' diagonally from the drill hole to the burn pit. The line will be placed on the surface from the center hole to the burn pit. The burn pit will not be lined, but will be fenced on four sides to protect livestock/wildlife. During air drilling, the blow line will be misted to prevent dust emission and directed into the pit and against a bank if necessary to prevent fluids from leaving the pit.
 - D. Access to the well pad will be as shown on FIGURES #2.
 - E. Natural runoff will be diverted around the well pad.
11. PLAN FOR RECLAMATION OF THE SURFACE:
 - A. The BLM will be contacted and an onsite inspection conducted prior to commencement of any reclamation operations.
 - B. Immediately upon well completion, the well location and surrounding areas will be cleared of all debris, materials, and trash not required for production.
 - C. Waste and spoil materials will be disposed of immediately upon completion of drilling and work-over activities.
 - D. Operator will upgrade/maintain access roads as necessary to prevent soil erosion and provide for year round traffic. Areas unnecessary to operations will be reshaped. Topsoil will be redistributed and a seedbed prepared. All areas outside work area will be re-seeded according to the BLM recommendations for seed mixture.
 - E. All cuttings areas and detention ponds will be closed as soon as possible.
 - F. Methods of stabilization: Local factors will be evaluated to determine what BMPs are suitable and practical at the time of construction. BMPs will be employed in different combinations during construction activities and phases as conditions warrant. BMPs may include: soil pitting/pocking, hydro-seeding, crimped mulch, revegetation, rip-rap armor, diversion ditch, etc.
 - G. Control drainage: Local factors will be evaluated to determine what BMPs are suitable and practical at the time of construction. BMPs will be employed in different combinations during construction activities and phases as conditions warrant, based on routine monitoring. BMPs may include culverts, topsoil/slash berms, run-on protection berm, diversion ditch, etc.
 - H. Sediment control: Local factors will be evaluated to determine what BMPs are suitable and practical at the time of construction. BMPs will be employed in different

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

combinations during construction activities and phases as conditions warrant. BMPs may include: run-off protection, detention pond, diversion ditch, vegetative filter, straw wattles etc.

- I. Slash/brush will be pushed into windrows at the terminal edge of disturbance site and kept in place to cold compost for reclamation.
- J. There will be no additional fill required beyond the materials from the proposed location.
- K. The fill from the proposed action will be separated mechanically and placed in 1 to 2 foot lifts using a dozer and blade.
- L. During interim and final reclamation of the site, fill material will be pushed into cuts and up over the back slope. Plans include construction of sediment traps/reservoirs to maintain compliance with State permit. Topsoil will be distributed evenly over the location and seeded according to the recommended seed mixture. The access road and location shall be ripped or disked prior to seeding. Perennial vegetation will be established. Additional work shall be implemented in case of seeding failures, etc.
- M. For interim and final reclamation, topsoil will be redistributed and prepared as a seedbed. All areas outside the work area will be re-seeded according to the BLM recommendation for seed mixture. Upon completion of backfilling, leveling and recontouring, the stockpiled topsoil will be evenly spread over the reclaimed area(s). Methods of topsoil material segregation and replacement will enable return of it to its respective position on the site (last out, first in) and will assist in the re-establishment of seed-bank, native plant species, soil health and productivity. Prior to reseeded, all disturbed surfaces will be scarified and left with a rough surface, then re-seeded according to the BLM recommendation for seed mixture.
- N. At final reclamation, all storm water management BMPs for drainage and control of erosion and sediment will be removed, as the only remaining potential pollution source via storm water will be sediment. All sediment will be managed through revegetation practices (seeding on contour, crimping straw on contour and/or erosion control hydro-mulch, pocking and topsoil distribution. Perimeter wattles will remain until vegetation establishment meets minimum requirements.
- O. In general, materials will be moved and returned according to a last out first in philosophy. Excessive rock will be scattered as micro-site BMPs or used to obstruct reclaimed access roads, per reclamation planning on-site.
- P. Estimated surface disturbance for this well pad:
Approximate Acreage Disturbance

Well Disturbance	1.7
Interim Reclamation	1.3
Access Road	0.3
- Q. Weed Control: Weeds will be monitored and controlled mechanically (weed-eater) or chemically, per BLM permits/ approval.
- R. The BLM will be notified 48 hours prior to reclamation or seeding. Copies of seed tags will be submitted 2 weeks before seeding, then originals sent to BLM within 30

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

days. All disturbed areas will be seeded with a mixture approved by the BLM in the approved APD.

12. SURFACE OWNERSHIP:

- A. The wellsite and access road has been constructed on lands owned by the Federal Government and managed by the Bureau of Land Management, Grand Junction Resource Area. The operator will contact the BLM office in Grand Junction Colorado 48 hours prior to beginning construction activities.

13. OTHER INFORMATION:

- A. The primary surface use is grazing, hunting and recreation.
- B. Date of commencement will be May 1, 2013 or as soon as possible after APD approval.
- C. If there is snow on the ground when construction begins, it will be removed before the soil is disturbed, and piled downhill from the topsoil stockpile location.
- D. The backslope will be constructed no steeper than 4:1, the foreslope no steeper than 4:1.
- E. All equipment and vehicles will be confined to the access road and well pad.
- F. A complete copy of the approved Application for Permit to Drill (APD) including conditions and stipulations, shall be on the wellsite during construction and drilling operations.
- G. There will be no deviation from the proposed drilling and/or workover program without prior approval from the BLM office. All wells, whether drilling, producing, suspended, or abandoned, will be identified in accordance with 43 CFR 3162.4.
- H. The Operator is responsible for informing all persons in the area who are associated with this project that they will be subject to prosecution for knowingly disturbing historic or archaeological sites, or for collecting artifacts or fossils. The operator will immediately bring to the attention of the Grand Junction Resource Area Manager any and all antiquities or other objects of historic or scientific interest including, but not limited to, historic or prehistoric ruins, artifacts, or fossils discovered as a result of operations under this permit. The operator will immediately suspend all activities in the area of the object and will leave such discoveries intact until told to proceed by Area Manager. Notice to proceed will be based upon evaluation of the cultural significance of the object. Evaluation will be by a qualified professional selected by the Area Manager from a Federal agency insofar as practical. When not practical, the operator will follow the mitigation requirements set forth by the Area Manager concerning protection, preservation, or disposition of any sites or materials discovered. Within five working days the Area Manager will inform the Operator as to:
 - Whether the materials appear eligible for the National Register of Historic Places;
 - the mitigation measures the Operator will likely have to undertake before the site can be used (assuming on site preservation is not necessary); and,
 - a time frame for the Area Manager to complete an expedited review under 36 CFR 800.11 to confirm, through the State Historic Preservation Officer, that the findings of the Area Manager are correct and that mitigation is appropriate.If the Operator wishes, at any time, to relocate activities to avoid the expense of mitigation and/or the delays associated with this process, the Area Manager will

Attachment A

Surface Use Plan of Operations

MULTIPOINT SURFACE USE PLAN

FEDERAL #1-23-8-101

assume responsibility for whatever recordation and stabilization of the exposed materials may be required. Otherwise, in those situations where the Area Manager determines that mitigation, data recovery and/or salvage excavations are necessary, the operator will bear the costs. The Area Manager will provide technical and procedural guidelines for the conduct of mitigation. Upon verification from the Area Manager that the required mitigation has been completed, the Operator will then be allowed to resume construction.

- I. Operator will protect all survey monuments found within the specific location. In the event of obliteration or disturbance of any such objects, Operator will report the incident, in writing, to the Authorized Officer.
- J. A Class III archeological survey was conducted by Grand River Institute and was submitted to the BLM for review.
- K. The proposed point of custody transfer for natural gas will be at the existing Western Gas Supply Company pipeline. Western Gas Supply Company is a wholly owned subsidiary of Xcel Energy.
The coordinates for the proposed tie-in are: (UTM12-NAD83 meters)

Northing	4358010.433
Easting	705880.462
- L. A Raptor Survey Report for this site has been conducted by WestWater Engineering and was submitted to the BLM for review.

14. COMPANY REPRESENTATIVE:

Walter S. Fees III
Walter S. Fees Jr. and Son Oil & Gas, LLC
2516 Foresight Circle, Room #10
Grand Junction, Colorado 81505
Phone (970) 242-2044
Fax (970) 242-2095

Olsson Associates
Lorne Prescott (lprescott@olssonassociates.com)
Jeff Hofman (jhofman@olssonassociates.com)
Craig Richardson (crichardson@olssonassociates.com)
826 21 ½ Road
Grand Junction, Colorado 81505
Phone (970) 263-7800
Fax (970) 263-7456

ATTACHMENT B Conditions of Approval

Company/Operator: Walter S. Fees, Jr. and Son Oil & Gas, LLC

Well: Federal 1-23-8-101MV

Surface Location: NW SE, Section 23, T8S, R101W

NOTIFICATION REQUIREMENTS

Location Construction	-	at least forty-eight (48) hours prior to construction of location and access roads
Spud Notice	-	at least twenty-four (24) hours prior to well spud
Casing/cementing	-	at least twenty-four (24) hours prior to running casing and cementing all casing strings
BOP and Related Equipment Tests	-	at least twenty-four (24) hours prior to initiating pressure tests
First Production Notice-		within five (5) business days after new well begins, or production resumes after well has been off production for over ninety (90) days.
Reclamation		At least (48) hours prior to reshaping the well pad

For after-hours approval or notification, please contact one of the following:

Grand Junction Field Office

Bob Hartman
Petroleum Engineer

W: 970-244-3041
C: 970.250-7002

Ed Fancher
Inspector

W: 970.244-3039

REGULATORY REMINDERS

Approval of this application does not warrant or certify that applicant holds legal or equitable title to those rights in the subject lease, which would entitle applicant to conduct operations thereon.

All lease and/or unit operations shall be conducted in such a manner that full compliance is made with applicable laws, regulations (43 CFR 3100), Onshore Oil and Gas Orders, and the approved plan of operations. The operator is fully responsible for the actions of his subcontractors.

A copy of the approved application for permit to drill (APD), including the conditions of approval and accompanying surface use plan shall be furnished to the field representative by the operator, to insure compliance, and shall be available to authorized personnel at the drill site whenever active construction or drilling operations are under way.

ATTACHMENT B

Conditions of Approval

DRILLING PROGRAM

All operations, unless otherwise specifically approved in the APD, must be conducted in accordance with Onshore Oil and Gas Order No. 2.

The BOP and related equipment shall meet the minimum requirements of Onshore Oil and Gas Order No. 2 for equipment and testing requirements, procedures, etc., for a 2M system and individual components shall be operable as designed. Chart recorders shall be used for all pressure tests.

Surface casing **shall** be cemented back to surface during the primary cement job or by remedial cementing. As a minimum, the cement for the production string shall be brought up to 100 feet above the surface casing shoe. A cement bond log (CBL) shall be run from the production casing shoe to **TOC** and shall be utilized to determine the bond quality for the production casing.

Whether the well is completed as a dry hole or as a producer, "Well Completion and Recompletion Report and Log" (Form 3160-4) shall be submitted no later than 30 days after completion of the well or after completion of operations being performed, per 43 CFR 3164. Per 43-CFR 3162.4(b), submit a complete set of electrical/mechanical logs in .LAS format with standard Form 3160-4, Well Completion or Recompletion Report and Log.

No location shall be constructed or moved, no well shall be plugged, and no drilling or workover equipment shall be removed from a well to be placed in a suspended status without prior approval of the AO. If operations are to be suspended, prior approval of the AO shall be obtained and notification given before resumption of operations.

Should the well be completed for production, the Authorized Officer shall be notified when the well is placed in a producing status. Such notification shall be sent by telegram or other written communication, not later than five (5) days following the date on which the well is placed on production.

A schematic facilities diagram as required by 43 CFR 3162.7-5(b.9.d.), and shall be submitted to the appropriate District Office within sixty (60) days of installation or first production, whichever occurs first. Adhere to all site security regulations as specified in Onshore Oil & Gas Order No. 3. All product lines entering and leaving hydrocarbon storage tanks shall be effectively sealed in accordance with 43 CFR 3162.7-5 (b.4).

No well abandonment operations shall be commenced without the prior approval of the AUTHORIZED OFFICER. In the case of newly drilled dry holes or failures, and in emergency situations, verbal approval shall be obtained from the AO. A "Subsequent Report of Abandonment" Form 3160-5, shall be filed with the AO within thirty (30) days following completion of the well for abandonment. This report shall indicate where plugs were placed and the current status of surface restoration. Final abandonment will not be approved until the surface reclamation work required by the approved APD or approved abandonment notice has been completed to the satisfaction of the AO, his representative, or the appropriate Surface Managing Agency.

The oil and gas measurement facilities shall be installed on the well location. The oil and gas meters shall be calibrated in place prior to any deliveries. Tests for meter accuracy shall be conducted following initial installation and at least quarterly thereafter. The AO shall be provided with a date and time for the initial meter calibration and all future meter-proving schedules. A copy of the meter calibration reports shall be submitted to the Grand Junction Field Office. All meter measurement facilities shall conform to

ATTACHMENT B

Conditions of Approval

Onshore Oil & Gas Order No. 4 for liquid hydrocarbons and Onshore Oil & Gas Order No. 5 for natural gas measurement.

Contact this office for a verbal approval prior to commencing remedial work, plugging operations on newly drilled boreholes, changes within the drilling plan, sidetracks, changes or variances to the BOPE, deviating from conditions of approval, and conducting other operations not specified within the APD.

Submit the (a) mud/drilling log (e.g. Pason disc), (b) driller's event log/operations summary report, (c) production test volumes, (d) directional survey, and (e) Pressure Integrity Test results within 30 days of completed operations (i.e. landing tubing) per 43 CRF 3160-9 (a).

SITE SPECIFIC SURFACE USE CONDITIONS OF APPROVAL

1. Pipeline. The gas-gathering pipeline included in the APD is NOT approved at this time, but shall require a separate right-of-way application and grant.

No pipeline construction or related disturbance is approved beyond the permitted disturbance boundaries of the road and pad.

2. Big Game Winter Range Timing Limitation. An annual Timing Limitation (TL) period shall apply from December 1 through April 31, annually, to minimize impacts to wintering big game. All construction, drilling, completion, work-overs and other intensive activities are excluded. Any request for exception to Timing Limitations shall be submitted in writing to the BLM.
3. Raptor Nest. BLM biologists will determine by July 1, 2013 whether the nest within ¼ mile of the proposed site is still unoccupied. If it is occupied, the nest shall be monitored by a BLM-approved biologist and construction shall not proceed until nestlings have fledged and dispersed from the nest. If construction activities are to occur after July 2014, new raptor surveys shall be conducted. In any case, vegetation removal shall conform to Migratory Bird Act COA below.
4. Pre-Construction. A pre-construction inspection shall be scheduled, before which pre-construction project features shall be marked and installed. Inspection shall include, but not be limited to on-the-ground review of installed pre-construction storm water BMPs, Limit of Disturbance staking, areas planned for topsoil berms, slash storage, vegetation buffers, hiking trail protections (see Recreation/Trails COA below), rounded pad corners and any other required construction details.

Operator shall provide copies of approved Storm Water Management Plan to BLM staff at time of pre-construction inspection.

Construction staff and construction monitors shall attend pre-construction inspection.

ATTACHMENT B

Conditions of Approval

Limit of Disturbance staking shall include areas where construction activities shall avoid the existing BLM hiking trail to the south.

5. Construction Requirements. A BLM-approved construction monitor with authority to direct and stop construction operations shall be on site during all vegetation removal and construction.

For the first 10 feet inside the staked Limit of Disturbance, in areas where topsoil berms are planned (Exhibit 2E), vegetation shall be left standing in place. Construction staking shall clearly delineate this vegetation buffer before vegetation removal proceeds.

Cleared trees, shrubs, limbs and large rocks shall be salvaged and stored as storm water perimeter controls for later redistribution on reclaimed areas. As much as possible vegetation in fill areas will be removed only at ground level to retain root systems to anchor soils and promote re-vegetation during reclamation.

Topsoil berms (Exhibit 2E) shall be pushed against and into the vegetated buffer described above, so that soil may settle into and between standing trees and shrubs, to anchor fill slopes and minimize visual resource impacts to road and trail users. In approved APD, such required actions are shown in **Exhibit 2E** (plat), **Exhibit 3**, (cross sections with hand-drawn trees and topsoil berms, and the hand-drawn sheet labeled **Site Prep Details** that shows planned wattle, vegetative buffer with topsoil, pad fill, pad and original site grade.

Where slopes exceed 40 percent, or should the BLM determine that slope or soil stability necessitated it, advanced design, construction, BMPs or revegetation techniques could be required. If this were to become necessary after construction, the BLM would notify the operator in writing.

Pad corners shall be rounded to minimize cuts and fills.

Operator shall certify to the BLM, by documentation from a licensed professional engineer or independent testing lab, that actual pad and road construction meets design criteria and is constructed to required standards. Certification shall include documentation of compaction testing. Certification of pad and road construction to applicable standards shall be provided to the BLM and the pad and road shall be completed before any drilling equipment moves onto the location. No drill rig, tank or other production equipment shall be placed on any uncompacted fill material.

Pad and road fill slopes shall be constructed in compacted lifts of 6-8", using mobile equipment such as a sheeps-foot roller or equivalent (not a bulldozer), to minimize potential for subsidence or slope failure. Fill material shall be compacted to a minimum density of 95 percent of the maximum dry density as determined by AASHTO T 99. Every 3rd lift shall be

ATTACHMENT B

Conditions of Approval

tested during construction and when compaction does not meet required standards, material shall be removed, replaced, recompacted and re-tested before construction proceeds.

Fill slopes shall be left rough (or roughened) and seeded immediately following construction, for soil/slope stability and visual impact mitigation. See seed mix below.

All available topsoil shall be salvaged and stored. Specifically, topsoil removal shall be to a minimum depth of 5 inches on south slope, 8 inches on ridgetop and on north slope, or to bedrock.

6. Road Construction. Disturbance width for road construction shall not exceed 24 feet, except where sidehills require cut or fill slopes. The road running surface shall not exceed 18 feet. Road design shall include at least two water relief structures.
7. Recreation/Trails. As agreed at the APD onsite inspection, the existing back country trail that runs to the south of the pad, below the fill slope and above the canyon rim, shall remain open and available to recreationists, as before project disturbance.
8. Visual Resource Management (VRM). Knob rising west of access road shall be retained. Pad, road, pipeline and production facilities shall be placed to avoid or minimize visibility from county road, recreation areas and trails, and other sensitive observation points, as much as possible.

Cleared trees and rocks shall be salvaged and redistributed over cut-and-fill slopes or along linear features at the time of construction and/or at times of interim and final reclamation.

Above-ground facilities shall be painted a natural color, BLM Standard Environmental Color Yuma Green, in a non-reflective finish, to minimize visual impacts.

All structures, including but not limited to storage tanks, meter houses, de-hydrators, and the well head, shall be designed to be as low-profile as possible. Tanks used for storage of produced water and condensate shall be no taller than 15 feet and shall be set below ground level if necessary to meet visual objectives.

9. Fire. Any heat-producing equipment installed on the pad shall be a distance of at least twice the height of nearby fuels. (Heat-producing equipment at least 40 feet away from 20 foot trees.)
10. All loading lines shall be placed inside the berm surrounding the tank battery. All off-lease storage, off-lease measurement, or commingling on-lease or off-lease shall have prior written approval from the AO. All open-vent exhaust stacks associated with heater-treater, separator, and dehydrator units must be constructed, to prevent birds and bats from entering and discourage perching and nesting.

ATTACHMENT B

Conditions of Approval

STANDARD SURFACE USE CONDITIONS OF APPROVAL

The following standard surface use COAs are in addition to all stipulations attached to the respective Federal lease.

1. Fire. The operator shall implement measures to prevent fires on public and private land and shall be held responsible for the costs of suppressing fires on public lands that result from the actions of its employees, contractors, or subcontractors. Range or forest fires caused or observed by the operator's employees, contractors, or subcontractors shall be immediately reported to the BLM Grand Junction Dispatch at 970-257-4800. All fires or explosions that cause damage to property or equipment, loss of oil or gas, or injuries to personnel shall immediately be reported to the BLM Grand Junction Field Office at 970-244-3000. During conditions of extreme fire danger, surface-use operations may be restricted or suspended in specific areas, or additional measures may be required by the BLM. In cases of fire hazard, BLM may require adaptive management techniques to minimize risks.
2. Other Regulations and Permits. This authorization is contingent upon receipt of and compliance with all applicable federal, state, county, municipal and local laws and regulations, including all necessary environmental clearances and permits (Colorado Oil and Gas Conservation Commission (COGCC), U.S. Army Corps of Engineers (USACE), U.S. Fish & Wildlife Service, U.S. Forest Service, Colorado Department of Transportation, Colorado Department of Health & Environment, County O&G liaisons, Health and Road Departments, municipalities, etc.).
3. Existing Uses. The operator shall obtain agreements allowing construction and maintenance with all existing right-of-way holders, authorized users, and pipeline operators prior to surface disturbance or construction of the location or access across or adjacent to any existing or approved rights-of-way or pipelines. In the case of privately owned surface, the operator shall certify to BLM that a Surface Use Agreement has been reached with the private surface owners prior to commencing construction and that the owner has been provided a copy of the Surface Use Plan of Operations (SUPO) required as part of a federal APD. If Agreement cannot be reached, the operator shall comply with provisions of the law or regulations governing the Federal right of re-entry to the surface (43 CFR 3814).
4. Migratory Bird Act. New surface disturbance, especially vegetation removal, shall not be allowed between May 15 and July 15, to prevent potential taking of migratory birds and/or eggs, unless otherwise approved in writing by the Grand Junction Field Manager. If surface disturbance is proposed during this period, a written request for exception and a migratory bird survey shall be submitted for approval prior to any surface disturbance. If vegetation removal is accomplished prior to May 15, exception may be granted to allow project activities to proceed during the closure period.

Open metal or plastic pipes or posts shall be permanently filled or capped, to prevent bird entrapment.
5. Federally Protected Species Notifications. If the operator discovers a dead or injured federally protected species (i.e., migratory bird species, bald or golden eagle, or species listed by the FWS as threatened or endangered) in or adjacent to a pit, trench, tank, exhaust stack, or fence. (If the operator is unable to contact the FWS Law Enforcement office, the operator must contact the nearest FWS Ecological Services office.)
6. Jurisdictional Waters of the U.S. The operator shall obtain appropriate permits from the U.S. Army Corps of Engineers (USACE) prior to discharging fill material into waters of the U.S. in accordance with Section 404 of the Clean Water Act. Waters of the U.S. are defined in 33 CFR Section 328.3

ATTACHMENT B

Conditions of Approval

and may include wetlands as well as perennial, intermittent, and ephemeral streams. Permanent impacts to waters of the U.S. may require mitigation. Copies of any printed or emailed approved USACE permits or verification letters shall be forwarded to the BLM.

When activity in a wetland is unavoidable, the operator may be required to prevent disturbance by use of wooden or other protective mats and shall restore all temporarily disturbed wetlands or riparian areas. The operator shall consult with the BLM to determine appropriate mitigation, including verification of native plant species to be used in restoration. Temporary and permanent impacts to jurisdictional waters of the U.S. may require additional mitigation, including compensatory offsite mitigation. Contact the USACE, Colorado West Regulatory Branch, at 970-243-1199, or susan.nall@usace.army.mil.

7. Heritage Resources - Cultural and Paleontological. All persons in the area who are associated with this authorization shall be informed that any person who, without a permit, injures, destroys, excavates, appropriates or removes any vertebrate fossil, historic or prehistoric ruin, artifact, object of antiquity, Native American remains, Native American cultural item, or archaeological resources on public lands is subject to arrest and penalty of law (16 USC 433, 16 USC 470, 18 USC 641, 18 USC 1170, and 18 USC 1361). Any heritage resource discovered requires that work in the area must stop and the BLM Authorized Officer notified. Strict adherence to the confidentiality of information concerning the nature and location of archeological resources would be required of the proponent and all of their subcontractors (Archaeological Resource Protection Act, 16 U.S.C. 470hh).

Inadvertent Discovery:

a) The **National Historic Preservation Act** (NHPA) [16 USC 470s., 36 CFR §800.13], as amended, requires that if newly discovered historic or archaeological materials or other cultural resources are identified during the Proposed Action implementation, work in that area must stop and the BLM Authorized Officer (AO) must be notified immediately. Within five working days the AO will determine the actions that will likely have to be completed before the site can be used, assuming in place preservation is not necessary §800.13(b)(3).

b) The **Native American Graves Protection and Repatriation Act** (NAGPRA) [25 USC 3001 et seq., 43 CFR 10.4] requires that if inadvertent discovery of Native American Human Remains or Objects of Cultural Patrimony occurs, any activity must cease in the area of discovery, a reasonable effort made to protect the item(s) discovered, and immediate notice be made to the BLM Authorized Officer, as well as the appropriate Native American group(s) (IV.C.2). Notice may be followed by a 30-day delay (NAGPRA §3(d)).

c) The **Paleontological Resources Preservation Act** (PRPA) [16 U.S.C. 470aaa] requires the proponent to immediately suspend activities in the vicinity, protect the discovery from damage and notify the BLM Authorized Officer of any paleontological resources discovered as a result of operations under this authorization. The Authorized Officer will evaluate, or will have evaluated, such discoveries as soon as possible, but not later than 10 working days after being notified. Appropriate measures to mitigate adverse effects to significant paleontological resources will be determined by the Authorized Officer after consulting with the operator. Within 10 days, the operator will be allowed to continue construction through the site, or will be given the choice of either (1) following the Authorized Officer's instructions for stabilizing the fossil resource in place and avoiding further disturbance to the fossil resource, or (2) following the Authorized Officer's instructions for mitigating impacts to the fossil resource prior to continuing construction through the project area.

ATTACHMENT B

Conditions of Approval

d) If human remains are discovered on private or state land associated with this authorization, the BLM will notify the State of Colorado Archaeologist immediately, who will comply with Colorado Revised Statutes (Appendix) regarding the discovery of human remains (24-80-1302).

e) In a new discovery situation, the operator may relocate activities to avoid the expense of mitigation and delays associated with this process, as long as the new area has been appropriately inventoried and has no resource concerns, and the exposed materials are recorded and stabilized. Otherwise, the operator will be responsible for mitigation costs. The BLM authorized officer will provide technical and procedural guidelines for relocation and/or to conduct mitigation. Upon verification from the BLM authorized officer that the required mitigation has been completed, the operator will be allowed to resume construction.

8. Big Game Winter Range Timing Limitation. Where winter range areas identified by BLM are not protected by lease stipulations, an annual Timing Limitation (TL) period shall apply from January 1 to March 1, to minimize impacts to wintering big game. All construction, drilling, completion, work-overs and other intensive activities are excluded during the 60-day period. Requests for exceptions to Timing Limitations shall be submitted in writing to the BLM via a Sundry Notice.
9. Range Management. Damage to range improvements (fences, gates, reservoirs, pipelines, etc.) shall be avoided, but if they are damaged, the operator shall immediately repair or replace them. Where an access road bisects an existing livestock fence, a steel frame gate or a cattle-guard with a bypass gate shall be installed across the roadway.
10. Soils. Cuts and fills shall be minimized when working on erosive soils and on slopes in excess of 30 percent. Cut-and-fill slopes shall be stabilized through revegetation practices with an approved seed mix shortly following construction activities, to minimize the potential for slope failures, erosion and soil loss. Fill slopes adjacent to drainages shall be protected with BMPs designed to minimize sediment transport. On slopes greater than 50 percent, BLM may request a professional geotechnical analysis and/or engineered plans prior to construction.
11. Weed Control. The operator shall regularly monitor and promptly control noxious weeds or other undesirable plant species as set forth in the BLM/ Forest Service *Noxious and Invasive Weed Management Plan for Oil and Gas Operators*, dated March 2007. A Pesticide Use Proposal (PUP) must be approved by the BLM prior to the use of herbicides. Annual weed monitoring reports shall be submitted to the BLM by **December 1**.

Before mobilization of equipment onto public lands, to prevent the spread of invasive species, the operator shall inspect and ensure that all construction equipment and vehicles are clean and free of soil, mud and vegetative material that could transport weed seeds. Avoid driving through or parking on weed infestations.

12. Dust Abatement. The operator shall prevent and abate fugitive dust as needed, whether created by vehicular traffic, equipment operations or wind events. If dust abatement is insufficient, the BLM may direct the operator to change the level and type of treatment. BLM approval is required before application of surfactants, binding agents, or other dust-suppression chemicals on federally permitted projects and on public lands. More stringent dust control may be required in areas adjacent to Federal- or State-listed threatened, endangered, or sensitive plant species.
13. Pre-Construction and Limits of Disturbance. An onsite pre-construction meeting may be required, to ensure construction proceeds in accordance with approved permit and COAs.

ATTACHMENT B

Conditions of Approval

Limit-of-disturbance (LOD) stakes or markers shall be placed before construction and maintained in place. If such boundary markers are disturbed during construction, they shall be immediately replaced before construction proceeds and shall remain. If LOD markers are removed before BLM post-construction inspection, the operator shall provide "As Built" surveys, shapefiles or a geodatabase, upon request from the BLM.

Before construction, cut and fill slopes and spoil storage areas shall be marked with flagging, snow fence, stakes or lath, visible one to another, in a distinctive color. Access road, pipeline and pad edges shall be marked by construction control stakes, to ensure construction in accordance with specifications. All stakes shall be visible from one to the next, be distinguishable from one another by type and be staked at no more than 100-foot stationing. If stakes are disturbed, they shall be immediately replaced before construction proceeds and shall remain in place at least until BLM post-construction inspection.

14. Storm Water Management and Soil Protection. A General Construction Permit from the Colorado Department of Public Health and Environment (CDPHE) is required and a copy shall be provided to the BLM prior to construction. Permit compliance requires a site-specific Storm Water Management Plan, establishment of directed run-off and adaptive Best Management Practices (BMPs), as well as systematic monitoring and maintenance of all BMPs. Storm Water BMPs may also incorporate or function as Spill Prevention, Control and Countermeasures (SPCC) controls.

All BMPs must be maintained in good repair and functional condition, including clean-out of sediment basins and catchments, and replacement of damaged straw wattles/ bales or silt fence.

15. As-Built Details. Within 30 days of setting production facilities, the operator shall submit to the BLM a digital as-built file of the following: the perimeter of the pad and all related BMPs, to be collected at the base of fill slopes, the head of cut slopes, and to include all associated soil storage areas and storm water BMPs, as well as the wellhead(s) and the centerline of the access road. The digital depiction shall be in a format that is GIS compatible (shapefiles) in NAD83, UTM coordinate system, Zone 13North, in meters.
16. Drainage Crossings and Culverts. Pads, roads, and pipelines shall be located away from defined drainages wherever possible. In areas where construction is located within 100 feet of a drainage, an adequate vegetative buffer, artificial buffer (e.g., straw bales, matting, etc.), or filter strip shall be maintained between the constructed feature road and the drainage, to minimize sediment transport into the drainage.

All vehicles shall be fueled at least 100 feet from stream corridors.

Any construction activities at perennial, intermittent and ephemeral drainage crossings (e.g. burying pipelines, installing culverts) shall be timed to avoid high flow conditions. The minimum culvert diameter in any installation for a drainage crossing or road drainage shall be 24 inches. Culverts on perennial and intermittent streams shall be designed to allow for passage of aquatic biota. Culverts at drainage crossings shall be designed and installed to pass, without development of a static head at the pipe inlet, at least a 25-year storm event, but may be deemed to require additional culvert design capacity. Due to the flashy nature of area drainages and anticipated culvert maintenance, the USACE recommends designing drainage crossings for the 100-year event. Contact the USACE Colorado West Regulatory Branch at 970-243-1199.

ATTACHMENT B

Conditions of Approval

17. Road Construction, Use and Maintenance. Roads shall be crowned or sloped, drained with ditches, culverts and/or water dips, and constructed, sized and surfaced in compliance with BLM Gold Book standards (pp. 24-28). Water outlets shall incorporate BMPs such as rip-rap, sediment catchments and anchored check structures which slow water velocity, to prevent erosion and sediment transport. If applicable, initial gravel application shall be to a minimum depth of 4 inches.

When saturated soil conditions exist on access roads or location, or rutting deepens to 3 inches, construction and travel shall be halted until soil material dries out or is frozen sufficiently or is otherwise brought to standards appropriate for resource protection and road construction. Use shall not proceed under conditions of undue damage and erosion to soils, roads and/or locations. All drainage ditches and culverts shall be kept clear and free flowing, and shall be maintained in good condition.

Where roads are located near drainages, vegetated buffer strips shall be left between areas of disturbance and drainages. (See Drainage Crossings and Culverts.)

The operator shall provide timely maintenance of roads. A regular schedule for maintenance shall include, but not be limited to dust abatement, reconstruction of the crown, slope, or water dips/bars; blading or resurfacing; clean-out of ditches, culverts, catchments and other BMPs. When rutting of the travel-way deepens to 3 inches, maintenance or upgrade shall be conducted as approved by BLM.

Roads that access active construction and drilling sites shall be posted with warning signs to alert road users to project personnel and vehicles likely to be in the area. Project personnel shall restrict activities and travel to permitted roads and sites.

Operator shall install speed control measures on project-related unpaved roads.

Ditches may be revegetated and/or include large rocks or other BMPs to slow drainage velocity and settle sediment. Ditch seeding and revegetation may be required in erodible soils.

All cut and fill slopes for roads (and well pads and related locations) shall be protected against rilling and erosion with BMPs such as soil texturing and seeding or additional measures approved by the BLM. Measures may include geotextiles, weed-free straw crimping/ bales/ wattles/ matting, as needed or as detailed by storm water plan or BLM permit. BMPs shall be monitored and maintained in functional condition.

18. Visual Resource Protection. Pads, roads, pipelines and production facilities shall be located and placed to avoid or minimize visibility from travel corridors, residential areas and other sensitive observation points, unless directed otherwise by the BLM, and shall be designed to maximize reshaping of cut/fill slopes and interim reclamation of the pad.

To the extent practical, existing vegetation shall be preserved when clearing and grading for pads, roads, and pipelines. The BLM may direct that cleared trees and rocks be salvaged and redistributed over reshaped cut-and-fill slopes or along linear features.

To mitigate straight-line visual contrast effects of cut/ fill slopes, pad margins or cleared vegetation, adaptive management techniques may be required by the BLM before or after construction. Example: Additional tree removal along contrasting edges, to create irregularly shaped openings or natural-looking mosaic patterns; texturing or coloring surfaces to mitigate visual contrasts.

ATTACHMENT B

Conditions of Approval

To blend with the natural environment, all permanent above-ground facilities placed on the location shall be painted a natural color to blend with the background landscape, in a non-reflective finish. A BLM Standard Environmental Color may be specified.

19. Construction, Vegetation Removal, Topsoil Stripping and Storage. Pre-construction BMPs shall be installed before construction. Areas of approved activities shall be cleared of brush and trees. No stump left in place shall exceed six inches in height. Cleared trees and shrubs that are not shredded be salvaged and stored as storm water perimeter controls for later redistribution on reclaimed areas, as appropriate.

When saturated soil conditions exist on access roads or location, construction shall be halted until soil dries or until activities can proceed without soil damage. No saturated or frozen topsoil shall be stripped.

At the time of construction, (well pads, pipelines, roads, or other surface facilities) topsoil shall be stripped following vegetation removal. Topsoil shall include all suitable growth medium present at a site, as indicated by color or texture — depths may vary across a site. Stripped topsoil and vegetation smaller than 4 inches in diameter shall be segregated and stored separately from subsoils or other excavated material and replaced prior to final seedbed preparation.

To facilitate its replacement, extend its biological viability and create a berm to control storm water, topsoil shall be wind-rowed around pad perimeter wherever practical. Along pipelines and roads, topsoil shall be wind-rowed, segregated and stored for later redistribution during reclamation.

Within 30 days of completion of pad construction, topsoil storage piles, storm water control features, temporarily disturbed areas along roads and pipelines, and cut and fill slopes shall undergo temporary seeding to stabilize the materials, maintain biotic soil activities, and minimize weed infestations. Seedbed preparation may not be required for topsoil storage piles or other areas of temporary seeding.

20. Chemical and Fuels - Secondary Containment /Exclosure Screening – The operator shall prevent all hazardous, poisonous, flammable and toxic substances from contacting soil and/or water. At a minimum, the operator shall install and maintain an impervious secondary containment system for any tank or barrel containing hazardous, poisonous, flammable or toxic substances. Containment shall be sufficient to contain 110% of the contents as well as any drips, leaks and anticipated precipitation.

All installed production facilities (storage tanks, load outs, separators, treating units, etc.) with the potential to leak or spill oil, condensate, produced water, glycol, or other fluid which may be a hazard to public health or safety shall be placed within an appropriate impervious secondary containment structure that shall hold 110% of the capacity of the largest single container within it for 72 hours.

Chemical containers shall be clearly labeled, maintained in good condition and placed within secondary containment. They shall not be stored on bare ground, nor exposed to sun and moisture.

Any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR, Part 117 shall be reported per the Comprehensive Environmental Response Compensation and Liability Act of 1980, Section 102b (CERCLA). Copies of any report to any Federal agency or State government as a result of a reportable release/ spill of any toxic substances shall be furnished to the BLM, concurrent with the filing of the reports to any Federal agency or State government.

ATTACHMENT B

Conditions of Approval

The operator shall dispose of any fluids that collect in the containment system which do not meet applicable State or U.S. Environmental Protection Agency livestock water standards, per State law and in a manner so that fluids do not drain to the soil or ground.

All secondary containment systems shall be designed, constructed, and maintained to prevent wildlife and livestock exposure to harmful substances. The operator shall install effective wildlife and livestock exclosure systems like fencing, netting, expanded metal mesh, lids and grate covers.

21. Pipelines. Buried pipelines shall have a minimum cover of 48 inches in a roadway and at road crossings, 36 inches through typical soil and rock, and 24 inches in areas requiring rock blasting. The permit holder is responsible for burying a pipeline to a depth that safely accommodates existing land and road uses and maintenance activities.

Pipeline warning signs permanently marked with the operator's and owner's names (emergency contacts) and purpose (product) of the pipeline shall be installed within five days of construction completion and prior to use of the pipeline. Pipeline warning signs are required at all road crossings and along the alignment, visible from sign to sign.

Pipelines installed beneath stream crossings shall be buried to a minimum depth of 4 feet below the channel substrate, to avoid pipeline exposure by channel scour and degradation. Following pipeline burial, the channel grade and substrate composition shall be returned to pre-construction conditions.

All pipeline welds within 100 feet of a perennial stream shall be x-rayed to prevent leakage. Where pipelines cross streams that support Federal- or State-listed threatened or endangered species or other sensitive species, the BLM may require additional safeguards, including double-walled pipe, and remotely-actuated block or check valves on both sides of the stream.

Buried pipelines shall be reclaimed to final reclamation at the time of installation.

22. Well Drilling, Testing, and Completion (Pits). Substances specifically listed as a hazardous waste or demonstrating character of a hazardous waste (40 CFR 261) shall not be used in drilling, testing, or completion operations, nor introduced at any time into the reserve or cuttings pit.

The operator shall minimize or preclude releases of hydrocarbons into open pits. Unless the authorized officer approves the release, no oil should go into a pit except in an emergency. The operator must remove any hydrocarbons (oil, condensate, paraffin, diesel, etc.) introduced a pit within 24 hours of discovery.

Fluids shall be confined to pits or tanks during air drilling, flaring or fracturing operations. Flare or blooey lines shall be directed into a pit and against a bank to prevent dispersion of materials or flame. During air drilling, the blooey line shall be misted.

All pits that may contain liquid material shall be lined to prevent seepage into the ground. The pit liner shall be maintained in good working condition, with no tears or holes, until the pit is closed.

Pits shall be constructed to preclude the accumulation of precipitation runoff and maintain a minimum of 2 feet of freeboard between the maximum fluid level and the lowest point of containment. If pit fluids threaten to rise to a level above that, the operator shall immediately prevent introduction of additional fluids until sufficient pit capacity has been restored through fluid removal or shall install an alternative approved containment method.

ATTACHMENT B

Conditions of Approval

The operator shall prevent wildlife and livestock access (including avian wildlife) to fluids pits that contain or have the potential to contain salinity sufficient to harm wildlife or livestock, to contain hydrocarbons, surfactants, or Resource Conservation and Recovery Act-exempt hazardous substances. For reserve pits, fence all four sides as soon as the pit is constructed. Reconstruct any damage to the rig side of the fence immediately following release of the drilling rig. At a minimum, the operator shall adequately fence all fluids pits and open cellars during and after drilling operations until the pit is free of fluids and the operator initiates backfilling.

Fencing for pits and other facilities with potential to cause harm to big game and other wildlife shall be 8-foot woven wire fence with adequate bracing. Construct the fence at least 2 feet from the edge of the pit. The bottom two feet of mesh shall be no larger than 1½ inch openings, to preclude small animals from entering the pit. All corners shall be braced and fence construction shall be on cut or undisturbed ground. The fence shall be maintained erect and in good condition to exclude wildlife and livestock. (Fencing: BLM Manual Handbook H-1741-1, p. 16)

All open top tanks and pits shall be covered or netted to eliminate any hazard to birds and flying mammals (CERCLA Section 101(14)). The operator shall prevent wildlife and livestock access (including avian wildlife) to fluids pits that contain or have the potential to contain salinity sufficient to harm wildlife or livestock, to contain hydrocarbons, surfactants, or Resource Conservation and Recovery Act-exempt hazardous substances. At a minimum, the operator shall install approved netting in these circumstances, immediately following release of the drilling rig. Note: The BLM does not approve flagging, strobe lights, metal reflectors or noisemakers to deter wildlife.

Minimum Netting Requirements: The operator shall:

- a. Construct a rigid structure of steel tubing or wooden posts with cable strung across the pit no further apart than 7-foot intervals along the X- and Y-axes to form a grid of 7-foot squares.
- b. Suspend netting a minimum of 4 to 5 feet above the pit surface.
- c. Use a maximum netting mesh size of 1½ inches to allow for snow loading while excluding most birds in accordance with Fish and Wildlife Service recommendations. Refer to: <http://www.fws.gov/mountain-prairie/contaminants/contaminants1c.html>
- d. Cover the top and sides of the netting support frame with netting and secure the netting at the ground surface around the entire pit to prevent wildlife entry at the netting edges.
Note: Other fencing or a wire mesh panel with openings larger than 1½ inches does not sufficiently exclude small wildlife and songbirds unless covered by smaller meshed netting.
- e. Monitor and maintain the netting sufficiently to ensure the netting is functioning as intended, has not entrapped wildlife, and is free of holes and gaps greater than 1½ inches.

Any wildlife or birds found dead or apparently ill in or near pits must be reported to the Grand Junction Field Office immediately.

Any lined pit, any pit constructed with a slope steeper than 3:1, or where entrapment hazards may exist, shall include escape ramps or ladders installed every 50 feet along the slope and at each corner. Example: anchored sections of galvanized chain-link fence at least 24 inches wide extending from the bottom of the pit to the top of the pit slope and across the top edge of the pit liner for at least two feet.

ATTACHMENT B

Conditions of Approval

Operator and all subcontractors shall comply with all State wildlife laws. As per Colorado Revised Statute 33-6-109 (1), it is unlawful for anyone to hunt, take or possess wildlife except as permitted by Colorado Statute or by Colorado Wildlife Commission regulation. Colorado statute defines “hunt” to include “trapping” and “capturing.” The trapping and subsequent drowning of wildlife within a pit may be viewed as illegal taking of wildlife and criminal or civil actions/ penalties for wildlife could be imposed. “Wildlife friendly” conditions are intended to prevent wildlife loss and potential legal consequences.

Pits shall be dry prior to soil testing and backfilling and closed per COGCC standards. Before backfilling, drill cuttings that have been tested and that meet COGCC Table 910-1 standards may be buried in the cut, but shall not be used as fill. At the time of backfilling, all muds and associated solids shall be confined to the pit, with none squeezed out or incorporated into surface materials. A minimum of 4 feet of cover (overburden) is required above any muds or solids. When work is complete, the pit area must support the weight of a drill rig/ heavy equipment without subsidence.

23. Production. Production facilities shall be located and arranged to facilitate safety and minimize long-term surface disturbance. Typically, they shall be clustered at the access end of the pad with tanks in cut. Access to facilities should be provided by a teardrop-shaped road through the production area, so that the driving area may be clearly defined and limited so that teardrop center may be revegetated.

To blend with the natural environment, all permanent above-ground facilities placed on the location shall be painted a natural color that blends with the background landscape, in a non-reflective finish. A BLM Standard Environmental Color may be specified.

All production equipment with a chimney, vent, or stack shall be fitted with a device such as an excluder cone, to prevent birds or small mammals from entering or perching on any part of the chimney. Flat screens inside stacks are insufficient protection.

Open metal or plastic pipes or posts shall be permanently filled or capped, to prevent bird entrapment.

24. Interim Reclamation of Producing Wells.

- a. *Deadlines and Objectives. (Deadlines are subject to extension on a case-by-case basis, following application in writing to the BLM.)*

Within 30 days of completion of pad construction, topsoil storage berms, storm water control features, temporarily disturbed areas along roads and pipelines, and cut and fill slopes shall undergo temporary seeding to stabilize materials, maintain biotic soil activities, and minimize weed infestations. Seedbed preparation may not be required for stored topsoil or other areas of temporary seeding.

Within 6 months following completion of the last well planned on a pad, or after a year has passed with no new wells drilled, interim reclamation (IR) shall be completed to reduce the well pad to the smallest size needed for production. IR shall include earthwork, seeding and BMPs.

Interim reclamation shall restore landforms; reestablish/maintain biologically active topsoil, including vegetative cover; control erosion and sediment transport; and minimize losses of habitat, visual resources, and forage throughout the life of the well.

ATTACHMENT B

Conditions of Approval

Prior to interim reclamation, the operator shall meet with BLM to inspect the disturbed area, to review the existing reclamation plan and agree upon any revisions to the plan.

Seed tags shall be submitted for BLM approval at least 14 days before proposed seeding date.

Notify the BLM at least 48 hours prior to beginning any reclamation work.

Weed-free certification, seed tags, and a Subsequent Report Sundry Notice describing the reclamation shall be submitted to the Grand Junction Field Office within 30 days of seeding.

IR performance standards shall be considered met when disturbed areas not needed for long-term production operations or vehicle travel have been recontoured and stabilized; revegetated with a self-sustaining, vigorous, diverse, native (or otherwise approved) plant community that minimizes visual impacts, provides forage and stabilizes soils.

At a minimum, the established plant community shall consist of species included in the seed mix and/or desirable species which occur in the surrounding natural vegetation. Permanent vegetative cover shall be determined successful when the basal cover of desirable perennial species is at least 80 percent of the basal cover of the adjacent undisturbed area or of potential basal cover as defined in the National Resource Conservation Service Ecological Site(s) for the area.

Operators and right-of-way holders are required to meet reclamation performance standards. Successful compliance with standards is determined by the BLM. If revegetation is unsuccessful, subsequent treatments and reseedings shall be required until standards are met.

- b. Recontouring and Seedbed Preparation.* Leaving in place only the areas needed for production, pull fill slope soils up and return them to cut areas, pushing up and over the edges of the cut. Compacted areas to be reclaimed shall be ripped in two passes at opposite directions before being reshaped (at least 18 inches deep, furrows spaced at 2 feet).

Following final contouring, evenly redistribute salvaged topsoil. BLM may require soil amendments. Final seedbed preparation shall consist of scarifying (raking or harrowing) or roughening spread topsoil prior to seeding, unless seeding takes place immediately. Seedbed preparation techniques may include pocking, ripping, disking or other soil roughening techniques. If contour cultivating is approved, it shall be 4-6 inches deep or to the depth of redistributed topsoil. If pocking, pit the surface with small depressions to form micro-basins, in a "fish scale" pattern. Construct them along the contour, perpendicular to the natural flow of water and/or prevailing wind.

- c. Seed Mixes.* All disturbed areas shall be seeded with a seed mixture approved by the BLM, consistent with BLM standards in terms of species and seeding rate for the specific habitat type within the project area.
- Seed shall contain no noxious, prohibited or restricted weed seeds and contain no more than 0.5 percent by weight of other weed seeds.
 - Only viability-tested, certified seed for the current year, with a minimum germination rate of 80% and a minimum purity of 90% shall be used.
 - Seed that does not meet the above criteria shall not be applied to public lands.
- d. Approved Seed Mixture.* All disturbed areas shall be seeded with the following:

ATTACHMENT B Conditions of Approval

SEED MIX Species Name	Common Name	Synonym	Lb/ac (PLS)
Native Grasses			
<i>Pseudoroegneria spicata</i>	Bluebunch wheatgrass	<i>Agropyron spicatum</i>	3.0
<i>Pascopyrum Smithii</i>	Western wheatgrass		3.0
<i>Elymus elymoides</i>	Bottlebrush squirreltail	<i>Sitanion hystrix</i>	2.0
<i>Oryzopsis hymenoides</i>	Indian rice grass	<i>Acnatherum hymenoides</i>	2.1
<i>Hesperostipa comate</i> or <i>Hesperostipa neomexicana</i>	Needle-and-thread grass		2.0
<i>Koeleria macrantha</i>	Prairie junegrass		1.0
Native Shrubs			
<i>Atriplex confertifolia</i>	Shadscale		2.0
<i>Amelanchier utahensis</i>	Utah serviceberry		0.4
This rate is for drilled seed and shall be doubled for broadcast seeding.			15.5

- e. *Seeding procedures.* Seeding shall be conducted no more than 24 hours following final seedbed preparation. If interim revegetation is unsuccessful, the operator shall implement subsequent reseeds until interim reclamation standards are met.

Where possible, drill seed no deeper than ½ inch, following the contour of the site. Follow drill seeding with culti-paction or crimped weed-free straw mulch, to enhance seed-to-soil contact and prevent loss of seeds and soil. In areas that cannot be drilled, broadcast seed at 2.0 times the application rate, within 24 hours of soil work. If seeding takes place later than within 24 hours of dirt work, cover seed ½ to 1 inch deep with a harrow or drag bar, unless pocking. When pocking is used as seedbed preparation, seed must be broadcast within 24 hours of soil prep.

- f. *Erosion Control.* Cut-and-fill slopes shall be protected against erosion with the use of pocking/pitting, lateral furrows, hydro mulch or other measures approved by the BLM. Near drainages or in areas with high erosion potential, additional revegetation, BMPs or other methods may be required, to reduce soil erosion and offsite transport of sediments.
- g. *Fencing and Site Protection.* The pad shall be fenced to BLM standards to exclude grazing livestock for the first two growing seasons or until seeded species are firmly established, whichever comes later. The BLM shall approve the type of fencing.

In deer and elk habitat, fences for livestock exclusion shall not exceed 40 inches. The four-strand fence shall have smooth top and bottom wires. Distance from the ground to the bottom smooth wire shall be no less than 16 inches. Distance from the top wire to the second wire shall be no less than 12 inches. Middle wires shall be barbed, with 6 inch spacing.

ATTACHMENT B

Conditions of Approval

h. Monitoring. The operator shall regularly monitor, for reclamation success and for invasive species, all sites categorized as “operator reclamation in progress” and shall submit an annual monitoring report of these sites to the BLM by December 1 of each year. The annual report shall document whether attainment of reclamation objectives appears likely. If objectives appear unlikely to be achieved, the report shall identify appropriate corrective actions. Upon review and approval of the report by the BLM, the operator shall be responsible for implementing approved or specified measures.

25. Final Reclamation. The long-term objective of final reclamation is to return the land, following use for energy development, to a condition approximating that which existed prior to disturbance. This includes restoration of the landform and natural vegetative community, hydrologic systems, visual resources, and wildlife habitats.

A well pad that no longer has a producing well shall undergo final reclamation within no more than 6 months, weather permitting, following plugging and abandonment of the final well on that pad. Buried pipelines shall be reclaimed to final reclamation standards at the time of installation.

Prior to final reclamation of a well pad or pipeline, the operator shall meet with BLM to inspect the disturbed area, review the existing reclamation plan, and agree to any changes to the plan.

The BLM shall be notified at least 48 hours prior to commencing any reclamation work and within 48 hours of completion of reclamation work.

Prior to recontouring and reseeding the pad, the operator shall complete the following:

- All equipment, facilities, and trash shall be removed from the location.
- Each borehole shall be plugged and capped, and its related surface equipment removed.
- Subsurface pipelines shall be purged and plugged at specific intervals.
- Dry hole markers shall be subsurface, to prevent their use as perching sites by raptors.

Recontouring for final reclamation shall consist of returning the pad, material storage piles, cut-and-fill slopes, and storm water control features to natural contours that blend with adjacent undisturbed areas, as specified in the final reclamation plan or final reclamation plat approved by BLM.

Requirements for seedbed preparation, soil amendments, seed, seeding procedures, mulching, erosion control, fencing, site security, and monitoring shall be as specified for interim reclamation.