RECORD OF DECISION

Federal Coal Lease Modifications COC-1362 & COC-67232

Paonia Ranger District
Grand Mesa, Uncompahgre and Gunnison National Forests
Gunnison County, Colorado
Sections 10, 11, 14, 15, 22 and 23 of T. 14S., R. 90W., 6th PM

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August 2, 2012

Date

ROD

Federal Coal Lease Modifications COC-1362 & COC-67232

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I. BACKGROUND

A Final Environmental Impact Statement (FEIS) has been prepared by Grand Mesa, Uncompahgre and Gunnison National Forests (GMUG) in cooperation with:

- Uncompahgre Field Office of the Bureau of Land Management (BLM),
- Colorado State Office of the BLM,
- Western Region of the Office of Surface Mining, Reclamation and Enforcement (OSM), and
- Colorado Division of Reclamation, Mining and Safety (DRMS)

The FEIS analyzes and discloses the impacts of modifying federal coal leases COC-1362 and COC-67232 in response to applications received by the BLM Colorado State Office. On January 26, 2009, the GMUG received a request from the BLM to analyze a proposed modification and stipulations to COC-1362 containing about 800 acres. On December 14, 2009, the GMUG received a request from the BLM to analyze a proposed modification and stipulations to COC-67232, containing about 921 acres. Coal in the existing leases is mined at the West Elk Mine near Somerset, Colorado. Lease COC-67232 is held by Ark Land Company (Ark), and lease COC-1362 is held by Mountain Coal Company (MCC). The applications were made to ensure that compliant and super-compliant coal reserves are recovered and not bypassed. These applications are being processed according to procedures set forth in 43 CFR 3432.

The coal lease modification areas lie in portions of sections 10, 11, 14, 15, 22 and 23 of T. 14S., R. 90W., 6th PM in Gunnison County, Colorado. The modification areas are within National Forest System (NFS) lands managed by the GMUG. The coal estate is administered by the BLM.

The BLM is required by law to consider leasing Federally-owned minerals for economic recovery. With respect to NFS lands, the Forest Service considers whether or not to consent to the BLM leasing coal reserves underlying NFS lands and prescribes stipulations for the protection of non-mineral surface resources.

Within the lease modification areas, the coal would be accessed and recovered by underground longwall mining methods from the existing West Elk Mine. The coal would be transported using the existing coal transportation system and surface facilities. At the leasing (or modification) stage, the federal agencies evaluate the effects of mining on surface resources. This evaluation includes direct impacts resulting from expected subsidence (i.e. the elevation of the land surface over mined areas would slightly be reduced as a result of mining), and other foreseeable impacts to surface resources from mining related activities. Under a foreseeable mine plan scenario, surface impacts within these modification areas would include those from constructing methane drainage wells (MDWs) and associated access routes required to safely mine the coal resources. Methane gas is byproduct of the process of mining coal using longwall systems. Methane concentrations in excess of 5% can be explosive, and thus it must be removed, most commonly through drainage wells, to keep concentrations below that dangerous level. Specific locations of the MDWs and roads are not known at the leasing stage, and will not be known until specific mine plans are approved by DRMS, BLM, OSM, and the Mine Safety and Health Administration (MSHA) during the mine permitting process, subsequent to leasing. The surface impacts associated with mining were estimated to consider cumulative effects of leasing and are based on similar impacts from recent mining.
On July 3, 2012, the Colorado Roadless Rule (CRR) was promulgated and codified at 36 CFR Part 294. The CRR is now the controlling law and the 2001 Roadless Rule does not apply. The State of Colorado and the Forest Service developed the CRR in partnership to create a balance between conserving roadless area characteristics for future generations and allowing limited management activities within roadless areas that are important to the citizens and economy of Colorado. The CRR includes an exception for temporary road construction within an area on the GMUG defined as the North Fork coal mining area. This exemption was crafted to allow construction of temporary roads needed for coal mining activities. These temporary roads would not have been allowed under the 2001 Roadless Rule, and the project proponent has said that absent these roads, coal mining would not occur. The portions of lease modification areas within the Sunset Colorado Roadless Area (CRA) are located within the North Fork coal mining area and are subject to the exception for temporary road construction.

About 915 of the approximately 921 acres of the proposed modification to federal coal lease COC-67232, and about 786 of the approximately 800 acres of the proposed modification to federal coal lease COC-1362 are within the Sunset CRA. If the lease modifications are approved and coal mining is permitted, temporary roads and tree cutting, as allowed by the CRR, will likely be used to construct, operate and maintain MDWs necessary for safety and incidental to underground mining. This decision to consent to lease does not authorize actual mining or any surface disturbing activities. However, for subsequent use of the land surface, direction for the North Fork coal mining area was developed in the CRR (FEIS, Section 3.30). All coal leases containing NFS lands and respective subsequent lease modifications contain lease notice language in accordance with Forest Service Manual (FSM) 2820 (FEIS, Table 2.1a): “The permittee/lessee must comply with all the rules and regulations of the Secretary of Agriculture set forth at Title 36, Chapter II, of the Code of Federal Regulations governing the use and management of the National Forest System (NFS) when not inconsistent with the rights granted by the Secretary of Interior in the permit.”

With respect to modifying federal coal leases, the GMUG, as the surface managing agency, is responsible for:

- Deciding whether or not to consent to the BLM modifying existing Federal Coal Lease COC-1362 by adding 800 acres according to the Federal Coal Leasing Amendments Act of 1976;
- Deciding whether or not to consent to the BLM modifying existing Federal Coal Lease COC-67232 by adding 921 acres according to the Federal Coal Leasing Amendments Act of 1976; and
- If consent is provided, prescribing stipulations needed for the protection of non-mineral resources by determining if the existing stipulations on the respective parent leases are sufficient.
  - If they are sufficient, stipulations from the parent leases will be applied to lease modification areas.
  - If they are not sufficient, prescribe additional stipulations that will provide for the protection of non-mineral surface resources to comply with regulations, policy and Forest Plan direction (FEIS, Table 2.1a).
II. DECISION AND REASON FOR THE DECISION

Decision

I have decided to select Alternative 3 as described in the FEIS (FEIS, Section 2.1) and summarized in Section III of this document. Selection of this Alternative provides the BLM-Colorado State Office my consent to lease the NFS lands included in federal coal lease modifications COC-1362 and COC-67232 as described in the FEIS, Table 1.2 and shown on the map in Appendix A. My consent decision includes the application of terms and conditions, identified as stipulations, to protect surface resources on NFS lands (Appendices B and C of this document, FEIS Tables 2.1a and 2.1b).

My decision will be implemented through issuance of this Record of Decision (ROD), followed by BLM's actions of: 1) making a subsequent decision on whether or not to approve lease modification(s), and 2) modifying the lease(s). The lessees would then be responsible to secure any local, State or Federal permits and approvals as applicable and required by law for future operations or development on the lease modifications.

In the event of any contradiction or conflict between descriptions or depictions of authorized actions, my decision is to be taken from the project documents in the following order of precedence:

- The description in this ROD,
- The representations on the Appendix A- Decision Map and Stipulations in Appendices B & C, and
- Descriptions in the FEIS.

My decision to consent to the lease modifications under Alternative 3 and potential future uses of NFS lands which may result from consenting to the lease modifications, including the construction of temporary roads, would be consistent with the CRR.

Reasons for the Decision

Authorities

The primary authorities for issuing coal lease modifications are found in the FEIS, Section 1.6 and restated below.


The Forest Service and BLM manage their minerals programs under law as specified in the Mining and Minerals Policy Act of 1970 which states in part that it is the “continuing policy of the federal government in the national interest to foster and encourage private enterprise in...(t)he development of economically sound and stable domestic mining minerals and mineral reclamation industries...(and) the orderly and economic development of domestic mineral resources....” Further, federal mineral leasing follows the Mineral Leasing Act of 1920 as amended by the Federal Coal Leasing Amendments Act of 1976 (MLA), and specific procedures set forth in 43 CFR 3400.

These lease modification applications are being processed according to procedures set forth in 43 CFR 3432. Lease modifications are non-competitive leasing actions. Since Ark Land applied for these modifications to add acreage to existing leases, other coal companies could not obtain the rights to the coal if it is approved.
Subsequent permitting actions to allow mining and changing of the approved mine permit boundary to include the modification areas would be evaluated by DRMS under procedures set forth in 30 CFR PART 906.30 Appendix B and the Regulations of the Colorado Mined Land Reclamation Board for Coal Mining. These modifications may also require approval from the United States Department of the Interior (USDI) through the OSM.

**Surface Mining Control and Reclamation Act of 1977 (SMCRA)**

The Surface Mining Control and Reclamation Act (SMCRA) principally applies to coal permitting. SMCRA balances the need to protect the environment from the adverse effects of surface coal mining with the Nation's need for coal as an essential energy source. It ensures that coal mining operations are conducted in an environmentally responsible manner and that the land is adequately reclaimed during and following the mining process. Most coal-mining states now have the primary responsibility to regulate surface coal mining on lands within their jurisdiction, with OSM performing an oversight role. SMCRA requires that all coal mining be conducted under a permit approved by the designated regulatory authority. The Colorado Division of Reclamation Mining and Safety is the regulatory authority for coal mining in the state.

Any applications submitted to the State of Colorado to revise the state mining and reclamation permit, including applications to allow mining and its related surface disturbances, reclamation, and the changing of the approved mine permit boundary to include the modification areas, would be reviewed by the Colorado Division of Reclamation, Mining and Safety (DRMS). This review would be conducted by DRMS as set forth in the Colorado Surface Coal Mining Reclamation Act (34-33-101 et seq., C.R.S. 1973 as amended) and the Regulations of the Colorado Mined Land Reclamation Board for Coal Mining (2 CCR 407-2, August 30, 1980 as revised). Coordination between DRMS and appropriate federal agencies of the review of any applications for Permit Revisions that may be submitted by Mountain Coal Company in conjunction with these lease modifications will be overseen by DRMS in accordance with the Colorado Surface Coal Mining Reclamation Act, the Regulations of the Colorado Mined Land Reclamation Board for Coal Mining, and, as applicable, 30 CFR 906.30. These state permitting actions may also require issuance or modification of a federal mine plan (or plans) by the USDI through the Office of Surface Mining, Reclamation and Enforcement (OSM) under the MLA.

The extent to which SMCRA directly applies at the leasing stage is related to the need to conduct the Unsuitability Assessment under Section 522(e) of SMCRA. For the purposes of the unsuitability assessment conducted at the leasing stage, the procedure is codified at 43 CFR 3461.

**Energy Policy Act of 2005**

The purpose of the Energy Policy Act of 2005 was to ensure jobs for the future with secure, affordable, and reliable energy.

This Act Amends 30 U.S.C. 203(c)(4)(A) to "secure modifications of the original coal lease by including additional coal lands or coal deposits contiguous or cornering to those embraced in the lease...(3) In no case shall the total area added by modifications to an existing coal lease under paragraph (1)–(A) exceed 960 acres; or (B) add acreage larger than that in the original lease."
Applicable Laws, Regulations, and Policy

This decision is consistent with applicable laws, regulations, and policies (refer to Section V of this document and FEIS, Chapter 1) and with Forest Plan direction (FEIS, Section 1.7).

How Issues Were Considered

Issues were identified by the interdisciplinary team (IDT) and through public involvement. Significant issues were identified in the FEIS (Section 1.9) and carried forward for analysis in the FEIS in both the development of Alternatives and in the individual resource sections (Chapter 3). Other issues brought forward were reviewed and addressed in: Response to Comments (FEIS, Table H), in the project file (available to the public on the internet), and in Alternatives Considered but Eliminated from Detailed Study (FEIS, Section 2.2).

Cumulative Effects

Consenting to lease does not result in any direct effects on the ground. However, should future development of the leases occur, such actions would result in indirect and cumulative effects. Indirect and cumulative effects (FEIS, Chapter 3) were addressed based on a Reasonably Foreseeable Mine Plan (FEIS, Section 3.2) for each resource area.

Lease Stipulations

Specific lease stipulations (Appendix B, and FEIS, Table 2.1a) are being prescribed for: cultural and paleontological resources; endangered or threatened species; Canada lynx; raptors; big game winter range; water depletions; breeding birds; geologic hazards; baseline studies; monitoring requirements; riparian, wetland or floodplain; subsidence; visuals; Colorado Roadless Areas; and BLM’s addenda and stipulation (FEIS, Table 2.1b) regarding methane flaring, capture or use or other Alternatives to venting.

Mitigation Measures & Methane Venting

Commenters have suggested that “mitigation measures be analyzed even if they are outside the jurisdiction of the lead agency” as in the case of methane released to the atmosphere. These mitigations have been identified and further addressed in the FEIS, Table 2.1b and Sections 2.2 and 3.3. The lease stipulations which have been adopted (CEQ terminology) are the mitigation measures identified to protect non-mineral surface resources. The analysis presented in the FEIS considers the lease stipulations as part of the Proposed Action; therefore, they are analyzed in detail (under the CEQ described as having been “explained and committed”). Should mining activities be authorized, these stipulations will be monitored and enforced by the respective appropriate permitting agencies for mining and associated operations. Further, the parent leases have respective addenda added by BLM (that will also be carried forward to the lease modifications) which allow capture and/or use of methane as a by-product of mining coal, if it is economically feasible for MCC to do so.

Commenters further contended that the Forest Service should require MCC to capture or use methane vented to the atmosphere. Methane is currently an unregulated constituent under the Clean Air Act as managed by the Environmental Protection Agency (EPA) and through their agent Colorado Department of Public Health and Environment (CDPHE). I agree capturing or using methane would be beneficial; however, the Forest Service is not a permitting agency for underground coal mining.
activities nor does it have the authority to promulgate or enforce air quality regulations pursuant to the Clean Air Act. These activities may be addressed in further detail at the permitting stage. There is no permitting proposal related to these mitigation measures in front of the agencies for consideration at this time. A site-specific analysis would not occur on these lease modifications until the reserves are under lease; however, MCC may consider these activities on any of their existing leaseholds. Any of these methods to reduce the effects of greenhouse gases on climate change may be designed by MCC and further approved by the regulatory agencies as part of the mine/ventilation plan approval process so long as the lives of miners are demonstrated to be adequately protected. Additionally, in accordance with Section V of the Clean Air Act, the Tailoring Rule may be determined (by CDPHE) to apply to the West Elk Mine and may provide some of the additional regulatory framework necessary for methane mitigation. Should methane mitigation be implemented in the future, monitoring and enforcement would be conducted by the respective appropriate permitting agencies for mining and associated operations.

**Air Quality and Climate Change**

The FEIS (Section 3.3, Appendices H & I) documents issues related to air quality standards and possible effects globally and locally from climate change. Trends in air quality and climate change impacts have been identified. A few commenters requested to see modeling impacts of criteria pollutants and climate change from this project. However, regulations at 40 CFR 1502.14-1502.16 describe that a comparison between the existing or baseline condition and the proposed activities be described “as is necessary to support the comparisons” and “provide a clear basis for choice by the decisionmaker.” The FEIS shows that the existing air quality impacts are in compliance with the CAA permits (permit for Construction Emissions) issued to MCC (FEIS Appendix F). MCC has also filed an application under Title V of the Clean Air Act (“Tailoring Rule”) as of July 1, 2012. Under the selected Alternative, the rate of mining and mining systems would not change. The change to air quality under the selected Alternative would be an extension of time over which the impacts would occur. The addition of the lease modification areas would add approximately 1.6 years to the permitted baseline on NFS lands, and an additional 1.4 years would be added due to probable associated activities on private lands and parent lease COC-1362 which would become accessible under this decision. Therefore, I find that the effects to air quality and climate change are adequately disclosed since the magnitude of the effect is compliant with the CAA permits, and the difference in comparing the Alternatives is the length of time the effect will occur.

**Factors Other Than Environmental Effects Considered In Making the Decision**

The purpose and need of this project is to consider consenting to and issuing coal lease modifications for federal coal lands immediately adjacent to existing federal coal leases COC-1362 and COC-67232. The purpose of the lease modifications is to ensure that compliant and super-compliant coal reserves are recovered.

The BLM, charged with administration of the mineral estate on these Federal lands, is required, by law, to consider leasing Federally-owned minerals for economic recovery. Under 43 CFR 3432 (as amended by the Energy Policy Act of 2005), the holder of a federal coal lease may apply to modify a lease by adding up to 960 acres. The federal agencies are responding to applications to modify existing leases.
The need is also linked to the GMUG Land and Resource Management Plan, as amended (Forest Plan), which emphasizes environmentally sound mineral and energy development (Forest Plan, page II-61). My decision supports the Purpose and Need for this project and is consistent with Forest Plan direction.

My decision fulfills the Federal Government’s policy to foster and encourage mineral development (Mining and Mineral Policy Act of 1970), the Federal Land Policy and Management Act (FLPMA), and complies with GMUG Forest Plan direction.

I considered the Forest Service Strategic Plan, which calls for the Forests to “help meet energy resource needs,” the Forest Service implementation of the National Energy Plan (2001) generally directing the agency to expedite federal actions necessary for energy-related project approvals, and Executive Order 13212 directing federal agencies to take steps to increase the energy supply to our nation.

I considered the CRR which made an exemption for temporary road construction in the North Fork coal mining area.

I considered all other laws pertaining to management of NFS including but not limited to the Multiple-Use Sustained Yield Act of 1960 and the National Forest Management Act of 1976.

**Identification of the Environmental Documents Considered in Making the Decision**

This decision was made after carefully considering the contents of the FEIS, public comments, agency response to comments, and the supporting project file including the Combined Geologic and Engineering Report and Maximum Economic Recovery Reports and Unsuitability Analysis & Report for Federal Coal Lease COC-1362, Modification 3 & Federal Coal Lease COC-67232, Modification 1. The GMUG Forest Plan acknowledges and allows for coal leasing and resource development in areas where such activities would be consistent with the Plan. Further, my decision follows the legal direction for coal resource management (FEIS, Section 1.6). Other environmental documents (FEIS, Section 1.10) prepared for activities in the immediate vicinity were also consulted.

**How Considerations Were Weighed and Balanced In Arriving At the Decision**

The resource effects analyses presented in the FEIS (Table 2.3 and Chapter 3) describes potential impacts to surface resources from leasing. Stipulations and lease addenda were carried forward from the parent leases specifically for the protection of cultural and paleontological resources, threatened or endangered species; Canada lynx; raptors; big game winter range, water depletions, breeding birds, geologic hazards, surface water, subsidence, long term roadless characteristics; Alternatives to methane venting and baseline data and monitoring requirements. Because of the surface protections in place, I chose to consent to lease modification parcels as requested by BLM. With these stipulations (Appendix B), there are no significant recreational, timber, economic, or other values incompatible with the surface mining operations.

My decision to consent to leasing included evaluating the role and responsibility of the Forest Service in meeting overall energy needs for the nation. This consideration, along with our legal responsibilities, led me to the consent to lease decision.
consideration of other alternatives
alternative 1- no action alternative

I did not select Alternative 1, no action, because it does not meet the purpose and need for the action, is inconsistent with mineral laws, and is not consistent with social and economic environment needs. The purpose of ensuring recovery of high-quality coal reserves on lands adjacent to existing coal mine operations would not be met with this Alternative. Minerals laws direct the Agency to continue a policy of encouraging private enterprise to develop mineral resources and ensure jobs for the future with secure, affordable and reliable energy (Minerals Policy Act of 1970 and Energy Policy Act of 2005). Further, the Forest Plan supports environmentally sound energy and mineral development.

This Alternative was not identified as the environmentally preferable Alternative because it does not achieve social and economic objectives in the area. Estimates suggest nearly a billion dollars in lost revenues, royalties, payroll and local payment for goods and services would be foregone by implementing this Alternative. About 380 direct jobs would be lost and 2,660 indirect jobs could be adversely affected 1.6 years earlier if this Alternative were selected. When considering that most impacts to surface resources are mitigated sufficiently to recover the natural ecosystem components and processes in the long term, losses to the social and economic environment outweigh temporary disturbance to the landscape. Therefore, the adverse impacts to the social and economic objectives suggest this Alternative is not environmentally preferable.

alternative 2

I did not select Alternative 2, consent and lease under the provisions of the 2001 Roadless Area Conservation Rule (2001 Rule), because selection of this Alternative would make coal leasing infeasible at this time. Alternative 2 was developed prior to the time the CRR was in effect and when Alternative 2 was developed it was the controlling roadless rule. However, I was aware that the CRR could become effective during the analysis of these lease modifications, and in fact, on July 3, 2012 the final CRR was published in the Federal Register. Although the analysis demonstrates that it is physically possible to conduct some of the actions necessary to implement Alternative 2, it is technically infeasible at this time because the longwall mining method requires cross-country travel. At this time aerial mobilization is not currently practical and cross-country overland travel is currently untested and would most likely cause more adverse impacts to water and soils than other Alternatives. Other mining methods are relatively inefficient, more hazardous, and much less economical than longwall methods. As such, mining the coal would be infeasible from a safety, technological, and productivity standpoint. The project proponent has stated that without temporary roads, it is not economically feasible to clear and drill the MDWs necessary to safely mine the coal. Without MDWs the mines cannot operate the longwall safely. The BLM has found that using other mining technology is inefficient and uneconomical, and thus longwall mining is the only feasible mining method. Current constraints in drill rig technology and lack of availability in the contiguous U.S. of appropriately sized, locally available, helicopter-portable rigs for MDW drilling make overland motorized access the only currently feasible option to drill MDWs.

Cross-country travel would be required to implement Alternative 2 because other indirect methods (e.g. helicopter use) are infeasible in the lease modification areas. Based on preliminary plans and existing experiments, underground horizontal boreholes and directional drilling from outside the leasing area are inadequate methods for proper
ventilation and efficient mine operation. Shallow overburden within the analysis area does not allow for directional drilling over long distances, and in-mine horizontal boreholes do not efficiently degas mine workings. Although these methods have been used in part by MCC, they do not meet all the ventilation needs for safe mine operations in this location. Therefore, MDW operations must be installed and maintained within the roadless area so that vertical or near-vertical MDWs can be drilled directly over the area to be mined.

Alternative 2 would require equipment to be walked or dragged in without the use of roads. This activity would create effects that would require more, or perhaps untested, watershed conservation practices to mitigate the disturbance. Moreover, the approach envisioned in Alternative 2 is inconsistent with standard methodologies and known feasible methods of MDW pad construction and access. Water and soil impact analyses indicate Alternative 2 would result in higher sedimentation rates and greater potential erosion than constructing engineered roads with appropriate drainage.

Although mining technology or drilling technology could change in the future to allow for safe recovery in the coal reserves, this option is not foreseeable at this time. For these many reasons, at this time and in the foreseeable future, it is infeasible to consent to lease pursuant to the terms required by Alternative 2.

**Alternative 4 (Agency Identified Environmentally Preferable Alternative)**

Alternative 4 was fully considered in this analysis. I compared: reasonably foreseeable surface disturbance; amount of expected coal to be recovered; and extension of mine life of the three action Alternatives. See Table 1 below.

**Table 1. Summary of Reasonably Foreseeable Actions by Alternative**

<table>
<thead>
<tr>
<th>Action</th>
<th>Alternative 2 &amp; 3</th>
<th>Alternative 4</th>
<th>Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated Foreseeable Surface Disturbance (acres)</td>
<td>72</td>
<td>66</td>
<td>(6)</td>
</tr>
<tr>
<td>Estimated Coal (tons)</td>
<td>10,100,000</td>
<td>9,265,000</td>
<td>(835,000)</td>
</tr>
<tr>
<td>Estimated Foreseeable Extension of Mine Life (years)</td>
<td>1.6</td>
<td>1.4</td>
<td>(0.2)</td>
</tr>
</tbody>
</table>

Although this Alternative is identified as environmentally preferable, I considered the relatively small environmental footprint difference between Alternatives, temporary nature of the expected post-lease disturbance and past reclamation success at the West Elk Mine when selecting Alternative 3. I determined that the economic benefits of Alternative 3 outweigh the environmental effects of disturbing a small amount of NFS lands for a short period of time as assessed in Alternative 4.

**Public Involvement Considerations**

Public and agency comments were sought during preparation of the FEIS (refer to Section VI). Responsive to some comments on the DEIS, the following changes were completed in development of the FEIS with respect to Alternatives:

- Development of Alternative 4; analyzing and disclosing impacts of consenting to only one of the proposed lease modifications (COC-1362)
III. SUMMARY OF ALTERNATIVES CONSIDERED

A total of 9 Alternatives were considered in the FEIS (Sections 2.1 and 2.2) with 4 carried forward for detailed analysis. I have selected Alternative 3, conditioned with stipulations. A summary of the Alternatives Considered in Detail in the FEIS follows:

Alternative 1- No Action Alternative

Analysis of the No Action Alternative is required by CEQ, 40 CFR Part 1502.14(d). Under the No Action Alternative, consent for the lease modifications would not be granted, and no mining would occur in these specific areas. Impacts from mining coal under these areas would not occur on these lands, and the effects from on-going land uses could continue including coal mining activities such as exploration and monitoring related to mine activities, as well as continued recreation and grazing. The land would continue to be managed according to Forest Plan standards, goals and guidelines.

Common to All Action Alternatives

The proposed action is for the Forest Service to consent to and BLM leasing/modifying MCC's existing federal coal leases COC-67232 and/or COC-1362 and by adding 921 and 800 additional acres (respectively) to ensure that compliant and super-compliant coal reserves are recovered and not bypassed, and to identify stipulations for the protection of non-mineral (i.e. surface) resources.

Methane drainage well construction is essential for operating longwall operations in the North Fork Valley. Normal mine ventilation alone does not allow for safe longwall mining in the North Fork Valley. Without MDWs methane builds up quickly during the longwall mining process. The current use of MDWs is necessary to mitigate methane safety hazards making mine-air compliant with MSHA standards. For the West Elk Mine, MDWs are a required part of their MSHA approved ventilation Plan (see project record).

Alternative 2

Under Alternative 2, the Forest Service would consent to leasing and BLM would modify the leases with stipulations/notices/addenda in Appendix B and Tables 2.1a. 2.1b, FEIS. This Alternative assumed that the provisions of 2001 Rule would govern and that temporary road construction would not be allowed in the modification areas. Because a leasing decision itself does not involve any mineral development or surface disturbance, it was necessary to project the amount of surface use or activity that would likely result during lease development in order to disclose and analyze potential effects. The Reasonably Foreseeable Mine Plan (RFMP), which describes the likely post-lease activity for this Alternative, is described in FEIS, Section 3.2 and was analyzed.

On July 3, 2012, the Colorado Roadless Rule (CRR) was promulgated and codified at 36 CFR Part 294. The CRR is now the controlling law and the 2001 Roadless Rule does not apply.

If applied, the provisions of the 2001 Roadless rule would have affected 703 acres of the COC-1362 lease modification and 903 acres of the COC-67232 lease modification.
The following methodologies for MDWs were considered in this Alternative: helicopter drilling in a roadless area, horizontal boreholes or directional drilling technology, methods other than longwall mining, and cross-country motorized access in a roadless area.

The provisions of the 2001 Rule would not prevent the agencies from consenting to lease or leasing, nor would they prevent the construction of drill pads.

**Alternative 3 (Agency Preferred Alternative)**

Similar to Alternative 2, Alternative 3 would also result in the Forest Service consenting to leasing and BLM would modify the leases with stipulations/notices/addenda in Appendix B. However, Alternative 3 is designed to be consistent with the CRR, which became effective on July 3, 2012.

The majority of both lease modification areas are within the Sunset CRA, which is entirely included in the CRR as the “North Fork coal mining area” that provides an exception for post-lease surface-disturbing activities, including the construction and use of temporary roads (36 CFR 294.43 (c)(1)(ix)). 786 acres of the COC-1362 lease modification and 915 acres of the COC-67232 lease modification are within the Sunset CRA. Allowing temporary roads would facilitate MDW drilling and would therefore allow for mining the coal under the RFMP (described in Section 3.2).

**Alternative 4 (Agency Environmentally Preferable Alternative)**

Many commenters expressed concerns regarding roadless area effects due to post-lease development. Similarly, some commenters suggested an Alternative requesting agencies’ consent/leasing for proposed modification to COC-1362 only, while not consenting to proposed modification to lease COC-67232. In response to those comments, Alternative 4 was brought forward for further analysis from Alternatives Considered but Eliminated from Detailed Study in the DEIS. As part of the analysis of this Alternative, the Forest Service requested an additional review from BLM to make determinations of mineable resources (Project File). This Alternative is environmentally preferable by the Agency because it would allow a majority of the coal reserve to be accessed for benefit to the social and economic environment while limiting surface disturbance to one lease area for the ecological environment.

Alternative 4 analyzed the effects of post-lease surface activities under two scenarios-

a) CRR including temporary road construction in the Sunset CRA, as described in Alternative 3 above, or

b) No road construction as described in Alternative 2 above

An RFMP was developed (Section 3.2) to address indirect and cumulative effects specific to the COC-1362 modification.

**Stipulations for Action Alternatives**

I am prescribing some additional stipulations to the existing stipulations on the parent leases to provide for the protection of non-mineral surface resources. All stipulations are listed in Appendix B corresponding to the respective applicability to lease modification(s).
IV. PUBLIC INVOLVEMENT

The Notice of Opportunity to Comment on the Environmental Assessment (EA) initially prepared for this project was published in the Grand Junction Daily Sentinel (newspaper of record) and in the Delta County Independent on April 21, 2010. The Notice of Opportunity to Comment asked for public comment on the proposed lease modifications from April 21-May 21, 2010. In addition, as part of the public involvement process, the agency sent out approximately 120 letters to state, federal, local agencies, tribes, environmental groups, and interested individuals; posted scoping materials to the GMUG’s website; and posted to the Forest Service’s Schedule of Proposed Actions.

During that initial comment period, approximately 684 versions of email form letters were received from Wild Earth Guardians supporters; 1900 versions of email form letters were received from Defenders of Wildlife supporters; 23,771 versions of email form letters were received from supporters of Natural Resources Defense Council; 5647 versions of email form letters were received from supporters of Earth Justice; 576 hardcopy/faxed various form letters were received from local community members in four counties in support of mining in this area; 74 original or somewhat original comments were received; and 4 original comments with attachments were received in response to this scoping effort.

Using the comments from the public, environmental groups, other agencies, and those developed internally, the interdisciplinary team developed a list of issues to address (see Issues section). Other comments were responded to in the EA.

The decision on that EA was issued in November 2011, was appealed December 2011 and was reversed in February 2012.

Notice of Intent (NOI) to prepare an Environmental Impact Statement was published in the Federal Register on April 25, 2012. Approximately 830 copies of letters/emails informing interested parties (including state, federal, local agencies, tribes, environmental groups, and individuals expressing desire to remain on mailing lists) of this intent were also sent out on April 25, 2012 inviting additional comments throughout the process but reminding them that to be eligible for appeal they must comment on Draft EIS when it became available. Additional notification was not sent out to those who submitted form letters through other groups’ clearinghouse websites on the previously prepared EA except for those who submitted original or somewhat original comments. Forest Service’s Schedule of Proposed Actions was also updated. Additional notification was sent out with the Draft EIS to approximately 768 individuals. Additional legal notices were published in the Grand Junction Daily Sentinel and Delta County Independent.

Approximately 24,680 comment letters were received on the Draft EIS. Of those, 67 were original or contained some original comments. Responses to comments received during the 30 day period following the printing of the NOI and the 45 day comment period on the DEIS, as well as other comments specifically included by reference can be found in Appendix H. Comments received during this time can be viewed in entirety in Appendix I of the FEIS.
V. FINDINGS REQUIRED BY OTHER LAWS AND REGULATIONS

To the best of my knowledge, this decision complies with all applicable laws and regulations. In the following, I have summarized the association of my decision to some pertinent legal requirements.

Executive Order 13212 of May 18, 2001

This Order called the federal agencies to expedite their review of permits for energy-related projects while maintaining safety, public health, and environmental protections. My decision is consistent with this Order.

Federal Land Policy and Management Act of 1976

The Federal Land Policy and Management Act of 1976 states that public lands are to be managed in a manner that recognizes the need for the domestic sources of minerals, including renewable and non-renewable resources. My decision is consistent with this act.

Multiple-Use Sustained-Yield Act of 1960

This act states that renewable resources are to be managed for the long term sustained yield. My decision is consistent with this act.

National Forest Management Act of 1976

The Forest Plan was approved in 1983 and amended in 1991, as required by this Act. This long-range land and resource management plan provides guidance for all resource management activities in the Forest. The National Forest Management Act requires all projects and activities to be consistent with the Forest Plan. The Forest Plan has been reviewed in consideration of this project (FEIS, Section 1.7). My decision is consistent with the Forest Plan.

Mining and Minerals Policy Act of 1970

This Act declared it would be the continuing policy of the Federal government and in the national interest to foster and encourage private enterprise in the development of economically sound and stable domestic mining industries, and the orderly and economic development of domestic mineral resources (FEIS, Section 1.6). My decision is consistent with this act.


Federal coal leasing follows the Mineral Leasing Act of 1920 (MLA), as amended and specific procedures set forth in 43 CFR 3400. These lease modification applications are being processed according to procedures set forth in 43 CFR 3432.

The purpose of the Energy Policy Act of 2005 was to ensure jobs for the future with secure, affordable, and reliable energy.
The Energy Policy Act Amended MLA [30 U.S.C. 203(c)(4)(A)] to "secure modifications of the original coal lease by including additional coal lands or coal deposits contiguous or cornering to those embraced in the lease…(3) In no case shall the total area added by modifications to an existing coal lease under paragraph (1)–(A) exceed 960 acres; or (B) add acreage larger than that in the original lease."

Some commenters have suggested that the processing of proposed modifications is not in compliance with MLA, and suggest that due to total acreage of both modifications, they should have been submitted and reviewed as a lease by application instead of two lease modifications.

On January 26, 2009, the GMUG received a request from the BLM to analyze an application to modify and review stipulations for federal coal lease COC-67232, containing about 762 acres. On that same date the GMUG also received a request to modify and review stipulations for federal coal lease COC-1362, containing about 800 acres. COC-1362 currently contains approximately 4,996 acres, including about 160 acres from a lease modification approved October 15, 2001. COC-67232 currently contains approximately 1,517 acres.

On December 14, 2009, the GMUG received an amended request from the BLM regarding COC-67232, addressing acres which removed NFS Wilderness while adding other NFS lands, bringing the total requested modification to 921 acres.

If BLM authorizes these lease modifications, the total modified acres for COC-1362 would be approximately 960 acres.

In summary, neither of the respective proposed lease modification areas exceeds 960 acres. Neither of the respective proposed lease modification areas exceeds acres within respective parent leases. Therefore, my decision is consistent with these Acts, and these lease modification applications are being processed according to procedures set forth in 43 CFR 3432.

**Colorado Surface Coal Mining Reclamation Act (CRS. 34-33-101)**

This Act and attendant regulations are consistent with the overarching federal regulations (30 CFR Part 906, Appendix B). Federal coal leaseholders in Colorado must hold a State-approved mining permit before performing mining and reclamation operations on Federal lands in the state. In accordance with Colorado's approved federal coal program procedures, during the mine permitting process the GMUG will review an applicant’s submittal to ensure that it provides for post-mining land use consistent with the Forest Plan and has adequate protections for NFS lands.

**Clean Air Act of 1955, as amended 1977**

This Clean Air Act (CAA) required States to develop plans to implement, maintain, and enforce primary and secondary ambient air quality standards for any criteria air pollutants, and called federal agencies to prevent deterioration of air quality. Effects on air quality as a result of this project were analyzed and showed that this project will have negligible effects on air quality. Further, MCC is required to hold and maintain state air quality permits for their activities under the CAA. MCC currently holds a valid permit from the Colorado Division of Public Health and Environment (CDPHE) for construction air emissions. MCC has also submitted an application to CDPHE for a permit in accordance with Title V of the Clean Air Act (Tailoring Rule). This decision is consistent with this Act.
**Clean Water Act and Amendments of 1972**

This Act requires State and Federal agencies to control and abate water pollution. This project was designed to comply with this Act (Appendix B and FEIS, Section 2.1) through the inclusion of stipulations for surface and ground water, water depletions, baseline data, and monitoring and compliance with all state and local laws. This decision is consistent with this Act.

**Executive Orders 11990 and 11988**

The management of wetlands and floodplains are subject to Executive Orders 11990 and 11988, respectively. The purpose of the EOs are to avoid to the extent possible the long- and short-term adverse impacts associated with the destruction or modification of wetlands and floodplains and to avoid direct or indirect support of new construction in wetlands wherever there is a practical Alternative. This order requires the Forest Service to take action to minimize destruction, loss or degradation of wetlands, and to preserve and enhance the natural and beneficial values of wetlands. In compliance with this order, Forest Service direction requires that an analysis be completed to determine whether adverse impacts would result (FEIS, Chapter 2 and Appendix B). The project was designed to avoid impacts to wetlands and floodplains through the addition of lease stipulations. Permits currently held by MCC, including NPDES, SPCC and CWA section 404 remain valid until renewal is necessary. Therefore, my decision is consistent with these orders.

**Executive Order 12898**

Concern for environmental justice stems from Executive Order 12898, “Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations,” signed February 11, 1994 by President Clinton. In this order (Section 1-101),

> “each Federal agency shall make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies, and activities on minority populations and low-income populations in the United States.”

The population around the project area was reviewed and no minority or low-income populations were identified, and no additional outreach was conducted. For this project, no disproportionately high adverse impacts are expected. This decision is consistent with this Order.

**National Historic Preservation Act**

Three cultural resource inventories have occurred within the project area and no heritage resources were located. Therefore the lease modifications are found to have no potential to affect cultural resources, as defined in regulations 36 CFR 800. The addition of the standard lease clause will protect currently undiscovered sites (FEIS Section 3.31 and Project File). Site specific resource surveys must be conducted prior to any ground disturbing activities (Appendix B, FEIS Table 2.1a). Therefore, at this time, no additional inventories need to be completed, and consultation with the State Historic Preservation Office (SHPO) is not required. My decision is consistent with this and other acts protecting heritage resources.
Endangered Species Act

A Biological Assessment (BA) was prepared for this decision (FEIS, Sections 3.9-3.10, Project File, and Internet). All known endangered or threatened species in the area were considered. Due to “may affect, likely to adversely affect” determinations for Canada Lynx and water depletions related to the four endangered Colorado River fish, formal consultation with the USFWS was completed. Depletions are covered under the GMUG’s Programmatic Biological Opinion ES/GJ-6-CO-F-033-CP062 and Canada lynx are covered under the Southern Rockies Lynx Amendment. USFWS has concurred with our findings. If additional findings regarding threatened or endangered, proposed or sensitive species are discovered, a new biological assessment or evaluation will be written, and formal consultation reinitiated.

Compliance with terms and conditions of the Biological Opinion are addressed in lease stipulations for threatened and endangered species (Appendix B, FEIS Tables 2.1a, 2.1b). Therefore, my decision is consistent with this Act.

National Environmental Policy Act

All documentation in the project record in support of, and including the FEIS and ROD have been developed to comply with this Act, CEQ regulations at 40 CFR 1500, Forest Service policies at Forest Service Handbook 1909.15 and 36 CFR 220, requirements that evolved through the practice of NEPA, and from case law.

Coal Unsuitability

Upon receipt of the applications to modify the leases, BLM completed tract delineation. I have reviewed the unsuitability criteria published in 43 CFR 3461 (FEIS, Appendix B) and am recommending to the Secretary of Interior (or their delegated representative) that there are no significant recreational, timber, economic, or other values that are incompatible with modifying the leases within the analysis.

The criteria have also been reviewed for implications with all Alternatives in this analysis. My recommendation is consistent with 43 CFR 3461.

Colorado Roadless Rule, 36 CFR 294

Within portions of proposed lease modification areas within the Sunset CRA, in accordance with § 294.43(c)(2), “If proposed road construction/ reconstruction meets one of the exceptions, subject to the legal rights identified in § 294.43(c)(1), the responsible official must determine:

(i) Motorized access, without road construction is not feasible;”

As described previously in this ROD, development of the lease modifications without roads (Alternative 2) is not feasible at this time. Therefore, motorized access via roads is necessary.

(ii) “When proposing to construct a forest road, that a temporary road would not provide reasonable access;”

All roads that may be constructed would be temporary.

(iii) “Road construction is consistent with applicable land management plan direction;”
The use of roads is consistent with the land management plan. During the permitting stage when the roads would be designed and approved, the Forest Service will work with the permitting agency to ensure compliance with the land management plan.

(iv) “Within a native cutthroat trout catchment or identified recovery watershed, road construction will not diminish, over the long term, conditions in the water influence zone and the extent of the occupied native cutthroat trout habitat;”

The lease modification area is not within a native cutthroat trout catchment or identified recovery watershed (project file).

“and

(v) That watershed conservation practices will be applied to all projects occurring in native cutthroat trout habitat.”

The lease modification area is not within native cutthroat trout habitat. However, watershed conservation practices will be applied.

Stipulations have been developed to ensure compliance with CRR respecting temporary roads, pipelines and linear construction zones should the latter be needed at a future date for capture of methane incident to mining.

Other Permits Required

- DRMS mine permit

In addition to the mine permit process, other permitting processes not covered by DRMS authority may need to be analyzed (NEPA) and permitted. Examples of these types of permits include: 1) Road Use Permits; 2) Timber contract for harvest of merchantable timber; and 3) Special Use/Right-of-Way Authorizations for other surface disturbing activities not covered by or outside the area covered in the mine permit (e.g. pipelines and off-lease facilities for methane mitigation).

MCC will be required to obtain/update additional information specific to this leasing action including:

- Update Forest Service Road Use Permit for roads outside the mine permit area
- Forest Service timber contract for any merchantable timber removed
- Update Approved Pesticide Use and Weed Control Plan

Other permits currently held by MCC such as NPDES, SPCC, 404 Permits, Air Construction Permit, etc. remain valid until renewal is necessary.

VII. IMPLEMENTATION DATE AND ADMINISTRATIVE REVIEW AND APPEAL OPPORTUNITY

Implementation Date

If no appeals are filed within the 45-day time period, implementation of the decision may occur on, but not before, 5 business days from the close of the appeal filing period. If appeals are filed, implementation may occur on, but not before, the 15th business day following the date of the last appeal disposition.

In relation to the Forest Service role in this project as the federal surface land management agency, BLM decision making relating to leasing these lands could not
occur until after the appeal period and the 5 day stay thereafter. Should an appeal be filed, BLM could not act until any appeals on this Forest Service decision have been resolved.

**Administrative Review or Appeal Opportunities**

This decision is subject to administrative review pursuant to Federal Regulations at 36 CFR 215. Appeals (including attachments) must be in writing and filed (regular mail, fax, e-mail, hand-delivery, express delivery, or messenger service) with the Appeal Deciding Officer (§ 215.8) within 45 days following the date of publication of the notice of this decision in the *Federal Register*. Attachments received after the 45-day appeal period will not be considered. The publication date of the legal notice in the *Federal Register* is the exclusive means for calculating the time to file an appeal (§ 215.15 (a)). Those wishing to appeal should not rely upon dates or timeframe information provided by any other source.

The appeal must be filed (regular mail, fax, email, hand-delivery, or express delivery) with the Appeal Deciding Officer at:

- **Appeals Deciding Officer**
- U.S.D.A. Forest Service
- Rocky Mountain Region
- 740 Simms Street
- Golden, CO 80401

Fax: 303-275-5134 to the attention of Appeals

Email: appeals-rocky-mountain-regional-office@fs.fed.us

The office business hours for those submitting hand-delivered appeals are 8:00 AM to 4:30 PM Monday through Friday, excluding federal holidays. Electronic appeals must be submitted in a format such as an e-mail message, plain text (.txt), rich text format (.rtf), or MSWord (.doc). In cases where no identifiable name is attached to an electronic message, a verification of identity will be required. A scanned signature is one way to provide verification.

Individuals or organizations who expressed interest during the comment period (identified as the scoping period in early 2010) specified at 36 CFR 215.6 may appeal this decision. The notice of appeal must meet the appeal content requirements at 36 CFR 215.14.

**Contact**

For more information about this project, contact either Niccole Mortenson phone 406-329-3163 or nmortenson@fs.fed.us or Ryan Taylor at 970-527-4131 or rztaylor@fs.fed.us.
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To file a complaint of discrimination, write to USDA, Director, Office of Civil Rights, 1400 Independence Avenue, S.W., Washington, DC 20250-9410, or for Forest Service issues please call, toll free, (866) 632-9992 (Voice). TDD users can contact USDA through local relay or the Federal Relay at (800) 877-8339 (TDD) or (866) 377-8642 (relay voice users). USDA is an equal opportunity provider and employer.
Appendix A- Decision Map
# Appendix B- Stipulations for National Forest System Lands Federal Coal Lease COC-1362 & COC-67232

<table>
<thead>
<tr>
<th>Resource Area</th>
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<th>Stipulations Specific to Lease Modifications</th>
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<tr>
<td>Cultural and Paleontological Resources</td>
<td>The FS is responsible for assuring that the leased lands are examined to determine if cultural resources are present and to specify mitigation measures. Prior to undertaking any surface-disturbing activities on the lands covered by this lease, the lessee or operator, unless notified to the contrary by the FS, shall:</td>
<td>The FS is responsible for assuring that the leased lands are examined to determine if cultural resources are present and to specify mitigation measures. Prior to undertaking any surface-disturbing activities on the lands covered by this lease, the lessee or operator, unless notified to the contrary by the FS, shall:</td>
<td>Use language from parent leases (required Standard Notice for Lands under the Jurisdiction of the Department of Agriculture.)</td>
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<td>• Contact the FS to determine if a site specific cultural resource inventory is required. If a survey is required then:</td>
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<td>• Engage the services of a cultural resource specialist acceptable to the FS to conduct a cultural resource inventory of the area of proposed surface disturbance. The operator may elect to inventory an area larger than the area of proposed disturbance to cover possible site relocation which may result from environmental or other considerations. An acceptable inventory report is to be submitted to the FS for review and approval at the time a</td>
<td>• Engage the services of a cultural resource specialist acceptable to the FS to conduct a cultural resource inventory of the area of proposed surface disturbance. The operator may elect to inventory an area larger than the area of proposed disturbance to cover possible site relocation which may result from environmental or other considerations. An acceptable inventory report is to be submitted to the FS for review and approval at the time a</td>
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ROD Federal Coal Lease Modifications COC-1362 & COC-67232

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<td>surface disturbing plan of operation is submitted.</td>
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<td>• Implement mitigation measures required by the FS and BLM to preserve or avoid destruction of cultural resource values. Mitigation may include relocation of proposed facilities, testing, salvage, and recordation or other protective measures. All costs of the inventory and mitigation will be borne by the lessee or operator, and all data and materials salvaged will remain under the jurisdiction of the U.S. Government as appropriate.</td>
<td>• Implement mitigation measures required by the FS and BLM to preserve or avoid destruction of cultural resource values. Mitigation may include relocation of proposed facilities, testing, salvage, and recordation or other protective measures. All costs of the inventory and mitigation will be borne by the lessee or operator, and all data and materials salvaged will remain under the jurisdiction of the U.S. Government as appropriate.</td>
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<td>• The lessee or operator shall immediately bring to the attention of the FS and BLM any cultural or paleontological resources or any other objects of scientific interest discovered as a result of surface operations under this license, and shall leave such discoveries intact until directed to proceed by FS and BLM.</td>
<td>• The lessee or operator shall immediately bring to the attention of the FS and BLM any cultural or paleontological resources or any other objects of scientific interest discovered as a result of surface operations under this license, and shall leave such discoveries intact until directed to proceed by FS and BLM.</td>
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<td>Endangered or Threatened Species</td>
<td>The FS is responsible for assuring that the leased land is examined prior to undertaking any surface-disturbing activities to determine effects upon any plant or animal species listed or proposed for listing as endangered or threatened, or their habitats. The findings of this examination may result in some restrictions to the operator's plans or even disallow use and occupancy that would be in violation of the Endangered Species Act of 1973 by detrimentally affecting endangered or threatened species or their habitats. The lessee/operator may, unless notified by the FS that the examination is not necessary, conduct the examination on the leased lands at his discretion and cost. This examination must be done by or under the supervision of a qualified resource specialist approved by the FS. An acceptable report must be provided to the FS identifying the anticipated effects of a proposed action on endangered or threatened species or their habitats.</td>
<td>The FS is responsible for assuring that the leased land is examined prior to undertaking any surface-disturbing activities to determine effects upon any plant or animal species listed or proposed for listing as endangered or threatened, or their habitats. The findings of this examination may result in some restrictions to the operator's plans or even disallow use and occupancy that would be in violation of the Endangered Species Act of 1973 by detrimentally affecting endangered or threatened species or their habitats. The lessee/operator may, unless notified by the FS that the examination is not necessary, conduct the examination on the leased lands at his discretion and cost. This examination must be done by or under the supervision of a qualified resource specialist approved by the FS. An acceptable report must be provided to the FS identifying the anticipated effects of a proposed action on endangered or threatened species or their habitats.</td>
<td>Use language from parent leases, required Standard Notice for Lands under the Jurisdiction of the Department of Agriculture.</td>
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<td>If there is reason to believe that Forest Service Sensitive species, Threatened or Endangered species of plants or animals, or migratory bird species of high Federal interest are present, or become present in the lease area, the Lessee/Operator shall be required to conduct an intensive field inventory of the area to be disturbed and/or impacted.</td>
<td>If there is reason to believe that Sensitive, Threatened or Endangered species of plants or animals, or migratory bird species of high Federal interest are present, or become present in the lease area, the Lessee/Operator shall be required to conduct an intensive field inventory of the area to be disturbed and/or impacted.</td>
<td>Use language from parent leases, required Standard Notice for Lands under the Jurisdiction of the Department of Agriculture.</td>
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The inventory shall include species or groups of species identified by the FS, and will be conducted by a qualified specialist. A report of findings will be prepared and provided to the FS. A plan will be made that recommends protection for these species or action necessary to mitigate the disturbance consistent with the Forest Plan. The cost of conducting such inventory, preparing reports and carrying out mitigation measures shall be borne by the Lessee/Operator.

To comply with the USDA Forest Service Conservation Agreement with Fish and Wildlife Service, to follow the conservation measures in the Canada Lynx Conservation Assessment and Strategy (Ruediger et al. 2000), the following special constraints will apply if surface use on the lease is proposed in lynx habitat:

- Winter access will be limited to designated routes.
- Further, should surface disturbing operations be proposed on the lease in lynx habitat, the following special constraints may apply, depending on site-specific circumstances:
  - Remote monitoring of the development sites and facilities

Further, should post-lease operations be proposed on the lease in lynx habitat, the following special constraints may apply, depending on site-specific circumstances:

- Remote monitoring of the development sites and facilities may be required to reduce snow compaction.
- A reclamation plan (e.g. road reclamation and vegetation rehabilitation) for sites and facilities that

To comply with the Canada Lynx Assessment and Strategy (Ruediger et al. 2000), the following special constraints will apply if post-lease surface use is proposed in lynx habitat:

- Winter access will be limited to designated routes.
- Remote monitoring of the development sites and facilities will be required to reduce snow compaction.

Further, should surface disturbing operations be proposed on the lease in lynx habitat, the following special constraints will apply:

- Remote monitoring of the development sites and facilities will be required to reduce snow compaction.
- A reclamation plan (e.g. road reclamation and vegetation rehabilitation) for sites and facilities that
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<td>may be required to reduce snow compaction.</td>
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<td>promotes the restoration of lynx habitat will be required.</td>
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<td>• A reclamation plan (e.g. road reclamation and vegetation rehabilitation) for sites and facilities that promotes the restoration of lynx habitat may be required.</td>
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<td>• Public motorized use on new roads constructed for project-specific purposes will be restricted.</td>
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<td>• Public motorized use on new roads constructed for project-specific purposes will be restricted.</td>
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<td>• Access roads will be designed to provide for effective closures and will be reclaimed or decommissioned at project completion if they are no longer needed for other management objectives.</td>
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<td>• Access roads will be designed to provide for effective closures and will be reclaimed or decommissioned at project completion if they are no longer needed for other management objectives.</td>
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<td>• New permanent roads will not be built on ridge tops or in saddles, if possible, or in areas identified as important for lynx habitat connectivity. New roads will be situated away from forested stringers.</td>
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<td></td>
<td>• New permanent roads will not be built on ridge tops or in saddles, or in areas identified as important for lynx habitat connectivity. New roads will be situated away from forested stringers.</td>
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<td>• If post lease surface use occurs in lynx habitat, the Lessee will be required to submit an annual report to the USDA-FS and USFWS of all activities having occurred in lynx habitat.</td>
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<td><strong>Raptors</strong></td>
<td>For raptors (except American kestrel) the Lessee will be required to:</td>
<td>For raptors (except American kestrel) the Lessee will be required to:</td>
<td>Use combined language from COC-67232 and COC-1362 which reflects Forest Plan standards as well as guidelines from the Biological Evaluation for this project:</td>
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<td>• Conduct surveys for nesting raptors on the lease prior to development of any surface</td>
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<td>• No surface activities will be allowed within ¼ mile radius of active nest sites between</td>
<td>• No surface activities will be allowed within ½-mile radius of active nest sites between</td>
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<td>• No surface activities will be allowed within 1-mile radius of active bald eagle or</td>
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<td>peregrine falcon nest sites between the dates of February 1 and August 15, unless</td>
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<td>specific basis.</td>
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<td>(* No bald eagle or peregrine falcon nest site habitat has been identified within the lease</td>
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<td>modifications as indicated in the Biological Evaluation prepared for this analysis.)</td>
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<td><strong>Big game winter range</strong></td>
<td>In order to protect big game wintering areas, elk calving areas, and other key</td>
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<td>wildlife habitat and/or activities, specific surface use may be curtailed during specific times of year. Specific time restrictions for specific species will be evaluated by the Forest Service at the individual project stage, and any additional site specific conditions of use developed at that time.</td>
<td>wildlife habitat and/or activities, specific surface use may be curtailed during specific times of year. Specific time restrictions for specific species will be evaluated by the Forest Service at the individual project stage, and any additional site specific conditions of use developed at that time.</td>
<td>Use language from parent leases.</td>
</tr>
<tr>
<td>Water depletions</td>
<td>In the future, if water to be used for mine related activities is taken from a source that is not considered to be non-tributary waters by the U.S. Fish and Wildlife Service, or which exceeds a depletion amount previously consulted upon, the permitting agency must enter into consultation with the U.S. Fish and Wildlife Service to determine appropriate conservation measures to offset effects to listed fish and critical habitat in the upper Colorado River Basin.</td>
<td>In the future, if water to be used for mine related activities is taken from a source that is not considered to be non-tributary waters by the U.S. Fish and Wildlife Service, or which exceeds a depletion amount previously consulted upon, the permitting agency must enter into consultation with the U.S. Fish and Wildlife Service to determine appropriate conservation measures to offset effects to listed fish and critical habitat in the upper Colorado River Basin.</td>
<td>Use language from parent leases.</td>
</tr>
<tr>
<td>Breeding birds</td>
<td>If surface disturbance is proposed on the lease, the lessee/operators will be required to conduct breeding bird surveys prior to surface disturbance as prescribed by the Forest Service.</td>
<td>If surface disturbance is proposed on the lease, the lessee/operators will be required to conduct breeding bird surveys prior to surface disturbance.</td>
<td>Use language from COC-1362 parent lease on both modifications.</td>
</tr>
<tr>
<td>Geologic hazards</td>
<td>No surface occupancy would be allowed in areas of high geologic hazard or high erosion potential, or on slopes which exceed 60%.</td>
<td>No surface occupancy would be allowed in areas of high geologic hazard or high erosion potential.</td>
<td>Use language from respective parent leases.</td>
</tr>
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<td></td>
<td>Special interdisciplinary team analysis and mitigation plans detailing construction and mitigation techniques</td>
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<td>would be required on areas where slopes range from 40-60 percent. The interdisciplinary team could include engineers, soil scientist, hydrologist, landscape architect, reclamation specialist and mining engineer.</td>
<td>would be required on areas where slopes range from 40-60 percent. The interdisciplinary team could include engineers, soil scientist, hydrologist, landscape architect, reclamation specialist and mining engineer.</td>
<td>Use language from parent leases</td>
</tr>
<tr>
<td>Baseline Information</td>
<td>The operator/lessee would be required to perform adequate baseline studies to quantify existing surface and subsurface resources. Existing data can be used for baseline analyses provided that the data is adequate to locate, quantify, and demonstrate interrelationships between geology, topography, hydrogeology, and hydrology. Baseline studies are critical to the success of future observation and assessment of mining related effects on resources.</td>
<td>The operator/lessee would be required to perform adequate baseline studies to quantify existing surface and subsurface resources. Existing data can be used for baseline analyses provided that the data is adequate to locate, quantify, and demonstrate interrelationships between geology, topography, hydrogeology, and hydrology. Baseline studies are critical to the success of future observation and assessment of mining related effects on resources in the Dry Fork lease tract.</td>
<td>Use language from parent leases</td>
</tr>
<tr>
<td>Monitoring Program</td>
<td>The operator/lessee would be required to establish or amend a monitoring program to be used as a continuing record of change over time of area resources in order to assess mining induced impacts. The monitoring program shall provide the procedures and methodologies to adequately assess interrelationships between geology, topography, hydrogeology, and hydrology identified in the baseline assessment to mining activities on the lease area. The monitoring program shall incorporate baseline data so as to provide a continuing record over time.</td>
<td>The operator/lessee of the lease tract would be required to establish or amend a monitoring program to be used as a continuing record of change over time of area resources in order to assess mining induced impacts. The monitoring program shall provide the procedures and methodologies to adequately assess interrelationships between geology, topography, hydrogeology, and hydrology identified in the baseline assessment to mining activities in the lease tract area. The monitoring program shall incorporate baseline data so as to provide a continuing record over time.</td>
<td>Use language from parent leases</td>
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<tr>
<td>Riparian, wetland or floodplain</td>
<td>Surface use or disturbances (except for surface subsidence and resource monitoring purposes defined in the approved mining permit) will avoid riparian, wetland or floodplain areas, and a buffer zone surrounding these areas (the definition of riparian areas and appropriate buffer zone will be consistent with that defined in the Forest Service Manual and Water Conservation Practices Handbook. Wetland definition will follow Army Corps of Engineers guidelines) unless no practical Alternatives exist.</td>
<td>Surface use or disturbances (except for surface subsidence and resource monitoring purposes defined in the approved mining permit) will not be permitted in riparian, wetland or floodplain areas, or within a buffer zone surrounding these areas (the definition of riparian areas and appropriate buffer zone will be consistent with that defined in the Forest Service Manual and Water Conservation Practices Handbook. Wetland definition will follow Army Corps of Engineers guidelines) unless no practical Alternatives exist.</td>
<td>Use language from parent leases</td>
</tr>
<tr>
<td>Subsidence</td>
<td>If subsidence adversely affects surface resources in any way (including, but not limited to a documented water loss), the Lessee, at their expense will be responsible to: restore stream channels, stock ponds, protect stream flow with earthwork or temporary culverts, restore affected roads, or provide other measures to repair damage or replace any surface water and/or developed ground water source, stock pond, water conveyance facilities, with water from an alternate source in sufficient quantity and quality to maintain existing riparian habitat, livestock and wildlife use, or other land uses as authorized by 36 CFR 251.</td>
<td>If subsidence adversely affects surface resources in any way (including, but not limited to a documented water loss), the Lessee, at their expense will be responsible to: restore stream channels, stock ponds, protect stream flow with earthwork or temporary culverts, restore affected roads, or provide other measures to repair damage or replace any surface water and/or developed ground water source, stock pond, water conveyance facilities, with water from an alternate source in sufficient quantity and quality to maintain existing riparian habitat, livestock and wildlife use, or other land uses as authorized by 36 CFR 251.</td>
<td>Use language from parent leases</td>
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</table>

The Lessee/Operator shall be responsible for monitoring, repairing and/or mitigating subsidence effects on

The Lessee/Operator shall be required to perform the following with respect to monitoring, repairing and/or mitigating

As parent lease for COC-67232 deals specifically with an irrigation ditch on that lease, use language from COC-
Resource Area | Stipulations Carried Forward from Parent Lease COC-1362 Specific to Forest Service Lands | Stipulations Carried Forward from Parent Lease COC-67232 Specific to Forest Service Lands | Stipulations Specific to Lease Modifications
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existing facilities under Special Use Permit with the Forest Service. Monitoring, repair and/or mitigation, if needed, would be performed at the Lessee’s expense. These requirements will be coordinated with the District Ranger and the Special Use Permittee.

subsidence effects on existing facilities under Special Use Permit with the Forest Service. Monitoring, repair and/or mitigation will be performed at the Lessee’s expense. The Lessee may request variations on timing for surveys, monitoring and reporting. Approving such requests would be at the discretion of the District Ranger.

a. Baseline condition surveys of existing facilities will be completed the Fall following award of lease. Reports of this survey will be deliverable to the Forest Service by December 1 of that same year.
b. In consultation with the Special Use Permittee and the Forest Service, install equipment to monitor flow on water conveyance facilities during the Fall following award of lease. Flow monitoring shall commence the following spring and continue until one year post mining. Flow data shall be provided to the Forest Service annually by December 1.
c. A Surface Facility Monitoring and Mitigation Plan (Plan) will be submitted to the Forest Service for review and approval not later than 12 months prior to scheduled undermining. The Plan will detail measures to be taken to monitor, repair and mitigate subsidence effects of the facilities during actual mining and for one year.

Roadless | The permittee/lessee must comply with all the rules and regulations of the For Alternative 2 (or, if applicable, Alternative 4) Consent and Lease | All or parts of the following lands encompassed in this lease are in the

For Alternative 2 (or, if applicable, Alternative 4) Consent and Lease
<table>
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|               | Secretary of Agriculture set forth at Title 36, Chapter II, of the Code of Federal Regulations governing the use and management of the National Forest System (NFS) when not inconsistent with the rights granted by the Secretary of Interior in the permit. The Secretary of Agriculture’s rules and regulations must be complied with for (1) all use and occupancy of the NFS prior to approval of an exploration plan by the Secretary of the Interior, (2) uses of all existing improvements, such as forest development roads, within and outside the area permitted by the Secretary of the Interior, and (3) use and occupancy of the NFS not authorized by the permit/operation approved by the Secretary of the Interior. | West Elk Inventoried Roadless Area and may be subject to restrictions on road-building pursuant to rules and regulations of the Secretary of Agriculture applicable at the time any roads may be proposed on the lease. All or parts of the following lands encompassed in this lease are in the West Elk Inventoried Roadless Area and may be subject to restrictions on road-building pursuant to rules and regulations of the Secretary of Agriculture applicable at the time any roads may be proposed on the lease. | under the provision of the 2001 Roadless Rule: On the following lands within inventoried roadless areas:  
1. All surface disturbances will be stabilized with effective runoff and erosion control measures.  
2. Disturbances will be restricted to the minimum area necessary to safely and efficiently complete surface activities.  
3. If rutting exceeds 6 inches on cross-country motorized access, all operations must cease until soil conditions improve. The District Ranger may authorize temporary use during these conditions for emergency situations.  
4. Cross-country motorized access will require grade breaks or undulations every 330 ft. on steep ground (>30% slope).  
**For Alternative 3 (or, if applicable, Alternative 4):** Colorado Roadless Rule stipulations  
On the following lands within the Sunset CRA, surface operations incident to underground coal mining are subject to regulations in 36 CFR 294, subpart D:  
- All roads that may be constructed must be |
<p>|               | Federal Coal Lease C-1362, as modified October 2001                                   |                                                                                        |                                                                                        |
|               | All or parts of the following lands encompassed in this lease are in the West Elk Inventoried Roadless Area and may be subject to restrictions on road-building pursuant to rules and regulations of the Secretary of Agriculture applicable at the time any roads may be proposed on the lease. |                                                                                        |                                                                                        |
|               | Legal descriptions are approximate. Locations of any proposed surface use would be verified for relationship to IRA boundaries using site-specific maps if/when surface operations are proposed. |                                                                                        |                                                                                        |</p>
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<td>temporary. All temporary road construction must be consistent with applicable land management plan direction</td>
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<td>Road construction may only occur if motorized access has been deemed infeasible by the responsible official; unless a temporary road is needed to protect public health and safety in cases of an imminent threat of flood, fire or other catastrophic event that, without intervention, would cause the loss of life or property</td>
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<td>Temporary road construction must be completed in a manner that reduces effects on surface resources, and prevents unnecessary or unreasonable surface disturbance</td>
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<td>All temporary roads must be decommissioned and affected landscapes restored when it is determined that the road is no longer needed for the established purpose</td>
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<td>All temporary roads must prohibit public motorized vehicles (including off-highway vehicles) except:</td>
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<td>I. Where specifically used for the purpose for which the road was established; or</td>
<td></td>
<td>For any linear construction zone (LCZ) over 50 inches wide used to install pipelines, the Regional Forester must determine that they are needed, and the responsible official must determine that motorized access without a linear construction zone is not feasible.</td>
</tr>
<tr>
<td></td>
<td>II. Motor vehicle use that is specifically authorized under a Federal law or regulation.</td>
<td></td>
<td>• Construction and use of linear construction zones must be consistent with the GMUG Forest Land and Resource Management Plan, and may be no wider than their respective intended uses.</td>
</tr>
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<td>• Installation of linear construction zones will be done in a manner that minimizes ground disturbance.</td>
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<td>• Reclamation of a linear construction zone will not diminish, over the long-term, roadless area</td>
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<td>characteristics. All authorizations approving the installation of linear facilities through the use of a linear construction zone shall include a responsible official approved reclamation plan for reclaiming the affected landscape while conserving roadless area characteristics over the long-term. Upon completion of the installation of a linear facility via the use of a linear construction zone, all areas of surface disturbance shall be reclaimed as prescribed in the authorization and the approved reclamation plan and may not be waived.</td>
</tr>
<tr>
<td>Visuals</td>
<td>n/a</td>
<td>n/a</td>
<td>Within the lease modification areas, the lessee will work with the District Ranger and his/her representative to see that all mine operations are situated on the ground in such a manner that reasonably minimizes impacts to the scenic integrity of that landscape as prescribed in the Forest Plan.</td>
</tr>
<tr>
<td>Methane use</td>
<td>n/a</td>
<td>n/a</td>
<td>If flaring or other combustion is prescribed as part of any future mitigation measure, lessee will be required to submit a fire prevention and protection plan subject to responsible Forest Service official for approval.</td>
</tr>
</tbody>
</table>
Appendix C- Existing Federal Coal Leases COC-1362 & COC-67232
Coal lease COC-01362 was issued effective September 1, 1967; and the last readjustment was on September 1, 1997. This lease becomes subject to readjustment of its terms and conditions on September 1, 2007.

Notice of intent to readjust the coal lease was sent to the lessee on September 01, 2005. As provided in the Mineral Leasing Act of 1920, as amended (41 Stat. 437, 30 U.S.C. 181 et seq.), and the regulations at 43 CFR 3451, we are hereby readjusting the terms and conditions of the lease. A copy of the lease is enclosed. The readjusted terms and conditions shall become effective September 01, 2007. This action has been reviewed for conformance with the Bureau of Land Management's public land health standards adopted February 12, 1997. The readjustment will not adversely affect achievement of the public land health standards.

The annual rental remains at $3 per acre or fraction thereof as provided in the current lease. The royalty rates established by law and by regulation at 43 CFR 3473.3-2 remain at 12½ percent of the value of the coal removed from a surface mine and at 8 percent for coal removed from an underground mine. The value of the coal shall be determined in accordance with the regulations at 30 CFR 206, as amended. The adequacy of the lease bond is reviewed periodically and adjusted when necessary to reflect changed conditions. The required bond amount remains at $265,000.

Payments of rentals and royalties must be submitted to the Minerals Management Service in accordance with that agency's regulations in Title 30, Code of Federal Regulations. In accordance with the regulations at 43 CFR 3451.2(b) and (e), this decision constitutes the final action of the Bureau of Land Management on all the provisions contained in the readjusted lease. The effective date of the readjusted lease shall not be affected by the filing of any appeal of, or subsequent civil suit regarding, any of the readjusted terms and conditions.
Within 30 days of receipt of this decision, you have the right of appeal to the Board of Land Appeals, Office of the Secretary, in accordance with the regulations at 43 CFR 4.400. The appeal procedures are outlined in the enclosed form 1842-1. Information on Filing Appeals to the Board of Land Appeals must be strictly followed. The appellant has the burden of showing that the decision appealed from is in error.

Matt R. McColm
Acting Chief, Branch of Solid Minerals
Division of Energy, Lands and Minerals

Enclosures:
Readjusted Lease
Appeal Form 1842-1

cc:
FOM, UFO w/lse
USFS w/lse
MMS w/lse
OSMRE w/lse
DOJ w/lse
Governor
UN I D STATES  
DEPARTMENT OF THE INTERIOR  
BUREAU OF LAND MANAGEMENT  

COAL LEASE READJUSTMENT  

PART I. LEASE RIGHTS GRANTED  

This lease, entered into by and between the UNITED STATES OF AMERICA, hereinafter called lessor, through the Bureau of Land Management, and  

Mountain Coal Company, LLC  
One City Place Dr., Ste. 300  
St. Louis, Missouri 63141  

hereinafter called lessee, is readjusted, effective September 1, 2007, for a period of 10 years and for so long thereafter as coal is produced in commercial quantities from the leased lands, subject to readjustment of lease terms at the end of each 10-year lease period.  

Sec.1. This lease readjustment is issued pursuant and subject to the terms and provisions of the Mineral Lands Leasing Act of 1920, Act of February 25, 1920, as amended, 41 Stat. 437, 30 U.S.C. 181-287, hereinafter referred to as the Act; and to the regulations and formal orders of the Secretary of the Interior which are now or hereafter in force, when not inconsistent with the express and specific provisions herein.  

Sec.2. Lessor, in consideration of any rents, and royalties to be paid, and the conditions and covenants to be observed as herein set forth, hereby grants to lessee the exclusive right and privilege to drill for, mine, extract, remove, or otherwise process and dispose of the coal deposits in, upon, or under the following described lands:  

T. 13 S., R. 90 W., 6th P.M.  
sec. 27, lots 1-16 inclusive;  
sec. 28, lots 1-16 inclusive;  
sec. 29, lots 1-14 inclusive;  
sec. 30, lots 5, 6, and 9 inclusive;  
sec. 32, lots 1-9 inclusive, excluding 24.8 acres in the Independent Reservoir;  
sec. 33, lots 1-16 inclusive;  
sec. 34, lots 1-16 inclusive;  

T. 14 S., R. 90 W., 6th P.M.  
sec. 3, lots 1-4 inclusive, S1/2N1/2, and S1/2;  
sec. 4, lots 1-3 inclusive, S1/2N1/2, E1/4N1/4, E1/2SW1/4, and SE1/4;  
sec. 9, N1/2N1/4 and SE1/4N1/4;  
sec. 10, N1/2.  

T. 13 S., R. 90 W., 6th P.M.  
sec. 35, Beginning at the northwest corner of said sec. 35;  
Thence S 89° 45'E, 2308.2 feet along the north line to the north 1/4 corner of said sec. 35;  
Thence S 89° 51'E, 755.52 feet along the north line of said sec. 35;  
Thence N 77° 34'26"W, 3118.74 feet to the west line of said sec. 35;  
Thence N 1° 33'E, 196.48 feet along the west line of said sec. 35 to the Point of Beginning.  

containing 4,836.36 more or less, together with the right to construct such works, buildings, plants, structures, equipment and appliances and the right to use such on-lease rights-of-way which may be necessary and convenient in the exercise of the rights and privileges granted, subject to the conditions herein provided.  

PART II. TERMS AND CONDITIONS  

Sec. 1. (a) RENTAL RATE - Lessee shall pay lessor rental annually and in advance for each acre or fraction thereof during the continuance of the lease at the rate of $1.00 for each lease year.  

(b) RENTAL CREDITS - Rental shall not be credited against either production or advance royalties for any year.  

Sec. 2. (a) PRODUCTION ROYALTIES - The royalty
shall be 12% percent of the value of the coal produced by strip or auger methods and 8.0 percent of the value of the coal produced by underground mining methods as set forth in the regulations. Royalties are due to lessee the final day of the month succeeding the calendar month in which the royalty obligation accrues.

(b) ADVANCE ROYALTIES - Upon request by the lessee, the authorized officer may accept, for a total of no more than 10 years, the payment of advance royalties in lieu of continued operation, consistent with the regulations. The advance royalty shall be based on a percent of the value of a minimum number of tons determined in the manner established by the advance royalty regulations in effect at the time the lessee requests approval to pay advance royalties in lieu of continued operation.

Sec. 3. BONDS - Lessee shall maintain in the proper office a lease bond in the amount of $265,000. The authorized officer may require an increase in this amount when additional coverage is determined appropriate.

Sec. 5. LOGICAL MINING UNIT (LMU) - Either upon approval by the lessee's application or at the direction of the lessee, this lease shall become an LMU or part of an LMU subject to the provisions set forth in the regulations.

The stipulations established in an LMU approval in effect at the time of LMU approval will supersede the relevant inconsistent terms of this lease so long as the lease remains committed to the LMU. If the LMU of which this lease is a part is dissolved, the lease shall then be subject to the lease terms which would have been applied if the lease had not been included in an LMU.

Sec. 6. DOCUMENTS, EVIDENCE AND INSPECTION - At such times and in such form as lessee may prescribe, lessee shall furnish detailed statements showing the amounts and quality of all products removed and sold from the lease, the proceeds therefrom, and the amount used for production purposes or unavoidably lost.

Lessee shall keep open at all reasonable times for the inspection of any duly authorized officer of lessee, the leased premises and all surface and underground improvements, works, machinery, ore stockpiles, equipment and all books, accounts, maps, and records relative to operations, surveys, or investigations on or under the leased lands.

Lessee shall allow lessee access to and copying of documents reasonably necessary to verify lessee compliance with terms and conditions of the lease. While this lease remains in effect, information obtained under this section shall be closed to inspection by the public in accordance with the Freedom of Information Act (5 U.S.C. 552).

Sec. 7. DAMAGES TO PROPERTY AND CONDUCT OF OPERATIONS - Lessee shall comply at its own expense with all reasonable orders of the Secretary, respecting diligent operations, prevention of waste, and protection of other resources.

Sec. 4. DILIGENCE - The lessee is subject to the conditions of diligent development and continued operations, except that these conditions are excused when operations under the lease are interrupted by strikes, the elements, or casualties not attributable to the lessee. The lessee in the public interest, may suspend the conditions of continued operation upon payment of advance royalties in accordance with the regulations in existence at the time of the suspension. Lessee's failure to produce coal in commercial quantities at the end of 10 years shall terminate the lease, pursuant to Section 7 of the Act. If not submitted already, lessee shall submit an operation and reclamation plan pursuant to Section 7 of the Act no later than 3 years after the effective date of this lease. Lessee shall readjustment. The lessee reserves the power to present or order the suspension of the terms and conditions of this lease in accordance with the, inter alia, Section 39 of the Mineral Leasing Act, 30 U.S.C. 202.

Sec. 8. PROTECTION OF DIVERSE INTERESTS, AND EQUAL OPPORTUNITY - Lessee shall: pay when due all taxes legally assessed and levied under the laws of the State or the United States; accord all employees complete freedom of purchase; pay all employees, at least twice prevailing lawful money of the United States, maintain a safe working environment in accordance with standard industry practices; restrict the workday to not
more than 8 hours in any one day for underground workers, except in emergencies; and take measures necessary to protect the health and safety of the public. No person under the age of 16 years shall be employed in any mine below the surface. To the extent that laws of the State in which the lands are situated are more restrictive than the provisions in this paragraph, then the State laws apply.

Lessee will comply with all provisions of Executive Order No. 11246 of September 24, 1965, as amended, and the rules, regulations and relevant orders of the Secretary of Labor. Neither lessee nor lessee's subcontractors shall maintain segregated facilities.

Sec. 9. (a) TRANSFERS - This lease may be transferred in whole or in part to any person, association or corporation qualified to hold such lease interest.

Transfers of record title, working or royalty interest must be approved in accordance with the regulations.

(b) RELINQUISHMENT - The lessee may relinquish in writing at any time all rights under this lease or any portion thereof as provided in the regulations. Upon lessee's acceptance of the relinquishment, lessee shall be relieved of all future obligations under the lease or the relinquished portion thereof, whichever is applicable.

Sec. 10. DELIVERY OF PREMISES, REMOVAL OF MACHINERY, EQUIPMENT, ETC. - At such time as all portions of this lease are returned to lessor, lessee shall deliver up to lessor the land leased, underground timbering, and such other supports and structures necessary for the preservation of the mine workings on the leased premises or deposits and place all workings in condition for suspension or abandonment. Within 180 days thereof, lessee shall remove from the premises all other structures, machinery, equipment, tools, and materials that it elects to or is required by the authorized officer. Any such structures, machinery, equipment, tools, and materials remaining on the leased lands beyond 180 days, or approved extension thereof, shall become the property of the lessor, but lessee shall either remove any or all such property or shall continue to be liable for the cost of removal and disposal in the amount actually incurred by the lessor. If the surface is owned by third parties, lessee shall waive the requirement for removal, provided the third parties do not object to such waiver. Lessee shall prior to the termination of bond liability or at any other time when required and in accordance with all applicable laws and regulations, reclaim all lands the surface of which has been disturbed, dispose of all debris or solid waste, repair the offsite and onsite damage caused by lessee's activity or activities incidental thereto, and reclaim access roads or trails.

Sec. 11. PROCEEDINGS IN CASE OF DEFAULT - If lessee fails to comply with applicable laws, existing regulations, or the terms, conditions and stipulations of this lease, and the noncompliance continues for 30 days after written notice thereof, this lease shall be subject to cancellation by the lessor only by judicial proceedings. This provision shall not be construed to prevent the exercise by lessor of any other legal and equitable remedy, including waiver of the default. Any such remedy or waiver shall not prevent later cancellation for the same default occurring at any other time.

Sec. 12. HEIRS AND SUCCESSORS-IN-INTEREST - Each obligation of this lease shall extend to and be binding upon, and every benefit hereof shall inure to the heirs, executors, administrators, successors, or assigns of the respective parties hereto.

Sec. 13. INDEMNIFICATION - Lessee shall indemnify and hold harmless the United States from any and all claims arising out of the lessee's activities and operations under this lease.

Sec. 14. SPECIAL STATUTES - This lease is subject to the Federal Water Pollution Control Act (33 U.S.C. 1151-1179), the Clean Air Act (42 U.S.C. 1857 et. seq.), and to all other applicable laws pertaining to exploration activities, mining operations and reclamation, including the Surface Mining Control and Reclamation Act of 1977 (30 U.S.C. 1201 et. seq.).

Sec. 15. SPECIAL STIPULATIONS - See Attachment A for USFS stipulations.

(a) All stipulations concerning compliance with the requirements of the Surface Mining Control and Reclamation Act will be included in the document approving the mining plan.

1. A statement of the immediate impacts and long term effects of mining on transportation facilities within the State, including: (i) the estimated transportation mode(s), route(s), and frequency of trips for the extracted resource, (ii) contemplated construction of transportation facilities, (iii) the estimated effect of any truck movements on the rate of roadway pavement deterioration, on the design life of the transportation mode, on the level of service repair and on overall safety to the motoring public, and (iv) a discussion of those measures which can mitigate impact on the transportation modes such as proper signing, lighting, and design or access to and from public roadway(s).

2. A statement of the perceived roles and responsibilities of the lessee, the affected local governments, and the State of Colorado, relating to the technical and financial needs of the affected communities.

A determination for completeness will be made by the BLM. The Bureau will make this impact mitigation study available to the State and local governments.

(b) Lessee shall comply with all valid and applicable laws and regulations of Federal, State, and local governmental authority.
(c) RESOURCE RECOVERY AND PROTECTION. (1) Notwithstanding the approval of a resource recovery and protection plan (R2P2) by the BLM, lessor reserves the right to seek damages against the operator/lessee in the event (i) the operator/lessee fails to achieve maximum economic recovery (MER) as defined at 43 CFR 1460.0-5(21) of the recoverable coal reserves or (ii) the operator/lessee is determined to have caused a wasting of recoverable coal reserves. Damages shall be measured on the basis of the royalty that would have been payable on the wasted or unrecovered coal.

(2) The parties recognize that under an approved R2P2, conditions may require a modification by the operator/lessee of that plan. In the event a coalbed or portion thereof is not to be mined or is rendered unmineable by the operation, the operator/lessee shall submit appropriate justification to obtain approval by the Authorized Officer (AO) to leave such reserves unmined. Upon approval by the AO, such coalbeds or portions thereof shall not be subject to damages as described above. Further, nothing in this section shall prevent the operator/lessee from exercising its right to relinquish all or portion of the lease as authorized by statute and regulation.

(3) In the event the AO determines that the R2P2, as approved, will not attain MER as the result of changed conditions, the AO will give proper notice to the operator/lessee as required under applicable regulations. The AO will order a modification if necessary, identifying additional reserves to be mined in order to attain MER. Upon a final administrative or judicial ruling upholding such an ordered modification, any reserves left unmined (wasted) under that plan will be subject to damages as described in the first paragraph under this section.

(4) Subject to the right to appeal hereinafter set forth, payment of the value of the royalty on such unmined recoverable coal reserves shall become due and payable upon determination by the AO that the coal reserves have been rendered unmineable or at such time that the operator/lessee has demonstrated an unwillingness to extract the coal.

(5) The BLM may enforce this provision either by issuing a written decision requiring payment of the BLM demand for such royalties, or by issuing a notice of non-compliance. A decision or notice of non-compliance issued by the lessor that payment is due under this stipulation is appealable as allowed by law.

THE UNITED STATES OF AMERICA

By: [Signature]

Matt R. McCollm
Acting Chief, Branch of Solid Minerals
Division of Energy, Lands and Minerals

Date: 7/2/07
Attachment A
USDA Forest Service
Grand Mesa-Uncompahgre-Gunnison National Forests
Gunnison County, CO

Standard Notice and Coal Lease Stipulations
for
National Forest System Lands
Federal Coal Lease
C-1362

T. 13 S., R. 90 W., 6th P.M.
Sec. 27: lots 1-16 inclusive;
Sec. 28: lots 1-16 inclusive;
Sec. 29: lots 1-14 inclusive;
Sec. 30: lots 5, 6, and 9;
Sec. 32: lots 1-9, inclusive, excluding 24.8
in the Independent Reservoir;
Sec. 33: lots 1-16, inclusive;
Sec. 34: lots 1-16, inclusive;

T. 14 S., R. 90 W., 6th P.M.
Sec. 3: lots 1-4, inclusive, S¼N½, and
S½;
Sec. 4: lots 1-3, inclusive, S¼NE¼,
SE¼NW¼, E¾SW¼, and SE¼;
Sec. 9: N¼NE¼ and SE¼NE¼;
Sec. 10: N¾.

T. 13 S., R. 90 W., 6th P.M.
Sec. 35: Beginning at the northwest corner of
said sec. 35;
Thence S 89° 45' E, 2308.02 feet along the
north line to the north ¾ corner of said
sec. 35;
Thence S 89° 51' E, 755.52 feet along the
north line of said sec 35;
Thence N 77° 34'26"W, 3118.74 feet to the
west line of said sec 35;
Thence N 1 33' E, 1046.48 feet along the west
line of said sec. 35 to the Point of
Beginning.

NOTICE FOR LANDS OF THE NATIONAL FOREST SYSTEM UNDER JURISDICTION OF
DEPARTMENT OF AGRICULTURE
(R2-FS-2628-13(92))

The permittee/lessee must comply with all the rules and regulations of the Secretary of Agriculture set
forth at Title 36, Chapter II, of the Code of Federal Regulations governing the use and management of the
National Forest System (NFS) when not inconsistent with the rights granted by the Secretary of Interior in
the permit. The Secretary of Agriculture’s rules and regulations must be complied with for (1) all use and
occupancy of the NFS prior to approval of an exploration plan by the Secretary of the Interior; (2) uses of
all existing improvements, such as forest development roads, within and outside the area permitted by the
Secretary of the Interior, and (3) use and occupancy of the NFS not authorized by the permit/operation
approved by the Secretary of the Interior.

All matters related to this stipulation are to be addressed to:
Forest Supervisor
Grand Mesa, Uncompahgre, and Gunnison National Forests
2250 Highway 50
Delta, CO 81416
970-874-6600

who is the authorized representative of the Secretary of Agriculture.
NOTICE

CULTURAL AND PALEONTOLOGICAL RESOURCES - The FS is responsible for assuring that the leased lands are examined to determine if cultural resources are present and to specify mitigation measures. Prior to undertaking any surface-disturbing activities on the lands covered by this lease, the lessee or operator, unless notified to the contrary by the FS, shall:

1. Contact the FS to determine if a site specific cultural resource inventory is required. If a survey is required then:

2. Engage the services of a cultural resource specialist acceptable to the FS to conduct a cultural resource inventory of the area of proposed surface disturbance. The operator may elect to inventory an area larger than the area of proposed disturbance to cover possible site relocation which may result from environmental or other considerations. An acceptable inventory report is to be submitted to the FS for review and approval at the time a surface disturbing plan of operation is submitted.

3. Implement mitigation measures required by the FS and BLM to preserve or avoid destruction of cultural resource values. Mitigation may include relocation of proposed facilities, testing, salvage, and recorrection or other protective measures. All costs of the inventory and mitigation will be borne by the lessee or operator, and all costs and materials salvaged will remain under the jurisdiction of the U.S. Government as appropriate.

The lessee or operator shall immediately bring to the attention of the FS and BLM any cultural or paleontological resources or any other objects of scientific interest discovered as a result of surface operations under this license, and shall leave such discoveries intact until directed to proceed by FS and BLM.

ENDANGERED OR THREATENED SPECIES - The FS is responsible for assuring that the leased land is examined prior to undertaking any surface-disturbing activities to determine effects upon any plant or animal species listed or proposed for listing as endangered or threatened, or their habitats. The findings of this examination may result in some restrictions to the operator's plans or even disallow use and occupancy that would be in violation of the Endangered Species Act of 1973 by detrimentally affecting endangered or threatened species or their habitats.

The lessee/operator may, unless notified by the FS that the examination is not necessary, conduct the examination on the leased lands at his discretion and cost. This examination must be done by or under the supervision of a qualified resource specialist approved by the FS. An acceptable report must be provided to the FS identifying the anticipated effects of a proposed action on endangered or threatened species or their habitats.

Stipulations:

1. To comply with the USDA Forest Service Conservation Agreement with Fish and Wildlife Service, to follow the conservation measures in the Canada Lynx Conservation Assessment and Strategy (Ruediger et al. 2000), the following special constraints will apply if surface use on the lease is proposed in lynx habitat:
   a. Winter access will be limited to designated routes.

   Further, should surface disturbing operations be proposed on the lease in lynx habitat, the following special constraints may apply, depending on site-specific circumstances:

   a. Remote monitoring of the development sites and facilities may be required to reduce snow compaction.
   b. A reclamation plan (e.g. road reclamation and vegetation rehabilitation) for sites and facilities that promotes the restoration of lynx habitat may be required.
c. Public motorized use on new roads constructed for project-specific purposes will be restricted.
d. Access roads will be designed to provide for effective closures and will be reclaimed or
decommissioned at project completion if they are no longer needed for other management
objectives.
e. New permanent roads will not be built on ridge tops or in saddles, or in areas identified as
important for lynx habitat connectivity. New roads will be situated away from forested stringers.

2. If there is reason to believe that Forest Service Sensitive species, Threatened or Endangered species
of plants or animals, or migratory bird species of high Federal interest are present, or become present in
the lease area, the Lessee/Operator shall be required to conduct an intensive field inventory of the area
to be disturbed and/or impacted. The inventory shall include species or groups of species identified by
the FS, and will be conducted to by a qualified specialist. A report of findings will be prepared and
provided to the FS. A plan will be made that recommends protection for these species or action
necessary to mitigate the disturbance consistent with the Forest Plan. The cost of conducting such
inventory, preparing reports and carrying out mitigation measures shall be borne by the Lessee/Operator.

3. For raptors (except American kestrel) the Lessee will be required to:
   a. Conduct surveys for nesting raptors on the lease prior to development of any surface facilities,
      and
   b. No surface activities will be allowed within 1/4-mile radius of active nest sites between the
dates of February 1 and August 15, unless authorized by the Forest Service on a site-specific
basis.
   c. No surface activities will be allowed within 1-mile radius of active bald eagle or peregrine falcon
nest sites between the dates of February 1 and August 15, unless authorized by the Forest
Service on a site-specific basis.

4. In order to protect big game wintering areas, elk calving areas, and other key wildlife habitat and/or
activities, specific surface use may be curtailed during specific times of year. Specific time restrictions for
specific species will be evaluated by the Forest Service at the individual project stage, and any additional
site specific conditions of use developed at that time.

5. In the future, if water to be used for mine related activities is taken from a source that is not considered
to be non-tributary waters by the U.S. Fish and Wildlife Service, or which exceeds a depletion amount
previously consulted upon, the permitting agency must enter into consultation with the U.S. Fish and
Wildlife Service to determine appropriate conservation measures to offset effects to listed fish and critical
habitat in the upper Colorado River Basin.

6. Surface use or disturbances (except for surface subsidence and resource monitoring purposes
defined in the approved mining permit) will avoid riparian, wetland or floodplain areas, and a buffer zone
surrounding these areas (the definition of riparian areas and appropriate buffer zone will be consistent
definition will follow Army Corps of Engineers guidelines) unless no practical alternatives exist.

7. No surface occupancy would be allowed in areas of high geologic hazard or high erosion potential, or
on slopes which exceed 60%.

8. Special interdisciplinary team analysis and mitigation plans detailing construction and mitigation
techniques would be required on areas where slopes range from 40-60 percent. The interdisciplinary
team could include engineers, soil scientist, hydrologist, landscape architect, reclamation specialist and
mining engineer.

9. The operator/lessee would be required to perform adequate baseline studies to quantify existing
surface and subsurface resources. Existing data can be used for baseline analyses provided that the
data is adequate to locate, quantify, and demonstrate interrelationships between geology, topography,
hydrogeology, and hydrology. Baseline studies are critical to the success of future observation and
assessment of mining related effects on resources.
10. The operator/lessee would be required to establish or amend a monitoring program to be used as a continuing record of change over time of area resources in order to assess mining induced impacts. The monitoring program shall provide the procedures and methodologies to adequately assess interrelationships between geology, topography, hydrogeology, and hydrology identified in the baseline assessment to mining activities on the lease area. The monitoring program shall incorporate baseline data so as to provide a continuing record over time.

11. If surface disturbance is proposed on the lease, the lessee/operators will be required to conduct breeding bird surveys prior to surface disturbance as prescribed by the Forest Service.

12. If subsidence adversely affects surface resources in any way (including, but not limited to a documented water loss), the Lessee, at their expense will be responsible to: restore stream channels, stock ponds, protect stream flow with earthwork or temporary culverts, restore affected roads, or provide other measures to repair damage or replace any surface water and/or developed ground water source, stock pond, water conveyance facilities, with water from an alternate source in sufficient quality and quantity to maintain existing riparian habitat, livestock and wildlife use, or other land uses as authorized by 36 CFR 251.

13. The Lessee/Operator shall be responsible for monitoring, repairing and/or mitigating subsidence effects on existing facilities under Special Use Permit with the Forest Service. Monitoring, repair and/or mitigation, if needed, would be performed at the Lessee's expense. These requirements will be coordinated with the District Ranger and the Special Use Permittee.

14. Lease Notice
Federal Coal Lease
C-1362, as modified October 2001

All or parts of the following lands encompassed in this lease are in the West Elk Inventoried Roadless Area and may be subject to restrictions on road-building pursuant to rules and regulations of the Secretary of Agriculture applicable at the time any roads may be proposed on the lease.

T. 13 S., R. 90 W., 6th P.M.
Sec. 27: lots 1-16 inclusive;
Sec. 28: lots 1-16 inclusive;
Sec. 29: lots 1-14 inclusive;
Sec. 30: lots 6, 6, and 9;
Sec. 32: lots 1-9, inclusive, excluding 24.6
In the Independent Reservoir;
Sec. 33: lots 1-16, inclusive;
Sec. 34: lots 1-16, inclusive;

T. 14 S., R. 90 W., 6th P.M.
Sec. 3: lots 1-4, inclusive, S¾N¾, and S¾;
Sec. 4: lots 1-3, inclusive, S¾NE¼, SE¼NW¼, E¾SW¾, and SE¾;
Sec. 9: NE¼NE¼ and SE¾NE¼;
Sec. 10: N¾.

T. 13 S., R. 90 W., 6th P.M.
Sec. 35: Beginning at the northwest corner of said sec. 35;
Thence S 89° 43'E, 2308.02 feet along the north line to the north ¼ corner of said sec. 35;
Thence S 89° 51'E, 755.52 feet along the north line of said sec. 35;
Thence N 77° 34'26"W, 3118.74 feet to the west line of said sec. 35;
Thence N 1 33'E, 1946.48 feet along the west line of said sec. 35 to the Point of Beginning.

Legal descriptions are approximate. Locations of any proposed surface use would be verified for relationship to IRA boundaries using site-specific maps if/when surface operations are proposed.
Coal Lease C-1362 is hereby amended by this addendum:

PART I. LEASE RIGHTS GRANTED

***

Sec. 3. Notwithstanding the language in Sec. 2 of this lease and subject to the terms and conditions below, lessee is authorized to drill for, extract, remove, develop, produce and capture for use or sale any or all of the coal mine methane from the above described lands that it would otherwise be required to vent or discharge for safety purposes by applicable laws and regulations. For purposes of this lease, "coal mine methane" means any combustible gas located in, over, under, or adjacent to the coal resources subject to this lease, that will or may infiltrate underground mining operations.

Sec. 4. Notwithstanding any other provision of this lease, nothing herein shall, nor shall it be interpreted to, waive, alter or amend lessee’s right to vent, discharge or otherwise dispose of coal mine methane as necessary for mine safety or to mine the coal deposits consistent with permitted underground mining operations and federal and state law and regulation. Lessee shall not be obligated or required to capture for use or sale coal mine methane that would otherwise be vented or discharged if the capture of coal mine methane, independent of activities related to mining coal, is not economically feasible or if the coal mine methane must be vented in order to abate the potential hazard to the health or safety of the coal miners or coal mining activities. In the event of a dispute between lessor and lessee as to the economic or other feasibility of capturing for use or sale the coal mine methane, lessor’s remedy as a prevailing party shall be limited to recovery of compensatory royalties on coal mine methane not captured for use or sale by lessee. Lessee shall have the right to continue all mining activities under this lease, including venting coal mine methane, pending resolution of any dispute regarding the application of the terms of Sections 3 and 4.

PART II. TERMS AND CONDITIONS

Sec. 2

***

(c) COAL MINE METHANE OPERATIONS AND ROYALTIES - Notwithstanding the language in Part II, Sec. 2 (a) of this lease, the royalty shall be 12.5 percent of the value of any coal mine methane that is captured for use or sale from this lease. For purposes of this lease, the term “capture for use or sale” shall not include and the royalty shall not apply to coal mine methane that is vented or discharged and not captured for the economic or safety reasons described in Part I, Sec. 4 of this lease. Lessee shall have no obligation to pay royalties on any coal mine methane that is used on or for the benefit of mineral extraction at the West Elk coal mine. When not inconsistent with any express
provision of this lease, this lease is subject to all rules and regulations related to Federal
gas royalty collection in Title 30 of the Code of Federal Regulations now or hereinafter in
effect and lessor's rules and regulations related to applicable reporting and gas
measurement now or hereinafter in effect.

****

SEVERABILITY - In the event any provision of this addendum is subject to a legal challenge or
is held to be invalid, unenforceable or illegal in any respect, the validity, legality and
enforceability of this lease will not in any way be affected or impaired thereby and lessee will
retain, in accordance with the terms of this lease, the exclusive right and privilege to drill for,
mine, extract, remove, or otherwise process and dispose of the coal deposits in, upon or under the
lands described in this lease, including the right to vent or discharge coal mine methane for safety
purposes as required by applicable laws and regulations.

This Coal Lease Addendum is effective as of the date all parties have executed the Addendum.

MOUNTAIN COAL COMPANY, LLC

Name:  
Title:  President  
Date:  1-13-09

THE UNITED STATES OF AMERICA

Name:  
Title:  Associate State under  
Date:  1-14-09
PART I. LEASE RIGHTS GRANTED

This lease, entered into by and between the UNITED STATES OF AMERICA, hereinafter called lessor, through the Bureau of Land Management (BLM), and

Ark Land Company, One Cityplace Dr., Ste.300, St. Louis, MS 63141

hereinafter called lessee, is effective 03/01/2007, for a period of 20 years and for so long thereafter as coal is produced in commercial quantities from the leased lands, subject to readjustment of lease terms at the end of the 20th lease year and each 10-year period thereafter.

Sec. 1. This lease is issued pursuant and subject to the terms and provisions of the:


and to the regulations and formal orders of the Secretary of the Interior which are now or hereafter in force, when not inconsistent with the express and specific provisions herein.

Sec. 2. Lessor, in consideration of any bonuses, rents, and royalties to be paid, and the conditions and covenants to be observed as herein set forth, hereby grants and leases to lessee the exclusive right and privilege to drill for, mine, extract, remove, or otherwise process and dispose of the coal deposits in, upon, or under the following described lands:

T. 13 S., R. 90 W., 6th P.M.

sec. 35, lots 5 through 7, inclusive, and lots 9 through 16, inclusive, less and except land in coal leases C-1362 and CUC-56447, as modified;

sec. 36, W1/2SW1/4NW1/4, and W1/2SW1/4, less and except land in coal lease CUC-56447, as modified.

T. 14 S., R. 90 W., 6th P.M.

sec. 1, lots 3, 4, S1/2NW1/4, SW1/4, W1/2NW1/4SE1/4, and SW1/4SE1/4;

sec. 2, lots 1 through 4, inclusive, S1/2N1/2, and S1/2;

sec. 11, N1/2N1/2;

sec. 12, N1/2NW1/4, and NW1/4NE1/4.

Containing 1,517.13 acres, more or less, together with the right to construct such works, buildings, plants, structures, equipment and appliances and the right to use such on-lease rights-of-way which may be necessary and convenient in the exercise of the rights and privileges granted, subject to the conditions herein provided.

PART II. TERMS AND CONDITIONS

Sec. 1. (a) RENTAL RATE -Lessee must pay lessee rental annually and in advance for each acre or fraction thereof during the continuance of the lease at the rate of $ 3.00 for each lease year.

(b) RENTAL CREDITS -Rental will not be credited against either production or advance royalties for any year.

Sec. 2. (a) PRODUCTION ROYALTIES -The royalty will be 8.0 percent of the value of the coal as set forth in the regulations. Royalties are due to the lessor the final day of the month succeeding the calendar month in which the royalty obligation occurs.

(b) ADVANCE ROYALTIES -Upon request by the lessee, the BLM may accept, for a total of not more than 10 years, the payment of advance royalties in lieu of continued operation, consistent with the regulations. The advance royalty will be based on a percent of the value of a minimum number of tons determined in the manner established by the advance royalty regulations in effect at the time the lessee requests approval to pay advance royalties in lieu of continued operation.

Sec. 3. BONDS -Lessee must maintain in the proper office a lease bond in the amount of $ 605,000.00. The BLM may require an increase in this amount when additional coverage is determined appropriate.

Sec. 4. DILIGENCE -This lease is subject to the conditions of diligent development and continued operation, except that these conditions are excused when operations under the lease are interrupted by strikes, the elements, or casualties not attributable to the lessee. The lessee, in the public interest, may suspend the condition of continued operation upon payment of advance royalties in accordance with the regulations in existence at the time of the suspension. Lessee's failure to produce coal in commercial quantities at the end of 10 years will terminate the lease. Lessee must submit an operation and reclamation plan pursuant to Section 7 of the Act not later than 3 years after lease issuance.

The lessee reserves the power in assent to or order the suspension of the terms and conditions of this lease in accordance with, inter alia, Section 39 of the Mineral Leasing Act, 30 U.S.C. 209.

5. LOGICAL MINING UNIT (LMU) -Either upon approval by the lessor of the lessee's application or at the direction of the lessor, this lease will become an LMU or part of an LMU, subject to the provisions set forth in the regulations.

The stipulations established in an LMU approval in effect at the time of LMU approval will supersede the relevant inconsistent terms of this lease so long as the lease remains committed to the LMU. If the LMU of which this lease is a part is dissolved, the lease will then be subject to the lease terms which would have been applied if the lease had not been included in an LMU.

(Continued on page 2)
Sec. 6. DOCUMENTS, EVIDENCE AND INSPECTION - At such times and in such form as lessor may prescribe, lessee must furnish detailed statements showing the amounts and quality of all products removed and sold from the lease, the proceeds therefrom, and the amount used for production purposes or unavoidably lost.

Lessees must keep open at all reasonable times for the inspection by BLM the leased premises and all surface and underground improvements, works, machinery, ore stockpiles, equipment, and all books, accounts, tapes, and records relative to operations, surveys, or investigations on or under the leased lands.

Lessees must allow lessee access to and copying of documents reasonably necessary to verify lessee compliance with terms and conditions of the lease.

While this lease remain in effect, information obtained under this section will be closed to inspection by the public in accordance with the Freedom of Information Act (5 U.S.C. 552).

Sec. 7. DAMAGES TO PROPERTY AND CONDUCT OF OPERATIONS - Lessee must comply at its own expense with all reasonable orders of the Secretary, respecting diligent operations, prevention of waste, and protection of other resources.

Lessees must not conduct exploration operations, other than casual use, without an approved exploration plan. All exploration plans prior to the commencement of mining operations within an approved mining permit area must be submitted to the BLM.

Lessees must carry on all operations in accordance with approved methods and practices as provided in the operating regulations, having due regard for the prevention of injury to life, health, or property, and prevention of waste, damage or degradation to any land, air, water, cultural, biological, visual, and other resources, including mineral deposits and formations of mineral deposits not leased hereunder, and to other lands and uses or users. Lessee must take measures deemed necessary by lessee to accomplish the intent of this lease term. Such measures may include, but are not limited to, modification to proposed siting or design of facilities, timing of operations, and specification of interim and final reclamation procedures. Lessee reserves to itself the right to lease, sell, or otherwise dispose of the surface or other mineral deposits in the lands and the right to continue existing uses and to authorize future uses upon or in the leased lands, including issuing leases for mineral deposits not covered hereunder and approving easements or rights-of-way. Lessee must condition such uses to prevent unnecessary or unreasonable interference with rights of lessee as may be consistent with concepts of multiple use and multiple mineral development.

Sec. 8. PROTECTION OF DIVERSE INTERESTS, AND EQUAL OPPORTUNITY - Lessee must pay when due all taxes legally assessed and levied under the laws of the State or the United States; accord all employees complete freedom of purchase; pay all wages at least twice each month in lawful money of the United States; maintain a safe working environment in accordance with standard industry practices; restrict the workday to no more than 8 hours in any one day for underground workers, except in emergencies; and take measures necessary to protect the health and safety of the public. No person under the age of 16 years should be employed in any mine below the surface. To the extent that laws of the State in which the lands are situated are more restrictive than the provisions in this paragraph, then the State laws apply.

Lessee will comply with all provisions of Executive Order No. 11246 of September 24, 1965, as amended, and the rules, regulations, and relevant orders of the Secretary of Labor. Neither lessee nor lessee's subcontractors should maintain segregated facilities.

Sec. 9. (a) TRANSFERS

☐ This lease may be transferred in whole or in part to any person, association or corporation qualified to hold such lease interest.

☐ This lease may be transferred in whole or in part to another public body or to a person who will mine coal on behalf of, and for the use of, the public body or to a person who for the limited purpose of creating a security interest in favor of a lender agrees to be obligated to mine the coal on behalf of the public body.

☐ This lease may only be transferred in whole or in part to another small business qualified under 13 CFR 121.

Transfers of record title, working or royalty interest must be approved in accordance with the regulations.

(b) RELINQUISHMENT - The lessee may relinquish in writing at any time all rights under this lease or any portion thereof as provided in the regulations.

Upon lessee's acceptance of the relinquishment, leases will be relieved of all future obligations under the lease or the relinquished portion thereof, whichever is applicable.

Sec. 10. DELIVERY OF PREMISES, REMOVAL OF MACHINERY, EQUIPMENT, ETC. - At such time as all portions of this lease are returned to lessee, lessee must deliver up to lessee the land leased, underground timbering, and all other supports and structures necessary for the preservation of the mine workings on the leased premises or deposits and place all workings in condition for suspension or abandonment. Within 180 days thereof, lessee must remove from the premises all other structures, machinery, equipment, tools, and materials that it elects to or as required by the BLM. Any such structures, machinery, equipment, tools, and materials remaining on the leased lands beyond 180 days, or approved extension thereof, will become the property of the lessee, but lessees may either remove any or all such property or continue to be liable for the cost of removal and disposal of the amount actually incurred by the lessee. If the surface is owned by third parties, lessee will waive the requirement for removal, provided the third parties do not object to such waiver. Lessees must, prior to the termination of bond liability or at any other time when required and in accordance with all applicable laws and regulations, reclaim all lands the surface of which has been disturbed, dispose of all debris or solid waste, repair the off-site and onsite damage caused by lessee's activity or activities incidental thereto, and reclaim access roads and trails.

Sec. 11. PROCEEDINGS IN CASE OF DEFAULT - If lessee fails to comply with applicable laws, existing regulations, or the terms, conditions and stipulations of this lease, and the noncompliance continues for 30 days after written notice thereof, this lease will be subject to cancellation by the lessee only by judicial proceedings. This provision will not be construed to prevent the exercise by lessee of any other legal and equitable remedy, including waiver of the default. Any such remedy or waiver will not prevent later cancellation for the same default occurring at any other time.

Sec. 12. HEIRS AND SUCCESSORS-IN-MOST INTEREST - Each obligation of this lease will extend to and be binding upon, and every benefit hereof will inure to, the heirs, executors, administrators, successors, or assigns of the respective parties herein.

Sec. 13. INDEMNIFICATION - Lessee must indemnify and hold harmless the United States from any and all claims arising out of lessee's activities and operations under this lease.

Sec. 14. SPECIAL STATUTES - This lease is subject to the Clean Water Act (33 U.S.C. 1252 et seq.), the Clean Air Act (42 U.S.C. 4274 et seq.), and to all other applicable laws pertaining to exploration activities, mining operations and reclamation, including the Surface Mining Control and Reclamation Act of 1977 (30 U.S.C. 1201 et seq.).

Sec. 15. SPECIAL STIPULATIONS

See Attachment "A" and Appendix A.
THE UNITED STATES OF AMERICA

[Signature and Name]

(Company or Lessee Name)

(Signature of Lessee)

(President)

(Title)

2/02/07

(Date)

By

[Signature and Name]

Chief, Branch of Solid Minerals

(BLM)

(Title)

2/13/07

(Date)

Title 18 U.S.C. Section 1001, makes it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

NOTICES

The Privacy Act of 1974 and the regulation in 43 CFR 2.48(d) provide that you be furnished with the following information in connection with information required by this application.


PRINCIPAL PURPOSE: BLM will use the information you provide to process your application and determine if you are eligible to hold a lease on BLM land.

ROUTINE USES: BLM will only disclose the information according to the regulations at 43 CFR 2.56(d).

EFFECT OF NOT PROVIDING INFORMATION: Disclosing the information is necessary to receive a benefit. Not disclosing the information may result in BLM's rejecting your request for a lease.

The Paperwork Reduction Act of 1995 requires us to inform you that:

The BLM collects this information to authorize and evaluate proposed exploration and mining operations on public lands.

Response to the provisions of this lease form is mandatory for the types of activities specified.

The BLM would like you to know that you do not have to respond to this or any other Federal agency-sponsored information collection unless it displays a currently valid OMB control number.

BURDEN HOURS STATEMENT: Public reporting burden for this form is estimated to average one hour per response including the time for reading the instructions and provisions, and completing and reviewing the form. Direct comments regarding the burden estimate or any other aspect of this form to U.S. Department of the Interior, Bureau of Land Management (1004-0073), Bureau Information Collection Clearance Officer (WO-630), 1849 C Street, Mail Stop 401 LS, Washington, D.C. 20240.
Stipulations Applicable To the Bureau of Land Management Lands:

**Sec. 15. (a) Cultural Resources.** (1) Before beginning any surface disturbing activities on the leased lands, lessee shall conduct a cultural resource intensive field inventory on those portions of the mine plan area and adjacent areas, or exploration plan area, which may be adversely affected by lease-related activities and which were not previously inventoried at such a level of intensity. The inventory shall be conducted by a qualified professional cultural resource specialist (i.e., archaeologist or historian, as appropriate) approved by the authorized officer of the Bureau of Land Management (BLM) and shall be conducted in the manner that the authorized officer specifies.

(2) Lessee shall submit an inventory report, including recommendations for protecting any significant cultural resources, to the Regional Director, Western Regional Coordinating Center, Office of Surface Mining Reclamation & Enforcement (OSMRE), and the BLM authorized officer. Lessee shall not begin surface disturbing activities until permission to proceed is given by the appropriate authorized officer.

(3) Lessee shall protect all known cultural resource properties within the lease area from lease-related activities until cultural resources avoidance or mitigation measures can be implemented as part of an approved exploration plan or an approved mining and exploration plan.

(4) The cost of conducting the inventory, preparing reports, and carrying out mitigation measures shall be borne by the lessee.

(5) If cultural resources are discovered during operations under the lease, lessee shall immediately notify the authorized officer of the BLM or OSMRE. Lessee shall not disturb such discovered resources except as subsequently authorized. Within two (2) working days of notification, the authorized officer will evaluate, or have evaluated, any cultural resources discovered and will determine if any action may be required to protect or preserve such discoveries. Cost of data recovery for cultural resources discovered during lease operations shall be borne by the surface managing agency unless otherwise specified by the BLM authorized officer.

(6) All cultural resources discovered shall remain under the jurisdiction of the United States until ownership is determined under applicable law.

**(b) Paleontological Resources.** (1) Before beginning surface disturbing activities on the leased lands, lessee shall contact the BLM authorized officer to determine whether lessee will be required to conduct a paleontological appraisal of lease areas that may be adversely affected by lease-related activities. Any paleontological appraisal required shall be conducted by a qualified paleontologist approved by the BLM authorized officer and in the manner the authorized officer specifies.

(2) Lessee shall submit an appraisal report, including recommendations for protecting any larger and more conspicuous fossils of significant scientific interest identified on the leased lands to the BLM authorized officer.

(3) If any such fossils are discovered during operations under this lease, lessee shall immediately notify the Regional Director, OSMRE. Operations may continue as long as the fossil specimen(s) would not be seriously damaged or destroyed by the activity. Within five (5) working days of notification, the
Regional Director, OSMRE, shall evaluate or have evaluated such discoveries and shall notify the lessee what action shall be taken with respect to such discoveries.

(4) Lessee shall not knowingly disturb, alter, destroy, or take any larger and more conspicuous fossils of significant scientific interest and shall protect all such fossils in conformance with the measures included in the approved mining and reclamation plan or exploration plan.

(5) These conditions apply to all such fossils of significant scientific interest discovered within the leased lands, whether discovered in the overburden, interburden, or coal seam or seams.

(6) All fossils of significant scientific interest shall remain under the jurisdiction of the United States until ownership is determined under applicable law.

(7) The cost of any required recovery of such fossils shall be borne by the United States. Copies of all paleontological resource data shall be provided to the Regional Director, OSMRE.

(c) Resource Recovery and Protection. (1) Notwithstanding the approval of a resource recovery and protection plan (R2P2) by the BLM, lessor reserves the right to seek damages against the operator/lessee in the event (i) the operator/lessee fails to achieve maximum economic recovery (MER) (as defined at 43 CFR 3480.0-5(21) of the recoverable coal reserves or (ii) the operator/lessee is determined to have caused a wasting of recoverable coal reserves. Damages shall be measured on the basis of the royalty that would have been payable on the wasted or unrecovered coal.

(2) The parties recognize that under an approved R2P2, conditions may require a modification by the operator/lessee of that plan. In the event a coalbed or portion thereof is not to be mined or is rendered unmineable by the operation, the operator/lessee shall submit appropriate justification to obtain approval by the AO to leave such reserves unmined. Upon approval by the AO, such coalbeds or portions thereof shall not be subject to damages as described above. Further, nothing in this section shall prevent the operator/lessee from exercising its right to relinquish all or portion of the lease as authorized by statute and regulation.

(3) In the event the AO determines that the R2P2, as approved, will not attain MER as the result of changed conditions, the AO will give proper notice to the operator/lessee as required under applicable regulations. The AO will order a modification, if necessary, identifying additional reserves to be mined in order to attain MER. Upon a final administrative or judicial ruling upholding such an ordered modification, any reserves left unmined (wasted) under that plan will be subject to damages as described in the first paragraph under this section.

(4) Subject to the right to appeal hereinafter set forth, payment of the value of the royalty on such unmined recoverable coal reserves shall become due and payable upon determination by the AO that the coal reserves have been rendered unmineable or at such time that the operator/lessee has demonstrated an unwillingness to extract the coal.

(5) The BLM may enforce this provision either by issuing a written decision requiring payment of the MMS demand for such royalties, or by issuing a notice of non-compliance. A decision or notice of non-compliance issued by the lessor that payment is due under this stipulation is appealable as allowed by law.

(d) Threatened and Endangered Species. If there is reason to believe that Threatened or Endangered, or Sensitive (TES) species of plants or animals, or migratory bird species of high Federal interest occur in the area, the lessee shall be required to conduct an intensive field inventory of the area to be disturbed and/or impacted. The inventory shall be conducted by a qualified specialist and a report of findings will be
prepared. A plan will be prepared making recommendations for the protection of these species or action necessary to mitigate the disturbance. The cost of conducting the inventory, preparing reports and carrying out mitigating measures shall be borne by the lessee.

(e) **Wildlife. (1) Raptors.** (1) With respect to Bald Eagle winter concentration areas:

   a) No surface activities, except subsidence, may occur within the bald eagle winter concentration area between the dates of December 1 through April 15. Any proposed activities in the bald eagle concentration area, during the closed period, must be approved by the authorized officer, after consultation with the U.S. Fish and Wildlife Service (USFWS).

(2) With respect to water depletions and impacts on endangered fish and critical habitat:

   a) In the future, if water to be used for mine related activities is to be taken from a source that is not considered to be non-tributary waters by the USFWS or which exceeds a depletion amount previously consulted upon, the permitting agency must enter into consultation with the USFWS to determine appropriate conservation measures to offset effects to listed fish and critical habitat in the upper Colorado River Basin.

(3) With respect to bald or golden eagle nests which may be established on the review area during the life of the project, the following special stipulations shall be applied:

   a) No new permanent surface facilities or disturbances, except subsidence, shall be located within a ¼ mile radius buffer zone around each bald or golden eagle nest site.

   b) No surface ground activities will be allowed within a 1/2 mile radius buffer zone around each bald eagle active nest site from November 15 to July 30, and around each active golden eagle nest site from February 1 to July 15.

   c) Any proposed surface facilities, disturbances or activities (as noted above) in, or adjacent to, these buffer zones will require approval from the Bureau of Land Management (BLM) or U.S. Forest Service (USFS) on a site-specific basis, after consultation with the USFWS.

(4) With respect to bald or golden eagle roost sites or concentration areas which may be established on the review area during the life of the project, the following special stipulations shall be applied:

   a) No surface ground activity, except subsidence, shall occur within a 1/4 mile radius of winter roosts between November 15 and March 15, development may be permitted at other periods. If periodic visits are required within the buffer zone after development, activity should be restricted to the hours of 10 am and 2 pm from November 15 through March 15.

   b) No surface activities, except subsidence, may occur within the bald eagle winter concentration area between the dates of December 1 through April 15. Any proposed activities in the bald eagle concentration area during the closed period must be approved by the authorized officer, after consultation with the USFWS.

(5) With respect to other raptors (except American Kestrel) which may occur or become established on the West Flatiron Tract during the life of the project, the following special stipulation shall apply:
a) Conduct surveys for nesting raptors on the lease tract prior to development of any surface facilities. No surface activities will be allowed within 1/2 mile radius of active nest sites between the dates of February 1 and August 15, unless authorized by BLM or USFS on a site specific basis.

(e)(2) **Big Game Winter Range.** If areas are determined by the Colorado Division of Wildlife (CDOW) to be mule deer and elk crucial winter range, the following stipulation shall be applied:

a) Coal related facilities and surface disturbance, except subsidence, will be authorized in the review area only if no practical alternatives exist. The BLM and USFS will coordinate with the CDOW to determine the type and extent of allowable variances. Coal exploration, facility construction, and major-scheduled maintenance will not be authorized within crucial winter ranges from December 1 through April 30. All unavoidable surface disturbances within the crucial winter ranges during these times will require approval of the BLM and USFS authorized officer.

(f) **Riparian Zones.** Riparian zones are present within the review area and are suitable for coal leasing only with inclusion of the following special stipulations to protect resident and migratory bird species:

a) A 1/8 mile buffer zone (660 ft.) will be protected on either side of Raven Gulch (or a buffer zone may be established in accordance with the surface management agency guidelines). No surface disturbances, except surface subsidence, will be permitted within these buffer zones unless no practical alternatives exist. All unavoidable surface disturbances will require approval of the USFS or BLM authorized officer. The BLM or USFS will coordinate with the USFWS and CDOW to determine the type and extent of allowable variances. A site specific analysis will determine if this stipulation will apply.

(g) **Subsidence.** (1) Except at specifically approved locations, mining that would cause subsidence will not be allowed under Raven Creek or within a buffer zone defined by projecting a 25 degree angle of draw (from vertical) from the surface expression of the creek down to the top of the coal seam to be mined.

(2) If subsidence activates a landslide, which adversely affects surface resources, or a documented water loss, the operator/lessee shall (where applicable): restore stream channels and surface drainage or protect stream flow with earthwork or temporary culverts; or re-vegetate, as necessary, to protect against erosion; or provide other mitigation (which could include water replacement).

(h) **Topography.** (1) The operator/lessee shall secure adequate baseline data to quantify the existing surface resources on and adjacent to the lease area. Existing data may be used if such data is adequate for the intended purposes. The study shall be adequate to locate, quantify, and demonstrate the inter-relationship of the topography, geology, surface hydrology, vegetation and wildlife. Baseline data will be established so that future programs of observation can be incorporated at regular intervals for comparison.

(2) The operator/lessee shall establish a monitoring system to quantify the progressive and final effects of underground mining activities on the topographic surface, underground and surface hydrology, and vegetation. The monitoring system shall utilize techniques that will provide a continuing record of change over time. The monitoring shall incorporate and be an extension of the baseline data.

(3) No surface occupancy or use would be allowed on LBA tract lands defined as wetlands by the U.S. Army Corp of Engineers regulations and guidelines.

**Stipulations Applicable To the U.S. Forest Service Lands:**

(i) **Standard Stipulation for the Department of Agriculture Lands.** Attached to and made a part of the coal lease.
(j) Big Game Winter Range. Surface use (including monitoring activities), should be scheduled to minimize adverse impacts on elk from December 1 to April 30. Unscheduled use may be allowed in emergency situations with notice and coordination with the Forest Service.

(k) Topography. (1) The operator/lessee shall secure adequate baseline data to quantify the existing surface resources on and adjacent to the lease area. Existing data may be used if such data is adequate for the intended purposes. The study shall be adequate to locate, quantify, and demonstrate the inter-relationship of the topography, geology, surface hydrology, vegetation and wildlife. Baseline data will be established so that future programs of observation can be incorporated at regular intervals for comparison.

(2) The operator/lessee shall establish a monitoring system to quantify the progressive and final effects of underground mining activities on the topographic surface, underground and surface hydrology, and vegetation. The monitoring system shall utilize techniques that will provide a continuing record of change over time. The monitoring shall incorporate and be an extension of the baseline data.

(3) Exploration, drilling and other development activity would not be allowed on NFS lands in the LBA tract during the period from December 1 to April 30. In the event of an emergency, surface use (including drilling) may be allowed with authorization from the Forest Service.

(4) No surface occupancy or use would be allowed on the LBA tract where slopes are greater than 60 percent.

(5) Surface occupancy or use would be controlled on lease tract slopes between 40 and 60 percent. Before any such occupancy or use on lands with such slopes, a special interdisciplinary team (IDT) analysis and mitigation plan detailing construction and mitigation techniques would be required. The IDT could include specialists such as a soil scientist, hydrologist, landscape architect, reclamation, and a mining engineer.

(6) No surface occupancy or use would be allowed on LBA tract lands defined as wetlands by the U.S. Army Corp of Engineers regulations and guidelines.

(7) No surface occupancy would be allowed in areas of high geologic hazard.

(l) Subsidence. (1) Except at locations specifically approved by the FS Responsible Official, mining that would cause subsidence will not be allowed under Raven Creek or within a buffer zone defined by projecting a 25 degree angle of draw (from vertical) from the surface expression of the creek down to the top of the coal seam to be mined.

(2) If subsidence activates a landslide, which adversely affects surface resources, or a documented water loss, the operator/lessee shall (where applicable): restore stream channels and surface drainage or protect stream flow with earthwork or temporary culverts; or revegetate, as necessary, to protect against erosion; or provide other mitigation (which could include water replacement).

(m) Riparian Zones. No surface disturbances will be permitted within a 1/8 mile buffer zone (660 ft.) on either side of the riparian zones of Raven Gulch (or a different buffer zone may be established in accordance with the surface management agency guidelines). Any surface disturbance will require approval of the USFS or BLM responsible official. The USFS will coordinate with the USFWS and CDOW to determine the type and extent of allowable variances. A site-specific analysis will determine if this stipulation applies.
APPENDIX A

Standard Notice and Coal Lease Stipulations for
National Forest System Lands
Dry Fork Federal Coal Lease
COC-67232

NOTICE FOR LANDS OF THE NATIONAL FOREST SYSTEM UNDER JURISDICTION OF DEPARTMENT OF AGRICULTURE (R2-FS-2828-13(92))

The permittee/lessee must comply with all the rules and regulations of the Secretary of Agriculture set forth at Title 36, Chapter II, of the Code of Federal Regulations governing the use and management of the National Forest System (NFS) when not inconsistent with the rights granted by the Secretary of Interior in the permit. The Secretary of Agriculture's rules and regulations must be complied with for (1) all use and occupancy of the NFS prior to approval of an exploration plan by the Secretary of the Interior, (2) uses of all existing improvements, such as forest development roads, within and outside the area permitted by the Secretary of the Interior, and (3) use and occupancy of the NFS not authorized by the permit/operation approved by the Secretary of the Interior.

All matters related to this stipulation are to be addressed to:

Forest Supervisor
Grand Mesa, Uncompahgre, and Gunnison National Forests
2250 Highway 50
Delta, CO 81416
970-874-6600

who is the authorized representative of the Secretary of Agriculture.

NOTICE

CULTURAL AND PALEONTOLOGICAL RESOURCES - The FS is responsible for assuring that the leased lands are examined to determine if cultural resources are present and to specify mitigation measures. Prior to undertaking any surface-disturbing activities on the lands covered by this lease, the lessee or operator, unless notified to the contrary by the FS, shall:

1. Contact the FS to determine if a site specific cultural resource inventory is required. If a survey is required then:

2. Engage the services of a cultural resource specialist acceptable to the FS to conduct a cultural resource inventory of the area of proposed surface disturbance. The operator may elect to inventory an area larger than the area of proposed disturbance to cover possible site relocation which may result from environmental or other considerations. An
acceptable inventory report is to be submitted to the FS for review and approval at the time a surface disturbing plan of operation is submitted.

3. Implement mitigation measures required by the FS and BLM to preserve or avoid destruction of cultural resource values. Mitigation may include relocation of proposed facilities, testing, salvage, and recordation or other protective measures. All costs of the inventory and mitigation will be borne by the lessee or operator, and all data and materials salvaged will remain under the jurisdiction of the U.S. Government as appropriate.

The lessee or operator shall immediately bring to the attention of the FS and BLM any cultural or paleontological resources or any other objects of scientific interest discovered as a result of surface operations under this license, and shall leave such discoveries intact until directed to proceed by FS and BLM.

ENDANGERED OR THREATENED SPECIES - The FS is responsible for assuring that the leased land is examined prior to undertaking any surface-disturbing activities to determine effects upon any plant or animal species listed or proposed for listing as endangered or threatened, or their habitats. The findings of this examination may result in some restrictions to the operator's plans or even disallow use and occupancy that would be in violation of the Endangered Species Act of 1973 by detrimentally affecting endangered or threatened species or their habitats.

The lessee/operator may, unless notified by the FS that the examination is not necessary, conduct the examination on the leased lands at his discretion and cost. This examination must be done by, or under the supervision of a qualified resource specialist approved by the FS. An acceptable report must be provided to the FS identifying the anticipated effects of a proposed action on endangered or threatened species or their habitats.

Stipulations:
1. To comply with the Canada Lynx Conservation Assessment and Strategy (Ruediger et al., 2000), the following special constraints will apply if post-lease surface use is proposed in lynx habitat:
   a. Winter access will be limited to designated routes.

Further, should post-lease operations be proposed on the lease in lynx habitat, the following special constraints may apply, depending on site-specific circumstances:

a. Remote monitoring of the development sites and facilities may be required to reduce snow compaction.

b. A reclamation plan (e.g. road reclamation and vegetation rehabilitation) for sites and facilities that promotes the restoration of lynx habitat may be required.

c. Public motorized use on new roads constructed for project-specific purposes will be restricted.

d. Access roads will be designed to provide for effective closures and will be reclaimed or decommissioned at project completion if they are no longer needed for other management objectives.
e. New permanent roads will not be built on ridge tops or in saddles, or in areas identified as important for lynx habitat connectivity. New roads will be situated away from forested stringers.

2. If post lease surface use occurs in lynx habitat, the Lessee will be required to submit an annual report to the USDA-FS and USFWS of all activities having occurred in lynx habitat.

3. If there is reason to believe that Sensitive, Threatened or Endangered species of plants or animals, or migratory bird species of high Federal interest are present, or become present in the lease area, the Lessee/Operator shall be required to conduct an intensive field inventory of the area to be disturbed and/or impacted. The inventory shall be conducted by a qualified specialist, and a report of findings prepared. A plan will be made that recommends protection for these species or action necessary to mitigate the disturbance. The cost of conducting such inventory, preparing reports and carrying out mitigation measures shall be borne by the Lessee/Operator.

4. Surface use or disturbances (except for surface subsidence and resource monitoring purposes defined in the approved mining permit) will not be permitted in riparian, wetland or floodplain areas, or within a buffer zone surrounding these areas (the definition of riparian areas and appropriate buffer zone will be consistent with that defined in the Forest Service Manual and Water Conservation Practices Handbook. Wetland definition will follow Army Corps of Engineers guidelines) unless no practical alternatives exist.

5. For raptors (except American kestrel) the Lessee will be required to:
   a. Conduct surveys for nesting raptors on the lease prior to development of any surface facilities; and
   b. No surface activities will be allowed within ½-mile radius of active nest sites between the dates of February 1 and August 15, unless authorized by the Forest Service on a site-specific basis.

6. In order to protect big game wintering areas, elk calving areas, and other key wildlife habitat and/or activities, specific surface use may be curtailed during specific times of year. Specific time restrictions for specific species will be evaluated by the Forest Service at the individual project stage, and any additional site specific conditions of use developed at that time.

7. In the future, if water to be used for mine related activities is taken from a source that is not considered to be non-tributary waters by the U.S. Fish and Wildlife Service, or which exceeds a depletion amount previously consulted upon, the permitting agency must enter into consultation with the U.S. Fish and Wildlife Service to determine appropriate conservation measures to offset effects to listed fish and critical habitat in the upper Colorado River Basin.

8. No surface occupancy would be allowed in areas of high geologic hazard or high erosion potential.

9. Special interdisciplinary team analysis and mitigation plans detailing construction and mitigation techniques would be required on areas where slopes range from 40-60 percent. The interdisciplinary team could include engineers, soil scientist, hydrologist, landscape architect, reclamation specialist and mining engineer.
10. The operator/lessee of the LBA tract would be required to perform adequate baseline studies to quantify existing surface and subsurface resources. Existing data can be used for baseline analyses provided that the data is adequate to locate, quantify, and demonstrate interrelationships between geology, topography, hydrogeology, and hydrology. Baseline studies are critical to the success of future observation and assessment of mining related effects on resources in the Dry Fork LBA tract.

11. The operator/lessee of the LBA tract would be required to establish or amend a monitoring program to be used as a continuing record of change over time of area resources in order to assess mining induced impacts. The monitoring program shall provide the procedures and methodologies to adequately assess interrelationships between geology, topography, hydrogeology, and hydrology identified in the baseline assessment to mining activities in the LBA tract area. The monitoring program shall incorporate baseline data so as to provide a continuing record over time.

12. If surface disturbance is proposed on the lease, the lessee/operators will be required to conduct breeding bird surveys prior to surface disturbance.

13. If subsidence adversely affects surface resources in any way (including, but not limited to a documented water loss), the Lessee, at their expense will be responsible to: restore stream channels, stock ponds, protect stream flow with earthwork or temporary culverts, restore affected roads, or provide other measures to repair damage or replace any surface water and/or developed ground water source, stock pond, water conveyance facilities, with water from an alternate source in sufficient quantity and quality to maintain existing riparian habitat, livestock and wildlife use, or other land uses as authorized by 36 CFR 251.

14. The Lessee/Operator shall be required to perform the following with respect to monitoring, repairing and/or mitigating subsidence effects on existing facilities under Special Use Permit with the Forest Service. Monitoring, repair and/or mitigation will be performed at the Lessee’s expense. The Lessee may request variations on timing for surveys, monitoring and reporting. Approving such requests would be at the discretion of the District Ranger.

   a. Baseline condition surveys of existing facilities will be completed the Fall following award of lease. Reports of this survey will be deliverable to the Forest Service by December 1 of that same year.

   b. In consultation with the Special Use Permittee and the Forest Service, install equipment to monitor flow on water conveyance facilities during the Fall following award of lease. Flow monitoring shall commence the following spring and continue until one year post mining. Flow data shall be provided to the Forest Service annually by December 1.

   c. A Surface Facility Monitoring and Mitigation Plan (Plan) will be submitted to the Forest Service for review and approval not later than 12 months prior to scheduled undermining. The Plan will detail measures to be taken to monitor, repair and mitigate subsidence effects of the facilities during actual mining and for one year post mining.
Lease Notice
Dry Fork Federal Coal Lease
COC-67232

All or parts of the following lands encompassed in this lease are in the West Elk Inventoried Roadless Area and may be subject to restrictions on road-building pursuant to rules and regulations of the Secretary of Agriculture applicable at the time any roads may be proposed on the lease.

T 13 S, R 90 W, 6th PM:

S2SENW; S2N2S2SWNW; E2NWSW; 2W2SESW; E2SESW; NESW; SE Section 35.

W2SWNW; W2SW Section 36

T 14 S, R 90 W, 6th PM

SWSWNE; NW; N2SW; W2NWSE; N2SWSE Section 1

NENE; E2NWNE; N2SENE; SESENE Section 2

S2NWNNW Section 11

Legal descriptions are approximate. Locations of any proposed surface use would be verified for relationship to IRA boundaries using site-specific maps if/when surface operations are proposed.