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DIVISION OF OIL, GAS AND MINING

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January 9, 2002

TO: Internal File
THRU: Gregg A. Galecki Reclamation Specialist/Hydrologist & Team Lead *AG*
FROM: Wayne H. Western Senior Reclamation Specialist/Engineering *WHW*
RE: Whitmore Canyon Extension, West Ridge Resources Inc. West Ridge Mine, C/007/041-PM01H

SUMMARY:

TECHNICAL ANALYSIS:

ENVIRONMENTAL RESOURCE INFORMATION

PERMIT AREA

Regulatory Requirements: 30 CFR 783.12; R645-301-521.

Analysis:

The Permittee will add lease UTU 78562 that contains 1646.34 acres, also known as the Whitmore lease. A legal description of the lease is given in Table I-1.

Findings:

The Permittee as met the minimum requirements of this section of the regulations.

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MAPS, PLANS, AND CROSS SECTIONS OF RESOURCE INFORMATION

Regulatory Reference: 30 CFR 783.24, 783.25; R645-301-323, -301-411, -301-521, -301-622, -301-722, -301-731.

Analysis:

Affected Area Boundary Maps

The Permittee gave the Division several maps that show the permit boundaries for the West Ridge mine including the Map 1-1 Location Map. Map 5-4A, Mining Projections shows the outline of the proposed areas to be mined. Many of the proposed areas are outside the permit boundaries. Therefore, the Permittee will have to revise Map 5-4A.

Map 5-4B, Mining Projections (Extended Reserves), show the mine layout if additional lease are acquired.

Existing Structures and Facilities Maps

No surface or subsurface features, such as buildings, transmission lines, pipelines exist in or near the proposed permit area. The Carbon County Road RS2477 that provided access to the top of West Ridge is located with the Whitmore lease. Several other dirt roads are located in the permit area, including a road in the Left Fork of Whitmore Canyon.

On Map 1-1, Location Map, the Permittee shows that part of the Grassy Trails reservoir is located within the permit area. The Permittee does not list that structure in Section 521.120. The Permittee needs to revise Section 521.120 to state that part of the Grassy Trail reservoir is located within the proposed permit area.

The regulations state that all existing structures will be shown on a map. The surface facilities map does not show the Grassy Trails reservoir nor is it mention in the text. Therefore, the Permittee must mention the reservoir in the text of the MRP.

Existing Surface Configuration Maps

Several maps show the existing surface configuration of the Whitmore lease, such as Map 1-1. That map is at a scale of 1-inch equals 2000 feet and has a contour interval of 40 feet.

Mine Workings Maps

The existing and proposed mine workings for the West Ridge mine and the Sunnyside mine are shown on Map 5-4A, Mining Projections. The map shows the location of the

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abandoned workings in the Sunnyside mine. The existing mine working and the proposed mine workings up to 2011 are shown.

Permit Area Boundary Maps

The Permittee gave the Division several maps that show the permit boundaries for the West Ridge mine including the Map 1-1 Location Map. Map 5-4A, Mining Projections shows the outline of the proposed permit boundary changes.

Surface and Subsurface Ownership Maps

The surface and subsurface ownership maps are shown on Map 5-2 and Map 5-3 respectively.

Surface and subsurface manmade features maps

A road exists in the Left Fork of Whitmore Canyon and a small part of the Grassy Trail Reservoir is located in the eastern part of the Whitmore lease. No subsurface manmade features in the Whitmore lease area.

Contour Maps

Several maps show the existing contour at or near the Whitmore lease, such as Map 1-1. That map is at a scale of 1-inch equals 2000 feet and has a contour interval of 40 feet.

Findings:

Information provided in the proposed amendment is not considered adequate to meet the requirements of this section. Before approval, the Permittee must provide the following in accordance with:

R645-300-140, The Permittee must revised Map 5-4A Mining Projections and Map 5-4B Mining Projections (Extended Reserves) to show that mining will only occur within the permit area.

R645-300-521.200, The Permittee must include mention of the Grassy Trail Reservoir being located with the permit. The Division recommends that the information be located in Section 521.120.

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OPERATION PLAN

MINING OPERATIONS AND FACILITIES

Regulatory Reference: 30 CFR 784.2, 784.11; R645-301-231, -301-526, -301-528.

Analysis:

General

Type and Method of Mining Operations

Facilities and Structures

Findings:

EXISTING STRUCTURES:

Regulatory Reference: 30 CFR 784.12; R645-301-526.

Analysis:

The existing structures at the Whitmore lease include dirt roads and part of the Grassy Trail reservoir. Those structures are shown on several maps including Map 1-1, Location Map.

Findings:

The Permittee has met the minimum regulatory requirements of this section.

RELOCATION OR USE OF PUBLIC ROADS

Regulatory Reference: 30 CFR 784.18; R645-301-521, -301-526.

Analysis:

No additional public roads will be use or relocated in connection with the Whitmore lease.

Findings:

The Permittee has met the minimum regulatory requirements of this section.

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COAL RECOVERY

Regulatory Reference: 30 CFR 817.59; R645-301-522.

Analysis:

The Permittee submitted a resource recovery and protection plan to the BLM. The R2P2 outlined how the Permittee would maximize coal recovery. The BLM has staff members who are specifically trained in evaluating coal recovery programs. The Division relies on the expertise of the BLM in evaluating coal recovery programs.

The Division reviewed the coal recovery program and found that the panel layout and mining methods will maximize coal recovery. The Permittee will use longwall mine ~~were~~ ^{is} ~~where~~ ^{here} feasible. Coal recovery is dependent on several factors including depth of cover and coal quality and thickness. Since those factors cannot be determined before mining the recovery plan will be adjusted as more information is obtained.

Findings:

The Permittee has met the minimum regulatory requirements of this section.

SUBSIDENCE CONTROL PLAN

Regulatory Reference: 30 CFR 784.20, 817.121, 817.122; R645-301-521, -301-525, -301-724.

Analysis:

Renewable Resources Survey

The Permittee did not state if the original renewable resource survey included the entire Whitmore lease. If a renewable resource survey was not conducted then the Permittee must do so. If the renewable resource survey includes the Whitmore lease, then the survey results must be included in the MRP.

Subsidence control Plan

In Section 525.200, Subsidence Control, the Permittee make contradicting statements. The Permittee states that no impoundment of 20 acre-feet of more capacity exists in the permittee boundary but Map 1-1 clearly shows that part of the Grassy Trail reservoir is within the permit boundaries.

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In Section 525.200, Subsidence Control, the Permittee states that as longwall mining approaches Grassy Trail Reservoir that ongoing subsidence monitoring information will be used to determine the angle of draw and the subsidence ratio in the area. Based on this information the underground workings will be designed to ensure that the reservoir is not adversely affected by mining activities. However, the Permittee does not state what criteria will be used to prevent subsidence damage to the reservoir. The Permittee must give that information in the MRP.

Map 5-7, Subsidence Map, shows where subsidence will occur. The map shows that subsidence and mining will take place outside the permit boundary. The Permittee must confine all mining activities including subsidence to the permit boundaries.

Map 5-4A and Map 5-4B show the location of each longwall panel and the estimate dates when mining will occur. Those maps can be overlaid on Map 5-7 so that the approximate dates of subsidence can be determined.

Performance Standards for Subsidence control

The Permittee agrees to meet all performance standards.

Notification

The Permittee will meet the notification standards.

Findings:

Information provided in the proposed amendment is not considered adequate to meet the requirements of this section. Before approval, the Permittee must provide the following in accordance with:

R645-300-521.100, The Permittee must state the results of the pre-subsidence survey for the Whitmore lease. If the Whitmore lease pre-subsidence survey was included in the original sub-subsidence survey then the Permittee needs to state that specifically in the MRP.

R645-300-121.200, The Permittee must clarify states in Section 525.200, Subsidence Control about the existence of a 20 acre-feet or greater capacity reservoir within the permit boundary. The Grassy Trail reservoir stores more than 20 acre-feet.

R645-300-525.450 and R645-301-535.311, The Permittee must state what criteria will be used to determine what measures will be taken to prevent subsidence damage from the Grassy Trail reservoir.

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R645-300-140, The Permittee must revised Map 5-4A Mining Projections, Map 5-4B Mining Projections (Extended Reserves) and Map 5-7, Subsidence Map, to show that mining and subsidence will only occur within the permit area.

SLIDES AND OTHER DAMAGE

Regulatory Reference: 30 CFR Sec. 817.99; R645-301-515.

Analysis:

The Permittee does not need to update this section for the Whitmore Lease.

Findings:

The Permittee met the minimum requirements for this section.

ROAD SYSTEMS AND OTHER TRANSPORTATION FACILITIES

Regulatory Reference: 30 CFR Sec. 784.24, 817.150, 817.151; R645-301-521, -301-527, -301-534, -301-732.

Analysis:

No additional roads will be built or modified as a result of the Whitmore Lease.

Findings:

The Permittee met the minimum requirements for this section.

SPOIL AND WASTE MATERIALS

Regulatory Reference: 30 CFR Sec. 701.5, 784.19, 784.25, 817.71, 817.72, 817.73, 817.74, 817.81, 817.83, 817.84, 817.87, 817.89; R645-100-200, -301-210, -301-211, -301-212, -301-412, -301-512, -301-513, -301-514, -301-521, -301-526, -301-528, -301-535, -301-536, -301-542, -301-553, -301-745, -301-746, -301-747.

Analysis:

No changes to the spoil or waste material-handling program because of the addition to the Whitmore Lease.

Findings:

The Permittee met the minimum requirements for this section.

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SUPPORT FACILITIES AND UTILITY INSTALLATIONS

Regulatory Reference: 30 CFR Sec. 784.30, 817.180, 817.181; R645-301-526.

Analysis:

No additional support facilities will be used in connection with the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

SIGNS AND MARKERS

Regulatory Reference: 30 CFR Sec. 817.11; R645-301-521.

Analysis:

No additional signs or markers will need to be placed as a result of the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

USE OF EXPLOSIVES

Regulatory Reference: 30 CFR Sec. 817.61, 817.62, 817.64, 817.66, 817.67, 817.68; R645-301-524.

Analysis:

No surface blasting will occur as a result of the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

MAPS, PLANS, AND CROSS SECTIONS OF MINING OPERATIONS

Regulatory Reference: 30 CFR Sec. 784.23; R645-301-512, -301-521, -301-542, -301-632, -301-731, -302-323.

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Analysis:

Affected area maps

The affected area is considered by the Division to be the same as the permit boundary. The permit boundary is shown on several maps including Map 1-1.

Mining facilities maps

The surface mine facilities maps will not change as a result of the Whitmore lease.

Mine workings maps

Map 5-4A and Map 5-4B show the existing and proposed mine workings for the Whitmore lease and possible additional leases.

Monitoring and sample location maps

Findings:

The Permittee met the minimum requirements for this section.

RECLAMATION PLAN

APPROXIMATE ORIGINAL CONTOUR RESTORATION

Regulatory Reference: 30 CFR Sec. 784.15, 785.16, 817.102, 817.107, 817.133; R645-301-234, -301-270, -301-271, -301-412, -301-413, -301-512, -301-531, -301-533, -301-553, -301-536, -301-542, -301-731, -301-732, -301-733, -301-764.

Analysis:

Since no additional surface area will be disturbed this section is not applicable to the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

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BACKFILLING AND GRADING

Regulatory Reference: 30 CFR Sec. 785.15, 817.102, 817.107; R645-301-234, -301-537, -301-552, -301-553, -302-230, -302-231, -302-232, -302-233.

Analysis:

Since no additional surface area will be disturbed this section is not applicable to the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

MINE OPENINGS

Regulatory Reference: 30 CFR Sec. 817.13, 817.14, 817.15; R645-301-513, -301-529, -301-551, -301-631, -301-748, -301-765, -301-748.

Analysis:

Since no additional mine openings will be created this section is not applicable to the Whitmore lease.

Findings:

The Permittee met the minimum requirements for this section.

ROAD SYSTEMS AND OTHER TRANSPORTATION FACILITIES

Regulatory Reference: 30 CFR Sec. 701.5, 784.24, 817.150, 817.151; R645-100-200, -301-513, -301-521, -301-527, -301-534, -301-537, -301-732.

Analysis:

Since no additional roads will be built or changes to their reclamation plans will occur because of the Whitmore lease this section is not applicable.

Findings:

The Permittee met the minimum requirements for this section.

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MAPS, PLANS, AND CROSS SECTIONS OF RECLAMATION OPERATIONS

Regulatory Reference: 30 CFR Sec. 784.23; R645-301-323, -301-512, -301-521, -301-542, -301-632, -301-731.

Analysis:

Affected area boundary maps

The affected area is considered by the Division to be the same as the permit boundary. The permit boundary is shown on several maps including Map 1-1.

Bonded area map

The bonded area is the same as the surface disturbance area. No changes to the disturbed surface area will occur because of the Whitmore lease.

Reclamation backfilling and grading maps

No changes to the backfilling or grading plan will occur because of the Whitmore lease.

Reclamation facilities maps

No changes to reclamation of surface facilities will occur because of the Whitmore lease.

Final surface configuration maps

No changes to the disturbed surface will occur because of the Whitmore lease.

Reclamation surface and subsurface manmade features maps

No changes to the reclamation of the surface or subsurface manmade features will occur because of the Whitmore lease.

Findings:

The Permittee met the minimum requirements of this section of the regulations.

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BONDING AND INSURANCE REQUIREMENTS

Regulatory Reference: 30 CFR Sec. 800; R645-301-800, et seq.

Analysis:

Determination of bond amount

Since no new surface facilities will be built as a result of the addition of the Whitmore lease the bond amount will not change for the Whitmore lease addition.

Findings:

The Permittee met the minimum requirements of this section of the regulations.

RECCOMENDATIONS:

The Division should deny the permit modification until the Permittee corrects the above-mentioned deficiencies.

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