

0007



State of Utah  
DEPARTMENT OF NATURAL RESOURCES  
DIVISION OF OIL, GAS AND MINING

Michael O. Leavitt  
Governor  
Ted Stewart  
Executive Director  
Lowell P. Braxton  
Division Director

1594 West North Temple, Suite 1210  
PO Box 145801  
Salt Lake City, Utah 84114-5801  
801-538-5340  
801-359-3940 (Fax)  
801-538-7223 (TDD)

February 12, 1999

TO: File

THROUGH: Daron Haddock, Permit Supervisor

FROM: Paul Baker, Reclamation Biologist

Re: 150-Acre Incidental Boundary Change, Canyon Fuel Company, Convulsion Canyon Mine, ACT/041/002-98-2, Folder #2, Sevier County, Utah

**SUMMARY:**

Canyon Fuel Company is proposing to add 150 acres to its permit area in the vicinity of the Right Fork of Box Canyon. The Forest Service and Bureau of Land Management have reviewed the proposal together with the Pines Tract lease and the proposal to longwall mine under the upper portion of Box Canyon. The Division received the proposal December 7, 1998.

Because no surface disturbance is planned, this review does not address the reclamation regulations.

**ANALYSIS:**

**ADMINISTRATIVE INFORMATION**

**RIGHT OF ENTRY**

Regulatory Reference: R645-301-114

**Analysis:**

Page 1-34 has been modified to show an addition of 150 acres to lease U-63214. It says the lease was modified in November 1998, but a representative of the Bureau of Land Management said in a telephone conversation on December 23, 1998, the lease has not yet been modified. The application needs to contain a description of the documents upon which the applicant bases its legal right to enter and begin coal mining and reclamation operations in the

permit area. This description must identify the documents by type and date of execution, identify the specific lands to which the documents pertain, and explain the legal rights claimed by the applicant.

**Findings:**

Information provided in the proposal is not considered adequate to meet the requirements of this section of the regulations. Prior to final approval, the applicant must provide the following in accordance with:

**R645-301-114,** The application indicates the applicant has received the right to enter and begin mining and reclamation operations in the proposed addition to the permit area. This contradicts verbal information received from the Bureau of Land Management. The applicant needs to show its basis for claiming right of entry and discuss the rights claimed.

## **ENVIRONMENTAL RESOURCE INFORMATION**

### **HISTORIC AND ARCHAEOLOGICAL RESOURCE INFORMATION**

Regulatory Reference: R645-301-411

**Analysis:**

The application includes no new cultural resource information. The amendment to undermine Box Canyon contains cultural resource information for that area but not for the area proposed to be added to the permit area.

The upper portion of Box Canyon contains several significant archaeological sites, and it was anticipated some of these could be adversely affected by subsidence. From the maps submitted, it appears a portion of the area proposed in this submittal to be undermined could contain similar sites. The applicant needs to supply cultural resource information about the area proposed to be added to the permit area.

**Findings:**

Information provided in the application is not considered adequate to meet the requirements of this section of the regulations. Prior to final approval, the applicant must provide the following in accordance with:

**R645-301-411.140**, The application needs to contain historic and archaeological resource information about the area proposed to be added to the permit area.

## **VEGETATION RESOURCE INFORMATION**

Regulatory Reference: R645-301-321

### **Analysis:**

The applicant has updated Plate 3-1 to show vegetation types in the area proposed to be added to the permit area. Most of this area is a sagebrush/grass community with some area of Douglas fir/spruce/ limber pine near Box Canyon.

The greatest potential effects on vegetation would be on riparian areas caused by water depletion, and a monitoring program is needed to show these effects. This is discussed under "Fish, Wildlife, and Vegetation Resource Protection" below.

### **Findings:**

Information provided in the application is considered adequate to meet the requirements of this section of the regulations.

## **FISH AND WILDLIFE RESOURCE INFORMATION**

Regulatory Reference: R645-301-322

### **Analysis:**

#### **Wildlife Information**

Wildlife maps of the permit area, Plates 3-2 and 3-3, have been extended to include the proposed lease addition. There is no new information in the text.

Two golden eagle nests are in the vicinity of the area that would be mined, but it does not appear they could be affected by the mining operations. Also in this area is high priority elk summer range and high priority deer winter range. Neither of these is considered habitat of unusually high value as defined by the regulations.

All riparian areas and water sources are considered critical habitat, and the main potential effects on wildlife would be from water loss. However, no further wildlife information is

required at this time.

### **Threatened or Endangered Species**

The application includes no new information about threatened or endangered species; however, the Pines Tract Draft Environmental Impact Statement discusses listed threatened, endangered, and sensitive species that could occur in the area or could be affected by mining. Of these, those that could be affected are four listed fish species of the Upper Colorado River basin, northern goshawks, spotted bats, northern three-toed woodpeckers, flammulated owls, and the Link Trail columbine. The most likely to be adversely affected is the Link Trail columbine since it grows in seeps and riparian areas.

The application needs to contain further baseline information about species and habitats of special concern. It should discuss or show on maps where these species occur in relation to the proposed mining operations.

### **Findings:**

Information provided in the proposal is not considered adequate to meet the requirements of this section of the regulations. Prior to final approval, the applicant must supply the following in accordance with:

**R645-301-322.200**, The application needs to contain baseline information about species and habitats of special concern, including a discussion or maps showing where these species occur in relation to the proposed mining operations.

## **LAND USE RESOURCE INFORMATION**

Regulatory Reference: R645-301-411

### **Analysis:**

Plate 4-1 is a land use map, and it has been updated to show land uses in the area of the proposed addition. The land is used for grazing and nearby areas are used for limited timbering and grazing. Considering the nature of the proposed mining activities, the information provided is considered adequate.

### **Findings:**

Information provided in the proposal is considered adequate to meet the requirements of

this section of the regulations.

## **OPERATION PLAN**

### **PROTECTION OF PUBLIC PARKS AND HISTORIC PLACES**

Regulatory Reference: R645-301-411.140

#### **Analysis:**

Because the application includes no information about cultural resources in the area, it is impossible to make a recommendation on whether there would be adverse effects.

#### **Findings:**

Information provided in the proposal is not considered adequate to meet the requirements of this section of the regulations. Prior to final approval, the applicant must supply the following in accordance with:

**R645-301-411.140**, The applicant needs to supply cultural resources information before the Division can make a recommendation to the State Historic Preservation Office whether there will be adverse effects.

### **FISH, WILDLIFE AND VEGETATION RESOURCE PROTECTION**

Regulatory Reference: R645-301-330

#### **Analysis:**

There are no changes to this section of the plan. Direct adverse effects to wildlife are highly unlikely since no surface disturbance is proposed and there are no raptor nests above the proposed addition to the permit area. The most likely effect would be a disruption of water supply to the creek in Box Canyon. The Environmental Impact State for the Pines Canyon Tract indicates the Link Trail columbine, a sensitive species is likely to be adversely affected. Although the application contains a discussion on potential effects to the hydrologic balance, it needs to also discuss how this could affect the Link Trail columbine and other species, particularly those that depend on the riparian area or water resources.

The proposal to longwall mine under Box Canyon includes studies of the hydrology and riparian vegetation of the Box Canyon area and analyses of potential effects of mining the area.

It is possible there will be some interception of ground and surface water flows, but the exact effects are not known. According to the Mayo and Associates report, any disruption will probably be temporary, and inflow from springs on the sides of the canyon should provide at least some water downstream.

The applicant currently has a plan for monitoring the effects of subsidence on vegetation through taking color infrared photos every five years. This is not adequate for monitoring the riparian vegetation in Box Canyon. All riparian areas are considered critical wildlife habitat, and Box Canyon is unique among stream corridors in the vicinity.

The applicant needs to establish a quantitative vegetation monitoring program that will be adequately sensitive to detect changes in vegetative cover and species composition. Baseline sampling should be done before the area is mined with subsequent sampling done for at least two years after mining. Best results would be obtained by establishing photopoints and permanent transects that could be checked each time. This requirement is being made after consultation with other agencies, and it is supported by R645-301-322.100, R645-301-322.220, and R645-301-333.

#### **Findings:**

Information provided in the application is not considered adequate to meet the requirements of this section of the regulations. Prior to final approval, the applicant must supply the following in accordance with:

**R645-301-330,** The application needs to discuss potential effects of the proposed mining operation on threatened and endangered species and other species of special concern, such as sensitive species. The Division is particularly concerned about those that could be affected by disruption of the hydrologic balance.

**R645-301-332,** The applicant needs to propose a plan for quantitatively monitoring the effects of subsidence on the riparian vegetation in Box Canyon.

#### **RECOMMENDATIONS:**

The application should not be approved until deficiencies discussed in this review have been adequately addressed.