

## 1.0 INTRODUCTION

This Environmental Impact Statement (EIS) considers a single proposed Federal action, with alternatives, and is a joint document between the United States Forest Service (USFS), Fishlake National Forest (Lead Agency) and the Bureau of Land Management (BLM), Richfield Field Office (Cooperating Agency). This National Environmental Policy Act (NEPA) analysis will consider the potential environmental consequences associated with implementing the Proposed Action and Alternatives, as described below.

The Sevier County SSD has submitted right-of-way applications to the USFS and the BLM for consideration of the construction of the Quitchupah Creek Road, a public road. The Quitchupah Creek Road would be generally located between the Acord Lakes Road (Sevier County Road #010) and a junction with State Route 10 (SR-10) (**Figure 1-1**). Lands along the proposed route are administered by the USFS, the BLM, and Utah State School and Institutional Trust Lands Administration (SITLA), all headquartered in Richfield, as well as private interests.

The Proposed Action involves consideration of Sevier County Special Service District (SSD) Number 1's right-of-way applications for construction of the Quitchupah Creek Road. NEPA requires that the environmental analysis compare alternatives to satisfy the identified purpose and need of the Proposed Action, to disclose environmental effects, analyze opportunities, and to resolve issues. The resolution of issues related to this project has been an ongoing and lengthy process. After initial public scoping in 1999-2000 (see **Section 1.6**), the Quitchupah Creek Road Draft EIS was circulated for public review and comment at the end of November 2001 (See Chapter 6 – Public Comments and Responses). Although the comment period was from December 1, 2001 through February 15, 2002, comments received after that time were also reviewed and included. Since that time, the EIS has been complicated by a changing BLM and FS staff of resource specialists and managers (due to transfers and retirement), and additional required studies for specific resources, such as the Ethnography Study conducted in 2004. This Final EIS takes into account a plethora of public and agency concerns, issues and views, as well as adapting to changes in land use policy and guidelines.

Decisions to be made, authorizing actions, and a description of the Federal right-of-way application process are further discussed in the following sections.

### 1.1 Purpose and Need

The purpose of the Federal action is to respond to a request from Sevier County SSD for granting a right-of-way to construct a public road. Southern Utah Fuel Company Mine (SUFCO Mine) would then be a toll user of this public road. Due to the SUFCO Mine location in rugged terrain, and the distance to railheads and loadouts, SUFCO Mine relies on truck transport for all of its coal shipments. The need for the road project is to ensure the competitive productivity of the SUFCO Mine, as a source of economic stability for Sevier County, a potential source of additional income and revenue for Emery County, and a source of high quality coal for electrical power generating plants in eastern Utah and the Midwest.

The recently signed National Energy Policy Act 2005 seeks to provide reliable, affordable energy to our nation's consumers, and to lessen the impact on Americans of energy price volatility and supply uncertainty. The demand for electricity in the U.S. is projected to increase by 45% over the next 20 years (National Energy Policy website). Access to coal reserves via any of the road alternatives proposed in this document would reduce fuel waste by shortening the transport routes, and would help to maintain supplies of diverse and traditional forms of energy within the U.S. (domestic oil, gas and coal). The National Energy Policy promotes such improvements in the productive and efficient use of energy.

The SUFCO Mine, operated by Canyon Fuel Company, LLC was Utah's largest coal producer in 2004, and produced a near-record high of 6.87 million tons. SUFCO and dependent trucking companies provided 20 percent of the non-farm employment and 28 percent of the personal income in Sevier County in 2002. The mine is an important component of local economies. The presence and stability of the SUFCO Mine, and the families who support it, guarantee a continued demand in both Sevier and Emery counties for bank loans, mortgages, utilities, and other goods and services. This adds to the economic stability of both counties.

Profitability of the SUFCO Mine over time ensures that funds are available for further exploration, and maintains the SUFCO Mine's level of production and competitive edge in the marketplace. The added profits, due to reduced transport costs, substantially lower risk of failure for the SUFCO Mine, and provide a buffer to economic consequences for Sevier County and to a lesser extent Emery County.

As companies mine toward the edge of coal deposits, mining is usually stopped because the mining conditions result in the cost of coal production exceeding the market price of coal. The decrease in transportation costs would allow some of the coal that otherwise would not be recovered due to excessive mining costs to be mined profitably without an increase in the selling price. Effective mining of the marginal portions of the SUFCO reserves could result in recovery of an additional 11 to 43.9 million tons of coal if the road were authorized.

Under the Mineral Leasing Act of 1920, regulations provide that any resource recovery and protection plan must achieve maximum economic recovery of the coal resources.

The purpose of this EIS is to evaluate the potential environmental, social, and economic consequences of granting rights-of-way to construct a public road across Federal and other lands.

## 1.2 General Location and Description of Proposed Road

Sevier County SSD has proposed the upgrade and realignment of an existing 9.15 mile road along Quitchupah Creek, to connect the Acord Lakes Road (Sevier County Road #010) in Sevier County with SR-10 in Emery County. The proposed 8.9-mile Quitchupah Creek Road (Alternative B) would intersect SR-10 in the N½ of Section 30, Township 22 South, Range 6 East, Salt Lake Base Meridian (SLBM). Continuing to the northwest into Sevier County, and then westward, the road would generally follow an existing trail along Quitchupah Creek, into Convulsion Canyon, where it would connect with the paved Acord Lakes Road in SW¼ of Section 11, Township 22 South, Range 4 East, SLBM. **Figure 1-1** presents the project's regional location. The alignments considered for Quitchupah Creek Road are presented in **Figure 1-2**. **Figure 1-3** presents the current transportation route in comparison with the Proposed Action and Alternative routes. Legal descriptions of each of the project components are given in **Appendix A**.

The proposed 8.9 mile road (Alternative B) would be a 28-foot wide paved surface, with an operational right-of-way of 66 feet. Several pullouts would be provided at various locations (see **Appendix B - Strip Maps**). The construction corridor would vary from 50 feet to 60 feet on the flatter ground (eastern end) to an average 100 feet for the remainder of the road. The road would be designed for a speed of 40 miles per hour, constructed according to the standards of the American Association of State Highway and Transportation Officials (AASHTO) and the current Utah Department of Transportation (UDOT) Standard Specifications for Road and Bridge Construction.

No facilities would be built in association with this alignment. The total new surface disturbance under this Alternative would be 92.3 acres. Once reclamation is complete, the net loss of vegetation would be about 45 acres that are dedicated to paved road surface/shoulder.

The Project Area includes all the terrain that would be affected by the proposed road alternatives (B, C, and D). The proposed Quitchupah Creek Road alignment (Alternative B) is generally east-west. Within the span, an approximately 1,600-foot change in elevation occurs. The proposed road junctions with SR-10, a north-south highway route that extends from Interstate 70 (I-70) on the south to U.S. Highway 6 on the north. The Project Area contains a diverse set of climatic, geologic, physiographic, and ecosystem characteristics.

### **REGIONAL CHARACTERISTICS**

From a regional perspective, the Project Area is predominantly located within the Basin and Range - Colorado Plateau Transition Physiographic Province (Stokes, 1986); it is marked by gently rolling or near-flat surfaces, through which drainages have dissected the otherwise gentle topography. The drainages typically form steep canyons cut through sedimentary rock. Adjacent to the High Plateaus, the eastern edge of the Project Area is located within the Mancos Shale Lowlands Subsection of the Canyonlands Section of the Colorado Plateau Province. Topography in this Subsection is influenced by the weak sedimentary rock at the eastern base of the High Plateaus.

The majority of the Project Area can be classified as a Steppeland climate, according to the modified Köppen System (Weber State College, 1981). Steppelands are located between the true desert areas and the higher mountains. They are generally semi-arid, with annual evaporation exceeding annual precipitation; a summer moisture deficit is typical. The western-most edge of the Project Area borders on Undifferentiated Highlands, according to the modified Köppen System, and has a less significant moisture deficit.

The regional physiography and climate influence vegetation characteristics. Located within the Upper Sonoran and Transition Vegetation Zones, the area contains a variety of vegetative types and habitats ranging from forest to brush-dominated communities to sparse small desert shrub lands. The presence of water further modifies these vegetative types, and localized areas of riparian and wetland communities are also found.

### **LOCAL CHARACTERISTICS**

At the upper, western end of the proposed road, the Project Area is still in the southern part of the north-south trending Wasatch Plateau. Following along a major dissection in the Plateau, the Convulsion Canyon/Quitchupah Creek drainage traverses and descends the east side of the Plateau and continues out of canyon confines. The Water Hollow Benches are south of Quitchupah Creek. They are highly dissected with numerous ephemeral drainages that cut through the bench surfaces. The eastern portion of the Project Area crosses shale flats to the alignments' terminus at SR-10. It is here, as each alignment drops from the high plateau country to the flatland, where Project Area characteristics vary significantly.

As mentioned above, the Project Area is associated with a canyon complex that dissects the plateau surface. The proposed Quitchupah Creek Road alignment traverses, and cuts through, numerous sedimentary geologic formations as it makes its way eastward across the plateau. These formations include the Mesaverde Group and the Mancos Shale Group.

The horizontally bedded nature of these formations, as well as textural and lithologic differences in the formations, is evident from the steep canyon walls, escarpments, and badlands visible in the Project Area. Flat ledges, vertical cliffs, and sloping erosional and depositional surfaces all contribute to the varied relief in the Project Area. Faulting and fracturing also affect the local topography, and in fact, the location of Quitchupah Canyon and its tributaries are likely dictated by the geologic structure.

The Project Area is located in the Quitchupah Creek watershed, which is part of the Colorado River system. At its upper end, where it is known as Convulsion Canyon, the watershed collects flows from small tributaries. Water Hollow, the North Fork of Quitchupah Creek, and Link Canyon Wash are three of the larger tributary channels that drain toward the Project Area. The Water Hollow Benches area to the south of Quitchupah Creek has numerous ephemeral drainages that head primarily southeast toward the creek. These drainages and tributaries have had a major influence on the area's topography as they cut down through, and laterally across, the valley bottom sediments.

The climate and physiography within the majority of the Project Area has generally not been conducive to extensive soil development; vegetation is sparse over much of the Project Area. However, at the upper, western-most end, where climate and topography are more amenable, soils with defined horizons and an organic component have developed over time and have not eroded away. They support pine, aspen, scrub oak, and mountain mahogany, as well as significant understory vegetation.

Over most of the rest of the area, significant exposed bedrock occurs adjacent to the proposed and alternate road alignments. Many other areas where soil development has occurred have been subject to extensive erosion by wind and water. These areas support only sparse vegetation, ranging from scattered pinyon and juniper woodlands with sparse understory to low density desert brush lands where shadscale and other salt bush communities dominate. The former floodplain (now terrace) of Quitchupah Creek contains well-developed soils that support sagebrush/grass vegetation communities. The perennially flowing stream corridors of Quitchupah and Water Hollow creeks support a varying mixture of riparian species.

In addition to the function of the Project Area in filling various habitat niches for wildlife, livestock grazing has occurred within the bounds of the Project Area for many years. These land uses are the predominant ones within the sparsely populated region.

### **1.3 Relationship to USFS/BLM Policies, Plans, and Programs**

The San Rafael Resource Management Plan (RMP) (1991) and the Forest Planning Unit Management Framework Plan (FPU MFP) (1982) guide the management of BLM public lands in the area. Under the FPU MFP, decisions on right-of-way applications are made according to analysis of each application. The USDA Fishlake National Forest Land and Resource Management Plan (LRMP) (1986) guides resource management activities for the Fishlake National Forest lands including the western portion of the Project Area. These management plans are currently in the revision process, but remain in effect until that process is finalized. However, while the plans are being revised the actions the agencies can take are limited by 40 CFR 1506.1. Specifically, during the NEPA process, "Until an agency issues a record of decision as provided in 1505.2, no action concerning the proposal shall be taken which would: 1) have an adverse environmental impact; or 2) limit the choice of reasonable alternatives." The BLM Richfield Field Office RMP is expected to be finalized in the spring of 2006 and will provide future direction for managing the public lands in Sevier County and additional areas. The BLM Travel Plan, due out in 2006 after the release of the final RMP, will designate a system of trails for off-highway vehicles (OHVs). The Richfield RMP will designate areas where proposed projects, such as OHV sites, are acceptable on BLM land.

The planning process for the Dixie and Fishlake National Forests (NF) Forest Plan Revision is ongoing and has included numerous public meetings and workshops. The Draft Management Direction Package for the Fishlake National Forest was released April 28, 2005. The Fishlake NF LRMP is expected to be finalized the end of 2006.

The current management prescription for the Forest lands in the Project Area emphasizes livestock grazing via intensive management level D for range resources (See **Section 3.8**, Range Resources). Also included in the Project Area is *Area Travel Restriction C*, which denotes lands closed year-around to all motorized vehicle travel. Travel Area C includes The Cove on Old Woman Plateau and a trail in Water Hollow. However, road system expansion to accommodate mineral activities is allowed. The Fishlake National Forest OHV Route Designation Plan is scheduled to be implemented in the summer of 2006. This Plan will designate roads, trails, and open areas for the use of OHVs. The rules and designations in the Plan will close the Forest to off-route motorized cross-country travel by OHVs, except in the designated areas. This plan will improve management and enforcement of OHV use on Forest land.

There are no designated BLM Areas of Critical Environmental Concern (ACECs) in or near the Project Area. However, the Quitchupah Creek – Trough Hollow ACEC has been nominated under the current land use planning effort for the BLM's Richfield Field Office. The ACEC would include Quitchupah Creek drainage, Link Canyon, and Trough Hollow, and would involve the majority of the EIS Project Area, excepting the Water Hollow and Saleratus benches. Further, Quitchupah Creek, from the Fishlake National Forest boundary to the Sevier/Emery county line (crossing 1.3 miles of BLM land) was determined eligible for possible designation as a Wild and Scenic River during the initial phase of Richfield BLM's land use planning update process.

This EIS tiers to the FEISs of these Land Use Plans, which are available for review at the USFS and BLM offices, both located in Richfield, Utah. See also **Section 3.9** regarding compliance with Emery County and Sevier County planning documents.

## **1.4 Decisions to be made By Responsible Officials**

This EIS addresses the need for Federal decisions approving a right-of-way application, or an alternative, which would cross Federal lands. The Forest Supervisor for the Fishlake National Forest and the Field Manager for the Richfield Field Office of the BLM are the responsible officials for the EIS. They will make their respective decisions regarding the Proposed Actions after considering the comments, responses, and environmental consequences discussed in the EIS. The rationale for each agency decision will be documented in separate Records of Decision (RODs). No plan amendments would be required by either the USFS Fishlake LRMP, the BLM San Rafael RMP, or the BLM Forest Planning Unit MFP in order to implement the Proposed Action or Alternatives.

### 1.5 Authorizing Actions

In addition to this EIS, approval of the Proposed Action or an Alternative would require authorizing actions from other Federal, State, or local agencies with jurisdiction over the project. Authorizing actions include rights-of-way, land use and environmental permits, and approvals. **Table 1.5-1** presents the principal authorizing actions required for the Proposed Action or an action Alternative.

**Table 1.5-1 Summary of Permits and Approvals Required for the Quitchupah Creek Road Project**

Permit/Approval	Granting Agency
<b>Permits Required by the Record of Decision</b>	
Public Road Easement issued to Sevier County*	U.S. Forest Service
Right-of-Way Grant*	Bureau of Land Management
Temporary Use Permit*	Bureau of Land Management
Farmland Protection Policy Act Farmland Conversion Impact Rating*	Natural Resources Conservation Service
Clean Water Act Section 404 Permit*	U.S. Army Corps of Engineers
Stream Alteration Permit (may be covered under 404 permit above)	Utah Division of Water Rights Stream Alteration
Section 7 Consultation	U.S. Fish and Wildlife Service
Cultural Resource Concurrence	State Historic Preservation Office
<b>Permits Required for Construction of Road</b>	
Fugitive Dust Control Plan	Utah Department of Environmental Quality
Encroachment Permit	Utah Department of Transportation
Easement Application	Utah School and Institutional Trust Lands Administration
Right-of-Way Acquisition	Private Landowners
National Pollution Discharge Elimination System Permit for Storm Water	Utah Department of Environmental Quality, Division of Water Quality
Surface Disturbance Permit, Air Quality	Utah Department of Environmental Quality, Division of Air Quality
Cultural Resource Concurrence (possibly Research Design/Memorandum of Agreement)	State Historic Preservation Office
Construction Permit	Emery and Sevier Counties

\*Federal permit, or other entitlement that must be obtained in implementing the proposal. (40 CFR 1502.25(b))  
CFR=Code of Federal Regulations.

## 1.6 Issues

### PUBLIC INVOLVEMENT PROCESS

Public involvement is an important part of the environmental analysis process. The Public Involvement Plan describes the methods and techniques that will be used to involve the public in the environmental analysis. It allows the public to participate actively in the NEPA process and to communicate their concerns regarding the Proposed Action. In addition, involvement of local, State, and other Federal agencies helps these entities to anticipate the effects and benefits that could occur from the project, then make necessary plans and changes in public policy.

The USFS and BLM initiated public scoping for the Quitchupah Creek Road Project on January 15, 1999 with the intent of preparing an EA. Informal meetings were held in Emery County, including a field meeting on March 30, 1999. Other meetings including the Quitchupah Grazing Association Meeting (January 27, 1999) and the Emery County Public Lands Council Meeting (June 8, 1999) were attended by agency and consultant representatives. Due to the level of public concern for the proposed project, and the issues identified during the scoping process, the USFS and the BLM determined that the proposed project warranted preparation of an EIS. A Notice of Intent (NOI) for the Quitchupah Creek Road EIS was published in the Federal Register on July 1, 1999. The legal notice, Request for Comments, was published in the *Richfield Reaper* July 14, 1999; *Emery County Progress* July 13, 1999; *Salt Lake Tribune* and *Deseret News* July 15, 1999.

A public mailing list was compiled and 160 letters were sent to interested individuals, agencies, and groups. Public meetings were held as scheduled in Castle Dale on July 21, 1999 at the Museum of the San Rafael, and in Richfield on July 22, 1999 at the Quality Inn Center. Comment forms were available at the meetings. Over 30 people attended the Castle Dale meeting and 23 people signed in at the Richfield meeting. A complete summary of the public participation is available in the Public Involvement Plan on file at the USFS Fishlake National Forest Office and the BLM Richfield Field Office.

The following official site tours were conducted in Quitchupah Canyon:

June 4, 1999	Representatives of the Paiute Indian Tribe of Utah
June 30, 1999	Agency and Sevier County SSD Representatives
July 15, 1999	Concerned Individuals of Emery County
August 6, 1999	Representatives of the Koosharem Band of the Paiute Indian Tribe of Utah
March 30, 2000	Representatives of the Uinta and Ouray Ute Indian Tribe of Utah
October 18, 2000	Representatives of the Koosharem Band of the Paiute Indian Tribe of Utah
August 22, 2002	Ranchers
June 3, 2003	BLM, USFS, and BLM State Director
August 28, 2003	State of Utah Resource Development Coordinating Committee
September 14, 2004	Representatives of the Paiute Indian Tribe of Utah

Rock art groups and Historical Society members are familiar with and have also visited the canyon.

A total of 35 comment letters or forms were received as a result of the EIS scoping effort. Approximately 25 comments had previously been received during scoping for the EA in January-February 1999. Consultation with interested parties has been on-going throughout the NEPA process, for both the EA and the EIS. The decision was made by the USFS and BLM to carry over all comments made during the EA scoping into the official record of scoping for the EIS. Those who provided comments on the EA have maintained their standing in the EIS process.

The Quitchupah Creek Road Draft EIS was prepared and circulated for public review and comment in November 2001. Comments received on the Draft EIS were reviewed by the BLM and FS, and based upon these, additional information has been gathered and/or revisions made to the EIS. The 409 correspondences received on the Draft EIS are represented in Chapter 6 along with BLM/FS responses.

### **KEY ISSUES CARRIED FORWARD IN ANALYSIS**

The scoping comments were examined for common themes, then combined, as appropriate, into issues. The issues were further organized by resource or issue topic. Based on internal discussions, the issues were organized by resource into key issues to be carried forward as the focus for analysis in the EIS. See the Summary of Public Scoping (JBR, January 2000) for all the comments, and the Significant Issues Document (JBR, February 2000) for details on the selection of key issues. These documents are on file at the USFS Fishlake National Forest and the BLM Richfield Field Office, Utah.

In addition to issues identified during scoping, the BLM's "Critical Elements" are reviewed in this document. These include: Air Quality, Areas of Critical Environmental Concern, Cultural Resources, Environmental Justice, Floodplains, Invasive and Non-native species, Migratory birds, Native American Religious Concerns, Prime or Unique Farmlands, Special Status Species, Wastes - Hazardous or Solid, Water Quality (surface and ground), Wetlands and Riparian zones, Wild and Scenic Rivers, and Wilderness (including BLM WSAs). The following Critical Elements are resources that are described and dismissed in Section 3.0 as not occurring in the Project Area, or not affected by the proposed project or alternatives: Air Quality, Noise, Environmental Justice, and Wastes – Hazardous or Solid. The other Critical Elements listed above are carried forward for analysis.

### **Key Issues and Indicators**

#### ***Water Quality***

Changes may occur to the water quality in Quitchupah Creek and other creeks within the Project Area due to channel realignment and consequent temporary removal of some of the stream-side hydric fringe and wetlands. Water quality may also diminish due to increased sedimentation from disturbed erodible soil. Increases in sedimentation in these creeks could increase salinity due to the presence of saline soils in some parts of the Quitchupah Creek drainage. A substantial increase in salinity could affect the salinity management of the Colorado River system.

Improvements in roadway design for the Quitchupah Creek Road, including: implementation of BMPs for runoff control, erosion/sedimentation control, and maintenance; and distancing the road from the creek where possible; along with the proposed riparian protection projects, would help to minimize increases in the amount of total dissolved solids (TDS) in Quitchupah Creek, in spite of some localized areas of increased erosion due to increased area of disturbance.

Indicators:      Salinity

Sedimentation potential  
Number of potential culverts/crossings

### ***Soils***

The presence of highly erodible soils and shrink-swell soils, and consequently potentially unstable soils, in the middle stretches of the Quitchupah Creek area, would increase road design and construction efforts. The proposed road alignment in the Quitchupah Creek area is located on areas of erodible soils as defined by Natural Resources Conservation Service (NRCS). The unstable soil areas will be a high maintenance item in the future as evidenced by maintenance requirements in the unstable areas within the SR-10 alignment. The disturbance of erosive soils also contributes sediments and salts to the creek. Farmland soils would be impacted under Alternatives B and C.

Indicators:      Percentage of potentially unstable soils  
                     Acres of farmland soils impacted

### ***Vegetation***

Riparian zones within the Project Area and those associated with wetlands would be impacted due to construction of the road, but would be replaced within the replacement channel in East Spring Canyon. The loss of riparian vegetation could impact wildlife and could cause increased sedimentation in the stream. Surface disturbance could also create direct impacts to vegetation, including the potential to encourage the invasion of noxious weeds and/or exotic plants. The plant communities of the Project Area should be identified and mapped to provide data for a more specific analysis. Grazing restrictions could add some protection to riparian areas.

Indicators:      Potential acreage of riparian zone impacted  
                     Potential acreage of disturbance susceptible to noxious weed invasion

### ***Wildlife***

The proposed road in the Project Area could interfere with big game use of the winter ranges on the benches and in the agricultural fields. Fencing of the road could become a barrier to big game migration and also to daily movements between the fields and cover in the nearby hills. Traffic on the roads in the form of large loaded trucks going downhill would be a hazard to all wildlife, especially big game and raptors.

Raptor nesting within the Project Area could be affected by road construction and operation. The increased activity during critical nesting periods may cause raptors to abandon active nesting sites.

Indicators:      Location of big game migration corridors  
                     Raptor nesting locations

### ***Fisheries/Macroinvertebrates***

Increased sedimentation and destabilization of Quitchupah Creek and other creeks in the Project Area could impact fisheries and aquatic macroinvertebrates in the stream. The loss of the hydric fringe and stream-side wetlands could affect the reproductive success of fish species and some macroinvertebrates species that depend on vegetation for cover and prey.

Indicators:      Stream-length within Project Area  
                     Acreage of hydric fringe/stream-side wetlands potentially impacted  
                     Presence of fish in Quitchupah Creek

## Existing macroinvertebrate populations

***Threatened, Endangered, and Sensitive Species***

Originally four species of threatened, endangered, or sensitive (TES) plants were suspected by BLM of occurring in the Project Area. However, additional information supplied by Lori Armstrong of the BLM and Bob Campbell of the USFS indicates that there is the potential for five species of TES plants to occur in the Project Area. Each TES plant species would need to be identified and mapped in the Project Area to ensure the road design avoids or minimizes impacts to these TES plants.

The flannelmouth sucker and the leatherside chub, State and BLM sensitive fish species, occur in the lower portion of Quitchupah Creek. The bluehead sucker has been recorded in Quitchupah Creek below the Project Area, at the confluence with Ivie Creek. The potential of increased sedimentation and stream destabilization may minimally affect these fish species. Their presence in the existing active, high TDS, flashy stream system suggests some degree of environmental tolerance.

Implementation of the proposed project requires Section 7 Consultation with the U.S. Fish and Wildlife Service (USFWS).

Indicators:      Acreage of identified TES plant species habitat within Project Area  
                         USFWS opinion

***Range Resources***

Livestock grazing is a traditional use of the Project Area. Livestock are wintered in the Quitchupah Creek area on the lower benches and in the agricultural fields. Livestock are moved to and from the summer range on Forest lands by trailing along Quitchupah Creek. The presence of a road would change the way livestock are trailed along the creek, causing changes in traditional ranching methods. The presence of a road would increase the need for the construction of more fences and other facilities to keep livestock off the road and allow them to trail and graze in adjacent areas of forage and water. The additional fences and facilities would increase the operating and maintenance costs for the rancher. There would also need to be parking areas for the livestock trucks and trailers along the road (pullouts are planned for East Spring Canyon). The riparian fencing on public lands would alter the way livestock are watered.

The road presents a hazard, in the form of vehicle-livestock collisions, to any livestock that enter onto the roadway. The ranchers predict an increase in livestock loss due to collisions on the road, similar to what is now being experienced on the Acord Lakes Road. There would be some loss of feed production in the agricultural fields in the Project Area due to the proposed road alignment and the removal of a small acreage of agricultural lands from production.

Indicators:      AUMS potentially lost  
                         Acreage of feed production field potentially impacted  
                         Change in area available for livestock to water

***Land Use***

Land uses in the Project Area would increase. Permitted facilities in the Project Area include the drainfield for the mine wastewater system in Convulsion Canyon, the power line that follows the creek, and the irrigation system for the agricultural fields adjacent to the creek. The road would provide easier access to the area which could increase the types and intensity of land use.

Indicators:      Potential land use changes

**Visual Resources, Recreation, and Wilderness**

The road would change the nature of the Project Area. The aesthetics of a remote but accessible creek area with several scenic canyons would change to an easily accessible area with the possibility of increased public use. There would be a loss of natural beauty and quietness along the creek. The road would be readily visible in the landscape and would attract the attention of the casual visitor, in contrast to the existing two-track road which is barely visible against the landscape. The views in the Project Area would be affected by the presence of the road. The BLM public lands are a Visual Class IV, which means that changes which dominate the landscape are permitted. The National Forest System lands Visual Quality Objective (VQO) is modification, which indicates activities within the area can be visually dominant.

Although access to the public lands and the National Forest System would be made easier with the construction of the proposed road, the recreational experience within the Project Area would be changed. The emphasis on traditional uses of ranching, hunting, trapping, and remote country adventure would change with increased tourism and public use. Those who advocate all-terrain vehicle (ATV) use have requested an ATV trail be constructed alongside the road to allow continued access into the Forest lands. The construction of a paved road on the current road alignment, where ATVs presently travel at will, would restrict access for ATV users. There would be pull-offs and parking along the paved road at several locations, such as near livestock facilities (see Appendix B- Strip Maps). Those who enjoy the peacefulness and solitude of the canyon would see a change. Hunting use may decrease due to the number and frequency of transport truck traffic causing displacement of wildlife.

Wilderness and roadless areas issues were raised but no wilderness or inventoried roadless areas are designated on the Forest or public lands near the Project Area. The Project Area is not affected by the USFS moratorium on road maintenance or construction in inventoried roadless areas.

Indicators: Visual Class and potential compliance  
Potential restrictions/changes to recreational opportunities

**ACECs and Wild & Scenic Rivers**

Quitichupah Creek, from the Fishlake National Forest boundary to the Sevier/Emery county line (crossing 1.3 miles of BLM land) was found to be eligible for possible designation as both an ACEC and a Wild & Scenic River during the initial phase of the Richfield BLM's land use planning update process. The July 2004 evaluation of outstandingly remarkable values determined that the nominated cultural values were outstanding; the nominated ecological values were determined not outstanding. Once values of a possible ACEC or Scenic River (or segment) crossing public lands has been determined eligible, the river corridor is managed to protect the outstandingly remarkable values for which it is nominated, until a suitability determination is made.

Indicators: Potential impacts to eligible ACEC and/or Wild & Scenic Rivers values  
Draft RMP determination

**Cultural Resources and Paleontology**

Numerous cultural resource sites are present in the Project Area and several would likely be impacted by the proposed project. Cultural affiliations include the Archaic, Fremont, and EuroAmerican cultures. Highly visible rock art sites are more susceptible to impacts as these sites become more accessible to the public. The relatively remote nature of the rock art site setting would be compromised by the presence of the paved road.

There is concern for historical sites in the Project Area. Several individuals feel that their historical and personal connection to the Quitchupah Creek area would be greatly affected by the road construction and operation. Historically the area has been used for cattle grazing/trailing. Both Emery and Sevier Counties' economic histories are based on cattle ranching and livestock in general.

Indicators:      Number of known NRHP Eligible cultural resource sites potentially impacted  
                      Number of known significant paleontological sites potentially impacted

### ***Native American Concerns***

As a result of the Native American consultation, the Paiute, Hopi, and Ute tribes have expressed concern over the proposed project. The Paiute Indian Tribe has stated that the canyon is sacred to them and the rock art sites represent traditional use of the area. The Ute Indian Tribe has expressed concern that the proposed road will lead to impacts to the rock art present in the area and request a one-mile buffer. The Hopi, who claim affiliation with the Fremont culture, have requested that no prehistoric sites be disturbed.

Indicators:      Potential sacred values impacted  
                      Potential Traditional Cultural Properties impacted  
                      Potential sites of traditional importance impacted  
                      Potential disturbance to rock art and other cultural resource sites

### ***Transportation***

A new rural collector road system would be developed that would link the Acord Lakes Road with SR-10, thus bypassing I-70. The proposed road would facilitate transporting coal to the east by reducing the round-trip distance by more than 50 miles. The road would also reduce the distance for coal mine service providers located in Carbon County traveling to the SUFCO Mine. Carbon County is the center for the coal mine service industry. The proposed road would be an alternate access to the SUFCO Mine providing increased mine safety. The new road would lessen coal truck traffic on a stretch of SR-10 from the I-70 junction north to the new junction near Emery. The coal truck traffic from the Quitchupah Creek area would still be routed through the town of Emery. The road would open access to alternative customers in the local area and in eastern coal markets.

There is concern regarding the location and design of the junction of the proposed Quitchupah Creek Road with SR-10. The proposed junction is adjacent to a bridge that would need to be widened to facilitate the placement of turn and acceleration/deceleration lanes. Just north of the proposed junction is an increase in the grade on Quitchupah Hill that slows northbound trucks and may interfere with the regular movement of traffic. Accelerating trucks may be slowed by the grade, consequently slowing northbound traffic on SR-10.

Reducing the coal transport round-trip east would increase the competitive balance for the SUFCO Mine with the other coal mines in Emery and Carbon Counties that are close to loadouts.

The need for the road on the basis of the round-trip transport distance for the SUFCO Mine, mine safety, and the increased access to the Acord Lakes area has been questioned by project opponents.

Indicators:      Potential junction requirements  
                      Potential distance savings

### ***Socioeconomics***

Residents of Emery County are concerned whether construction of the road would lead to increased economic benefits to Emery County, and if so, would these benefits from the proposed road outweigh perceived environmental and social impacts?

Coal mining provides economic benefits such as employment, payroll, Federal coal royalties, and tax revenues on a local and regional level. Would these economic benefits change as a result of any of the Alternatives? An economic electrical cost benefit would also accrue, in time, to the electrical energy consuming public and industry.

Indicators:     Income and employment  
                  Tax royalties

### **Issues Not Analyzed In Detail**

The following issues identified through the public scoping process were determined to be outside the scope of the Proposed Action, did not drive alternative selection, already decided (by laws, regulations, or Land Use Plan decisions), irrelevant to the decision, or not affected by the Proposed Action or build alternatives. Therefore, these issues were not analyzed in this EIS. Issues not analyzed in detail in this EIS are summarized below; text includes statements or concerns made by the public. The rationale or justification for not analyzing these issues in detail is presented immediately following the summation of each individual issue.

#### ***Geology***

The surficial geology of the Convulsion Canyon and Quitchupah Creek area would be affected by road construction mainly in areas that require blasting.

- Surface exposures of formations would be impacted by blasting and road construction, but these impacts would be confined to aesthetic ones. The nature of the canyon is one of rocky outcrops and steep, exposed slopes.

#### ***Landslide***

There is a mapped landslide feature along the north side of Convulsion Canyon at the intersection of the existing Acord Lakes transport road and the jeep trail.

- The landslide is presently stable and not a threat to the Acord Lakes Road. The potential for additional landslides in the Project Area was reviewed and no recognized active landslides were identified.

#### ***Noise***

The change in nature of a remote area to a readily accessible area with consistent haul truck traffic would be expected to increase the noise level, both in intensity of the noise and frequency of events. This basic change would potentially degrade the recreation experience of those seeking a remote type of recreation and could affect wildlife. The noise level from coal truck traffic in the town of Emery will increase.

- Overall, noise would increase above current natural background levels in the road corridor. Due to the remote and rural nature of the Project Area, noise receptors in the area are limited. Haul truck traffic would be consistent once established. Remote recreation experiences are available throughout this region of Utah; although noise could affect the area close to the haul road, the opportunity for remote recreation experiences in the region would be minimally affected. Initial road construction activity would make the area less desirable to wildlife. Once the road is established, big game in particular, as well as songbirds, would be expected to avoid the noise present in the road corridor. Depending upon need and forage availability, however, big game may utilize habitats alongside the road. Other wildlife are likely to become accustomed to the consistency of truck traffic noise once the road is complete. The same amount of coal will be trucked through the town of Emery whether or not this road is constructed; therefore the proposed project would not further impact noise levels in the town of Emery.

**Road Costs**

How do the road costs compare and what upgrades would need to be completed for the intersection with SR-10? Is the mileage saved worth the cost? The different alternatives would have different construction costs.

- The toll user would pay for road construction costs, including the intersection with SR-10. The fuel/transport savings would pay for the road within a matter of 5 to 10 years depending on alternative chosen.

**Range Resources****Trucking/ Cattle guards**

Trucking cattle is not a viable option due to the potential for cow and calf deaths resulting from trampling and also for the potential of cows abandoning calves.

- Trucking cattle is a commonly used method in Utah to move livestock to and from summer ranges, with negligible adverse results.
- Trucking is not necessary since designated livestock trail would be constructed and trailing would be allowed.

Cattle guards are not practical under the use of heavy coal trucks.

- Cattle guard structures are utilized on other coal transport roads and would be designed for use with heavy trucks.

**Socioeconomics****Unions**

SUFCO Mine is a non-union mine. With the potential for an increased competitive position for markets east of the Plateau, there could be an impact to the union coal mines in Carbon and Emery Counties. Non-union mines could perceive preferential treatment based on this economic advantage.

- Due to closing or declining production from union mines in Carbon and Emery Counties, some coal sales have already shifted to the SUFCO Mine out of necessity and/or competitive advantage.

**Private Lands**

Some of the private landowners in the Project Area have questioned the need for a road and have not been favorable to granting a right-of-way for the road. The ranchers assert the road would interfere with their ranching operations and reduce the quality of life in the Quitchupah Creek area. The proposed road would cross 3.7 miles of private lands, mostly ranch lands adjacent to the lower creek. Five parcels of undeveloped land adjacent to SR-10 would also be affected.

- Under Alternative B (Proposed Action), a prescriptive easement for the road is in place. Under Alternatives C and D, the associated private landowners are amenable to granting a right-of-way.