

**U.S. Department of the Interior  
Bureau of Land Management  
Royal Gorge Field Office  
3170 E. Main Street  
Canon City, CO 81212**

## **ENVIRONMENTAL ASSESSMENT**

NUMBER: CO-200-2008-0098 EA

CASEFILE/PROJECT NUMBER: Grazing Record No. 0500136

PROJECT NAME: Range – Grazing Permit Renewal for Green Mountain Gulch Allotment #05158

PLANNING UNIT: Waugh Mtn. / Tallahassee Creek Subregion #6

LEGAL DESCRIPTION: T50N, R12E, S. 32, & 33 913 Acres  
T49N, R12 E S. 5 & 6

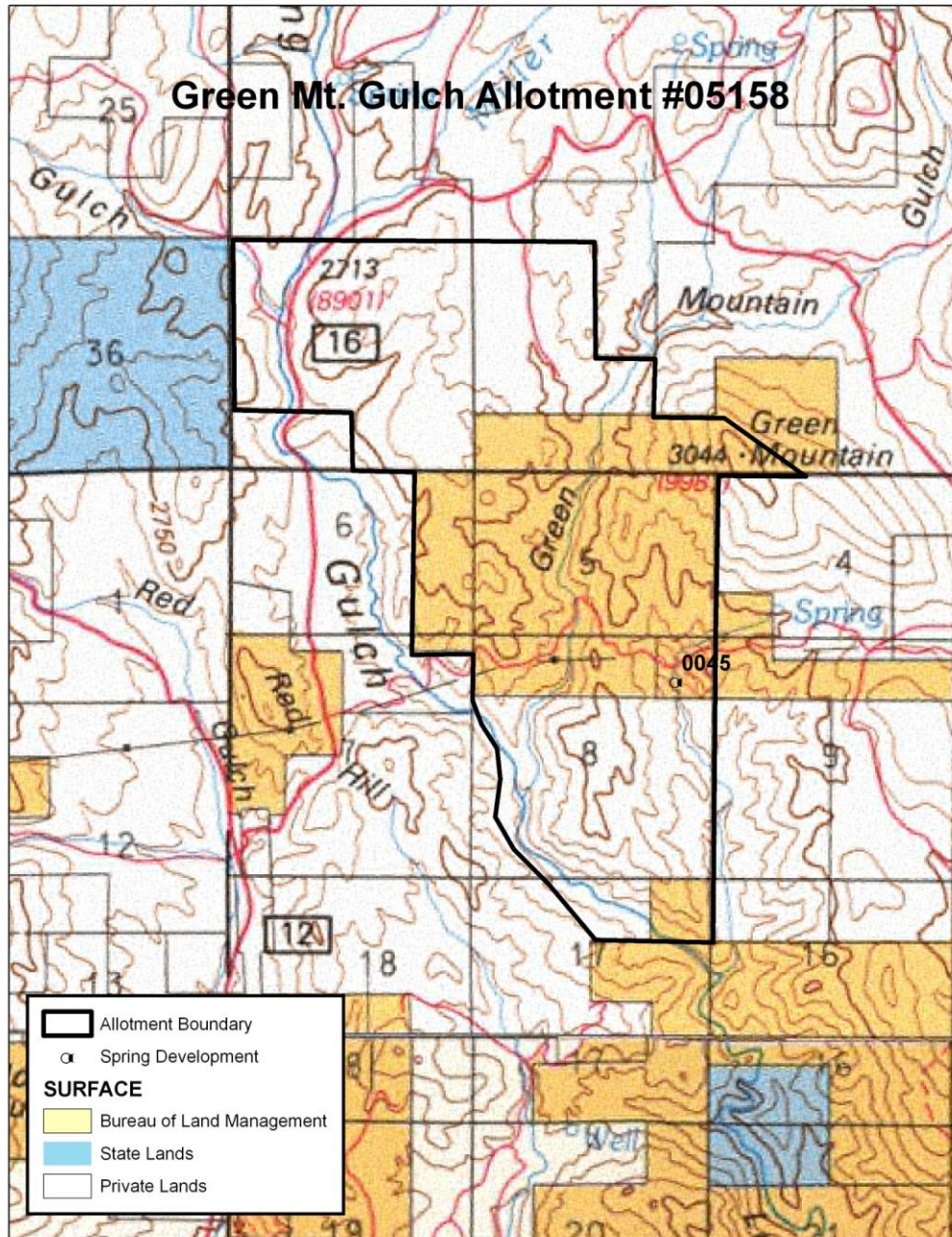
APPLICANT: Howard Eggleston & Tom Estis

ISSUES AND CONCERNS: BLM has solicited public involvement in the evaluation of grazing use on this allotment in 2006. There were no issues or concerns related to livestock grazing brought up as a result of this scoping process.

During the summer of 2007, the Royal Gorge Field Office conducted a Public Land Health Assessment within the Green Mountain Gulch Allotment. The results of this assessment identified issues with 1.3 miles of riparian within the allotment that were not meeting Standards for Public Land Health.

There is no public access to the BLM portion of the allotment.

NEED FOR THE ACTION: This assessment analyzes livestock grazing use on the Green Mountain Gulch Allotment #05158 in Fremont County, Colorado. This analysis is needed to complete the grazing permit renewal process to comply with all applicable laws and regulations. The proposed action is needed to ensure that grazing use helps the allotment meet Standards for Public Land Health and future grazing use on the allotment is consistent with Guidelines for Livestock Grazing Management in Colorado.



Background/Introduction:

Grazing use on the Green Mountain Gulch Allotment is currently managed as a “C” category allotment and scheduled as follows:

<u>Allotment</u>	<u>Number</u>	<u>Kind</u>	<u>Grazing Period</u>		<u>% Public Land</u>	<u>AUMs</u>
			<u>Begin</u>	<u>End</u>		
Green Mt. Gulch	5	Cattle	03/01	02/28	100	58

The terms & conditions are as follows:

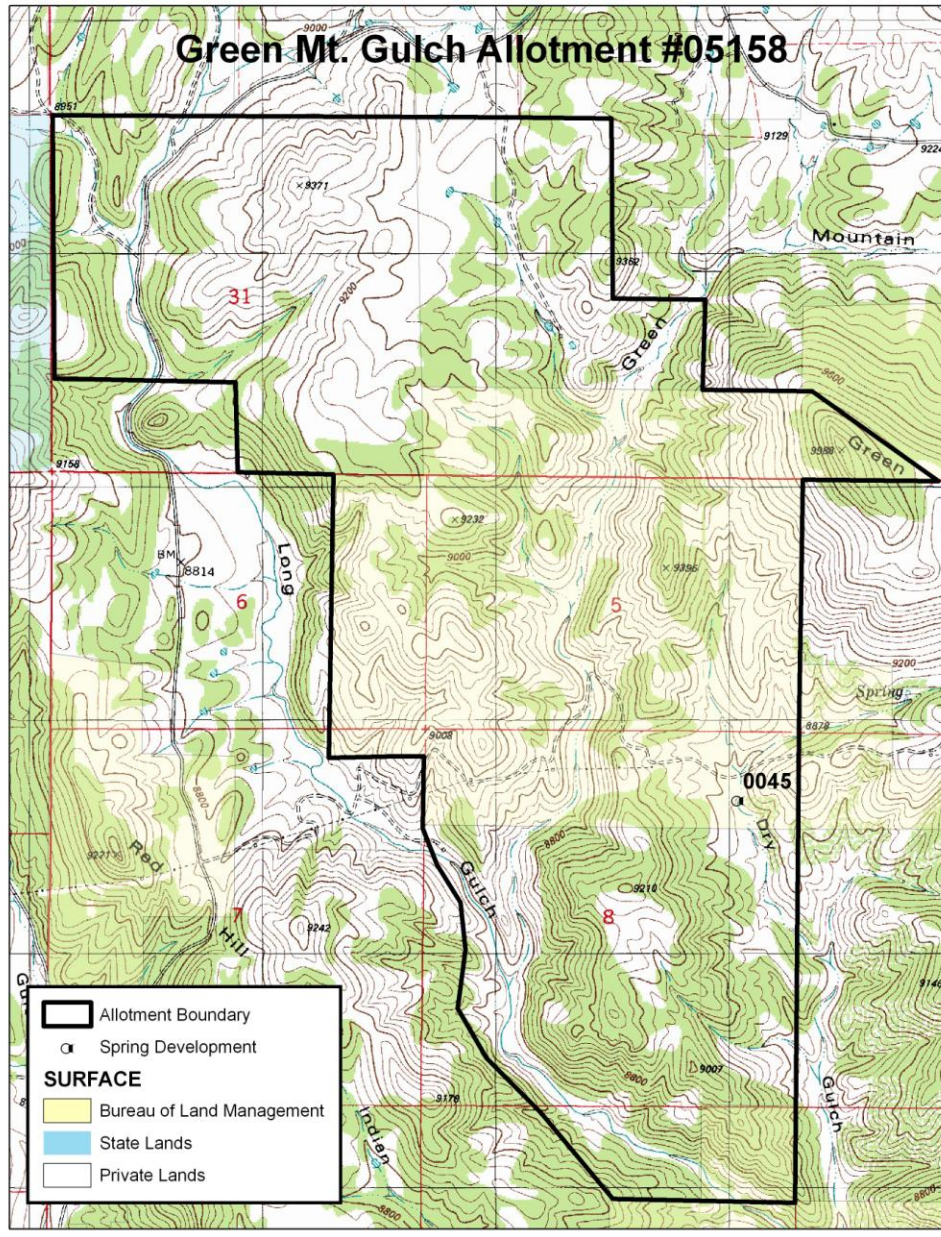
Grazing use on the allotment is authorized for the full estimated grazing capacity of the federal range which is used in conjunction with private land and is not limited as to season of use or numbers of cattle as long as grazing use is not detrimental to the federal range and authorized use is not exceeded.

	Allotment Summary (AUMs)		
	Authorized Livestock Grazing Use		
	<u>Active</u>	<u>Suspended</u>	<u>Total</u>
Green Mt. Gulch	58	0	58

Custodial management is generally used on allotments that consist of relatively small, scattered parcels of public lands that are unfenced from large amounts of private land, are difficult to manage separately, and have limited resource issues. The permittee is not restricted to specific numbers of livestock, nor restricted to specific grazing dates, as long as the authorized amount of grazing use on public land within the pasture is not exceeded. The authorized amount of grazing use on these allotments equals the estimated carrying capacity of the allotment and is expected to result in utilization levels of 40% - 60% of the total annual forage production of key forage species. Grazing use that exceeds this level on public land is not authorized.

During the summer of 2007, the Royal Gorge Field Office conducted a Public Land Health Assessment within the Green Mountain Gulch Allotment. Public land within the assessment area was evaluated to determine the health of upland soils, plant and animal communities, riparian systems, threatened and endangered species, and water quality. One issue identified during the assessment was 1.3 miles of riparian along Green Mt. Gulch that was rated as "Non-Functional". The cause was contributed to livestock grazing under both authorized use and unauthorized trespass use. Even though there is no public access to the BLM parcel, parcels with significant riparian resources are generally not considered Custodial allotments. Livestock trespass has been an issue resulting in grazing use above and beyond the authorized amount. Livestock trespass has been the result of neighbors livestock accessing public lands and not necessarily the permittees' livestock. Boundary fences surrounding the allotment are in poor condition and need maintenance.

The allotment consists of a significant amount of land area that is inaccessible or unsuitable to livestock grazing due to rough and steep topography. As a result, grazing use is concentrated to the riparian areas, especially during the warmer parts of the season. The primary water source on the allotment is Green Mountain Gulch, which runs intermittently and surfaces in various locations within the allotment. A spring development exists on the SE corner of the allotment that requires further maintenance. The spring went dry during the drought of 2002 and since has not worked properly.



DESCRIPTION OF PROPOSED ACTION AND ALTERNATIVES: Three alternatives are analyzed in this assessment:

1. **Proposed Action:** Renew livestock grazing authorization on the allotment with changes to management.
2. **No Action Alternative:** Renew livestock grazing authorization on the allotment with no changes.
3. **No Grazing Alternative:** This action would be not to authorize livestock grazing on the allotment.

**Proposed Action:** Renew permit for ten years with the following changes:

- Upgrade management status to an “I” category.
- New grazing schedule with a specific season of use and livestock numbers.
- New terms and conditions.

The allotment would be managed at the “I” category level, and include the following schedule:

<u>Allotment</u>	<u>Number</u>	<u>Kind</u>	<u>Grazing Period</u> <u>Begin-End</u>	<u>% Public</u> <u>Land</u>	<u>AUMs</u>
Green Mt. Gulch	30	Cattle	11/1 – 6/10	100	58

The following terms and conditions would be included with the permit:

1. Livestock may use the allotment at any time within the authorized period (11/1-6/10) for no more than 60 days of use. Billing for livestock use will be based on actual use.
2. Utilization levels on upland herbaceous vegetation will be limited to 80% of the previous year’s annual growth during the dormant period (11/1-4/30) and 60% of the current growth during the early growing season (5/1-6/10). Utilization levels on riparian grass and woody leader growth will be limited to 60% regardless of season. If grazing use reaches these levels, livestock will be removed.
3. Salt, mineral, and protein tub locations will be located at least ¼ mile from any water source and re-located every two weeks. Emergency feeding of weed free certified hay will be allowed on public land if conditions warrant and within areas agreed to by BLM prior to turn out.
4. The permittee and all persons associated with the allotment operations shall not damage, destroy, remove, move or disturb any objects or sites of cultural, paleontological or scientific value, such as historic or prehistoric resources, graves or grave markers, human remains, ruins, cabins, rock art, fossils and artifacts. If in connection with allotment operations under this authorization any of the above resources are encountered, the permittee shall protect such resources and immediately notify the BLM authorized officer of the findings.
5. This Grazing Permit has been fully processed in accordance with all applicable laws and regulations. The grazing schedule complies with Guidelines for Grazing Management in Colorado and is designed to help the public land achieve the Standards for Public Land Health. In the event that the proposed grazing schedule fails to help public land achieve the Standards for Public Land Health, grazing use on this allotment may be revised at any time.

Allotment Summary (AUMs)  
Authorized Livestock Grazing Use

	<u>Active</u>	<u>Suspended</u>	<u>Total</u>
Green Mt. Gulch	58	0	58

Allotments in the “Improve” category generally include allotments where specific resource concerns or issues have been identified and a specific livestock management strategy has been implemented to address these issues or concerns. Improve category allotments generally include the most intensive management employed on allotments within the Royal Gorge Field Office. Management strategies may include dormant season use, rest rotation schedules, multiple pastures, and/or specific forage utilization standards. Management of these allotments includes vegetative monitoring for both short and long term. Generally, BLM lands under more intensive management are fenced and managed separately from the permittee’s private lands. In this case not all BLM lands are fenced separate from private land, however, the BLM lands are managed separate due to the fact that BLM contains water and topography limits livestock movement on and off public land.

The Proposed Action attempts to promote better livestock distribution on the allotment by moving salt and mineral locations every two weeks, repairing the existing spring development, and limiting livestock use to a cooler season of the year. Emphasis will be needed in monitoring for livestock trespass outside of the authorized grazing period. BLM will work with surrounding landowners to gain better administrative access to the allotment for vegetative monitoring and trespass compliance.

Additional methods may be required in the future to further meet the objectives and may include development of new water sources, constructing livestock trails into inaccessible areas of the allotment, and subdivide larger areas into sub units through fencing. If needed, these methods would be analyzed under further NEPA. The Proposed Action was coordinated and agreed upon by the grazing permittee.

**No Action Alternative:** Renew livestock grazing authorization on the allotment with no changes in grazing management. Under this alternative the grazing permit would be renewed for ten years as a “Custodial” allotment with the existing grazing schedule and terms & conditions.

**No Grazing Alternative:** This alternative would not authorize livestock grazing on the public land portion of the Cottonwood Creek Allotment.

ALTERNATIVES CONSIDERED BUT NOT CARRIED FORWARD:

PLAN CONFORMANCE REVIEW:

Name of Plan: Royal Gorge Resource Management Plan

Date Approved: 05/13/96

Decision Number: 6-3, 6-4, 6-6, C-36, C-41, C-42, C-43, C-44

Decision Language:

- 6-3: Livestock grazing will be prioritized based on IAP resolution of conflicts with riparian.
- 6-4: Grazing is authorized on 70 allotments.
- 6-6: Allotments are categorized as 22 Improve and 43 Custodial.
- C-36: Grazing plans will be prepared in consultation, cooperation, and coordination with the permittee.
- C-41: Adjustments in grazing use will be made by allotment on a case by case basis. Changes in number of livestock, season of use, duration of use, and class of livestock can be made based on monitoring studies and inventory data.
- C-42: The grazing treatment on Improve category allotments will require a rest standard to allow a time period for forage species to recover from the last grazing period before plants are re-grazed.
- C-43: Maximum allowable utilization on allotments with dormant season grazing will be 80% annual production on grass species and 60% annual production on shrub species.
- C-44: On single pasture allotments with season long spring/summer grazing, utilization will be held to the 40-60% range on forage species in lieu of a rest standard. This requirement will be on high elevation allotments where deferment or dormant season use is impracticable because of deep snow and fencing the allotment into smaller units is uneconomical.

Standards for Public Land Health: In January 1997, Colorado BLM approved the Standards for Public Land Health. These standards cover upland soils, riparian systems, plant and animal communities, threatened and endangered species, and water quality. Standards describe conditions needed to sustain public land health and relate to all uses of the public lands. Because a standard exists for these five categories, a finding must be made for each of them in an environmental analysis. These findings are located in specific elements listed below.

AFFECTED ENVIRONMENT / ENVIRONMENTAL CONSEQUENCES / MITIGATION MEASURES:

CRITICAL ELEMENTS

AIR QUALITY

**Affected Environment:** Air quality in the area is, generally, good to excellent. Area is largely undeveloped rangeland utilized for forage production. Fugitive dust from vehicle traffic is probably the largest contributor to degraded air quality in the area.

**Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will not result in degradation of air quality in the area. No mitigation is necessary.

Recommended Mitigation Measures:

No Action: This alternative perpetuates the existing condition and will not result in a degradation of air quality. No mitigations are necessary.

Recommended Mitigation Measures:

No Grazing Alternative: NA

Recommended Mitigation Measures:

Cumulative Impacts of the Proposed Action: Geographic scope: None

## CULTURAL RESOURCES

**Affected Environment:** All public land within the Green Mountain Gulch allotment has been inventoried for cultural resources (see report: CR-RG-07-01 P). No sites eligible to the National Register of Historic Places (NRHP) were encountered.

### **Environmental Consequences/Mitigation:**

Proposed Action: No sites eligible to the NRHP will be impacted by the proposed action.

Recommended Mitigation Measures: None

No Action Alternative: No sites eligible to the NRHP will be impacted by the No action Alternative.

Recommended Mitigation Measures: None

No Grazing Alternative: No sites eligible to the NRHP will be impacted.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: Since no sites eligible to the NRHP are present, there will be no cumulative impacts.

## ENVIRONMENTAL JUSTICE

**Affected Environment:** The area of the proposed action is open country with a mixture of Public and private lands.

### **Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will increase riparian vegetation vigor in turn helping prevent sedimentation that will enhance fishing opportunities for minority and low-income residents of Fremont County.

Recommended Mitigation Measures: None

No Action Alternative: This alternative would increase plant vigor the quickest, however, overtime, without the animals harvesting biomass, plant vigor will decrease.



Recommended Mitigation Measures: None

No Grazing Alternative: This alternative, like the no-action alternative, would increase plant vigor the quickest, however, plant vigor will eventually decrease over time.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None

## FARMLANDS, PRIME AND UNIQUE

**Affected Environment:** There are no prime or unique farmlands involved in the proposed action or the alternatives.

### **Environmental Consequences/Mitigation:**

Proposed Action: N/A

Recommended Mitigation Measures: N/A

No Action Alternative: N/A

Recommended Mitigation Measures: N/A

No Grazing Alternative: N/A

Recommended Mitigation Measures: N/A

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: N/A

## FLOODPLAINS, WETLANDS & RIPARIAN ZONES (includes a finding on Standard 2)

**Affected Environment:** Issues affecting Green Gulch are well described in the background section. The stream here is perennial and is capable of a better condition than observed. Primary reasons for overall stream degradation relate to suppressed vegetation caused by excessive grazing utilization and the streams inability to resist flooding. Although the allotment does have substantial upland grazing area, hot season grazing has likely concentrated livestock on the stream resulting in an uneven grazing distribution issue.

### **Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will continue to allow grazing but during a more preferential season and include utilization stipulations to benefit riparian resources. This allotment is well suited for grazing with substantial uplands and good production in those upland areas and the dormant season use will take grazing pressure off of riparian resources. The month of May at that elevation will stimulate plant growth and utilization of riparian areas will begin,

but with the livestock out of the allotment in early June there should be substantial recovery time for plants before severe summer storms hit the area. This use regime will protect the stream and begin to recover the system. If the stipulations in place are followed, this allotment plan will allow for riparian resource recovery under an active grazing scenario.

Recommended Mitigation Measures: Fences in the area will need work to make the proposed action viable and eliminate trespass.

No Action Alternative: Reauthorizing this permit, without changing how the allotment is currently managed will likely not allow riparian resources to recover and move towards meeting BLM's riparian land health standards. It is not recommended that the C category of management be retained for this allotment.

Recommended Mitigation Measures: If no major changes to this allotments management are made, the trespass grazing still needs to be eliminated.

No Grazing Alternative: Not grazing these public lands would also allow for riparian recovery.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: Although this is an isolated parcel of public land, it is large and has valuable stream attributes with good potential for important riparian resources to expand. Surrounding lands are not likely to be protected from subdivision affects. Protecting this parcel through I category grazing management will help offset affects from surrounding subdivision development.

**Finding on the Public Land Health Standard for Riparian Systems:** Riparian resources and not functioning. Changes proposed will move condition in a positive direction.

#### INVASIVE, NON-NATIVE SPECIES

**Affected Environment:** The ecological site involved in the proposed action is prone to invasion by noxious weeds if severe soil surface disturbance occurs.

#### **Environmental Consequences/Mitigation:**

Proposed Action:. There will not be severe soil surface disturbance resulting from this alternative.

Recommended Mitigation Measures: N/A

No Action Alternative: There will not be severe soil surface disturbance resulting from this alternative.

Recommended Mitigation Measures: N/A

No Grazing Alternative:. There will not be severe soil surface disturbance resulting from this alternative.

Recommended Mitigation Measures: N/A

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None

## MIGRATORY BIRDS

**Affected Environment:** Several habitat types are found within the area covered by this EA. At lower elevations the habitat is primarily pinyon/juniper. Open areas of mountain grassland are interspersed throughout the area and mountain shrubs such as currant and mountain mahogany are abundant. Pinyon-juniper habitat supports the largest nesting bird species list of any upland vegetation type in the West. The richness of the pinyon-juniper vegetation type, however, is important due to its middle elevation. Survey tallies in pinyon-juniper are similar in species diversity to the best riparian. Several species are found in the pinyon-juniper habitat and include: black-chinned hummingbird, gray flycatcher, Cassin's kingbird, gray vireo, pinyon jay, juniper titmouse, black-throated gray warbler, Scott's oriole, ash-throated flycatcher, Bewick's wren, mountain chickadee, white-breasted nuthatch, and chipping sparrow.

Ponderosa pine, mixed conifer and mountain shrubland habitats are found at higher elevations. Ponderosa pines are the largest conifers in Colorado and gambel oak is a common component of the understory, typically in a shrubby form. Other common understory shrubs include mountain mahogany and wax currant. Tree species sometimes found mixed with ponderosa pine are junipers, pinyon pine, aspen, white fir, and Douglas-fir. Birds typical of the ponderosa pine forest type include Merriam's turkey, Williamson's sapsucker, pygmy nuthatch, western bluebird, band-tailed pigeon, Grace's warbler, flammulated owl, red-breasted nuthatch, violet-green swallow, western tanager, and chipping sparrow. Higher elevation mixed conifer forests are found on north slopes of the allotment. Also included are small areas of aspen habitat and mountain grassland habitat.

The following birds are listed on the US Fish and Wildlife Service Birds of Conservation Concern (BCC) – 2002 List for BCR 16-Southern Rockies/Colorado Plateau. These species have been identified as species that may be found in the area and have declining populations that should be monitored and protected from habitat alterations.

The golden eagle is a bird of grasslands, shrublands, pinyon-juniper woodlands, and ponderosa pine forests, may occur in most other habitats occasionally, especially in winter. Nests are placed on cliffs and sometimes in trees in rugged areas, and breeding birds range widely over surrounding habitats.

Flammulated owls prefer old-growth or mature ponderosa pine, apparently due to the presence of large broken-top and lightning-damaged snags and trees for nesting cavities, large cavities excavated by northern flickers and other woodpeckers, open structure of trees and understory for foraging, and high prey availability. They will utilize other habitats with similar structure, such

as open mixed-conifer and aspen forests. Key habitat features seem to be the presence of large trees and snags, scattered clusters of shrubs or saplings, clearings, and a high abundance of nocturnal arthropod prey.

Northern harrier's reside throughout Colorado, with highest densities on the eastern plains, mountain parks, and western valleys. These hawks feed on small mammals, birds, reptiles, and amphibians. They hunt by flying low over wetlands, grasslands, shrublands, and croplands.

Peregrine falcons in Colorado breed on cliffs and rock outcrops from 4,500-9000 ft in elevation. They most commonly choose cliffs within pinyon-juniper and ponderosa pine zones. These falcons feed on smaller birds almost exclusively, with white-throated swifts and rock doves being among their favored prey.

Prairie falcons nest in scattered locations throughout the state where they inhabit the grassland and cliff/rock habitat types. These falcons breed on cliffs and rock outcrops, and their diet during the breeding season is a mix of passerines and small mammals.

Williamson's sapsuckers breed in forested regions and in Colorado populations are concentrated along the eastern edge of the Rockies. Williamson's sapsuckers nest primarily in ponderosa pine and in aspen components of mixed-conifer. They often place nest cavities in aspen trees, and often choose nest trees in aspen stands adjacent to open ponderosa pine or mixed-conifer forest.

Gray vireos are pinyon-juniper woodland obligates. Gray vireos usually inhabit stands dominated by juniper or thin stands of pure juniper. They construct nests of dry grasses, plant fibers, stems, and hair, often camouflaging them with sagebrush leaves.

Pinyon jays range the semiarid lands of the West. The Colorado Breeding Bird Atlas map shows them south of a diagonal line drawn from the northwest corner to the southeast corner of the state. Pinyon jays are pinyon and juniper obligates in Colorado and nest commonly at the lower elevations of pinyon-juniper woodlands, often where junipers dominate. A few nest in ponderosa pine. They prefer extensive stands far from high human activity.

Black-throated gray warblers are fairly common summer residents in pinyon-juniper woodlands across the southwestern half of Colorado. Some surveys show these warblers to be the most frequently encountered birds in the pinyon-juniper woodland. Black-throated gray warblers, in Colorado, are pinyon-juniper obligates, preferring tall, dense pinyon-juniper woodlands.

Virginia's warblers in Colorado nest between 5,000-9,000 ft elevation. They breed most abundantly in the western quarter of the state, along the eastern slope foothills, and in the Upper Arkansas River drainage. Virginia's warblers nest in dense shrublands and on scrub-adorned slopes of mesas, foothills, open ravines, and mountain valleys in semiarid country. They use scrubby brush, pinyon-juniper woodland with a well-developed shrubby understory, ravines covered with scrub oak, and dense shrublands--especially Gambel oak. They also breed in open ponderosa pine savannahs that have a dense understory of tall shrubs.

Grace's warblers breed from southwestern Colorado and southern Utah, south through central Arizona, western New Mexico, and into north-central Mexico. Grace's warblers inhabit open ponderosa pine forests with pines 16 ft tall, especially with a shrubby understory, usually gambel oak.

**Environmental Consequences/Mitigation:**

Proposed Action: In order to be in compliance with the Migratory Bird Treaty Act, which requires that BLM avoid actions that “take” migratory birds, it is recommended that any vegetation disturbance be avoided from May 15 thru July 15. This is the breeding and brood rearing season for most Colorado migratory birds. Grazing use at the levels approved in this EA will not result in “take” of migratory birds.

Recommended Mitigation Measures: Monitor use in the riparian area to ensure that riparian vegetation is maintained in a condition that will support migratory bird nesting during the breeding season.

No Action Alternative: The existing situation has resulted in heavy utilization of riparian species along Green Mountain Gulch. Efforts must be undertaken to improve the situation as the current grazing schedule is not meeting land health standards.

Recommended Mitigation Measures: None

No Grazing Alternative: Not renewing the current grazing permit as prescribed by this alternative would remove grazing use on the public land. This in turn would result in an initial increase in plant vigor and litter production. However removing grazing from the land could over time result in an eventual decrease in plant vigor which could negatively impact wildlife habitat.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None

**NATIVE AMERICAN RELIGIOUS CONCERNS**

**Affected Environment:** A literature review was conducted and tribal representatives were contacted to determine if any possible traditional cultural properties or sacred areas are present within the allotment boundaries or if a given tribe has any other concerns with livestock grazing in the allotments.

**Environmental Consequences/Mitigation:**

Proposed Action: After tribal consultation and a review of literature there is no known evidence that suggests the project area holds special significance for Native Americans. The proposed action will therefore have no impact on any traditional cultural properties or sacred areas.

Recommended Mitigation Measures: None necessary

No Action Alternative: After tribal consultation and a review of literature there is no known evidence that suggests the project area holds special significance for Native Americans. The proposed action will therefore have no impact on any traditional cultural properties or sacred areas.

Recommended Mitigation Measures: None necessary

No Grazing Alternative: The no grazing alternative will have no impact on any traditional cultural properties or sacred areas.

Recommended Mitigation Measures: None necessary

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: Since no traditional cultural properties or sacred areas are present, there will be no cumulative impacts.

THREATENED, ENDANGERED, AND SENSITIVE SPECIES (includes a finding on Standard 4)

**Affected Environment**: This Environmental Assessment (EA) analyzes the effects of issuing a grazing permit on threatened, endangered, proposed, candidate, and sensitive species. While sensitive species are not federally protected, it is BLM policy to manage these species to prevent future listing, thereby affording them the same level of protection as Threatened and Endangered (T&E) species in BLM programs. The goshawk is the only species (BLM Sensitive) that may occur in the area.

**Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will help to recover the riparian habitat along Green Mountain Gulch by reducing grazing pressure during the growing season. There will be no impacts to goshawk from the proposed action as the goshawk is a forest bird and would rarely utilize habitat of the type that exists in this allotment. However, improvements to the riparian system over time could provide mature cottonwood forests suitable for goshawk use.

Recommended Mitigation Measures: None

No Action Alternative: The existing situation has resulted in heavy utilization of riparian species along Green Mountain Gulch. Efforts must be undertaken to improve the situation as the current grazing schedule is not meeting land health standards.

Recommended Mitigation Measures: None

No Grazing Alternative: Not renewing the current grazing permit as prescribed by this alternative would remove grazing use on the public land. This in turn would result in an initial increase in plant vigor and litter production. However removing grazing from the land could

over time result in an eventual decrease in plant vigor which could negatively impact wildlife habitat.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None

**Finding on the Public Land Health Standard for Threatened & Endangered species:**

The proposed action will have no impact on public land health standards for Threatened and Endangered Species.

**WASTES, HAZARDOUS OR SOLID**

**Affected Environment:** There is no public access to the public land included in this allotment. There is no known history or dumping in the area.

**Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will not result in the use, storage or disposal of hazardous materials on public lands. No mitigations are necessary.

Recommended Mitigation Measures: None

No Action Alternative: Perpetuates the existing conditions, will not result in the use, storage or disposal of hazardous materials on public lands. No mitigations are necessary.

Recommended Mitigation Measures: None

No Grazing Alternative: NA

Recommended Mitigation Measures:

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope:

**WATER QUALITY, SURFACE AND GROUND (includes a finding on Standard 5)**

**Affected Environment:** The Green Mountain Gulch allotment is tributary to Fernleaf Gulch and the Arkansas River. Water quality in the watershed is generally good and is not identified by the State of Colorado as being water quality limited. Sediment loading due to poor riparian area condition is contributing to elevated sediment levels within the allotment and downstream.

**Environmental Consequences/Mitigation:**

Proposed Action: Sediment production as a result of grazing is the biggest concern from a water quality standpoint. Grazing in the riparian areas containing surface water could lead to bank trampling and increased sediment production. The Proposed Action would leave sufficient forage in the uplands to protect the soils from eroding and contains grazing changes that would improve the condition of riparian vegetation. This would lead to a decrease in sediment loading in area waterways.

Recommended Mitigation Measures: No additional mitigation would be necessary to protect water quality.

No Action Alternative: Under the No Action Alternative, conditions would remain as they currently are and no improvements to water quality or riparian vegetation would occur.

Recommended Mitigation Measures: None

No Grazing Alternative: Under the No Grazing Alternative, cattle grazing would cease and vegetative growth would not be removed on a yearly basis. This would allow for better vegetative buffers limiting sediment entering the streams and decreasing sediment loads. This would improve the water quality over the current situation/Proposed Action.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: The Cottonwood Creek watershed has a fairly high amount of development from low density housing and roads along with livestock grazing. The changes being proposed would add a beneficial improvement to the water quality of the area.

**Finding on the Public Land Health Standard for Water Quality:** Currently, water quality is meeting standards. With the Proposed Action water quality would improve.

**WILDERNESS, AREAS OF CRITICAL ENVIRONMENTAL CONCERN, WILD AND SCENIC RIVERS**

**Affected Environment:** None of the public lands in this area have these special designations.

**Environmental Consequences/Mitigation:**

Proposed Action: No impacts.

Recommended Mitigation Measures: None.

No Action Alternative: No impacts.



Recommended Mitigation Measures: None.

No Grazing Alternative: No impacts.

Recommended Mitigation Measures: None.

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None.

## NON-CRITICAL ELEMENTS

The following elements **must** be addressed due to the involvement of Standards for Public Land Health:

SOILS (includes a finding on Standard 1)

**Affected Environment:** In response to the various detailed soil mapping units covered in this analysis, the general soil descriptions will be described in this analysis. A more detailed description of the soil data associated with this allotment can be located in the NRCS Soil Survey of Fremont County 1995.

The public land portion of allotment consists of the Bushvalley-Ess-Hoodle general soil. The Bushvalley-Ess-Hoodle soils occur between 8,000 and 11,000 feet. The soils are found on the steep to gentle sloping broad and convex slopes separated by steep drainages. The slopes are both forested and open grass parks. The soil depth is dependant on slope where steep slopes are generally associated with shallow soils and gentle slopes are associated with deeper soils. Typically, these soils are well drained, have poor water holding capacity, and soil erosion is rated as high.

**Environmental Consequences/Mitigation:** Due to the high water and wind erosion hazard on these soils, having sufficient and desirable vegetative cover to protect the soil surface during precipitation events and to slow and allow infiltration of runoff is critical.

Proposed Action: The Proposed Action includes target utilization restrictions that will allow sufficient vegetative and litter cover to provide protection to the soil surface during precipitation events and to slow and allow infiltration of runoff. In addition, the majority of grazing use proposed will occur during periods of vegetation dormancy resulting in a vigorous and healthy plant population that will protect the soils. The action also promotes better livestock distribution resulting in less over utilized and compacted areas. In all, the Proposed Action will help the allotment meet standards for upland soil health.

Recommended Mitigation Measures: See vegetation section.

No Action Alternative: Under current management, there is no restriction on numbers of livestock or when livestock can graze public lands and terms and conditions are limited under the current permit. Under the current resource conditions, management may not

provide sufficient vegetative cover to protect the soil surface during precipitation events and to slow and allow infiltration of runoff. The long term effects could result in an unhealthy vegetation community, which would be less resistant to soil erosion and not meeting public land health standards.

Recommended Mitigation Measures:

No Grazing Alternative: The vegetation portion of this analysis indicates that, under no grazing, a lack of livestock grazing use on some of the sites may result in an eventual decrease in the amount of vegetative and litter cover. This would reduce the vegetative cover that is necessary to protect the soil surface during precipitation events and to slow and allow infiltration of runoff.

Recommended Mitigation Measures: Monitor for livestock trespass.

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: Refer to the cumulative impacts related to the Vegetation and Range Management portions of this analysis.

**Finding on the Public Land Health Standard for Upland Soils:** As stated in the Background section, the allotment was assessed as to whether it was meeting Standards for Public Land Health (including Standard 1 related to Upland Soils). In general, Standard 1 is assessed based on the departure from the Ecological Site Description or Reference Area of the following indicators: rills, water flow patterns, pedestals and/or terraces, gullies, wind scoured or blown out areas, litter movement, resistance to erosion, soil loss, plant community composition relative to infiltration and runoff, and soil compaction. The allotment was determined to be meeting Standard 1.

VEGETATION (includes a finding on Standard 3)

**Affected Environment:** The elevation of the analysis area ranges from 8,500 to 10,000 feet. The growing season on this allotment is generally between the months of late May through early September. Precipitation records indicate that July and August in this area are the wettest months of the year as well as the warmest. The combination of available moisture and warm temperatures tend to provide July and August with the most favorable conditions for plant growth during the year.

The allotment consists of a mixture of grassland parks and a woodland forest. The range sites are Shallow Pine, Dry Shallow Pine, Loamy Park, and Skeletal Loam. The Shallow Loam site dominates the allotment and consists of Mountain Muhly, Arizona Fescue, Parry Oatgrass, Muttongrass, Pine Dropseed, Western Wheatgrass, Geranium, Gambel Oak, Current, and Mountain Mahogany. The site is grass dominated with Ponderosa Pine and Pinyon occurring intermittently. The Dry Shallow Pine is an open grassland park intermixed with pine. The dominant vegetation includes Mountain Muhly, Arizona Fescue, Needle-and-thread, Pine Dropseed, Gambel Oak, Pinyon and Ponderosa Pine.

The Loamy Park range site is dominated by bunchgrasses consisting of Arizona fescue, Mountain Muhly, and Parry Oatgrass. Various shrubs and forbs may also occupy the site as a minor component. The average annual productivity on this site is 1500 lbs ac/year.

The Skeletal Loam range site consists of Parry Oatgrass, Arizona fescue, Parry Junegrass, Mountain Muhly, Elk Sedge, and Bottlebrush Squirrel tail. Forbs and shrubs may include Cinquefoil, Geraniums, Penstium, Asters, Rabbitbrush, Snakeweed, and Fringed Sage. The average annual productivity on this site is 1000 lbs ac/year and the basal area of perennial vegetation is approximately 20%.

On this allotment, a majority of the public land consists of steep slopes, which limits the amount of livestock grazing. The grassland sites are susceptible to ecological retrogression through season long and heavy utilization grazing. Under this scenario, the more desirable grass species will decrease and be replaced with less desirable plant species.

### **Environmental Consequences/Mitigation:**

Proposed Action: The Proposed Action defers grazing use during a majority of the growing season and provides terms & conditions that help promote even utilization on the allotment. The action meets the physiological needs of plant species and will promote seed dissemination and seedling establishment on the allotment. The action also upgrades the allotment from a Custodial to Improve management category, which will prioritize resource issues. Under the Proposed Action, the grazing schedule and terms & conditions will help the allotment meet the Guidelines for Livestock Grazing Management in Colorado and Standards for Public Land Health.

Recommended Mitigation Measures: Monitor for compliance of the new schedule and terms & conditions. Also, monitor for any unauthorized grazing use.

No Action Alternative: Under current management, grazing use is not restricted to cattle numbers or season of use and may not allow for full recovery of plant species during the growing season. More over, sufficient terms & conditions on the permit do not exist that would promote even livestock distribution resulting in sufficient vegetative cover to protect the soil surface during precipitation events and to slow and allow infiltration of runoff. The long term effects of this alternative could result in an unhealthy vegetation community, which would be less resistant to soil erosion and not allow the allotment meet vegetation health standards.

Recommended Mitigation Measures: None

No Grazing Alternative: Not renewing the current grazing permit as prescribed by this alternative would remove grazing use on the public land. This in turn would result in an initial increase in plant vigor and litter production. However, precipitation in this area is fairly low (approximately 11 - 15 inches). Due to these dry conditions, decomposition of litter and “standing dead” plant material is relatively slow and the return of nutrients from these materials to the soil is therefore also slow. Livestock grazing, when managed properly, tends to harvest plant biomass and return a higher portion of the nutrients to the soil (and more quickly) than

allowing the plant to decompose without grazing use. Furthermore, harvesting a portion of a plant's biomass, when done properly, tends to stimulate new growth and improve plant vigor. The effect of livestock hooves also tends to break up soil crusts and improve the soil surface as a seed bed for plant reproduction. Therefore, a lack of periodic grazing use in this area could result in an eventual decrease in plant vigor, and the amount of vegetative and litter cover. This alternative would initially increase plant vigor and litter production but would eventually result in movement away from applicable standards.

Recommended Mitigation Measures: Monitor for livestock trespass.

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: The geographic scope of the Proposed Action occurs within the Royal Gorge Watershed. The watershed includes approximately 63,000 acres of public land administered by BLM, 3,200 acres of land administered by the USFS, 4,480 acres of state land, and 140,000 acres of private land. Grazing use by domestic livestock occurs on over 55,000 acres of the public land within the area. Livestock grazing and other activities such as mining and logging have historically been present in the area for at least a hundred years. Furthermore, recreation has increased in popularity resulting in more road and trail densities. All of these factors are cumulative impacts to vegetation in the area. Under the Proposed Action, the grazing permit will be renewed for ten years allowing livestock grazing to continue with the same or less overall impacts to vegetation. The allotment will be re-evaluated in ten years.

#### **Finding on the Public Land Health Standard for Plant and Animal Communities**

(partial, see also Wildlife, Aquatic and Wildlife, Terrestrial): As stated in the Background section of this analysis, the allotment has undergone a formal Public Land Health Assessment in 2007. It was determined that the allotment was not meeting all standards applicable to livestock grazing under current management.

WILDLIFE, AQUATIC (includes a finding on Standard 3)

**Affected Environment:** Green Mountain Gulch is tributary to Fernleaf Gulch and the Arkansas River. The stream system is small, but is many miles long and flows through a lot of public land in an area with few waterways, e.g. Badger Creek to the west, East Gulch to the east, but little else. Green Mountain Gulch makes up a portion of the headwaters for this system. As discussed in the Floodplain section, the riparian resources are not meeting standards thus minimizing the aquatic habitat values.

#### **Environmental Consequences/Mitigation:**

Proposed Action: The proposed action will continue to allow grazing but during a more preferential season and include utilization stipulations to benefit riparian resources. Improved riparian resources will improve the aquatic habitat. This allotment is well suited for grazing with substantial uplands and good production in those upland areas and the dormant season use will take grazing pressure off of riparian resources. The month of May at that elevation will stimulate plant growth and there will begin to be use in riparian areas, but with the livestock out of the allotment in early June there should be substantial recovery time for plants before severe

summer storms hit the area. This will protect the streambanks and begin to recover the system. If the stipulations in place are followed, this allotment plan will allow for riparian resource recovery under an active grazing scenario.

Recommended Mitigation Measures: Fences in the area will need work to make the proposed action viable and eliminate trespass.

No Action Alternative: Reauthorizing this permit without changing how the allotment is currently managed will not allow riparian resources to recover and move towards meeting BLM's riparian land health standards. It is not recommended that the C category of management be retained for this allotment.

Recommended Mitigation Measures: If no major changes to this allotments management are made, the trespass grazing still needs to be eliminated.

No Grazing Alternative: Not grazing these public lands would also allow for riparian recovery.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: Although this is an isolated parcel of public land, it is large and has valuable stream attributes with good potential for important riparian resources to expand. Surrounding lands are not likely to be protected from subdivision affects. Protecting this parcel through I category grazing management will help offset affects from surrounding subdivision and development.

**Finding on the Public Land Health Standard for Plant and Animal Communities** (partial, see also Vegetation and Wildlife, Terrestrial): Riparian resources and not functioning. Specific aquatic habitat inventories have not been conducted, but changes proposed will move riparian condition in a positive direction and variables indicating improved aquatic habitat will develop.

WILDLIFE, TERRESTRIAL (includes a finding on Standard 3)

**Affected Environment:** Several habitat types are found within the area covered by this EA. At lower elevations the habitat is primarily pinyon/juniper. Open areas of mountain grassland are interspersed throughout the area and mountain shrubs such as currant and mountain mahogany are abundant. Ponderosa pine, mixed conifer and mountain shrubland habitats are found at higher elevations. Other common understory shrubs include mountain mahogany and wax currant. Tree species sometimes found mixed with ponderosa pine are junipers, pinyon pine, aspen, white fir, and Douglas-fir. Higher elevation mixed conifer forests are found on north slopes of the allotment. Douglas fir is the primary tree species found at higher elevations. Also included are small areas of aspen habitat and mountain grassland habitat. The allotment provides habitat for mule deer, elk, mountain lion, coyote, black bear, turkey and a wide variety of smaller birds and mammals.

**Environmental Consequences/Mitigation:**

Proposed Action: The proposed action continues to defer grazing use during a majority of the growing season and strives to improve the riparian vegetation along Green Mountain Gulch. The action meets the physiological needs of plant species and will promote seed dissemination and seedling establishment on the allotment. Maintaining and improving vegetative conditions on the allotment will benefit wildlife by providing quality browse and forage for ungulate species.

Recommended Mitigation Measures: Monitor utilization of the riparian vegetation along Green Mountain Gulch

No Action Alternative: The existing situation has resulted in heavy utilization of riparian species along Green Mountain Gulch. Efforts must be undertaken to improve the situation as the current grazing schedule is not meeting land health standards.

Recommended Mitigation Measures: None

No Grazing Alternative: Not renewing the current grazing permit as prescribed by this alternative would remove grazing use on the public land. This in turn would result in an initial increase in plant vigor and litter production. However removing grazing from the land could over time result in an eventual decrease in plant vigor which could negatively impact wildlife habitat.

Recommended Mitigation Measures: None

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: None

**Finding on the Public Land Health Standard for Plant and Animal Communities** (partial, see also Vegetation and Wildlife, Aquatic): The proposed action will have no adverse affect on the public land health standard for Plant and Animal communities.

OTHER NON-CRITICAL ELEMENTS: For the following elements, those brought forward for analysis will be formatted as shown above.

Non-Critical Element	NA or Not Present	Applicable or Present, No Impact	Applicable & Present and Brought Forward for Analysis
Cadastral Survey		X	
Fire		X	
Forest Management		X	
Geology and Minerals		X	
Hydrology/Water Rights		X	
Law Enforcement	X		
Paleontology	X		
Noise	X		
Range Management			X

Realty Authorizations		X	
Recreation	X		
Socio-Economics		X	
Transportation & Access	X		
Visual Resources		X	

## RANGE MANAGEMENT

**Affected Environment:** The Green Mountain Gulch Allotment encompasses 913 acres of public land. A significant amount of private land is unfenced from the public portion however, topography limits livestock movement from BLM and private. In addition to poor distribution on the allotment, there is an issue with other livestock trespass onto the allotment during the growing season. Most trespass is occurring from adjacent landowners and not the permittee. The greatest need is more BLM compliance of the area, which is difficult due to the lack of access. Currently, there is no public access to the allotment. The only access is from the north traveling through Jane Reeds property who generally does not allow BLM access. Another access route is from the west along the power line road. Contacts are needed to attain access for monitoring livestock trespass

### **Environmental Consequences/Mitigation:**

Proposed Action: The Proposed Action upgrades the allotment from a “Custodial” to an “Improve” category allotment which prioritizes management on the allotment. The Proposed Action also promotes even livestock use by moving salt and mineral locations on a frequent basis and keeping these away from water sources. These actions assure sufficient residual vegetation to protect soil from wind and water erosion and allow adequate seed dissemination and seedling establishment as well as comply with applicable BLM land use plans. The Proposed Action helps ensure that grazing use on the allotment comply with Guidelines for Livestock Grazing Management in Colorado.

Recommended Mitigation Measures: Request and attempt to gain better access into allotment to monitor for livestock trespass.

No Action Alternative: Under the no action alternative, grazing use will remain as currently scheduled. No new terms & conditions would be applied to the new grazing permit. The current use lacks the required stipulations and actions to promote livestock distribution. The management category would remain as “Custodial” and not include a restrictive season of use.

Recommended Mitigation Measures: Monitor use on riparian areas and trespass.

No Grazing Alternative: There would be economic impacts experienced by the permittee due to the loss of pasture under this alternative. Based on the permittees’ anticipated need to provide additional pasture to make up for the loss of public land grazing use, the permittee could be expected to experience additional cost annually under this alternative. When compared to the estimated public land carrying capacity for the allotment (58 AUMs), the additional annual cost

to the permittee would be \$841. This estimate is based on the estimated private land lease rate in Colorado as estimated by BLM (\$14.50 per AUM).

Recommended Mitigation Measures: Monitor for livestock trespass.

Cumulative Impacts of the Proposed Action: Geographic scope; Time Scope: The Proposed Action occurs within the Royal Gorge Watershed. The watershed includes approximately 63,000 acres of public land administered by BLM, 3,200 acres of land administered by the USFS, 4,480 acres of state land, and 140,000 acres of private land. Within this area, BLM manages approximately 25 grazing allotments, totaling approximately 55,000 acres of public land. Grazing use takes place on much of the private and state lands within the watershed as well. Generally, BLM grazing management is more intensive than management of the surrounding private and state lands and takes other resource values, such as wildlife, cultural, soils, vegetative and riparian on the public land into account to a greater degree. The proposed action on this allotment, as well as almost all of the other BLM allotments currently being evaluated for renewal within the same watershed, include new or additional protection for vegetative, soils, cultural and riparian values. Therefore, the impacts of the proposed action on this allotment, together with those of other similar BLM actions within the watershed, will be an improvement in the protection of other resource values on public land.

CUMULATIVE IMPACTS SUMMARY: Other potential impacts to the watershed include housing development, roads, trails, and recreation. There are also other BLM grazing allotments in the adjacent area. Some of the uses have been occurring over the last 100 or more years. The Proposed Action renews the grazing permit for 10 years. During the 10 year period of the permit, additional cumulative impacts in response to livestock grazing are anticipated to be slight to none, provided the proposed action is followed.

INTERDISCIPLINARY REVIEW:

<u>Name</u>	<u>Title</u>	<u>Area of Responsibility</u>
Debbie Bellew	Land Law Examiner	Realty
Keith Berger	Range Management Spec.	Range, Vegetation
Erik Brekke	Wildlife Biologist	Wildlife, T&E, Migratory Birds
Natalee Czarnota	Realty Specialist (SCEP)	Realty
Mike Gaylord	Fire Mit./Educ. Spec.	Air, Hazardous Materials
Dave Gilbert	Fisheries Biologist	Aquatic Wildlife, Riparian/Wetlands
Ernie Gillingham	Surface Reclamation Spec.	Soils
Dan Grenard	Geologist	Minerals, Paleontology
Tom Grette	Range Management Spec.	Range, Vegetation, Farmland, Weeds
Jack Hagan	Law Enforcement Ranger	Law Enforcement
Tony Mule'	Cadastral Surveyor	Cadastral Survey
John Nahomenuk	River Manager	Recreation, Wilderness, Visual, ACEC
Leah Quesenberry	Outdoor Recreation Planner	Recreation, Wilderness, Visual, ACEC
Ken Reed	Forester	Forestry



Ed Skerjanec	Fire Management Officer	Fire
John Smeins	Hydrologist	Hydrology, Water Quality/Rights
Melissa Smeins	Geologist	Minerals, Paleontology
Dave Toelle	Fire Ecologist	Air, Vegetation
Martin Weimer	Archaeologist	Cultural, Native American
Monica Weimer	Archaeologist	Cultural, Native American
Jeff Williams	Range Management Spec.	Range, Vegetation

# FONSI

## CO-200-2008-0098 EA

Based on review of the EA and the supporting documents, I have determined that the project is not a major federal action and will not have a significant effect on the quality of the human environment, individually or cumulatively with other actions in the general area. No environmental effects from any alternative assessed or evaluated meet the definition of significance in context or intensity, as defined by 43 CFR 1508.27. Therefore, an environmental impact statement is not required. This finding is based on the context and intensity of the project as described below:

### RATIONALE:

#### Context

This grazing allotment proposal is located north of the Arkansas River and US Highway 50 and west of Highway 9 in the lower reaches of Green Mountain Gulch. South of this allotment Green Mountain Gulch merges with Long Gulch eventually becoming Fernleaf Gulch before entering the Arkansas River. The Arkansas River provides drinking water and irrigation water for a large portion of south eastern Colorado. Given the importance of the Arkansas River to this area of Colorado any impacts from BLM allotment management decisions must be considered on a regional scale.

#### Intensity

The proposed action will change the allotment management status from custodial to intensive management. The proposed intensive management prescription will require the permittee to move cattle and install fencing to prevent further riparian degradation and trespass. The proposed protection of vegetation riparian and trespass elimination will help decrease sedimentation, which will benefit the environment and public drinking water supplies in south eastern Colorado.

The proposed action is being chosen because it manages cattle to promote the growth of riparian vegetation which will help prevent sedimentation of Green Mountain gulch. Green Mountain Gulch is a tributary to the Arkansas River a major source of drinking and irrigation water for southeastern Colorado. Given that, the proposed action will be beneficial to public health and safety.

There are none of the following unique characteristics in the geographic area of the allotment renewal: prime or unique farmlands, wild and scenic rivers, designated wilderness areas and/or wilderness study areas, or areas of critical environmental concern.

The proposed action is the chosen alternative because it will enhance vegetation in the allotment and prevent trespass; therefore, the effects from this alternative will be uncontroversial.

The management of cattle grazing on public lands is one part of the multi-use mandate given to BLM by congress under FLMPA. Considering the aforementioned congressional mandate and

the long standing history of BLM's management of grazing activity on public lands, all affects from this proposal are understood and do not involve any unknown or unique risks.

The proposed action is being selected because it does set precedent for future actions, however, those future actions, if based on this action, would have less impact just as this action does.

The proposed action is not related to other actions with cumulatively significant impacts.

A through literature review followed by correspondence with affected tribal organizations produced no known evidence that suggests the project area holds special significance for Native Americans. A survey of the area did not reveal any properties listed or eligible for listing on the National Register of Historic Places. During project analysis no scientifically significant resources were found in the project area.

No threatened or endangered species were found in the project area; therefore the proposal does not affect any of these species.

The proposed project does not violate or threaten to violate any Federal, state, or local law or requirement imposed of the protection of the environment.

NAME OF PREPARER: Jeff Williams

SUPERVISORY REVIEW: Paul Trentzsch /S/ 08-18-2008

NAME OF ENVIRONMENTAL COORDINATOR: John Dow

DATE: 08/18/2008

SIGNATURE OF AUTHORIZED OFFICIAL:     /s/ Roy Masinton  
Roy L. Masinton, Field Manager

DATE SIGNED: 08/19/2008

This signature acknowledges a finding of no significant impact. However, this is not a decision determining a selection of an alternative.