

U.S. Department of the Interior  
 Bureau of Land Management  
 White River Field Office  
 73544 Hwy 64  
 Meeker, CO 81641

## ENVIRONMENTAL ASSESSMENT

**NUMBER:** CO-110-2005-06-EA

**CASEFILE/PROJECT NUMBER** (optional): Horse Draw Allotment (06332)  
 --- Baking Powder Pasture  
 Red Wash Allotment (06320)

**PROJECT NAME:** Grazing Permit Renewal for Villard Ranch (0501444)

**LEGAL DESCRIPTION:**

Allotment					Legal Description		
No.	Name	BLM Acres	Private Acres	State Acres	Township	Range	Section(s)/Lot(s) Or Portions of:
06320	Red Wash	8239	0	0	3 N.	101W.	22, 23, 24, 27, 26, 25, 35, 36
						100W.	19, 20, 21, 30, 29, 31
					2 N.	101W.	1, 12
						100W.	6, 7
06332	Horse Draw*	3939	0	0	4 N.	99W.	16, 15, 20, 21, 22, 23, 29, 28, 27, 26, 32, 33, 34, & 35
					3 N.	99W.	4, 3, 2

\*Baking Powder Pasture

**APPLICANT:** Villard Ranch (0501444)

**DESCRIPTION OF PROPOSED ACTION AND ALTERNATIVES:**

**Background/Introduction:** The grazing permit held by Villard Ranches (0501444) expired on 01/02/02 and was reissued under the Appropriations Rider in accordance with Section 328, title 3, division F of House Joint Resolution 2. The grazing permit was issued under the Appropriations Rider because no work had been completed in accordance to the National Environmental Policy Act (NEPA), which analyzes the environmental impacts of the issued permit. This Environmental Assessment (EA) will serve in meeting NEPA requirements.

The Red Wash allotment is situated south of where the Red Wash drainage departs through Coal Ridge. The allotment is divided lengthwise by the Red Wash drainage from north to south and consists of a gently sloping terrain with a southern gradient. The elevation ranges from 6044 feet in the northeastern portion of the allotment to 5444 feet in the southern part. Natural impediments of Coal Ridge form the northern boundary of the Red Wash Allotment at approximately the Moffat and Rio Blanco county line. The majority of the allotment is located in Rio Blanco County. Private lands along the White River form the southern boundary and fence lines consist of the eastern and western boundaries of the allotment.

All mentioning of the Horse Draw allotment will be in reference to the Baking Powder Pasture of the Horse Draw allotment, unless otherwise noted. The Horse Draw allotment is located south of highway 40, with the Middle Fork of Wolf Creek drainage forming the western boundary, and Wagon Ridge forming the eastern boundary. A Rangeline agreement with Three Springs Ranch (sheep) extends the eastern boundary to the East Fork of Wolf Creek, abutting the Upper Coal Creek Allotment. The west and south boundaries of the Allotment are unfenced. Ridgelines in the pasture contour in a north / south direction with moderate slopes descending east toward the East Fork Wolf Creek, and slopes descending west toward the Middle Fork Wolf Creek; with all major drainages flowing southerly. Elevations of the allotment range from 5880 feet in the northern portion of the allotment to 5600 feet in the southern part.

Grazing allotments within the Bureau of Land Management’s (BLM) White River Field Office (WRFO) have been placed in one of three management categories that define the intensity of management: (1) improve, (2) custodial and (3) maintain. These categories broadly define rangeland management objectives in response to an analysis of an allotment’s resource characteristics, potential, opportunities, and needs.

Allotment Categorization for allotments analyzed in this permit renewal:

- Red Wash – Improve
- Horse Draw – Improve

**A: Proposed Action:** The grazing permit would be renewed for a term of 3 full grazing years, which expires on 01/02/08, as outlined in the table below. The term of the grazing permit coincides with the term of the base property lease held by Villard Ranch. Grazing on the Red Wash and Horse Draw (Baking Powder pasture) allotments would be authorized according to the following schedules that were applied for by Villard Ranch on their *Application for Grazing Permit Renewal* form signed and dated on 12/01/04, which is based upon the carrying capacity of the rangelands.

Proposed Grazing Permit 0501444 --Villard Ranch										
Allot. #	Allot. Name	Livestock		Begin	End	% PL	AUMs	Active AUMs	Susp. AUMs	Total AUMs
		#	Kind							
06320	Red Wash	1600	Sheep	01/25	02/28	100	368	799	0	799
		1600	Sheep	03/01	04/10	100	431			
06332	Horse Draw	1600	Sheep	12/13	01/24	100	452	452	0	452

The above table's AUMs are in part derived from a forage analysis (see Rangeland section) based upon ecological site production in consideration of the season of use (winter/early spring). Also, this figure is a reflection of the rangeland's carrying capacity based upon conditions of the ecological and vegetation communities.

**Grazing Permit Terms and Conditions** The following terms and conditions as required by 43 CFR 4130.3 would be included in the grazing permit issued under this alternative:

1. Grazing use must be applied for prior to the grazing period using a *Grazing Application* form. This *Grazing Application* must be approved by the BLM each year before livestock are authorized.
2. It is unlawful for the permittee, agents or employees to knowingly disturb or collect cultural, historical or paleontological materials on public lands. If cultural, historical or paleontological materials are found, including human remains, funerary items or objects of cultural patrimony. The permittee is to stop activities that might disturb such materials, and notify the authorized officer immediately.
3. No grazing use can be authorized under this grazing permit/lease during any period of delinquency in the payment of amounts due in settlement for unauthorized grazing use.
4. Grazing use authorized under this grazing permit/lessee may be suspended, in whole or in part, for violation by the permittee/lessee of any of the provisions of the rules or regulations now or hereafter approved by the Secretary of the Interior.
5. This grazing permit/lease is subject to cancellation, in whole or in part, at any time because of:
  - a. Noncompliance by the permittee/lessee with rules and regulations now or hereafter approved by the Secretary of the Interior.
  - b. Loss of control by the permittee/lessee of all or a part of the property upon which it is based.
  - c. A transfer of grazing preference by the permittee/lessee to another party.
  - d. A decrease in the lands administered by the Bureau of Land Management within the allotment(s) described herein.
  - e. Repeated willful unauthorized grazing use
6. This grazing permit/lease is subject to the provisions of executive Order NO. 11246 of September 24, 1965, as amended, which sets forth nondiscrimination clauses. A copy of this order may be obtained from the authorized officer.
7. The permittee/lessee must own or control and be responsible for the management of the livestock authorized to graze under this grazing permit/lease.
8. The authorized officer may require counting and/or additional or special marking or tagging of the livestock authorized to graze under this grazing permit/lease.

9. The permittee's/lessee's grazing case file is available for public inspection as required by the Freedom of Information Act.

10. In order to improve livestock distribution on the public lands, all salt blocks and/or mineral supplements will not be placed within a 1/4 mile of any riparian area, wet meadow, or watering facility (either permanent or temporary) unless stipulated through a written agreement or decision in accordance with 43 CFR 4130.3-2(c).

11. In accordance with 43 CFR 4130.8-1(F): Failure to pay grazing bills within 15 days of the due date specified in the bill shall result in a late fee assessment. Payment made later than 15 days after the due date, shall include the appropriate late fee assessment. Failure to make payment within 30 days may be a violation of 43 CFR Sec. 4140.1(b) (1) and shall result in action by the authorized officer under 43 CFR Secs 4150.1 and 4160.1-2 (Trespass).

**B: Continuation of Current Management Alternative (No Action):** Re-issuance of Villard Ranch's current grazing permits (no changes) for a 3 grazing year period as outlined below. The term of the grazing permit (3 years) coincides with the term of the base property lease held by Villard Ranch.

Current Permitted Use – Villard Ranch -- Grazing Permit 0501444										
Allot. #	Allot. Name	Livestock		Begin	End	% PL	AUMs	Active AUMs	Susp. AUMs	Total AUMs
		#	Kind							
06320	Red Wash	1692	Sheep	01/25	02/28	100	401	880	219	1099
		1692	Sheep	03/01	04/12	100	478			
06332	Horse Draw	1600	Sheep	12/09	01/24	100	495	495	105	600

**C: No Grazing Alternative:** No livestock will be authorized on the current permitted allotments, thus Villard Ranch's existing grazing permit (0501444) would not be reissued.

**ALTERNATIVES CONSIDERED BUT NOT CARRIED FORWARD:** None

**NEED FOR THE ACTION:** The base property lease agreement between Clair H. & Albert P. Villard (lessors) and Melody & Albert F. Villard (lessees, Villard Ranch) that is attached to the Grazing Permit (051444) expired on 01/02/03. Thus the Grazing Permit also expired and was renewed under the Appropriation Rider as no work was completed in accordance with NEPA at that time. This Grazing Permit authorizes livestock grazing on the Red Wash Allotment (06320) and the Baking Powder Pasture of the Horse Draw Allotment (06332). The base property lease has been renewed for the period covering 01/03/03 through 01/02/08.

Grazing Permits are subject to renewal at the discretion of the Secretary of the Interior for a maximum period of 10 years. The BLM has the authority to renew the livestock Grazing Permits/Leases consistent with the provisions of the *Taylor Grazing Act, Public Rangelands*

*Improvement Act, Federal Land Policy and Management Act, and the White River Resource Area Resource Management Plan (RMP). This Plan has been amended by the Standards for Public Land Health in Colorado.*

In order to graze livestock on public land, the livestock operator (permittee) must hold a grazing permit/lease. The grazing permittee who holds the Grazing Permit has a preference right to receive the permit/lease after renewal if grazing is to continue. The RMP allows for livestock grazing to continue.

**PLAN CONFORMANCE REVIEW:** The Proposed Action is subject to and has been reviewed for conformance with the following plan (43 CFR 1610.5, BLM 1617.3):

Name of Plan: White River Record of Decision and Approved Resource Management Plan (ROD/RMP).

Date Approved: July 1, 1997

Decision Number/Page: 2-10, 2-22 through 2-26

Decision Language: “Sustain a landscape composed of plant community mosaics that represent successional stages and distribution patterns that are consistent with natural and regeneration regimes, and compatible with the goals identified in Standard Three of the Standards for Public Land Health” (2-10). Also, as stated on page 2-10, the objective of the livestock management program is to improve the rangeland forage resources by managing toward or at a desired plant community (potential natural plant community).

“Maintain or enhance a healthy rangeland vegetative composition and species diversity, capable of supplying forage at a sustained yield to meet the demand for livestock grazing. Provide for adequate forage plant growth and/or regrowth opportunity necessary to : 1) replenish the plants food reserves; and 2) produce sufficient seed to meet the reproduction needs necessary to maintain an ecological presence in the plant community ” (2-22 through 2-23).

**COMPLIANCE WITH SECTION 302 OF FLPMA RELATIVE TO THE COMB WASH GRAZING DECISION:** A review of applicable planning documents and a thoughtful consideration of the new issues and new demands for the use of the public lands involved with these allotments have been made. This analysis concludes that the current multiple use allocation of resources is appropriate.

**AFFECTED ENVIRONMENT / ENVIRONMENTAL CONSEQUENCES / MITIGATION MEASURES:**

**STANDARDS FOR PUBLIC LAND HEALTH:** In January 1997, Colorado Bureau of Land Management (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:

<b>STANDARDS FOR PUBLIC LAND HEALTH</b>							
	<b>Current Situation</b>			<b>With Proposed Action</b>		<b>With No Grazing</b>	
<b>Standard</b>	<b>Acres Achieving or Moving Towards Achieving</b>	<b>Acres Not Achieving</b>	<b>Causative Factors</b>	<b>Acres Achieving or Moving Towards Achieving</b>	<b>Acres Not Achieving</b>	<b>Acres Achieving or Moving Towards Achieving</b>	<b>Acres Not Achieving</b>
<b>#1-Upland Soils</b>							
Red Wash 06320	6881	1358	Historical grazing practices, drought, grazing use near facilities / water, failed improvements (seedings), sheep bed grounds. (Altered ground cover-cheatgrass)	6941	1298	6981	1258
Horse Draw 06332	3737	203	Historical grazing practices, historic trailing use (Victory Trail), bed grounds. (Altered ground cover-cheatgrass)	3752	188	3762	178
<b>#2-Riparian Systems</b>							
Red Wash 06320	5.7	0		5.7	0	5.7	0
Horse Draw 06332	0	0		0	0	0	0
<b>#3-Plant Communities</b>							
Red Wash 06320	6881	1358	Historical grazing practices, drought, grazing use near facilities / water, failed improvements (seedings), sheep bed grounds. (Cheatgrass dominance)	6941	1298	6981	1258
Horse Draw 06332	3737	203	Historical grazing practices, historic trailing use (Victory Trail), bed grounds. (Cheatgrass dominance)	3752	188	3762	178
<b>#3-Animal Communities</b>							
Red Wash 06320	6881	1358	Low percentage perennial grasses and forbs in ground cover composition, low ground cover density	6881	1358	6881	1358

STANDARDS FOR PUBLIC LAND HEALTH							
Standard	Current Situation			With Proposed Action		With No Grazing	
	Acres Achieving or Moving Towards Achieving	Acres Not Achieving	Causative Factors	Acres Achieving or Moving Towards Achieving	Acres Not Achieving	Acres Achieving or Moving Towards Achieving	Acres Not Achieving
Horse Draw 06332	3737	203	Low percentage perennial grasses and forbs in ground cover composition, low ground cover density	3737	203	3737	203
<b>#4-Special Status, T&amp;E Species</b>							
Red Wash 06320	8239	0	No apparent consequence of high percentage of introduced annuals in ground cover composition for prairie dogs and their associates	8239	0	8239	0
Horse Draw 06332	3940	0	No apparent consequence of high percentage of introduced annuals in ground cover composition for prairie dogs and their associates	3940	0	3940	0
<b>#5-Water Quality</b>							
Red Wash 06320	6881	1358	Historical grazing practices, drought, grazing use near facilities / water, failed improvements (seedings), sheep bed grounds. (Altered ground cover-cheatgrass)	6941	1298	6981	1258
Horse Draw 06332	3737	203	Historical grazing practices, historic trailing use (Victory Trail), bed grounds. (Altered ground cover-cheatgrass)	3752	188	3762	178

## **CRITICAL ELEMENTS**

### **AIR QUALITY**

*Affected Environment:* The entire White River Resource Area has been designated as either attainment or unclassified for all pollutants, and most of the area has been designated prevention of significant deterioration (PSD) class II.

*Environmental Consequences of the Proposed Action:* The grazing management plan would not affect air quality. Impacts to air quality from livestock grazing are not anticipated.

*Environmental Consequences of continuation of Current Management:* Impacts are not anticipated from the current management alternative.

*Environmental Consequences of the No Grazing Alternative:* None

*Mitigation:* None

## **CULTURAL RESOURCES**

*Affected Environment:* A pre-field search indicates that the only recorded cultural resource on Horse Draw Pasture is on private land. There are no recorded sites on Red Wash. A Class III pedestrian inventory was conducted on approximately 150 acres of land at random on both the Horse Draw and Red Wash Pastures. No cultural resources were found.

*Environmental Consequences of the Proposed Action:* Impacts from the proposed action are not anticipated.

*Environmental Consequences of the Continuation of Current Management Alternative:* Impacts from the continuation of current management alternative are not anticipated.

*Environmental Consequences of the No Grazing Alternative:* Impacts from the no-grazing alternative are not anticipated.

*Mitigation:* None.

## **INVASIVE, NON-NATIVE SPECIES**

*Affected Environment:* Known infestations of noxious weeds within the Red Wash allotment occur at Cactus Reservoir, with isolated plants of Russian knapweed (*Acroptilon repens*), Canada thistle (*Cirsium arvense*), and musk thistle (*Carduus nutans*), which have been and will continue to be treated chemically. There are no known infestations of noxious weeds within the Baking Powder Pasture of the Horse Draw allotment. White River Field Office policy is to actively control initial outbreaks of noxious weeds, thus preventing spread and lowering long-term control cost. Overall weeds of concern for these areas are the knapweeds, whitetop (*Cardaria draba*), common burdock (*Arctium minus*), and miscellaneous thistles (Canada, bull, and musk thistles). There has been reported perennial pepperweed (*Lepidium latifolium*) at the confluence of Red Wash and the White River (T2N, R101W, Sec 11 SENE), however this area is private land and outside the boundary of the Red Wash allotment.

Cheatgrass (*Bromus tectorum*) is an invasive, annual, and alien plant species that is common throughout the Red Wash allotment on a variety of ecological sites. Ecological site acres not meeting Public Land Health standards can be attributed to the prevalence of cheatgrass within the natural plant community (Red Wash - 1358 acres, Baking Powder – 203 acres). Thus, these



communities have sufficient cheatgrass in the plant composition and insufficient desirable perennial species to maintain a healthy, viable plant community that meets Standards. In these areas, cheatgrass consists of approximately 60-90% of the grass component of the plant community. For a greater analysis of cheatgrass and plants, refer to the Vegetation section of this document.

The majority of acres (low seral rangelands) infected with cheatgrass have crossed a threshold that is irreversible regardless of livestock grazing without some influencing agent such as fire, chemical treatment, and/or seeding of adapted perennial grasses. The apparent causal factors for cheatgrass domination are a result of historic overgrazing, sheep bed grounds, winter-feeding, and current drought conditions. The drought has caused low vigor within the sagebrush community.

*Environmental Consequences of the Proposed Action:* The proposed action's adjusted AUMs and season of use will provide a greater opportunity for the replenishment of root reserves, biomass accumulation, and plant propagation of native species; thereby aiding in the rangeland's ability to naturally compete with invasive, non-native species. This affect would be slight in nature due to the threshold that has been crossed by cheatgrass domination and lack of known noxious weeds. Identified noxious weeds would continue in their current state of absence within the landscape. Grazing permittees are important to the discovery and control of noxious weeds due the permittees on the ground affiliation and knowledge on assigned allotments.

On early seral ecological sites, such as the mono-culture of cheatgrass, the majority of areas are not expected to change in perennial cover because they have crossed a threshold of annual plant domination.

*Environmental Consequences of the Continuation of Current Management Alternative:* Ecological sites (mid seral) that would be potentially affected by grazing would be relatively less resistant to the invasion and proliferation of noxious weeds and/or invasive plants. Identified noxious weeds would continue in their current state of absence within the landscape. Grazing permittees are important to the discovery and control of noxious weeds due the permittees on the ground affiliation and knowledge on assigned allotments.

On early seral ecological sites, such as the mono-culture of cheatgrass, the majority of areas are not expected to change in perennial cover because they have crossed a threshold of annual plant domination.

*Environmental Consequences of the No Grazing Alternative:* A short term increase in both perennial cover and soil surface litter accumulation would occur under a no grazing alternative; thereby aiding in the rangeland's ability to naturally compete with invasive, non-native species. This affect would be slight in nature due to the threshold that has been crossed by cheatgrass domination and lack of known noxious weeds. Identified noxious weeds would continue in their current state of absence within the landscape. There would be no authorized grazing permittee to monitor the rangelands for noxious weed outbreaks.

On early seral ecological sites, such as the mono-culture of cheatgrass, the majority of areas are not expected to change in perennial cover because they have crossed a threshold of annual plant domination.

*Mitigation:* If noxious weeds are identified within the Red Wash and/or Horse Draw allotments and occur on BLM administrated lands, they will be treated by a certified pesticide applicator either by the BLM or permittee. If livestock grazing practices have resulted in the establishment of noxious weeds, the permittee will be responsible for the eradication of these weeds as directed by the BLM.

## **MIGRATORY BIRDS**

*Affected Environment:* An array of migratory birds nest in these allotments' low elevation sagebrush and saltbush communities from early May through early July. Several of these birds have been identified as having higher conservation interest by the Rocky Mountain Bird Observatory, including: loggerhead shrike, sage sparrow, Brewer's sparrow, and horned lark. Loggerhead shrike are regular, but low density breeding species that nest in large greasewood and basin big sagebrush shrubs in the broad incised drainages throughout Wolf Creek and Red Wash. The sparrows are widely distributed and abundant throughout the arid sagebrush and saltbush communities, whereas the lark is common and found on relatively barren annual bottomlands or mat saltbush ridgelines. Small scattered tracts or narrow stands of Utah juniper are found on more prominent ridgelines of the Red Wash allotment and make up about 13% of its area. Junipers are confined to rare single plants on Horse Draw. Avian communities associated with these lower elevation juniper stands are composed more dominantly of Bewick's wren, blue-gray gnatcatcher, and house finch, and lesser numbers of birds with higher conservation interest (e.g., gray vireo, gray flycatcher, juniper titmouse, black-throated gray warbler).

*Environmental Consequences of the Proposed Action:* The proposed action would have no direct influence on migratory bird nesting activities in either allotment. Grazing use (Horse Draw: December-January, Red Wash: January-mid April) would occur predominantly during the winter months prior to the arrival of these birds (December through early March). Although a few birds arrive very early in the spring (i.e., early March: sage sparrow, sage thrasher), most birds do not appear until early April and delay actual nesting functions until late April to mid May. Winter use would reduce herbaceous residual as interstitial ground cover, but there is no evidence suggesting that these salt-desert associates respond positively to increasing ground cover. Livestock removal in early April (Red Wash only) allows for essentially unaffected development of herbaceous growth prior to the fledging of young.

*Environmental Consequences of the Continuation of Current Management Alternative:* Same as Proposed Action.

*Environmental Consequences of the No Grazing Alternative:* Direct effects would be the same as the proposed action. In the absence of grazing and lacking progressive declines in herbaceous ground cover into the early spring months, it is expected that nest density and nest

success of more generalized species (e.g., western meadowlark, vesper sparrow) would undergo minor increase. Any positive influence would likely be confined to early season effects, since the development of herbaceous cover would be essentially identical to the proposed action later in the growing season and later summer months.

*Mitigation:* None.

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

*Affected Environment:* White-tailed prairie dogs, a BLM sensitive species, are distributed widely across lower elevation salt desert ranges that make up much of these allotments. Prairie dogs occupy valleys and basins with low or sparse woody cover in greatest abundance, and are typically associated with vegetation types and range sites that are heavily represented by annual grasses (e.g., cheatgrass) and forbs. Prairie dog abundance is strongly influenced by disease (e.g., sylvatic plague, tularemia) and populations tend to fluctuate dramatically.

Prairie dogs and their burrow systems are important habitat components of burrowing owl (a State threatened species), and reintroduced populations of black-footed ferret. Under the auspices of a non-essential, experimental population rule, black-footed ferret recovery was initiated in northwest Colorado and northeast Utah in 1999. Since 2001, ferrets have been released annually in the designated Wolf Creek Ferret Management Area (WCMA) that lies along the US40 corridor in the lower Wolf Creek basin. These allotments are either integral with the WCMA (Horse Draw) or in very close proximity (Red Wash allotment lies just off the southwest corner of the WCMA). Prairie dogs associated with the Red Wash allotment are thought to be effectively isolated from the prairie dog complex associated with the WCMA by Coal Ridge. Although no ferrets are known to have occupied Red Wash south of Coal Ridge, this rocky, wooded ridge would not present a barrier to potential ferret movement from the US 40 corridor. Ferrets breed in February and March with parturition in mid- to late-May. Kits emerge from natal burrows in mid-July.

Over the last 30 years, prairie dogs have occupied up to 2400 acres of Hatch Flat and the terraces Red Wash or nearly 40% of the allotment's shrubland types. This area has historically supported low and dispersed prairie dog populations due to relatively heavy sagebrush cover. Their distribution largely coincides with range sites rated in early seral condition. The Horse Draw allotment lies on the western margin of a relatively large (3,400 acre) prairie dog town whose populations are monitored annually as part of ferret recovery efforts. Prairie dog population indices on this town remained relatively constant in 2003 and 2004, and nearly doubled in 2005. Current populations are about 70% of the highest recorded populations of 1993/94. Although prairie dogs can appear above ground sparingly during the winter months, most begin to emerge from hibernation by early March, with young appearing above ground by late May.

Although intuitive that availability of higher quality and increased quantities of vegetation as forage would figure prominently in the ultimate survival and/or reproductive ability of white-tailed prairie dogs, there is little to suggest that the current forage base or the prevailing use of

that forage by potential competitors is suppressing prairie dog abundance or reproductive capacity in the Wolf Creek basin. Similarly, there is no reason to presume that the situation is different in Red Wash since there is an equal preponderance of annuals in the composition of ground cover on prairie dog-occupied portions of Wolf Creek.

Burrowing owls are uncommon in this Resource Area. These birds return to occupy a prairie dog burrow system in early April and begin nesting soon afterward. Young birds are normally fledged by late July with family groups remaining together through September, when the birds leave for southern wintering grounds. BLM has no historical records of burrowing owl nests in either allotments, but a pair have regularly nested immediately adjacent to the west edge of the Horse Draw allotment since 2003.

Ferruginous hawks are uncommon breeding species and are closely associated with prairie dog distribution in this Resource Area. Nest sites are well distributed across the lower elevation shrublands north of the White River and a complex of two and three alternate juniper sites are located in the northeast corners of the Horse Draw and Red Wash allotments, respectively. These hawks return to these ranges in late February and begin nesting (egg laying) by early to mid April. Incubation continues through late May with fledging of young by late July. Breeding populations of these hawks vary in direct relation to the prairie dog, cottontail, and jackrabbit prey base.

Bald eagles forage extensively across these lower elevation shrublands during the winter months from roost sites along the lower White River. Their use of these areas is regular, but dispersed and opportunistic. That portion of the White River within several miles up and downstream of the allotment has no mature cottonwood stands that would serve eagle roost or nest functions.

A small number of greater sage-grouse strut, nest, and raise broods in the lower Wolf Creek basin. Although these arid salt-desert shrublands are not normally considered suitable sage-grouse summer habitat, a population of several 10's of birds persists nonetheless. These birds tend to congregate in the deep incised drainages of Wolf Creek later in the summer where, presumably, shade and succulent broadleaf vegetation and invertebrates are more easily procured. The closest lek, which typically holds less than 6 roosters, is about 0.8 mile east of the northeast corner of the Horse Draw allotment. In contrast, several hundred sage-grouse winter in the Wolf Creek basin's scattered Wyoming big sagebrush habitats, the birds tending to concentrate from the mainstem of Wolf Creek east to Pinyon Ridge (encompassing the Horse Draw allotment). These birds apparently originate from the upper elevations of Wolf Creek on Blue Mountain, 10 and more miles upstream.

The lower Red Wash drainage supported a small population of sage-grouse, including a lek at Cactus Reservoir, through the mid-1980. No birds have been seen here since and the population is considered extirpated. There have been no reasons advanced that would explain the collapse of this small isolated population.

*Environmental Consequences of the Proposed Action:* The proposed grazing plans would allow for modest declines in potential use intensity (about 10%) that would be of particular long-term benefit to vegetation composition and vigor in those early and mid-seral

fractions of the Red Wash allotment, and would allow a slight increase in the amount of herbaceous residual remaining through the winter on both allotments.

Herbaceous residuals, or that herbaceous material remaining after the grazing period, serve as forage and/or a supplemental cover base for non-hibernating small mammals (e.g., voles) and early ground nesting birds (e.g., horned larks), both of which may serve as prey to burrowing owl. Although considered an important source of supplemental cover for nesting sage-grouse, the potential contribution of perennial grasses as residual cover on these arid ranges is likely limited.

Although adjustments in grazing use would not alter the preponderance of annuals in early seral parcels within the allotments (particularly Horse Draw), having a grazing system in place that is increasingly compatible with the development of perennial ground cover would be beneficial in ensuring that the long-term utility and quality of habitats for herbivores and those relying on them as a prey and cover source is maintained. Although of undetermined influence, long term improvement in ground cover composition, vigor, and density attending reduced early spring use in Red Wash would be expected to enhance, to a small degree, the nutrition base for white-tailed prairie dogs and lagomorphs, the distribution and abundance of which is central to the continued availability of suitable habitat for black-footed ferret (potential), burrowing owl, and, to a lesser degree, ferruginous hawk in this allotment. Similarly, slight improvements in ground cover density and the availability of succulent upland and channel-based forbs would serve as an improved cover and forage base for female sage-grouse and their broods, in the event these birds reestablish a population in lower Red Wash basin. Prevailing sheep use of big sagebrush stands within either allotment has no apparent influence on the availability of continued development of big sagebrush for winter use.

The proposed action would have no direct influence on burrowing owl or ferruginous hawk nesting activities in either allotment. Grazing use (Horse Draw: December-January, Red Wash: January-mid April) would occur predominantly during the winter months (December through early March) prior to the arrival of these birds. Ferruginous hawks arrive very early in the spring (i.e., late February) and although proposed grazing use in Red Wash may possibly lapse into the period of earliest egg-laying (3 April), the average onset of egg-laying and incubation occurs around 12 April, with the earliest hatching in early May. Burrowing owls' nest chronology is similar, although their arrival is slightly later. The influence of herbaceous residual remaining into the growing season has no marked influence on these birds' nesting outcomes or prey base. Livestock removal in early April (Red Wash only) allows for essentially unaffected development of herbaceous growth prior to the fledging of young.

The proposed action would have no conceivable influence on breeding or wintering populations of bald eagle. That portion of the lower White River encompassed by the Red Wash allotment abuts steep cliff-like slopes and has no floodplain or terraces accessible to livestock.

*Environmental Consequences of the Continuation of Current Management Alternative:* Continuation of current management would not be expected to effect any dramatic change in special status species populations or the utility or suitability of their habitats. Current management would maintain the current trends and rate of recovery on early and mid-seral

ranges in either allotment. Compared to the proposed action, it is likely that slightly higher grazing use intensity would incrementally slow the potential rates of vegetation recovery attainable through the proposed action.

*Environmental Consequences of the No Grazing Alternative:* It is suspected that the influence of the no-grazing alternative on special status species would differ little from the proposed action. Because of very little growing season involvement, the differences among the two alternatives would likely be very subtle and imperceptible over the course of the grazing permit and decades beyond.

*Mitigation:* None.

*Finding on the Public Land Health Standard for Threatened & Endangered species:* Public Land Health Standards for those special status species associated with white-tailed prairie dogs in these allotments, including black-footed ferret, ferruginous hawk, and burrowing owl, are currently being met. There is no evidence to suggest that proposed grazing practices would have an adverse influence on populations, available extent of suitable habitat, or the reproductive activities of these four species and would, therefore, have no influence on continued meeting of the land health standard. Small incremental gains in perennial grass cover (dormant and growing season) associated with the proposed and no action alternatives would be expected to bolster (on a diminutive scale) local populations of prairie dogs and potentially benefit individual burrowing owl, ferruginous hawk, and black-footed ferret. The no grazing alternative would not be expected to alter habitat conditions ascribed to the proposed action.

Both allotments represent marginal sage grouse nest and brood-rearing habitat. Recognizing the limited potential of the sites, Horse Draw meets the standard in this regard. It is more difficult to assign status to the Red Wash allotment. The question of whether the collapse of this population was ultimately tied to habitat conditions on public lands or continuity with brood habitat on private lands along the White River is open to speculation. In either case, the proposed action would, on a diminutive scale, tend to enhance upland herbaceous conditions as sage-grouse cover and forage in the Red Wash allotment and therefore contribute toward the long term meeting of the standard. The proposed and no action alternatives would have no further influence on sage-grouse habitats and would not interfere with continued meeting of the standard.

None of the alternatives would have any influence on continued meeting of the Public Land Health standards for bald eagle.

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

*Affected Environment:* The Horse Draw allotment has documented occurrences of a BLM Sensitive Species known as Debris Milkvetch, (*Astragalus detritalis*). This rare milkvetch occurs from north of Meeker, into northeastern Utah. Populations are known to occur south of Highway 40 within the Horse Draw allotment. The plant flowers in May. There does not appear

to be a geological substrate with which it is intimately associated, as it occurs on rocky or sandy soils on alluvial terraces with cobbles. Elevation ranges that support this species are from 5400-7200 ft.

*Environmental Consequences of the Proposed Action:* No environmental consequences are anticipated providing the grazing schedule is followed as proposed. Critical growing periods for the plants will be avoided by the removal of the sheep during those times.

*Environmental Consequences of the Continuation of Current Management Alternative:*  
None

*Environmental Consequences of the No Grazing Alternative:* None

*Mitigation:* None

*Finding on the Public Land Health Standard for Threatened & Endangered species:*  
There is no reasonable likelihood that the proposed action or no action alternative would have an influence on the condition or function of Threatened, Endangered, or Sensitive plant species. Thus there would be no effect on achieving the land health standard.

## **WASTES, HAZARDOUS OR SOLID**

*Affected Environment:* There are no known hazardous or other solid wastes on the subject lands.

*Environmental Consequences of the Proposed Action:* No hazardous wastes would be generated. Small quantities of solid could be potentially be generated by day to day operations.

*Environmental Consequences of the Continuation of Current Management Alternative:*  
No hazardous wastes would be generated. Small quantities of solid waste could be potentially be generated by day to day operations.

*Environmental Consequences of the No Grazing Alternative:* None

*Mitigation:* The permittee shall be required to collect and properly dispose of any solid wastes generated by the proposed action.

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

*Affected Environment:* Wolf Creek and Red Wash are in segment 13a and the main stem of White River is in segment 12. The table below identifies these reaches as well as segment classifications and designations. For "Use Protected" reaches, the antidegradation review requirements in the Antidegradation Rule are not applicable. For those waters, only the protection specified in each reach will apply. The state has defined these water quality

parameters with table values. These standards reflect the ambient water quality and define maximum allowable concentrations for the various water quality parameters. For segment 12, the anti-degradation rule applies to meaning no further water quality degradation is allowable that would interfere with or become harmful to the designated uses. The state has further defined water quality parameters with table values. These standards reflect the ambient water quality and define maximum allowable concentrations for the various water quality parameters.

<b>White River</b>				
<b>Watershed</b>	<b>Drainage Name</b>	<b>Water Quality Stream Segment</b>	<b>Designated Uses</b>	<b>Segment Classification</b>
Wolf Creek	Wolf Creek	White River Tributaries to Douglas Creek	Aquatic Life Warm 2, Recreation 2, Agriculture	Use Protected
	Middle Fork Wolf Creek			
	East Fork Middle Fork			
	Coal Creek			
	Elk Springs Draw			
	Three Springs Draw			
	Horse Draw			
	Divide Creek			
Red Wash	Red Wash			
	Boxelder Creek			
	Priest Draw			
White River	White River	White River, Piceance Cr to Douglas Creek	Aquatic Life Warm 1, Recreation 1a, Water Supply, Agriculture	Anti- Degradation Rule Applies

Wolf Creek and Red Wash are tributaries to the White River, which is a major sub basin of the Colorado River System. High runoff generally occurs from mid-March through mid-June and is caused primarily by melting of the higher elevation snowpack. Transitional months are usually March and July. Early season runoff is generally from lower elevation snowmelt and may provide a separate and lower discharge peak than the main peak in the hydrograph, which usually occurs in late May and early June.

Water from the higher mountain runoff contains lower concentrations of salts with calcium bicarbonate predominating. As water moves through the lower reaches of the system, the major constituents typically change from calcium bicarbonate to calcium sulfate, sodium sulfate, and sodium chloride. This shift is influenced by factors such as (a) a change in the salinity of the alluvial material that water contacts, (b) the chemical makeup of soils and geologic formations contributing surface runoff and groundwater, and (c) the relative cation-anion exchange activity between salt producing ions. Sodium and chloride are the most active ions and tend to replace or exchange with other elements in solution.

Over the years, Red Wash and Wolf Creek have had extensive watershed restoration work preformed in the uplands. Thirteen sediment control reservoirs are found within the boundaries of these allotments.



*Environmental Consequences of the Proposed Action:* With reduced grazing intensity provided by livestock management under the proposed action there should be an improvement in ground cover which in turn protects a watershed. Lack of ground cover exposes barren soils which are easily transported as suspended sediment during storm events.

*Environmental Consequences of the Continuation of Current Management Alternative:* The impacts from the current management alternative would be similar to the proposed action. Although the suspended AUMs would be available for use; an increase in use would reduce the vegetative cover exposing soils and allowing an increase in suspended sediment during runoff events.

*Environmental Consequences of the No Grazing Alternative:* By implementing the no grazing alternative, impacts to vegetation from livestock would not occur. With an increase in vegetation cover one would expect an improvement in watershed conditions; thereby improving the overall water quality condition during storm events. This improvement would most likely be a very slow process with minimal results because there are many other factors influencing runoff conditions.

*Mitigation:* Compliance monitoring for vegetation improvement would help identify if additional actions were needed to comply with the *Clean Water Act*.

*Finding on the Public Land Health Standard for water quality:* Currently the White River drainage meets the Public Land Health Standard and would continue to do so with the implementation of the proposed action. Many of the upper tributaries which are ephemeral and flow in direct response to storm events do not meet the standards during periods of flow.

## **WETLANDS AND RIPARIAN ZONES (includes a finding on Standard 2)**

*Affected Environment:* Within the Red Wash allotment, known riparian systems located on BLM administrated lands include the Red Wash drainage (5 miles), Cactus Reservoir (2/10 mile, 1 acre), and the White River (1/2 mile).

There are no known riparian systems located within the Baking Powder Pasture of the Horse Draw allotment.

Within the Red Wash allotment, the Red Wash drainage traverses down the entire extent of the allotment in a southern direction. The drainage intersects the White River on private land at approximately ¼ mile below (south) the southern boundary of the allotment. Riparian zones within the Red Wash drainage are intermittent within this 5 mile stretch, dependent upon surface and subsurface water availability. Dominate plant species include sedges, rushes, redtop, narrowleaf willows, common reedgrass, cottonwoods, and tamarisks. Immediate upland vegetation along the drainage consists of big sagebrush, rabbitbrush, and greasewood with an understory of slender wheatgrass, bottlebrush squirreltail, and western wheatgrass. Cheatgrass is found within a portion of the uplands (see vegetation section).

A portion of the Red Wash drainage in the Red Wash allotment was inventoried for Proper Functioning Condition (PFC) in 2002 and delineated 5 segments which all rated as Proper Functioning Condition with static trends. This inventory noted willows extending 30 feet beyond the edge of the first terrace among the sagebrush and dense herbaceous and young willows dominating channels and banks. Noted concerns were that certain localities have tamarisks and rabbitbrush domination, reaches somewhat entrenched, heavy elk use, lack of sufficient upland vegetation, and the establishment of a couple of Russian olives.

Also, the complete drainage of Red Wash had a Riparian Inventory performed in 1987 which delineated 38 segments and was rated as stable with an upward trend. Field notes during this inventory stated riparian vegetation conditions are best at and below Coal Ridge, which is where the Red Wash allotment is located.

Cactus Reservoir was inventoried for Proper Functioning Condition in 2002, 2004, and 2005 which had a functional rating of Proper Functioning Condition. This reservoir is fed by an underground spring source and is subject to low water levels, and may at times go dry. The riparian zone is limited to the banks of the reservoir. During the 2004 inventory conducted on July 17<sup>th</sup> the reservoir was dry, thus only a few riparian species were exhibiting high vigor. Vegetation along the shoreline of the reservoir included foxtail barley, bull rushes, willows, and narrowleaf cottonwoods. Of concern was the fact that the reservoir was filling in with sediment and that the reservoir was dry, thus hampering riparian species survival. This influence of water level is not related to the authorized livestock use.

The stretch of BLM administrated lands along the White River is bound by private lands on the east and west sides, with BLM to the north. Steep topography from the BLM lands limit access to the river. This stretch of river is influenced downstream by Kenny Reservoir, which backs up water to this area creating a steady flow of water at a reduced velocity. Authorized livestock make little, if any, use of this stretch of river due to steep topography, private lands, and limited need for watering of sheep during the season of use (sheep utilizing snow and upland water sources). Therefore, under all alternatives below, sheep are having no negative influence on the functionality of this zone, which is in a functional state.

*Environmental Consequences of the Proposed Action:* Livestock grazing by sheep during the proposed season of use will have a have a neutral benefit on riparian vegetation. Therefore, the proposed action will keep the riparian areas in a Properly Functioning Condition with a static to slightly upward trend.

Sheep make little use of the riparian areas due to the season of use (winter), available upland water supplies (snow, reservoirs, etc.), herding of sheep, and natural characteristics of sheep. Sheep use during the winter period are not dependent upon live water for meeting watering requirements, because snow may be used to meet the watering needs of sheep. Also, during the proposed period of use sheep are dependent upon upland vegetation (Wyoming sagebrush) for foraging and then bed at night within the steeper topography areas away from any riparian zones. Therefore, authorized sheep use is currently and will continue to have a nominal impact on the functionality of the riparian systems.

*Environmental Consequences of the Continuation of Current Management Alternative:* Sheep currently make little use of the riparian areas due to the season of use, herding of sheep, and natural characteristics of sheep. Sheep use during the winter period are not dependent upon live water for meeting watering requirements, because snow may be used to meet the watering needs of sheep. Also, during the current period of use sheep are dependent upon upland vegetation (Wyoming sagebrush) for foraging and then bed at night within the steeper topography areas away from any riparian areas. Therefore, authorized sheep use is currently and will continue to have a nominal impact on the functionality of the riparian systems. Thus the systems will continue to have a rating of Proper Functioning Condition with a static trend that will forgo the slight improvement under the proposal.

*Environmental Consequences of the No Grazing Alternative:* Without grazing, the riparian systems will continue in a Proper Functioning Condition with an improvement in vegetative growth of riparian species. This additional growth will aid in bank stabilization and sediment trapment.

*Mitigation:* None

*Finding on the Public Land Health Standard for riparian systems:* Currently, all riparian systems are meeting Public Land Health Standards for riparian systems and will continue under all alternatives.

**CRITICAL ELEMENTS NOT PRESENT OR NOT AFFECTED:**

No ACEC’s, flood plains, prime and unique farmlands, Wilderness, or Wild and Scenic Rivers exist within the area affected by the proposed action. There are also no Native American religious or environmental justice concerns associated with the proposed action.

**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:* The tables below are a breakdown of soil units and associated ecological sites for the Red Wash and Horse Draw allotments. Soils analyzed in this document have been covered in the Rio Blanco County Soil Survey or the Moffat County Soil Survey. The Soil surveys delineate individual soil unit polygons and associated ecological sites.

Red Wash Allotment - Soil Summary			
Soil Unit	BLM Acres	Soil Unit	Ecological Site
94	2053.01	Turley fine sandy loam,3-8% slopes	Alkaline Slopes

<b>Red Wash Allotment - Soil Summary</b>			
<b>Soil Unit</b>	<b>BLM Acres</b>	<b>Soil Unit</b>	<b>Ecological Site</b>
53	1953.73	Moyerson stony clay loam,15-65%slopes	Clayey Slopes
78	1660.32	Rock Outcrop	None
90	619.24	Torrifluvents, gullied	None
91	512.48	Torriorthents-Rock Outcrop, complex,15-90%slopes	Stoney Foothills
74	330.93	Rentsac-Moyerson-RockOutcrop,complex,5-65%slps	PJ Woodlands/Rolling Loam
RL	320.83	Rock Outcrop-Torriorthents Complex, Very Steep	None
93	289.38	Turley fine sandy loam,0-3%slopes	Alkaline Slopes
95	221.99	Uffens loam,0-5%slopes	Alkaline Slopes
64	113.52	Piceance fine sandy loam,5-15%slopes	Rolling Loam
200	34.96	Massadona-Youngston loams,Moist,1-8%slopes	Foothill Swale
161	33.04	Chroder Sandy Loam, 3-12%slopes	Loamy Cold Desert
7	29.78	Eghelm Loamy Sand,0-3%slopes	Foothill Swale
48	23.92	Kobar silty clay cloam,3-8%slopes	Deep Clay Loam
33	16.06	Forelle loam, 3-8%slopes	Rolling Loam
W	12.44	Water	None
25	11.73	Colorow sandy loam	Sandy Saltdesert
70	1.28	Redcreek-Rentsac complex,5-30%slopes	PJ woodlands/PJ woodlands
1C	0.05	Turley loam,Saline,1-8%slopes	Alkaline Slopes
<b>Total</b>	<b>8238.69</b>		

<b>Horse Draw Allotment (Baking Powder Pasture) - Soil Summary</b>			
<b>Soil Unit</b>	<b>BLM Acres</b>	<b>Soil Unit</b>	<b>Ecological Site</b>
X121	2041.73	Deaver-Chipeta Silty Clay Loam, 3-35% slopes	Clayey Saltedert/Clayey Saltedert
138	1199.61	Massadona Silty Clay Loam, 0-12% slopes	Clayey Slopes
202	526.84	Deaver-Avalon Complex, 5-45% slopes	Clayey Slopes/Semidesert Loam
133	112.88	Torriorthents-Rock Outcrop, Shale, Complex, Steep	Stoney Foothills
12D	47.89	Avalon-Mack Complex, 1-12% slopes	Semi-desert Loam/Loamy Salt Desert
201	8.28	Pavillion-Degater Complex, 3-20% slopes	Semi-desert Loam/Clayey Slopes
200	1.63	Massadona-Youngston Loams, Moist, 1-8% slopes	Foothill Swale
<b>Total</b>	<b>3938.86</b>		

Soils that are occupied with plant communities rated as a mid seral, late seral, or PNC (Potential Natural Community) have sufficient cover of desirable plant species to produce adequate litter and ground cover to minimize runoff and provide for soil protection (refer to the Vegetation section below). These soils are meeting the Colorado Public Land Health Standard for upland soils. The following allotments have BLM acres achieving or moving towards achieving for

Standards for Public Land Health: Red Wash-6881 acres (78%), Horse Draw-3737 acres (95%) (Refer to the below Vegetation section of this document).

Soils that have sites rated as early seral plant communities do not have sufficient diversity and/or cover of native plant species to provide effective ground cover to prevent overland flow, runoff, and general soil degradation. These soils are experiencing a certain degree of pedestaling, minor expression of rills, and some areas have active gully erosion. Erosion is most evident within the salt desert communities whose soils have a high clay content or in areas with little vegetative understory to provide soil protection. These areas that are experiencing active erosion are typically found along major drainages (Wolf Creek & Red Wash) that have downcut in the distant past, which has caused the side drainages to downcut to the level of the major drainages to obtain equilibrium. The early seral sites have soils that are typically within drainage bottoms and toe slopes that are found on soil units in the Red Wash allotment such as Turley Fine Sandy Loam, 3-8% Slopes (Alkaline Slopes) and Deaver-Chipeta Silty Clay Loam, 3-35% Slopes (Clayey Salt desert) in the Horse Draw allotment. These early seral sites are not meeting land health standards. The following allotments have BLM acres not achieving Standards for Public Land Health: Red Wash-1358 acres (22%), Horse Draw-203 acres (5%) (refer to the below Vegetation section of this document).

*Environmental Consequences of the Proposed Action:* On most mid seral sites and some limited early seral rangelands there would be an increase in surface litter accumulation, canopy cover, and ground cover due to the reduced grazing intensity (AUMs) provided by livestock management under the proposed action. Ground cover of native perennial plant species and litter are central in the protection and stabilization of soils.

On soils with late seral or PNC plant communities, little change from the current status is expected in regards to plant cover that provides soil protection. These sites are already at full potential and meeting health standards and will not be appreciably influenced by the proposal.

Soils with early seral plant communities will mostly continue at their current state because they have crossed a threshold of annual plant domination (cheatgrass) that provides little soil protection. This situation is nearly irreversible regardless of the livestock management without some form of disturbing agent such as fire, chemical, or drill seeding. Historical grazing practices (spring use, over utilization, etc.) created the situation in which most of the early seral plant communities will not meet the rangeland health standards for soils.

*Environmental Consequences of the Continuation of Current Management Alternative:* A slightly negative impact would occur in regards for achieving rangeland health standards. Such impacts to soils may include a slightly/moderately downward change in species composition, diversity, desired plant cover, and/or reduced production for some rangelands, which would mostly occur within mid seral sites and to a lesser degree within the late seral communities. The PNC communities would most likely continue to meet health standards and the early seral communities would not.

Under the Current Management’s actual use (running below Active AUM levels), a slightly improving to static soil conditions on all seral classes are expected as no significant changes in plant cover and litter accumulation are anticipated that would influence soil health.

*Environmental Consequences of the No Grazing Alternative:* Under a no grazing by livestock alternative, most localities that are being grazed by sheep would experience a short term increase in both perennial plant cover and soil surface litter accumulation. Mid seral ecological sites would likely experience the greatest benefit of increased perennial plant cover. On early seral ecological sites such as the mono-cultures of rangelands dominated by cheatgrass, the majority of areas are not expected to change in perennial plant cover because they have crossed a threshold of annual plant domination (cheatgrass) which provides little soil protection. Soils associated with PNC ecological sites would continue to meet standards and experience minimal changes in plant species composition and diversity.

*Mitigation:* None

*Finding on the Public Land Health Standard for plant and animal communities* (partial, see also Wildlife, Aquatic and Wildlife, Terrestrial): Soils that occupy early seral communities are mostly not meeting the Standards due to the lack of soil protection caused from a significant composition of cheatgrass, an invasive annual grass. All other seral communities (Mid – PNC) are currently meeting standards and make up the bulk of acres on all allotments. Implementation of the proposed action will enhance the ability of the rangelands to meet the Standards in the future.

**VEGETATION** (includes a finding on Standard 3)

*Affected Environment:* The following table lists the plant community appearance for the ecological sites or woodland types on allotments associated with the proposed action, along with the predominant plant species comprising the composition of each community. Forb species, though important to the diversity of a community and making up to 25 to 30% of the composition of several of the plant communities listed, are not presented in the following table because they generally are not contributors to the appearance nor the dominance of the community. Dominate ecological sites within the Red Wash allotment are Clayey Slopes and Alkaline Slopes, and dominate ecological sites within the Horse Draw allotment are Clayey Saltdesert and Clayey Slopes.

<b>Ecological Site /Woodland Type</b>	<b>Plant Community Appearance</b>	<b>Predominant Plant Species in the Plant Community</b>
Alkaline Slopes	Sagebrush/grass Shrubland	Wyoming big sagebrush, winterfat, low rabbitbrush, wheat grasses, Indian rice grass, squirreltail
Clayey Saltdesert	Salt Desert Shrubland	Gardner saltbush, shadscale, mat saltbush, galleta, Salina wildrye, squirreltail, Indian rice grass
Clayey Slopes	Grassland	Salina wildrye, mutton grass, western wheatgrass, June grass, squirreltail, shadscale
Deep Clay Loam	Grass/Open Shrub Shrubland	Western wheatgrass, slender wheatgrass, mutton grass, squirreltail, June grass, Letterman and Columbia needle

Ecological Site /Woodland Type	Plant Community Appearance	Predominant Plant Species in the Plant Community
		grasses, mountain big sagebrush
Foothill Swale	Grass/Open Shrub Shrubland	Basin wildrye, western wheatgrass, slender wheatgrass, streambank wheatgrass, Indian rice grass, Nevada bluegrass, basin big sagebrush, fourwing saltbush, rubber rabbitbrush
Loamy Saltedest	Grass/Salt Desert Shrubland	Needle-and-thread, galleta, Sandberg bluegrass, squirreltail, Indian rice grass, Gardner saltbush, shadscale, winterfat, horsebrush
Loamy Slopes	Mix Shrub/grass Shrubland	Mountain mahogany, bitterbrush, serviceberry, mountain big sagebrush, beardless bluebunch wheatgrass, western wheatgrass, June grass, Indian rice grass
Rolling Loam	Sagebrush/grass Shrubland	Wyoming big sagebrush, winterfat, low rabbitbrush, horsebrush, bitterbrush, western wheat grass, Indian rice grass, squirreltail, June grass, Nevada and Sandberg bluegrass
Sandy Saltedest	Grass/Salt Desert Shrubland	Needle-and-thread, Indian rice grass, sand dropseed, Sandberg bluegrass, squirreltail, galleta, shadscale, winterfat, horsebrush
Semidesert Clay Loam	Grass/Sagebrush Shrubland	Western wheatgrass, squirreltail, galleta, Salina wildrye, Indian rice grass, Wyoming big sagebrush, fourwing saltbush, shadscale
Semidesert Loam	Grass/Sagebrush Shrubland	Needle-and-thread, western wheatgrass, galleta, Sandberg bluegrass, squirreltail, Indian rice grass, sand dropseed, Wyoming big sagebrush, fourwing saltbush, winterfat
Stony Foothills	Grass/Open Shrub Shrubland	Beardless bluebunch wheatgrass, western wheatgrass, needle-and-thread, June grass, Indian rice grass, fringed sage, Wyoming big sagebrush, black sage, serviceberry, pinyon and juniper
Pinyon/Juniper	Pinyon/Juniper Woodland	Pinyon pine, Utah juniper, mountain mahogany, bitterbrush, serviceberry, Wyoming big sagebrush, beardless bluebunch wheatgrass, western wheatgrass, June grass, Indian rice grass, mutton grass

The following table shows the seral rating used by the BLM to rate rangeland vegetation communities in comparison to the Potential Natural Plant Community (PNC) for a particular ecological site.

ECOLOGICAL SITE SIMILARITY RATINGS	
Seral Rating	% Similarity to the Potential Natural Plant Community (PNC)
Potential Natural community (PNC)	76-100% composition of species in the PNC
Late-Seral	51-75% composition of species in the PNC
Mid-Seral	26-50% composition of species in the PNC
Early-Seral	0-25% composition of species in the PNC

The following tables show an estimate of the public land acreage falling within one of the seral ratings for each ecological site on allotments associated with this permit renewal. These estimates are based upon professional judgments of the Rangeland Management Specialist

trained in the use of the rating system. Nearly all ecological sites were visited during the 2004 field seasons for a plant community assessment of the Colorado Public Land Health Standards for each allotment. Historical grazing practices (spring use, over utilization, etc.) created the situation in which most of the early seral plant communities do not meet the rangeland health standards. The early seral sites have crossed a threshold and are nearly irreversible regardless of the livestock management without some form of disturbing activity such as fire, mechanical or chemicals treatments.

<b>Red Wash Allotment Ecological Site Similarity Rating</b>						
<b>Ecological Site</b>	<b>BLM Acres</b>	<b>PNC</b>	<b>Late Seral</b>	<b>Mid Seral</b>	<b>Early Seral</b>	<b>BLM Acres Classified</b>
Alkaline Slopes	2564	102	409	1120	933	<b>2564</b>
Clayey Slopes	1954	685	810	301	158	<b>1954</b>
Rock Outcrop	1660	N/A	N/A	N/A	N/A	<b>N/A</b>
Torrifluvents, gullied	619	0	58	413	148	<b>619</b>
Stoney Foothills	513	58	281	115	59	<b>513</b>
PJ Woodlands/Clayey Slopes	331	265	58	7	1	<b>331</b>
Rock Outcrop-Torriorthents Complex, Very Steep	321	N/A	N/A	N/A	N/A	<b>N/A</b>
Rolling Loam	130	25	10	51	44	<b>130</b>
Foothill Swale	65	60	5	0	0	<b>65</b>
Loamy Cold Desert	33	28	7	0	0	<b>35</b>
Deep Clay Loam	24	0	0	9	15	<b>24</b>
Water	12	N/A	N/A	N/A	N/A	<b>N/A</b>
Sandy Salt-desert	12	5	5	2	0	<b>12</b>
PJ woodlands/PJ woodlands	1	N/A	N/A	N/A	N/A	<b>N/A</b>
<b>Totals:</b>	<b>8239</b>	<b>1228</b>	<b>1643</b>	<b>2018</b>	<b>1358</b>	<b>6247</b>
<b>Percent (%) BLM Acres Classified</b>		<b>20%</b>	<b>26%</b>	<b>32%</b>	<b>22%</b>	<b>100%</b>

Red Wash: As shown within the Red Wash allotment, 78% of the ecological sites represent plant communities within acceptable thresholds for healthy communities and within acceptable levels of desired plant communities (mid to PNC) as defined in the White River ROD/RMP. Vegetation production and species composition on these sites provide adequate cover for soil protection and forage production to meet foraging demands.

The mid seral communities are generally located in Wyoming big sagebrush (*Artemisia tridentata*) dominated sites that occur on the ridgeline/slopes adjacent to Red Wash and have a higher composition of sagebrush which has resulted over time from grazing influences and lack of fire. These communities have adequate production and cover of native species and are not presently at risk of degradation below the threshold of a healthy community nor at risk from invasion of non-native species.



The early seral communities are primarily valley bottom, valley toe-slope, and/or flats sites which have been degraded from the historical influences from livestock grazing such as historic spring use, feeding practices, and bedding of sheep. These early seral communities are typically located in Hatch Flat, Red Wash drainage, and other lowland drainages. In these areas, cheatgrass (*Bromus tectorum*), a non-native, invasive and annual plant species consist of approximately 60-90% of the grass component within the plant community. The early seral communities do not meet the Colorado Public Land Health Standards for species diversity, soil protection, and/or forage production. However, these early seral areas have crossed an ecological threshold of cheatgrass domination whose condition would not significantly change with or without grazing.

The Red Wash allotment has been particularly impacted by recent drought which has caused low vigor within the sagebrush community, with sagebrush experiencing varying degrees of decadence with intermixed mortality.

<b>Horse Draw Allotment (Baking Powder Pasture)</b>						
<b>Ecological Site Similarity Rating</b>						
<b>Ecological Site</b>	<b>BLM Acres</b>	<b>PNC</b>	<b>Late Seral</b>	<b>Mid Seral</b>	<b>Early Seral</b>	<b>BLM Acres Classified</b>
Clayey Salt Desert	2042	1548	283	201	10	<b>2042</b>
Clayey Slopes	1200	125	201	710	164	<b>1200</b>
Clayey Slopes/Semidesert Loam	527	75	120	303	29	<b>527</b>
Stoney Foothills	113	100	13	0	0	<b>113</b>
Semi-desert Loam/Loamy Salt Desert	48	38	10	0	0	<b>48</b>
Semi-desert Loam/Clayey Slopes	8	8	0	0	0	<b>8</b>
Foothill Swale	2	2	0	0	0	<b>2</b>
<b>Totals:</b>	<b>3940</b>	<b>1896</b>	<b>627</b>	<b>1214</b>	<b>203</b>	<b>3940</b>
		<b>48%</b>	<b>16%</b>	<b>31%</b>	<b>5%</b>	

Horse Draw: As shown within the Horse Draw allotment, 95% of the ecological sites represent plant communities within acceptable thresholds for healthy communities and within acceptable levels of desired plant communities (mid to PNC) as defined in the White River ROD/RMP. Vegetation production and species composition on these sites provide adequate cover for soil protection and forage production to meet foraging demands.

The mid seral communities are generally located in salt desert shrub communities that occur on the ridgeline/slopes adjacent to the Middle Fork and East Fork of Wolf Creek. These communities have adequate production and cover of native species and are not presently at risk of degradation below the threshold of a healthy community nor at risk from invasion of non-native species.

The early seral communities are primarily valley bottom, valley toe-slope, and/or flats sites which have been degraded from the historical influences from livestock grazing such as historic spring use, feeding practices, and bedding of sheep. These early seral communities are typically

located with the drainages of the Middle Fork and East Fork of Wolf Creek, and other lowland drainages. In these areas cheatgrass, a non-native, invasive, and annual plant species consist of approximately 40-90% of the grass component. The early seral communities do not meet the Colorado Public Land Health Standards for species diversity, soil protection, and/or forage production. However, these early seral areas have crossed a threshold of cheatgrass domination whose condition would not significantly change with or without grazing.

This salt desert shrub community has been particularly impacted by recent drought which has caused extremely low vigor within the native Colorado wildrye (*Agropyron salina*) and western wheatgrass (*Agropyron smithii*) communities, with approximately 50-85% of these grasses experiencing varying degrees of decadence with intermixed mortality. For example, the bunch grasses have experienced partial or complete die-off that left remnant soil pedestals.

Growing Season: The following table is considered an average-growing season for a desert shrub community for both allotments, however this season may vary year-to-year dependant upon climatic patterns.

Growing Seasons (1 cycle)		
Season	Begin	End
Growing Season	03/15	06/01
Critical Growing Season	04/15	05/15

Allotment	AUMs Authorized in the Critical Growing Season	% of Authorized AUMs used in the Critical Growing Season
Red Wash	0	0%
Horse Draw	0	0%

*Environmental Consequences of the Proposed Action:* Under the Proposed Action and Current Management alternatives, no use will occur during the critical growing season for plant communities in the Red Wash allotment and no use will occur in the Horse Draw allotment during any growing season. Under the proposal, authorized grazing use during the regular growing season will be reduced by 12% within the Red Wash allotment. Overall grazing use during the entire grazing season will be reduced by 9% within Red Wash and 9% within Horse Draw. Thereby reducing grazing pressure to meet the rangeland’s carrying capacity, which will give plant communities a greater opportunity for; replenishment of root reserves, biomass accumulation, and plant propagation.

The current Suspended AUMs are not within the plant community’s ability to support them and meet public land health standards. Therefore, these Suspended AUMs are not carried forward into the Proposed Action or Villard Ranch’s *Grazing Application for Permit Renewal*.

For the Red Wash allotment, the slightly shorten grazing season (2 days) and reduced grazing intensity (AUMs) will assist in meeting rangeland health standards by moderately increasing perennial cover and litter accumulation over time. Also, AUMs associated with the proposed season are within the rangeland’s carrying capacity to meet resource objectives. These situations will have the greatest positive impact on the mid seral ecological sites. On PNC and late seral ecological sites, a neutral to slightly positive impact will occur as these sites are already meeting

or exceeding the standards. On most early seral sites, the present situation will typically continue at their current state unless some influencing agent was implemented such as fire/seeding because most of these sites have crossed a threshold of cheatgrass domination. It is apparent that the current early seral ecological sites within the Red Wash allotment are a result of historic grazing use (spring use, high intensity) and current drought conditions which have hampered plant production of desirable species. Therefore, these situations have left an opportunity for cheatgrass establishment and dominance.

The Horse Draw allotment's proposed grazing schedule (12/13 – 01/24) that is slightly shortened will assist in meeting rangeland health standards by slightly/moderately increasing perennial cover and litter accumulation over time. However, positive improvements to plant condition will be less noticeable within the Horse Draw allotment due its heavier soils (high clay content) which hamper vegetative production. AUMs associated with the proposed season are within the rangeland's carrying capacity to meet resource objectives. No grazing will occur during the growing season for plants, thus plant communities will have an opportunity to complete a full growth cycle without grazing by sheep every year. These situations will have the greatest positive impact on the mid seral ecological sites. On PNC and late seral ecological sites, a neutral to slightly positive impact will occur as these sites are already meeting or exceeding the standards. On most early seral sites, the present situation will typically continue at their current state unless some outside influencing agent (chemical, seeding, etc.) occurred because most of these sites have crossed a threshold of cheatgrass domination

*Environmental Consequences of the Continuation of Current Management Alternative:* Under the Proposed Action and Current Management alternatives, no use will occur during the critical growing season for plant communities in the Red Wash allotment and no use will occur in the Horse Draw allotment during any growing season. However potential authorized use would be above the estimated livestock carrying capacity for both allotments (see tables within the Rangeland Section, estimated 810 AUMs for Red Wash 463 AUMs for Horse Draw). The current Suspended AUMs are not within the plant community's ability to support them and meet public land health standards.

The greatest impacts of authorizing AUMs beyond the landscapes ability to support them would mostly occur within the mid seral sites and to a lesser degree within the late seral communities. The PNC communities would most likely continue to meet health standards and the early seral communities would not.

Villard Ranch has historically operated below their full Active AUM level within the Red Wash allotment and to a lesser degree in Horse Draw. Therefore, the ranch has grazed livestock within the capacity of the land, which has been a positive impact for plant cover of desirable plant species.

*Environmental Consequences of the No Grazing Alternative:* Under a no grazing by livestock alternative, most localities that are being grazed by sheep would experience a short term increase in both perennial plant cover and soil surface litter accumulation. Mid seral ecological sites would likely experience the greatest benefit of increase perennial plant cover. On early seral ecological sites such as the mono-cultures of cheatgrass, the majority of areas are

not expected to change in perennial plant cover because they have crossed a threshold of annual plant domination. The PNC ecological sites would continue to meet standards and experience minimal changes in plant species composition and diversity.

*Mitigation:* None

*Finding on the Public Land Health Standard for plant and animal communities* (partial, see also Wildlife, Aquatic and Wildlife, Terrestrial): The early seral communities are mostly not meeting the Standards due to the significant composition of cheatgrass, an invasive annual grass. All other seral communities (Mid – PNC) are currently meeting standards and make up the bulk of acres on all allotments. Implementation of the proposed action will enhance the ability of the rangelands to meet the Standards in the future.

### **WILDLIFE, AQUATIC** (includes a finding on Standard 3)

*Affected Environment:* The only aquatic habitats potentially influenced by livestock within these allotments consist of several ephemeral stock ponds. These small, shallow impoundments often support abundant tiger salamanders and, less regularly, chorus frogs. That portion of the lower White River encompassed by the Red Wash allotment abuts steep cliff-like slopes and has no floodplain or terraces accessible to livestock.

*Environmental Consequences of the Proposed Action:* Ephemeral aquatic habitats available within these allotments are not subject to substantive influence under the proposed grazing regimen. Those facilities in Horse Draw would receive no winter season use and those in Red Wash would be subject to use only until early April. Current levels of sheep use in Red Wash have not detracted from continued occupation of these livestock management facilities by amphibians adapted to short and inconsistent availability of water and this situation would not change under the proposed action.

*Environmental Consequences of the Continuation of Current Management Alternative:* Same as the Proposed Action.

*Environmental Consequences of the No Grazing Alternative:* It is uncertain whether aquatic habitat conditions would change under the no grazing alternative. Although riparian and wetland vegetation would likely express itself more abundantly in the long term, the duration and frequency of impounded water would not change appreciably. Increased vegetation growth may also tend to accelerate the progression of pond succession and ultimately decrease the usable lifespan of these ponds for species requiring open water (e.g., salamanders).

*Mitigation:* None.

*Finding on the Public Land Health Standard for plant and animal communities* (partial, see also Vegetation and Wildlife, Terrestrial): The public land health standard for aquatic wildlife communities is currently being met. Under the proposed action, the standard would continue to be met since there would be no substantive change in the use of livestock waters and the aquatic

conditions which they provide. It is uncertain what influence no grazing would have on these features, but it would not detract from continued meeting of the standard through the term of the permit.

### **WILDLIFE, TERRESTRIAL** (includes a finding on Standard 3)

*Affected Environment:* These low elevation salt-desert, big sagebrush, and juniper woodland ranges are used by deer and elk during the winter and early spring months (November through early May). Deer use is light and is associated primarily with seasonal movements in the Horse Draw allotment. Interspersed woodland cover and terrain in the Red Wash allotment allow for the support of sustained winter deer use. Heavy elk use, beginning in mid-December and involving in excess of 400 head, has become prevalent in Wolf Creek and along the White River (including Red Wash) over the past 15 years. Pronghorn use these ranges throughout the year, but lacking reliable water sources; summer use on these allotments is generally limited and dispersed. Although up to 150 pronghorn wintered in the vicinity of the Horse Draw allotment in the early 1990s, northwest Colorado has undergone unexplained declines in pronghorn populations, and today the area winters no more than half this number.

Breeding raptor use of the Horse Draw allotment is limited to ferruginous hawk and burrowing owl (discussed in Special Status Species above). The abundance and variety of raptor use in the lower Wolf Creek basin is higher during the winter, with opportunistic foraging by golden and bald eagle, rough-legged and red-tailed hawk, and prairie falcon. Juniper woodlands in the Red Wash allotment likely supports a small number of breeding Cooper's hawk and long-eared owl and scattered Fremont cottonwoods in the Red Wash drainage are occasionally used by red-tailed hawk for nesting.

Nongame bird and small mammal populations associated with these lower elevation juniper/sagebrush ranges are typically common and broadly distributed in extensive shrubland and woodland communities found throughout the Resource Area (as well as the Great Basin), but two species in particular, the sage sparrow and gray vireo, are somewhat more specialized and, in this Resource Area, are narrowly associated with arid salt-desert shrubland and juniper-dominated woodland habitats, respectively, along the lower White River corridor.

*Environmental Consequences of the Proposed Action:* The proposed action would reduce dormant season use of woody and herbaceous forage by 10% across the allotments. Although likely allowing occasionally (e.g., drought) for minor increases in subsequent shrub vigor and enhancing the availability of herbaceous forage for wintering elk and woody forage for pronghorn, there is no evidence to suggest that current levels of cumulative use by sheep and big game are causing inappropriate or potentially damaging levels of use on big sagebrush or saltbush stands in either allotment. Reduced early spring use in the Red Wash allotment would complement efforts by the Colorado Division of Wildlife to reduce the number of elk that have recently begun to make extended use of the river bottoms and adjacent uplands through the summer months. Collectively, reduced growing season use would not only increase the availability of higher quality herbaceous growth for the more selective seasonal diets of deer and pronghorn (recovering from nutritional deficits of winter), but would establish a grazing regimen

more compatible with long-term recovery of native ground cover on early-seral ranges from natural processes or BLM intervention.

Although proposed livestock grazing management would have no direct influence on breeding or wintering raptors (see discussion in Special Status species section), proposed reductions in grazing use intensity would provide minor increases in herbaceous residuals as a forage and/or a supplemental cover base for non-hibernating small mammals (e.g., voles) and early ground nesting birds (e.g., horned larks). Although likely to be small and discountable, any positive response of small mammal or nongame bird populations to enhanced habitat conditions would yield a more consistently abundant and available prey base for these birds and their broods.

Similarly, and as discussed in the Special Status Species section, adjustments in grazing use would not alter the extent of ranges dominated by introduced annual weeds, nor the poorer nutritional and ground cover properties they offer. However, by having a grazing system in place that is more compatible with the development of perennial ground cover, the long term prospects of re-establishing native ground cover and its related wildlife values (e.g., nutrition and enhanced reproductive performance) is increased in the long term.

*Environmental Consequences of the Continuation of Current Management Alternative:* Continuation of current management would not be expected to effect any dramatic change in big game or non-game populations or the utility or suitability of their habitats. Current management would maintain the current trends and rate of recovery on early and mid-seral ranges in either allotment. Compared to the proposed action, it is likely that slightly higher grazing use intensity would incrementally slow the potential rates of vegetation recovery and wildlife cover and forage values attainable through the proposed action.

*Environmental Consequences of the No Grazing Alternative:* It is suspected that the influence of the no-grazing alternative big game and non-game wildlife would differ little from the proposed action. Because of very little growing season involvement, the differences among the two alternatives in regard to vegetation-derived habitat values would likely be very subtle and imperceptible over the course of the grazing permit and decades beyond.

*Mitigation:* None.

*Finding on the Public Land Health Standard for plant and animal communities* (partial, see also Vegetation and Wildlife, Aquatic): The Public Land Health standard for terrestrial wildlife communities in these allotments is currently being met at the landscape scale. Although there is considerable acreage that fails to meet the standard (particularly Red Wash) because of the preponderance of introduced annuals in ground cover composition, there is no evidence to suggest that current grazing practices are aggravating deficiencies in the utility or available extent of wildlife habitat. Consistent with the intent of the standards, proposed reductions in overall (both allotments) and early spring livestock use (Red Wash allotment) and incremental gains in perennial ground cover (as residual and new growth) attributable to the proposed and no action alternatives would be expected to bolster (on a diminutive scale) the nutritional planes and reproductive performance of local populations of big game and nongame wildlife, and would complement continued meeting of the land health standard.

Although the no action or proposed action alternative would not, in and of themselves, substantially reduce the extent of ranges not meeting the standard, a grazing alternative compatible with the development of perennial native ground cover may increase the incentive and priority for BLM and permittee to intervene with costly efforts to suppress the competitive advantage of annual weeds--concurrently increasing the long term prospects of re-establishing native ground cover and related wildlife values.

**OTHER NON-CRITICAL ELEMENTS:** For the following elements, only those brought forward for analysis will be addressed further.

Non-Critical Element	NA or Not Present	Applicable or Present, No Impact	Applicable & Present and Brought Forward for Analysis
Access and Transportation			X
Cadastral Survey	X		
Fire Management	X		
Forest Management			X
Geology and Minerals	X		
Hydrology/Water Rights	X		
Law Enforcement		X	
Noise			
Paleontology	X		
Rangeland Management			X
Realty Authorizations		X	
Recreation			X
Socio-Economics		X	
Visual Resources			X
Wild Horses	X		

## ACCESS AND TRANSPORTATION

*Affected Environment:* Allotment 06332 is located within an area where travel is limited to existing routes. Allotment 06320 is located within an area where travel is limited to existing routes from September 30 through April 30.

*Environmental Consequences of the Proposed Action:* None.

*Environmental Consequences of the Continuation of Current Management Alternative:* Impacts from the Current Management alternative are not anticipated.

*Environmental Consequences of the No Action Alternative:* Impacts from the Current Management alternative are not anticipated.

*Mitigation:* None.

## FOREST MANAGEMENT

*Affected Environment:* Within the Red Wash allotment there is 331 acres of pinyon/juniper woodland. The Horse Draw allotment contains only scattered junipers on ridgetops. Within the White River RMP of 1997, these woodlands were classified as non-commercial because of limited woodland resources. These stands are available for harvest by individuals under permit. The primary products are juniper fence posts and firewood.

*Environmental Consequences of the Proposed Action:* The pinyon/juniper woodlands are located on ridgetops with shallow soils. These woodlands are relatively unaffected by grazing and would not be affected by the proposed action.

*Environmental Consequences of the Continuation of Current Management Alternative:* Impacts would be similar to the Proposed Action.

*Environmental Consequences of the No Grazing Alternative:* Impacts would be similar to the Proposed Action.

*Mitigation:* None

## RANGELAND MANAGEMENT

*Affected Environment:* Villard Ranch (0501444) is the BLM authorized grazing permit holder on the Red Wash (06320) and Horse Draw (06332) allotments. The following tables show an estimated carrying capacity (AUMs) of livestock for allotments authorized by Villard Ranch. The tables are broken down by acres within an ecological site and acres per AUM, which determines AUMs for those acres when divided. Villard Ranches submitted *Grazing Application for Permit Renewal* was used to determine the public land's available forage contribution (AUMs), which was developed in part based upon the below figures.

Also, these tables below are based upon a moderate stocking level that is generally less than the stocking rates recommended by the Natural Resources Conservation Service (NRCS) for the specific ecological sites. The reason for this is in consideration of a moderate stocking level that meets public land health standards in relation to the rangeland's carrying capacity and current rangeland conditions.

<b>Red Wash Allotment Livestock Grazing Capacity</b>			
<b>Ecological Site</b>	<b>BLM Acres</b>	<b>Acres / AUM</b>	<b>BLM AUMs</b>
Alkaline Slopes	2564.43	9	285
Clayey Slopes	1953.73	8	244
Rock Outcrop*	1660.32	19	87
Torrifluvents, gullied*	619.24	15	41
Stoney Foothills	512.48	9	57



<b>Red Wash Allotment Livestock Grazing Capacity</b>			
<b>Ecological Site</b>	<b>BLM Acres</b>	<b>Acres / AUM</b>	<b>BLM AUMs</b>
PJ Woodlands/Clayey Slopes	330.93	10	33
Rock Outcrop-Torriorthents Complex, Very Steep*	320.83	19	17
Rolling Loam	129.58	6	22
Foothill Swale	64.74	5	13
Loamy Cold Desert	33.04	7	5
Deep Clay Loam	23.92	6	4
Water*	12.44	0	0
Sandy Saltdesert	11.73	6	2
PJ woodlands/PJ woodlands	1.28	25	0
<b>Totals:</b>	<b>8238.69</b>		<b>810</b>

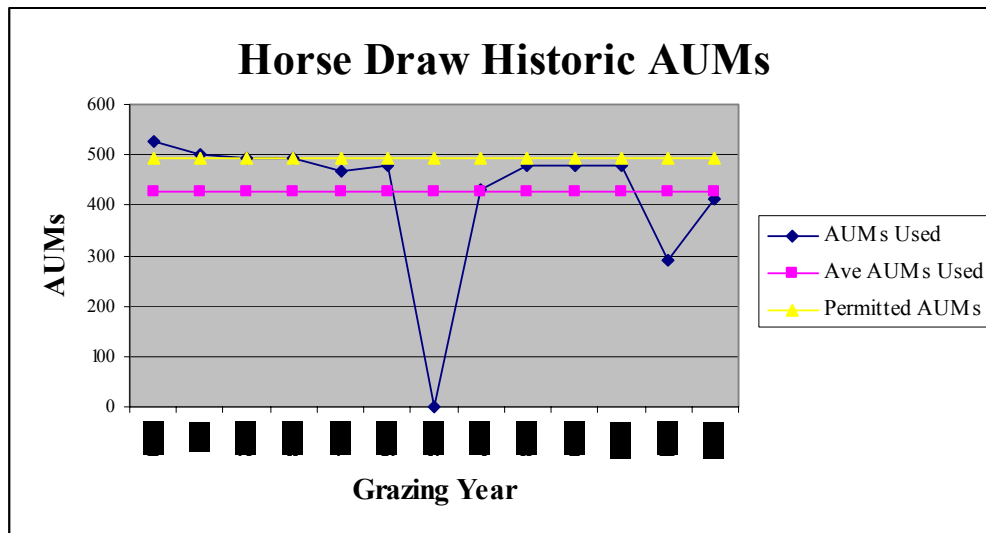
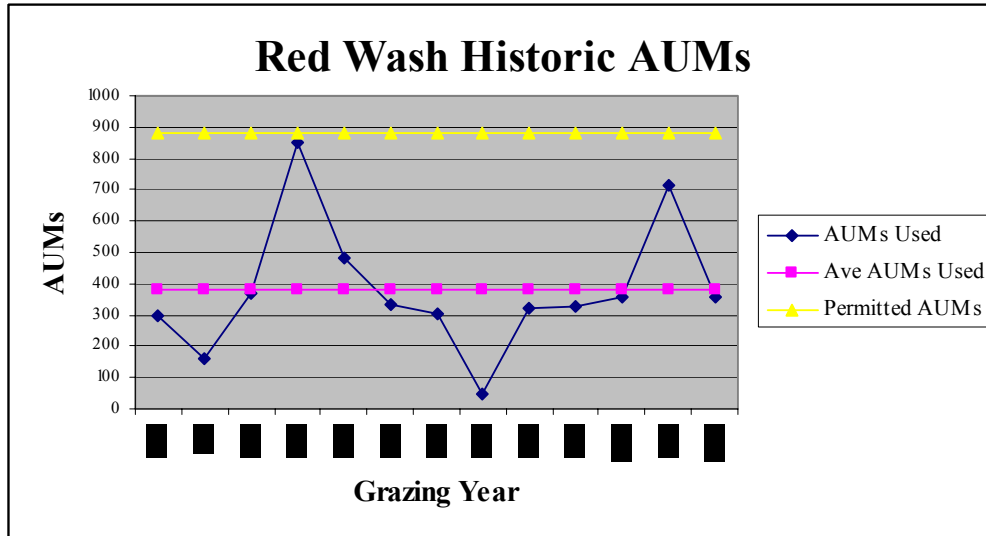
\*Soil units

<b>Horse Draw Allotment Livestock Grazing Capacity</b>			
<b>Ecological Site</b>	<b>BLM Acres</b>	<b>Acres / AUM</b>	<b>BLM AUMs</b>
Clayey Saltdesert	2041.73	9	227
Clayey Slopes	1199.61	8	150
Clayey Slopes/Semidesert Loam	526.84	8	66
Stoney Foothills	112.88	9	13
Semi-desert Loam/Loamy Salt Desert	47.89	8	6
Semi-desert Loam/Clayey Slopes	8.28	8	1
Foothill Swale	1.63	5	0
<b>Totals:</b>	<b>3938.86</b>		<b>463</b>

The tables below reflect the billed AUMs (Historic AUM Use) for the Red Wash and Horse Draw allotments by grazing year. The grazing year begins March 1<sup>st</sup> and end February 28<sup>th</sup>, and billed AUMs are based upon a submitted grazing application before the grazing season.

<b>Historic AUM Use</b>		
<b>Grazing Year</b>	<b>Red Wash: AUMs Authorized</b>	<b>Horse Draw: AUMs Authorized</b>
1990	295	526
1991	158	501
1992	368	495
1993	852	495
1994	484	466
1995	331	480
1996	303	0
1997	47	432
1998	319	480
1999	326	480
2000	356	480
2001	714	289

Historic AUM Use		
Grazing Year	Red Wash: AUMs Authorized	Horse Draw: AUMs Authorized
2002	355	411
<b>13 Year Average</b>	<b>378</b>	<b>426</b>
<b>Permitted Use AUMs</b>	<b>880</b>	<b>495</b>
<b>Percent of Permitted AUMs Used over 13 Yrs</b>	<b>42.9%</b>	<b>86.0%</b>



*Environmental Consequences of the Proposed Action:* Refer to the Vegetation section of this document for an analysis of rangeland vegetation impacts. As shown in the Vegetation Section, the proposed action is expected to improve livestock grazing use in respects to a reduced grazing intensity (AUMs), a slightly shorter grazing season, and a slight reduction of AUMs used during the regular growing season. Under all alternatives, no AUMs will be authorized during

the critical growing period. These situations will provide an opportunity for plants to receive less defoliation in relation to the Current Management Alternative, thereby giving the vegetation a greater opportunity for replenishment of root reserves, biomass accumulation, and plant propagation.

The proposed Grazing Permit Schedule's active AUMs are based upon the above Livestock Carrying Capacity tables. Therefore, the proposal alters active AUMs to a level that is in accordance with the ability of the rangelands to produce forage, be grazed, and still meet rangeland health standards over time.

It is anticipated that the management of the rangelands by Villard Ranches will not be impaired by the implementation of the proposed action, as the ranch has applied for this use with their submitted *Grazing Application of Permit Renewal*. Also, the ranch has historically operated below their current active use, which has improved the health of the rangelands.

Implementation of the proposed action will further enhance the ability of the rangelands to meet the various Public Land Health Standards in the future.

*Environmental Consequences of the Continuation of Current Management Alternative:* As shown from the Historic AUM Use tables above, Villard Ranch has historically grazed their permitted allotments, particularly Red Wash, below the current active AUM level, below estimated AUMs, and below the proposed AUM levels. A prolonged drought that still persists has accounted for part of this historical AUM level. This situation of grazing below the rangeland's carrying capacity has helped in the recovery of these allotments from historical grazing practices that lead to poor land health conditions in certain localities. Thereby, the ranch has created a situation of improving the rangeland health, particularly on the mid seral ecological sites. It is anticipated that this same trend will continue into the future, yet at a lesser rate than the proposed action.

If the current active AUMs were fully authorized, it would create a situation where grazing exceeds the rangeland's ability to support it and still meet resource objectives over time.

*Environmental Consequences of the No Grazing Alternative:* Under this alternative, Villard Ranch would not have the ability to authorize their existing grazing permit (0501444). Therefore, the ranch would not have a viable sheep operation with the loss of these winter grazing permits. Without the BLM allocated forage on the Red Wash and Horse Draw allotments, it would place an economical burden on the ranch to provide private land or other forage during the time frame outlined on the proposed grazing permit (12/13-04/10) for 1600 head of sheep. Therefore, it is likely that Villard Ranch would not be able to continue in its current state as a sheep operation.

*Mitigation:* None

## **RECREATION**

*Affected Environment:* The proposed action occurs within the White River Extensive Recreation Management Area (ERMA). BLM custodially manages the ERMA to provide for unstructured recreation activities such as hunting, dispersed camping, hiking, horseback riding, wildlife viewing and off-highway vehicle use.

The project areas area has been delineated a Recreation Opportunity Spectrum (ROS) class of Semi-Primitive Motorized (SPM). SPM recreation setting is typically characterized by a natural appearing environment with few administrative controls, low interaction between users but evidence of other users may be present. SPM recreation experience is characterized by a high probability of isolation from the sights and sounds of humans that offers an environment that offers challenge and risk.

*Environmental Consequences of the Proposed Action:* No impact.

*Environmental Consequences of the Continuation of Current Management Alternative:* No impact.

*Environmental Consequences of the No Grazing Alternative:* No impact.

*Mitigation:* None.

## **VISUAL RESOURCES**

*Affected Environment:* The proposed action is within a VRM class III area. The objective of this class is to partially retain the existing character of the landscape. The level of change to the characteristic landscape should be moderate. Management activities may attract attention but should not dominate the view of the casual observer. Changes should repeat the basic elements found in the predominant natural features of the characteristic landscape

*Environmental Consequences of the Proposed Action:* VRM objectives will be met.

*Environmental Consequences of the Continuation of Current Management Alternative:* VRM objectives will be met.

*Environmental Consequences of the No Grazing Alternative:* VRM objectives will be met.

*Mitigation:* None.

**CUMULATIVE IMPACTS SUMMARY:** Cumulative impacts from the proposed action would not exceed those discussed in the White River Resource Area RMP and/or White River Resource Area Grazing Management Environmental Impact Statement (EIS).

**PERSONS / AGENCIES CONSULTED:** A Public Notice of the NEPA action is posted on the White River Field Office Internet website at the Colorado BLM Home Page asking for public input on Grazing Permit renewals and the assessment of public land health standards within the White River Field Office area. Local notification is published in the Rio Blanco Herald Times newspaper located here in Meeker, Colorado on a monthly basis. The Grazing Advisory Board was notified of impending Grazing Permit renewals. Also, individual letters are sent to the lessees/permittees informing them that their lease is up for renewal and request any information they want included in or taken into consideration during the renewal process.

**INTERDISCIPLINARY REVIEW:**

<b>Name</b>	<b>Title</b>	<b>Area of Responsibility</b>
Caroline Hollowed	Planning & environmental Coordinator	Air Quality
Tamara Meagley	Natural Resource Specialist	Areas of Critical Environmental Concern
Tamara Meagley	Natural Resource Specialist	Threatened and Endangered Plant Species
Gabrielle Elliott	Archaeologist	Cultural Resources Paleontological Resources
Jed Carling	Rangeland Specialist	Invasive, Non-Native Species
Ed Hollowed	Wildlife Biologist	Migratory Birds
Ed Hollowed	Wildlife Biologist	Threatened, Endangered and Sensitive Animal Species
Bo Brown	Hazmat Collateral;	Wastes, Hazardous or Solid
Caroline Hollowed	Planning & environmental Coordinator	Water Quality, Surface and Ground Hydrology and Water Rights
Jed Carling	Rangeland Specialist	Wetlands and Riparian Zones
Chris Ham	Outdoor Recreation Planner	Wilderness
Jed Carling	Rangeland Specialist	Soils
Jed Carling	Rangeland Specialist	Vegetation
Ed Hollowed	Wildlife Biologist	Wildlife Terrestrial and Aquatic
Chris Ham	Outdoor Recreation Planner	Access and Transportation
Ken Holsinger	Natural Resource Specialist	Fire Management
Robert Fowler	Forester	Forest Management
Paul Daggett	Mining Engineer	Geology and Minerals
Jed Carling	Rangeland Specialist	Rangeland Management
Penny Brown	Realty Specialist	Realty Authorizations
Chris Ham	Outdoor Recreation Planner	Recreation
Chris Ham	Outdoor Recreation Planner	Visual Resources
Valerie Dobrich	Natural Resource Specialist	Wild Horses

**Finding of No Significant Impact/Decision Record  
(FONSI/DR)**

**CO-110-2005-006-EA**

**FINDING OF NO SIGNIFICANT IMPACT (FONSI)/RATIONALE:** The environmental assessment and analyzing the environmental effects of the proposed action have been reviewed. The approved mitigation measures (listed below) result in a Finding of No Significant Impact on the human environment. Therefore, an environmental impact statement is not necessary to further analyze the environmental effects of the proposed action.

**DECISION/RATIONALE:** It is my decision to implement the proposed action to renew the grazing permit #0501444 for a period of three full grazing years, as described in the proposed action with the addition of the below mitigation.


**MITIGATION MEASURES:** 1. If noxious weeds are identified within the Red Wash and/or Horse Draw allotments and occur on BLM administrated lands, they will be treated by a certified pesticide applicator either by the BLM or permittee. If livestock grazing practices have resulted in the establishment of noxious weeds, the permittee will be responsible for the eradication of these weeds as directed by the BLM.

2. The permittee shall be required to collect and properly dispose of any solid wastes generated by the proposed action.

**COMPLIANCE/MONITORING:** Refer to the Monitoring and Evaluation section within the proposed action of this document.

**NAME OF PREPARER:** Jed Carling

**NAME OF ENVIRONMENTAL COORDINATOR:** Caroline Hollowed

**SIGNATURE OF AUTHORIZED OFFICIAL:**   
Field Manager

**DATE SIGNED:** 09-20-05

**ATTACHMENTS:**

- Figure 1: Map of the Red Wash Allotment
- Figure 2: Map of the Horse Draw Allotment, Baking Powder Pasture
- General Location map of the Proposed Action

Figure 1: Map of the Red Wash Allotment

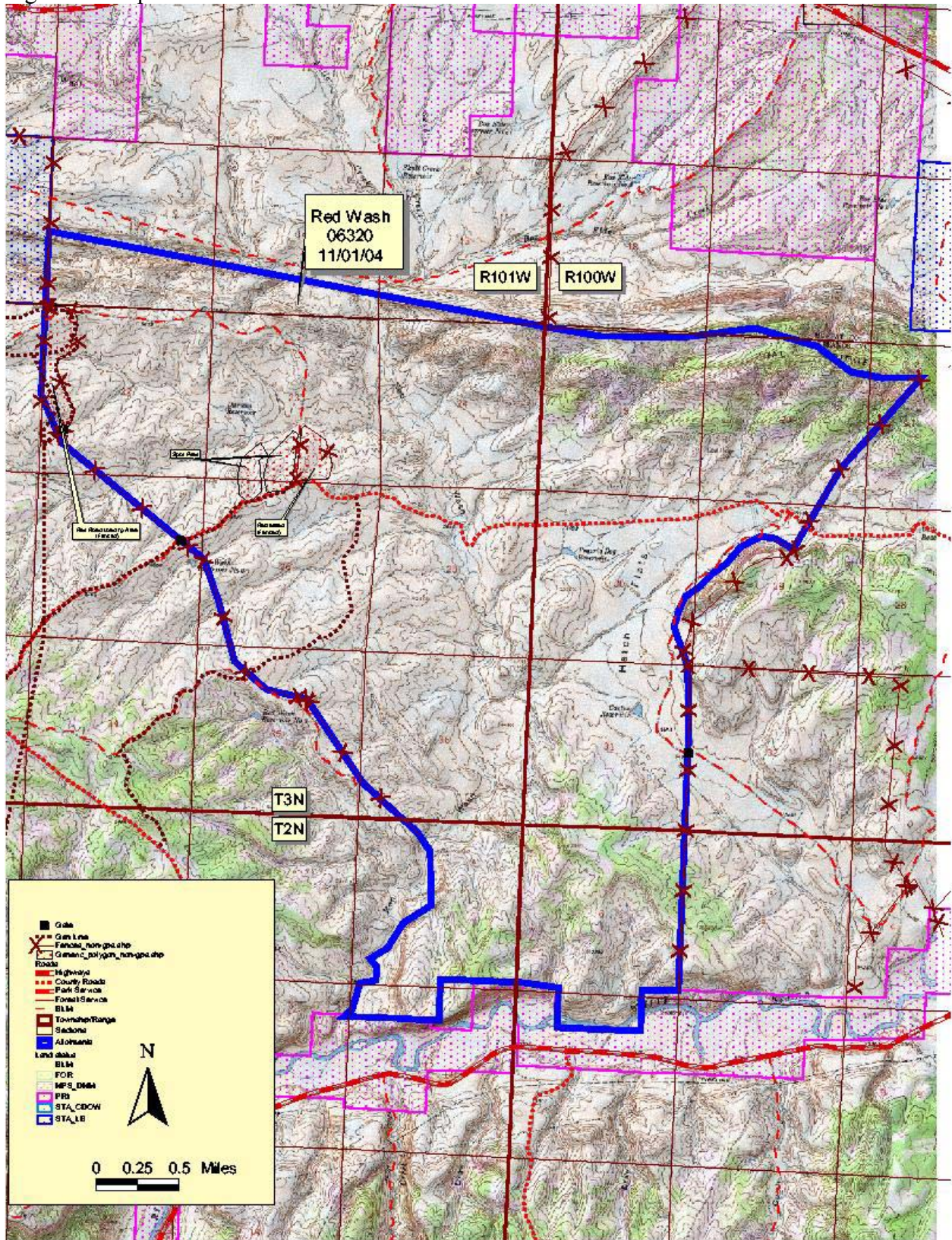
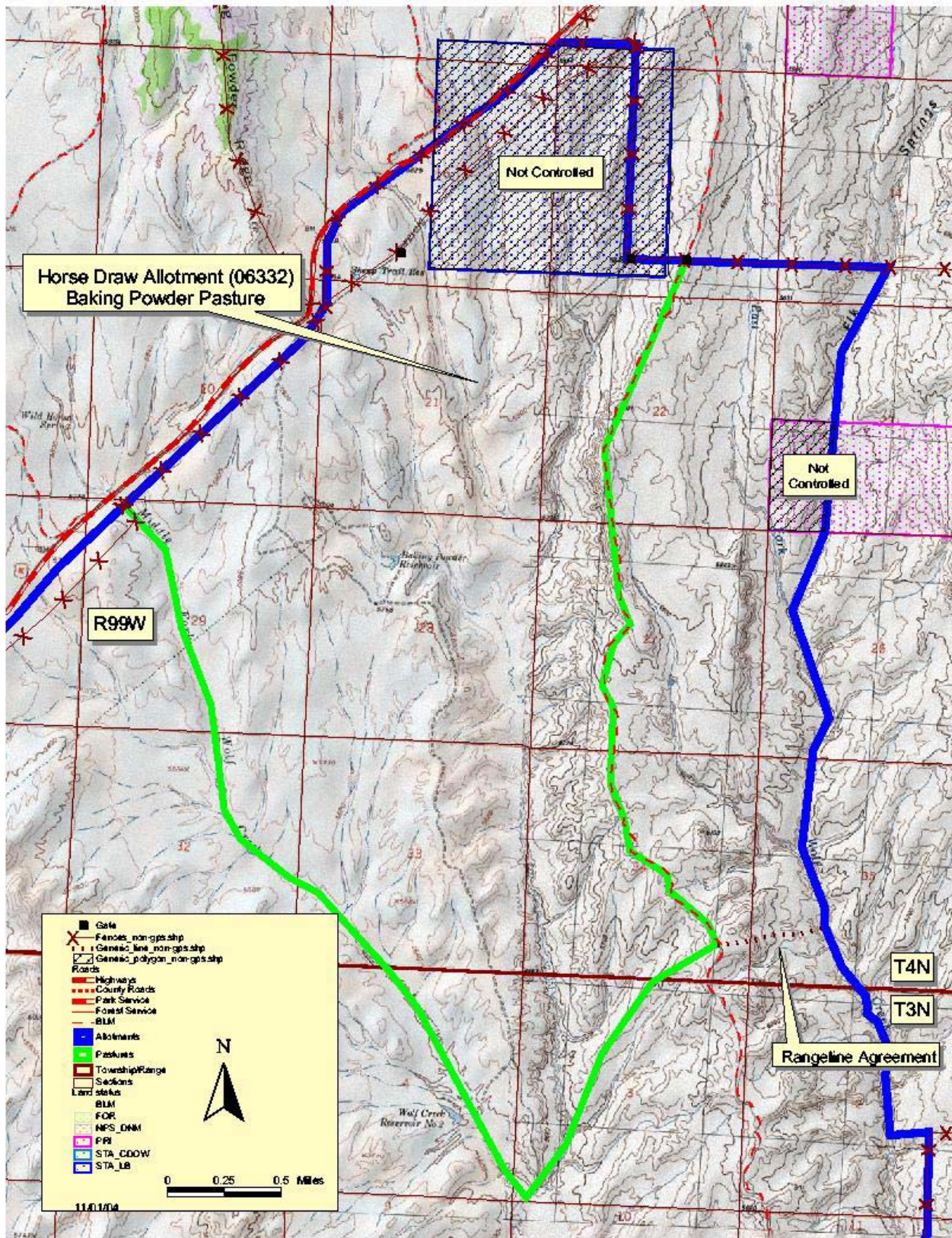


Figure 2: Map of the Horse Draw Allotment, Baking Powder Pasture





# Location of Proposed Action CO-110-2005-006-EA

