

ma: cottonwood, SM 10-97



# United States Department of the Interior

## BUREAU OF LAND MANAGEMENT

Ely District Office  
HC 33 Box 33500  
Ely, Nevada 89301-9408



IN REPLY REFER TO:

4130 (NV-046)

APR 8 1997

IN REPLY REFER TO:

Dear Participant:

Enclosed for your information and review, are the management Action Selection Report (MASR) for the Cottonwood Allotment. These reports are included with the Proposed Multiple Use Decision.

This MASR is the final section of the allotment evaluation, and complete the monitoring evaluation process. This report addresses the primary concerns received from involved interests, list the technical recommendations considered during the evaluation, and describe the rationale as to why those actions were selected or not selected. The MASR identify selected changes in management required to meet or make progress towards allotment specific objectives. In addition, the MASR includes selected management actions for the terms and conditions for the grazing permit held by the permittee for the Cottonwood Allotment. Finally, the MASR address changes to livestock and wild horse management to be included in the Proposed Multiple Use Decision for the allotment.

The MASR is included for information purposes only. The Proposed Multiple Use Decision initiates the selected management actions on the ground and specifies the procedures for protest.

Sincerely,  
*Alfred W. Coulberson*  
Acting for,  
Hal M. Bybee, ADM  
Renewable Resources

2 Enclosures

1. management action selection report (20 Pages)
2. proposed multiple use decision (14 Pages)



IN REPLY REFER TO:

# United States Department of the Interior

BUREAU OF LAND MANAGEMENT

Ely District Office

HC 33 Box 33500

Ely, Nevada 89301-9408

TAKE  
PRIDE IN  
AMERICA

IN REPLY REFER TO:

4130 (NV-042)

APR 8 1997

Huntsman Ranch LLC  
Lyman Huntsman  
12th East 1200 South  
Beryl, UT 84714

CERTIFIED MAIL NO. P 313 269 719  
Return Receipt Requested

## NOTICE OF PROPOSED MULTIPLE USE DECISION FOR THE COTTONWOOD ALLOTMENT

### BACKGROUND INFORMATION:

The Management Framework Plan and the Record of Decision for the Schell Grazing Environmental Impact Statement were issued in June and July of 1983, respectively. These documents guide the management of public lands within the Cottonwood Allotment. The Schell Resource Area Record of Decision dated July 1983 states in pertinent part:

"When adequate monitoring data becomes available adjustments to the grazing capacity will be made that are compatible with the multiple use objectives...

Implementation of the range management program will take place through monitoring and consultation and coordination with all interests concerned with the management of resources in a given local area; landowners, land management agencies, wildlife groups, wild horse groups, conservation organizations, etc. Grazing adjustments, if required, will be based upon reliable vegetation monitoring studies, consultation and coordination, baseline inventory, or a combination of these...

Prior to initiating grazing adjustments, the Bureau, within the guidance of the Management Framework Plan and consultation and coordination, will consider the specific management objectives for an allotment and other resource values (e.g., riparian habitat, water quality, wildlife, recreation, wild horses and livestock) to be evaluated in determining progress in meeting these objectives. Changes in the resource values may warrant a modification of the scheduled adjustments and thus indicate the intensity and types of monitoring that will be required in each allotment..."

Management of wild horses in the Cottonwood Allotment shall be undertaken with the objective of limiting animals distribution to herd areas.

Monitoring studies were initially established in 1983 and have been conducted since that time.

In accordance with Bureau policy and regulations, this data has been analyzed and evaluated in order to determine progress in meeting management objectives for the Cottonwood Allotment. Input was received from the permittee and N-4 Grazing Board/RCI.

Appendices I through V show the management objectives for livestock and wild horses, wildlife, and riparian on the allotment. These objectives are in conformance with and formulated to accomplish the land use plan objectives and Mojave-Southern Great Basin Area Standards as they relate to all grazing use on the Cottonwood Allotment.

**THEREFORE, BASED UPON THE EVALUATION OF MONITORING DATA FOR THE COTTONWOOD ALLOTMENT, RECOMMENDATIONS FROM DISTRICT STAFF, INPUT RECEIVED THROUGH CONSULTATION, COOPERATION, AND COORDINATION WITH THE PERMITTEE, N-4 GRAZING BOARD/RCI, AND PUBLIC INTEREST GROUPS, THE PROPOSED DECISION IS AS FOLLOWS:**

The analysis of monitoring data has revealed that three of the five multiple use objectives for the Cottonwood Allotment are not being met under the existing management practices; therefore, implementation of management actions and adjustments to livestock and wild horses are necessary to meet these objectives. Allowable use levels for the key species selected for specific use areas on the allotment have been exceeded; use pattern data indicates poor distribution of livestock and wild horses, and long term studies data show a static trend of range sites. Livestock and wild horse grazing contributed to the high use levels recorded on the Cottonwood Allotment. Grazing use is adjusted to allow for short term (allowable use level) objectives and associated long term objectives to be met. These adjustments would initiate the required improvement of rangeland conditions. Wildlife use is not contributing to the non attainment of multiple use objectives.

**LIVESTOCK MANAGEMENT DECISION**

In accordance with 43 CFR 4110.3 and 4110.3-2(b) and 4130.3-1(a), the current Authorized Livestock Use shall be changed effective November 1, 1997 as follows:

**COTTONWOOD ALLOTMENT**

From:	<u>Total</u>	<u>Suspended</u>	<u>Active Preference</u>
	4,106	0	4,106

To:	<u>Authorized Use</u>	<u>Conservation Use*</u>	<u>Active Use</u>
	2,248	386	1,862

\* Mandatory non-use required for conservation and protection purposes, the average number of AUMs of the three seeded pastures to cover one pasture being rested each year.

**The Total Number of Animal Unit Months of Specified Livestock Grazing.**

Authorized livestock use effective 11/1/97 as follows:

<u>Livestock No.</u>	<u>Kind</u>	<u>Period of Use</u>	<u>% PL</u>	<u>Active Use</u>
250	Cattle	11/1-6/15	100	1,862

In accordance with 43 CFR 4130.3-2, the following terms and conditions are hereby made a part of the grazing permit, for the Cottonwood Allotment effective November 1, 1997:

- Grazing will be in accordance with the rest rotation grazing system as outlined in Table 1 for cattle with a season of use from 11/01 to 06/15.

**TABLE 1: Grazing Schedule for the Cottonwood Allotment.**

<b>YEARLY GRAZING SCHEDULE</b>	
<b>PASTURE</b>	<b>PERIOD OF USE</b>
<b>YEAR 1</b>	
NATIVE	11/01 to 03/13
Upper and Middle	03/14 to 05/03
Lower	05/04 to 06/15
Deer Flat	REST
<b>YEAR 2</b>	
NATIVE	11/01 to 03/13
Deer Flat	03/14 to 05/03
Upper and Middle	05/04 to 06/15
Lower	REST
<b>YEAR 3</b>	
NATIVE	11/01 to 03/13
Lower	03/14 to 04/21
Deer Flat	04/22 to 06/15
Upper and Middle	REST
<b>YEAR 4</b>	
REPEAT CYCLE STARTING WITH YEAR 1	



2. To improve livestock distribution; mineral block and/or salt block will be placed a minimum distance of 1/2 mile from water, increased livestock movement by herding and water hauling. Water haul sites will be determined through consultation with permittee during annual use authorizations.
3. When livestock are moved out of a seeded pasture, gates will be closed.
4. Certified actual use report by use area and pasture is due 15 days after the end of the authorized grazing period.

### **TRANSFER APPLICATION DECISION**

On March 28, 1997 Huntsman Ranch LLC submitted a transfer application requesting that Gordon Kirkeby's grazing privileges for the Cottonwood and Scotty Meadows Allotments be transferred to them. After considering the livestock management decision and the transfer application, my decision is to approve the transfer as follows:

#### **Cottonwood**

Authorized use will be as follows.

Authorized Use

2,248

#### **Scotty Meadows**

Authorized use will be as follows:

Authorized Use

1,227

**RATIONALE:** The analysis and evaluation of available monitoring data indicates that the current stocking rate and management practices must be modified to meet the multiple use management objectives for the Cottonwood Allotment as identified in the Appendices. The data indicates that 2,248 AUMs are available for livestock, and that active preference is 1,858 AUMs in excess of the livestock carrying capacity. Since livestock are contributing to the non attainment of multiple use objectives on the allotment, livestock are being reduced. The prescribed adjustments in stocking rates, grazing practices and increased intensity of management will initiate the accomplishment of the multiple use objectives. These actions are necessary to improve the natural ecological balance of the area's vegetative resources for all users by improving plant diversity in plant communities. In addition these actions will increase desirable plant species in the area.

No changes to the terms and conditions for Scotty Meadows are proposed at this time. The

allotment evaluation process currently in place will be used in the future to modify the terms and conditions if warranted. Scotty Meadows Allotment is not within an HMA.

**AUTHORITY:** The authority for this proposed decision is contained in Title 43 of the Code of Federal Regulations, which states in pertinent parts:

4100.0-8: "The authorized officer shall manage livestock grazing on public lands under the principle of multiple use and sustained yield, and in accordance with applicable land use plans. Land use plans shall establish allowable resource uses (either singly or in combination), related levels of production or use to be maintained, areas of use, and resource condition goals and objectives to be obtained. The plans also set forth program constraints and general management practices needed to achieve management objectives. Livestock grazing activities and management actions approved by the authorized officer shall be in conformance with the land use plan as defined at 43 CFR 1601.0-5(b)."

4110.3: "The authorized officer shall periodically review the permitted use specified in a grazing permit or grazing lease and shall make changes in the permitted use as needed to manage, maintain or improve rangeland productivity, to assist in restoring ecosystems to properly functioning condition, to conform with land use plans or activity plans, or to comply with the provisions of subpart 4180. These changes must be supported by monitoring, field observations, ecological site inventory or other data acceptable to the authorized officer."

4110.3-2(b): "When monitoring or field observations show grazing use or patterns of use are not consistent with the provisions of subpart 4180, or grazing use is otherwise causing an unacceptable level or pattern of utilization or, when use exceeds the livestock carrying capacity as determined through monitoring, ecological site inventory or other acceptable methods, the authorized officer shall reduce permitted grazing use or otherwise modify management practices."

4110.3-3(a): "After consultation, cooperation and coordination with the affected permittee or lessee, the State having lands or managing resources within the area, and the interested public, reductions of permitted use shall be implemented through a documented agreement or by decision of the authorized officer..."

4130.3: "Livestock grazing permits and leases shall contain terms and conditions determined by the authorized officer to be appropriate to achieve the management and resource condition objectives for the public lands and other lands administered by the Bureau of Land Management, and to ensure conformance with the provisions of subpart 4180 of this part."

4130.3-1(a): "The authorized officer shall specify the kind and number of livestock, the period(s) of use, the allotment(s) to be used, and the amount of use, in animal unit months, for every grazing permit or lease. The authorized livestock grazing use shall not exceed the livestock carrying capacity of the allotment."

4130.3-2: "The authorized officer may specify in grazing permits or leases other terms and conditions which will assist in achieving management objectives, provide for proper range management or assist in the orderly administration of the public rangelands..."

#### **PROTEST:**

Any applicant, permittee, lessee or other affected interest may protest the livestock grazing portion of this proposed multiple-use decision under 43 CFR Sec. 4160.1, in person or in writing to Hal M. Bybee, ADM Renewable Resources, HC 33 Box 33500, Ely, Nevada 89301-9408 within 15 days after receipt of such decision. The protest if filed, should clearly and concisely state the reason(s) as to why the proposed decision is in error.

Subsequent to the protest period, a final multiple-use decision will be issued specifying the appeal procedures.

#### **WILD HORSE AND BURRO MANAGEMENT PROPOSED DECISION**

Manage wild horses at the appropriate management level (AML) of 4 horses (44 AUMs) in that portion of the Cottonwood Allotment within the Wilson Creek Herd Management Area (HMA). This AML will maintain a thriving natural ecological balance and prevent deterioration of the range.

AML will remain at 4 wild horses  $\pm 15\%$  for the Cottonwood Allotment unless further monitoring data indicates a change is necessary.

The AML for this small portion of the HMA, in combination with Wilson Creek and Geyser Ranch Allotments which contain most of the HMA, will set the total AML at 159 wild horses (1,911 AUMs) for the Wilson Creek HMA. Removals will occur on an HMA basis and numbers will be maintained at or near the total AML. Numbers within use areas and/or allotments may be higher or lower than the numbers identified above because of seasonal movements, but the total AML for the HMA will be maintained.

In accordance with 43 CFR 4700.0-6(a), wild horse use on the Cottonwood Allotment shall be managed at forty four AUMs or four horses yearlong in this portion of Wilson Creek Herd Management Area (HMA).

In accordance with 43 CFR 4720.1, all wild horses in excess of the appropriate management level for the total HMA will be removed.

Monitoring will continue to ensure that AML is maintaining a thriving natural ecological balance.

**RATIONALE:** The analysis and evaluation of available monitoring data indicates that a change in management actions for wild horses is needed to meet multiple use management objectives on the Cottonwood Allotment as identified in the Appendices. The data indicates 44 AUMs of forage available for wild horses on the Cottonwood Allotment in the Wilson Creek HMA.

**AUTHORITY:** The authority for this decision is contained in Sec. 3(a) and (b) of the Wild Free-Roaming Horse and Burro Act (P.L. 92-195), as amended, and in Title 43 of the Code of Federal Regulations, which states in pertinent parts:

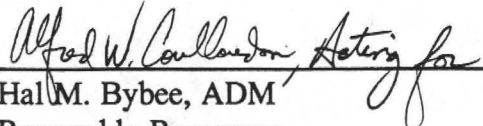
4700.0-6(a): "Wild horses and burros shall be managed as self-sustaining populations of healthy animals in balance with other uses and the productive capacity of their habitat."

4710.4: "Management of wild horses and burros shall be undertaken with the objective of limiting the animals' distribution to herd areas. Management shall be at the minimum level necessary to attain the objectives identified in approved land use plans and herd management area plans."

4720.1: "Upon examination of current information and a determination by the authorized officer that an excess of wild horses or burros exists, the authorized officer shall remove the excess animals immediately..."

**PROTEST:**

Although the 4700 regulations allow for an appeal with no mention of a protest, for the purpose of consistency with the livestock management portion of this decision, the entire multiple use decision is initially being sent as a "Proposed" decision. If you wish to protest this decision, in whole or in part, you are allowed fifteen (15) days from receipt of this notice within which to file a protest with the ADM Renewable Resources, Bureau of Land Management, HC 33 Box 33500, Ely, Nevada 89301. Subsequent to the protest period, a final decision will be issued, regardless of whether or not any protests were received. The final decision may be modified in light of pertinent information brought forth during the protest period.

  
Hal M. Bybee, ADM  
Renewable Resources



(Certified Mail No.)

Huntsman Ranch LLC	(P 313 269 719)
Kirkeby Ranch	(P 313 269 720)
Nevada Division of Wildlife, Region III	(P 313 269 721)
Nevada Division of Wildlife, Kraig Beckstrand	(P 313 269 722)
U.S. Fish and Wildlife Service	(P 313 269 723)
Nevada State Grazing Board, N-4	(P 313 269 724)
Natural Resources Defense Council	(P 313 269 725)
Animal Protection Institute of America	(P 313 269 726)
Sierra Club, Toiyabe Chapter	(P 313 269 727)
Nevada Cattlemen's Association	(P 313 269 728)
Commission for the Preservation of Wild Horses	(P 313 269 729)
Marvel and Hansen	(P 313 269 730)
Lincoln County Commissioners	(P 313 269 731)
Lincoln County Public Lands Commission	(P 313 269 732)
Wild Horse Organized Assistance	(P 313 269 733)
Nevada Outdoor Recreation Association	(P 313 269 734)
American Wildlands	(P 313 269 735)
International Society for Protection Of Mustangs and Burros	(P 313 269 736)
Resource Concepts, Inc.	(P 313 269 737)

## **APPENDIX I: Allotment Specific Objectives**

### **Livestock**

- (1) The short term objective will be accomplished through managing the allowable use level (AUL) by season of use to improve or maintain the desired vegetative community throughout the allotment including crested wheatgrass seedings.
- (2) The long term objective is to improve those acres in poor or fair livestock forage condition and maintain all acres presently in good livestock forage condition by managing for those seral stages which optimize livestock forage production.
- (3) The long term objective is to improve those acres in poor or fair livestock forage condition on seeded rangeland.

### **Wild Horses**

- (1) The short term objective will be accomplished through managing the allowable use level (AUL) by season to improve or maintain the desired vegetative community.
- (2) The long term objective is to manage for the most appropriate seral stage to provide the desired quantity, quality, variety, and density of forage in order to meet the requirements of the wild horses.

### **Mule Deer**

- (1) The short term objective is to limit yearlong use on key species to 40 percent for perennial grasses, grass-like plants, and forbs and to 35 percent for shrubs if the mule deer range is in poor habitat condition. If the range is in fair condition or better, the objective is to limit yearlong use on key species to 55 percent for perennial grasses, grass-like plants, and forbs and to 45 percent for shrubs.
- (2) The long term objective is to maintain mule deer range in at least fair habitat condition by providing diversity of forage species.

### **Pronghorn Antelope**

- (1) The short-term objective is to limit use on key perennial grasses and forbs listed for antelope kidding ground to 30 percent until June 30, and to 40

percent yearlong; also limit yearlong use on key shrubs to 45 percent.

- (2) The long-term objective is to improve antelope kidding ground from fair to good habitat condition.

### **Riparian Areas**

- (1) The short term objective is to limit use on riparian areas to 50 percent for key species by all animals yearlong.
- (2) The long term objective is to maintain riparian areas in proper functioning condition.

**APPENDIX II**

**ALLOTMENT: COTTONWOOD - LIVESTOCK OBJECTIVES (Seedings)**

Study No.	Key Area Location	Ecological Site No.	Key Species	PRESENT SITUATION			LONG TERM OBJECTIVE		SHORT TERM OBJECTIVE		
				Key Spp % Comp By Weight	Livestock Forage Condition	Maintain or Improve	Key Spp % Comp By Weight	Livestock Forage Condition	Allowable Use Level	Season of Use	
C01	Upper Pasture	N/A	AGCR	79%	Good	Maintain	>79%	Good	60%	3/14-06/15	
C02	Upper Pasture	N/A	AGCR	61%	Good	Improve	70%	Good	60%	3/14-06/15	
C03	Deer Flat Pasture	N/A	AGCR	71%	Good	Maintain	>71%	Good	60%	3/14-06/15	
C04	Deer Flat Pasture	N/A	AGCR	79%	Good	Maintain	>79%	Good	60%	3/14-06/15	
C05	Lower Pasture	N/A	AGCR	73%	Good	Maintain	>73%	Good	60%	3/14-06/15	
C06	Middle Pasture	N/A	AGCR	50%	Fair	Improve	70%	Good	60%	3/14-06/15	



**APPENDIX III**

**ALLOTMENT: COTTONWOOD - LIVESTOCK AND WILD HORSE OBJECTIVES (Native)**

Study No.	Key Area Location	Ecological Site No.	Key Species	PRESENT SITUATION		LONG TERM OBJECTIVE		SHORT TERM OBJECTIVE		
				Key Spp % Comp By Weight	Seral Stage (% of PNC)	Maintain or Improve	Key Spp % Comp By Weight	Seral Stage (% of PNC)	Allowable Use Level	Season of Use
CAW01	T. 9 N., R. 68 E., Sec 14	028BY011 NV	ORHY EULA ARARN	21 66	Mid 41	Improve	5 5 <66	Late 55 - 60	50% 45% 45%	Year-long *

\* Season of use for cattle 11/1-3/13, wild horse yearlong.

**APPENDIX IV**

**ALLOTMENT: COTTONWOOD - WILDLIFE OBJECTIVE**

PRESENT SITUATION      LONG TERM OBJECTIVE      SHORT TERM OBJECTIVE

Study No.	Key Area Location	Key Species	Habitat Condition Rating 1/	Maintain or Improve	Habitat Condition Improve	Allowable Use Level	Season of Use
South Spring Valley AKG	T. 9 N., R. 68 E., Sec. 14	PHLOX ORHY ARARN	42(Fair)	Improve	>61% (good)	40% 40% 45%	Yearlong

**APPENDIX V**

**ALLOTMENT: COTTONWOOD - RIPARIAN OBJECTIVES**

			PRESENT SITUATION	LONG TERM OBJECTIVES		SHORT TERM OBJECTIVES	
Study No.	Key Area Location	Key Species	Functioning Condition	Maintain or Improve	Functioning Condition	Allowable Use Level	Season of Use
Pipe Spring	T. 8 N., R. 67 E., Sec. 3 SWSE	SALIX	Proper Functioning Condition	Maintain	Proper Functioning Condition	50%	Yearlong
Cottonwood Spring	T. 9 N., R. 67 E., Sec. 27 SENW	POA++ ELCI2 SALIX	Proper Functioning Condition	Maintain	Proper Functioning Condition	50% 50%	Yearlong

# MANAGEMENT ACTION SELECTION REPORT

## COTTONWOOD ALLOTMENT

APR 8 1997

### A. INTRODUCTION

The Cottonwood Allotment Evaluation was conducted in accordance with the direction set forth in the Washington Office Instruction Memorandum No. 86-706, and is based on monitoring data collected between 1982 and 1992. The draft allotment evaluation and management action selection report were sent out for consultation, cooperation, and coordination with interested publics and the affected permittee on October 12, 1993 and July 13, 1995 respectively. The base property for the Cottonwood Allotment grazing privileges recently sold to Huntsman Ranch LLC. Huntsman's have submitted an application to have the grazing privileges transferred from Gordon Kirkeby to Huntsman Ranch LLC.

A moderate amount of public comment was received pertaining to the Cottonwood Allotment Evaluation conducted in the Ely District. Copies of the comment letters pertaining specifically to this allotment can be found in Section VII of the allotment evaluation summary, located in the Ely District files. All allotment-specific comments were carefully considered for incorporation into the final evaluation. Some of the primary concerns are addressed as follows:

A comment was received from the permittee on the change of season of use for the crested wheatgrass seedings and the problems with grass tetany and spring use. The establishment of a spring rest rotation grazing system for the seeded pastures and primarily winter use treatment for the native range should increase forage production, grass and forb composition, and plant vigor throughout the allotment. The grazing system will also increase available forage on the allotment over the long term. In practice, supplemental magnesium from a variety of inorganic sources is effective in preventing grass tetany.

A comment was received from the permittee on why Basin Spring, Cow Haven Spring, and Deer Flat Spring were not included in the evaluation. Basin Spring, Cow Haven Spring, and Deer Flat Spring were examined in the fall of 1993. Basin Spring and Cow Haven Spring were dry, and have been dry for several years. Deer Flat Spring had been developed; however, the old concrete spring box and trough have deteriorated and are no longer functional. Flow at Deer Flat Spring appears to be very low. In addition, there are no riparian areas associated with these springs.

The permittee restated his long standing complaint about the boundary fences needing re-alignment. As explained to the permittee during various meetings in the past, the BLM will not reconstruct the boundary fences. All maintenance on fences will be in accordance with cooperative agreements and the District Managers Decision dated 8/4/86. The new permittees have not expressed any concerns over this issue.



copy  
A comment was received concerning the use of the Sneva and Hyder Crop Yield Index. The yield index is not used to "correct" utilization levels as suggested. The determination of whether or not allowable use levels were exceeded is based on actual utilization measured. The index is used to account for the effect of yearly climate variations on the calculation of appropriate stocking levels for all users. Since it is not feasible to adjust numbers of all grazing animals (livestock, wildlife, and wild horses) on a yearly basis to respond to annual fluctuations in precipitation, an average carrying capacity is determined based on a "normal" year. The effects of precipitation on carrying capacity must be considered. After review of existing research on this subject, the Ely District chose the Sneva and Hyder model as the most appropriate for this region. Authority to use the yield index is provided in BLM Technical Reference #4400-7 and Instruction Memorandum No. NV-89-468 and has been supported by a recent court ruling by an Administrative Law Judge in Oregon.

Some concerns were expressed over short term allowable use level objectives. The allowable use levels recommended in the Nevada Rangeland Monitoring Handbook were used in conjunction with existing research as guidelines to establish acceptable use levels. The use levels from the handbook were considered appropriate on most native ranges to maintain the present plant community under yearlong or fall/winter use; however, the literature suggests that more conservative utilization levels are necessary during critical spring growth on sensitive areas or to improve condition within acceptable time-frames on certain plant communities. The information also supports that higher utilization levels are appropriate for seeded ranges and for native ranges under an intensive management system. Allowable use levels were developed for key species within individual use areas in each allotment taking into consideration these guidelines, monitoring observations, and site-specific factors.

Conclusions of the evaluation were based upon monitoring data collected and consultation, cooperation, and coordination from the following sources:

Range, wildlife, and wild horse monitoring files compiled by the Ely District staff.

Input from Permittee: Gordon A. Kirkeby through letters and meetings dated November 8, 1993, November 17, 1993, December 4, 1993, August 15, 1995, August 22, 1995, September 13, 1995, September 29, 1995, June 20, 1996, December 12, 1996, and December 18, 1996.

Input from the N-4 Grazing Board/Resource Concepts Inc. through a letter dated October 20, 1993.

## **B. ANALYSIS OF MONITORING DATA**

Based on the identified issues of the evaluation, three of the five land use plan objectives for the allotment are not being met under the existing management practices; therefore,

implementation of management actions and/or adjustments to livestock and wild horse numbers are necessary to meet these objectives. Allowable use levels for the key species selected for specific use areas on the allotment have been exceeded; use pattern data indicates poor distribution of livestock. Livestock actual use records show a significant amount of voluntary nonuse applied for by the permittee over the past years. Livestock contributed to the high use levels recorded on the allotment.

A portion of the allotment is within the Wilson Creek Wild Horse Herd Management Area (HMA)(map 1). Based on census data, wild horses mostly use the portion of the allotment west of the seedings which is the east side of the Fortification Range. It appears that the horses move from the west side of the Fortifications onto the allotment for a short period of time in the spring, and then move back to the west.

### **C. SELECTED MANAGEMENT ACTION**

#### **LIVESTOCK**

The selected management actions are a combination of the options listed under Section VI of the Cottonwood Allotment Evaluation and input from the past and present permittees and affected interests. Short term management actions for livestock and wild horses will be implemented the first year. The long term management actions are necessary to make progress towards attainment of multiple use management objectives (Appendix II, III, and IV). Implementation of long-term management actions such as range improvement projects are dependent on staff and funding availability.

The selected management actions for the Cottonwood Allotment are as follows:

#### **1. Short Term**

- a. Reduce authorized use a total of 1,858 AUMs from 4,106 AUMs to 2,248. This preference adjustment is based on evaluation of monitoring data towards the accomplishment of multiple use objectives.

Shorten the period of use in June by two weeks. This allows for more livestock numbers for a shorter period of time.

- b. Implement a three pasture rest rotation grazing system for the crested wheatgrass seedings. Upper and Middle Pastures would be combined to form one pasture having 386 AUMs. Lower and Deer Flat Pastures would make up the other two pastures of the grazing system. Lower Pasture has 320 AUMs and Deer Flat Pasture has 452 AUMs. This totals 1,158 AUMS in the crested wheatgrass seedings. The implementation of a grazing system will provide year-long rest for one of the three pastures each year. The Native Pasture will be grazed each

winter; this will improve forage condition by avoiding grazing during the critical spring growth period.

The grazing system will accommodate 250 cows from 11/01 to 06/15. Periods of use and treatment level will be adjusted by pasture to account for the disproportionate carrying capacities among pastures (Table 1 and Map 1).

Table 1: Grazing Schedule for the Cottonwood Allotment.

<b>YEARLY GRAZING SCHEDULE</b>	
<b>PASTURE</b>	<b>PERIOD OF USE</b>
<b>YEAR 1</b>	
NATIVE	11/01 to 03/13
Upper and Middle	03/14 to 05/03
Lower	05/04 to 06/15
Deer Flat	REST
<b>YEAR 2</b>	
NATIVE	11/01 to 03/13
Deer Flat	03/14 to 05/03
Upper and Middle	05/04 to 06/15
Lower	REST
<b>YEAR 3</b>	
NATIVE	11/01 to 03/13
Lower	03/14 to 04/21
Deer Flat	04/22 to 06/15
Upper and Middle	REST
<b>YEAR 4</b>	
REPEAT CYCLE STARTING WITH YEAR 1	

- c. Improve livestock distribution with better salting practices and water hauling. Heavy use could be alleviated by placing salt no closer than

1/2 mile from water and water hauling. Water haul sites will be determined through consultation with permittee during annual use authorizations.

## 2. Long Term

- a. Improve deteriorated and/or unproductive rangeland to secondary successional stages through vegetative manipulations to enhance livestock and wildlife habitat. This will be accomplished by performing seeding maintenance on the Middle, Lower, and Deer Flat seedings. This would provide additional forage for livestock and wildlife while meeting the long-term objective established for the seedings.
- b. Improve livestock distribution by constructing a water pipeline extension from the Cottonwood Pipeline located in T9N R67E sec 30 to a trough in T9N R68E sec 8. (map 2).
- c. Improve livestock distribution by constructing a fence within the native pasture to divide the native into two manageable sections. Fence would begin at T9N R68E sec 31 run due east to the allotment boundary in T9N R68E sec 35 (Map 2). After construction a rotation schedule would be developed for the native range. This fence would have no impacts on the Wilson Creek HMA wild horses.

## WILD HORSES

Manage the wild horses on the Cottonwood Allotment at 4 horses yearlong (44 AUMs)  $\pm$  15% which has been determined to be the optimum level to maintain the thriving natural ecological balance in this portion of the Wilson Creek Herd Management Area (HMA).

## RATIONALE

Monitoring data indicates that the present livestock situation has resulted in unacceptable use patterns (heavy to severe use). The short term and long term objectives would be met with the recommended adjustments in grazing use as discussed in Appendix I to establish proper carrying capacities based on sustained yield, to improve the vigor and production of key forage plants, and to prevent the invasion of undesirable annual plants, such as halogeton. The establishment of a rest rotation grazing system for the seeded pastures and primarily winter use treatment for the native range should increase forage production, grass and forb composition and plant vigor throughout the allotment. Improved management practices to improve distribution, increased herding, water hauling, and water developments would also aid in meeting resource objectives throughout the allotment.

Wildlife use on the allotment have not contributed to the non attainment of multiple use



objectives. Limiting livestock use in the Native Pasture from 11/1 to 3/13 would improve habitat condition of antelope kidding grounds.

Based on census data, wild horses are using the allotment approximately 4 months of the year, from March to June. Based on 1990 utilization data and census data, wild horses were the primary contributors to heavy utilization levels on a portion of the allotment west of the Upper Pasture. There were 14 horses (56 AUMs) counted in March 1990. To reduce utilization levels from 70% to 50% on grasses, a reduction to 4 horses yearlong (44 AUMs) is necessary in order to meet the short-term objectives. Appropriate Management Level (AML) for the allotment is 4 horses yearlong (44 AUMs). This has been determined to be the optimum level in order to achieve a thriving natural ecological balance in this portion of the Wilson Creek HMA. The AML for this small portion of the HMA in combination with Wilson Creek and Geyser Ranch Allotments which contain most of the HMA, will set the total AML at 159 Horses (1,911 AUMs) for the Wilson Creek HMA.

#### **D. OBJECTIVES**

The allotment objectives under which grazing use, as stated above, will be monitored and evaluated are listed below (Appendix II, III, and IV for site specific objectives). These objectives are a quantification of Land Use Plan/Rangeland Program Summary objectives and Mojave-Southern Great Basin Area Resource Advisory Council standards.

##### 1. Allotment Specific Objectives

###### Livestock

- (1) The short term objective will be accomplished through managing the allowable use level (AUL) by season of use to improve or maintain the desired vegetative community throughout the allotment. Addresses standard 1 (Appendix V).
- (2) The long term objective is to improve those acres in poor or fair livestock forage condition and maintain all acres presently in good livestock forage condition by managing for those seral stages which optimize livestock forage production. Addresses standard 3 (Appendix V).
- (3) The long term objective is to improve those acres in poor or fair livestock forage condition on seeded rangeland. Addresses standard 3 (Appendix V).

###### Wild Horses

- (1) The short term objective will be accomplished through managing the allowable use level (AUL) by season to improve or maintain the desired vegetative community. Addresses standard 1 (Appendix V).

- (2) The long term objective is to manage for the most appropriate seral stage to provide the desired quantity, quality, variety, and density of forage in order to meet the requirements of the wild horses. Addresses standard 3 (Appendix V).

#### Mule Deer

- (1) The short term objective is to limit yearlong use on key species to 40 percent for perennial grasses, grass-like plants, and forbs and to 35 percent for shrubs if the mule deer range is in poor habitat condition. If the range is in fair condition or better, the objective is to limit yearlong use on key species to 55 percent for perennial grasses, grass-like plants, and forbs and to 45 percent for shrubs. Addresses standard 1 (Appendix V).
- (2) The long term objective is to maintain mule deer range in at least fair habitat condition by providing diversity of forage species. Addresses standard 3 (Appendix V).

#### Pronghorn Antelope

- (1) The short-term objective is to limit use on key perennial grasses and forbs listed for antelope kidding ground to 30 percent until June 30, and to 40 percent yearlong; also limit yearlong use on key shrubs to 45 percent. Addresses standard 1 (Appendix V).
- (2) The long-term objective is to improve antelope kidding ground from fair to good habitat condition. Addresses standard 3 (Appendix V).

#### Riparian Areas

- (1) The short term objective is to limit use on riparian areas to 50 percent for key species by all animals yearlong. Addresses standard 1 (Appendix V).
- (2) The long term objective is to maintain riparian areas in proper functioning condition. Addresses standard 2 (Appendix V).

### **E. GRAZING ADJUSTMENTS**

(Appendix I for Stocking Rate Calculations)  
Authorized Use will be adjusted as follows:

From: Total    Suspended    Active Preference  
 4,106            0                    4,106

To:    Authorized Use            Nonuse\*            Active Use  
           2,248                            386                    1,862

\* Mandatory non-use required for conservation and protection purposes is the average number of AUMs of the three seeded pastures to cover one pasture being rested each year.

**The Total Number of Animal Unit Months of Specified Livestock Grazing.**

Authorized livestock use effective 11/1/97 is as follows:

<u>Livestock No.</u>	<u>Kind</u>	<u>Period of Use</u>	<u>% PL</u>	<u>Active Use</u>
250	Cattle	11/1-6/15	100	1,862

The following terms and conditions will be a part of the grazing permit:

1. Grazing will be in accordance with the rest rotational grazing system as outlined in Table 1 for cattle with a season of use from 11/01 to 06/15.
2. To improve livestock distribution, mineral block and/or salt block will be placed a minimum distance of 1/2 mile from water, increased livestock movement by herding and water hauling. Water haul sites will be determined through consultation with permittee during annual use authorizations.
3. When livestock are moved out of a seeded pasture, gates will be closed.
4. Certified actual use report by use area and pasture is due 15 days after the end of the authorized grazing period.

**F. FUTURE MONITORING AND GRAZING ADJUSTMENTS**

The Ely District will continue to monitor all existing studies and establish additional studies as identified in Section VI of the Allotment Evaluation. This monitoring data will continue to be collected in the future to provide the necessary information for subsequent evaluations following the decision. These evaluations are necessary to determine if the allotment specific objectives are being met under the new grazing management strategies. In addition, these subsequent evaluations will determine if additional adjustments are required to meet the established allotment specific objectives.

As funding becomes available, data on distribution of wild horses will be collected along with annual census data.

## APPENDIX I

### STOCKING LEVEL CALCULATION PROCEDURES COTTONWOOD ALLOTMENT

Historically no grazing system was implemented on the Cottonwood Allotment following the development of seeding projects. The Deer Flat, Lower, Upper and Middle Seedings were established by the BLM in cooperation with the permittee between 1957 and 1965. Portions of the Lower Pasture were reseeded or extended in other areas in the summer of 1981. A stocking rate analysis following the vegetation treatment projects was never performed by the BLM.

The permittee did not submit actual use reports indicating livestock use by pasture as required during the evaluation period. Utilization data was collected by pasture and use pattern mapping data was collected for the whole allotment.

A stocking rate analysis was performed using licensed use each year for the whole allotment. Six years of data indicated an average desired stocking level of 2,248 AUMs.

The desired stocking level for the Cottonwood Allotment was determined using the following formula (BLM Technical Reference 4400-7):

$$\frac{\text{Actual Use (AUMs)}}{\text{Actual \% Utilization}} = \frac{\text{Desired Use (AUMs)}}{\text{Desired \% Utilization}}$$

**TABLE I**  
CALCULATED LIVESTOCK STOCKING RATES

Year	Estimated Livestock AUMs	Livestock Actual Utilization	Yield Index	Adjusted Utiliz	Desired Utiliz	Desired Use AUMs
1984	1,840	74%	.89	65.9%	60%	1,675
1985	2,440	72%	1.37	98.6%	60%	1,485
1986	3,535	*	1.07	*	60%	**
1987	2,188	*	0.96	*	60%	**
1988	2,800	*	0.60	*	60%	**
1989	2,127	70%	0.60	42.0%	60%	3,039
1990	1,237	70%	0.48	33.6%	60%	2,209
1991	1,922	67%	0.53	35.5%	60%	3,248
1992	1,925	76%	0.83	63.1%	60%	1,830
AVG/2,224						AVG/2,248

\* Livestock actual utilization data was not collected.

\*\* Desired Use AUMs were not calculated.

## APPENDIX I CONT.

In order to determine a stocking rate to manage each pasture on a sustained yield basis, it was decided to collect production data in each seeded pasture. The data was analyzed and used to determine a stocking level for each seeded pasture.

Forage production calculations indicated that 1158 AUMS were available in the four seeded pastures (i.e., Upper Seeding (188 AUMs), Middle Seeding (198 AUMs), Lower Seeding (320 AUMs), and Deer Flat Seeding (452 AUMs).

Subtracting the stocking rate for the seeded pastures based on production data from the Desired Stocking Rate for the whole allotment (2248 AUMs) there is a difference of 1090 AUMs (i.e., 2248 minus 1158 = 1090). This leaves 1090 AUMs for the Native Range as shown in the draft evaluation.

The stocking rate analysis by pasture was applied to the recommended three-pasture spring/fall rest rotation grazing system for the seeded pastures. The native pasture will receive primarily winter use each year. Implementation of a three-pasture rest-rotation grazing system will require one pasture to be rested each year. Nonuse will be required each year for the rested pasture. The recommended grazing practices will improve the current management practices and should provide more forage on a sustained yield basis and allow for progress to be made towards attainment of multiple use objectives for the allotment.

## APPENDIX I CONT.

### FORAGE PRODUCTION CALCULATIONS CRESTED WHEATGRASS PASTURES

#### Upper Seeding

$$\frac{* 1,235 \text{ Ac.} \times 203 \text{ lbs/Ac.} \times 60\% \text{ (proper use)}}{800 \text{ lbs forage/AUMs}} = 188 \text{ AUMs}$$

$$\frac{1,235 \text{ Ac.}}{188 \text{ AUMs}} = 6.6 \text{ Ac./AUMs}$$

#### Middle Seeding

$$\frac{*1,510 \text{ Ac.} \times 175 \text{ lbs/Ac.} \times 60\% \text{ (proper use)}}{800 \text{ lbs forage/AUMs}} = 198 \text{ AUMs}$$

$$\frac{1,510 \text{ Ac.}}{198 \text{ AUMs}} = 7.6 \text{ Ac./AUMs}$$

#### Lower Seeding

$$\frac{*1,677 \text{ Ac.} \times 255 \text{ lbs/Ac} \times 60\% \text{ (proper use)}}{800 \text{ lbs forage/AUMs}} = 320 \text{ AUMs}$$

$$\frac{1,677 \text{ Ac.}}{321 \text{ AUMs}} = 5.2 \text{ Ac./AUMs}$$

#### Deer Flat Seeding

$$\frac{*1,023 \text{ Ac.} \times 590 \text{ lbs/Ac} \times 60\% \text{ (proper use)}}{800 \text{ lbs forage/AUMs}} = 452 \text{ AUMs}$$

$$\frac{1,023 \text{ Ac.}}{453 \text{ AUMs}} = 2.3 \text{ Ac./AUMs}$$

\* The acreage figures represent the treated acres within the pasture.



**APPENDIX II**

**ALLOTMENT: COTTONWOOD - LIVESTOCK OBJECTIVES (Seedings)**

Study No.	Key Area Location	Ecological Site No.	Key Species	PRESENT SITUATION			LONG TERM OBJECTIVE		SHORT TERM OBJECTIVE				Rationale
				Key Spp % Comp By Weight	Livestock Forage Condition	Maintain or Improve	Key Spp % Comp By Weight	Livestock Forage Condition	Allowable Use Level	Season of Use	Met or Not Met		
C01	Upper Pasture	N/A	AGCR	79%	Good	Maintain	>79%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	
C02	Upper Pasture	N/A	AGCR	61%	Good	Improve	70%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	
C03	Deer Flat Pasture	N/A	AGCR	71%	Good	Maintain	>71%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	
C04	Deer Flat Pasture	N/A	AGCR	79%	Good	Maintain	>79%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	
C05	Lower Pasture	N/A	AGCR	73%	Good	Maintain	>73%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	
C06	Middle Pasture	N/A	AGCR	50%	Fair	Improve	70%	Good	60%	3/09-06/30	Not Met	Allowable Use Levels Exceeded	

**APPENDIX II (con't)**

**ALLOTMENT: COTTONWOOD - LIVESTOCK OBJECTIVES (Native)**

Study No.	Key Area Location	Ecological Site No.	Key Species	PRESENT SITUATION			LONG TERM OBJECTIVE		SHORT TERM OBJECTIVE			
				Key Spp % Comp By Weight	Seral Stage (% of PNC)	Maintain or Improve	Key Spp % Comp By Weight	Seral Stage (% of PNC)	Allowable Use Level	Season of Use	Met or Not Met	Rationale
CAW01	T. 9 N., R. 68 E., Sec 14	028BY011 NV	ORHY EULA5 ARARN	2 1 66	Mid 41	Improve	5 5 <66	Late 55 - 60	50% 45% 45%	11/1- 3/26	Not Met	Allowable Use Level Was Exceeded

**APPENDIX III**

**ALLOTMENT: COTTONWOOD - WILDLIFE OBJECTIVE**

Study No.	Key Area Location	Key Species	PRESENT SITUATION		LONG TERM OBJECTIVE		SHORT TERM OBJECTIVE		
			Habitat Condition Rating 1/	Maintain or Improve	Habitat Condition Improve	Allowable Use Level	Season of Use	Met or Not Met	Rationale
South Spring Valley AKG	T. 9 N., R. 68 E., Sec. 14	PHLOX ORHY ARARN	42(Fair)	Improve	>61% (good)	40% 40% 45%	Yearlong	Not Met	Habitat condition is less than good

**APPENDIX IV**

**ALLOTMENT: COTTONWOOD - RIPARIAN OBJECTIVES**

			PRESENT SITUATION	LONG TERM OBJECTIVES		SHORT TERM OBJECTIVES			
Study No.	Key Area Location	Key Species	Functioning Condition	Maintain or Improve	Functioning Condition	Allowable Use Level	Season of Use	Met or Not Met	Rationale
Pipe Spring	T. 8 N., R. 67 E., Sec. 3 SWSE	SALIX	Proper Functioning Condition	Maintain	Proper Functioning Condition	50%	Yearlong	Met	Allowable use levels not exceeded
Cotton-wood Spring	T. 9 N., R. 67 E., Sec. 27 SENW	POA++ ELC12 SALIX	Proper Functioning Condition	Maintain	Proper Functioning Condition	50% 50%	Yearlong	Met	Allowable use levels not exceeded

## **APPENDIX V**

### **MOJAVE-SOUTHERN GREAT BASIN AREA RESOURCE ADVISORY COUNCIL (RAC)**

#### **STANDARDS:**

#### **STANDARD 1. SOILS:**

Watershed soils and stream banks should have adequate stability to resist accelerated erosion, maintain soil productivity, and sustain the hydrologic cycle.

##### Soil indicators:

- Ground cover (vegetation, litter, rock, bare ground);
- Surfaces (e.g., biological crusts, pavement); and
- Compaction/infiltration.

##### Riparian soil indicators:

- Stream bank stability.

All of the above indicators are appropriate to the potential of the ecological site.

#### **STANDARD 2. ECOSYSTEM COMPONENTS;**

Watersheds should possess the necessary ecological components to achieve state water quality criteria, maintain ecological processes, and sustain appropriate uses.

Riparian and wetlands vegetation should have structural and species diversity characteristic of the stage of stream channel succession in order to provide forage and cover, capture sediment, and capture, retain, and safely release water (watershed function).

##### Upland indicators:

- Canopy and ground cover, including litter, live vegetation, biological crust, and rock appropriate to the potential of the ecological site.
- Ecological processes are adequate for the vegetative communities.

Riparian indicators:

- Stream side riparian area are functioning properly when adequate vegetation, large woody debris, or rock is present to dissipate stream energy associated with high water flows.
- Elements indicating proper functioning condition such as avoiding acceleration erosion, capturing sediment, and providing for groundwater recharge and release are determined by the following measurements as appropriate to the site characteristics:

Width/Depth ratio;

Channel roughness;

Sinuosity of stream channel;

Bank stability;

Vegetative cover (amount, spacing, life form); and

Other cover (large woody debris, rock).

- Natural springs, seeps, and marsh areas are functioning properly when adequate vegetation is present to facilitate water retention, filtering, and release as indicated by plant species and cover appropriate to the site characteristics.

Water quality indicators:

- Chemical, physical and biological constituents do not exceed the state water quality standards.

The above indicators shall be applied to the potential of the ecological site.

**STANDARD 3. HABITAT AND BIOTA:**

Habitats and watersheds should sustain a level of biodiversity appropriate for the area and conducive to appropriate uses. Habitats of special status species should be able to sustain viable populations of those species.

Habitat indicators:

- Vegetation composition (relative abundance of species);
- Vegetation structure (life forms, cover, height, and age classes);
- Vegetation distribution (patchiness, corridors);



- Vegetation productivity; and
- Vegetation nutritional value.

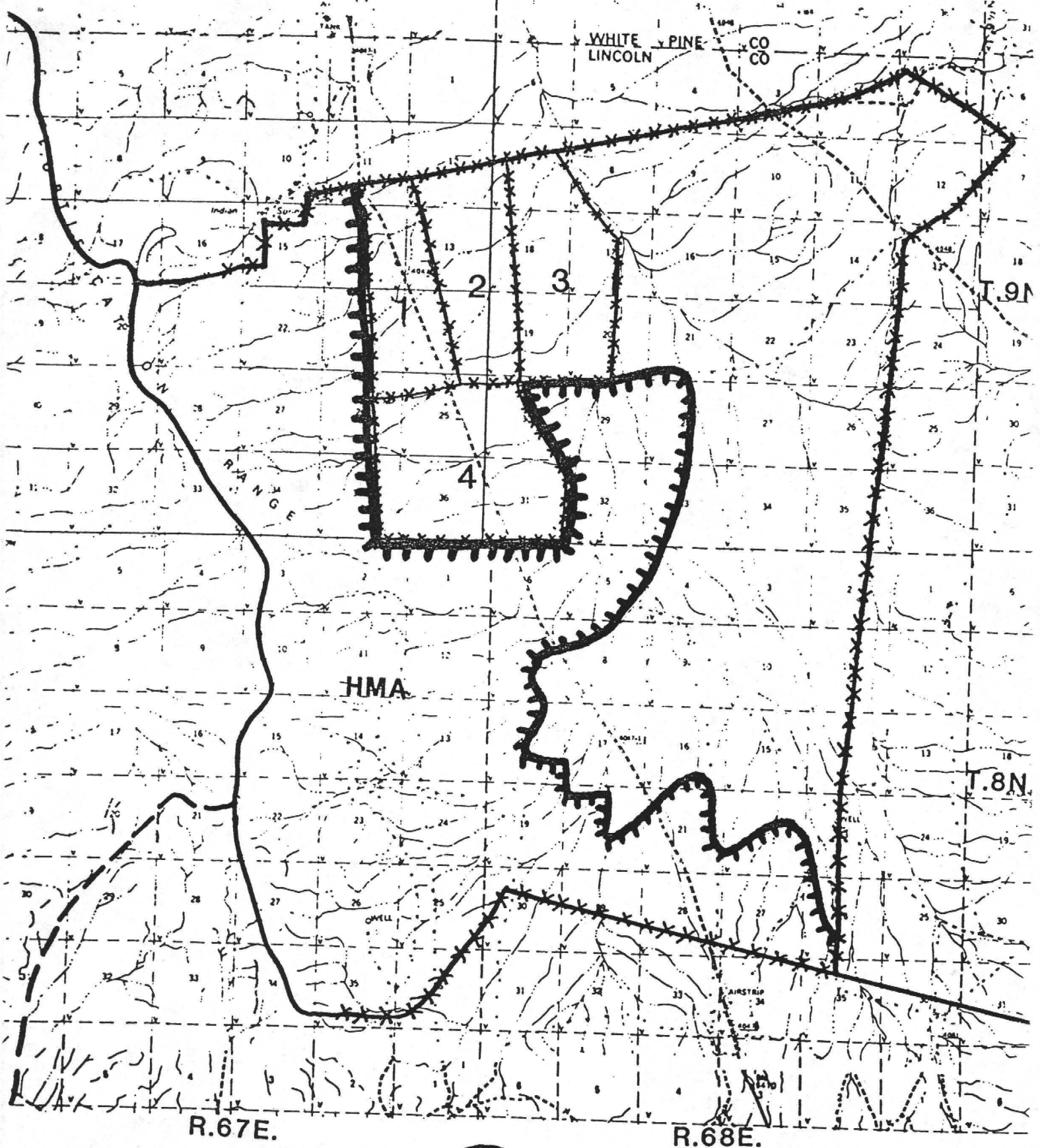
Wildlife indicators:

- Escape terrain;
- Relative abundance;
- Composition;
- Distribution;
- Nutritional value; and
- Edge-patch snags.

The above indicators shall be applied to the potential of the ecological site.

# COTTONWOOD ALLOTMENT (00132)

MAP 1



WILSON CREEK HMA BOUNDARY



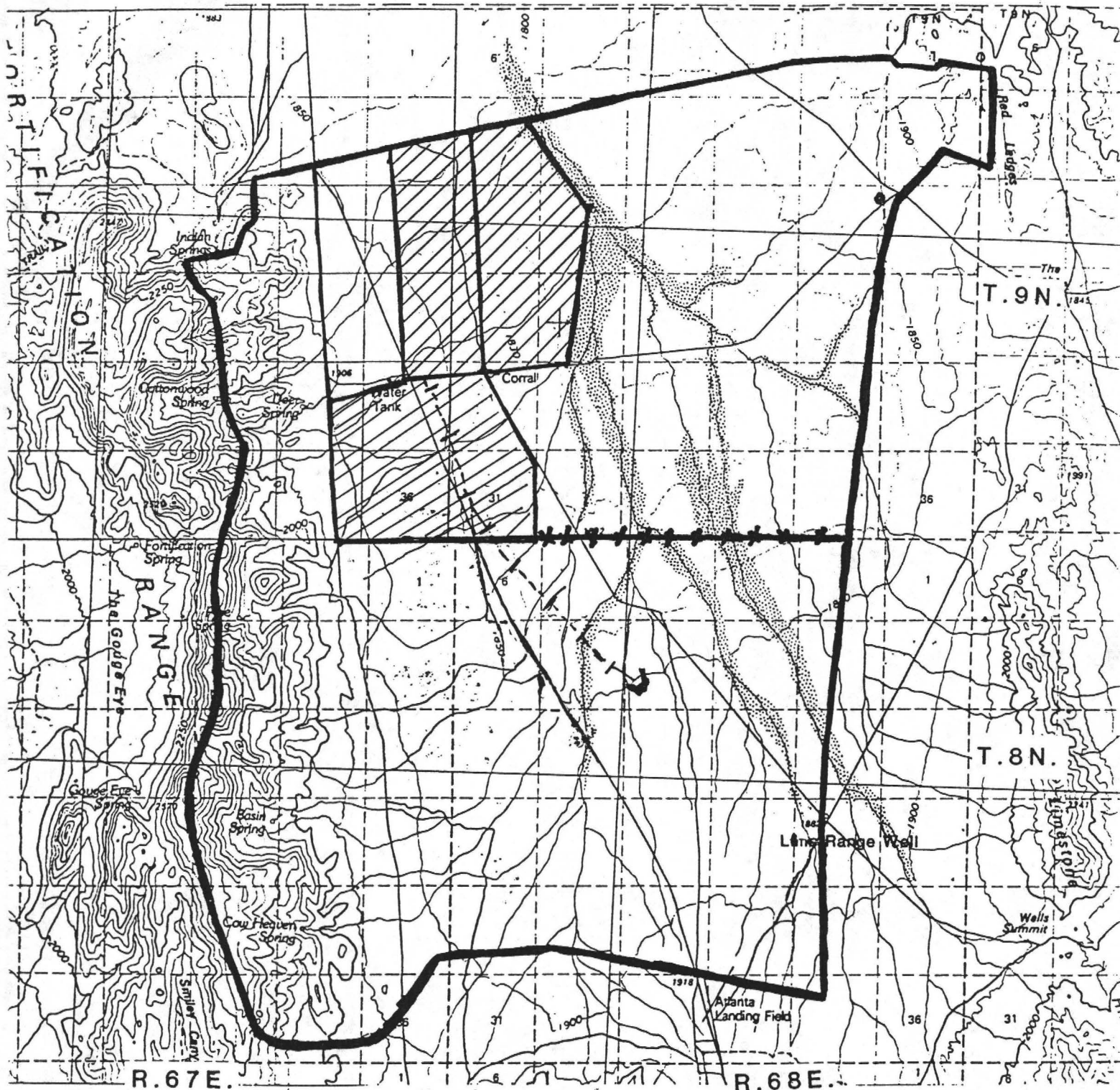
1-UPPER PASTURE . 3-LOWER PASTURE

2-MIDDLE PASTURE 4-DEERFLAT PASTURE

# COTTONWOOD ALLOTMENT (00132)

MAP 2

## Proposed Range Improvements

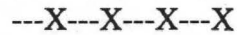


### LEGEND

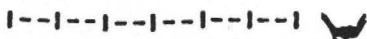
Seeding Maintenance



Fence



Pipeline



Water Haul Point







COMMISSION FOR THE  
PRESERVATION OF WILD HORSES

1105 Terminal Way

Suite 209

Reno, Nevada 89502

(702) 688-2626

April 16, 1997

Mr. Hal Bybee  
Ely District  
Bureau of Land Management  
HC 33 Box 33500  
Ely, Nevada 89301-9408

Subject: Cottonwood Allotment MASR - Wilson Creek HMA

Dear Mr. Bybee:

The Commission for the Preservation for Wild Horses has received and reviewed the Action Selection Report for the Cottonwood Allotment. We could not find past correspondence concerning the allotment evaluation for this report.

Mathematical results of the District's use of yield indexing dissolves the affects of over-utilization in the carrying capacity computation. Please provide the Administrative Law Judge decision that supports this application of procedure.

Please advise us of the status of the Wilson Creek and Geysers Ranch Allotment Multiple Use Decisions. We hope the District does not execute a gather plan and gather without the benefit of these essential decisions.

P.S. Please note new address.

Sincerely,

A handwritten signature in cursive script that reads "Catherine Barcomb".

CATHERINE BARCOMB  
Executive Director