



U.S. Department of the Interior

Bureau of Land Management

Winnemucca Field Office Winnemucca, Nevada

Surprise Field Office Cedarville, California

February 2003



Draft Resource Management Plan and Draft Environmental Impact Statement for the Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area (NCA) and Associated Wilderness, and Other Contiguous Lands in Nevada

Volume 2: Maps and Appendices



















It is the mission of the Bureau of Land Management to sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations.

11. 8800521U

List of Maps

List of Maps

243

Chapter 1

Map 1-1 Reference Map

Chapter 2

COMMON TO ALL ALTERNATIVES

Cultural Resources Management Including Emigrant Trails

Cultural Resources Management

Map 2-1 Cultural Resources Management - Trail Classes

Water Resources

Soldier Meadows

Map 2-2 Soldier Meadows - Desert Dace Critical Habitat

NO ACTION ALTERNATIVE

Transportation and OHV Routes

Functional Classes

Map 2-3 Transportation, No Action Alternative

OHV Designations

Map 2-4a OHV Designations, No Action Alternative

Map 2-4b OHV Designations, Northwestern Detail, No Action Alternative

Map 2-4c OHV Designations, Soldier Meadows Detail, No Action Alternative

Map 2-4d OHV Designations, Southeastern Detail, No Action Alternative

Special Designations

Areas of Critical Concern (ACECs)

Map 2-5a Areas of Critical Environmental Concern

Map 2-5b Areas of Critical Environmental Concern, Detail

Wildland Fire

Map 2-6 Wildland Fire, No Action Alternative

Visual Resource Management

Map 2-7 Visual Resource Management, No Action Alternative

Lands and Realty

Map 2-8 Lands and Realty, Utility Corridors, No Action Alternative

Mineral Resources

Map 2-9 Locatable Minerals Management, No Action Alternative

Map 2-10 Leasable Minerals Management, No Action Alternative

Map 2-11 Saleable Minerals Management, No Action Alternative

ALTERNATIVE A

Transportation and Access Routes

Transportation and OHV Routes

Functional Classes

Map 2-12 Transportation, Alternative A

OHV Designations

Map 2-13a OHV Designations, No Action Alternative

Map 2-13b OHV Designations, Northwestern Detail, Alternative A

Map 2-13c OHV Designations, Soldier Meadows Detail, Alternative A

Map 2-13d OHV Designations, Southeastern Detail, Alternative A

Special Designations

Areas of Critical Environmental Concern

Map 2-14a Areas of Critical Environmental Concern, Alternative A

Map 2-14b Areas of Critical Environmental Concern Detail, Alternative A

Wild and Scenic Rivers

Map 2-15 Wild and Scenic River Suitability Alternative A

Wildland Fires

Map 2-16 Wildland Fire Management Alternative A

Visual Resource Management (VRM)

Map 2-17 Visual Resource Management Alternative A

Lands and Realty

Map 2-18 Lands and Realty - Utility Corridors Alternative A

Mineral Resources

Map 2-19 Locatable Minerals Management Alternative A

Map 2-20 Leasable Minerals Management Alternative A

Map 2-21 Saleable Minerals Management Alternative A

Recreation

Map 2-22 Special Camping Designations Alternative A

Map 2-23 Recreation Classifications Alternative A

Map 2-24 Special Recreation Permit Events Alternative A

ALTERNATIVE B

Transportation and Access Routes

Transportation and OHV Routes

Functional Classes

Map 2-25 Transportation, Alternative B

OHV Designations

Map 2-26a OHV Designations, No Action Alternative

Map 2-26b OHV Designations, Northwestern Detail, Alternative B

Map 2-26c OHV Designations, Soldier Meadows Detail, Alternative B

Map 2-26d OHV Designations, Southeastern Detail, Alternative B

Wilderness Designations

Map 2-27 Wilderness Inventory Units

Special Designations

Areas of Critical Environmental Concern

Map 2-28a Areas of Critical Environmental Concern, Alternative B

Map 2-28b Areas of Critical Environmental Concern Detail, Alternative B

Wild and Scenic Rivers

Map 2-29 Wild and Scenic River Suitability Alternative B

Livestock Grazing

Map 2-30 Livestock Grazing Allotments Alternative B

Visual Resource Management (VRM)

Map 2-31 Visual Resource Management Alternative B

Lands and Realty

Map 2-32 Lands and Realty - Utility Corridors Alternative B

Mineral Resources

Map 2-19 Locatable Minerals Management Alternatives A and B

Map 2-20 Leasable Minerals Management Alternatives A and B

Map 2-21 Saleable Minerals Management Alternatives A and B

Recreation

- Map 2-33 Special Camping Designations Alternative B
- Map 2-34 Recreation Classifications Alternative B
- Map 2-35 Special Recreation Permit Events Alternative B

ALTERNATIVE C

Transportation and Access Routes

Transportation and OHV Routes

Functional Classes

Map 2-36 Transportation, Alternative C

OHV Designations

- Map 2-37a OHV Designations, No Action Alternative
- Map 2-37b OHV Designations, Northwestern Detail, Alternative C
- Map 2-37c OHV Designations, Soldier Meadows Detail, Alternative C
- Map 2-37d OHV Designations, Southeastern Detail, Alternative C

Wilderness Designations

Map 2-27 Wilderness Inventory Units

Visual Resource Management (VRM)

Map 2-38 Visual Resource Management Alternative C

Lands and Realty

Map 2-39 Lands and Realty - Utility Corridors Alternative C

Mineral Resources

- Map 2-19 Locatable Minerals Management Alternatives A, B, and C
- Map 2-40 Leasable Minerals Management Alternative C
- Map 2-41 Saleable Minerals Management Alternative C

Recreation

- Map 2-42 Special Camping Designations Alternative C
- Map 2-43 Recreation Classifications Alternative C
- Map 2-44 Special Recreation Permit Events Alternative C

Chapter 3

SOILS

Map 3-1 Water Erosion Map 3-2 Wind Erosion

TRANSPORTATION AND OHV

Transportation

Map 3-3 Transportation

WILDERNESS AREAS

Map 3-4 Wilderness Areas

LIVESTOCK GRAZING

Map 3-5 Livestock Grazing Allotments

WILD HORSES AND BURROS MANAGEMENT

Map 3-6 Wild Horses and Burros Management

FISH AND WILDLIFE

Map 3-7 Mule Deer Habitat

Map 3-8 Bighorn Sheep Habitat

Map 3-9 Pronghorn Antelope Habitat

WILDLIFE AND WILDLIFE HABITAT

Map 3-10 Sage-Grouse Habitat

Map 3-11 Vegetation

VISUAL RESOURCES

Map 3-12 Visual Resource Management

WATER RESOURCES

Map 3-13 Watersheds

LANDS AND REALTY

Utility Corridors/Rights-of-Way

Map 3-14 Lands and Realty - Rights-of-Way and Utility Corridors

MINERALS RESOURCES

Locatable Minerals

Map 3-15 Locatable Minerals and Mining Claims

Map 3-16 Geologic Units

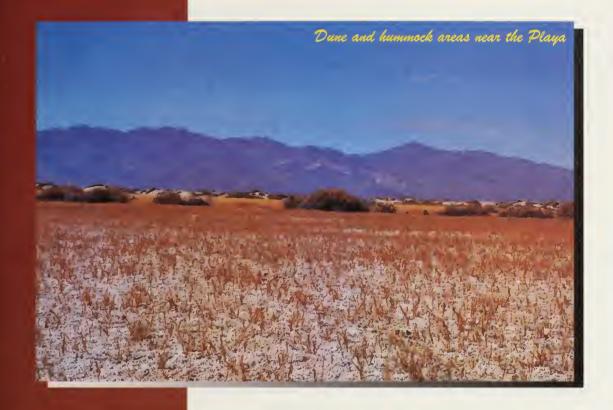
Mineral Material Permits and Rights-of-Way

Map 3-17 Sand and Gravel Potential

List of Appendices

Appendix A	Applicable Laws and Management Guidance (Including NCA Act and Wilderness Act)
Appendix B	Management Zone Descriptions
Appendix C	California and Nevada Rangeland Health Standards and Guidelines
Appendix D	Road Classification and Maintenance Level Descriptions
Appendix E	Emigrant Trail Inventory Classes
Appendix F	Explanation of Minimum Requirement and Minimum Tool
Appendix G	Visual Resource Management Class Descriptions
Appendix H	Decisions from Existing Management Framework Plans for the No Action Alternative
Appendix I	Cultural, Traditional, and Paleontological Resource Use Categories
Appendix J	Wild and Scenic River Policy, Inventory, and Findings
Appendix K	Wildland Fire Appropriate Management Response
Appendix L	Special Recreation Permit Classification System
Appendix M	Description of Scientific Working Group





Appendix A: Applicable Laws and Management Guidance





Appendix A: Applicable Laws and Management Guidance

Decision contained in this Draft EIS and RMP comply with all applicable laws, regulations, and management guidance that direct the BLM in its resource management activities. This appendix lists the key applicable laws that guide BLM management activities, followed by program-specific criteria that the BLM used in the development of this RMP.

The full text of both the NCA Act and the Wilderness Act are also contained in this Appendix for informational purposes prior to the program-specific planning criteria.

Laws and Executive Orders

- 1. The Federal Land Policy and Management Act of 1976, as amended, 43 U.S.C. 1701 et seq., provides the authority for BLM land use planning.
 - Sec. 102 (a) (7) and (8) sets forth the policy of the United States concerning the management of BLM lands.
 - a. Sec. 201 requires the Secretary of the Interior to prepare and maintain an inventory of all BLM lands and their resources and other values, giving priority to areas of critical environmental concern; and, as funding and workforce are available, to determine the boundaries of the public lands, provide signs and maps to the public, and provide inventory data to State and local governments.
 - b. Sec. 202 (a) requires the Secretary, with public involvement, to develop, maintain, and when appropriate, revise land use plans that provide by tracts or areas for the use of the BLM lands.
 - c. Sec. 202 (c) (9) requires that land use plans for BLM lands be consistent with tribal plans and, to the maximum extent consistent with applicable Federal laws, with State and local plans.
 - d. <u>Sec. 202 (d)</u> provides that all public lands, regardless of classification, are subject to inclusion in land use plans, and that the Secretary may modify or terminate classifications consistent with land use plans.
 - e. Sec. 202 (f) and Sec. 309 (e) provide that Federal, State, and local governments and the public be given adequate notice and opportunity to comment on the formulation of standards and criteria for, and to participate in, the preparation and execution of plans and programs for the management of the public lands.
 - f. Sec. 302 (a) requires the Secretary to manage the BLM lands under the principles of multiple use and sustained yield, in accordance with, when available, land use plans developed under Sec. 202 of the Federal Land Policy and Management Act, except that where a tract of BLM lands has been dedicated to specific uses according to any other provisions of law, it shall be managed in accordance with such laws.
 - g. Sec. 302 (b) recognizes the entry and development rights of mining claimants, while directing the Secretary to prevent unnecessary or undue degradation of the public lands.
- 2. The <u>Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area Act of 2000</u>, 16 U.S.C. 460ppp, to conserve, protect, and enhance resources associated with the Applegate-Lassen and Nobles Trails corridors and surrounding areas for the benefit and enjoyment of present and future generations. (full-text included)
- 3. The <u>Clean Air Act</u> of 1990, as amended, 42 U.S.C. 7418, requires Federal agencies to comply with all Federal, State and local requirements regarding the control and abatement of air pollution. This includes abiding by the requirements of State Implementation Plans.

- 4. The <u>Clean Water Act</u> of 1987, as amended, 33 U.S.C. 1251, establishes objectives to restore and maintain the chemical, physical, and biological integrity of the Nation's water.
- 5. The <u>Federal Water Pollution Control Act</u>, 33 U.S.C. 1323, requires the Federal land manager to comply with all Federal, State, and local requirements, administrative authority, process, and sanctions regarding the control and abatement of water pollution in the same manner and to the same extent as any non-governmental entity.
- 6. The <u>Safe Drinking Water Act</u>, 42 U.S.C. 201, is designed to make the Nation's waters "drinkable" as well as "swimmable." Amendments in 1996 establish a direct connection between safe drinking water and watershed protection and management.
- 7. The Endangered Species Act of 1973, as amended, 16 U.S.C. 1531 et seq.:
 - h. Provides a means whereby the ecosystems upon which endangered and threatened species depend may be conserved and to provide a program for the conservation of such endangered and threatened species (Sec. 1531 (b), Purposes).
 - i. Requires all Federal agencies to seek to conserve endangered and threatened species and utilize applicable authorities in furtherance of the purposes of the Endangered Species Act (Sec. 1531 (c) (1), Policy).
 - j. Requires all Federal agencies to avoid jeopardizing the continued existence of any species that is listed or proposed for listing as threatened or endangered or destroying or adversely modifying its designated or proposed critical habitat (Sec. 1536 (a), Interagency Cooperation).
 - k. Requires all Federal agencies to consult (or confer) in accordance with Sec. 7 of the Endangered Species Act with the Secretary of the Interior, through the Fish and Wildlife Service and/or the National Marine Fisheries Service, to ensure that any Federal action (including land use plans) or activity is not likely to jeopardize the continued existence of any species listed of proposed to be listed under the provisions of the Endangered Species Act, or result in the destruction of adverse modification of designated of proposed critical habitat (Sec. 1536 (a), Interagency Cooperation, and 50 CFR 402).
- 8. The <u>Wild and Scenic Rivers Act</u>, as amended, 16 U.S.C. 1271 *et seq*., requires the Federal land management agencies to identify potential river systems and then study them for potential designation as wild, scenic, or recreational rivers.
- 9. The <u>Wilderness Act</u>, as amended, 16 U.S.C. 1131 *et seq*., authorizes the President to make recommendations to the Congress for Federal lands to be aside for preservation as wilderness. (full-text included)
- 10. The <u>National Historic Preservation Act, as amended</u>, 16 U.S.C. 470, expands protection of historic and archeological properties to include those of national, State, and local significance and directs Federal agencies to consider the effects of proposed actions on properties eligible for or included in the National Register of Historic Places.
- 11. The <u>Archaeological Resources Protection Act of 1979</u>, 16. U.S.C. 470, secures the protection of archaeological resources and sites which are on public lands and Indian lands, and to foster increased cooperation and exchange of information between governmental authorities, the professional archaeological community, and private individuals having collections of archaeological resources and data which were obtained before October 31, 1979.
- 12. The Native American Graves Protection and Repatriation Act of 1990, 25 U.S.C. 3001, addresses the rights of lineal descendants, Indian tribes, and Native Hawaiian organizations to Native American human remains, funerary objects, sacred objects, and objects of cultural patrimony. It requires federal agencies and museums to provide information about Native American cultural items to parties with standing and, upon presentation of a valid request, dispose of or repatriate these objects to them.

- 13. The American Indian Religious Freedom Act of 1978, 42 U.S.C. 1996, establishes a national policy to protect and preserve the right of America Indians to exercise traditional Indian religious beliefs or practices.
- 14. The Recreation and Public Purposes Act of 1926, as amended, 43 U.S.C. 869 et seq., authorizes the Secretary of the Interior to lease or convey BLM lands for recreational and public purposes under specified conditions.
- 15. The Surface Mining Control and Reclamation Act of 1977, 30 U.S.C. 1201 et seq., requires application unsuitability criteria prior to coal leasing and also to proposed mining operations for minerals or mineral materials other than coal.
- 16. The Mineral Leasing Act of 1920, as amended, 30 U.S.C. 181 et seq., authorizes the development and conservation of oil and gas resources.
- 17. The Onshore Oil and Gas Leasing Reform Act of 1987, 30 U.S.C. 181 et seq., provides:
 - a. Potential oil and gas resources be adequately addressed in planning documents;
 - b. The social, economic, and environmental consequences of exploration and development of oil and gas resources be determined; and
 - c. Any stipulations to be applied to oil and gas leases be clearly identified.
- 18. The General Mining Law of 1872, as amended, 30 U.S.C. 21 et seq., allows the location, use and patenting of mining claims on sites on public domain lands of the United States.
- 19. The Mining and Mineral Policy Act of 1970, 30 U.S.C. 21a, establishes a policy of fostering development of economically stable mining and minerals industries, their orderly and economic development, and studying methods for disposal of waste and reclamation.
- 20. The Taylor Grazing Act of 1934, 43 U.S.C. 315, "[T]he Secretary of the Interior is authorized, in his discretion, by order to establish grazing districts or additions thereto...of vacant unappropriated and unreserved lands from any part of the public domain...which in his opinion are chiefly valuable for grazing and raising forage crops[.]..." The Act also provides for the classification of lands for particular uses.
- 21. The Public Rangelands Improvement Act of 1978, 43 U.S.C. 1901, provides that the public rangelands be managed so that they become as productive as feasible in accordance with management objectives and the land use planning process established pursuant to 43 U.S.C. 1712.
- 22. Executive Order 12898 (Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations), 49 Fed. Reg. 7629 (1994), requires that each Federal agency consider the impacts of its programs on minority populations and low income populations.
- 23. Executive Order 13007 (Indian Sacred Sites), 61 Fed Reg. 26771 (1996), requires Federal agencies to the extent practicable, permitted by law, and not clearly inconsistent with essential agency functions to:
 - d. Accommodate access to and ceremonial use of Indian sacred sites by Indian religious practitioners; and
 - Avoid adversely affecting the physical integrity of such sacred sites.
- 24. Executive Order 13084 (Consultation and Coordination with Indian Tribal Governments) provides, in part, that each Federal agency shall establish regular and meaningful consultation and collaboration with Indian tribal governments in development of regulatory practices on Federal matters that significantly or uniquely affect their communities.
- 25. Executive Order 13112 (Invasive Species) provides that no Federal agency shall authorize, fund or carry out actions that it believes are likely to cause or promote the introduction or spread of invasive species unless, pursuant to guidelines that it has prescribed, the agency has determined and made public its determination that the benefits of such actions clearly outweigh the potential harm caused by invasive species; and that all feasible and prudent measures to minimize risk or harm will be taken in conjunction with the actions.
- 26. Secretarial Order 3175 (incorporated into the Departmental Manual at 512 DM 2) requires that if Department of the Interior (DOI) agency actions might impact Indian trust resources, the agency explicitly

Appendix A: Applicable Laws and Management Guidance

- address those potential impacts in planning and decision documents, and the agency consult with the tribal government whose trust resources are potentially affected by the Federal action.
- 27. Secretarial Order 3206 (American Indian Tribal Rights, Federal –Tribal Trust Responsibilities, and the Endangered Species Act) requires DOI agencies to consult with Indian Tribes when agency actions to protect a listed species, as a result of compliance with ESA, affect or may affect of Indian lands, tribal trust resources, or the exercise of American Indian tribal rights.

Black Rock Desert-High Rock Canyon Emigrant Trails National **Conservation Area Act of 2000**

[Page 114 STAT. 2763 Page 114, (U.S. Statutes at Large, page 114 ff.), Public Law 106-554] Signed into Law December 21, 2000 as Amended November 6, 2001

AN ACT

To establish the Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area, and for other purposes.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled.

SECTION 1. SHORT TITLE.

This Act may be cited as the 'Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area Act of 2000'.

SEC. 2. FINDINGS.

The Congress finds the following:

- (1) The areas of northwestern Nevada known as the Black Rock Desert and High Rock Canyon contain and surround the last nationally significant, untouched segments of the historic California emigrant Trails, including wagon ruts, historic inscriptions, and a wilderness landscape largely unchanged since the days of the pioneers.
- (2) The relative absence of development in the Black Rock Desert and high Rock Canyon areas from emigrant times to the present day offers a unique opportunity to capture the terrain, sights, and conditions of the overland trails as they were experienced by the emigrants and to make available to both present and future generations of Americans the opportunity of experiencing emigrant conditions in an unaltered setting.
- (3) The Black Rock Desert and High Rock Canyon areas are unique segments of the Northern Great Basin and contain broad representation of the Great Basin's land forms and plant and animal species, including golden eagles and other birds of prey, sage grouse, mule deer, pronghorn antelope, bighorn sheep, free roaming horses and burros, threatened fish and sensitive plants.
- (4) The Black Rock-High Rock region contains a number of cultural and natural resources that have been declared eligible for National Historic Landmark and Natural Landmark status, including a portion of the 1843-44 John Charles Fremont exploration route, the site of the death of Peter Lassen, early military facilities, and examples of early homesteading and mining.
- (5) The archeological, paleontological, and geographical resources of the Black Rock-High Rock region include numerous prehistoric and historic Native American sites, wooly mammoth sites, some of the largest

natural potholes of North America, and a remnant dry Pleistocene lakebed (playa) where the curvature of the Earth may be observed.

- (6) The two large wilderness mosaics that frame the conservation area offer exceptional opportunities for solitude and serve to protect the integrity of the viewshed of the historic emigrant trails.
- (7) Public lands in the conservation area have been used for domestic livestock grazing for over a century, with resultant benefits to community stability and contributions to the local and State economies. It has not been demonstrated that continuation of this use would be incompatible with appropriate protection and sound management of the resource values of these lands; therefore, it is expected that such grazing will continue in accordance with the management plan for the conservation area and other applicable laws and regulations.
- (8) The Black Rock Desert playa is a unique natural resource that serves as the primary destination for the majority of visitors to the conservation area, including visitors associated with large-scale permitted events. It is expected that such permitted events will continue to be administered in accordance with the management plan for the conservation area and other applicable laws and regulations.

SEC. 3. DEFINITIONS.

As used in this Act:

- (1) The term 'Secretary' means the Secretary of the Interior.
- (2) The term 'public lands' has the meaning stated in section 103(e) of the Federal Land Policy and Management Act of 1976 (43 U.S.C. 1702(e)).
- (3) The term 'conservation area' means the Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area established pursuant to section 4 of this Act.

SEC. 4. ESTABLISHMENT OF THE CONSERVATION AREA.

- (a) ESTABLISHMENT AND PURPOSES- In order to conserve, protect, and enhance for the benefit and enjoyment of present and future generations the unique and nationally important historical, cultural, paleontological, scenic, scientific, biological, educational, wildlife, riparian, wilderness, endangered species, and recreational values and resources associated with the Applegate-Lassen and Nobles Trails corridors and surrounding areas, there is hereby established the Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area in the State of Nevada.
- (b) AREAS INCLUDED- The conservation area shall consist of approximately 797,100 acres of public lands as generally depicted on the map entitled 'Black Rock Desert Emigrant Trail National Conservation Area' and dated October 3, 2001.
- (c) MAPS AND LEGAL DESCRIPTION- As soon as practicable after the date of the enactment of this Act, the Secretary shall submit to Congress a map and legal description of the conservation area. The map and legal description shall have the same force and effect as if included in this Act, except the Secretary may correct clerical and typographical errors in such map and legal description. Copies of the map and legal description shall be on file and available for public inspection in the appropriate offices of the Bureau of Land Management.

SEC. 5. MANAGEMENT.

(a) MANAGEMENT- The Secretary, acting through the Bureau of Land Management, shall manage the conservation area in a manner that conserves, protects and enhances its resources and values, including those resources and values specified in subsection 4(a), in accordance with this Act, the Federal Land Policy and Management Act of 1976 (43 U.S.C. 1701 et seq.), and other applicable provisions of law.

(b) Access-

- (1) IN GENERAL- The Secretary shall maintain adequate access for the reasonable use and enjoyment of the conservation area.
- (2) PRIVATE LAND- The Secretary shall provide reasonable access to privately owned land or interests in land within the boundaries of the conservation area.
- (3) EXISTING PUBLIC ROADS- The Secretary is authorized to maintain existing public access within the boundaries of the conservation area in a manner consistent with the purposes for which the conservation area was established.

(c) Uses-

- (1) IN GENERAL- The Secretary shall only allow such uses of the conservation area as the Secretary finds will further the purposes for which the conservation area is established.
- (2) OFF-HIGHWAY VEHICLE USE- Except where needed for administrative purposes or to respond to an emergency, use of motorized vehicles in the conservation area shall be permitted only on roads and trails and in other areas designated for use of motorized vehicles as part of the management plan prepared pursuant to subsection (e).
- (3) PERMITTED EVENTS- The Secretary may continue to permit large-scale events in defined, low impact areas of the Black Rock Desert playa in the conservation area in accordance with the management plan prepared pursuant to subsection (e).
- (d) HUNTING, TRAPPING, AND FISHING- Nothing in this Act shall be deemed to diminish the jurisdiction of the State of Nevada with respect to fish and wildlife management, including regulation of hunting and fishing, on public lands within the conservation area.
- (e) MANAGEMENT PLAN- Within three years following the date of enactment of this Act, the Secretary shall develop a comprehensive resource management plan for the long-term protection and management of the conservation area. The plan shall be developed with full public participation and shall describe the appropriate uses and management of the conservation area consistent with the provisions of this Act. The plan may incorporate appropriate decisions contained in any current management or activity plan for the area and may use information developed in previous studies of the lands within or adjacent to the conservation area.
- (f) GRAZING- Where the Secretary of the Interior currently permits livestock grazing in the conservation area, such grazing shall be allowed to continue subject to all applicable laws, regulations, and executive orders.
- (g) VISITOR SERVICE FACILITIES- The Secretary is authorized to establish, in cooperation with other public or private entities as the Secretary may deem appropriate, visitor service facilities for the purpose of providing information about the historical, cultural, ecological, recreational, and other resources of the conservation area.

(h) ROAD MAINTENANCE- Within the conservation area the Secretary may permit the use of gravel pits for the maintenance of roads within the Materials Act of 1947 (30 U.S.C. 601 *et seq.*) to the extent consistent with this Act and subject to such regulations, policies, and practices as the Secretary considers necessary.

SEC. 6. WITHDRAWAL.

(a) IN GENERAL- Subject to valid existing rights, all Federal lands within the conservation area and all lands and interests therein which are hereafter acquired by the United States are hereby withdrawn from all forms of entry, appropriation, or disposal under the public land laws, from location, entry, and patent under the mining laws, from operation of the mineral leasing and geothermal leasing laws and from the minerals materials laws and all amendments thereto.

SEC. 7. NO BUFFER ZONES.

The Congress does not intend for the establishment of the conservation area to lead to the creation of protective perimeters or buffer zones around the conservation area. The fact that there may be activities or uses on lands outside the conservation area that would not be permitted in the conservation area shall not preclude such activities or uses on such lands up to the boundary of the conservation area consistent with other applicable laws.

SEC. 8. WILDERNESS.

- (a) DESIGNATION- In furtherance of the purposes of the Wilderness Act of 1964 (16 U.S.C. 1131 et seq.), the following lands in the State of Nevada are designated as wilderness, and, therefore, as components of the National Wilderness Preservation System:
- (1) Certain lands in the Black Rock Desert Wilderness Study Area comprised of approximately 315,700 acres, as generally depicted on a map entitled 'Black Rock Desert Wilderness' and dated October 3, 2001, and which shall be known as the Black Rock Desert Wilderness.
- (2) Certain lands in the Pahute Peak Wilderness Study Area comprised of approximately 57,400 acres, as generally depicted on a map entitled 'Pahute Peak Wilderness' and dated October 3, 2001, and which shall be known as the Pahute Peak Wilderness.
- (3) Certain lands in the North Black Rock Range Wilderness Study Area comprised of approximately 30,800 acres, as generally depicted on a map entitled 'North Black Rock Range Wilderness' and dated October 3, 2001, and which shall be known as the North Black Rock Range Wilderness.
- (4) Certain lands in the East Fork High Rock Canyon Wilderness Study Area comprised of approximately 52,800 acres, as generally depicted on a map entitled 'East Fork High Rock Canyon Wilderness' and dated October 3, 2001, and which shall be known as the East Fork High Rock Canyon Wilderness.
- (5) Certain lands in the High Rock Lake Wilderness Study Area comprised of approximately 59,300 acres, as generally depicted on a map entitled 'High Rock Lake Wilderness' and dated October 3, 2001, and which shall be known as the High Rock Lake Wilderness.
- (6) Certain lands in the Little High Rock Canyon Wilderness Study Area comprised of approximately 48,700 acres, as generally depicted on a map entitled 'Little High Rock Canyon Wilderness' and dated October 3, 2001, and which shall be known as the Little High Rock Canyon Wilderness.

- (7) Certain lands in the High Rock Canyon Wilderness Study Area and Yellow Rock Canyon Wilderness Study Area comprised of approximately 46,600 acres, as generally depicted on a map entitled 'High Rock Canyon Wilderness' and dated October 3, 2001, and which shall be known as the High Rock Canyon Wilderness.
- (8) Certain lands in the Calico Mountains Wilderness Study Area comprised of approximately 65,400 acres, as generally depicted on a map entitled 'Calico Mountains Wilderness' and dated October 3, 2001, and which shall be known as the Calico Mountains Wilderness.
- (9) Certain lands in the South Jackson Mountains Wilderness Study Area comprised of approximately 56,800 acres, as generally depicted on a map entitled 'South Jackson Mountains Wilderness' and dated October 3, 2001, and which shall be known as the South Jackson Mountains Wilderness.
- (10) Certain lands in the North Jackson Mountains Wilderness Study Area comprised of approximately 24,000 acres, as generally depicted on a map entitled 'North Jackson Mountains Wilderness' and dated October 3, 2001, and which shall be known as the North Jackson Mountains Wilderness.
- (b) ADMINISTRATION OF WILDERNESS AREAS- Subject to valid existing rights, each wilderness area designated by this Act shall be administered by the Secretary in accordance with the provisions of the Wilderness Act, except that any reference in such provisions to the effective date of the Wilderness Act shall be deemed to be a reference to the date of enactment of this Act and any reference to the Secretary of Agriculture shall be deemed to be a reference to the Secretary of the Interior.
- (c) MAPS AND LEGAL DESCRIPTION- As soon as practicable after the date of the enactment of this Act, the Secretary shall submit to Congress a map and legal description of the wilderness areas designated under this Act. The map and legal description shall have the same force and effect as if included in this Act, except the Secretary may correct clerical and typographical errors in such map and legal description. Copies of the map and legal description shall be on file and available for public inspection in the appropriate offices of the Bureau of Land Management.
- (d) GRAZING- Within the wilderness areas designated under subsection (a), the grazing of livestock, where established prior to the date of enactment of this Act, shall be permitted to continue subject to such reasonable regulations, policies, and practices as the Secretary deems necessary, as long as such regulations, policies, and practices fully conform with and implement the intent of Congress regarding grazing in such areas as such intent is expressed in the Wilderness Act and section 101(f) of Public Law 101-628.

(e) HUNTING, TRAPPING, AND FISHING-

- (1) IN GENERAL- Nothing in this Act diminishes the jurisdiction of the State of Nevada with respect to fish and wildlife management, including regulation of hunting and fishing on public land in the areas designated as wilderness under subsection (a).
- (2) APPLICABLE LAW- Any action in the areas designated as wilderness under subsection (a) shall be consistent with the Wilderness Act (16 U.S.C. 1131 *et seq.*).
- (f) WILDLAND FIRE PROTECTION- Nothing in this Act or the Wilderness Act (16 U.S.C. 1131 *et seq.*) precludes a Federal, State, or local agency from conducting wildland fire management operations (including prescribed burns) within the areas designated as wilderness under subsection (a), subject to any conditions that the Secretary considers appropriate.

(g) WILDERNESS STUDY RELEASE- Congress-

- (1) finds that the parcels of land in the wilderness study areas referred to in subsection (a) that are not designated as wilderness in subsection (a) have been adequately studied for wilderness designation under section 603 of the Federal Land Policy and Management Act of 1976 (43 U.S.C. 1782); and
- (2) declares that those parcels are no longer subject to the requirement of subsection (c) of that section pertaining to the management of wilderness study areas in a manner that does not impair the suitability of such areas for preservation as wilderness.

SEC. 9. AUTHORIZATION OF APPROPRIATIONS.

There is hereby authorized to be appropriated such sums as may be necessary to carry out the provisions of this Act.

Passed the Senate October 5, 2000. Passed the House of Representatives December 18, 2000 Signed by the President December 21, 2000 Amended November 6, 2001

National Wilderness Preservation System

Public Law 88-577 88th Congress, S. 4 September 3, 1964

An Act

To establish a National Wilderness Preservation System for the permanent good of the whole people, and for other purposes.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled.

Short Title

Section 1. This Act may be cited as the "Wilderness Act".

Wilderness System Established Statement of Policy

Sec. 2. (a) In order to assure that an increasing population, accompanied by expanding settlement and growing mechanization, does not occupy and modify all areas within the United States and its possessions, leaving no lands designated for preservation and protection in their natural condition, it is hereby declared to be the policy of the Congress to secure for the American people of present and future generations the benefits of an enduring resource of wilderness. For this purpose there is hereby established a National Wilderness Preservation System to be composed of federally owned areas designated by Congress as "wilderness areas", and these shall be administered for the use and enjoyment of the American people in such manner as will leave them unimpaired for future use and enjoyment as wilderness; and no Federal lands shall be designated as "wilderness areas" except as provided for in this Act or by a subsequent Act.

(b) The inclusion of an area in the National Wilderness Preservation System notwithstanding, the area shall continue to be managed by the Department and agency having jurisdiction thereover immediately before its inclusion in the National Wilderness Preservation System unless otherwise provided by Act of Congress. No appropriation shall be available for the payment of expenses or salaries for the administration of the National Wilderness Preservation System as a separate unit nor shall any appropriations be available for additional personnel stated as being required solely for the purpose of managing or administering areas solely because they are included within the National Wilderness Preservation System.

Definition of Wilderness

(c) A wilderness, in contrast with those areas where man and his own works dominate the landscape, is hereby recognized as an area where the earth and its community of life are untrammeled by man, where man himself is a visitor who does not remain. An area of wilderness is further defined to mean in this Act an area of undeveloped Federal land retaining its primeval character and influence, without permanent improvements or human habitation, which is protected and managed so as to preserve its natural conditions and which (1) generally appears to have been affected primarily by the forces of nature, with the imprint of man's work substantially unnoticeable; (2) has outstanding opportunities for solitude or a primitive and unconfined type of recreation; (3) has at least five thousand acres of land or is of sufficient size as to make practicable its preservation and use in an unimpaired condition; and (4) may also contain ecological, geological, or other features of scientific, educational, scenic, or historical value.

National Wilderness Preservation System -- Extent of System

- Sec. 3. (a) All areas within the national forests classified at least 30 days before the effective date of this Act by the Secretary of Agriculture or the Chief of the Forest Service as "wilderness", "wild", or "canoe" are hereby designated as wilderness areas. The Secretary of Agriculture shall --
- (1) Within one year after the effective date of this Act, file a map and legal description of each wilderness area with the Interior and Insular Affairs Committees of the United States Senate and the House of Representatives, and such descriptions shall have the same force and effect as if included in this Act: Provided, however, That correction of clerical and typographical errors in such legal descriptions and maps may be made.
- (2) Maintain, available to the public, records pertaining to said wilderness areas, including maps and legal descriptions, copies of regulations governing them, copies of public notices of, and reports submitted to Congress regarding pending additions, eliminations, or modifications. Maps, legal descriptions, and regulations pertaining to wilderness areas within their respective jurisdictions also shall be available to the public in the offices of regional foresters, national forest supervisors, and forest rangers.
- (b) The Secretary of Agriculture shall, within ten years after the enactment of this Act, review, as to its suitability or nonsuitability for preservation as wilderness, each area in the national forests classified on the effective date of this Act by the Secretary of Agriculture or the Chief of the Forest Service as "primitive" and report his findings to the President. The President shall advise the United States Senate and House of Representatives of his recommendations with respect to the designation as "wilderness" or other reclassification of each area on which review has been completed, together with maps and a definition of boundaries. Such advice shall be given with respect to not less than one-third of all the areas now classified as "primitive" within three years after the enactment of this Act, not less than two-thirds within seven years after the enactment of this Act, and the remaining areas within ten years after the enactment of this Act. Each recommendation of the President for designation as "wilderness" shall become effective only if so provided by an Act of Congress. Areas classified as "primitive" on the effective date of this Act shall continue to be administered under the rules and regulations affecting such areas on the effective date of this Act until Congress has determined otherwise. Any such area may be increased in size by the President at the time he submits his recommendation to the Congress by not more than five thousand acres with no more than one thousand two hundred and eighty acres of such increase in any one compact unit; if it is proposed to increase the size of any such area by more than five thousand acres or by more than one thousand two hundred and eighty acres in any one compact unit the increase in size shall not become effective until acted upon by Congress. Nothing herein contained shall limit the President in proposing, as part of his recommendations to Congress, the alteration of existing boundaries of primitive areas or recommending the addition of any contiguous area of national forest lands predominantly of wilderness value. Not withstanding any other provisions of this Act, the Secretary of Agriculture may complete his review and delete such area as may be necessary, but not to exceed seven thousand acres, from the southern tip of the Gore Range-Eagles Nest Primitive Area, Colorado, if the Secretary determines that such action is in the public interest.
- (c) Within ten years after the effective date of this Act the Secretary of the Interior shall review every roadless area of five thousand contiguous acres or more in the national parks, monuments and other units of the national park system and every such area of, and every roadless island within, the national wildlife refuges and game ranges, under his jurisdiction on the effective date of this Act and shall report to the President his recommendation as to the suitability or nonsuitability of each such area or island for preservation as wilderness. The President shall advise the President of the Senate and the Speaker of the House of Representatives of his

recommendation with respect to the designation as wilderness of each such area or island on which review has been completed, together with a map thereof and a definition of its boundaries. Such advice shall be given with respect to not less than one-third of the areas and islands to be reviewed under this subsection within three years after enactment of this Act, not less than two-thirds within seven years of enactment of this Act, and the remainder within ten years of enactment of this Act. A recommendation of the President for designation as wilderness shall become effective only if so provided by an Act of Congress. Nothing contained herein shall, by implication or otherwise, be construed to lessen the present statutory authority of the Secretary of the Interior with respect to the maintenance of roadless areas within units of the national park system.

- (d) (1) The Secretary of Agriculture and the Secretary of the Interior shall, prior to submitting any recommendations to the President with respect to the suitability of any area for preservation as wilderness--
- (A) give such public notice of the proposed action as they deem appropriate, including publication in the Federal Register and in a newspaper having general circulation in the area or areas in the vicinity of the affected land;
- (B) hold a public hearing or hearings at a location or locations convenient to the area affected. The hearings shall be announced through such means as the respective Secretaries involved deem appropriate, including notices in the Federal Register and in newspapers of general circulation in the area: Provided, That if the lands involved are located in more than one State, at least one hearing shall be held in each State in which a portion of the land lies;
- (C) at least thirty days before the date of a hearing advise the Governor of each State and the governing board of each county, or in Alaska the borough, in which the lands are located, and Federal departments and agencies concerned, and invite such officials and Federal agencies to submit their views on the proposed action at the hearing or by not later than thirty days following the date of the hearing.
- (d)(2) Any views submitted to the appropriate Secretary under the provisions of (1) of this subsection with respect to any area shall be included with any recommendations to the President and to Congress with respect to such area.
- (e) Any modification or adjustment of boundaries of any wilderness area shall be recommended by the appropriate Secretary after public notice of such proposal and public hearing or hearings as provided on subsection (d) of this section. The proposed modification or adjustment shall then be recommended with map and description thereof to the President. The President shall advise the United States Senate and the House of Representatives of his recommendations with respect to such modification or adjustment and such recommendations shall become effective only on the same manner as provided for in subsections (b) and (c) of this section.

Use of Wilderness Areas

- Sec. 4. (a) The purposes of this Act are hereby declared to be within and supplemental to the purposes for which national forests and units of the national park and national wildlife refuge systems are established and administered and --
- (1) Nothing in this Act shall be deemed to be in interference with the purpose for which national forests are established as set forth in the Act of June 4, 1897 (30 Stat. 11), and the Multiple Use Sustained-Yield Act of June 12, 1960 (74 Stat. 215).
- (2) Nothing in this Act shall modify the restrictions and provisions of the Shipstead-Nolan Act (Public Law 539, Seventy-first Congress, July 10, 1930; 46 Stat. 1020), the Thye-Blatnik Act (Public Law 733, Eightieth Congress, June 22, 1948; 62 Stat. 568), and the Humphrey-Thye-Blatnik-Andresen Act (Public Law 607,

Eighty-fourth Congress, June 22.1965; 70 Stat. 326), as applying to the Superior National Forest or the regulations of the Secretary of Agriculture.

- (3) Nothing in this Act shall modify the statutory authority under which units of the national park system are created. Further, the designation of any area of any park, monument, or other unit of the national park system as a wilderness area pursuant to this Act shall in no manner lower the standards evolved for the use and preservation of such park, monument, or other unit of the national park system in accordance with the Act of August 25, 1916, the statutory authority under which the area was created, or any other Act of Congress which might pertain to or affect such area, including, but not limited to, the Act of June 8, 1906 (34 Stat. 225; 16 U.S.C. 432 et seq.); section 3(2) of the Federal Power Act (16 U.S.C. 796 (2)); and the Act of August 21,1935 (49 Stat. 666; 16 U.S.C. 461 et seq.).
- (b) Except as otherwise provided in this Act, each agency administering any area designated as wilderness shall be responsible for preserving the wilderness character of the area and shall so administer such area for such other purposes for which it may have been established as also to preserve its wilderness character. Except as otherwise provided in this Act, wilderness areas shall be devoted to the public purposes of recreational, scenic, scientific, educational, conservation, and historical use.

Prohibition of Certain Uses

(c) Except as specifically provided for in this Act, and subject to existing private rights, there shall be no commercial enterprise and no permanent road within any wilderness area designated by this Act and, except as necessary to meet minimum requirements for the administration of the area for the purpose of this Act (including measures required in emergencies involving the health and safety of persons within the area), there shall be no temporary road, no use of motor vehicles, motorized equipment or motorboats, no landing of aircraft, no other form of mechanical transport, and no structure or installation within any such area.

Special Provisions

- (d) The following special provisions are hereby made:
- (1) Within wilderness areas designated by this Act the use of aircraft or motorboats, where these uses have already become established, may be permitted to continue subject to such restrictions as the Secretary of Agriculture deems desirable. In addition, such measures may be taken as may be necessary in the control of fire, insects, and diseases, subject to such conditions as the Secretary deems desirable.
- (2) Nothing in this Act shall prevent within national forest wilderness areas any activity, including prospecting, for the purpose of gathering information about mineral or other resources, if such activity is carried on in a manner compatible with the preservation of the wilderness environment. Furthermore, in accordance with such program as the Secretary of the Interior shall develop and conduct in consultation with the Secretary of Agriculture, such areas shall be surveyed on a planned, recurring basis consistent with the concept of wilderness preservation by the Geological Survey and the Bureau of Mines to determine the mineral values, if any, that may be present; and the results of such surveys shall be made available to the public and submitted to the President and Congress.
- (3) Not withstanding any other provisions of this Act, until midnight December 31, 1983, the United States mining laws and all laws pertaining to mineral leasing shall, to the extent as applicable prior to the effective date of this Act, extend to those national forest lands designated by this Act as "wilderness areas"; subject, however, to such reasonable regulations governing ingress and egress as may be prescribed by the Secretary of Agriculture consistent with the use of the land for mineral location and development and exploration, drilling, and production, and use of land for transmission lines, waterlines, telephone lines, or facilities necessary in

exploring, drilling, producing, mining, and processing operations, including where essential the use of mechanized ground or air equipment and restoration as near as practicable of the surface of the land disturbed in performing prospecting, location, and , in oil and gas leasing, discovery work, exploration, drilling, and production, as soon as they have served their purpose. Mining locations lying within the boundaries of said wilderness areas shall be held and used solely for mining or processing operations and uses reasonably incident thereto; and hereafter, subject to valid existing rights, all patents issued under the mining laws of the United States affecting national forest lands designated by this Act as wilderness areas shall convey title to the mineral deposits within the claim, together with the right to cut and use so much of the mature timber therefrom as may be needed in the extraction, removal, and beneficiation of the mineral deposits, if needed timber is not otherwise reasonably available, and if the timber is cut under sound principles of forest management as defined by the national forest rules and regulations, but each such patent shall reserve to the United States all title in or to the surface of the lands and products thereof, and no use of the surface of the claim or the resources therefrom not reasonably required for carrying on mining or prospecting shall be allowed except as otherwise expressly provided in this Act: Provided, That, unless hereafter specifically authorized, no patent within wilderness areas designated by this Act shall issue after December 31, 1983, except for the valid claims existing on or before December 31, 1983. Mining claims located after the effective date of this Act within the boundaries of wilderness areas designated by this Act shall create no rights in excess of those rights which may be patented under the provisions of this subsection. Mineral leases, permits, and licenses covering lands within national forest wilderness areas designated by this Act shall contain such reasonable stipulations as may be prescribed by the Secretary of Agriculture for the protection of the wilderness character of the land consistent with the use of the land for the purposes for which they are leased, permitted, or licensed. Subject to valid rights then existing, effective January 1,1984, the minerals in lands designated by this Act as wilderness areas are withdrawn from all forms of appropriation under the mining laws and from disposition under all laws pertaining to mineral leasing and all amendments thereto.

- (4) Within wilderness areas in the national forests designated by this Act, (1) the President may, within a specific area and in accordance with such regulations as he may deem desirable, authorize prospecting for water resources, the establishment and maintenance of reservoirs, water-conservation works, power projects, transmission lines, and other facilities needed in the public interest, including the road construction and maintenance essential to development and use thereof, upon his determination that such use or uses in the specific area will better serve the interests of the United States and the people thereof than will its denial; and (2) the grazing of livestock, where established prior to the effective date of this Act, shall be permitted to continue subject to such reasonable regulations as are deemed necessary by the Secretary of Agriculture.
- (5) Other provisions of this Act to the contrary notwithstanding, the management of the Boundary Waters Canoe Area, formerly designated as the Superior, Little Indian Sioux, and Caribou Roadless Areas, in the Superior National Forest, Minnesota, shall be in accordance with the general purpose of maintaining, without unnecessary restrictions on other uses, including that of timber, the primitive character of the area, particularly in the vicinity of lakes, streams, and portages: Provided, That nothing in this Act shall preclude the continuance within the area of any already established use of motorboats.
- (6) Commercial services may be performed within the wilderness areas designated by this Act to the extent necessary for activities which are proper for realizing the recreational or other wilderness purposes of the areas.
- (7) Nothing in this Act shall constitute an express or implied claim or denial on the part of the Federal Government as to exemption from State water laws.
- (8) Nothing in this Act shall be construed as affecting the jurisdiction or responsibilities of the several States with respect to wildlife and fish in the national forests.

State and Private Lands Within Wilderness Areas

- Sec. 5. (a) In any case where State-owned of privately owned land is completely surrounded by national forest lands within areas designated by this Act as wilderness, such State or private owner shall be given such rights as may be necessary to assure adequate access to such State-owned or privately owned land by such State or private owner and their successors in interest, or the State-owned land or privately owned land shall be exchanged for federally owned land in the same State of approximately equal value under authorities available to the Secretary of Agriculture: Provided, however, That the United States shall not transfer to a state or private owner any mineral interests unless the State or private owner relinquishes or causes to be relinquished to the United States the mineral interest in the surrounded land.
- (b) In any case where valid mining claims or other valid occupancies are wholly within a designated national forest wilderness area, the Secretary of Agriculture shall, by reasonable regulations consistent with the preservation of the area as wilderness, permit ingress and egress to such surrounded areas by means which have been or are being customarily enjoyed with respect to other such areas similarly situated.
- (c) Subject to the appropriation of funds by Congress, the Secretary of Agriculture is authorized to acquire privately owned land within the perimeter of any area designated by this Act as wilderness if (1) the owner concurs in such acquisition or (2) the acquisition is specifically authorized by Congress.

Gifts, Bequests, and Contributions

- Sec. 6. (a) The Secretary of Agriculture may accept gifts or bequests of land within wilderness areas designated by this Act for preservation as wilderness. The Secretary of Agriculture may also accept gifts or bequests of land adjacent to wilderness areas designated by this Act for preservation as wilderness if he has given sixty days advance notice thereof to the President of the Senate and the Speaker of the House of Representatives. Land accepted by the Secretary of Agriculture under this section shall become part of the wilderness area involved. Regulations with regard to any such land may be in accordance with such agreements, consistent with the policy of this Act, as are made at the time of such gift, or such conditions, consistent with such policy, as may be included in, and accepted with, such bequest.
- (b) The Secretary of Agriculture or the Secretary of the Interior is authorized to accept private contributions and gifts to be used to further the purpose of this Act.

Annual Reports

Sec. 7. At the opening of each session of Congress, the Secretaries of Agriculture and Interior shall jointly report to the President for transmission to Congress on the status of the wilderness system, including a list and descriptions of the areas in the system, regulations in effect, and other pertinent information, together with any recommendations they may care to make.

Approved September 3, 1964.

Legislative History

House Reports: No. 1538 accompanying H.R. 9070 (Comm. on Interior & Insular affairs) and No. 1829 (Comm. of Conference).

Senate Report No. 109 (Comm. on Interior & Insular Affairs).

Congressional Record:

Appendix A: Applicable Laws and Management Guidance

Vol. 109 (1963): Apr. 4, 8, considered in Senate. Apr. 9, considered and passed Senate.

Vol. 110 (1964): July 28, considered in House. July 30, considered and passed House, amended, in lieu of H. R. 9070. Aug. 20, House and Senate agreed to conference report.

Program Planning Criteria

The following program-specific planning criteria were developed to help guide the development of this Draft EIS and RMP. These provide more specificity on the General Planning Criteria, which are contained in Chapter 1.

(1) Air Quality

Under the "Clean Air Act," BLM-administered land in the planning area is classified as Class II (see Glossary). All activities will be managed to achieve Class II standards unless it is reclassified by the State of Nevada.

(2) Water Quality

The "Federal Water Pollution Control Act of 1977," as amended (known also as the "Clean Water Act" [CWA]), requires the BLM to be consistent with State non-point source management program plans and relevant water quality standards. Section 313 requires compliance with State water quality standards. The RMP will incorporate best management practices (BMPs) or other conservation measures for specific programs and activities. Water quality will be maintained or improved in accordance with State and Federal standards.

(3) Soil Management

Soil will be managed to protect long-term productivity. BMPs will be incorporated into other programs to minimize soil erosion and compaction.

(4) Vegetation Management

Vegetation will be managed to provide for biological diversity at the landscape level, to protect and restore native perennial and desirable nonnative perennial species, and to provide for consumptive uses and non-consumptive values, including visual quality and watershed condition.

Livestock forage allocations, established in grazing program EISs and subsequent agreements and decisions, will not be revised by this plan. Grazing management adjustments will occur on a priority basis over the life of the plan through an adaptive management process and subsequent agreements, decisions, or plan revisions. Authorization of livestock use in the planning area will be adjusted by allotment management plans. The RMP will include provisions for plant maintenance, watershed protection and stability, and wildlife habitat; and will provide for livestock, wildlife, and wild horses.

Fire and other treatment methods are considered tools to meet vegetation management objectives.

(5) Riparian Areas, Floodplains and Wetlands

Riparian areas, floodplains and wetlands will be managed to restore, protect, or improve their natural functions relating to water storage, groundwater recharge, water quality, and fish and wildlife values.

(6) Woodland Management

All juniper and quaking aspen woodlands will be managed to protect long-term productivity, biological diversity, and watershed values.

(7) Noxious Weed Control

The BLM, in participation with county, state, and Federal agencies will monitor the locations and spread of noxious weeds. Noxious weed control will be conducted in accordance with the integrated weed management guidelines and design features identified in the Thirteen State Vegetation Treatment EIS.. Control of noxious weeds will occur in wilderness areas, if needed, but may include certain restrictions to reduce potential impacts on specific values. The BLM will assess land prior to acquisition to determine whether or not noxious weeds are present.

(8) Special Status Species

The BLM is required by law to assist the conservation and recovery of species listed as threatened or endangered or proposed for listing under the "Endangered Species Act" ((ESA). Federal actions that may affect the well being of these species require consultation with the U.S. Fish and Wildlife Service (USFWS). BLM policy also requires that authorized actions do not contribute to the need to list any other special status species under the provisions of the ESA. The intent is to avoid the need for future listings of species as threatened or endangered.

(9) Wild Horses

Forage will be provided to support wild horse populations at levels established in accordance with the "Wild Free-Roaming Horse and Burro Act. (check terminology) "Adjustments in range allocation will be based on monitoring to ensure a thriving natural ecological balance within herd management areas (HMAs).

(10) Livestock Management

Grazing of public land will be authorized under the principles of multiple use and sustained yield. Livestock will be managed to maintain or improve public land resources and rangeland productivity and to stabilize the livestock industry dependent on the public range over the long term. Livestock grazing will be consistent with meeting the applicable Standards for Rangeland Health and the Guidelines for livestock grazing.

Forage will be allocated, by allotment, for livestock grazing on suitable rangeland based on multiple use and sustained yield objectives. Existing management systems, including those outlined in allotment management plans, will continue until evaluations indicate that change is needed to meet objectives. The process for determining livestock forage allocations through allotment evaluations will proceed in accordance with BLM regulations and policy.

(11) Fire Management

Wildland fire, as a critical natural process, will be integrated into resource management planning to assist in the attainment of resource management objectives. The use of surface-disturbing equipment to suppress wildland fires will be restricted in areas such as wilderness and other areas containing significant cultural or paleontological values, except when needed to protect human life or private property.

(12) Land Tenure Adjustments

BLM-administered land will be retained in Federal ownership. Land acquisition will be based on public benefits, management considerations, willing sellers and public access needs. Specific actions that meet land tenure adjustment criteria established in the RMP will occur with public participation and will be made in consultation with local, county, state, and tribal governments.

(13) Rights-of-way

Public land will be limited for land use authorizations including transportation and utility rights-of-way, with preference given to existing corridors.

(14) Energy and Minerals

Public land will be un-available for energy and mineral exploration except in the case of valid rights existing at the time of designation. Development will be subject to applicable Federal and state laws and regulations.

(15) Recreation

All public land will be identified as being within either special recreation management areas or extensive recreation management areas. Some areas may be subject to special measures to protect resources or reduce potential conflicts among uses. Where there is a demonstrated need, the BLM may develop and maintain recreation facilities, including campgrounds, picnic areas, interpretive sites, , and trails.

(16) Motorized Vehicle Use

All public land will be designated as open, limited, or closed in regard to OHV use. Public safety, resource protection, user access needs, and conflict resolution will be considered in assigning these designations.

(17) Visual Resources

The BLM will manage public land to protect the quality of scenic (visual) values in accordance with established guidelines. All public land will be designated as VRM Class I, II, III, or IV.

(18) National Wild and Scenic Rivers System

As required by law, streams and drainages will be evaluated for potential addition to the NWSRS. The evaluation will be conducted according to guidelines published by the Secretaries of Interior and Agriculture on September 7,1982, and other applicable guidance. Designated NWSRs will be managed in accordance with laws and existing plans.

(19) Wilderness Areas

Wilderness areas designated will be managed under the authority of the Wilderness Act of 1964 and the Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Act of 2000, as amended.

(20) Cultural and Paleontological Resources

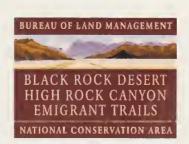
The long term integrity of the historic trails and their setting will be managed to conserve intact segments, protect associated trail sites, and stabilize damaged portions. Cultural and paleontological resources will be managed to maintain or enhance their scientific, interpretive, educational, and American Indian values. Cultural resources will be managed to protect American Indian interests.

(21) Areas of Critical Environmental Concern

ACECs will be designated where special management attention is required to protect historic, cultural, or scenic values; natural resources or processes; or human life and safety. Management requirements for ACECs will be identified in this plan.



Appendix B: Management Zone Descriptions





Appendix B: Management Zone Descriptions

Management zoning would be established throughout the planning area to provide and maintain a range of recreational opportunities for different user-types with varying interests and abilities. Each separate zone has distinct settings to be provided and maintained. Physical settings consider the degree of naturalness, amount and type of facilities, as well as proximity to roads. Social settings consider the number of contacts with other people, the size of groups, and evidence of other users. Managerial settings consider the amount of visitor management used to achieve desired social and resource conditions, the compatibility of traditional land uses with the recreational environment, and the type of vehicle use allowed in the area.

Zones are tools that help guide decision-making on visitor uses, management actions, facility development and other uses. Certain limitations and developments in some areas may better provide for one user-type than another. All users are welcome to use all areas as long as they participate in a manner that is consistent with the access, facilities, and opportunities provided.

Standards for each zone would be set through a Recreation Area Management Plan creating critical thresholds based on the minimal acceptable condition of resources and the visitor experience. Standards would be used to determine when and where management action is needed. Social and resource indicators would be monitored to identify areas that are experiencing resource impacts, and to determine the status of their condition in relation to the acceptable standards.

A variety of "resource indicators" and "social indicators" would be developed for each zone. The most stringent resource and experiential (social) requirements will be instituted for the Wilderness Zone, with less stringent requirements for the Front Country Zone. For example, limits to the extent of disturbance around a campsite, or the number of people camping in one area would be greater in the Wilderness Zone, since management in the Wilderness Zone would strive for visitor solitude, absence of development, and no evidence of human use. The Front Country Zone would be the primary area of visitation, social encounters would not likely trigger limitations on visitor numbers, but resource damage could impose more active visitation management if other tools prove ineffective.

The following represents management goals as they relate to the recreation zones:

Wilderness Zone

The Wilderness Zone would provide opportunities for an undeveloped, primitive, and self-directed visitor experience, without motorized or mechanized access. The environment would offer the greatest opportunity for challenge, risk and adventure, and self-sufficiency would be crucial. Excellent opportunities for primitive recreation include, but are not limited to dispersed camping, backpacking, horsepacking, nature study, and hunting in large areas of solitude and quiet. Contact with other people would be minimal.

Rustic Zone

The Rustic Zone would provide opportunities for dispersed primitive recreation with limited designated campsites, trails, and minimal interpretation. Opportunities for dispersed primitive camping would be widely available with designated campsites provided in some areas to limit resource damage. Motorized and mechanized access would be allowed on designated routes. The environment offers possibilities for challenge, risk and adventure, and self-sufficiency would be needed. Interaction with other people would be expected during certain seasons and times, but there would be a good chance of solitary experiences.

Appendix B: Management Zone Descriptions

Front Country Zone

The Front Country Zone would serve as the primary area for visitation. It would provide opportunities for developed camping, recreation trails, social interaction, and interpretation that highlight the vast natural and historical resources of the NCA. Challenge and adventure would be less important compared to other zones. Interaction with other people would be common during certain seasons and times, but solitude and quiet would be available some of the time.



Appendix C: Rangeland Health Standards and Guidelines





Appendix C: California and Nevada Rangeland Health Standards and Guidelines

Sierra Front-Northwestern Great Basin Area

PREAMBLE

The Standards and Guidelines for livestock grazing on Bureau of Land Management lands are written to accomplish the four fundamentals of rangeland health, insofar as they are affected by livestock grazing practices. Those fundamentals are:

- Watersheds are properly functioning;
- Ecological processes are in order;
- Water quality complies with State Standards; and
- Habitats of protected species are in order.

Other uses can affect the health of the land, and Guidelines for these currently exist or will be developed as needed. In addition, implementation of livestock grazing guidelines must be coordinated with other uses of the land, and collectively these uses should not detract from the goal of achieving public land health.

Standards, Indicators and Guidelines will be implemented through Standard public land management practices as defined in the Nevada Rangeland Monitoring Handbook and the other documents listed in Appendix A [of this appendix].

Standards: The goal to be achieved.

Indicators: Indicators are observations or measurements of physical, chemical or biological factors that should be used to evaluate site conditions or trends, appropriate to the potential of the site. Indicators assist in determining whether Standards are met or Guidelines followed.

Guidelines: Guidelines are livestock management practices (e.g., tools, methods, strategies and techniques) designed to achieve healthy public lands as defined by Standards and portrayed by Indicators. Guidelines are designed to provide direction, yet offer flexibility for local implementation through activity plans and grazing permits. Activity plans may add specificity to the Guidelines based on local goals and objectives as provided for in adopted manuals, handbooks and policy. Not all Guidelines fit all circumstances. Monitoring and site specific evaluation will determine if the Standards are being met or the trend on a particular site is toward desired objectives, and if the correct Guidelines are being applied. The BLM Authorized Officer, in consultation with public land users, will identify and document acceptable or unavoidable exceptions on a case-by-case basis.

STANDARDS FOR RANGELAND HEALTH

STANDARD 1. SOILS:

Soil processes will be appropriate to soil types, climate and landform. As indicated by:

- Surface litter is appropriate to the potential of the site;

- Soil crusting formations in shrub interspaces, and soil compaction are minimal or not in evidence, allowing for appropriate infiltration of water;
- Hydrologic cycle, nutrient cycle and energy flow are adequate for the vegetative communities;
- Plant communities are diverse and vigorous, and there is evidence of recruitment; and
- Basal and canopy cover (vegetative) is appropriate for site potential.

STANDARD 2. RIPARIAN/WETLANDS:

Riparian/Wetland systems are in properly functioning condition. As indicated by:

- Sinuosity, width/depth ratio and gradient are adequate to dissipate streamflow without excessive erosion or deposition;
- Riparian vegetation is adequate to dissipate high flow energy and protect banks from excessive erosion; and
- Plant species diversity is appropriate to riparian-wetland systems.

STANDARD 3. WATER QUALITY:

Water quality criteria in Nevada or California State Law shall be achieved or maintained. As indicated by:

- Chemical constituents do not exceed the water quality Standards;
- Physical constituents do not exceed the water quality Standards;
- Biological constituents do not exceed the water quality Standards; and
- The water quality of all water bodies, including ground water located on or influenced by BLM lands will meet or exceed the applicable Nevada or California water quality Standards. Water quality Standards for surface and ground waters include the designated beneficial uses, numeric criteria, narrative criteria, and antidegradation requirements set forth under State law, and as found in Section 303(c) of the Clean Water Act.

STANDARD 4. PLANT AND ANIMAL HABITAT:

Populations and communities of native plant species and habitats for native animal species are healthy, productive and diverse. As indicated by:

- Good representation of life forms and numbers of species;
- Good diversity of height, size, and distribution of plants;
- Number of wood stalks, seed stalks, and seed production adequate for stand maintenance; and
- Vegetative mosaic, vegetative corridors for wildlife, and minimal habitat fragmentation.

STANDARD 5. SPECIAL STATUS SPECIES HABITAT:

Habitat conditions meet the life cycle requirements of special status species. As indicated by:

- Habitat areas are large enough to support viable populations of special status species;
- Special status plant and animal numbers and ages appear to ensure stable populations;
- Good diversity of height, size, and distribution of plants;
- Number of wood stalks, seed stalks, and seed production adequate for stand maintenance; and
- Vegetative mosaic, vegetative corridors for wildlife, and minimal habitat fragmentation.

GUIDELINES FOR GRAZING MANAGEMENT:

- 1. Waters must be free from high temperature, biocides, organisms pathogenic to human beings, toxic, corrosive or other deleterious substances attributable to domestic or industrial waste or other controllable sources at levels or combinations to interfere with any beneficial use of the water. Compliance with the provisions of this subsection may be determined in accordance with methods of testing prescribed by the State. If used as an Indicator, survival of test organisms must not be significantly less in test water than in control water.
- 2. Grazing management practices should be planned and implemented to meet water quality provisions in either California State water law or Nevada Administrative Code Section 445A.120-121 as applicable.
- 3. Management practices within allotments will maintain or promote stream channel morphology, appropriate soil organisms; adequate amounts of ground cover to support infiltration, maintain soil moisture storage, and stabilize soils; and the hydrologic cycle, nutrient cycle and energy flow.
- 4. After a range fire or other natural catastrophic event, vegetation should be returned to the native species as rapidly as possible, to afford forage and habitat for native animals. If a nurse crop is needed to protect the land from erosion, all native nurse crops should be used first.
- 5. Treated areas will be rested from livestock grazing for two growing seasons or until seedlings are established or the vegetative response has achieved objective levels. Wild horse and burros removed from Herd Management Areas will be restored after rehabilitation objectives have been met.
- 6. Alternative solutions (e.g., reseeding, funding, labor, equipment use or rental) to facilitate fire rehabilitation may be included in cooperative agreements involving qualified groups and individuals who want to participate.
- 7. Appropriate livestock grazing treatments will be implemented to control the frequency, duration, and level of grazing use. Where livestock grazing is authorized, grazing systems will provide within any one grazing year one or more of the following treatments:
 - a. Rest or deferment from livestock grazing on a specified area as appropriate to meet Standards.
 - b. Systematic rotation of deferred use and/or rest from livestock grazing among two or more units.
 - c. Continuous, season-long use where it has been demonstrated to be consistent with achieving identified Standards. Once season long use is determined to be unacceptable, an alternative system will be developed and implemented before termination of season long use, prior to the next grazing season.
 - d. Excluding further livestock grazing within the affected use area through appropriate techniques when utilization objectives are reached.
- 8. Conservation of Federal threatened or endangered, proposed, species of concern (formally Category One and Two) and other special status species is promoted by the restoration and maintenance of their habitats.
- 9. Salt and/or supplements will be placed at least ¼ mile from live waters (springs/streams) and outside of associated riparian areas, permanent livestock watering facilities, wet or dry meadows, and aspen stands. Also salt should not be placed in known historic properties.
- 10. Night bedding of sheep will be located at least ¼ mile from live waters, streams, springs, seeps, associated riparian areas, wet or dry meadows, and aspen stands.

- 11. Encourage the use of prescribed and natural fires, meeting prescription objectives, for the restoration and maintenance of healthy rangelands.
- 12. Departure from traditional grazing management practices may be authorized by BLM to achieve Standards on a case-by-case experimental basis for rangeland restoration and rehabilitation.
- 13. The best available science and technology will be utilized in monitoring and assessing the condition of rangelands from the pasture to the BLM District level.
- 14. Recognizing State Water Law requirements, wildlife and wild horses/burros within their Herd Management Areas will have access to surface water they customarily use.
- 15. Design of water facilities will incorporate features to ensure safe access and escape for small animals and birds.
- 16. The development of springs and seeps or other projects affecting water and associated resources shall be designed to maintain the associated riparian area and assure the attainment of Standards.
- 17. Grazing management practices shall be planned and implemented to allow for habitat requirements of wildlife and wild horses and burros within Herd Management Areas.
- 18. Implement aggressive action to reduce the invasion of exotic plant species into native plant communities. Control the spread of noxious weeds through various methods such as, grazing management, fire management and other vegetative management practices.
- 19. Riparian structural developments (i.e., gabions, dams, etc.) designed to achieve improvement in riparian and wetland conditions shall only be implemented in conjunction with changes in existing grazing management practices, where grazing is a significant factor contributing to a riparian condition needing such attention. Where grazing is not a significant factor causing a riparian condition needing attention, structural developments designed to achieve improvement in riparian and wetland conditions may be implemented independent of changes in existing grazing management practices.
- 20. The utilization, monitoring and evaluation process will be used as a tool to promote healthy rangelands and achieve Standards.
- 21. Implement grazing management practices that sustain biological diversity across the landscape.
- 22. To prevent transmission of disease between domestic and bighorn sheep, adopt and implement the "Guidelines for Domestic Sheep Management in Bighorn Sheep Habitats" contained in Mountain Sheep Ecosystem Management Strategy in the 11 Western States and Alaska.
- 23. Rangeland management plans will consider listings of known historic properties and new eligible properties as they become known

Standards and Guidelines for Rangeland Health in Northeastern California and Northwestern Nevada

The Preferred Alternative described in the final EIS (Alternative 5), with minor changes for clarification, has been chosen as the Standards and Guidelines for Northeastern California and Northwestern Nevada. The changes reflected in this Decision are within the scope and analysis of the EIS. These Standards and Guidelines will take effect immediately upon their approval by the Secretary of the Interior. These standards and guidelines were developed for, and are hereby adopted for, that part of northeastern California and northwestern Nevada formerly known as the Susanville District.

Preamble

Healthy rangelands contribute to the social and economic well being of rural communities in Northeastern California and Northwestern Nevada, and they provide, over the long term, the most reliable harvest of rangeland resources. The objective of rangeland resource planning is to integrate BLM resources with other resources to achieve the mandate of multiple-use and sustained yield management of renewable resources in an environmentally sound and cost-effective manner.

The **Standards** of rangeland health are expressions of physical and biological condition or degree of function required for healthy, sustainable rangelands. The Standards are applied on a landscape scale. Some standards may not apply to all acres. For example, a mosaic of vegetation types and age classes

Decision -- Page 3 may produce the diversity associated with healthy rangelands; however, some individual vegetation communities within the mosaic may lack diversity. The Standards always relate to the capability or potential of a specific site. The land will not be expected to produce vegetation or support habitats not attainable due to climate, soils, or other limiting attributes. In instances where site capability or potential has changed due to human-caused or natural disturbance, recognition will be given to the modified capability when setting or assigning a standard to (for) the site. The Standards are designed to establish the threshold for healthy rangelands. In some circumstances, an exception to the Standards or Guidelines may be necessary or unavoidable; however, these instances should be under extreme conditions only, and fully justified (documented) in order to be acceptable.

The **Guidelines** for grazing management are the types of grazing management methods and practices determined to be appropriate to ensure that standards can be met or that significant progress can be made toward meeting the standard. The Guidelines were designed to provide direction, yet offer flexibility for implementation through activity plans and terms and conditions for grazing permits. The Bureau of Land Management (BLM) must operate within the constraints of other regulatory requirements that may affect how standards and guidelines are applied for livestock grazing, for example the Wild Free-Roaming Horse and Burro Act (1971).

STANDARD 1: UPLAND SOILS

Upland soils exhibit infiltration and permeability rates that are appropriate to soil type, climate and landform, and exhibit functional biological, chemical and physical characteristics.

Meaning that:

Precipitation is able to enter the soil surface and move through the soil profile at a rate appropriate to soil type, climate, and landform; the soil is adequately protected against human-caused wind or water erosion; and the soil fertility is maintained at, or improved to, the appropriate level.

Criteria to Meet Standard:

- * Ground cover (vegetation, litter, and other types of ground cover such as rock fragments) is sufficient to protect sites from accelerated erosion.
- * Evidence of wind and water erosion, such as rills and gullies, pedestaling, scour or sheet erosion, and deposition of dunes is either absent or, if present, does not exceed what is natural for the site.

* Vegetation is vigorous, diverse in species composition and age class, and reflects the potential natural vegetation or desired plant community for the site.

STANDARD 2: STREAMS

Stream channel form and function are characteristic for the soil type, climate, and landform.

Meaning that:

Decision -- Page 4

Channel gradient, pool frequency, width to depth ratio, roughness, sinuosity, and sediment transport are able to function naturally and are characteristic of the soil type, climate, and landform.

Criteria to Meet Standard:

- * Gravel bars and other coarse textured stream deposits are successfully colonized and stabilized by woody riparian species.
- * Stream bank vegetation is vigorous and diverse, mostly perennial, and holds and protects banks during high stream flow events.
- * The stream water surface has a high degree of shading, resulting in cooler water in summer and reduced icing in winter.
- * Portions of the primary floodplain are frequently flooded (inundated every 1-5 years).

STANDARD 3: WATER QUALITY

Water will have characteristics suitable for existing or potential beneficial uses. Surface and groundwater complies with objectives of the Clean Water Act and other applicable water quality requirements, including meeting the California and Nevada State standards, excepting approved variances. Management Objective: For water bodies, the primary objective is to maintain the existing quality and beneficial uses of water, protect them where they are threatened, and restore them where they are currently degraded. This objective is of even higher priority in the following situations:

- a. Where beneficial uses of water bodies have been listed as threatened or impaired pursuant to Section 303(d) of the Federal Clean Water Act;
- b. Where aquatic habitat is present, has been present, or is potentially present for Federal threatened or endangered, candidate, and other special status species dependent on water resources; and
- c. In designated water resource sensitive areas such as riparian and wetland areas.

Meaning That:

BLM will:

Maintain the physical, biological, and chemical integrity of waters flowing across or underlying the lands it administers.

Protect the integrity of these waters where it is currently threatened.

Insofar as is feasible, restore the integrity of these waters where it is currently impaired.

Not contribute to pollution and take action to remedy any pollution resulting from its actions that violates California and Nevada water quality standards, Tribal water quality standards, or other applicable water quality requirements (e.g., requirements adopted by SWRCB or RWQCB in Decision -- Page 5

California, or U.S. EPA pursuant to Section 303(d) of the Clean Water Act or the Coastal Zone Reauthorization Act). Where action related to grazing management is required, such action will

be taken as soon as practicable but not later than the start of the next grazing year (in accordance with 43 CFR 4180.1). Be consistent with the non-degradation policies as identified by the States. Develop and execute a Management Agency Agreement with the States of California and Nevada for the efficient protection of water quality associated with BLM's management. Work with the States' water quality administrative agencies and U.S. EPA to establish appropriate beneficial uses for public waters, establish appropriate numeric targets for 303(d)- listed water bodies, and implement the applicable requirements to ensure that water quality on public

lands meets the objectives for the designated beneficial uses of the water. Develop and implement Best Management Practices (BMPs) approved by the States to protect

and restore the quality and beneficial uses of water, and monitor both implementation and effectiveness of the BMPs. These BMPs will be developed in full consultation, coordination, and cooperation with permittees and other interests.

State or Tribal approved variances or exceptions to water quality standards may be applicable within their Basin Plans for specific types of activities or actions. BLM will follow State or Tribal administrative procedures associated with variances.

As Indicated By:

- * The following do not exceed the applicable requirements for physical, chemical, and biological constituents including, but not limited to: temperature, nutrients, fecal coliform, turbidity, sediment, dissolved oxygen, aquatic organisms and plants (e.g., indicator macroinvertebrates, fish, algae, and plants).
- * Achievement of the standards for riparian, wetlands, and water bodies.
- * Monitoring results or other data that show water quality is meeting the standard.

STANDARD 4: RIPARIAN and WETLAND SITES

Riparian and Wetland areas are in properly functioning condition and are meeting regional and local management objectives.

Meaning that:

The riparian and wetland vegetation is controlling erosion, stabilizing stream banks, shading water areas to reduce water temperature, filtering sediment, aiding in floodplain development, dissipating energy, delaying floodwater and increasing recharge of ground water that is characteristic for these sites. Vegetation surrounding seeps and springs is controlling erosion and reflects the potential natural vegetation for the site.

Criteria to Meet Standard:

Decision -- Page 6

- * Riparian vegetation is vigorous and mostly perennial, and diverse in species composition, age class and life form sufficient to stabilize stream banks and shorelines.
- * Riparian vegetation and large woody debris are well anchored and capable of withstanding high stream flow events.
- * Negligible accelerated erosion as a result of human related activities is evident.
- * Age class and structure of woody riparian and wetland vegetation are appropriate for the site.

Exceptions and Exemptions to Standard 4 (where Standard 4 is not applicable)

* Structural facilities constructed for livestock/wildlife water or other purposes are not natural wetland and/or riparian areas. Examples are: water troughs, stock ponds, flood control structures, tailings ponds, water gaps on fenced or otherwise restricted stream corridors, etc.

STANDARD 5: BIODIVERSITY

Viable, healthy, productive and diverse populations of native and desired plant and animal species, including special status species, are maintained.

Meaning that:

Native and other desirable plant and animal populations are diverse, vigorous, able to reproduce, and support nutrient cycles and energy flows.

Criteria to Meet Standard:

* Wildlife habitats include seral stages, vegetation structure, and patch size to promote diverse and viable wildlife populations.

- * A variety of age classes are present for most species.
- * Vigor is adequate to maintain desirable levels of plant and animal species to ensure reproduction and recruitment of plants and animals when favorable events occur.
- * Distribution of plant species and their habitats allow for reproduction and recovery from localized catastrophic events.
- * Natural disturbances such as fire are evident, but not catastrophic.
- * Non-native plant and animal species are present at acceptable levels.
- * Habitat areas are sufficient to support diverse, viable, and desired populations and are connected adequately with other similar habitat areas.
- * Adequate organic matter (litter and standing dead plant material) is present for site protection and decomposition to replenish soil nutrients and maintain soil health.

 Decision -- Page 7

GUIDELINES FOR LIVESTOCK GRAZING

The following guidelines are meant to apply to one or more of the standards for rangeland health.

Guideline 1: Adequate stubble will be present on all stream-side areas at the end of the growing season, or at the end of the grazing season if grazing occurs after fall dormancy. The residual or regrowth should provide sufficient herbaceous forage biomass to meet the requirement of plant vigor maintenance, bank protection, and sediment entrapment. Stubble height thresholds will be set on a site-specific basis, except for those allotments to which Guideline 16 applies (see Guideline 16 for an explanation of when Guideline 16 applies). Utilization of stream-side herbaceous and woody plants should be limited to a specified amount of the current growth, and/or livestock should be removed to allow sufficient time for plant regrowth.

- a. Late season use (summer or fall grazed pastures) requires more restrictive utilization based on site specific situations.
- **b.** Special situations such as fragile fisheries habitats or easily eroded stream banks may require more restrictive utilization thresholds.
- c. Hoof action impacts or chiseling on stream banks will not exceed specified thresholds so that stream bank stability is maintained or improved.

Guideline 2: Desired seral states will be determined through the Allotment Management Plan development process; generally the goal will be to achieve advanced ecological status in the riparian zone, except where site-specific objectives call for lower ecological status (such as meadows in important sage grouse habitat, where the objective might call for a pattern of meadows in different seral stages from mid-seral to the potential natural community). These site-specific objectives will be determined through allotment management plans or other plans and analyzed through the NEPA process.

Guideline 3: Periods of rest from livestock grazing or other avoidable disturbances must be provided during/after periods of stress on the land (e.g.: fire, flood, drought) and during critical times of plant growth.

Guideline 4: Plans for grazing on any allotment must consider other uses (recreation, archaeological sites, wildlife, horses and burros, mineral resource extraction, etc.) and be coordinated with the other users of public lands so that overall use does not detract from the goal of achieving rangeland health.

Guideline 5: Intensity, frequency, season-of-use, and distribution of grazing shall provide for growth and reproduction of desired plant species and the achievement of the potential natural vegetation or desired plant community.

Guideline 6: Grazing permits will include site-specific, measurable terms and conditions.

Guideline 7: Design and work towards implementation of a grazing management strategy for livestock for each grazing unit (pasture) within I (Improvement) and M (Maintenance) category allotments, to maintain or improve rangeland health. This may consist of, but not be limited to, season-of-use, rotation, or by setting utilization levels for desirable plants. Each management plan implemented will incorporate the factors necessary to maintain the health of desirable plants.

Decision -- Page 8

Guideline 8: Determination of grazing use by livestock must provide for the habitat requirements of fish and wildlife.

Guideline 9: Grazing management practices must sustain biological diversity across the landscape. A mosaic of seral stages, vegetation corridors, and minimal habitat fragmentation must be maintained.

Guideline 10: Take aggressive action to reduce the invasion of undesirable exotic plant species into native plant communities. The spread of noxious weeds will be controlled through appropriate methods such as grazing management, fire management, and other management practices.

Guideline 11: Prescribed fire and (natural) prescribed fire will be utilized to promote a mosaic of healthy plant communities and vegetative diversity.

Guideline 12: Grazing and other management practices shall take advantage of transitional opportunities (e.g., drought, flood, fire) to enhance or establish populations of desirable tree, shrub, herbaceous and grass species. Utilization levels will be established for desired seedlings, saplings, and/or mature plants to promote their presence in the plant community.

Guideline 13: Development of springs, seeps, and other water related projects shall be designed to promote rangeland health. Wherever possible, water sources shall be available year long for use by wildlife.

Guideline 14: Apply the management practices recognized and approved by the States of California and Nevada as Best Management Practices (BMPs) for grazing related activities to protect and maintain water quality.

Guideline 15: In watersheds draining into water bodies that have been listed or are proposed for listing as having threatened or impaired beneficial uses, and where grazing activities may contribute to the pollutants causing such impairment, the management objective is to fully protect, enhance, and restore the beneficial uses of the water.

Guideline 16: Utilization Levels to be Applied to those Allotments Not Meeting or Making Significant Progress Toward Meeting the Standards

If monitoring or documented observation indicates that one of more of the standards is not being met, and if significant progress is not being made toward meeting all of those standards that are not being met, and if there is evidence that current grazing practices are causing or contributing to this unsatisfactory condition, then the following utilization levels will be applied.

Utilization of key upland herbaceous species

UTILIZATION GUIDELINES
(adapted from Holechek 1988 and Holechek et al. 1998)
Community Type Percent of Use of Key Herbaceous Species
Salt desert shrubland 25-35
Semi-desert grass and shrubland 30-40
Sagebrush grassland 30-40

California annual grassland 50-60*
Perennial grass communities within the
California annual grassland vegetation type 30-40
Coniferous forest 30-40
Mountain shrubland 30-40
Oak woodland 30-40
Pinyon-juniper woodland 30-40
Alpine tundra 20-30

* Residual dry matter (RDM) guidelines will be used instead of these utilization levels for management of annual species in the California annual grassland. These RDM levels correspond approximately with these utilization levels. The RDM levels given in the table in the Final EIS under Alternative 5, Ukiah RAC Recommended Standards and Guidelines (Section 2.92), will be used for those few annual allotments within the area covered by this ROD.

Utilization of key upland browse species

There will be no more than 20 percent utilization of annual growth on key browse species prior to October 1 within identified deer concentration areas. These concentration areas are those areas within mule deer habitat where mule deer numbers are most likely to be concentrated during the winter season (winter season normally occurs from December 16 through March 31). These areas have been identified through State Fish and Game Agency fall and spring counts over a period of several years. Maps of these deer concentration areas are on file at the BLM Eagle Lake Field Office.

Utilization of key riparian species

A 4-6 inch minimum stubble height will remain at the end of the growing season in most riparian areas. There should be no more than 20% utilization on key riparian trees and shrub species in those areas where the presence of woody riparian species is necessary to meet standards.

Decision -- Page 10

Application of the above utilization levels

These utilization guidelines will be applied to those areas of the allotment responsible for the determination that the allotment is not meeting the standards. For example, an allotment has 10 riparian areas, of which 6 have been determined to be in proper functioning condition and 4 have been determined to be functional—at risk. The utilization guidelines for riparian species given above would be applied to the 4 riparian areas that are functional—at risk, not to the 6 that are in proper functioning condition (although *all* of the riparian areas will be managed to meet the standards). Also, only those guidelines that are applicable to making progress toward meeting the standards that are not being met would be applied. For example, if only riparian standards are not being met, then only the guidelines applicable to utilization and stubble height of riparian vegetation would be applied. These utilization levels will be implemented unless and until a current site-specific analysis is completed and new utilization levels are developed for specific allotments and documented in allotment management plans, other management plans, and/or in terms and conditions of grazing permits/leases. New site-specific utilization levels that are developed may be more restrictive than the guidelines presented above, consistent with achieving the desired resource conditions (as prescribed in land use plans and activity plans) and progress toward meeting the standards.

Implementation of this guideline

1. Uplands (including perennial grass and browse communities). Guideline 16 will be implemented only on those upland areas that are responsible for the determination that the allotment is not meeting one or more of the standards and for which lighter utilization would be expected to move these areas toward meeting the standard(s). Management changes (such as changes in season of use, timing, duration, and/or intensity; rotational grazing; fencing; herding; and/or adjustments in stocking rates) will be implemented if utilization guidelines on the average of the upland key areas across the pasture (or allotment if there is only one pasture)

are exceeded for 2 consecutive years or in any 2 years out of every 5 years. In addition, at least 70% of upland key areas on the pasture (or allotment) are not to exceed maximum utilization guidelines in most years. Because of the potential long-term damage to perennial grass species associated with severe grazing, severe grazing use (>70% utilization) in any upland key area in any year will result in a management change the following year. If any particular key area fails to meet the guidelines for more than 2 consecutive years, then management action will be taken to remedy the problem in the area of the allotment that key area represents. The average (mean) utilization on key species will be estimated at each key area and used to determine if the guidelines have been met. There are indications that the median may be a better statistic to use than the mean; we will calculate both statistics from the same data sets and make a determination on which statistic to use after examining the data over a period of a few

years. See Appendix 20 of the Final EIS for further discussion on this issue. The management options to be implemented to meet this guideline will be determined in full consultation, cooperation, and coordination with affected permittees and other interests. For allotments not meeting or making significant progress toward meeting the standards (and for which lower utilization levels of perennial upland species would be expected to help move these allotments toward the standards), utilization data already in hand will be used to determine whether a management change is necessary. Thus, for example, if utilization on a particular key area has exceeded the thresholds for the two years previous to the approval of these standards and guidelines, a management change will Decision -- Page 11 be implemented prior to the first grazing year following this approval. In addition to implementing management changes that are expected to bring utilization levels within threshold values, close monitoring will follow to ensure that the grazing use levels are not exceeded during the grazing period following the management changes. If utilization levels are exceeded or expected to be exceeded during this period, a reduction or curtailment of further grazing in the area represented by the key area will be required for the remainder of the grazing season. In addition, further management changes will be implemented prior to the start of the next grazing season to bring utilization levels within thresholds.

2. Riparian areas (including herbaceous and woody plant communities). Guideline 16 will be implemented only on those riparian areas that are nonfunctional or functional—at risk and lighter utilization levels would be expected to move these areas toward meeting the standards. The guideline will apply where the riparian area in a healthy state has the capability to produce vegetation of the prescribed height. The stubble heights will be measured at the end of the growing season to determine if the guideline has been met. Management changes (such as changes in season of use, timing, duration, and/or intensity; rotational grazing; fencing; herding; and/or adjustments in stocking rates) will be implemented if stubble heights on the average of the key riparian areas across the pasture (or allotment if there is only one pasture) fall below the guidelines for 2 consecutive years or in any 2 years out of every 5 years. In addition, at least 70% of riparian key areas on the allotment are to exceed minimum stubble heights in most years. If any particular key area fails to meet the guidelines for more than 2 consecutive years, then management action will be taken to remedy the problem in the area of the allotment that key area represents. Because stream banks may be inadequately protected by heavy use in any one year and because stubble heights below 3 inches result in cattle shifting their preference to shrubs, stubble heights below 2 inches in any one year will require a management change in the following year. The mean stubble height on key riparian species will be estimated at each riparian key area and used to determine if the guidelines have been met. There are indications that the median may be a better statistic to use than the mean; we will calculate both statistics from the same data sets and make a determination on which statistic to use after examining the data over a period of a few years. See Appendix 20 of the Final EIS for further discussion on this issue.

For allotments not meeting or making significant progress toward meeting the standards (and for which higher stubble would be expected to help move these allotments toward the standards), stubble height data already in hand will be used to determine whether a management change is necessary. Thus, for example, if stubble heights on a particular key area have fallen below the thresholds for the two years previous to the approval of these standards and guidelines, a management change will be implemented prior to the first grazing year following this approval. In addition to implementing management changes that are expected to bring stubble heights within threshold values, close monitoring will follow to ensure that the grazing use levels are not exceeded

during the grazing period following the management changes. If utilization levels are exceeded or expected to be exceeded during this period, a reduction or curtailment of further grazing in the area represented by the key area will be required for the remainder of the grazing season. In addition, further management changes will be implemented prior to the start of the next grazing season to bring utilization levels within thresholds.

The management options to be implemented to meet this guideline will be determined in full consultation, coordination, and cooperation with affected permittees and other interests.

If reductions in permitted use are required

Any reductions in permitted use required as a result of implementing this guideline will be held in suspension and apportioned back to the permittee(s) or lessee(s) authorized to graze in the affected allotment if rangeland health improves to the extent that the authorized officer determines additional forage to be available (see Implementation, Appendix 1, for more information on this).

Guideline 17: Rangeland monitoring to determine utilization of forage resources and trend of rangeland health will be conducted in each allotment based on current accepted practices and techniques as directed in the Interagency Technical References: *Utilization Studies and Residual Measurements* (BLM et al. 1996b) and *Sampling Vegetation Attributes* (BLM et al. 1996a). Monitoring methodologies will be applicable to local conditions and developed in consultation with permittees and interested publics. To the extent possible, monitoring methods will be simple and easily accomplished. BLM, permittees, or others will do the monitoring. BLM will be responsible for ensuring that the monitoring is conducted in accordance with currently accepted practices and techniques, for analyzing and interpreting the data collected (in consultation, coordination, and cooperation with affected permittees and other interests), and for the accuracy of the data.

Existing key areas will be used where they exist. New key areas will be selected in full consultation, coordination, and cooperation with affected permittees and other interests. BLM will periodically review established key areas to determine if they continue to be appropriate to management. This review will be done in full consultation, coordination, and cooperation with affected permittees and other interests. If there is disagreement between BLM, permittees, and other interests over the location of key areas, the RAC will be asked for ideas on resolution. The final decision on the placement of key areas, however, rests with BLM.

BLM, in cooperation with other agencies, including Cooperative Extension, the Natural Resources Conservation Service, and the Forest Service, will provide training for permittees and other interested parties on rangeland monitoring methods.



Appendix D: Road and Maintenance Class Descriptions





Appendix D: Road Classification and Maintenance Level Descriptions

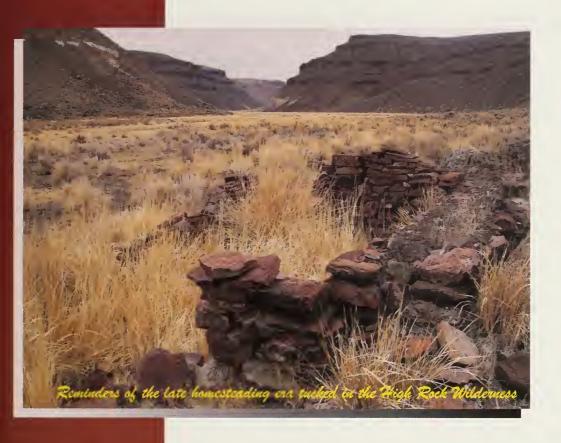
Level	Description
1	This level of maintenance entails only the most basic custodial care completed on an intermittent basis involving minimal equipment, time or investment. Roads are normally blocked/not open for traffic or are open only for restricted traffic. Primitive roads or "ways" are included here. Roads were typically constructed as fire trails, access to discontinued use administrative areas, discontinued use to energy/mineral exploration or development areas. Level 1 roads receive no annual maintenance. Any culverts, waterbars or other drainage facilities will be maintained. Slides, fallen trees and brush would be left unless they affect roadbed drainage.
2	This level of maintenance is used on roads where management requires the road to be opened seasonally for limited passage of traffic. Maintenance standard is minimum, including brush/obstruction removal, maintenance of drainage facilities and maintenance of the road prism. "Resource Road" Functional Classification fits this maintenance level.
3	This level of maintenance includes work needed to maintain the road primarily for seasonal use or occasionally open year round. Roads at this level will typically be low volume, single lane, low standard, native surface roads typical of a "resource" road to service low use recreation areas or other resource uses. Maintenance would include keeping drainage structures functional and maintenance of the road prism. Sight distance, driver safety and minimal road signage would be included in this level. "Resource Road/Local Road" fits this maintenance level.
4	This level of maintenance includes the work necessary to maintain year-round, high seasonal use with high concern for driver safety and convenience. Roads may be two lane, high standard native, aggregate or bituminous surfacing with medium volume. Preventative maintenance is done on an established schedule; problems are repaired as soon as discovered. "Local Road/Collector Road" fits this maintenance level.
5	Level 5 roads are designed for high volumes of traffic (15-100 average daily traffic), designed speeds up to 55 mph. These roads include design features important to safety and comfort. Roads will have preventative maintenance performed on an established schedule. "Collector Road" fits this maintenance level.

Functional Road Classification Types:

Collector Roads (Level 4 or 5) – These bureau roads normally provide primary access to large blocks of land and connect with or are extensions of a public road system. They accommodate mixed traffic and serve many uses. They generally receive the highest volume of traffic of all roads in the bureau road system. User cost, safety, comfort and travel time are primary road management considerations. Collector roads usually require application of the highest standards used by the bureau.

<u>Local Roads (Level 4 or 3)</u> – These bureau roads normally serve a smaller area than collectors and connect to collectors or public road systems. Local roads receive lower volumes, carry fewer traffic types and generally serve fewer users. User cost, comfort and travel time are secondary to construction and maintenance cost considerations. Low volume local roads in mountainous terrain, where operating speed is reduced by effort of terrain, may be single lane roads with turnouts. Environmental impacts are reduced as steeper grades, sharper curves and lower design speeds than would be permissible on collector roads are allowable.

Resource Roads (Level 2) — These bureau roads are spur roads that provide point access and connect to local or collector roads. They carry very low volume and accommodate only one or two types of use. Use restrictions are applied to prevent conflicts between users needing the road and users attracted to the road. The location and design of these roads are governed by environmental compatibility and minimizing bureau costs with minimal consideration for user cost, comfort or travel time.



Appendix E: Emigrant Trail Inventory Classes





Appendix E: Emigrant Trail Inventory Classes

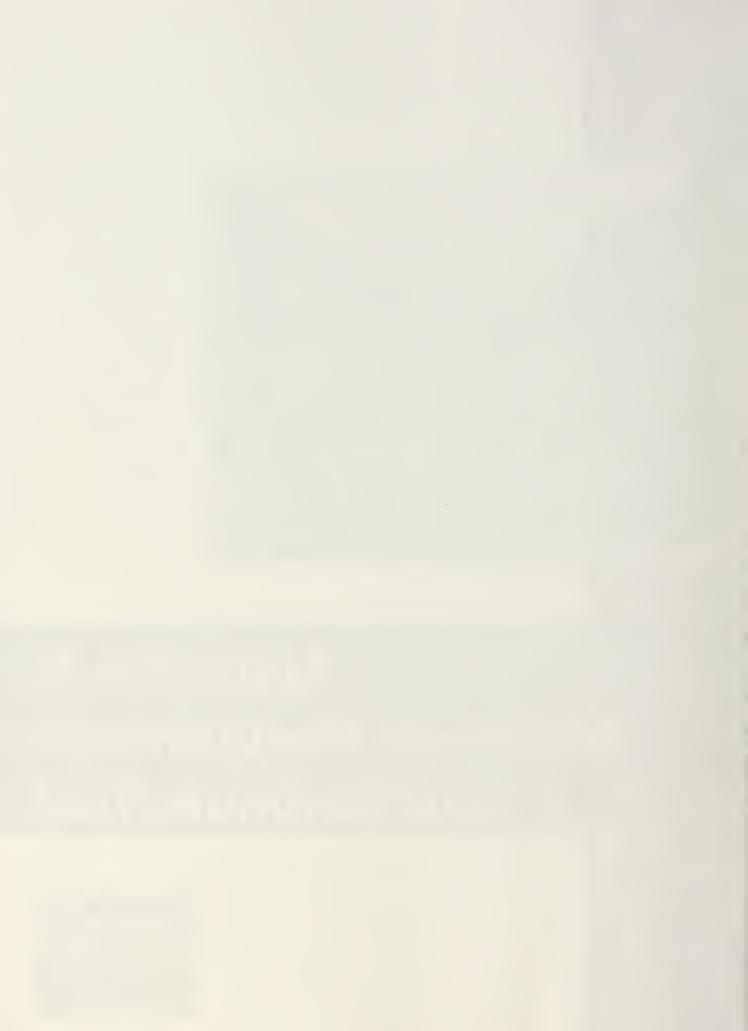
Trail Class	Description
Class A (OCTA Class 1) Trail Ruts	Pristine trail ruts and swales.
Class B (OCTA Class 3) Trail Ruts	Trail route confirmed through artifacts, rust stains, topography, etc. May include short segments of trail converted into 2-track roads where continued use of these roads would result in damage to pristine trail segments.
Class C (OCTA Class 2) Trail Ruts	Trail used as 2-track road, no improvements.
Class D (OCTA Class 4) Trail Ruts	Trail converted into improved road.
Class E (OCTA Class 5) Trail Ruts	Approximate trail route, all traces destroyed by man made or natural processes.
Trail Sites	Inscriptions, campsites, graves, etc. associated with emigrant trail traffic.

This Page Intentionally Left Blank



Appendix F: Minimum Requirement and Minimum Tool





Appendix F: Explanation of Minimum Requirement and Minimum Tool

Wilderness managers often speak of "minimum required" or "minimum tool". The terms are shorthand for the provisions found in section 4(c) of the Wilderness Act.

Section 4 (c) of the Act prohibits certain activities in wilderness by the public and, at the same time, allows the agencies to engage in those activities in some situations. Section 4 (c) states:

"... except as necessary to meet minimum requirements for the administration of the area for the purpose of this Act (including measures required in emergencies involving the health and safety of persons within the area), there shall be no temporary road, no use of motor vehicles, motorized equipment or motorboats, no landing of aircraft, no other form of mechanical transport, and no structure or installation within any such area."

In the above language, Congress acknowledged that even though certain activities are prohibited, there are times when exceptions to these prohibitions will need to be made for administration of the area. However, from the regulations, special orders, and internal agency policy, it is clear that the wilderness management agencies should not view the language in Section 4 (c) as blanket approval to conduct projects or allow activities without an analysis of (1) whether the project or activity is necessary to meet the minimum requirements for the administration of the area, and (2) which tool or method should be used to complete the project that results in the least impact to the physical resource or wilderness values.

Agency employees entrusted with management of wilderness should set the highest standard possible when reviewing management practices in wilderness. Wilderness is intended to be managed differently from other public lands and this difference needs to be demonstrated to the public.

The minimum requirement analysis is used to determine what is the least impacting way of administering the wilderness. The wilderness manager may authorize any of the generally prohibited activities or uses listed in Sec. 4(c) of the Wilderness Act if they are determined to be the minimum necessary to do the job and meet wilderness management objectives.

When conducting the actual minimum requirement analysis wilderness managers generally follow these steps:

- 1. Complete a minimum requirement analysis, for all proposed projects or activities. This step should not be used to justify use of motorized equipment or mechanical transport, but rather, to scrutinize the project or activity and make the best decision for wilderness in the long term. To determine if the proposal truly is required for the administration of the wilderness area, managers need to answer the following questions:
 - a. Is there an emergency?
 - b. Does the project conflict with stated wilderness goals, objectives and desired future conditions of applicable legislation, policy, and management plans?
 - c. Are there any less intrusive actions that should be tried first?
 - d. Can this project be accomplished outside of wilderness and still meet it's objectives?
 - e. Is the project subject to valid existing rights?
 - f. Is there a special provision in the enabling legislation that allows for the proposal?
 - g. How does the proposal benefit wilderness as a whole?
 - h. If this project were not completed, how would the wilderness characteristics of naturalness, solitude, primitive recreation and special features be impacted?
 - i. How would the project ensure that human presence is kept to a minimum?
 - j. How would the project ensure that the wilderness provides opportunities for solitude or primitive recreation?

- k. How did you consider wilderness values over convenience, comfort, political, economic or commercial values while evaluating this project or activity?
- 2. If after completing step one, the proposal is found to be the minimum required action for administration of the area as wilderness, the wilderness manager needs to complete a minimum tool analysis. The minimum tool analysis is used to determine which method of implementing the proposal would have the least impact on the wilderness resource while still allowing the project to be completed safely and successfully. Generally at least three alternatives are evaluated in the minimum tool analysis; an alternative using non-motorized, non-mechanized equipment, an alternative using motorized and/or mechanized equipment, and one alterative using a combination of the methods. Impacts to naturalness, solitude, primitive recreation and special features are evaluated for each alternative. That method that has the least impact on the wilderness resource and allows the project to be successful is determined to be the minimum tool.

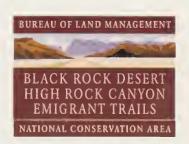
If the analysis shows a justifiable need for motorized equipment, it is important to have this analysis in writing to provide to the official(s) who can authorize the use of mechanical transport or motorized equipment in wilderness. For some units, this analysis may become an integral part of an environmental analysis required to document a decision to use motorized equipment.

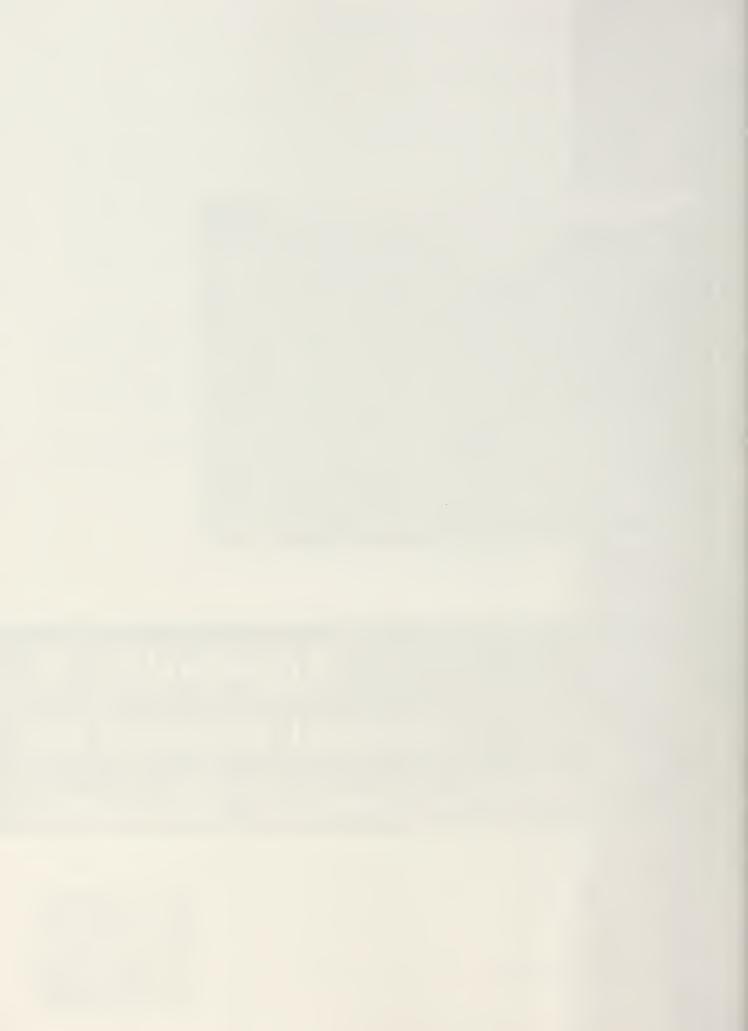
Ongoing management practices, especially if they involve mechanical transport, motorized equipment, or structures, should be reviewed to determine if they are still necessary or the best way to complete the task at hand.

The Wilderness Management Plan, to be prepared after the RMP, will contain minimum required and minimum tool analysis for specific management actions dealing with wildlife, grazing operations, fire suppression and other resources in the wilderness areas.



Appendix G: Visual Resource Management Classes





Appendix G: Visual Resource Management Class Descriptions

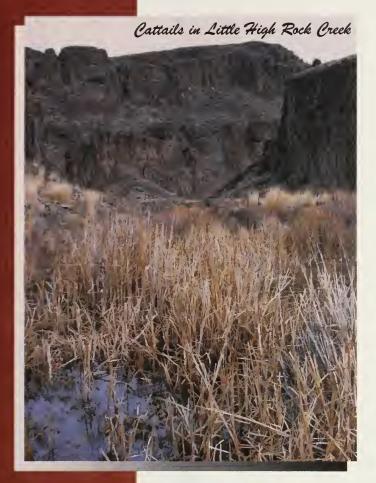
The Visual Resource Management process is divided into two stages- inventory and analysis. Inventory is the stage associated with Resource Management Planning, while the analysis stage is used primarily to determine if proposed actions are appropriate to a visual resource management class assigned through a resource management plan.

The inventory stage involves identifying the visual resources of an area and assigning them to inventory classes using BLM's visual resource inventory process. The process involves rating the visual appeal of a tract of land, measuring public concern for scenic quality, and determining whether the tract of land is visible from travel routes or observation points. The process is described in detail in BLM Handbook H-8410-1, Visual Resource Inventory. The results of the visual resource inventory become an important component of BLM's Resource Management Plan (RMP) for the area. Visual values are considered throughout the RMP process, and the area's visual resources are then assigned to the following management classes:

- Class I To preserve the existing character of the landscape. This class provides for natural ecological changes; however, it does not preclude very limited management activity. The level of change to the characteristic landscape should be very low and must not attract attention.
- Class II To retain the existing character of the landscape. The level of change to the characteristic landscape should be low. Management activities may be seen, but should not attract the attention of the casual observer. Any changes must repeat the basic elements of form, line, color, and texture found in the predominant natural features of the characteristic landscape.
- Class III 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.
- Class IV To provide for management activities that require major modification of the existing character of the landscape. The level of change to the characteristic landscape can be high. These management activities may dominate the view and be the major focus of viewer attention. However, every attempt should be made to minimize the impact of these activities through careful location, mini-mal disturbance and repeating the basic landscape elements.

The analysis stage involves determining whether the potential visual impacts from proposed surface-disturbing activities or developments will meet the management objectives established for the area, or whether design adjustments will be required. A visual contrast rating process is used for this analysis, which involves comparing the project features with the major features in the existing landscape using the basic design elements of form, line, color, and texture. This process is described in BLM Handbook H-8431-1, Visual Resource Contrast Rating. The analysis can then be used as a guide for resolving visual impacts. Once every attempt is made to reduce visual impacts, BLM managers can decide whether to accept or deny project proposals. Managers also have the option of attaching additional mitigation stipulations to bring the proposal into compliance.





Appendix H: Existing Land Use Plan Decisions





Appendix H: Existing Land Use Plan Decisions Applicable to the **No Action Alternative**

Table 1. Transportation and OHV Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
Designate the Playa of the Black Rock Desert as a limited OHV use area. Allow no organized or competitive off-road Ensure legal access vehicle use that would permanently BLM roads, wh detract from the natural character of the management plans. Playa as determined by the authorized officer.	Ensure legal access to public lands on all BLM roads, when consistent with management plans.	Restrict vehicle use to existing roads and trails.	Designate the Playa of the Black Rock Desert as a limited OHV use area. Allow no organized or competitive off-road Ensure legal access to public lands on all Restrict vehicle use that would permanently BLM roads, when consistent with detract from the natural character of the management plans. Playa as determined by the authorized officer.
Add the following areas to the list of transportation or utility facilities will be places closed to OHV use: All public located within a designated corridor lands in WSAs other than existing ways bounded ½ mile north and 2-3/4 miles and trails. South of the railroad tracks. Only underground utility facilities will be located north of the railroad tracks.	In the vicinity of the Black Rock Desert Playa from Sulphur to Gerlach, transportation or utility facilities will be located within a designated corridor bounded 1/4 mile north and 2-3/4 miles south of the railroad tracks. Only underground utility facilities will be located north of the railroad tracks.		Prohibit vehicular travel through High Rock Canyon during the courtship and incubation period of raptors (Feb. 15 to Mar. 31) and during or immediately following periods of wet weather. Encourage travel on improved county roads during these periods.
The Sonoma-Gerlach Resource Area is ranges identified in the plan will be exceptions listed in the MFP.	Area is specific ranges identified in the plan will be permitted only when no feasible alternative is available.		

Table 1. Transportation and OHV Decisions from the MFPs and Activity Plans (cont'd)

Cowhead-Massacre MFP					
Tuledad-Homecamp MFP					
Paradise-Denio MFP	Reduce flood and sediment damage caused by roads or trails through an active maintenance program. On BLM As re-introductions of bighorn sheep are roads this would include water barring, made, limit off-road vehicle use during spur ditching, and/or installing culverts. the lambing season in bighorn sheep use on non-BLM roads and rights-of-way, areas.	Minimize access to potential bighorn sheep range by limiting new trail and road construction.	Retain in public ownership those lands that provide access to the Humboldt and Little Humboldt Rivers and other lands that adjoin these rivers.	Review all proposed disposals of public Review all proposed disposals of public lands and retain any legal access required lands and retain any legal access required to remaining public lands.	Provide legal access to public lands located in the checkerboard region and those isolated tracts or parcels bordering agriculturally developed lands.
Sonoma-Gerlach MFP	Reduce flood and sediment damage caused by roads or trails through an active maintenance program. On BLM As re-introductions of bighorn sheep are roads this would include water barring, made, limit off-road vehicle use during spur ditching, and/or installing culverts. the lambing season in bighorn sheep use. On non-BLM roads and rights-of-way, areas. require stipulations to accomplish these objectives.	Sage-grouse strutting grounds and associated use areas must be given consideration and protection in the planning and permitting of roads.	Retain in public ownership those lands Retain in public that provide access to the Humboldt and that provide acce Little Humboldt Rivers and other lands Little Humboldt that adjoin these rivers.	Review all proposed disposals of public Review all proposed disposals of public lands and retain any legal access required to remaining public lands.	

Table 2. Cultural Resources Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Cowhead-Massacre MFP
When evaluation of a site listed in MFP I proves that interpretation is warranted, establish an interpretive program for that site. Maintain fire protection for those sites that have significant values.	When evaluation of a site listed in MFP I proves that Preserve significant Basque aspen carvings through fire resources sites with National Historic Register interpretation is warranted, establish an interpretive protection, photo documentation, rubbing or other qualities, then remedial management action (i.e., herd program for that site. Maintain fire protection for those means. Consider donating some to the Nevada State reduction, removal, or relocation through fencing, etc.) will be taken to protect sites that are being degraded.	If wild horses cause significant impacts on cultural resources sites with National Historic Register qualities, then remedial management action (i.e., herd reduction, removal, or relocation through fencing, etc.) will be taken to protect sites that are being degraded.
Preserve significant Basque aspen carvings by Isolated historic structures will be evaluated prior to protecting carved trees from fire and cutting, or by destruction to determine which should be left intact and mitigating unavoidable damage.	by Isolated historic structures will be evaluated prior to by destruction to determine which should be left intact and which should be destroyed.	
Consider historical sites in the development of the District Fire Management Plan and determine those sites that warrant preservation.		
Line shacks, mine cabins and other isolated historic structures will be evaluated prior to destruction to determine which should be left intact and which should be destroyed.		
Physical deterioration of important sites will be arrested through fencing, protective overburden, riprap, and other appropriate measures.		
Protective signs using positive wording will be posted at sites.		
Ensure that cultural resources surveys are completed prior to any new surface disturbing activities or transfers of land from public ownership.		
Encourage mining and other interests to work with BLM to mitigate possible adverse environmental impacts to cultural resources.		

Table 3. Range Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP Cowhead-I	Cowhead-Massacre MFP
Base herbivore grazing levels will be Base herbivore determined by allotment.		grazing levels will be after completion of further small-scale determined by monitoring, allocation will lotment. Consider levels will be after completion of further small-scale determined by monitoring, allocation will lotment. Provide forage for both consumptive and non-sheep, wild horses, and cattle. As sheep, wild horses, and cattle. As piloting to assess the success of be made to cattle, wildlife, and non-identified techniques. High-Rock Canyon. Allocations will only be made to wildlife and non-consumptive uses for the canyon bottoms and east of the canyon.	Provide forage for both consumptive and non-consumptive resources, including mule deer, pronghorn antelope, bighorn sheep, wild horses, and cattle. As additional forage becomes available as determined by monitoring, allocation will be made to cattle, wildlife, and nonconsumptive uses for the area west of High-Rock Canyon. Allocations will only be made to wildlife and nonconsumptive uses for the canyon bottoms and east of the canyon.
Make season of use data available to Coordinated Resource Management Plan Domestic horse (CRMP) groups so that they can use this such animals we information in the development of plans with wild horses using the CRMP process.	Domestic horse use in those areas where such animals would be expected to mix with wild horses is disallowed.	Make season of use data available to Coordinated Resource Management Plan Domestic horse use in those areas where to meet wildlife habitat objectives or No cancellation of livestock would occur (CRMP) groups so that they can use this such animals would be expected to mix other multiple use objectives. to provide buffer zones to prevent Subsequent forage increases should be disease transmission to bighorn sheep. allocated to meet all demands.	tion of livestock would occur buffer zones to prevent smission to bighorn sheep.
Develop and implement intensive grazing management systems on allotments.	and implement intensive All grazing management systems management systems (AMPs) will be revised as needed.	Designate the intensive live Massacre Locanyon, and	Designate the following allotments for intensive livestock grazing management: Massacre Lakes, Nut Mountain, Wall Canyon, and Massacre Mountain.
Allow for conversion from cattle to Establish periods of use for each sheep on all allotments within the allotment basing management on the resource area except where conflicts with physiological requirements of key bighorn sheep occur.	Establish periods of use for each allotment basing management on the physiological requirements of key species.		Establish moderate use on grasses and light utilization on bitterbrush as the upper limits for livestock use in Subunit 2.
Combine economic control of insect allow complete conversion of cattle to infestation on public lands when proper sheep use, or a combination of sheep and range management procedures are cattle use for all allotments.	Allow complete conversion of cattle to sheep use, or a combination of sheep and cattle use for all allotments.		

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
Provide a quantity and quality of water adequate to maintain livestock requirements through: notification to the Control insect State of livestock requirements, filing land. with the State where appropriate, or by purchase of adjudicated water rights.	Control insect infestations on public land.		
Increase existing forage by artificial methods when appropriate.	Increase existing forage by artificial requirements through: notification to the State of livestock requirements, filing with the State where appropriate, or by purchase of adjudicated water rights.		
Through land disposal or exchange, transfer the title of public lands identified for disposal in the Management Framework Plan.	Through land disposal or exchange, transfer the title of public lands identified Manage, maintain and improve rangeland for disposal in the Management conditions on the public lands.		
	Increase existing allocable livestock forage artificially by seeding, controlling brush and developing water.		
	Implement an ear-tagging program.		
	Improve and strengthen range the studies program.		

Table 4. Wild Horse and Burro (WHB) Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
Establish wild horse and burro numbers by herd use area.	Establish wild horse and burro numbers by herd use area on non-checkerboard lands.	Maintain and protect a viable, self-sustaining population of wild horses in the Tuledad-Homecamp planning area.	Establish wild horse and burro numbers by herd use area on non-checkerboard sustaining population of wild horses area. Establish wild horse and burro numbers Maintain and protect a viable, self-lands. Establish wild horse and burro numbers Maintain and protect a viable, self-lands area. Establish wild horse and burro numbers Maintain and protect a viable, self-lands significant impacts on these sites, the Tuledad-Homecamp planning area. Register qualities. If wild horses do cause significant impacts on these sites, then remedial management action (i.e., herd reduction, removal, or relocation through fencing, etc.) will be taken to protect sites that are being degraded.
Remove wild horses and burros from the checkerboard HUAs listed in the Sonoma-Gerlach MFP unless a Manage cooperative agreement providing for the occurred retention and protection of wild horses 12/15/71. and burros is consummated with the affected private landowner(s).	Manage and protect WHBs where they occurred on non-checkerboard lands on 12/15/71.	checkerboard HUAs listed in the Sonoma-Gerlach MFP unless a Manage and protect WHBs where they Protect and maintain the appropriate Herd Management Accoperative agreement providing for the occurred on non-checkerboard lands on management level of horses for the Fox- Sagehen Allotment. Hog Mountain Herd Management Area. Appropriate managemen and burros is consummated with the affected private landowner(s).	checkerboard HUAs listed in the Sonoma-Gerlach MFP unless a Manage and protect WHBs where they Protect and maintain the appropriate Herd Management Area to include cooperative agreement providing for the occurred on non-checkerboard lands on management level of horses for the Fox- Sagehen Allotment. Maintain retention and protection of wild horses 12/15/71. Hog Mountain Herd Management Area. appropriate management level (AML) of horses in the Massacre Lakes HMA. affected private landowner(s).
Permit domestic horses and burros only in areas where such domestic animals Remove all wild horwould not be expected to mix with checkerboard HUAs. populations of wild horses or burros.	Remove all wild horses and burros from checkerboard HUAs.	horses and burros from Consider horse use areas when fencing.	
Acquire sufficient water on public lands through permit, adjudication, or purchase processes as provided by federal and State water law or other appropriate Provide sufficient water o direction to support the uses of the public for wild horses and burros. lands by wild horses, wildlife, and livestock, and for aquatic habitat and recreation.	Provide sufficient water on public lands for wild horses and burros.	Acquire sufficient water on public lands through permit, adjudication, or purchase processes as provided by federal and State water law or other appropriate Provide sufficient water on public lands Conduct routine inventories of existing direction to support the uses of the public for wild horses and burros. Investor, and for aquatic habitat and recreation.	

Appendix H: Existing Land Use Plan Decisions Applicable to the No Action Alternative

Table 4. Wild Horse and Burro (WHB) Decisions from the MFPs and Activity Plans (cont'd)

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
	Permit domestic horses and burros only		
	in areas where such domestic animals		
	would not be expected to mix with		
	populations of wild horses or burros.		

Table 5. Fish and Wildlife Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
Manage range conditions to allow existing big game populations to reach reasonable numbers. Monitor condition management species in activity plans. habitat is available.	ical	Strive to meet a ratio of grass to brush consistent with site potential.	Threatened and Endangered species survey and clearance will be required for each project site before construction (Endangered Species Act).
WL 1.4a-1.4b – The primary management objective for the following area is to provide recrucial wildlife habitat made, limit off-road vehicle use during for mule deer and bighom sheep. The lambing season in bighorn sheep use is considered areas. Exclude vegetative manipulations within complex and east to the Winnemucca and bighorn sheep use prairie falcon eyrie. Exclude vegetative manipulations within complex and east to the Winnemucca and bighorn sheep. Provide habitat in the High Rock Canyon complex and east to the Winnemucca prairie falcon eyrie.	As re-introductions of bighorn sheep are made, limit off-road vehicle use during the lambing season in bighorn sheep use areas.	Exclude vegetative manipulations within a 3-mile radius of any eagle, peregrine or prairie falcon eyrie.	Provide habitat in the High Rock Canyon complex and east to the Winnemucca District Boundary for the reintroduction of bighorn sheep.
WL 1.5a – Designate a 307.22-acre parcel surrounding the hot springs located in T40N, R24E, Sec. 23, as an All activity p Area of Critical Environmental Concern measures to pro (ACEC). The hot springs in this area areas and waters. contain habitat for the Soldier Meadows desert dace.	lans will implement tect important wildlife	Management systems should be designed to improve riparian vegetation throughout the unit. Fence areas where management is unable to improve riparian habitat.	Ensure that sufficient browse is available to support reasonable numbers of deer.
WL 1.7 – In allotments designated for grazing system development, the forage needs of wildlife will be estimated within Preserve the existing acres of mahogany, maximize vegetative cover in accordance to support reasonable numbers of antelope. WE 1.7 – In allotments designated for grazing system development, the forage numbers of mahogany, maximize vegetative cover in accordance to support reasonable numbers of antelope.	Preserve the existing acres of mahogany, and limber and whitebark pine.	Maximize vegetative cover in accordance with site potential.	Provide habitat in satisfactory condition to support reasonable numbers of antelope.

WL 1.9 – In the design, implementation,	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
or revision of grazing management systems, plans for horse management areas or horse use areas, consider aspen and and mahogany as a "critical" mits to benefit management objectives will be established for these critical species and these objectives will be incorporated in Activity plans developed within the area.	et e	All reservoirs should be designed to fence water catchment provide cover, food and water for nonit a variety of wildlife game birds by retaining or developing varying heights and densities of vegetation.	
WL 1.10 – Management objectives of activity plans (AMPs, Herd Management Areas (HMAs), etc.) will include specific objectives pertaining to improving and maintaining desired riparian areas and Rings River Valley. activity plans, meadows and riparian areas will be considered as critical areas.	WL 1.10 – Management objectives of activity plans (AMPs, Herd Management Areas (HMAs), etc.) will include specific objectives pertaining to improving and positional areas and meadow habitat. In the development of meadow habitat. In the development of activity plans, meadows and riparian areas will be considered as critical areas.	WL 1.10 – Management objectives of activity plans (AMPs, Herd Management objectives of an activity plans (AMPs, Herd Management Areas (HMAs), etc.) will include specific objectives pertaining to improving and Quinn River Lakes at the south end of suitability for wells on a case-by-case meadow habitat. In the development of meadow habitat. In the development of activity plans, meadows and riparian areas will be considered as critical areas.	
WL 1.11 – Protect sage-grouse strutting grounds and give proper consideration to other sage-grouse habitat by accepting as guidance NDOW Guidelines for Vegetal Control Programs in Sage Grouse Habitat in Nevada. NDOW must be given a minimum of two years notice of any proposed large-scale vegetal manipulations in order that it might Uses involvi inventory the area for sage-grouse use, will not be a and thus provide appropriate input. In be mitigated addition, sage-grouse strutting grounds and associated use areas must be given similar consideration and protection in the planning and permitting of other types of projects and uses (fences, pipelines, roads, gravel pits, rock gathering, power line rights-of-way, land exchanges, mining, mineral leasing, etc.).	WL 1.11 – Protect sage-grouse strutting grounds and give proper consideration to other sage-grouse habitat by accepting as guidance NDOW Guidelines for Vegetal Control Programs in Sage Grouse Habitat in Nevada. NDOW must be given a minimum of two years notice of any proposed large-scale vegetal manipulations in order that it might Uses involving crucial wildlife use areas Decide upor inventory the area for sage-grouse use, will not be authorized if conflicts cannot site-specific and thus provide appropriate input. In be mitigated. addition, sage-grouse strutting grounds and associated use areas must be given similar consideration and protection in the planning and permitting of other types of projects and uses (fences, pipelines, roads, gravel pits, rock gathering, power line rights-of-way, land exchanges, mining, mineral leasing, etc.)	WL 1.11 – Protect sage-grouse strutting grounds and give proper consideration to other sage-grouse habitat by accepting as guidance NDOW Guidelines for Vegetal Control Programs in Sage Grouse Habitat in Nevada. NDOW must be given a minimum of two years notice of any proposed large-scale vegetal manipulations in order that it might Uses involving crucial wildlife use areas Decide upon treatment of meadows on a minimum of two years notice of any manipulations in order that it might Uses involving crucial wildlife use areas Decide upon treatment of meadows on a minimum of two sage-grouse use, will not be authorized if conflicts cannot site-specific basis; fence where and thus provide appropriate input. In be mitigated. addition, sage-grouse strutting grounds and associated use areas must be given similar consideration and protection in the planning and permitting of other types of projects and uses (fences, pipelines, roads, gravel pits, rock gathering, power line rights-of-way, land exchanges, mining, mineral leasing, etc.).	

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
WL 1.12 – Preserve broadleaf woodland habitat in the entire resource area by Restrict the us responding quickly in fire situations secondary killing where non-coniferous woodlands are lands.		effects on the public areas when sheep are introduced.	
WL 1.13 – Provide water for wildlife at existing water sources by adhering to Modify existing multiple use principles in maintenance, alter wildlife use and development of water sources on passage. public land in the Sonoma-Gerlach area.	Modify existing fences that restrict or allow bassage.		
Coordinate development of new Habitat Management Plans (HMPs) and revision Minimize access of existing deficient ones, so that HMP sheep range by completion coincides with completion of road construction.	Minimize access to potential bighorn heep range by limiting new trail and oad construction.		
Retain in public ownership all public habitats containing valuable wildlife habitat, as determined by appropriate BLM personnel at the time of disposal maintain and improve habitats for proposals, unless it is determined that sensitive, protected, and Threatened and such land, because of its location or other Endangered species listed by USF,WS characteristics is difficult and BLM, and the State of Nevada. uneconomical to manage as part of the public lands or there is a higher and better use.	Retain in public ownership all public lands containing valuable wildlife habitat, as determined by appropriate BLM personnel at the time of disposal Maintain and improve habitats for proposals, unless it is determined that sensitive, protected, and Threatened and such land, because of its location or other Endangered species listed by USFWS, characteristics is difficult and BLM, and the State of Nevada. uneconomical to manage as part of the public lands or there is a higher and better use.		
As sites are identified or need or opportunity arise, acquire by exchange or other means those private lands intermingled with public lands that contain high resource values within the Lahontan Cutthroat Trout Natural Area (now the LCT WSA).	As sites are identified or need or opportunity arise, acquire by exchange or other means those private lands intermingled with public lands that contain high resource values within the Lahontan Cutthroat Trout Natural Area (now the LCT WSA).		

	Table 5. Fish and Wildlife Decisions from the MFPs and Activity Plans (cont'd)	the MFPs and Activity Plans (cont	(p,
noma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
	Acquire or otherwise provide sufficient water for multiple uses on public lands.		
	Ensure that waterfowl habitats are adequately addressed in the development of activity plans.		

Table 6. Water Resources Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP
Prohibit BLM and BLM-authorized activities from degrading water quality beyond established standards Planning for streams under multiple owne as specified in the Nev. Water Pollution Control accomplished using cooperative planning. Regulations of 1978.	Prohibit BLM and BLM-authorized activities from degrading water quality beyond established standards Planning for streams under multiple ownerships will be Implement livestock management plans that restore as specified in the Nev. Water Pollution Control accomplished using cooperative planning. Regulations of 1978.	Implement livestock management plans that restore vegetation to site potential
Acquire or provide sufficient water on public lands through permit, adjudication or purchase processes as provided by Federal and State Water Law.	Acquire or provide sufficient water on public lands Acquire by exchange or other means those private through permit, adjudication or purchase processes as lands that support or have the potential to support a provided by Federal and State Water Law.	Implement an effective grazing system using livestock, horses, sheep, deer and antelope with rest provided in order to: • Allow plants opportunity to make and store food to restore vigor • Allow seed to ripen • Allow seedlings to become established • Allow litter to accumulate between plants
Carefully consider land treatments, prohibit disturbance activities, and consider denying land disposals which would result in significant reduction (50% or more) in the amount of vegetative cover in areas designated as Whaving "high" erosion susceptibility or "high" vegetal (N soil factor, unless such treatments or disturbance and to the potential accelerating soil loss can be adequately mitigated through proper management or application of Best Management Practices.	Carefully consider land treatments, prohibit disturbance activities, and consider denying land disposals which would result in significant reduction (50% or more) in the amount of vegetative cover in areas designated as Work cooperatively with Nevada Division of Wildlife Select species of plants considering all other species having "high" erosion susceptibility or "high" vegetal (NDOW) and private landowners to eliminate hazards growth requirements and then manage to achieve site soil factor, unless such treatments or disturbance and to fish from existing and future stream diversions. The potential accelerating soil loss can be adequately mitigated through proper management or application of mitigated through practices.	Select species of plants considering all other species growth requirements and then manage to achieve site potential.
Reduce flood and sediment damage caused by roads or trails through an active maintenance program. On BLM roads this would include water barring, spur Continue to n ditching, and/or installing culverts. On non-BLM roads and reservoirs, and rights-of-way, require stipulations to accomplish these objectives.	nonitor water quality of streams, lakes,	Implement water monitoring stations to analyze water quality for compliance with federal, State and local regulations.
Consider the use of prescribed burning to eliminate big sagebrush overstory and enhance the understory Recognize water rights needed to ensure that fisher vegetation on big sagebrush sites identified as having habitat is protected and work with NDOW and the potential to improve desirable watershed cover State Water Engineer to accomplish this protection. through vegetation manipulation.	Consider the use of prescribed burning to eliminate big sagebrush overstory and enhance the understory Recognize water rights needed to ensure that fisheries Work with County Agriculture Commissioners to vegetation on big sagebrush sites identified as having habitat is protected and work with NDOW and the identify noxious weed areas and assist with their the potential to improve desirable watershed cover State Water Engineer to accomplish this protection.	Work with County Agriculture Commissioners to identify noxious weed areas and assist with their control.

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP
Protect "high" erosion susceptibility areas from accelerated erosion.	Protect "high" erosion susceptibility areas from Paradise-Denio Resource Area's streams, lakes or accelerated erosion. Protect "high" erosion susceptibility areas from Paradise-Denio Resource Area's streams, lakes or proper management before expending large sums of mitigated.	mprove upper watershed and meadow healing through roper management before expending large sums of noney for structures.
Prevent BLM and BLM-authorized activities from degrading air quality beyond established standards as specified in the Nevada ambient Air Quality Standards.	J.	To control erosion issue slips with stipulations to minimize disturbance.
Through a coordinated planning approach, develop a habitat management plan for each stream within each grazing allotment in the resource area.		
Through a coordinated planning process, ensure that fish habitat factors (bank stability, siltation of pools and spawning gravels) are included as objectives in each Allotment Management Plan (AMP) that contains fishable streams.		
Whenever practicable all reservoirs constructed on public land that have fisheries potential will be fenced, and the water piped to a tank for livestock use. Any new irrigation reservoirs on public land will have a minimum pool requirement established. The same will apply on existing reservoirs when opportunities arise. This will be coordinated with other affected individuals, permittees, or agencies in advance, including NDOW.		
Encourage mining and other interests to work with BLM to mitigate possible adverse environmental impacts.		
Acquire or otherwise provide sufficient water on public lands (through permit, adjudication or purchase processes as provided by federal and State water law and/or other appropriate direction) to support use of public lands by wild horses, wildlife, and livestock, and for aquatic habitat and recreation.		

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP
Fire lines will not be constructed by heavy equipment in riparian zones, and fire retardant will not be applied to water.		
BLM initiated actions will not apply herbicides or pesticides directly over the Sonoma-Gerlach area streams, lakes or reservoirs.		

Table 7. Lands and Realty Decisions from the MFPs and Activity Plans

	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
in the MFP in federal ownership unless it has been determined through this land use planning process that disposal is in determined through the public's interest. Dispose of lands to planning process local government entities under Recreation and Public Purposes Act (R&PP) applications or other appropriate authorities, as the need for such lands is made apparent through community planning documents.		and unless it has been buse that disposal is in the provide for additional power lines that corridors along the existing 750 KV line.	Establish power line right-of-way corridors along the existing 750 KV transmission line.
L 2.4 – As sites are identified and/or need or opportunity arises, acquire by exchange or other means those private lands intermingled with public lands that contain high resource values within the Lahontan Cutthroat Trout Natural Area (now the LCT WSA).	L 2.4 – As sites are identified and/or need or opportunity arises, acquire by exchange or other means those private Review all proposed disposals of public archaeological sites, scenic areas and Encourage land tenure adjustments, lands intermingled with public lands that lands and retain any legal access required other high value resources should be where these actions accrue multiple use acquired by exchanging public lands. Lahontan Cutthroat Trout Natural Area (now the LCT WSA).	High value wildlife habitat, archaeological sites, scenic areas and Encourage land to other high value resources should be where these actions acquired by exchanging public lands of benefits to the public less public value.	Encourage land tenure adjustments, where these actions accrue multiple use benefits to the public.
L 4.1 – Designate right-of-way corridors along existing transportation and utility facilities locations with a specified width of 1.5 miles on each side of the existing transportation/ utility facility. Exceptions to this width requirement may be made on a case-by-case basis.	L 4.1 – Designate right-of-way corridors along existing transportation and utility facilities locations with a specified width of 1.5 miles on each side of the existing transportation/ utility facility. Exceptions to this width requirement may be made on a case-by-case basis.		Acquire private lands near Massacre Lakes and in Hanging Rock Canyon, whenever possible.
en frequencies are cisting sites to provide on needs on public	L 4.2 – When frequencies are existing transportation and utility compatible, use existing sites to provide facilities with a specified width of 1.5 for communication needs on public transportation/utility facilities. Exceptions to this width requirement may be made on a case-by-case basis.		

Table 7. Lands and Realty Decisions from the MFPs and Activity Plans (cont'd)

Appendix H: Existing Land Use Plan Decisions Applicable to the No Action Alternative

Table 7. Lands and Realty Decisions from the MFPs and Activity Plans (cont'd)

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP	Cowhead-Massacre MFP
	New communication site development and road construction on the mountain ranges identified in the plan will be permitted only when no feasible alternative is available.		
	Utilize this land use plan to determine the disposition of each trespass in compliance with the policy for unauthorized use approved by the Secretary of the Interior on December 24, 1980.		

Table 8. Recreation Decisions from the MFPs and Activity Plans

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP
Establish easily accessible locations for public viewing Establish an interpretive program and interpretation of wild horses.		Develop hunter camps, with maximum development at the locations shown in the Tuledad-Homecamp MFP.
Acquire or otherwise provide sufficient water on public lands (through permit, adjudication or purchase processes as provided by federal and State water law provide water-based recreation and encourage their and/or other appropriate direction) to support use of public lands by wild horses, wildlife, and livestock, and for aquatic habitat and recreation.	Acquire or otherwise provide sufficient water on public lands (through permit, adjudication or purchase processes as provided by federal and State water law provide water-based recreation and encourage their Do not develop any campgrounds. and/or other appropriate direction) to support use of development public lands by wild horses, wildlife, and livestock, and for aquatic habitat and recreation.	Do not develop any campgrounds.
Priorities should be established for development of Recreation Management Plans. Use the suggested listing in the MFP as a guide for future Recreation Management Plan writing and implementation. Recreation Management Plans would lead to the organized development of an area's recreational values.	Develop Recreation Area Management Plans.	Designate the remainder of the planning unit outside of hunter camps as Restricted for recreation vehicle use.
Line shacks, mine cabins and other isolated historic structures will be evaluated prior to destruction to determine which should be left intact and which should Pre be destroyed. This evaluation will consider the bey qualities that make the structures appeal to a visitor's sense of beauty or sense of curiosity.	Line shacks, mine cabins and other isolated historic structures will be evaluated prior to destruction to determine which should be left intact and which should Prevent BLM activities from degrading water quality Restrict vehicle use to existing roads and trails. be destroyed. This evaluation will consider the beyond established standards. qualities that make the structures appeal to a visitor's sense of beauty or sense of curiosity.	Restrict vehicle use to existing roads and trails.
When evaluation of a site listed in the MFP proves that lands (through permit, adjudication or purchase interpretation is warranted, establish an interpretive processes as provided by federal and State water law program for that site. Maintain fire protection for those and/or other appropriate direction) to support use of sites that have significant values. Paguardian provides and livestock, and for aquatic habitat and recreation.	Acquire or otherwise provide sufficient water on public lands (through permit, adjudication or purchase processes as provided by federal and State water law and/or other appropriate direction) to support use of public lands by wild horses, wildlife, and livestock, and for aquatic habitat and recreation.	
Designate the Playa of the Black Rock Desert as a limited OHV use area. Allow no organized or competitive off-road vehicle use that would through the district. Playa as determined by the authorized officer.	Cooperate in establishing the National Desert Trail through the district.	

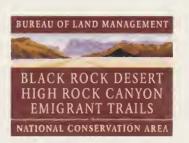
Table 8. Recreation Decisions from the MFPs and Activity Plans (cont'd)

Sonoma-Gerlach MFP	Paradise-Denio MFP	Tuledad-Homecamp MFP
Add the following areas to the list of places closed to OHV use: All public lands in WSAs other than when consistent with management plans.	nsure legal access to public lands on all BLM roads, hen consistent with management plans.	
The Sonoma-Gerlach Resource Area is open to OHV with high recreational value should be analyzed. Parcels use with specific exceptions listed in the MFP. (R&PP).	Prior to disposal of public lands, the recreational value of the proposed parcels should be analyzed. Parcels with high recreational value should not be disposed of unless under Recreation and Public Purposes Act (R&PP).	
Retain in public ownership those lands that provide Retain in public ownership those lands that provide access to the Humboldt and Little Humboldt Rivers and other lands that adjoin these rivers.	Retain in public ownership those lands that provide access to the Humboldt and Little Humboldt Rivers and other lands that adjoin these rivers.	
Cooperate in establishing the National Desert Trail Manage the VRM classes that were identified on through the district.	Manage the VRM classes that were identified on overlays established in 1981.	
Acquire or otherwise provide sufficient water on public lands (through permit, adjudication or purchase Preserve significant Basque aspen carvings through fire processes as provided by federal and State water law protection, photo documentation, rubbing or other and/or other appropriate direction) to support use of means. Consider donating some to the Nevada State public lands by wild horses, wildlife, and livestock, and Museum.	eserve significant Basque aspen carvings through fire otection, photo documentation, rubbing or other eans. Consider donating some to the Nevada State useum.	
Identify and manage the Sonoma-Gerlach Planning Isolated historic structures will be evaluated prior to Area in accordance with the VRM classes listed in the destruction to determine which should be left intact and WFP.	Isolated historic structures will be evaluated prior to destruction to determine which should be left intact and which should be destroyed.	





Appendix I: Cultural, Traditional, and Paleontological Use Categories





Appendix I: Cultural, Traditional, and Paleontological Resource Use Categories

Cultural Resource Use Categories

A. Scientific Use. This category applies to any cultural property determined available for consideration as the subject of scientific or historical study at the present time, using currently available research techniques. Study includes methods that would result in the property's physical alteration or destruction. This category applies almost entirely to prehistoric and historic archaeological properties, where the method of use is generally archaeological excavation, controlled surface collection, and/or controlled recordation (data recovery). Recommendations to allocate individual properties to this use must be based on documentation of the kinds of data the property is thought to contain and the data's importance for pursuing specified research topics. Properties in this category need not be conserved in the face of a research or data recovery (mitigation) proposal that would make adequate and appropriate use of the property's research importance.

Management Direction

Compliance Directives

1. Data recovery rather than avoidance is the preferred option. Data recovery must be accomplished prior to impacts from conflicting uses or natural or human caused deterioration, or is undertaken to ameliorate impacts that have already occurred.

- 1. Resources in this category are available for testing and excavation by qualified researchers operating under valid permits with acceptable research designs. Preference will be given to research proposals emphasizing priorities established in this plan. Resources in this category may be discharged from use or assigned to another category other than Conservation for Future Use once the resource has no further scientific use.
- **B.** Conservation for Future Use. This category is reserved for any unusual cultural property, which, because of scarcity, a research potential that surpasses the current state of the art, singular historic importance, cultural importance, architectural interest, or comparable reasons, is not currently available for consideration as the subject of scientific or historical study that would result in its physical alteration. Cultural resources in this category must be determined eligible for, or listed on, the National Register of Historic Places. A cultural property included in this category is deemed worthy of segregation from all other land or resource uses, including cultural resource uses, that would threaten the maintenance of its present condition or setting, as pertinent, and will remain in this use category until specified provisions are met in the future.

Management Direction

Compliance Directives

- 1. Avoidance is the preferred mitigation measure. Discretionary activities will be denied within boundaries of these resources. The land on which these sites are situated is not available for disposal.
 - a. If avoidance is impossible, then data recovery or other acceptable measures will be allowed after going through the required consultation processes. Since the majority of the plan area is for National Conservation Area and Wilderness, we anticipate that avoidance will be possible in the vast majority of cases with uncontrolled erosion being the most likely cause of data recovery efforts. For many of the sites in this category, the setting will be an important factor of the site's importance and integrity. In these cases, Visual Resource Management (VRM) prescriptions will be implemented to lessen effects, generally by conformance to VRM Class II standards. Other management efforts will also be taken to lessen noise and impacts to atmospheric elements.
 - b. In some instances, such as arbor glyphs (Basque aspen art) threatened by fire or death and decay of the tree, removal of objects or features for curation and display in a museum, visitors' center, or other qualified repository will be acceptable.

Resource Management Directives

- 1. Sites in this category have the highest priority for protection and preservation and will not be available for other current uses, including research or interpretation.
 - a. A resource listed in the Conservation for Future Use category may be placed in another use management category if: (1) BLM identifies the specific criteria underlying this classification (for example, outstanding research potential), (2) the specific reasons for prohibitions or limitations are identified, and (3) BLM identifies or accepts methodological, technological or other criteria that if met or implemented justify alterations to the integrity of the resource and placement in another use category.
- 2. Protective actions may be taken to ensure preservation of those qualities providing the basis for classification. These actions, such as fencing, installation of erosion control structures, road closures, etc., must not impinge on the values and integrity of the site. Resources in this use category will be monitored at least semi-annually to assess potential threats.
- C. <u>Traditional Use</u>. This category is to be applied to any cultural resource known to be perceived by a specified social and/or cultural group as important in maintaining the cultural identity, heritage, or well-being of the group. Cultural properties assigned to this category are to be managed in ways that recognize the importance ascribed to them and seek to accommodate their continuing traditional use.

Management Direction

Compliance Directives

1. Avoidance is the preferred treatment.

2. If avoidance is impossible, then data recovery and/or other acceptable measures will be implemented after consultation with the involved group(s) but before implementation of the proposed activity.

Resource Management Directives

- 1. Resources in this category are available for use by representative members of Native American tribal groups or other groups for limited collection of materials, non-destructive group uses, or other traditional uses.
 - a. Management should accommodate continued site access to the extent and manner possible.
 - b. Sites should be monitor annually to ensure that site use is not adversely affecting the site. Monitoring should include representatives of the involved group in assessing site condition.
 - c. Sites may be protected by fencing, road closures, etc., provided there has been consultation with the group(s) using the resource.
- **D.** <u>Public use</u>. This category may be applied to any cultural property found to be appropriate for use as an interpretive exhibit in place, or for related educational and recreational uses by members of the general public. The category may also be applied to buildings suitable for continued use or adaptive use, for example, as staff housing or administrative facilities at a visitor contact or interpretive site, or as shelter along a hiking trail.

Management Direction

Compliance Management

1. Interpretation through development of on site facilities and/or published materials made available to the public is the identified treatment. Interpretation will be based on appropriate archaeological excavation and analysis, historic research, ethnographic research, or any combination of data gathering. Interpretation and development of information will reflect consultation with the SHPO.

- 1. These sites are available for educational and recreational use by the general public. Testing, data recovery, historic research, oral histories, ethnographic research, and other treatment may be necessary to gather sufficient information for suitable educational and interpretive uses, to prevent damage from proposed recreational or educational uses, or both. Interpretation and development of information will reflect consultation with SHPO.
- 2. Existing public roads will be retained in their current use to provide for continued public access.
- 3. Signage may be part of the interpretive efforts when consistent with standards of size and appearance within the planning area.
- 4. Fences, erosion control devices, and other protective structures may be constructed to prevent or limit site damage.
- **E.** Experimental Use. This category may be applied to a cultural property judged well-suited for controlled experimental study, to be conducted by BLM or others concerned with the techniques of managing cultural properties, which would result in the property's alteration, possibly including loss of integrity and destruction of physical elements. Committing cultural properties or the data they contain to loss must be justified in terms of specific information that would be gained and how it would aid in the management of other cultural properties. Experimental study should aim toward understanding the kinds and rates of natural or human-caused deterioration, testing the effectiveness of protection measures, or developing new research or interpretation methods and similar kinds of practical management information. It should not be applied to cultural properties

with strong research potential, traditional cultural importance, or good public use potential, if it would significantly diminish those uses.

Management Direction

Compliance Directives

1. These sites are reserved for studies concerning the effects of erosion, fire, or other site formational processes on cultural resources. The preferred Sec. 106 treatment for sites placed in the Experimental Use that are actively engaged in an Experimental Use Study will be avoidance so that the study can continue. If avoidance is impossible, then the site may be placed in the Discharged from Management category, or may undergo data recovery or other treatment depending on National Register eligibility and other factors. SHPO will be consulted concerning treatment of eligible properties.

Resource Management Directives

- 1. Experimental use studies should be implemented to collect information on the effects of erosion, fire, or other site formational processes. If the BLM determines that the useful experimental life of the site is exhausted, then it can be placed into Discharged from Use or other appropriate category. If BLM determines there will be an adverse effect to an Experimental Use category site that is listed on or eligible for the National Register, SHPO will be consulted regarding continued placement of the site in this category.
- **F.** <u>Discharged from Management</u>. This category is assigned to cultural properties that have no remaining identifiable use. Most often these are prehistoric and historic archaeological properties, such as small surface scatters of artifacts or debris, whose limited research potential is effectively exhausted during documentation. Also, more complex archaeological properties that have had their salient information collected and preserved through mitigation or research may be discharged from management, as should cultural properties destroyed by any natural event or human activity</u>. Properties discharged from management remain in the inventory, but they are removed from further management attention and do not constrain other land uses. Particular classes of unrecorded cultural properties may be named and described in advance as dischargeable upon documentation, but specific cultural properties must be inspected in the field and recorded before they may be discharged from management.

Management Direction

Compliance Directives

- 1. SHPO concurrence is required before any eligible or unevaluated property is placed in this use category.
- 2. Appropriate consultation is required before any site that is of cultural or religious significance to a tribe or other group is placed in this category.

Resource Management Directives

1. Same as compliance.

G. Traditional/Scientific Use. This category is assigned to cultural properties that require an emphasis on traditional use, as defined in C above, as their primary use and on scientific use, as defined in A above, as their secondary use. Where conflicts exist in use, the directives associated with the primary use prevail.

Management Direction

Compliance Directives

- 1. In consultation with affected tribes or other groups, develop appropriate mitigation actions.
 - a. Do not approve any land use impacting sites in this category until the consultation process is complete and any necessary treatment plans are developed and implemented.

Resource Management Directives

- 1. These sites will be available for use by traditional users for limited collection of materials or nondestructive group uses. Management should accommodate continued site access to the extent and manner possible.
- 2. Research, that does not conflict with traditional use, or that may enhance traditional use, may be allowed after consultation with affected tribes or other groups.
- H. Public/Scientific Use. This category is assigned to cultural properties that are most valuable for Public use, as defined in D above, and that may be used available for scientific use, as defined in A above, that enhances the properties public use

Management Direction

Compliance Directives

- 1. Interpretive and educational actions, including but not limited to on site interpretation, signage or publications, is the preferred treatment action.
- 2. Data recovery, or other treatments, that do not diminish the Public Use Value of the resource, may be authorized.
 - a. As much as practical, data recovery, or other treatment actions, will involve volunteers and be open to the public in ways that do not interfere with treatment activities.

- 1. These sites will be available for educational and recreational use by the general public. Testing, data recovery, and other treatment may be necessary to gather sufficient information for suitable educational and interpretive uses, or to treat damage from recreational uses.
- I. Conservation/Scientific Use. This category is assigned to cultural properties that are primarily valuable for conservation use, as defined in B above, and that may be used for scientific purposes, as defined in A above, that do not conflict with conservation use. Where conflicts exist in use, the directives associated with the primary use (Conservation) prevail. The land on which these sites are situated is not available for disposal.

Management Direction

Compliance Directives

- 1. Avoidance is the primary treatment action. Discretionary actions will be denied within the boundaries of the resource.
- 2. Where avoidance is not possible, data recovery, or other treatment is required.

Resource Management Directives

- 1. Sites in this category will be managed to avoid degradation from land uses and from natural processes. This can include implementation of actions such as fencing, construction of erosion control devices, road closures, etc.
- 2. Sites may be assigned to other uses after consultation with the SHPO to develop appropriate research or interpretation plans.
- I. <u>Conservation/Public Use</u>. This category is assigned to cultural properties that are primarily valuable for conservation use, as defined in B above, and that may be used for public purposes, as defined in D above, that do not conflict with conservation use.

Management Direction

Compliance Directives

- 1. Avoidance is the primary treatment action.
- 2. Data recovery, or other treatment that does not conflict with conservation, may be allowed.

Resource Management Directives

1. Sites in this category will be managed to avoid degradation from land uses and from natural processes.

Sites may be used for interpretation or other public uses after consultation with the SHPO to ensure that adverse effects from these activities are avoided. Treatment of effects may include data recovery.

Properties of Cultural and Religious and Importance

Use categorizations would be established during the consultation process with appropriate Native American groups. Use categories applicable to properties of traditional religious and cultural importance are limited to traditional use, conservation use, and traditional/scientific use using definitions established above. In addition, the category of scientific use, as defined in the cultural resource section above, might apply to human burials recovered prior to enactment of NAGPRA and determined by BLM as unaffiliated. The category of discharged from management could also be employed, provided the original basis for the property's importance was deemed absent or destroyed, based on appropriate consultation. The category of "conservation for future use" would exclude traditional uses in order to allow the property (e.g., a resource area) to re-establish those qualities that form the basis for the traditional use. Use of this category would have to reflect consultation and must identify conditions under which traditional use would eventually resume.

A. Traditional Use. This category is to be applied to any properties of traditional religious and cultural importance known to be perceived by a specified social and/or cultural group as important in maintaining the cultural identity, heritage, or well being of the group. Properties assigned to this category are to be managed in ways that recognize the importance ascribed to them and seek to accommodate their continuing traditional use.

Management Direction

Compliance Directives

- 1. Avoidance is the preferred treatment.
- 2. If avoidance is impossible, then data recovery and/or other acceptable measures will be implemented after consultation with the involved group(s) but before implementation of the proposed activity.

- 1. Resources in this category are available for use by representative members of Native American tribal groups or other groups for limited collection of materials, non-destructive group uses, or other traditional uses.
 - a. Management should accommodate continued site access to the extent and manner possible.
 - b. Sites should be monitor annually to ensure that site use is not adversely affecting the site. Monitoring should include representatives of the involved group in assessing site condition.
 - c. Sites may be protected by fencing, road closures, etc., provided there has been consultation with the group(s) using the resource.
- 2. Ethnographic studies will be initiated when funding is available to identify these types of properties and to ensure that they receive the desired level of management.
- **B.** <u>Traditional/Scientific Use</u>. This category is assigned to properties of traditional religious and cultural importance that require an emphasis on traditional use, as defined in C above, as their primary use and on scientific use, as defined in the cultural resource categories, as their secondary use. Where conflicts exist in use, the directives associated with the primary use prevail.

Management Direction

Compliance Directives

- 1. In consultation with affected tribes or other groups, develop appropriate mitigation actions.
 - a. Do not approve any land use impacting sites in this category until the consultation process is complete and any necessary treatment plans are developed and implemented.

Resource Management Directives

- 1. These sites will be available for use by traditional users for limited collection of materials or non-destructive group uses. Management should accommodate continued site access to the extent and manner possible.
- 2. Ethnographic studies will be initiated when funding is available to identify these types of properties and to ensure that they receive the desired level of management. Additional research that does not conflict with traditional use, or that may enhance traditional use, may be allowed after consultation with affected tribes or other groups.
- C. Conservation for Future Use. This category is reserved for any unusual property of traditional religious and cultural importance, which, because of scarcity, singular cultural importance, or comparable reasons, is not currently available for consideration as the subject of scientific or historical study or traditional use that would result in its physical alteration. Properties of traditional religious and cultural importance in this category must be determined eligible for, or listed on, the National Register of Historic Places. A property included in this category is deemed worthy of segregation from all other land or resource uses, including cultural resource uses, that would threaten the maintenance of its present condition or setting, as pertinent, and will remain in this use category until specified provisions are met in the future.

Management Direction

Compliance Directives

- 1. Avoidance is the preferred mitigation measure. Discretionary activities will be denied within boundaries of these resources. The land on which these sites are situated is not available for disposal.
 - a. If avoidance is impossible, then data recovery or other acceptable measures will be allowed after going through the required consultation processes. Since the majority of the plan area is for National Conservation Area and Wilderness, we anticipate that avoidance will be possible in the vast majority of cases with uncontrolled erosion being the most likely cause of data recovery efforts. For many of the sites in this category, the setting will be an important factor of the site's importance and integrity. In these cases, Visual Resource Management (VRM) prescriptions will be implemented to lessen effects, generally by conformance to VRM Class II standards. Other management efforts will also be taken to lessen noise and impacts to atmospheric elements.

Resource Management Directives

1. Properties in this category have the highest priority for protection and preservation and will not be available for other current uses, including research or interpretation.

- a. A resource listed in the Conservation for Future Use category may be placed in another use management category if: (1) BLM identifies the specific criteria underlying this classification, (2) the specific reasons for prohibitions or limitations are identified, and (3) BLM identifies or accepts methodological, technological or other criteria that if met or implemented justify alterations to the integrity of the resource and placement in another use category.
- 2. Protective actions may be taken to ensure preservation of those qualities providing the basis for classification. These actions, such as fencing, installation of erosion control structures, road closures, etc., must not impinge on the values and integrity of the site. Resources in this use category will be monitored at least semi-annually to assess potential threats.

Specific information about properties of traditional religious and cultural importance within the study area is very limited, reflecting a general lack of formal consultation and data collection. Such consultation should occur in the future to gather important data. Until that is done, existing cultural resources overviews and other reports (e.g., Bengston 2002) prepared by anthropologists and archaeologists are used. Property type categories are generalized from information gathered from Northern Paiute informants in the past and in the present. The discussion reflects a combination of very little specific knowledge but a broad awareness of the kinds of places, sites, resources and issues identified nearby and, in some cases, even within the study area.

One known resource of concern may be within the study area (Bengston 2002:Figure D5). However, properties of traditional religious and cultural importance may exist in the study area and may fit into one of the categories listed below or in others, yet to be identified.

Paleontological Use Categories

For purposes of management under terms of the NCA plan, a set of use categories similar to those applied to cultural resources is in effect.

A. Scientific Use. This category applies to any paleontological locality with known or potential vertebrate fossils or noteworthy occurrences of invertebrate or plant fossils available for consideration as the subject of scientific study at the present time, using currently available research techniques. Study includes methods that would result in the physical alteration or destruction of some, or all, of the locality. Recommendations to allocate individual localities to this use must be based on documentation of the kinds of scientific research potential the locality is known or thought to contain and the data's importance for pursuing specified research topics. Localities in this category need not be conserved in the face of a research or mitigation proposal that would make adequate and appropriate use of the locality's research importance.

Management Direction

Compliance Directives

1. Mitigation rather than avoidance is the preferred option. Mitigation must be accomplished prior to impacts from conflicting uses or natural or human caused deterioration, or is undertaken to ameliorate impacts that have already occurred. Mitigation may be accomplished by means of collection of data and fossil material, obtaining representative samples of fossils, avoidance, or no action. Qualified persons holding a BLM-issued permit reflecting an accepted research design accomplish mitigation. Appropriate curation of specimens and records is required.

2. Monitoring during project development will be conducted at a level of intensity appropriate for the apparent sensitivity of the geologic unit or area being affected, based on results of analysis of existing data and/or field inventory.

Resource Management Directives

- 1. Resources in this category are available for testing and excavation by qualified researchers operating under valid permits with accepted research designs. Preference will be given to research proposals emphasizing priorities established in this plan. Resources in this category may be discharged from use once the locality has no further scientific use, or a resource in this category may be assigned to the Conservation for Future Use if determined appropriate based on results of scientific research.
- **B.** Conservation for Future Use. This category is reserved for any unusual fossil locality, which because of scarcity, a research potential that surpasses the current state of the art, singular importance, scientific importance or comparable reasons, is not currently available for consideration as the subject of scientific study that would result in its physical alteration. A fossil locality included in this category is deemed worthy of segregation from all land or resource uses that would threaten the maintenance of its present condition, and will remain in this use category until specified provisions are met in the future.

Management Direction

Compliance Directives

- 1. Avoidance is the preferred mitigation measure. Discretionary activities will be denied within boundaries of these localities. The land on which these sites are situated is not available for disposal.
 - a. If avoidance is impossible, then mitigation will be allowed, per that described for mitigation under compliance for resources assigned to Scientific Use. Since the majority of the plan area is for National Conservation Area and Wilderness, we anticipate that avoidance will be possible in the vast majority of cases with uncontrolled erosion being the most likely cause of mitigation efforts.

- 1. Sites in this category have the highest priority for protection and preservation and will not be available for other current uses, including research or interpretation.
 - b. A resource listed in the Conservation for Future Use category may be placed in another use management category if: (1) BLM identifies the specific criteria underlying this classification (for example, outstanding research potential), (2) the specific reasons for prohibitions or limitations are identified, and (3) BLM identifies or accepts methodological, technological or other criteria that if met or implemented justify alterations to the integrity of the resource and placement in another use category.
- 2. Protective actions, such as fencing, installation of erosion control structures, road closures, etc., may be taken to ensure preservation of those qualities providing the basis for classification. Resources in this use category will be monitored at least semi-annually to assess potential threats.

C. <u>Discharged from Management</u>. This category is assigned to fossil localities having either (1) no further scientific use or (2) are established through appropriate means of inventory and evaluation by qualified persons as having no potential for important vertebrate fossils or noteworthy occurrences of invertebrate or plant fossils. Properties discharged from management remain in the inventory, but they are removed from further management attention and do not constrain other land uses

Management Direction

Compliance Directives

1. With certain exceptions, appropriate formal analysis is required to place a fossil locality in this category. Common invertebrate fossils and locations of petrified wood are placed in this category, subject to certain exceptions that may be established to preserve unusual, rare or noteworthy examples. For paleontological localities, Discharged from Use means that management of these resources will be the same as for other rocks and minerals in the planning area.

Resource Management Directives

- 1. Common plant and invertebrate fossils and petrified wood are placed in this category, subject to certain exceptions that may be established to preserve unusual, rare or noteworthy examples. For Paleontological resources, Discharged from Use means that management of these resources will be the same as for other rocks and minerals in the planning area
- **D.** Conservation/Scientific Use. This category is assigned to paleontological properties that are primarily valuable for conservation use, as defined in B above, and that may be used for scientific purposes, as defined in A above, that do not conflict with conservation use. Where conflicts exist in use, the directives associated with the primary use (Conservation) prevail.

Management Direction

Compliance Directives

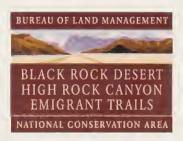
- 1. Avoidance is the primary treatment action. Discretionary actions will be denied within the boundaries of the resource.
- 2. Where avoidance is not possible, data recovery, or other treatment is required.

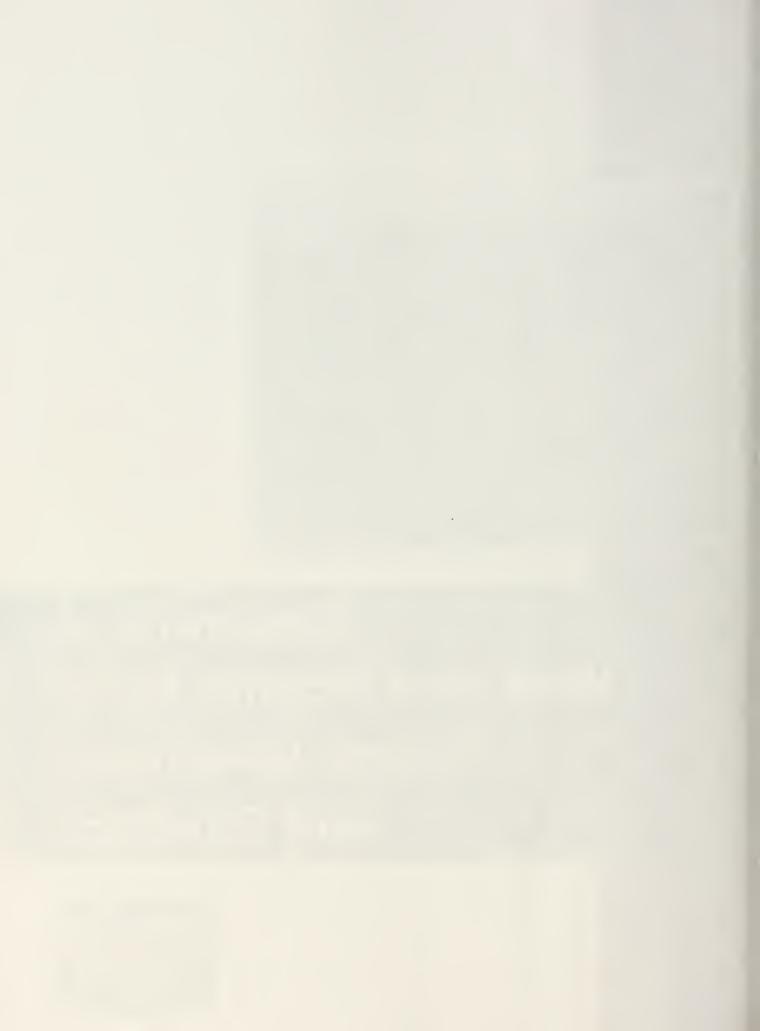
- 1. Sites in this category will be managed to avoid degradation from land uses and from natural processes. This can include implementation of actions such as fencing, construction of erosion control devices, road closures, etc.
- 2. Sites may be assigned to other uses after development of appropriate research or interpretation plans.

This Page Intentionally Left Blank
.



Appendix J: Wild and Scenic River Policy, Inventory, and Findings





Appendix J: Wild and Scenic River Policy, Inventory, and Findings

Black Rock High Rock NCA Wild and Scenic River Inventory Process

The Wild and Scenic Rivers Act (October 2, 1968, Public Law 90-542) requires the Bureau of Land Management to consider wild and scenic river values in its land use planning process. The objective of the Wild and Scenic Rivers Act is to preserve in free-flowing condition selected rivers in the Nation which possess outstandingly remarkable values and to protect those rivers and their immediate environments for the benefit of present and future generations.

Policy requires BLM to "identify and evaluate river segments within the resource management planning process to determine eligibility, tentative classification, protection requirements, and suitability under the Wild and Scenic River Act." The procedures by which the BLM determines eligibility and suitability and provides management direction are described in the USDI-USDA Final Revised Guidelines for Eligibility, Classification, and Management of River Areas (Federal Register Vol. 47, No. 173, September 7, 1982) and BLM Manual 8351.

Step I. Initial Inventory of Streams/Rivers in the Planning Area

Assessing eligibility of individual river segments for possible inclusion into the National Wild and Scenic River System was accomplished by a team of BLM specialists. The team used personal knowledge, and Geographic Information System (GIS) resource and land information to conduct the evaluations. This inventory and recommendation only pertains to those stream segments on public land.

Because there are hundreds of dry washes, gullies and canyons as well as perennial, ephemeral, and intermittent streams within the planning area an objective method of selecting which drainages would be assessed for eligibility was developed.

It was determined that to be included in the assessment process the drainage would need to meet the one of the following criteria:

- 1. The stream would need to support some type of riparian vegetation community. (i.e. aspens, cottonwoods, willows, red osier dogwood, reeds, sedges, etc...) or
- 2. If the stream did not meet the above criteria but had the potential for having one of the "Outstandingly Remarkable Values" outlined in Section 1(b) of the Wild and Scenic Rivers Act, it would also be assessed for eligibility.

Table 1 shows all of the stream segments in the planning area that were assessed in the WSR inventory and their potential outstandingly remarkable values, if any.

Table 1. Wild and Scenic River Inventory BRHR NCA RMP (Streams Evaluated for Eligibility)

Inventoried Streams	Free								
General Area/Stream Name	Flowing			Potenti	al outstandin	gly remarkah	ole values		
High Rock Canyon Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
High Rock Canyon Creek	Y	X	X	X		X	X	X	
Yellow Rock Canyon Creek	Y	X	į į	X			X	X	
Grassy Canyon Creek	Y								
Mahogany Creek (High Rock tributary)	Y	X		X		X	X	X	
East Fork High Rock Canyon Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
E.F. High Rock Canyon Creek	Y	X	X	X				X	
Cottonwood Creek	Y								
Wall Canyon Creek	Y								
Little High Rock Canyon Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Little High Rock Canyon Creek	Y	X	X	X		X	X	X	
Willow Creek (Mcconell Canyon)	Y	X		X					
High Rock Lake Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Fly Canyon Creek	Y	X	X	X				X	
Box Canyon Creek	Y Y			X					
Willow Creek	Y								
Cherry Creek	Y								
Donelly Creek	Y Y				X				
Calico Mountains Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Cow Creek	Y			3531087					
Cottonwood Creek	Y								
North Black Rock Range Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Soldier Creek	Y	Sections	Recircation	deology	1 1311	Wilding	Tremstory	Thistory	Other values
Coleman Creek	Y				Х		1		
Snow Creek (WA and "sliver")	Y	i			X				
Slumgullion Creek	Y				24				
North Fork Battle Creek	Y				X				
		Comme	Recreation	Geology		Wildlife	Prehistory	Uistom	Other Values
Lahontan Cutthroat Trout ISA Mahogany Creek (ISA)	Y	Scenery X	X	Geology	Fish X	wildille	Frenistory	History	Other values
Summer Camp Creek	Y	X	X		X				
Pole Creek	Y	^	Α		А				
			D .:	0.1	E' I	31/11/10	D 11.	77	Od - Vd
Pahute Peak Wilderness	V	Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History X	Other Values
Clapper Creek Sheep Creek	Y							^	
Indian Creek	Y								
				0.1	P' 1		D 11.	7.77	
Black Rock Desert Wilderness Area		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Paiute Creek (BR Desert Section)	Y								
Battle Creek (BR Desert Section)	Y								
Leonard Creek(BR Desert Section)	Y								
Jackson Creek Slough Ouinn River	Y		X						
North Jackson Mountains Wilderness	,,	Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Happy Creek	Y				X				
Deer Creek (Jackson Mountains)	Y								
Mike O'Brien Canyon Creek	Y								
Blind Canyon Creek	Y								
New Years Canyon Creek Unnamed Creek north of Blind Canyon	Y]						
	1				E: 1	W. 11 11 C	D 11.	***	
South Jackson Mountains Wilderness		Scenery	Recreation	Geology	Fish	Wildlife	Prehistory	History	Other Values
Mcgill Canyon Creek	Y								
Alaska Canyon Creek	Y								
Bliss Canyon Creek	Y								
Hobo Canyon Creek	Y								
Christiorsson Canyon Creek Shawnee Creek	Y								
Bull Creek	Y								
Little Cedar Creek	Y								
Big Cedar Creek	Y								
Louse Creek	Y								
Doubt Creek	11					L			

Step II. Determining Eligibility

Following criteria established in the Wild and Scenic Rivers Act and outlined in Bureau of Land Management Manual 8351, the team determined whether or not each of the inventory segments was free-flowing and possessed one or more outstandingly remarkable values (ORVs). The values considered were: scenic, recreational, geological, fish and wildlife, historic, prehistoric, and other similar values such as ecological (riparian), botanical. A tentative classification of wild, scenic or recreational was also made for each eligible stream segment. The region of comparison for the outstandingly remarkable values was the Northern Great Basin.

The following guidelines were followed when conducting eligibility evaluation:

- 1. Threatened and endangered species known to occur in the stream corridor automatically became an outstandingly remarkable value.
- 2. Potential wildlife habitat without confirmed species sightings did not become an outstandingly remarkable value.
- 3. Habitat for common wildlife species was not an outstandingly remarkable value.
- 4. Cultural and paleontological sites were used as supporting outstandingly remarkable values only, one of these sites by itself did not warrant preliminary listing.

Table 2 shows those study streams found to be eligible for Wild and Scenic River designation.

Table 2. Study Stream Segments found Eligible

Segment Name	Segment Description and approximate length of segment	Outstandingly Remarkable Values	Tentative Classification (Recreational, Scenic, Wild)
High Rock Canyon Creek	21 miles of the stream from its headwaters in Upper High Rock Canyon to the private property boundary near High Rock Lake.	Scenic Geologic Historic Prehistoric	All Scenic
Mahogany Creek (High Rock Tributary)	4 miles of the stream from where the steam crosses the southern boundary of the High Rock Canyon Wilderness to it's confluence with High Rock Canyon Creek.	Scenic Geologic Historic Prehistoric	All Wild
East Fork High Rock Canyon Creek	5.8 miles from where the stream starts entering the canyon below Bernard's Corral to it's confluence with High Rock Canyon Creek.	Scenic Geologic Historic Recreation	All Wild
Little High Rock Canyon Creek	6 miles of the stream from the private property boundary at the head of the canyon to the private property boundary at the mouth of the canyon.	Scenic Geologic Historic Prehistoric	All Wild

Fly Canyon Creek	4 miles from where the stream enters Fly canyon north of High Rock Lake to the private property boundary east of the High Rock Lake Wilderness boundary.	Scenic Geologic Historic	All Wild
Donnelly Creek	7.2 miles from the streams headwaters east of Division Peak to the private property boundary near the Soldier Meadows Road.	Fish	6.2 miles Wild 1 mile Scenic (1/2 mile upstream and downstream from the road crossing)
Coleman Creek	10 miles from the streams headwaters to it's confluence with Soldier Creek.	Fish Scenery	All Wild
Snow Creek	3miles from the streams headwaters to the Summit Lake Reservation boundary.	Fish	2 miles Wild 1 mile Scenic (1/2 mile upstream and downstream from the road crossing)
North Fork of Battle Creek	2.5 miles from the streams headwaters to the wilderness boundary (excluding the segments in the two private parcels)	Fish Scenery	All Wild
Mahogany Creek (ISA)	6 miles from the streams headwaters to the Summit Lake Reservation boundary	Fish Scenery	4 miles Wild 2 miles Scenic
Summer Camp Creek	3.6 miles from the streams headwaters to the confluence with Mahogany Creek. (Excluding the segments in the private parcels)	Fish Scenery	2 miles Scenic 1.6 miles Wild
Clapper Creek	3 miles from the streams headwaters to where it leaves the canyon and flows through the alluvial fan.	Historic	1 mile Scenic 2 miles Wild
Happy Creek	7 miles from the streams headwaters to the wilderness boundary. All headwaters of Happy Creek are included.	Fish	2.5 miles Scenic 4.5 miles Wild
Mary Sloan Creek	3.7 miles from the private property boundary on the upper section of stream to the wilderness boundary.	Fish	All Wild
Soldier Meadows Hot Spring Creek	1.5 miles from the headwaters to the private property boundary	Fish Recreational Other (Plants) Historic	1.5 miles Scenic
Quinn River	49 miles from the northern boundary of the Black Rock Desert Wilderness to the western arm of the playa.	Recreational	42 Wild 7 Scenic

Step III. Making Suitability Recommendations

The final step in the process is the determination of suitability. This step provides the basis for determining which rivers should be recommended for addition to the National System of Wild and Scenic

Rivers. Suitability recommendations will vary with Alternatives. Under the "No Action Alternative" a Wild and Scenic River assessment would not occur and therefore no rivers would be recommended suitable.

The BLM team used the following questions to guide their recommendations for suitability:

- 1. Should the river's free flowing character, water quality, and ORV's be protected, or are one or more other uses important enough to warrant doing otherwise?
- 2. Will the river's free flowing character, water quality, and ORV's be protected through designation?
- 3. Is it the best method for protecting the river corridor?

Under Alternative A, all eligible sections would be recommended suitable. Under Alternative B, only those stream segments outside of wilderness would be found suitable, because wilderness designation provides sufficient protection and the protection of their Outstandingly Remarkable Values would not be further increased. Under the No Action Alternative and Alternative C, no streams would be recommended suitable. Table 3 shows the suitability recommendations for the various alternatives.

Table 3. Suitability Recommendations by Alternative

Segment Name	No Action	Alt A	Alt B	Alt C
High Rock Canyon Creek	Not suitable	Suitable	Suitable	Not suitable
Mahogany Creek (High Rock Tributary)	Not suitable	Suitable	Not Suitable	Not suitable
East Fork High Rock Canyon Creek	Not suitable	Suitable	Not Suitable	Not suitable
Little High Rock Canyon Creek	Not suitable	Suitable	Not Suitable	Not suitable
Fly Canyon	Not suitable	Suitable	Not Suitable	Not suitable
Donnelly Creek	Not suitable	Suitable	Not Suitable	Not suitable
Coleman Creek	Not suitable	Suitable	Not Suitable	Not suitable
Snow Creek	Not suitable	Suitable	Wilderness Section not suitable "Sliver" section suitable	Not suitable
North Fork of Battle Creek	Not suitable	Suitable	Not suitable	Not suitable
Mahogany Creek ISA	Not suitable	Suitable	Suitable	Not suitable
Summer Camp Creek	Not suitable	Suitable	Suitable	Not suitable
Clapper Creek	Not suitable	Suitable	Not Suitable	Not suitable
Happy Creek	Not suitable	Suitable	Not Suitable	Not suitable
Mary Sloan Creek	Not suitable	Suitable	Not Suitable	Not suitable
Soldier Meadows Hot Spring Creek	Not suitable	Suitable	Suitable	Not suitable
Quinn River	Not Suitable	Suitable	Not Suitable	Not Suitable

No Action Alternative

Of the 16 river segments found eligible for Wild and Scenic River status designation, no streams would be recommended as suitable for such designation.

Alternative A

All 16 stream segments (137.3 miles) found eligible would be recommended suitable.

Alternative B

Only five streams (34.1 miles) would be recommended suitable and receive additional protection by Wild and Scenic River designation. These streams include: Soldier Meadows Hot Springs Creek, Summer Camp Creek, Mahogany Creek (WSA), Snow Creek (outside of wilderness), and High Rock Canyon Creek.

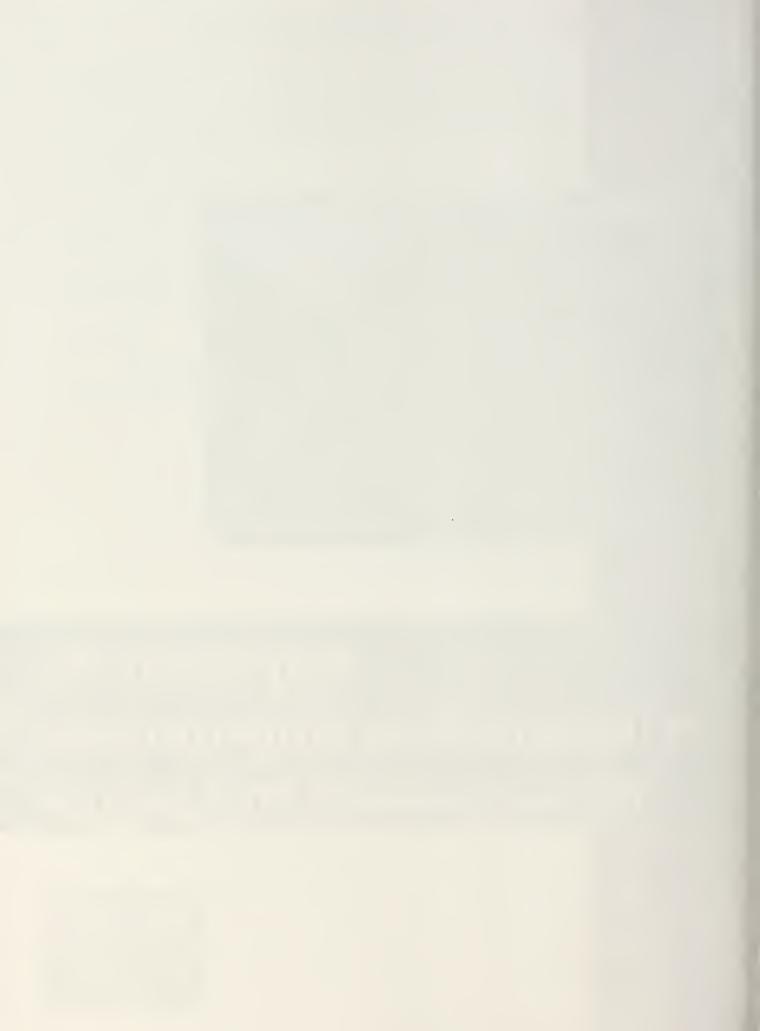
Alternative C

Because existing designations (NCA, Wilderness, Wilderness Study Areas, and ACECs) provide sufficient protection for the streams, none of stream segments would be recommended suitable.



Appendix K: Wildland Fire Appropriate Management Response





Appendix K: Wildland Fire Appropriate Management Response

Use of appropriate management response (AMR) on all wildland fire allows agency administrators the ability to choose from a full spectrum of fire suppression actions. Although all wildland fires must have an appropriate action taken to suppress them, not all wildfires need to be suppressed with the same level of intensity. Appropriate suppression actions, whether aggressive, high intensity or low intensity actions, will be based on preplanned analysis and executed to minimize suppression costs plus resource losses, consistent with land management objectives, including the threat to life and property.

Preplanned analysis criteria has been identified through the Phase One Fire Management Planning Process (see glossary) in which an interdisciplinary team of resource, fire, and line management representatives classified public land into the two different management categories listed as follows:

Category A

Those lands where wildland fire should be excluded; using only prescribed fire or non-fire treatment techniques to achieve the desired resource conditions or management of the area. The appropriate management response for these lands would be full suppression. In multiple fire situations, with fires occurring within both land categories, suppression priorities would be given to those fires burning within this classification of land. When multiple fires occur within Category A, suppression priority would be based on the threat or potential threat to public safety, structures, private property, and improvements.

Criteria used to determine Category A land include:

- Protecting public safety;
- Threat to private land;
- Protecting capital improvements;
- Protecting administrative/recreational sites;
- Minimizing loss of shrub cover and biological soil crusts;
- Minimizing increase in annual vegetation types;
- Limiting or reducing medusahead, cheatgrass, and other noxious species;
- Providing diverse perennial species;
- Protecting habitat for special status plant species;
- Protecting Federal and State lands identified under fire protection agreements.

Category B

Those lands where wildland fire could/should be used in addition to prescribed fire to meet desired resource conditions or management. Under this category of land the appropriate management response could vary based on predetermined fire and resource criteria (see criteria below) for land in and adjacent to the fire location. In multiple fire situations, Category A land would, with the exception of threat to life, receive higher priority for suppression actions than would Category B land.

While all wildland fires would receive a suppression response, that response would not always be full suppression. Less than full suppression responses would occur only during spring early or late summer and fall months, dependant on weather conditions, or in multiple fire situations when suppression forces are not

adequate to respond to all going fires. With multiple fires burning, suppression actions would occur in order of priority, with lower priority fires receiving suppression action as forces become available. All other fires receiving less than full suppression actions must meet the following fire criteria thresholds:

- Fire located within Category B land;
- Live fuel moisture in big sagebrush at 120 percent or more with 10-hour fuel stick readings of 5 percent or above or live fuels of 95 percent or above and 10-hour fuel stick reading of 8 percent or above;
- Predicted, maximum sustained wind speed of 10 mph (obtained from fire weather forecast);
- Observed and predicted fire behavior will continue to meet resource management objectives;
- No threat to public safety;
- Not a threat to private, State or other Federal land (unless those lands are under a signed mutual agreement with the landowner or agency for less than full suppression actions);
- Fires ignition is not suspected to be arson;
- Actions are in accordance with the "Preparedness Level 3" or less of the local unit (this level is based on the number of fire suppression resources that are committed to ongoing fire suppression activities, as more resources are committed the level raises).

If any of these criteria are exceeded the appropriate management response becomes that of full suppression, with the only exception to this occurring in a multiple fire situation where suppression actions are based on priority.

Within Category B, land resource considerations would be addressed and updated annually to reflect appropriate changes in the values to be protected. Resource criteria has been identified as to those criteria which may lead to full suppression actions and those criteria which may lead to less than full suppression actions, those criteria include but are not limited to the following.

Resource criteria that may lead to full suppression action include but are not limited to:

- Burning vegetation resources with commodity values;
- Burning within the perimeter of an area burned within the last 10 years;
- Burning within the perimeter of a fire rehabilitation area;
- Burning within sensitive vegetation types/habitat (key winter range, annual grasslands, shrub/annual grassland, rabbit brush/grassland, or salt desert shrub); and
- Burning more than one-third of a 5th code watershed in a 3-year period.

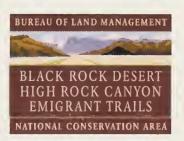
Resource criteria that may lead to less than full suppression actions include but are not limited to:

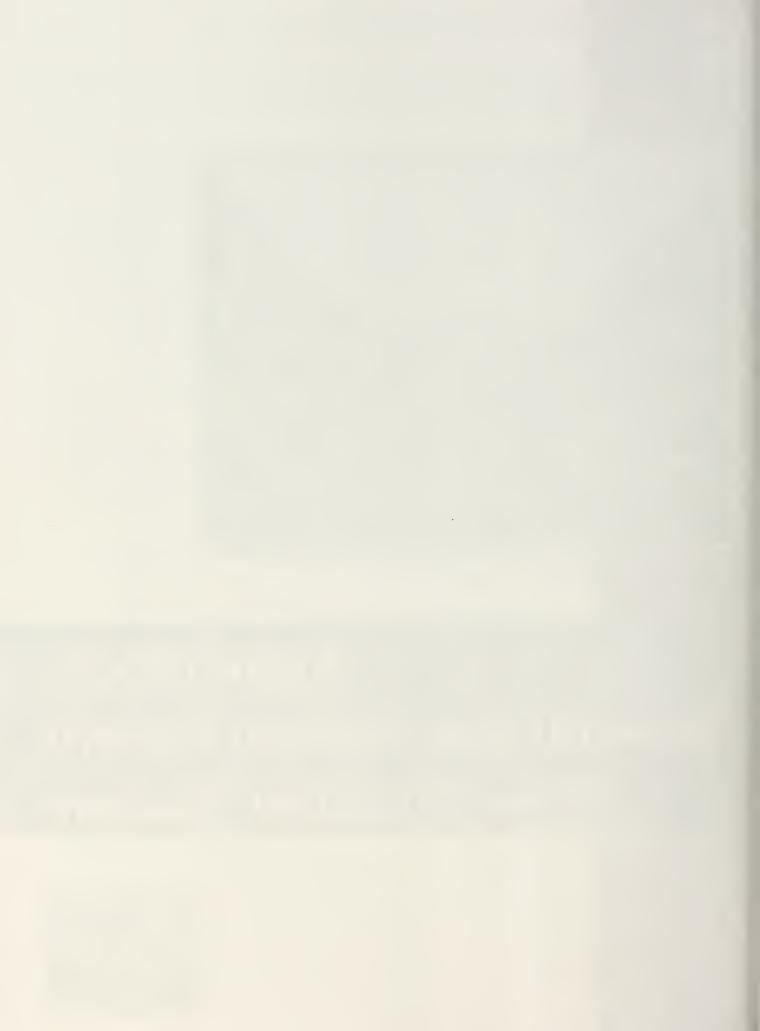
- Burning within riparian areas;
- Burning within designated ACEC/RNA areas (allow to monitor natural processes);
- Burning within a wilderness or wilderness study area;
- Burning within given vegetation types (juniper, aspen, mountain big sagebrush, mountain brush);
- Burning at 5,500 feet elevation or above (vegetation communities capable of natural rehabilitation); or
- Burning within an area that has a prescribed fire plan in place.

The authorized officer (field manager or designated representative) has the authority to modify fire and resource criteria for either category of land based on site-specific resource management objectives identified through the adaptive management process.



Appendix L: Special Recreation Permit Classification System





Appendix L: Special Recreation Permit Classification System

Classification of Permits

Evaluation Factors:

Size of the area under exclusive use by the applicant.

Small < 1 acre

Medium 1 acre to 100 acres

Large > 100 acres

Time period for exclusive use by the applicant.

Trivial one day or less
Short two to six days
Long one week or greater

Buffer needed to protect other users from potential effects

None no buffer required Small < 0.25 mile buffer Large > 0.25 mile buffer

Potential Environmental Effects

Trivial Effects of a temporary nature and surface disturbance less than 0.1 acres
Low Effects of a temporary nature and surface disturbance less than 0.5 acres
Other Effects longer than one year or surface disturbance greater than 0.5 acre

Anticipated numbers of participants or vehicles

	Participants	Vehicles	
Low	< 50	< 30	
Medium	51 to 1000	31 to 50	
High	> 1000	>50	

Oversight requirements (includes cleanup inspections, LE activities)

None No post permit compliance actions required

Low Post permit activities require < 4 hours of BLM oversight

High Post permit activities require > 4 hours of BLM oversight

Mechanical Equipment Required?

Y Vehicles or other mechanical equipment required.
No vehicles or other mechanical equipment required.

Classification Matrix Black Rock-High Rock NCA Permits

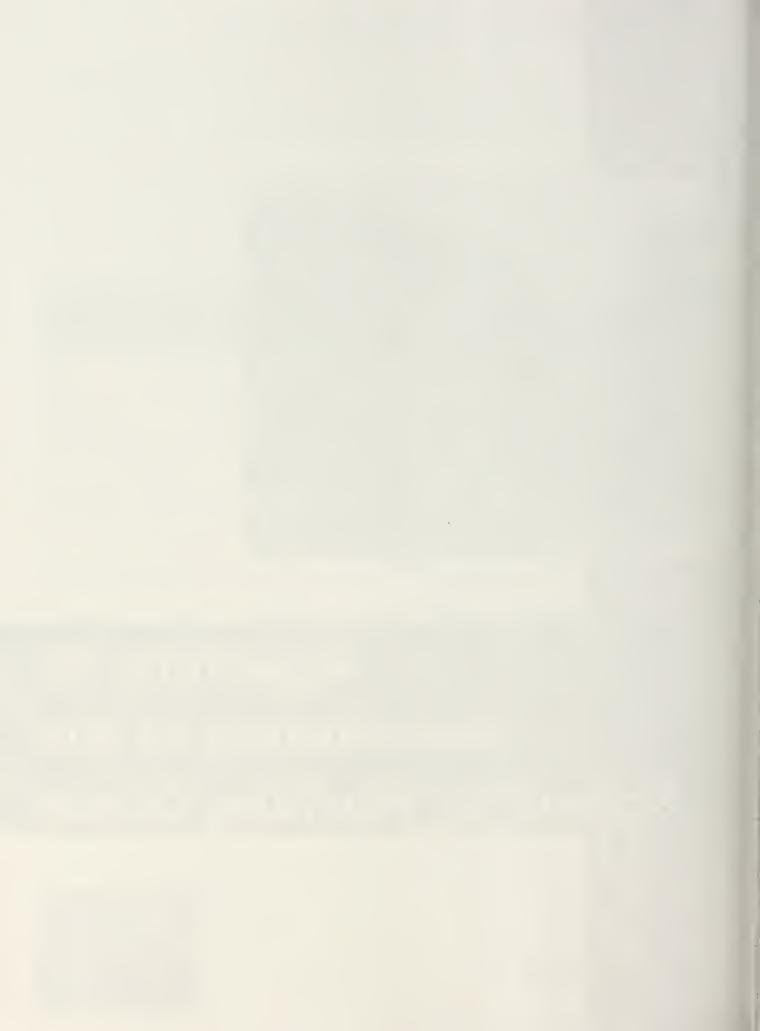
(Special Recreation Permits, Film Permits and other temporary Land Use Permits)

Evaluation Factors		Permit Class				
		1	II	III	IV	
Size		Small	Small/Medium	Medium	Large	
Time		Trivial	Trivial/Short	Short	Long	
Buffer Size		None	None	Medium	High	
Environmental Effects		Trivial	Trivial	Low	Other	
Anticipated Numbers	Users	Low	Low/Medium	Medium	High	
	Vehicles	N/A	Low	Medium	High	
Oversight		None	None/Low	Low	High	
Mechanical Equipment		N	N or Y	Y	Y	
Examples		NOLS, wilderness outfitting	Outfitting, small tours, land sailing, film permits	Golf tournament, most rocket events, large tours	Large Rocket launches, Land speed trials, Burning Man	



Appendix M: Description of the Scientific Working Group





Appendix M: Description of Scientific Working Group

Science Partnership Center of Black Rock Desert-High Rock Canyon Emigrant Trails National Conservation Area

The Black Rock Desert–High Rock Canyon Emigrant Trails National Conservation Area (BRD-HRC NCA) offers the scientific community a unique opportunity to participate in a variety of research activities based on the geological, ecological, cultural, historical, and economic features of this region. The Bureau of Land Management proposes to establish the **Science Partnership Center** (SPARC) of BRD-HRC NCA to provide a place and an environment designed to expand the science needed to understand and manage these resources. SPARC would have the core mission to encourage and facilitate a research partnership in which the scientific community, the resource managers, the resource users, and the general public can pursue a common goal of learning more about what the NCA contains, how it got this way, how it functions, and how it can best be appreciated and managed.

Although formed and sited within the structure of the NCA, SPARC would function as a neutral focal point for the exchange of information and ideas. Further, SPARC would provide an open door, or perhaps gate, to a rich and still largely unknown desert and mountain world, through which science can freely move, in both directions. Anyone wishing to pursue serious scientific inquiry which would be enhanced by access to the NCA, and would be supportive of the mission of SPARC, would be welcome to join the partnership. SPARC would be able to coordinate selection, designation and protection of field research sites for approved projects. In partnership with funding sources SPARC would provide sponsored internships and facilities for on-site research projects. SPARC would also host an annual conference for presentation and discussion of research results. A wide range of research projects could result from the SPARC initiative. Examples might include:

- Landscape ecology in the context of long-term geologic processes.
- Ecological impacts of mechanical land disturbances on soil surface features and plant communities in shrubland zones of the NCA.
- Pleistocene hydrology and relationships to then-contemporary and subsequent biology of region.
- Constraints on sustainability of current and proposed land uses in the NCA.
- Role of soil cryptophytes in stability and productivity of Great Basin desert ecosystems.
- Competition for range forage among livestock and other large herbivores.
- Range vegetation changes since late 1800's in relationship to range fires and livestock grazing.
- Long-term role and management of livestock grazing in wilderness areas.
- Management responses to public interest in Wild Horse and Burro program.

Appendix M: Description of Scientific Working Group

- Noxious weed control strategies for wilderness and non-wilderness areas.
- Economic impacts of intensive development of remote desert resources.
- Evaluation of locally native vs. exotic plants for rangeland rehabilitation.
- Relationships between livestock grazing and sage grouse reproduction.
- Ecologic and economic implications of wildlife re-introductions in the NCA.
- Aeolian influences on plant geography of the Black Rock Desert region.
- Human habitation near Pleistocene lakes of Black Rock Desert region.
- Concerns of, and for, Native American land resource interests in the NCA.
- Carrying capacity of cold desert landscapes for recreation uses and visitors.
- Public perceptions of relationships and impacts among multiple uses of NCA.
- Roles of public interest groups in management of NCA land resources.
- Long-term "outdoor" laboratory and classroom values of NCA.
- Actual and potential roles, both collaborative and conflicting, of federal, state, and local government authorities, plus private entities, in the control and management of NCA resources for scientific and educational purposes.
- Design and management of visitor information and accommodation facilities for the Black Rock Desert-High Rock Canyon Emigrant Trails NCA.
- Opportunities for expansion of private-sector visitor services for the NCA.

Objectives

- 1. To encourage and facilitate a research partnership in which the scientific community, the resource managers, the resource users, and the general public can pursue a common goal of learning more about what the NCA contains, how it got this way, how it functions, and how it can best be appreciated and managed.
- 2. To provide both a physical administrative location and a philosophical administrative commitment to support inquiry into the natural, social, and cultural phenomena which determine the uses and future of our land resources.

Rationale

Sound management of the NCA planning area depends on the availability and application of reliable information. To make land use decisions managers choose and use information of variable reliability from many sources. For a given level of managerial skill and professional judgment, the outcome of land use decisions could well depend on the completeness and quality of the supporting information on which they are

Appendix M: Description of Scientific Working Group

based. Good resource information can be the key to good resource management. Few land resource managers would declare that they had too much, or even enough, good information about their region of concern. This newly-established NCA certainly qualifies as a place about which land managers do not have more reliable, relevant land resource data than they can use.

Encouragement and support of independent research into questions related to the NCA could directly and materially improve the management of NCA resources and programs. The challenges of managing a complex system of inter-related physical, biological, social, cultural, political and economic elements will be an open-ended, ongoing process of seeking and applying good decisions. Good decisions are usually based on what has come to be labeled as "good science." SPARC would be dedicated to providing an environment and an attitude where "good science" would be at home.

Proposed Actions

- 1. Develop a working advisory board (or committee) drawn primarily from the scientific community, but with representation from other members of the public with an interest in the objectives of SPARC.
- 2. Communicate actively with the public to encourage participation.
- 3. Coordinate research activities for approved projects within NCA.
- 4. Sponsor an annual conference for presentation of research results.
- 5. Facilitate working sessions to transfer research results to managers.
- 6. Invite public feedback on objectives and results of SPARC activities.

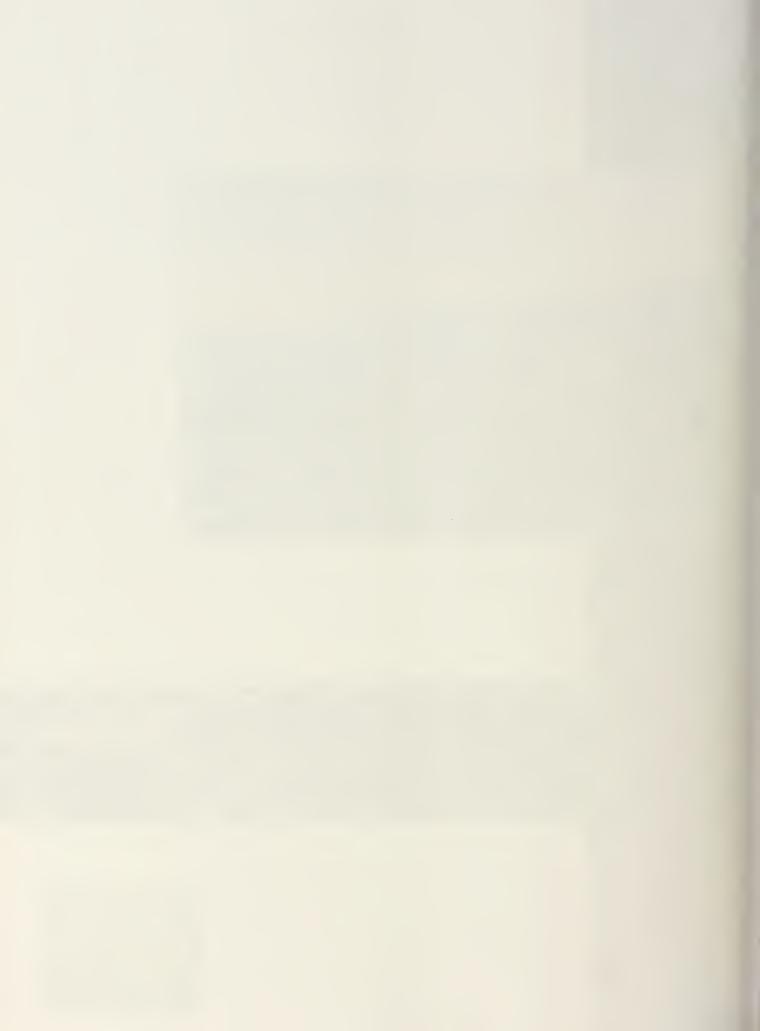
This Page Intentionally Left Blank



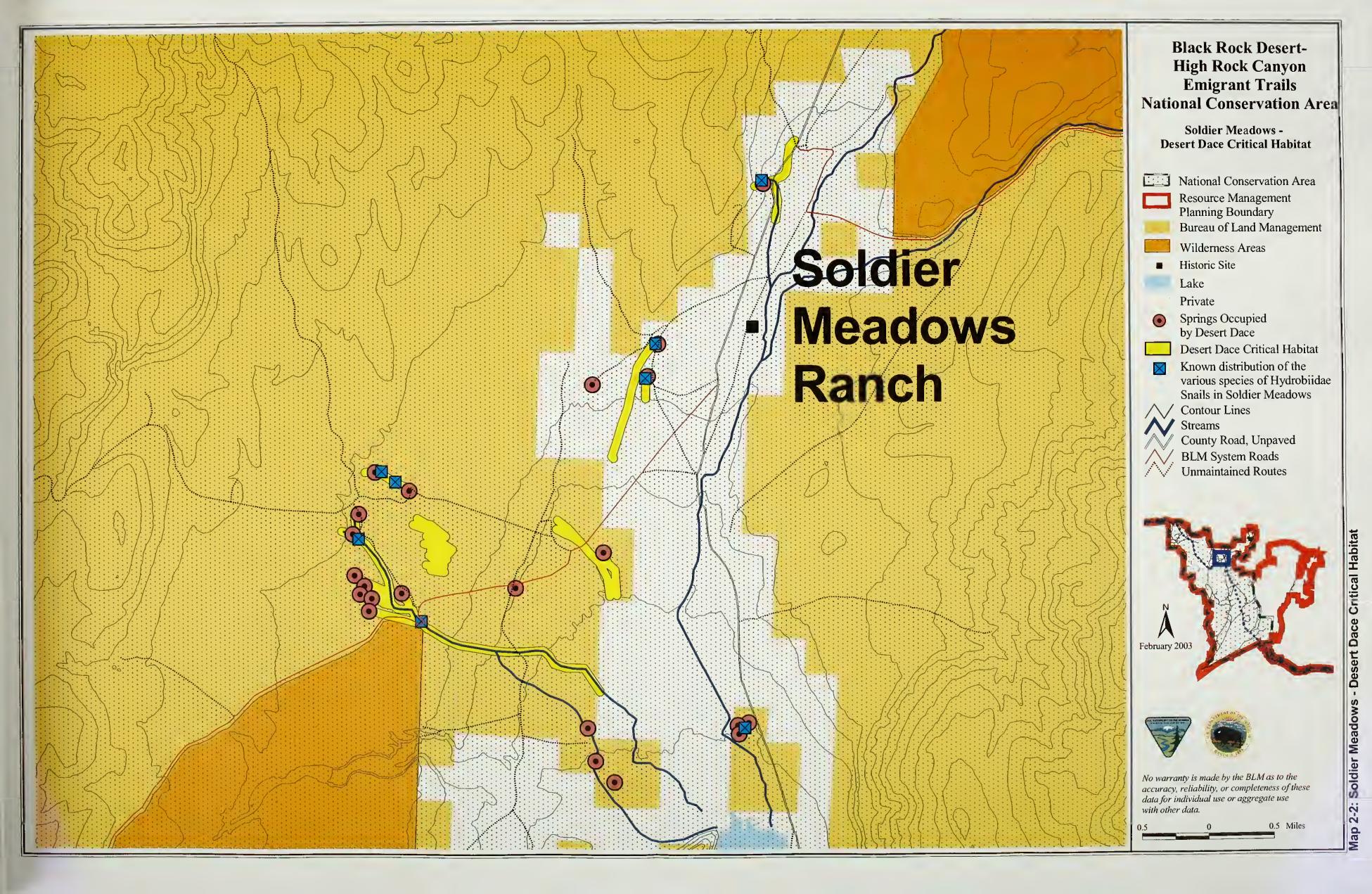
Maps

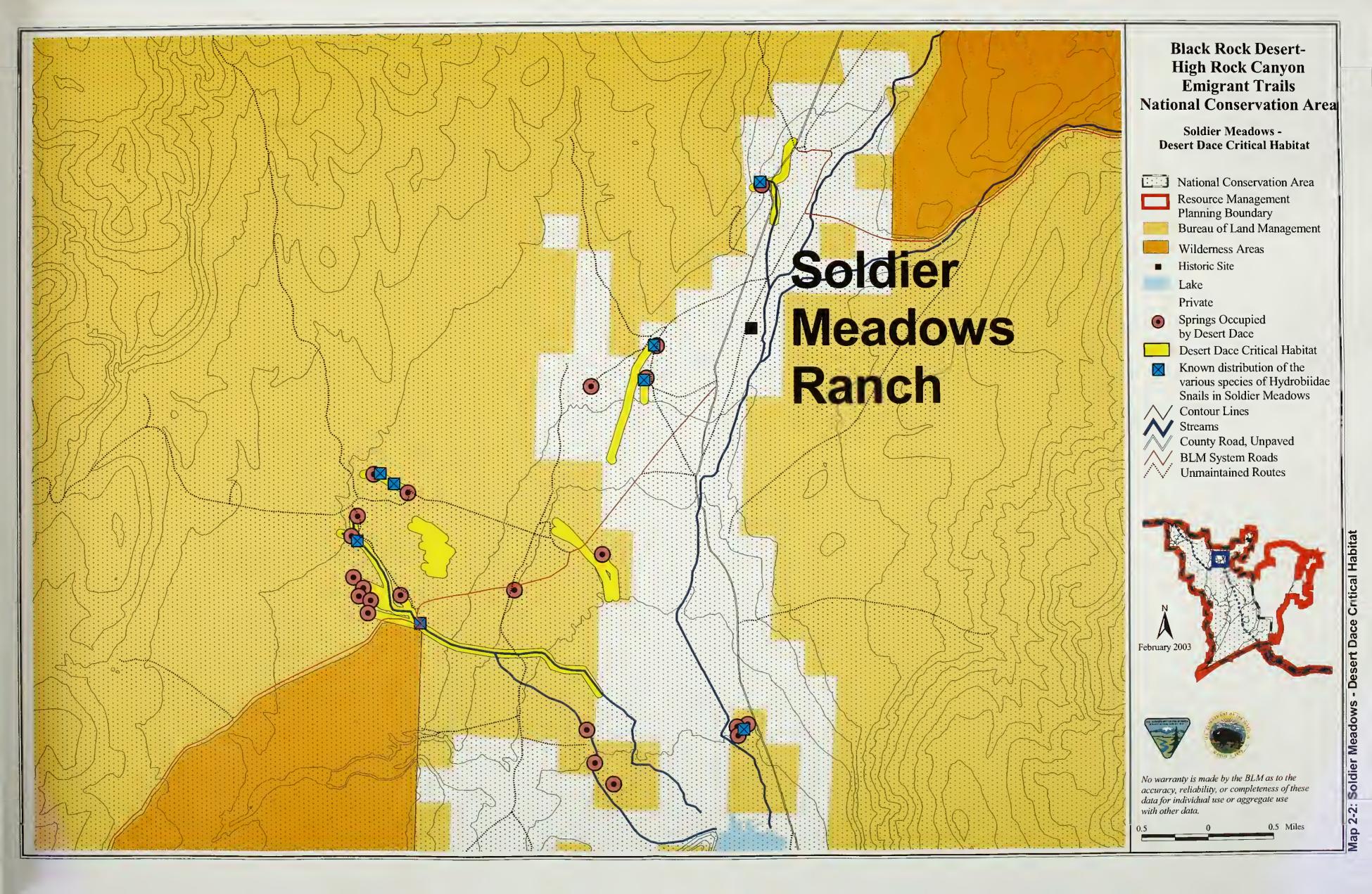
BLACK ROCK DESERT HIGH ROCK CANYON EMIGRANT TRAILS

NATIONAL CONSERVATION AREA

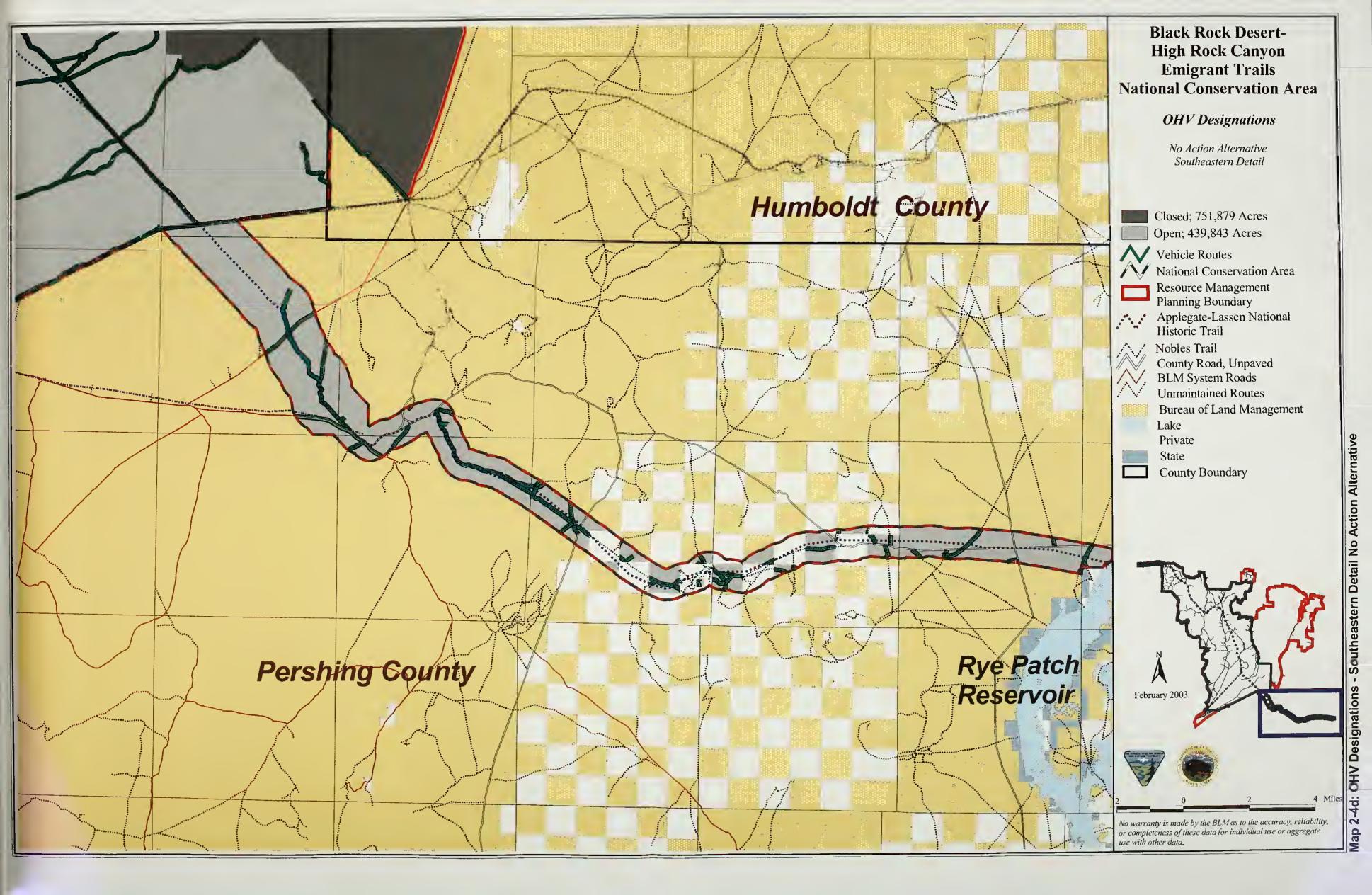


ap 1-1: Reference Map

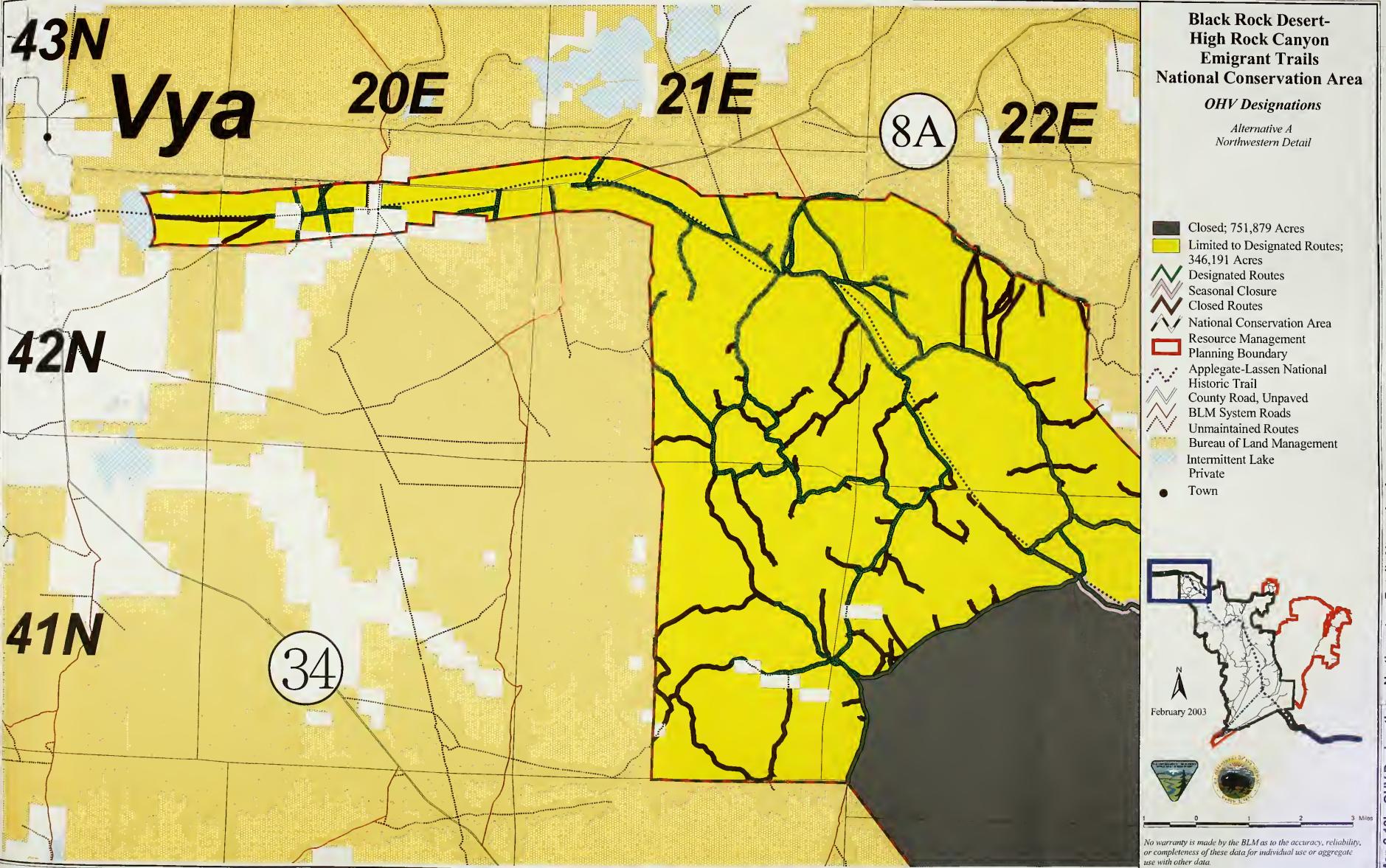




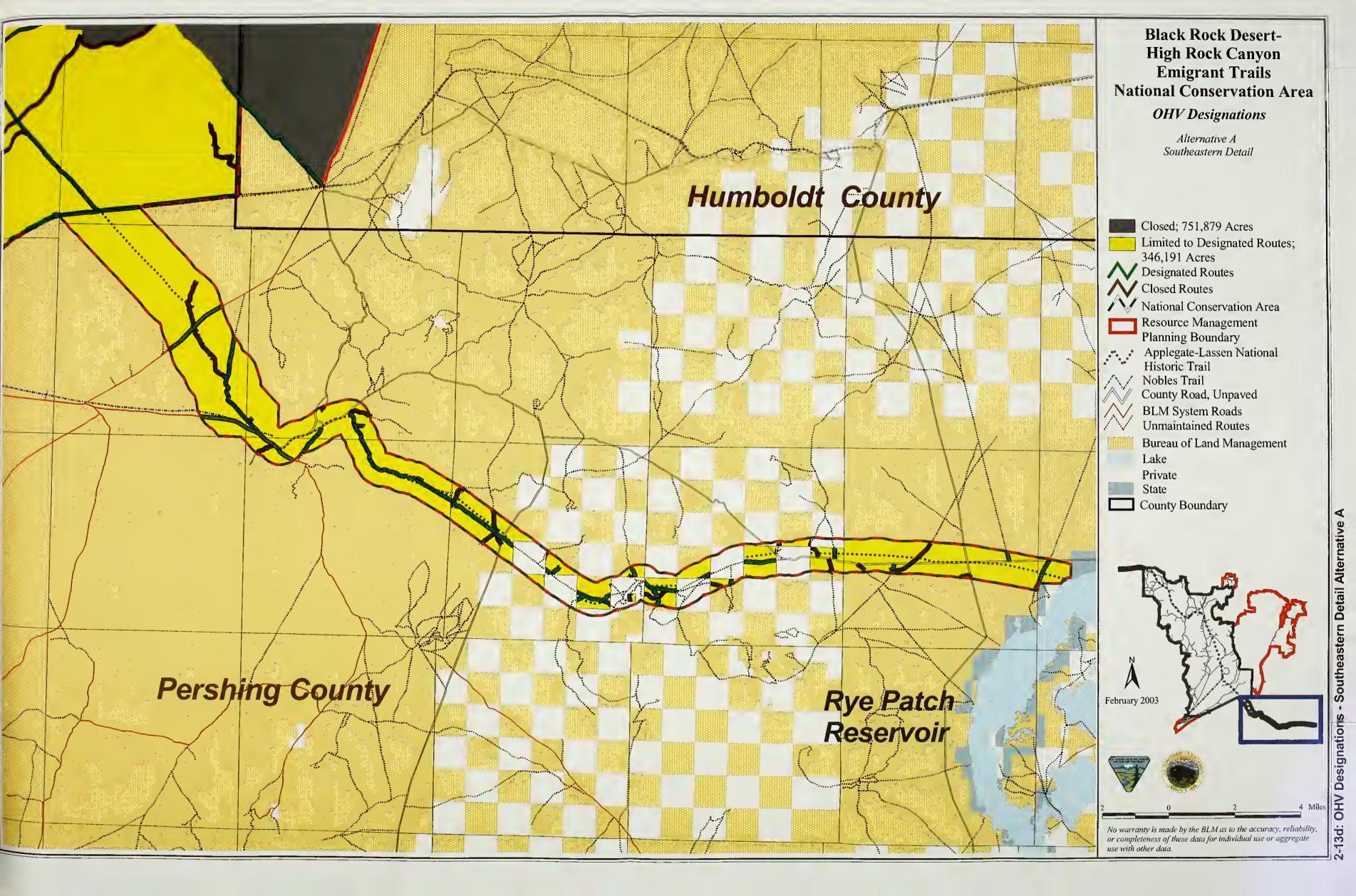
Map 2-4a: OHV Designations No Action Alternative



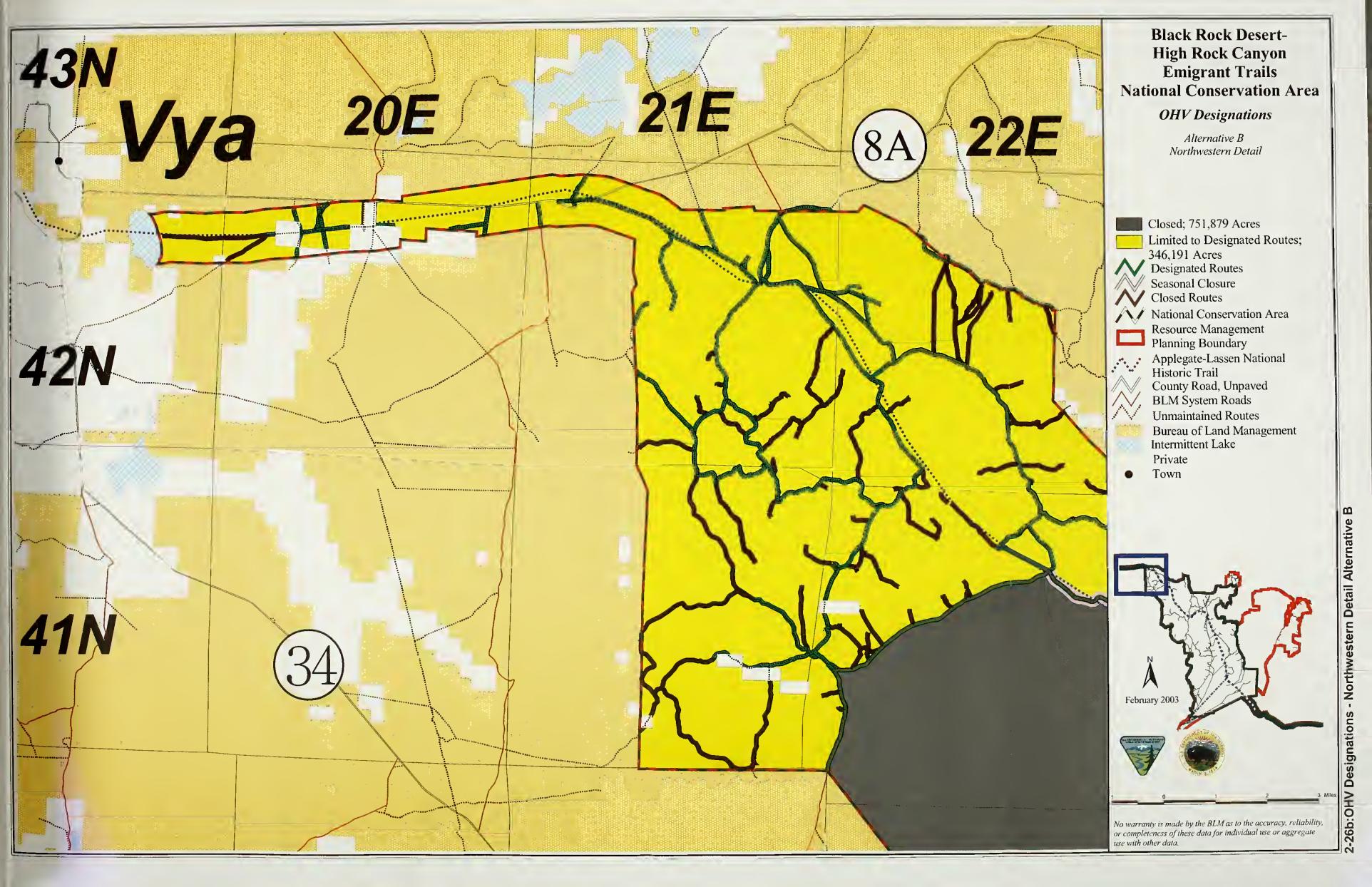
Map 2-13a: OHV Designations Alternative A

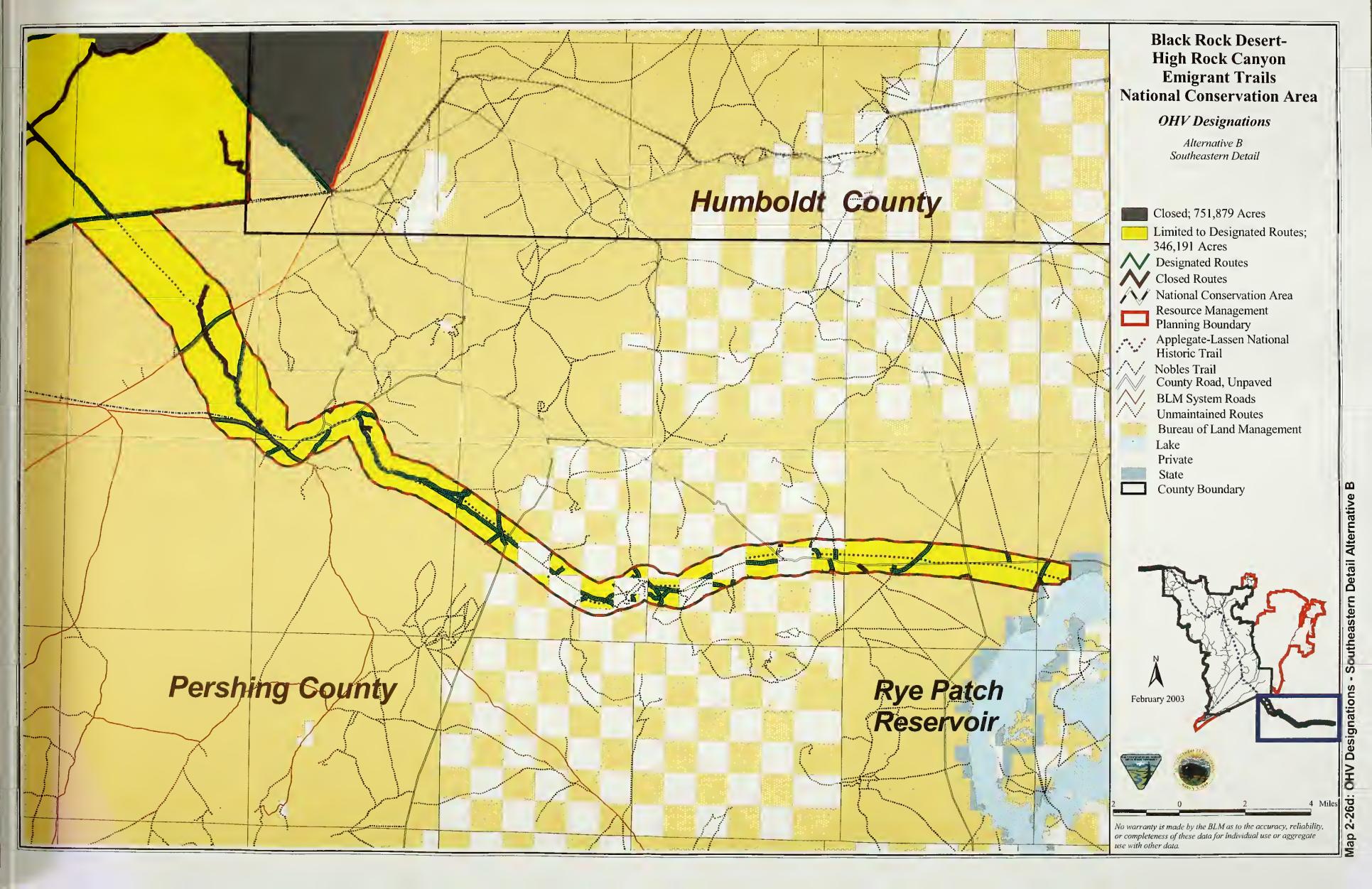


2-13b: OHV Designations -Northwestern Detail Alternative A

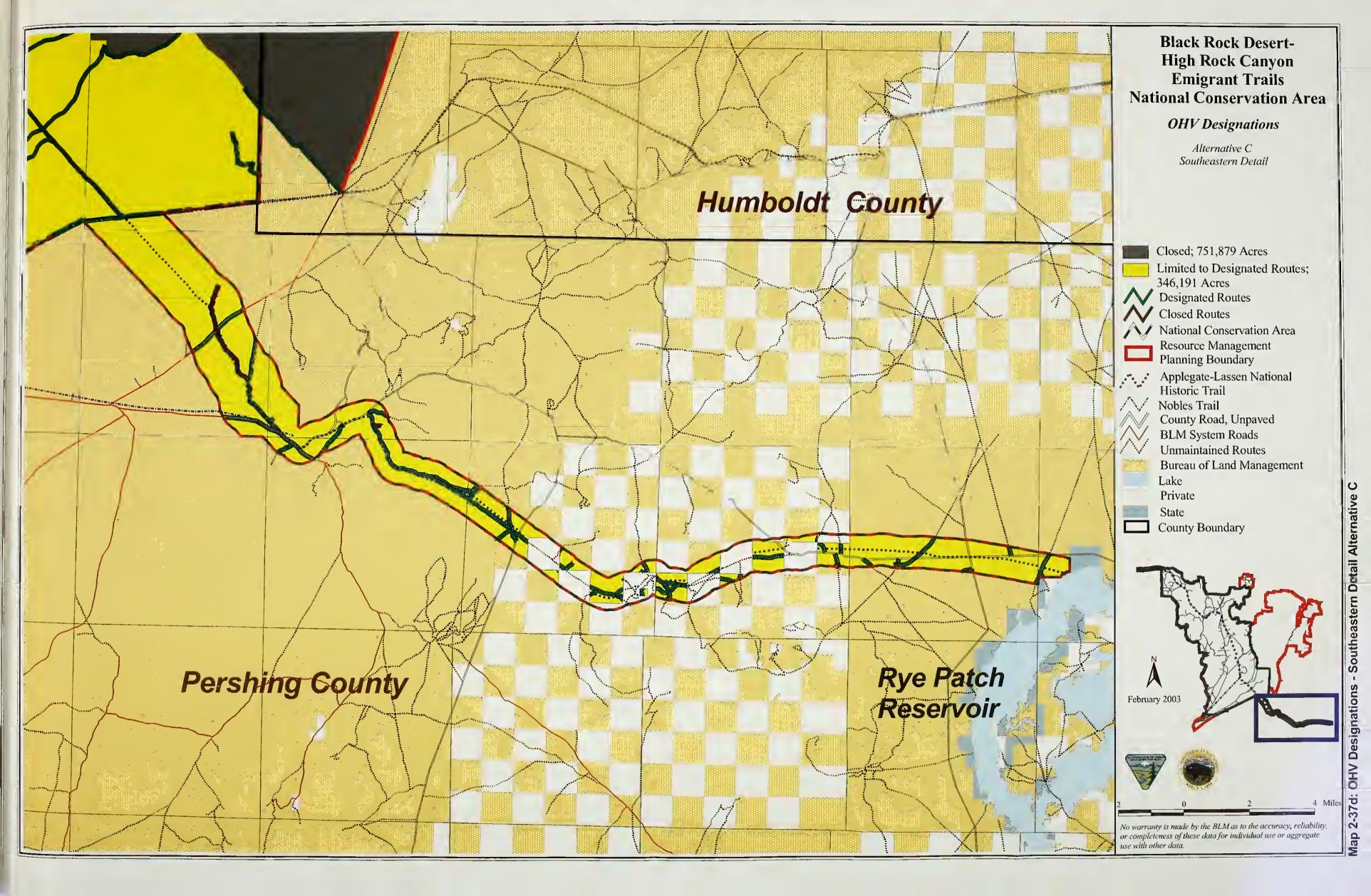


Special Camping Designations Alternative A

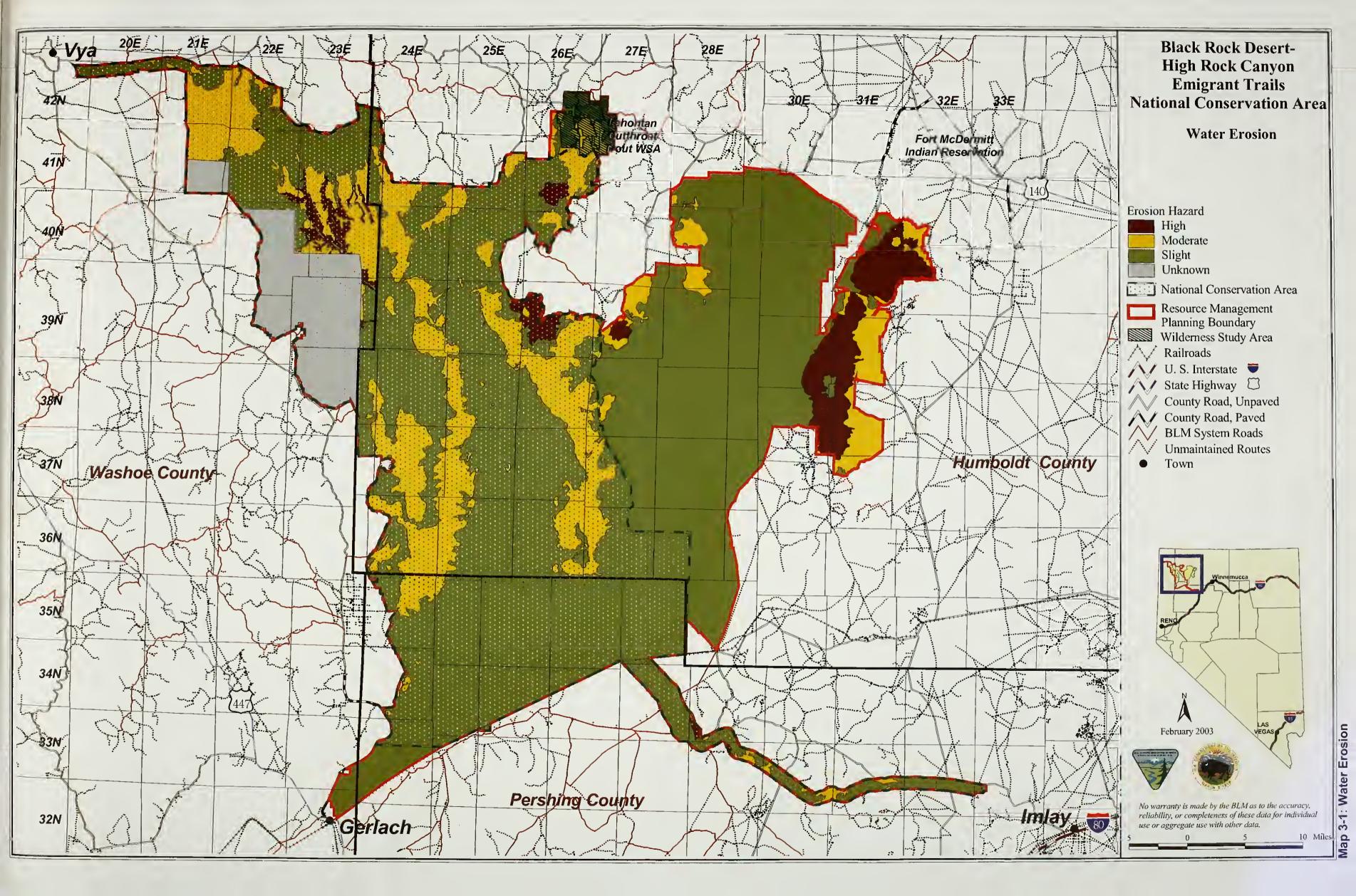


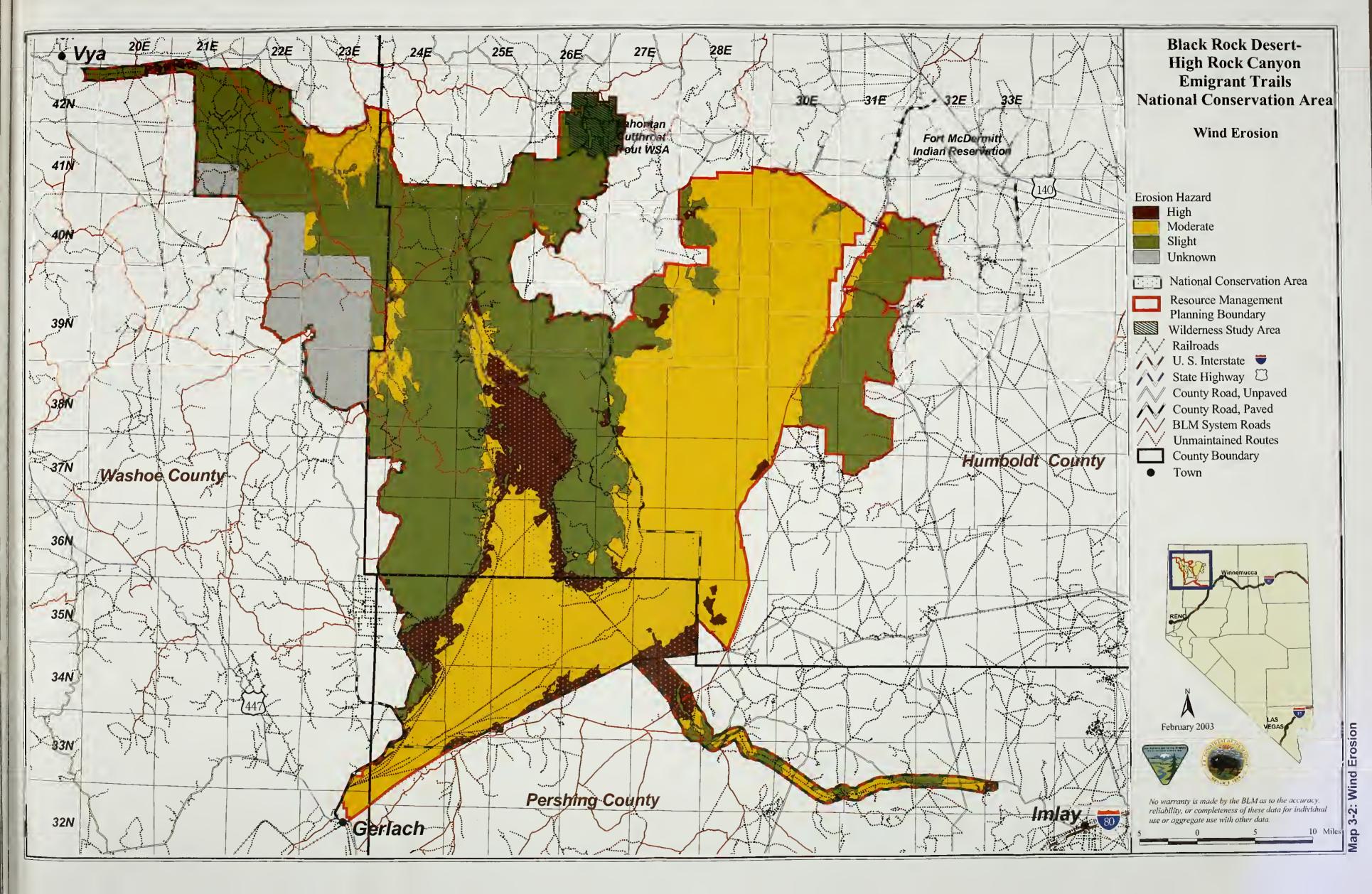


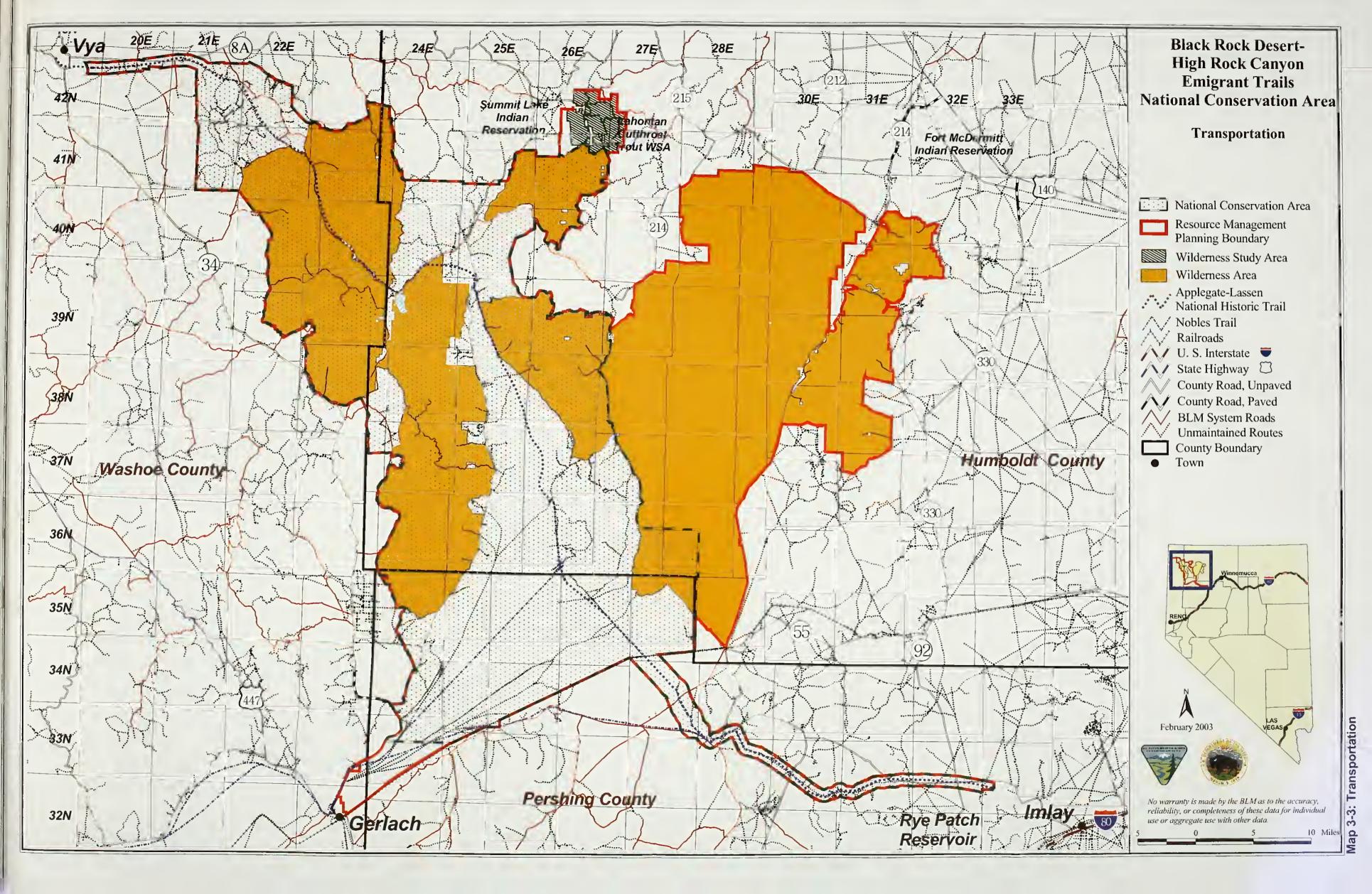
OHV Designations Alternative C

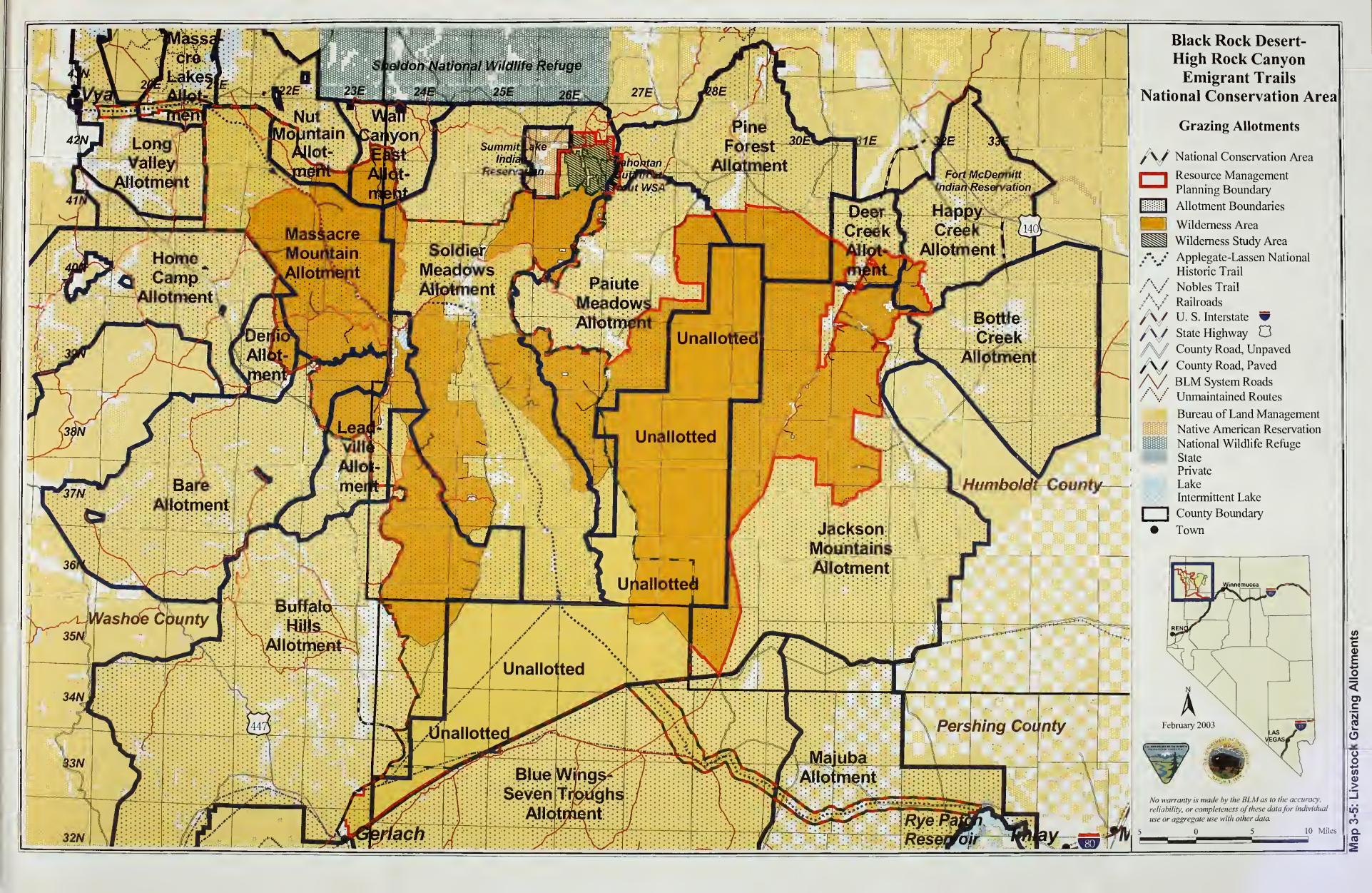


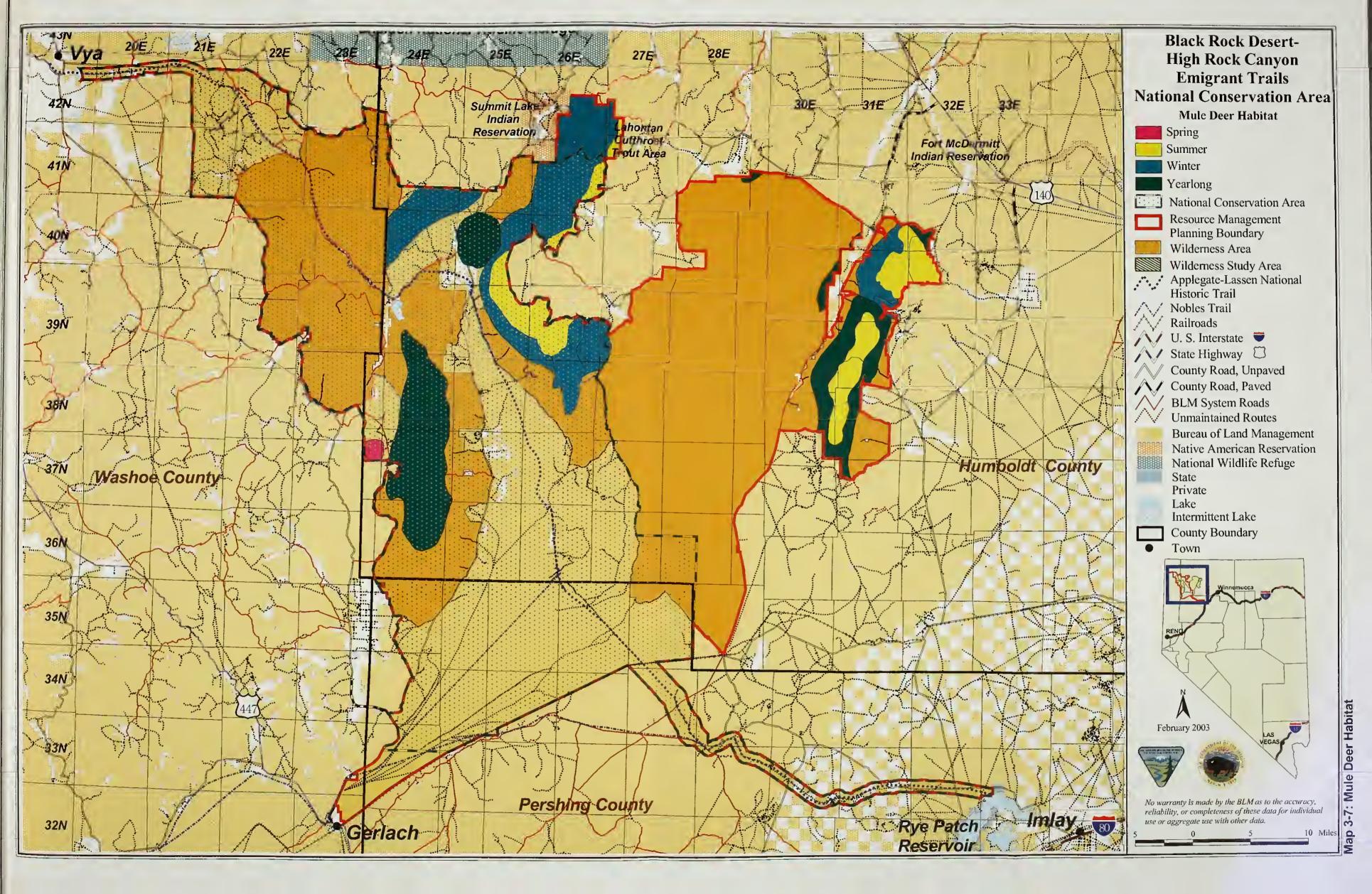
lap 2-41: Saleable Minerals Management Alternative C

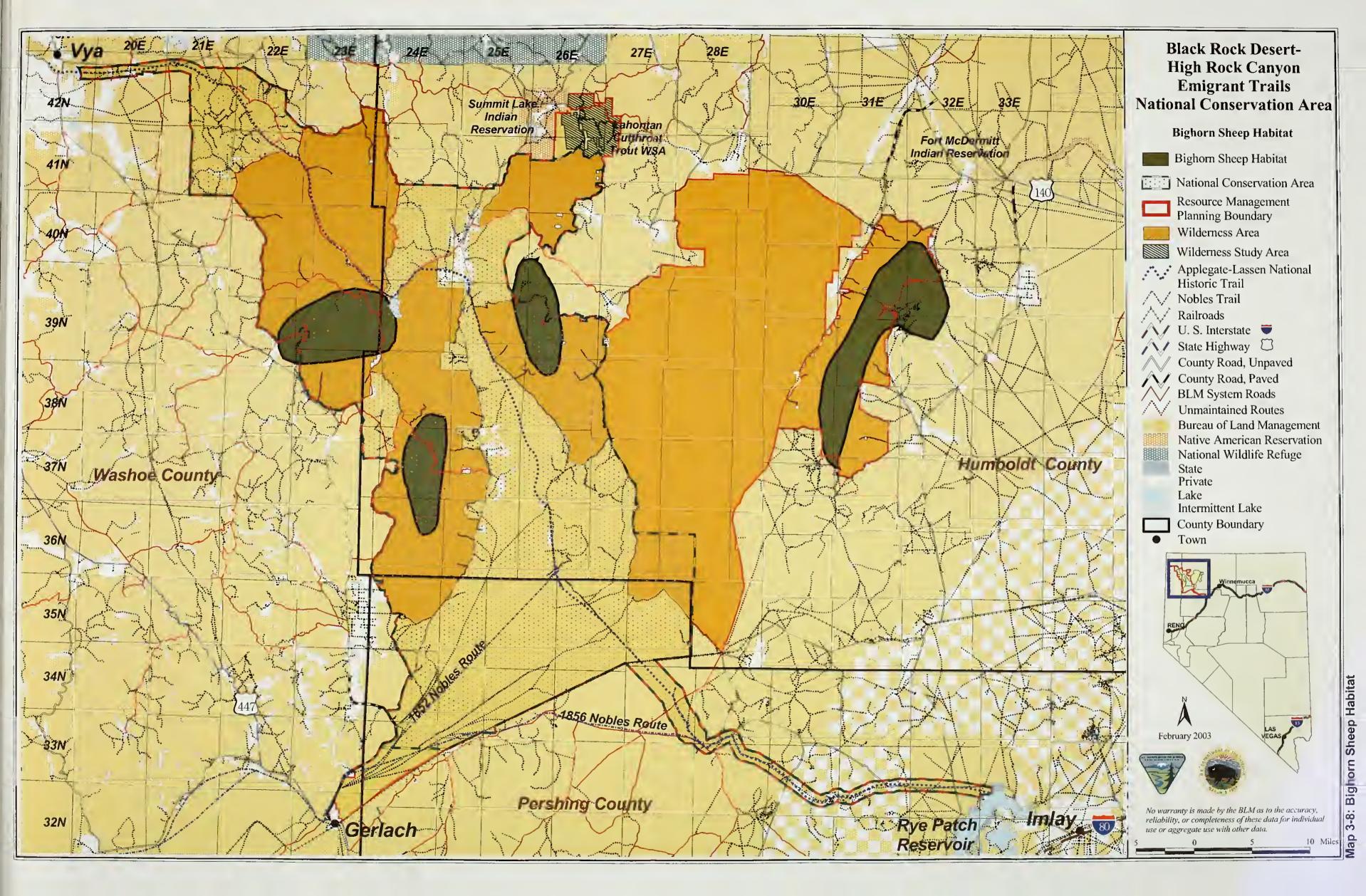


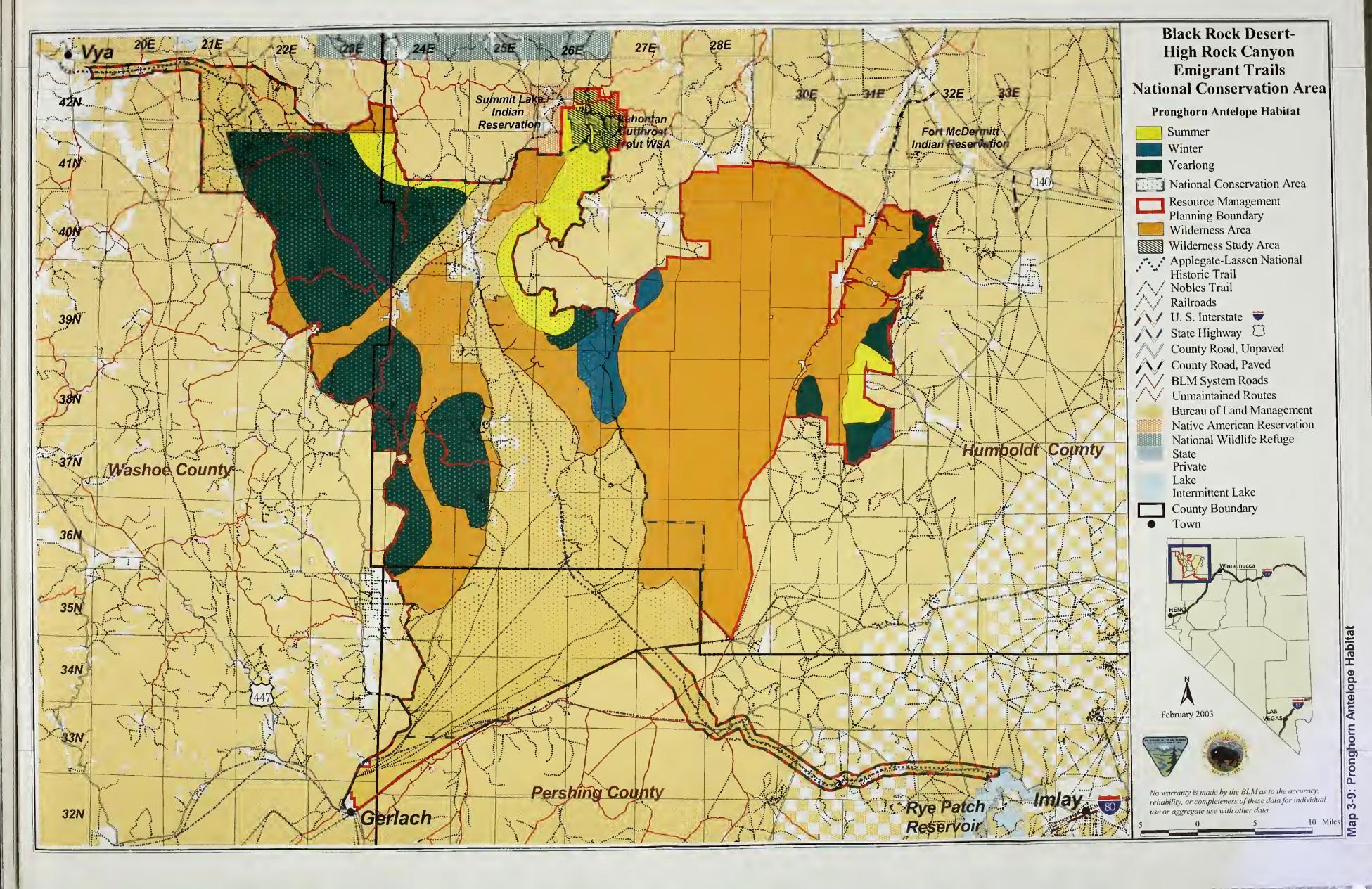


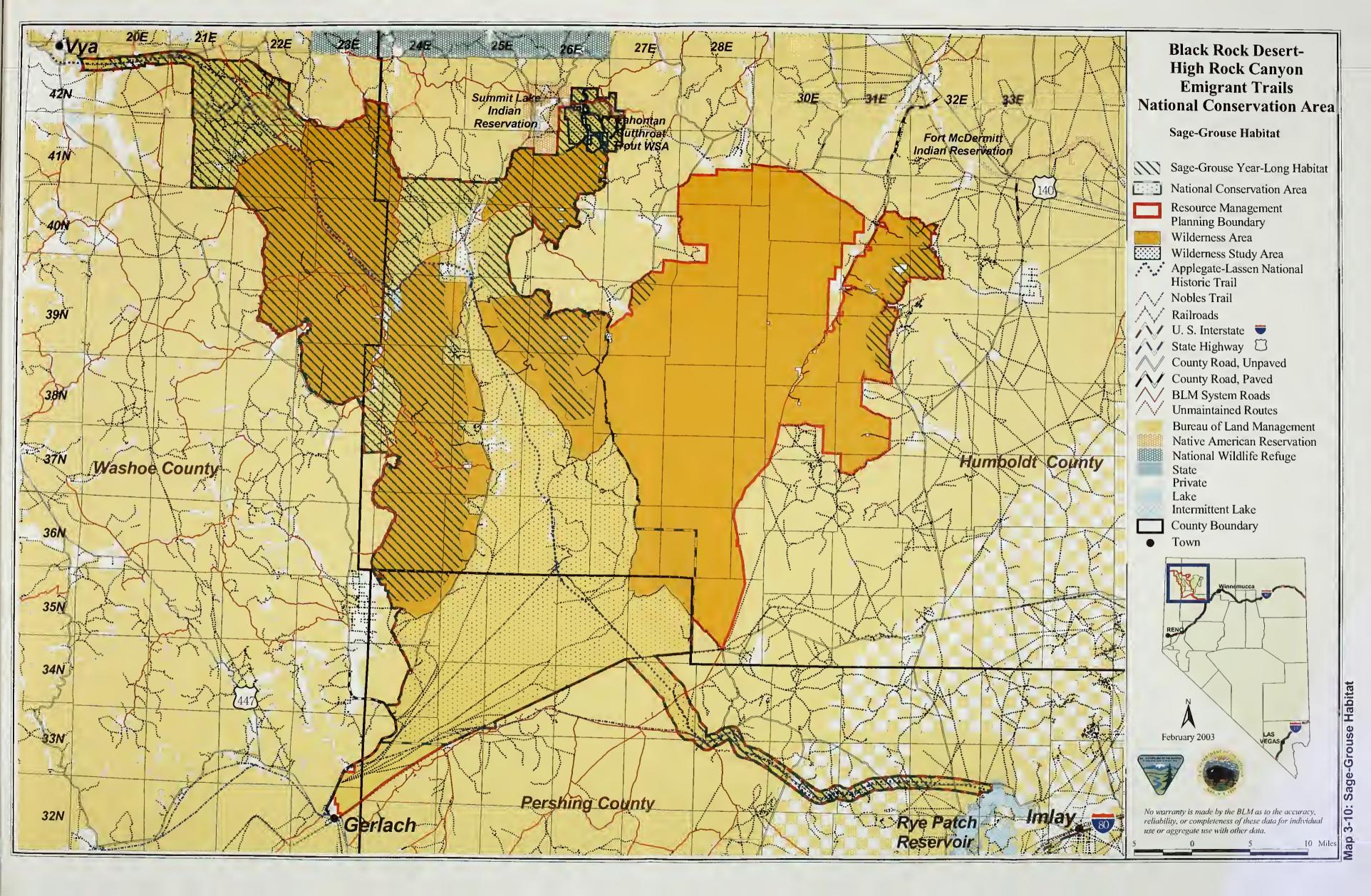


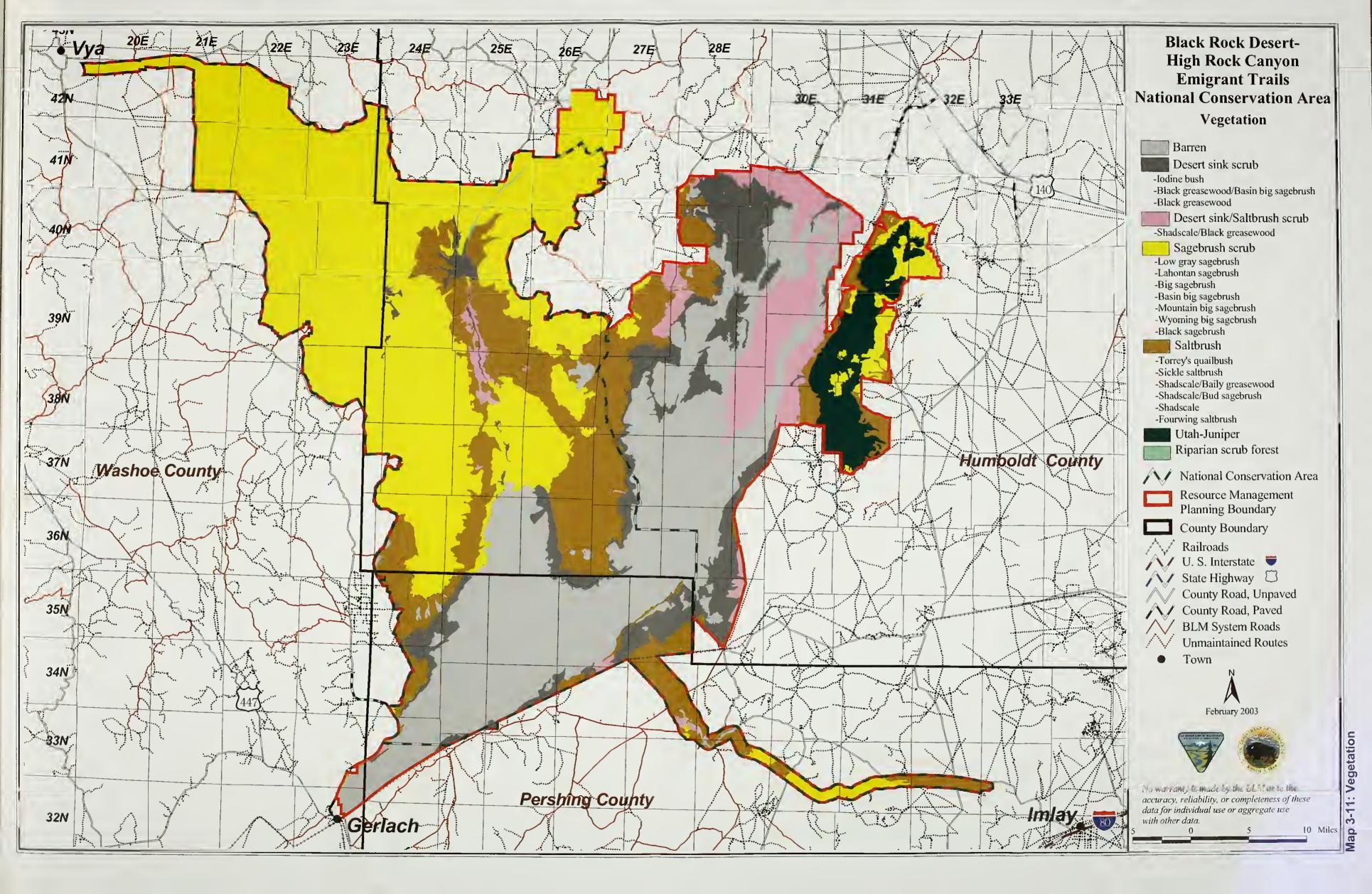












3-12: Visual Resource Management

