CHAPTER 1
PURPOSE AND NEED

PURPOSE AND NEED FOR THE PLAN AMENDMENT

Public lands administered by the Bureau of Land Management (BLM) are managed under land use plans which require periodic updating. The land use plans that provide direction for livestock grazing and rangeland management for most of the areas administered by the Grand Staircase-Escalante National Monument (GSENM) were completed in 1981 and are more than 20 years old. This Rangeland Health Plan Amendment (further referenced as Plan Amendment) updates the grazing portion of these older land use plans. These plans need updating to reflect changes in resource conditions, revisions to grazing regulations, updates and/or amendments to allotment management plans, and the requirements of legal proceedings and court rulings.

The existing land use plans providing direction for livestock grazing include the Escalante, Paria, Vermilion, and Zion Management Framework Plans (MFPs) along with the more recent Monument Management Plan (MMP). The Monument Management Plan prepared for the GSENM (2000) covers most of the lands in the planning area. Because the MMP did not address most of the prior livestock grazing decisions, these earlier plans continue to govern livestock use and rangeland management. This Plan Amendment will allow the integration of livestock and rangeland management with the other resources in the MMP. Decisions for livestock grazing and rangeland management on lands in the planning area outside of GSENM would be integrated into the 2008 Kanab Resource Management Plan (RMP).

The GSENM also administers livestock grazing on lands managed by the National Park Service (NPS) within Glen Canyon National Recreation Area (GCNRA) as well as lands within BLM's Kanab and Arizona Strip Field Offices through inter-agency agreements. This Plan Amendment will incorporate current plans or portions of plans prepared by those agencies that address livestock grazing.

The purposes of this proposal are to:

- Integrate decisions for livestock and rangeland management into the GSENM MMP through a plan amendment.
- Revise GSENM MMP sections affected by rangeland management to integrate livestock grazing into existing resource management.
- Update and amend livestock management decisions in land use plans for non-GSENM lands where GSENM has grazing management responsibility.
- Provide the management direction necessary to ensure that public lands are achieving or making progress towards achieving Rangeland Health Standards.

This proposal is needed to:

- Renew livestock grazing permits.
- Update allotment management plans.
- Consider proposed Glen Canyon National Recreation Area grazing management actions.

- Allocate multiple resources to resolve conflicts.
- Incorporate current resource condition inventories into land use decisions.
- Fulfill the mandates of the GSENM Proclamation, and the GSENM Monument Management Plan.

BACKGROUND

Pursuant to BLM policy and regulations, as well as Federal law, BLM is required to assess whether public lands are achieving Rangeland Health Standards and complete the appropriate environmental review prior to renewing grazing permits. An interdisciplinary team has developed this Plan Amendment/Draft Environmental Impact Statement (DEIS) for the purpose of analyzing the potential effects of livestock grazing on resources that may be affected in the planning area. This approach is needed to ensure that all management actions on public land conform to the appropriate regulations and planning guidance, and balances the use between different resource values.

Where current land use plan decisions have been found to be valid, they are brought forward as valid existing management determinations. Where current land use plan decisions have been found to be outdated, new management actions are proposed and analyzed in this DEIS. If changes in the terms and conditions of existing grazing permits are required, the permits would be reissued with modified and/or additional terms and conditions.

Recognizing that completing the environmental review requirements for all grazing allotments would take some years to accomplish, starting in 1999 Congress enacted a series of Public Laws allowing BLM to issue new grazing permits for those permits expiring in Fiscal Years 1999 through 2008, with the same terms and conditions contained in the expired permits, pending ". . . processing of such permit[s] . . . in compliance with all applicable laws and regulations." Agency policy was that "compliance with all applicable laws and regulations" included consultation, coordination and cooperation with affected individuals, interested publics, States, Indian Tribes, and other land managing agencies; completion of the applicable level of National Environmental Policy Act (NEPA) review; and consultation with the United States Fish and Wildlife Service (USF&WS) under Section 7 of the Endangered Species Act prior to issuing new grazing permits. Grazing permits renewed under the authority of these Public Laws, which became known as BLM's authority to renew permits under the appropriations rider, can be modified if the above analysis and consultation processes indicates a change was warranted.

Grazing permits within the Grand Staircase-Escalante National Monument (GSENM), and those allotments outside the GSENM but administered by GSENM, have been renewed for up to 10 years upon application pursuant to the provisions of the appropriations rider language until such time that NEPA analysis and compliance with other laws and regulations can be completed.

Livestock grazing is an accepted and valid use of the public land as provided for by the Taylor Grazing Act of 1934 (TGA), the Federal Land Policy and Management Act of 1976 (FLPMA),

and the Public Rangelands Improvement Act of 1978 (PRIA). Grazing regulations require that the BLM pursue an integrated approach to processing grazing permits and leases. The BLM is responsible for ensuring that all management actions on public land conform to the appropriate land use plan(s), that required National Environmental Policy Act (NEPA) analyses are completed, and that public land uses are balanced between competing resource values. The impacts of renewing grazing permits often are analyzed in individual, allotment-by-allotment, Environmental Assessments (EAs). This Plan Amendment/EIS has been prepared instead of preparing individual EAs for the 82 allotments administered by GSENM. The Plan Amendment/EIS analyzes cumulative impacts of BLM's grazing program on these allotments and provides site specific analysis and management direction for individual allotments.
This Plan Amendment/EIS proposal would support two tiers of decision-making. The first tier is a planning decision that would amend the current GSENM management plan. The second tier consists of implementation decisions that would authorize the renewal of grazing permits on the GSENM.

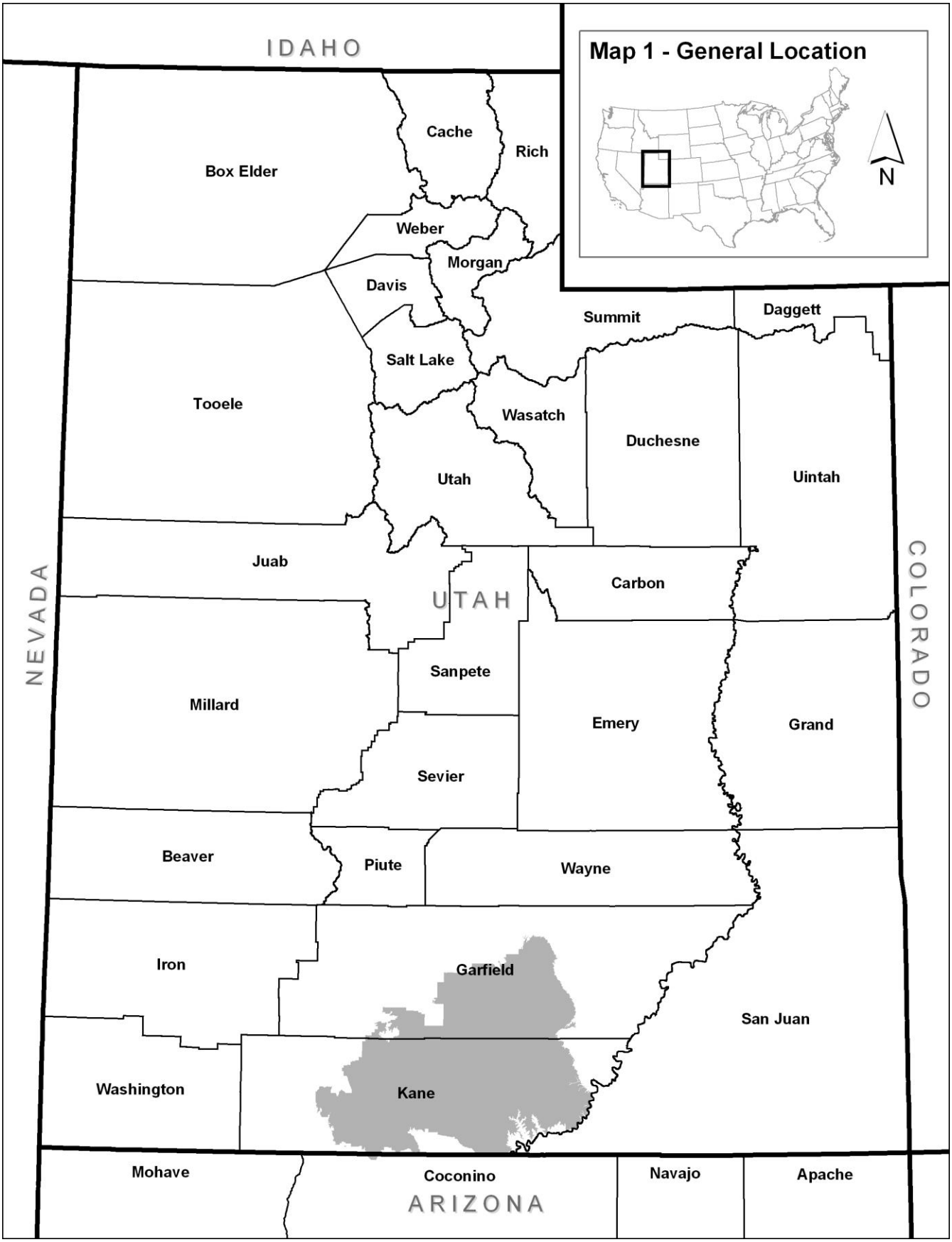
The legislation creating Glen Canyon National Recreation Area (Public Law 92-593, October 27, 1972) authorized livestock grazing within the Recreation Area. This law provides that grazing permits will be administered by the BLM following the same regulations and policies as on the adjacent lands under BLM jurisdiction subject to requirement that the Secretary administer, protect, and develop the recreation area in accordance with the National Park Service (NPS) Organic Act, as amended and supplemented, and with any other statutory authority available to the Secretary for the conservation and management of natural resource to the extent the Secretary finds such authority will further the purpose of the act. The purpose of Glen Canyon National Recreation Area is to provide for public outdoor recreation use and enjoyment of Lake Powell and lands adjacent thereto in the States of Arizona and Utah and to preserve the scenic, scientific, and historic features contributing to public enjoyment.

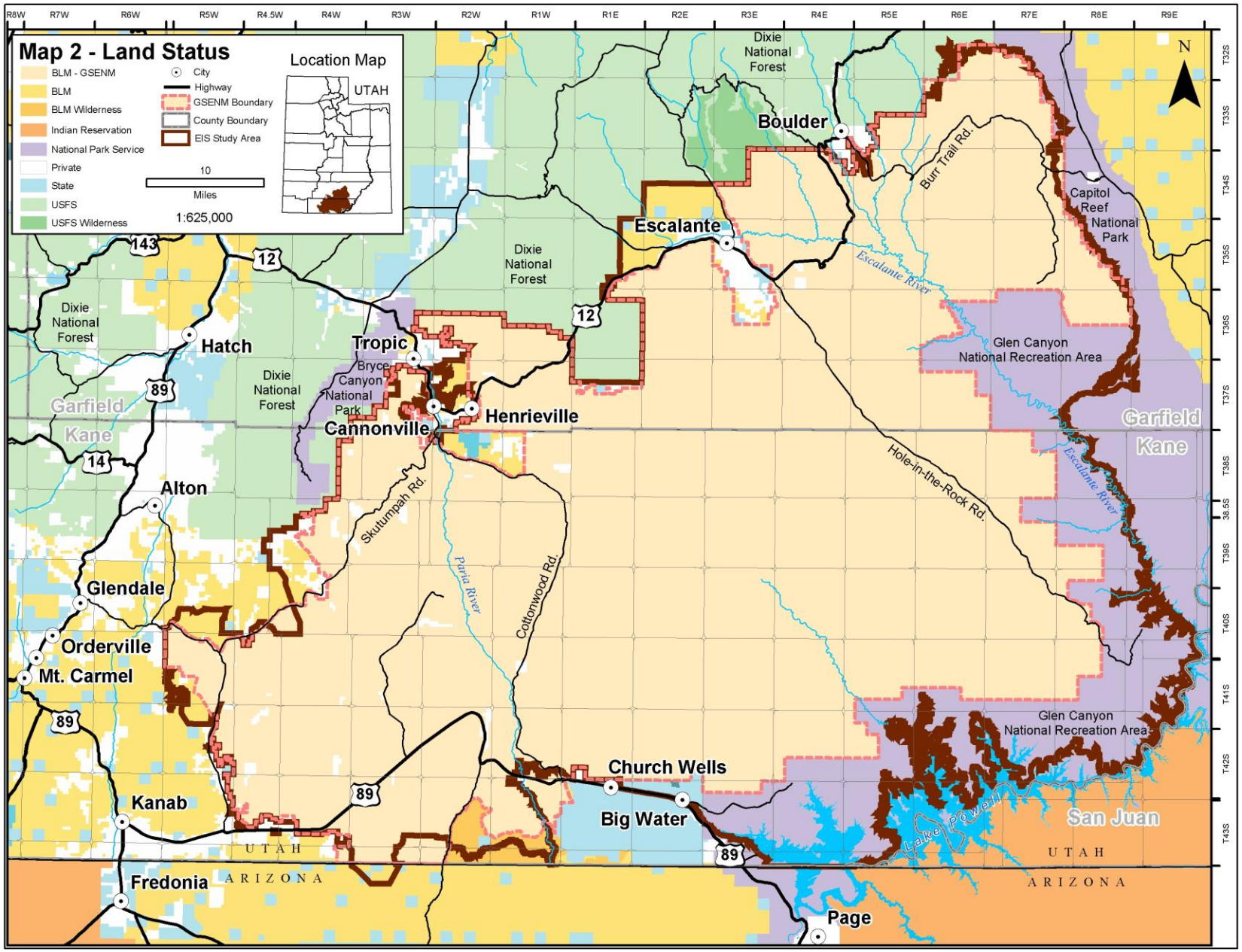
DESCRIPTION OF THE PLANNING AREA

The planning area includes all lands for which the GSENM office has grazing management responsibility. This includes most of the lands within GSENM, additional lands within the BLM's Kanab and Arizona Strip Field Offices, Glen Canyon National Recreation Area (GCNRA), and non-GSENM BLM lands (totaling approximately 2,168,726 acres of Federal land) near the communities of Escalante, Cannonville, and Tropic, Utah. As a result, the GSENM, the Kanab and Arizona Strip Field Offices, and the GCNRA have intra- or inter-agency agreements to address management and/or permit administration for certain grazing allotments. Map 1 shows the planning area boundary (where GSENM administers livestock grazing) and Map 2 identifies the underlying administrative units.

Grand Staircase-Escalante National Monument was established on September 18, 1996 when President William Jefferson Clinton issued a Proclamation under the provisions of the Antiquities Act of 1906. It was created to protect a vast and austere landscape that embraces a spectacular array of scientific and historic objects, including objects of geological, paleontological, biological, archaeological, cultural and historical value. The boundaries of GSENM do not follow all BLM administrative or livestock grazing allotment boundaries. Thus grazing management

responsibilities for some lands within the GSENM are, through agreement, handled by the BLM's Kanab and Arizona Strip Field Offices. These lands are not included in the planning area for this assessment.


Map 1 - General Location
N
IDAHO
NEVADA
COLORADO
UTAH
ARIZONA
Box Elder
Cache
Rich
Weber
Morgan
Davis
Summit
Daggett
Salt Lake
Tooele
Wasatch
Duchesne
Uintah
Utah
Juab
Carbon
Sanpete
Millard
Emery
Grand
Sevier
Beaver
Piute
Wayne
Iron
Garfield
San Juan
Washington
Kane
Mohave
Coconino
Navajo
Apache


Map 2 - Land Status
BLM - GSENM
BLM
BLM Wilderness
Indian Reservation
National Park Service
Private
State
USFS
USFS Wilderness
City
Highway
GSENM Boundary
County Boundary
EIS Study Area
10
Miles
1:625,000
Location Map
UTAH
R8W
R7W
R6W
R5W
R4.5W
R4W
R3W
R2W
R1W
R1E
R2E
R3E
R4E
R5E
R6E
R7E
R8E
R9E
T32S
T33S
T34S
T35S
T36S
T37S
T38S
38.5S
T39S
T40S
T41S
T42S
T43S
N
Dixie National Forest
Boulder
Burr Trail Rd.
Capitol Reef National Park
Escalante
Escalante River
Glen Canyon National Recreation Area
Garfield
Kane
Hole-in-the-Rock Rd.
Hatch
Tropic
Bryce Canyon National Park
Henrieville
Cannonville
Alton
Skutumpah Rd.
Paria River
Cottonwood Rd.
Glendale
Orderville
Mt. Carmel
Church Wells
Big Water
Kanab
Fredonia
Page
Lake Powell
San Juan
UTAH
ARIZONA
143
12
89
14

CHAPTER 1
PURPOSE AND NEED

ISSUE IDENTIFICATION PROCESS

The first step in the planning process was to invite public participation in the identification of planning issues. This "Scoping" process began with publication of the Notice of Intent to prepare an Environmental Impact Statement, which appeared in the Federal Register on August 31, 2000 (Volume 65, No. 170, Pgs. 53028-53029). The public was invited to comment on issues they felt were significant which should be addressed in the Environmental Impact Statement.

The scoping process also invited public input through a mailed questionnaire, the internet, and public workshops. Three public workshops were held in September and October 2000. About 1,200 scoping comments were received. Scoping will continue throughout the process of developing the Plan Amendment through additional comments received through newsletters, meetings, and workshops. A complete outline of the scoping process is found in Chapter 5.

One of the most important outcomes of the scoping process was the identification of the significant issues to be addressed in the EIS. For the purposes of this EIS, an "issue" is defined as a matter of controversy, dispute, or general concern over resource management activities or land uses. Issues can help focus the data collection and inventory efforts, identify areas of concern, conflict or controversy, and limit the scope of analysis.

ISSUES ASSESSED, BUT NOT CONSIDERED FURTHER

Several issues were identified during the assessment process or are required to be addressed by Federal statute, but were not carried forward for analysis. These included transportation and access, air quality, Native American Religious Concerns, Wilderness Areas, Wilderness Study Areas (WSAs), Non WSA Lands with Wilderness Character, Wild and Scenic Rivers, Areas of Critical Environmental Concerns (ACECs), Environmental Justice, Prime or Unique Farmlands, Hazardous or Solid Waste, Wild Horses, and Paleontological Resources.

Transportation and Access

No unfilled transportation needs were disclosed during internal and external scoping. Each grazing permittee was contacted during the assessment process to discuss access needs, and no specific needs for improved access to maintain improvements were identified. The public scoping process did not result in the identification of a need for routes or access for livestock management beyond what is currently available. The internal assessment of each allotment identified range improvements and facilities which would need maintenance or would be proposed, along with access.

Air Quality
No air quality issues were raised during internal and external scoping. No impacts to local or regional air quality, and no impacts to Class 1 airsheds were identified.

Management of air quality in accordance with standards prescribed by federal, state, and local laws, regulations, and policies include the following:

- Applicable National Ambient Air Quality Standards.
- Applicable National Emission Standards for Hazardous Air Pollutants.
- State or tribal implementation plans.
- Prevention of Significant Deterioration (PSD), if applicable.
- Conformity analyses and determinations.
- Regional haze regulations, including visibility impacts on mandatory federal Class I areas.
- Utah Smoke Management Plan.

Comply with the Clean Air Act through the application of the National Environmental Policy Act (NEPA) process on a case-by-case basis.

Comply with Utah Administrative Code Regulation R307-205, which prohibits the use, maintenance, or construction of roadways in disturbed areas without taking appropriate dust abatement measures.

Compliance would be obtained through site-specific stipulations identified on a case-by-case basis for new projects and through the use of dust abatement control techniques in problem areas.

Mitigate actions that compromise ambient air quality standards or visibility within the Class I air areas.

BLM will continue to work cooperatively with state, federal, and tribal entities in developing air quality assessment protocols to address cumulative impacts and regional air quality issues.

National Ambient Air Quality Standards are enforced by the Utah Department of Environmental Quality, Division of Air Quality, with Environmental Protection Agency (EPA) oversight. Special requirements to reduce potential air quality impacts will be considered on a case-by-case basis in processing land use authorizations.

Project specific analyses will consider use of quantitative air quality analysis methods (i.e. modeling), when appropriate as determined by BLM, in consultation with state, federal, and tribal entities.

CHAPTER 1
PURPOSE AND NEED

Global Climate Change

On-going scientific research has identified the potential impacts of climate changing pollutants on global climate. These pollutants are commonly called "greenhouse gases" and include carbon dioxide, CO2; methane; nitrous oxide; water vapor; and several trace gas emissions. Through complex interactions on a regional and global scale, these emissions cause a net warming effect of the atmosphere, primarily by decreasing the amount of heat energy radiated by the Earth back into space. Although climate changing pollutant levels have varied for millennia (along with corresponding variations in climatic conditions), recent industrialization and burning of fossil carbon sources have caused CO2 concentrations to increase dramatically, and are likely to contribute to overall climatic changes, typically referred to as global warming. Increasing CO2 concentrations also lead to preferential fertilization and growth of specific plant species.

Global mean surface temperatures have increased nearly 1.0°C (1.8°F) from 1890 to 2006 (Goddard Institute for Space Studies, 2007). However, observations and predictive models indicate that average temperature changes are likely to be greater in the Northern Hemisphere. Figure 3-10 demonstrates that northern latitudes (above 24° N) have exhibited temperature increases of nearly 1.2°C (2.1°F) since 1900, with nearly a 1.0°C (1.8°F) increase since 1970. Without additional meteorological monitoring systems, it is difficult to determine the spatial and temporal variability and change of climatic conditions, but increasing concentrations of these "greenhouse gases" are likely to accelerate the rate of climate change.

The Intergovernmental Panel on Climate Change (IPCC) has recently completed a comprehensive report assessing the current state of knowledge on climate change, its potential impacts, and options for adaptation and mitigation. At printing of this DEIS, this assessment is available on the IPCC website at http://www.ipcc.ch/. According to this report, global climate change may ultimately contribute to a rise in sea level, destruction of estuaries and coastal wetlands, and changes in regional temperature and rainfall patterns, with major implications to agricultural and coastal communities. The IPCC has suggested that the average global surface temperature could rise 1 to 4.5 degrees Fahrenheit (°F) in the next 50 years, with significant regional variation. The National Academy of Sciences (2006) has confirmed these findings, but also indicated that there are uncertainties regarding how climate change may affect different regions. Computer models indicate that such increases in temperature will not be equally distributed globally, but are likely to be accentuated at higher latitudes, such as in the Arctic, where the temperature increase may be more than double the global average (BLM 2007b). Also, warming during the winter months is expected to be greater than during the summer, and increases in daily minimum temperatures is more likely than increases in daily maximum temperatures. Vulnerabilities to climate change depend considerably on specific geographic and social contexts. BLM recognizes the importance of climate change and the potential effects it may have on the natural environment. Several activities occur within the planning area that may generate emissions of climate changing pollutants. For example, large fires, and recreation using

combustion engines, can potentially generate CO2 and methane. Wind erosion from disturbed areas and fugitive dust from roads along with entrained atmospheric dust has the potential to darken glacial surfaces and snow packs resulting in faster snowmelt. Other activities may help sequester carbon, such as managing vegetation to favor perennial grasses and increase vegetative cover, which may help build organic carbon in soils and function as "carbon sinks".

Since none of the actions proposed in this EIS would generate additional greenhouse gases that would contribute to global warming, this issue will not be further addressed.

Native American Religious Concerns
Local tribes were contacted during public scoping, and no Native American religious or other issues were raised.

Wilderness Areas
A small portion of the Paria Canyon-Vermilion Cliffs Wilderness Area extends into the Clark Bench and Mollies Nipple allotments. No facilities or improvements are approved as part of this analysis, and all future construction would require site specific assessment, including assessing impacts on Wilderness Areas.

Wilderness Study Areas
Wilderness Study Areas were addressed during the scoping process. No specific issues were identified during scoping. Livestock grazing is authorized and occurs within Wilderness Study Areas within the EIS area. Rangeland management activities in WSAs are administered under guidelines in the Interim Management Policy for Lands under Wilderness Review (IMP H-8550-1). While some facilities or improvements are proposed in the alternatives, none are approved as part of this analysis. All future construction would require site specific assessment, including assessing impacts on WSAs. The impacts of future management actions on wilderness characteristics, will be deferred until the nature of the impact can be assessed; i.e., upon the proposing of a specific improvement, along with design specifications. Livestock grazing has been occurring in WSAs and continued grazing would not impair wilderness characteristics and would not affect their eligibility for wilderness consideration. Under all the alternatives livestock grazing would continue at or below current livestock grazing levels.

Non WSA Lands with Wilderness Characteristics
There are Non WSA Lands with Wilderness Characteristics in the decision area outside of existing WSAs that were determined by the BLM in the1999 Utah Wilderness Inventory to have wilderness characteristics. Members of the public submitted information suggesting that additional areas outside of existing WSAs have wilderness characteristics and should be managed to preserve those values. Livestock grazing is authorized, and occurs, within Non WSA Lands with Wilderness Characteristics within the EIS area. While some facilities or improvements are proposed in the alternatives, none are approved as part of this analysis,

and all future construction would require site specific assessment, including assessing impacts on Non WSA Lands with Wilderness Characteristics. The impacts of future management actions on wilderness characteristics, will be deferred until the nature of the impact can be assessed; i.e., upon the proposing of a specific improvement, along with design specifications. Livestock grazing has been occurring in these areas and continued grazing would not impair wilderness characteristics and would not affect their eligibility for wilderness consideration. Under all the alternatives livestock grazing would continue at or below current livestock grazing levels.

Wild and Scenic Rivers System
In the EIS area, there are no designated Wild and Scenic Rivers System segments. There are approximately 252 miles of river segments that have been determined suitable for inclusion in the National Wild and Scenic River System. No facilities or improvements are approved as part of this analysis, and all future construction would require site specific assessment, including assessing impacts on Wild and Scenic River suitability. Livestock grazing is a current activity in these areas and continued grazing would not affect their eligibility for Wild and Scenic River consideration.

Areas of Critical Environmental Concern
The Monument Management Plan states: "No Areas of Critical Environmental Concern (ACECs) are designated in the Monument Management Plan." Further, there are no ACECs within the EIS area.

Environmental Justice
According to the EPA Region VIII, State of Utah, Environmental Justice Map, the region has been categorized as a minority population area of 0-10% and a poverty population area of 10-20%. No minority or economically disadvantaged communities or populations are present which could be affected by the proposed action or alternatives. (see http://www.epa.gov/enviro/ej).

Prime or Unique Farmlands
No Prime or Unique Farmlands exist within the EIS area. (see http://www.ut.nrcs.usda.gov/technical/nri.)

Hazardous or Solid Wastes
No anticipated impacts were identified relating to hazardous or solid wastes.

Wild Horses
Concerns relating to a small band of horses (13-16 head) located in the Harvey's Fear/Spencer Bench area will not be addressed. Removal of these horses is provided for in the Escalante MFP which will be carried forward as discussed in the Chapter 2 section of Existing Land Use Plan Decisions To Be Carried Forward. Therefore, this is an administrative action to be implemented under an existing land use plan decision.

Paleontological Resources
Paleontological resources generally require management protection only if they have significant scientific, historic, cultural, or educational value. Such significant fossil sites are invariably in rock or sediment exposures relatively free of soils and extensive vegetation. Historically, use of such areas by cattle is rather limited. The only possible direct impact cattle may have on fossil resources is trampling and such low levels of grazing activity would not be a significant threat. Other activities associated with grazing that involve ground disturbance such as water developments, laying of subsurface pipelines, post-hole digging, and road construction/maintenance could significantly impact paleontological resources but would be examined on a case-by-case basis by a qualified paleontologist before being approved. Significant resources found during such examinations would be collected or mitigated, thus preventing significant impacts. As a result, paleontological resources are given no further consideration in the analysis.

ISSUE SUMMARY

This section describes the issues or concerns that will be analyzed in this EIS. The process used to identify these issues or concerns were described earlier.

CLARIFICATION OF MONUMENT MANAGEMENT PLAN DIRECTION

- The MMP direction was developed without an assessment of the interaction between livestock grazing, rangeland management, and other resources uses or an analysis of the impacts on livestock grazing.
- MMP direction for habitat (vegetation) management, while emphasizing the use of native species, does not provide specific direction related to existing rangeland seeding projects. The MMP is inconsistent because it both prohibits and allows the use of non-native species under the same possible set of circumstances.
- Grazing related range improvements, specifically seedings, were not addressed in the MMP.
- Proposed restoration and revegetation projects are not prioritized.
- Existing MMP determinations do not comply with new direction regarding the use of management ignited fire.
- The MMP determination concerning “Noxious weeds” is insufficient, since it does not include exotic or invasive non-native species.

LIVESTOCK GRAZING MANAGEMENT

- There is no consistent direction regarding coordinated management, including recognition of enabling legislation intent and compliance with existing management plans, with Glen Canyon National Recreation Area, Capital Reef National Park, U.S. Forest Service - Dixie National Forest, BLM Arizona Strip Field Office, and the BLM Kanab Field Office.

- Corrective action is required on allotments where periodic monitoring has documented downward trend, and/or overuse of forage resources, or BLM has determined that current livestock grazing practices are significant factors in not achieving one or more rangeland health standards, or do not conform to grazing management guidelines.

COMPLIANCE WITH STANDARDS AND GUIDELINES FOR RANGELAND HEALTH

Standard 1: Soils

- Analysis of potential impacts of management actions on areas where soil conditions are not meeting the desired Standard due to a lack of vegetative cover and evidence of increased erosion.

- Analysis of impacts of management actions that have the potential to degrade soil quality and increase soil erosion due to reduction in vegetative cover.

Standard 2: Riparian and Wetland Areas

- Analysis of potential impacts of management activities on riparian areas focusing on areas that currently do not meet the existing standard for properly functioning condition.

- Analysis of potential impacts to watershed health degradation due to cumulative impacts of land use activities.

Standard 3: Desired Species

- Identification of rangelands not meeting Standard 3 for the desired species including native, threatened, endangered, and special status species and analysis of management actions on these rangelands.

- Analysis of potential impacts of rangeland activities on the habitat characteristics needed for the conservation of migratory bird species of concern as required under Executive Order 13186 *Responsibilities of*

Federal Agencies to Protect Migratory Birds (66FR 3853), January 17, 2001.

- Analysis of the potential impacts of livestock distribution and season of use on the Paunsaugunt Deer Herd wintering and migration areas.

- Analysis of the potential impacts of rangeland activities on the habitat and viability of populations of federally listed threatened or endangered species, BLM Utah State Sensitive Species, or species of special concern listed by the Utah Division of Wildlife Resources, GSENM, and other state and Federal agencies.

- Analysis of the potential impact of rangeland management activities on the recovery of threatened, endangered, and sensitive plant and animal species.

- Analysis of potential impact to vegetative ecosystems from livestock management activities including season-long or early spring grazing and drought and long-term climate change.

- Analysis of the potential impacts of invasive non-native plants on native plant and animal communities, soil and hydrologic functions, fire regime, wildlife habitat, and recreational opportunities.

- Analysis of potential impacts to biological soil crust cover that has been reduced below expected amounts at many sites.

Standard 4: Water Quality

- Analysis of management activities on streams and springs that do not currently meet the State of Utah's water quality standards.

SOCIO-ECONOMICS

- Analysis of the potential impacts to local custom and culture values due to modification or reduction in traditional uses.

CULTURAL RESOURCES

- Analysis of potential impacts of rangeland management activities and related improvements on historic and prehistoric cultural resource sites.

RECREATION

- Analysis of the potential competition between recreation and rangeland management activities that compete for use of space, and for use of water resources.

- Analysis of the potential impacts rangeland management activities and related improvements on recreational aesthetics and scenic values.

PLANNING CRITERIA AND CONSIDERATIONS

BLM planning regulations (43CFR1600) require the preparation of planning criteria to guide the development of resource management plans. Planning criteria ensure that plans are tailored to the identified issues and ensure that unnecessary data collection and analysis are avoided. Planning criteria are based on applicable law, agency guidance, public comment, and coordination with other Federal agencies, state and local governments, and Native American tribes.

The planning criteria used in developing this plan for the management of livestock grazing on GSENM and administration of livestock permits on GCNRA are as follows:

- The plan amendment will be completed in compliance with FLPMA, NEPA, and all other applicable laws. It will meet the requirement of the Proclamation to protect the objects of geological, paleontological, archaeological, biological, and historic values within GSENM.

- The Planning Team will work cooperatively with the State of Utah, tribal governments, county and municipal governments, other Federal agencies, and all other interested groups, agencies, and individuals.

- The plan amendment will incorporate the Fundamentals of Rangeland Health and the Utah Standards for Rangeland Health and Guidelines for Grazing Management (these are listed in Appendix 8).

- The plan amendment will incorporate the NPS's 1999 GCNRA Grazing Management Plan and 2005 Values and Purposes Determination.

- Vegetation management activities and treatment of invasive species will follow principles of integrated pest management. The following documents are incorporated by reference as current national guidance, although they may be updated over the life of this plan: Final Environmental Impact Statement Vegetation Treatment on BLM Lands in Thirteen Western States and associated

Records of Decision. BLM Wyoming State Office, Casper Wyoming. 1991. (BLM-WY-ES-91-036-4320); Record of Decision Vegetation Treatments Using Herbicides on BLM Lands in 17 Western States Programmatic Environmental Impact Statement USDI, Bureau of Land Management, 2007. (FES 07-21).

- All management actions proposed will be in accordance with applicable laws, regulation, policy, and guidance.

- BLM will follow the guidelines for processing the voluntary relinquishment of grazing permits and preferences as directed in Washington Office (WO) Instruction Memorandum (IM) number 2007-067(refer to Appendix 7).

PLAN AMENDMENT GOALS

LIVESTOCK GRAZING MANAGEMENT

- Meet Utah's Rangeland Health Standards on all allotments.
- Keep lands productive, while minimizing conflicts with other resources.
- To the extent possible, ensure continuation of viable livestock operations, consistent with existing laws, regulations, and resource management goals.

VEGETATION MANAGEMENT

- Achieve or maintain desired plant communities (incorporating a natural range of native plant associations and seral stages where applicable) with appropriate species density and composition.
- Utilize the principles of Integrated Pest Management to control existing noxious and invasive weed species and reduce their introduction and spread.
- Maintain or increase species diversity and cover.
- Ensure the proper functioning and distribution of biological soil crust.

SOILS

- Maintain soils in a healthy condition.
- Restore soil health in degraded areas.

REVEGETATION

- Stabilize areas that are disturbed to prevent further degradation.
- Reduce the visual contrast between revegetated areas and the existing landscape.
- Revegetate with native species whenever feasible.

RIPARIAN

- Maintain or restore riparian areas to properly functioning conditions.

WATER RESOURCES

- Manage streams and springs to meet the State of Utah's water quality standards.
- Ensure that water developments provide sufficient water (where possible) to support riparian resources, wildlife and other values.

SPECIAL STATUS SPECIES

- Ensure the Special Status Species existence would not be jeopardized.
- Ensure that Special Status Species habitat would not be not adversely modified .

WILDLIFE

- Protect and enhance wildlife habitat.
- Preserve the integrity of wildlife corridors and migration routes.
- Ensure wildlife availability, and access to, key forage, nesting, and spawning areas.

SOCIO-ECONOMIC

- Support a diverse economy that relies on multiple use and sustainable yield principles.
- Provide for economic opportunities and social sustainability.
- Maintain natural values and resources.

CULTURAL RESOURCES

- Protect archaeological and historical sites by putting comprehensive mitigation measures in place (see Cultural Protocol, Appendix 3).
- Protect Traditional Cultural Properties (TCPs) to insure their continued access and availability for use.

RECREATION

- Consider important recreational concerns, such as aesthetics, scenic values, access to clean water, access to quality campsites, and opportunities for solitude when authorizing livestock use and management actions.
- Reduce conflicts between recreational users and livestock grazing wherever possible, particularly those areas with high recreational use activity, during the peak seasons of use.

CONSISTENCY WITH OTHER PLANS

Section 202 of the Federal Land Policy Management Act (FLPMA) requires, to the extent practical, that the BLM keep itself informed of other Federal, State and local land use plans, and assure that consideration is given to those plans in the development of BLM land use plan decisions. During the course of this planning effort, the following local, State and Federal land use plans were considered:

County Land Use Plans

Kane and Garfield Counties have developed County land use plans that include guidance for the management of Federal lands and activities. To the extent that the County land use plans encourage and support the continued traditional uses of the public lands (in this specific planning effort, livestock grazing) and the custom and culture of the region, the plan amendment continues this traditional use and is consistent with the County land use plans. Where the County land use plans proscribe a use level or prohibit the reduction in use levels of federally managed and permitted uses, federal laws and regulations, and resource inventory data, are used to establish allowable use levels.

Appendix 5 details the specific elements of the County and State plans which address grazing and rangeland health, and establishes whether this plan amendment is consistent with them. In general, this draft plan amendment is consistent with portions of the County plans which require the maintenance of the livestock industry, and is not consistent with those portions which call for an increase in livestock grazing, or "no net loss" of AUMs.

National Park Service, Glen Canyon National Recreation Area

Public Law 92-593 established GCNRA on October 27, 1972. That enabling legislation specifically required the continuation of livestock grazing, under the administration of the BLM, but "subject to the provisions of" the National Park Service (NPS) Organic Act of August 25, 1916. The Directors of the NPS and BLM signed a Memorandum of Understanding on September 4, 1984 requiring the BLM to "consult and cooperate with" the NPS in grazing administration on GCNRA. The NPS was required to participate in planning, to ensure that the "values and purposes" of the NRA were "adequately considered".

The process of consultation on grazing administration, and incorporation of GCNRA values and purposes into that consultation, was described in an interagency agreement between the BLM's Utah State Director and the Superintendent of GCNRA. The BLM would inform the NPS of any proposed changes in grazing administration, and the NPS would then determine how those changes would conform to the values and purposes of GCNRA. The details as to what constituted "values and purposes" were established when a grazing component was incorporated into the General Management Plan for Glen Canyon National Recreation Area on October 31, 1998. Upon being presented with a proposed change in

grazing administration, the Superintendent of GCNRA would provide the BLM with a Values and Purposes Determination based upon the GCNRA's plan.

Glen Canyon National Recreation Area has been participating in this planning process as a cooperator since its initiation. A Values and Purposes Determination has been completed, and of the eighteen allotments (and several unallotted closed areas) on NPS lands, the proposals for all but three were found to be consistent with the values and purposes of GCNRA. Those three (Rock Creek-Mudholes, Lake and Soda Allotments) had archeological conflicts which could be resolved through preservation activities and cooperative "protection alternatives", such as the proposed Cultural Resource Protocol. The BLM and the NPS will continue to work together to identify and protect cultural sites which may be impacted by livestock during the implementation phase of this plan amendment.

Grand Staircase-Escalante National Monument Science Plan

Grand Staircase-Escalante National Monument was established by Presidential proclamation on September 18, 1996 to protect its "spectacular array of scientific and historic resources". Archaeology, biology, geology, history and paleontology, among other items, were specifically mentioned in the enabling proclamation emphasizing opportunities for science. The focus on science was integrated in the MMP, completed in November 1999, and effective February 2000. The plan identifies scientific study as part of an overall vision for GSENM. The plan further states that: "Monument management priorities and budgets will focus on a comprehensive understanding of the resources of the Monument while assisting in the development of improved and innovative land management, restoration, and rehabilitation practices. The natural, physical, and social sciences, including the study of history will each play an essential role in science and research activities". The MMP identifies three priorities for the science program: 1) study, collect, or record scientific information that is most at risk of being damaged or lost through disturbance or the passage of time; 2) continue gathering baseline data on the biological, physical, cultural, and social sciences within GSENM and; 3) conduct applied research regarding the management of natural systems, including disturbance and recovery strategies. In addition to these priorities the Monument Advisory Committee (MAC) also serves to review and refine science recommendations to the Monument Manager.

There are three indentified areas for science in GSENM: to focus on the at-risk resources, continue baseline documentation and, apply science to management. These goals will be accomplished through integrated activity planning.

Overall, GSENM management priorities and budgets will focus on a comprehensive understanding of Monument resources with a focus on the development of improved and innovative land management, restoration, and rehabilitation practices. Multi-scale and interdisciplinary approaches will be used whenever possible. Uses of the GSENM will be

managed to complement science and research objectives and to provide information that feeds directly into the adaptive management framework.

The science component related specifically to the Rangeland Health Plan Amendment and Grazing EIS will focus on several components including, but not limited to: understanding and restoring native systems through ecological research and restoration of "native landscapes"; understanding native and non-native species utility and viability; developing desired plant communities; identifying major vegetation types; identifying palatable forage species and noxious weeds; understanding biological soil crusts; understanding springs, riparian, and relict areas; understanding and correcting soil erosion and compaction; determining hydrological and watershed needs; identifying and protecting threatened and endangered species (plant and animal); understanding the effects and needs of rangeland management; understanding the influences of locating range improvements relative to other resources; understanding recreation and livestock interactions; identifying cultural and historic resources; and monitoring. GSENM offers extremely high-value research opportunities, some of which may not be available elsewhere.

The GSENM science program is an example of how the BLM is applying research to improve management of public lands. Data gathering for management purposes is reflected in the fieldwork behind the rangeland health assessment program. In addition to aiding in the analysis of the grazing management practices and constraints, these data will have many additional uses, such as developing a vegetation classification scheme or picking sites with different levels of grazing impacts for experimentation. This information also has provided a baseline for future monitoring efforts. This adaptive management loop will be closed when decisions are made, based on the information collected, to continue current management or to change management of the areas being monitored.

ORGANIZATION OF THE DRAFT ENVIRONMENTAL IMPACT STATEMENT (DEIS)

The remainder of this document outlines alternatives for addressing the issues within the framework established by the Federal Land Policy and Management Act, the GCNRA establishing legislation and National Park Service Organic Act, and for lands within GSENM, the Monument Proclamation, applicable laws and regulations, and other directives. Briefly, the remaining chapters of this document are described as follows:

- ***Chapter 2 – Alternatives***

  This chapter describes the alternatives in detail, including specific actions that would be taken under each alternative, as well as items that would be common to all of the alternatives.

- ***Chapter 3 – Affected Environment***

  The chapter characterizes the existing condition of the planning area, including baseline data and trends based on historical and current conditions.

- ***Chapter 4 – Environmental Impacts***

  This chapter evaluates and displays the possible environmental, social, and economic consequences of implementing each alternative given the baseline data in Chapter 3.

- ***Chapter 5 – Public Participation & Preparers***

  This chapter focuses on the consultation and coordination that took place throughout this effort including but not limited to:

  - the public participation process,
  - the review of planning consistency,
  - a list of agencies and organizations that were consulted,
  - a list of preparers of this document.

The appendices, glossary, and references can be found at the end of the document.