

# RECLAMATION

*Managing Water in the West*

## **Lake Nighthorse Recreation Plan Final Environmental Assessment and Finding of No New Significant Impact**

**Animas-La Plata Project, Colorado**



**U.S. Department of the Interior  
Bureau of Reclamation  
Western Colorado Area Office**

**December 2016**

## **MISSION STATEMENTS**

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Lake Nighthorse Recreation Plan, Final Environmental Assessment and Finding of No New Significant Impact

Lead Agency: Bureau of Reclamation, Upper Colorado Region, Western Colorado Area Office

Responsible Official: Ed Warner, Area Manager

Cooperating Agencies: None

Abstract: The proposed Federal action analyzed in this final environmental assessment is to provide public recreational opportunities and facilities at Lake Nighthorse, Animas-La Plata Project, Colorado.

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# Finding of No New Significant Impact

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## Introduction

The Bureau of Reclamation, Western Colorado Area Office, has finalized an environmental assessment (FEA) for a proposed action and alternatives related to providing public recreational opportunities and facilities at Lake Nighthorse, Animas-La Plata Project, La Plata County, Colorado. Based on a review of the FEA, public comments and concerns, and supporting documents, I have determined that the proposed action would not significantly affect the quality of the human environment. No environmental effects meet the definition of significance in context or intensity as defined at 40 CFR 1508.27. Nor would the effects exceed those described in the Final Supplemental Environmental Impact Statement for the Animas-La Plata Project (FSEIS). Therefore, another environmental impact statement is not required for this proposed action. This finding is based on the context and intensity of the proposed action as described here and in the FEA.

## Context:

The study area includes the 5,500 acres of Reclamation lands and Lake Nighthorse, the storage reservoir built to implement the Colorado Ute Indian tribes' water rights settlement. The study area is located in La Plata County, Colorado and the socioeconomic impact study area is expanded beyond Reclamation's lands to include the City of Durango and La Plata County.

The proposed action is a site-specific action directly involving 2,000 acres; approximately 500 acres of land and 1,500 water surface acres of Lake Nighthorse, all administered by Reclamation.

## Intensity:

The Council on Environmental Quality requires review of 10 factors or significance criteria described at 40 CFR 1508.27. The following factors have been considered in evaluating intensity of this proposal.

1. Impacts that may be both beneficial and adverse.

The beneficial effects of the proposed action include the provision of public recreational opportunities within Ridges Basin and on Lake Nighthorse. Opting to implement the proposed action means implementing a small-scale, staged approach to the development of recreational opportunities and facilities, while protecting water quality and the primary purpose of Lake Nighthorse. Selecting the proposed action allows the opportunity to ensure economic and environmentally acceptable levels of recreation while minimizing permanent modification to the natural environment.

Adverse effects include the potential for impacts to soils, vegetation, and visual resources, and cultural resources (see number 8 below).

2. Degree of effect on public health and safety.

The effects to public health and safety involve considerations of water quality and law enforcement and boating or water-sport safety. Reclamation has selected the proposed action with mitigation measures, which is comprised of environmental commitments, permit requirements, etc.

3. Unique characteristics of the geographic area such as proximity to park lands, national monuments or parks, wetlands, or areas of critical environmental concern.

There are no prime farmlands, wild and scenic rivers, wilderness areas, national parks or monuments, or areas of critical environmental concern within the project area, although there are 421,852 acres of parks, wilderness areas, national conservation areas, etc. in La Plata County as a whole. In terms of vegetation cover, about 31 percent of La Plata County is forested, but the vegetation communities in the study area are not valuable forest lands.

As described in the FEA, there would be no impacts to floodplains and wetlands, although there is a possibility that jurisdictional wetlands could develop over time if the right combinations of water availability, soils, and vegetation develop.

4. Degree to which the possible effects on the quality of the environment are likely to be highly controversial.

Public input and tribal consultation has been solicited throughout the NEPA process. Representatives of Reclamation, the U.S. Fish and Wildlife Service, the City of Durango, La Plata County, and the tribes met or consulted at various times to discuss potential impacts of the proposals on the resources of concern.

Public involvement included public meetings held in local communities. The public was given the opportunity to comment and question the alternatives and impacts. A formal public comment period was provided and 285 comment documents were received. Many of these were “votes” for one or another alternative. Concerns were raised about noise, particularly from motor boats, as well as impacts to water resources, wildlife resources, cultural resources, and other topics covered in the FEA.

Based on the content of the comments received from the public (see Appendix B), the effects of the proposal on the quality of the human environment are not considered highly controversial—the effects are predictable.

5. Degree to which the possible effects on the quality of the environment are highly uncertain or involve unique or unknown risks.

The proposal involves conventional construction and management techniques. Anticipated effects on the environment have been thoroughly identified, analyzed, and mitigated to insignificant levels. No uncertain effects are expected.

6. Degree to which the action may establish a precedent for future actions with significant effects or represent a decision in principle about a future consideration.

The proposed action is a site-specific action involving 2,000 acres of land and water surface area administered by Reclamation. The action would include entering into a 25-year lease agreement with the City of Durango.

7. Whether the action is related to other actions with individually insignificant but cumulatively significant impacts.

The study area for cumulative impacts is the ALP Project area around Lake Nighthorse, located in La Plata County, Colorado. The proposed action would not individually have a significant impact on natural resources or communities in the county. Reasonably foreseeable future actions will be subject to further NEPA analysis and will be consistent with the FSEIS.

8. Degree to which the action may adversely affect districts, sties, structures, buildings or objects listed on the National Register of Historic Places.

Sites and an historic district eligible for listing on the National Register of Historic Places are present in the area of potential effects of the proposed action. Identification of these properties has satisfied the Secretary of the Interior's Standards and Guidelines for the identification of historic properties. On-site monitoring of excavation or ground disturbance by qualified professionals provided by Reclamation will minimize the potential for adverse effects to cultural resources. The proposed action contains commitments for developing a cultural resources management plan and agreement document in compliance with 36 CFR 800 that will lead to avoidance or mitigation of effects.

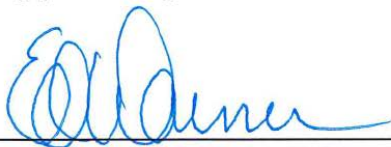
9. Degree to which the action may adversely affect an endangered, threatened species, or critical habitat.

Field surveys conducted on the project lands and waters by qualified biologists for the FSEIS and the FEA have found no known federally listed animal or plant species or critical habitat.

10. Whether the action threatens a violation of federal, state, or local environmental protection law.

The proposed action would comply with all relevant environmental laws, regulations, and policies. Potential resource conflicts would be resolved through environmental commitments and monitoring stipulations defined in the FEA or FSEIS. The major tribal concerns are cultural resources and water quality. As a result, Reclamation is preparing a Cultural Resource Management Plan and Programmatic Agreement and will also continue to monitor water quality.

**Approved by:**



Area Manager

12-19-16

Date

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# Acronyms and Abbreviations

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ACS	American Community Survey
A.D.	Anno Domini
ADA	Americans with Disabilities Act
ALP	Animas-La Plata Project
ALPOMRA	Animas-La Plata Operations, Maintenance, and Replacement Association
ALPWCD	Animas-La Plata Water Conservancy District
ANS	aquatic nuisance species
B.C.	Before Christ
CAA	Clean Air Act
CDOT	Colorado Department of Transportation
CDNR	Colorado Department of Natural Resources
CDPHE	Colorado Department of Public Health and Environment
CEQ	Council on Environmental Quality
CFR	Code of Federal Regulations
CO <sub>2e</sub>	carbon dioxide–equivalent
Colorado Ute tribes	Ute Mountain Ute and the Southern Ute Indian tribes of southwestern Colorado
Corps	U.S. Army Corps of Engineers
CR	County Road
CPW	Colorado Parks and Wildlife
CT	census tract
CWA	Clean Water Act
dBA	decibels on the A-weighted scale
DM	Departmental Manual
EA	Environmental Assessment
EO	Executive Order
EPA	U.S. Environmental Protection Agency
FSEIS	Final Supplemental Environmental Impact Statement
FWCA	Fish and Wildlife Coordination Act
GHG	greenhouse gas
IPaC	Information, Planning, and Conservation
LOS	Level of Service
MBTA	Migratory Bird Treaty Act
mph	miles per hour
NAAQS	National Ambient Air Quality Standards
NEPA	National Environmental Policy Act of 1969
NPDES	National Pollutant Discharge Elimination System
NRHP	National Register of Historic Places
P.L.	Public Law
PM <sub>2.5</sub>	particulate matter less than 2.5 microns in diameter
PM <sub>10</sub>	particulate matter less than 10 but more than 2.5 microns in diameter
Reclamation	Bureau of Reclamation
RV	recreational vehicle

SHPO  
U.S.  
USFWS  
WQCD  
WUS

State Historic Preservation Office  
United States  
U.S. Fish and Wildlife Service  
Water Quality Control Division  
Water of the United States

# 1.0 Purpose and Need for Action

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## 1.1 Introduction

The United States (U.S.) Bureau of Reclamation, Western Colorado Area Office (Reclamation) is considering providing public recreational opportunities and facilities at Lake Nighthorse, near the City of Durango, La Plata County, Colorado. This Environmental Assessment (EA) has been prepared to analyze environmental effects associated with providing the public with recreational opportunities and the development, operation, and management of recreational facilities. This EA tiers from and incorporates by reference the Animas-La Plata Project (ALP Project) Final Supplemental Environmental Impact Statement (FSEIS), prepared by Reclamation in 2000 (Reclamation 2000a) and with a record of decision signed by the Secretary of the Interior in 2000. The FSEIS addressed development of recreational facilities and amenities for Ridges Basin Reservoir, now referred to as Lake Nighthorse.

This Final EA (FEA) has been prepared in compliance with the National Environmental Policy Act of 1969 (NEPA), Council on Environmental Quality (CEQ) regulations (40 Code of Federal Regulations [CFR] 1500–1508), and Department of the Interior NEPA regulations (43 CFR 46). Reclamation is the lead federal agency responsible for the preparation of this FEA. While considerable consultation and coordination occurred during the NEPA process, no formal cooperating agencies were designed.

## 1.2 Background

Lake Nighthorse is a component of the ALP Project. The ALP Project was built to fulfill the water rights settlement of the Ute Mountain Ute and the Southern Ute Indian tribes of southwestern Colorado (Colorado Ute tribes). The ALP Project was authorized by the Colorado River Basin Project Act of 1968 and was designed to provide irrigation, municipal and industrial water supplies to the Colorado Ute tribes and other project beneficiaries. A Colorado Ute Indian Water Rights Final Settlement Agreement, signed in 1986, quantified the Colorado Ute tribes' rights to obtain water from several rivers and projects, including the ALP Project. Congress incorporated the ALP Project into the Colorado Ute Indian Water rights Settlement Act of 1988 (Public Law [P.L.] 100-585) (Settlement Act) to settle Colorado Ute tribal water rights claims. In 2009, the Colorado Water Resources and Power Development Authority, the San Juan Water Commission, the La Plata Water Conservancy District, the Southern Ute Indian Tribe, the Navajo Nation, and the Ute Mountain Ute Tribe entered into an Intergovernmental Agreement to establish the Animas-La Plata Operation, Maintenance, and Replacement Association (ALPOMRA) who is responsible for operations, maintenance, and replacement activities under contract to Reclamation (Reclamation 2009).

The ALP Project has been the subject of public interest and environmental review since it was initially authorized. Reclamation, in compliance with NEPA, prepared a Final Environmental Statement for the ALP Project in 1980 (Reclamation 1980a), a Draft Supplement to the 1980 Final Environmental Statement in 1992 (Reclamation 1992), and a Final Supplement to the Final Environmental Statement in 1996 (Reclamation 1996).

In response to continuing public controversy, structural and nonstructural alternatives to the original proposed ALP Project were developed. Under the structural alternative, the initial stage of the project, as described in the 1996 Final Supplement to the Final Environmental Statement, would be constructed, including a proposed reservoir at Ridges Basin near Durango that would store water from the Animas River. In 1998, the U.S. Secretary of the Interior presented an Administration Proposal to implement the Settlement Act through construction of a downsized dam and reservoir at Ridges Basin to supply water for only municipal and industrial uses to the Colorado Ute tribes and other project beneficiaries. Irrigation uses were eliminated with this proposal. Because the Administration Proposal represented a significant modification to the original project, Reclamation prepared a Draft Supplemental Environmental Impact Statement followed by the FSEIS in 2000. The Record of Decision identified Refined Alternative 4 of the FSEIS as the selected alternative (Reclamation 2000b). This alternative envisioned development and management of recreation by a nonfederal entity, including the following recreational developments and uses at the reservoir:

- 1,980 users at one time and 218,400 annual user days
- 10 miles of hiking trails
- 196 camping units, 37 picnic units, and one group site
- A four-lane boat ramp and 26 boat slips
- A two-lane county access road
- 591 parking stalls
- A public beach
- A fish-cleaning station, an entrance station, and an administrative building

In 2003, the Assistant Secretary of Water and Science, acting through Reclamation, determined to build the major ALP Project components and that the State of Colorado or its citizens would be responsible for development and management of recreation at the reservoir. In 2004, Ridges Basin Reservoir was renamed as Lake Nighthorse, in honor of Ben Nighthorse Campbell, the former U.S. senator from Colorado who served as the primary author for the Settlement Act and its amendments. Construction of the ALP Project started in 2002, and reservoir filling was initiated in 2009 and completed in June 2011. The primary features of the ALP Project include Ridges Basin Dam and Reservoir, Durango Pumping Plant, and Ridges Basin Inlet Conduit. Reservoir storage at Lake Nighthorse currently totals 123,541 acre-feet, including 30,000 acre-feet of inactive storage to sustain a cold-water recreational trout fishery. Since 2003, the reservoir area and the area below the dam have been closed to public access.

In 2008, Colorado State Parks declined to accept the development and management of recreation at Lake Nighthorse and agreed to allow Reclamation to seek other nonfederal partners. The state gave Reclamation a \$3 million Motorboat Access grant for construction of a boat ramp, a parking area, a vault restroom, and an access road. Construction of the boat ramp project was completed in 2012. Recognizing the potential of the reservoir to serve as an important recreational amenity, the ALPWCD initiated public meetings in 2009 and contracted for the preparation of a recreation master plan in 2010 to evaluate and direct planning, development, and management of recreational facilities at Lake Nighthorse. At that time, the City of Durango expressed interest in serving as



Reclamation's nonfederal partner responsible for development and management of recreation at Lake Nighthorse. Since development of a Draft Recreation Master Plan in 2011 (DHM Design 2011), in-depth discussions have been held with various stakeholders, primarily members of the ALPOMRA, including the ALPWCD, the Southern Ute Indian and Ute Mountain Ute tribes, and the City of Durango, regarding the scope of recreational development at Lake Nighthorse. These discussions culminated in the development of a draft conceptual recreation plan by the City of Durango, in collaboration with Reclamation, in 2014 (Reclamation and City of Durango 2014).

### **1.3 Purpose and Need for Action**

The purpose and need is to manage public recreation at Lake Nighthorse while protecting water quality and natural, cultural, and other resources including Indian trust assets, and ensuring compatibility with the primary purpose of the ALP Project for municipal and industrial water supply. Recreation is an incidental or secondary purpose of the ALP Project and is subordinate to the primary purpose.

Public involvement and participation conducted from March 2009 through April 2011 identified a public desire for a variety of recreational opportunities, including boating, swimming, multi-use trails, fishing, hunting, camping, picnicking, other activities, and special events (DHM Design 2011). Similarly, a market study completed in June 2010 identified local and regional demand for reservoir-based recreational activities, including boating, fishing, camping, swimming, and trail use. The percentage of the local or regional population that participates in these types of reservoir-based activities ranges from 26 percent to 87 percent, which is significantly higher than national rates (RPI Consulting 2010a).

### **1.4 Project Location**

As shown in Figures 1 and 2, the study area or project area includes Lake Nighthorse and the surrounding upland areas. The reservoir has a surface area of approximately 1,500 acres at full pool and 750 acres at minimum pool. The reservoir area and the area below the dam that fall under Reclamation jurisdiction total about 5,500 acres. For this analysis, the study area includes the reservoir area as well as adjacent private, tribal, municipal, and state lands (Figure 2). The study area for socioeconomic effects extends to Durango and La Plata County.

### **1.5 Decision to Be Made**

The responsible official for this FEA, the Area Manager for Reclamation's Western Colorado Area Office, will decide whether to implement an action alternative with all stated mitigation and monitoring requirements, whether to implement the No Action Alternative, or if an environmental impact statement is required. If an action alternative is selected, the proposed recreational facilities would be developed and administered through establishment of a management authority under contract with Reclamation. Reclamation would retain ownership and oversight responsibility for operation of the dam, reservoir, recreational facilities, and associated upland areas under its jurisdiction.

## **1.6 Public Involvement**

### **1.6.1 Public and Agency Scoping**

The CEQ defines scoping as “an early and open process for determining the scope of issues to be addressed and for identifying significant issues related to a proposed action” (40 CFR 1501.7).

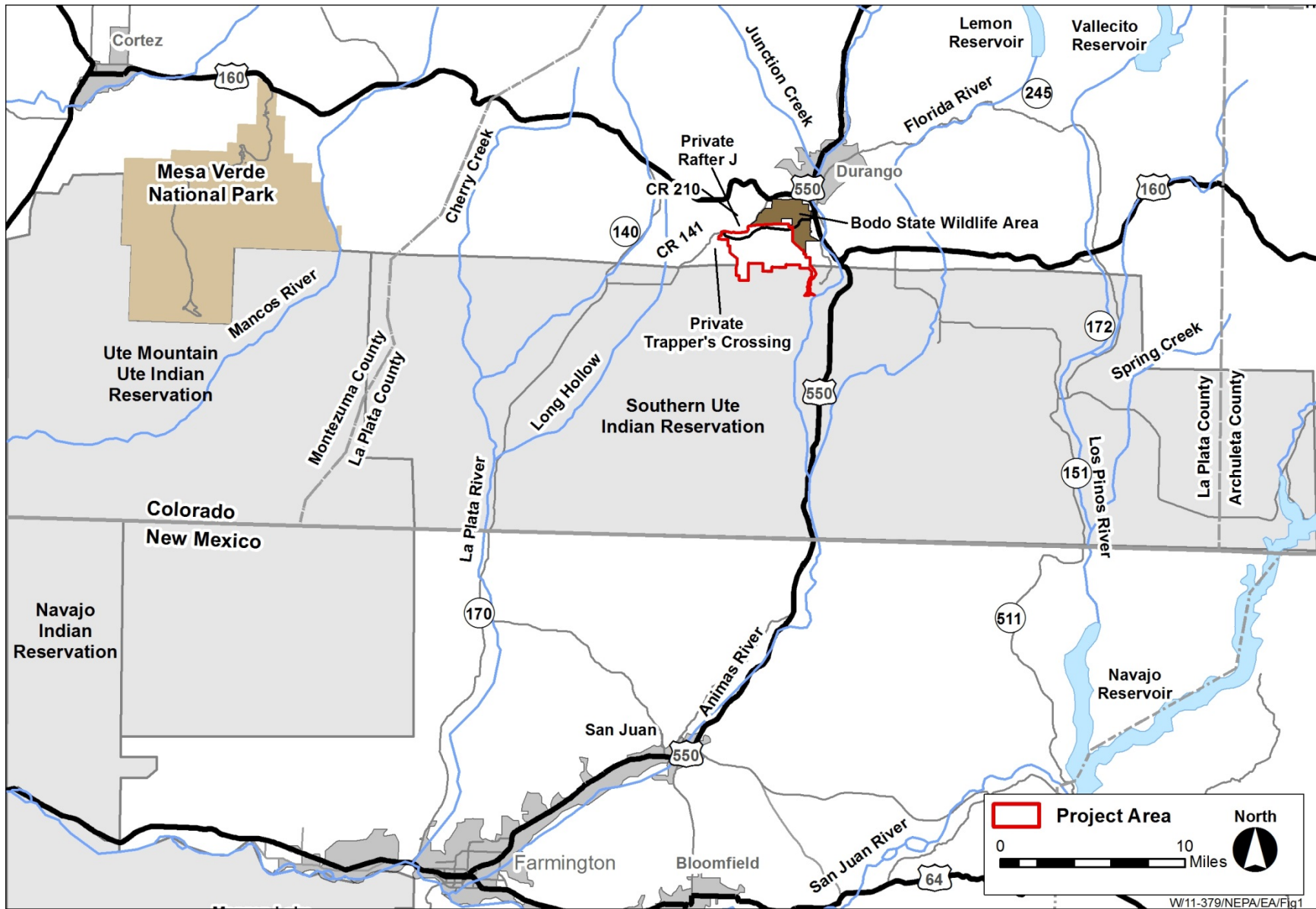


Figure 1. Project vicinity.

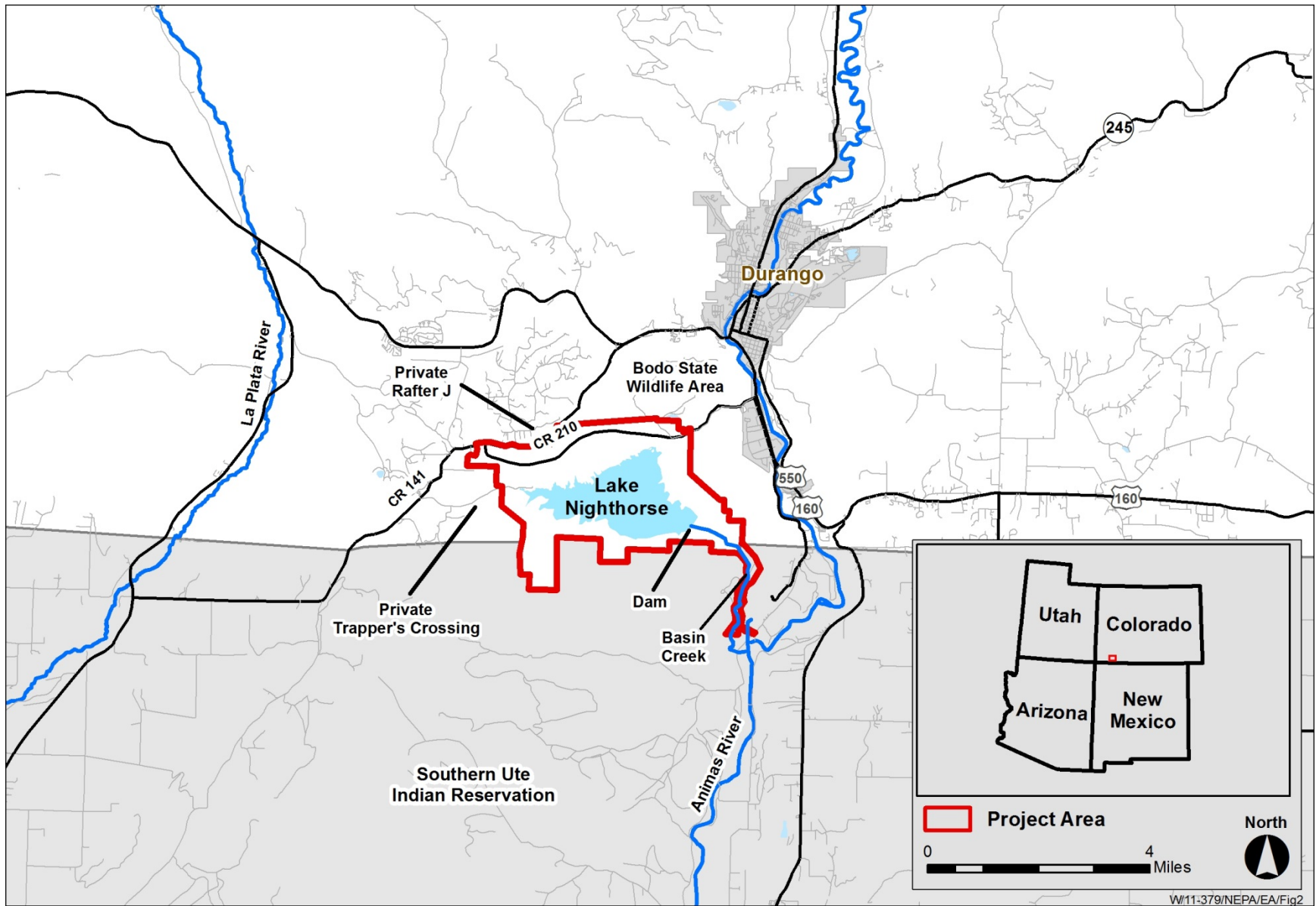


Figure 2. Project area.

Scoping, which encourages public input and helps focus the environmental analysis on relevant issues, is an important foundation to the NEPA process.

Public and agency scoping was initiated in March 2009 as part of the development of a Draft Recreation Master Plan for Lake Nighthorse. A collaborative public involvement process was undertaken that included open houses, a public forum, issues workshops, and a design workshop. The public was notified of each of these events through advertisements published in local newspapers and public service announcements on local radio stations. Email announcements were sent to interested parties and those individuals who previously contacted the planning team or provided contact information. Additionally, the public process calendar was advertised through posters, comment cards, and a website. Though no formal agency consultations occurred in the development of the Draft Recreation Master Plan, Colorado Parks and Wildlife (CPW) and the U.S. Army Corps of Engineers (Corps) were represented in the planning process because of their special expertise and Reclamation's existing commitments. The National Park Service facilitated the public process.

All public involvement events in 2009 and 2010 were held in Durango. Open houses were held on March 5, 2009, and November 10 and 11, 2010. At these open houses, project representatives provided the public with basic information, answered questions, and established a common baseline of factual information. A public forum was held on November 16, 2010, to allow interested persons to express concerns, share ideas, and identify issues related to the project. Workshops were held on December 7 and 8, 2010, to identify specific issues and develop shared solutions to water and shoreline recreation and land-based recreation, respectively. A two-day design workshop was held on January 11 and 12, 2011, to further develop recommendations for recreation at Lake Nighthorse. This workshop specifically addressed water-based recreation, trails, camping, shoreline recreation, education and interpretation, and financing and management of recreation. A public open house was held on April 11, 2011, to review the Draft Recreation Master Plan, answer questions, obtain recommendations from the community, and discuss the process for finalizing the plan.

The following issues were identified as a result of public scoping:

- Motorized vs. nonmotorized water-based recreation
- Noise effects on nearby residential areas and wildlife
- Public access to the area north of County Road (CR) 210
- Introduction and spread of invasive aquatic species
- Effects on water quality/pollution
- Impacts on nesting golden eagles
- Effects on wildlife habitat and wildlife corridors
- Desire for hunting opportunities
- Americans with Disabilities Act (ADA) accessibility
- Expanded fishing opportunities (stocking of warm-water species)

- Mountain bike and hiker effects on wildlife
- Noxious/invasive weed effects (from horses)
- Separate trail users (bikes vs. horses)
- Potential effects of introducing new fish species, invasive aquatic species, parasites, and diseases into the Animas River
- Light pollution
- Effects on property values
- Maintenance/operating costs
- Erosion
- Phased implementation
- Preservation of cultural resources

On June 18, 2014, a public open house/community meeting was held by Reclamation in Durango to provide an update on recreation planning at Lake Nighthorse. The majority of comments received inquired about the anticipated opening date of the recreational area and expressed a desire to open the area in the near future. Other comments inquired about specifics such as recreational vehicle (RV) access, cost, allowable length of stay, and allowable motorboat size. One commenter made a suggestion about automated fee collection and another questioned the need for stricter regulations compared with other recreational areas/lakes in the area. Comments also questioned the effects of recreational development on the reservoir's primary purpose (water storage and availability).

Following completion of the Lake Nighthorse Recreation Master Plan prepared and funded by the Animas-La Plata Water Conservancy District (ALPWCD)—Final Draft May 2011, discussions ensued with the member entities of the ALPOMRA and Reclamation. Consensus was reached to establish the framework for proceeding with recreation at Lake Nighthorse to ensure compatibility with the primary purpose of the project. These discussions led to the creation of the Lake Nighthorse Conceptual Recreation Plan—October 2014 Draft prepared by the City of Durango and Reclamation. This became the proposed action in the draft EA.

### **1.6.2 Preliminary Draft EA**

The Preliminary Draft EA was made available for review by an ALP Project stakeholder group. Comments received on the Preliminary Draft EA and responses are included in Appendix A. Comments of the ALP Project stakeholders were incorporated into the draft EA that was released for public comment in March of 2016.

### **1.6.3 Draft EA and Major Changes**

The Draft EA was provided to the public in March of 2016. A two month comment period was provided. Changes to the draft include further explanation of recreational activities and facilities under the action alternatives, clarification of the environmental impacts such as the growth-inducing effects of the Proposed Action, and adding Appendix B, a summary of comments and responses. Specific plans and actions were added to the cumulative effects chapter.

## 2.0 Alternatives

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This chapter describes the range of alternatives considered for the development of recreational opportunities and facilities at Lake Nighthorse. Three action alternatives are analyzed in detail in this EA. These consist of implementation of the Conceptual Recreation Plan developed in 2014 (Proposed Action—2014 Recreation Plan), the Draft Recreation Master Plan developed in 2011 (Action Alternative 1—2011 Recreation Plan), and additional recreational development described in the 2000 FSEIS (Action Alternative 2—2000 FSEIS Recreation Plan). As required by NEPA, a No Action Alternative is included, under which no recreational development would take place. The three action alternatives and the No Action Alternative are described in detail in the following sections. Section 2.5 lists commitments common to all action alternatives considered. Section 2.6 includes alternatives considered but eliminated from this EA. Section 2.7 summarizes and compares the alternatives under consideration with regard to proposed facilities and environmental consequences.

Recreation plans under all three action alternatives would incorporate use of existing and authorized facilities, specifically the existing boat ramp and associated parking area and access road, and an entrance station that includes an aquatic invasive species (AIS) inspection station that is currently being constructed. Under the action alternatives and the No Action Alternative, Reclamation would maintain, in cooperation with CPW, a cold water (trout) fishery that has been established in Lake Nighthorse. Stocking of trout, in addition to fish tissue monitoring, and issuance of fish consumption advisories as needed, would reduce the potential for mercury consumption hazard. In addition, under the action alternatives and the No Action Alternative, Reclamation is responsible for protecting water quality and sensitive natural, cultural, and other resources including Indian Trust Assets, and to ensure compatibility with the primary purpose of the ALP Project for municipal and industrial water supply.

### 2.1 Proposed Action—2014 Recreation Plan

The Proposed Action would allow public recreational opportunities and develop recreational facilities as described in the 2014 conceptual recreation plan (Reclamation and City of Durango 2014) (see Appendix C). This plan was developed as a result of discussions initiated in 2011 with the City of Durango (City) exploring the feasibility of their development and management of recreation at Lake Nighthorse. These discussions led to a consensus among project stakeholders on restricted development and management of recreational opportunities and facilities to ensure compatibility with the primary purpose of the project (municipal and industrial water supply). This plan was developed in accordance with guiding principles and best management practices that include protection of cultural resources; compliance with standards and regulations; monitoring and protection of water quality; acknowledgement of Brunot Treaty rights; promotion of ecological sustainability and protection of wildlife habitat; and to provide proper stewardship and law enforcement for public access. Under the Proposed Action, the City would serve as the recreation manager under contract with Reclamation. The City would annex the recreational area (footprint) proposed under this alternative. Compared with the other two action alternatives, recreational development at Lake Nighthorse under the Proposed Action would be more limited in scope and extent.

### **2.1.1 Proposed Action Activities and Restrictions**

Public recreational activities under the Proposed Action would include day use only, from sunrise to sunset. Activities would include paddle sports including canoeing, kayaking, rowing, sculling, and stand-up-paddle boarding; swimming and scuba diving; and fishing. Motorized boating, including water skiing and wake boarding, would be allowed, however, the lake would be closed to all motorized boating from mid-November to mid-May (unless the CPW, U.S. Fish and Wildlife Service (USFWS), Reclamation, ALPOMRA, and the recreation manager agree to an earlier spring opening or later fall closure on an annual basis). Designated land areas in the south and west portions of the project area would be closed to public access from mid-November to mid-May to protect wildlife habitat. All areas within ¼ mile of golden eagle nest sites would be closed to public access from December 1 to July 15. Temporary closures due to unforeseen events may occur periodically.

Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

### **2.1.2 Proposed Action Facilities**

Under the Proposed Action, development would be limited to the minimum facilities necessary to open the area to the public, including facilities for public health and safety, law enforcement, and environmental protection. Specifically, these facilities would consist of an overflow parking area for the existing boat ramp, including a connecting trail, improvement of boat ramp access road by regrading and application of a chip seal surface, and development of a courtesy dock system at the existing boat ramp. Public rest rooms would be provided. Figure 3 depicts the proposed recreation footprint and the general location of the facilities proposed under this alternative. Figure 4 shows the location and configuration of the boat ramp access road realignment, boat ramp overflow parking area, and access/connector trail.

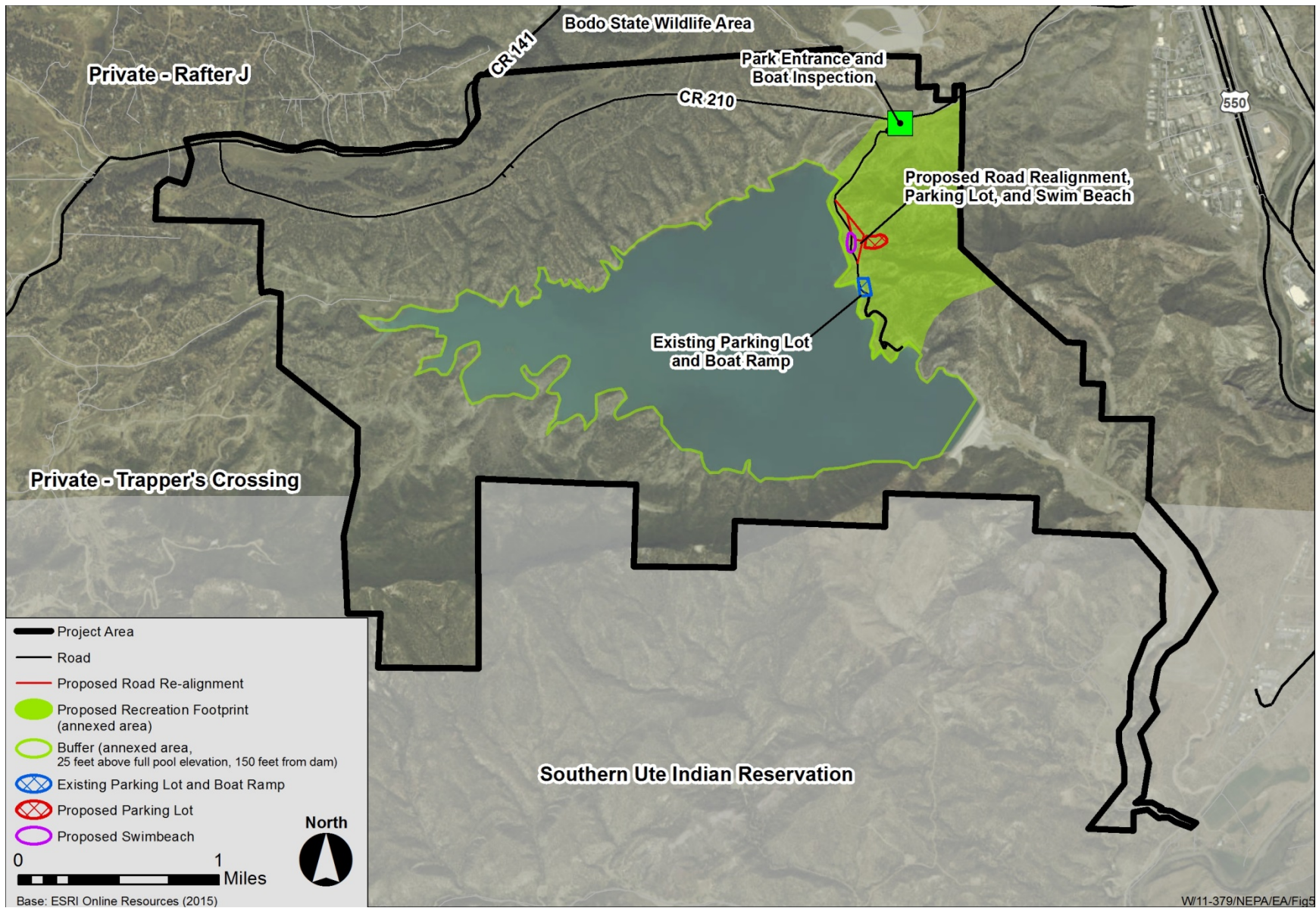
Constructed in phases, future recreational development under this alternative may include interpretive displays such as wayside exhibits, a natural surface trail connecting Lake Nighthorse to the Animas River Trail, a looped natural surface trail system on the east side of the reservoir, linkages with other trails outside the project area, a public swim beach and picnic area, a trail connecting the swim beach to the overflow parking area, breakwater structures at the boat ramp and swim beach, a public campground with access near the entrance station, a permanent entrance building, and day use picnic and/or parking areas along the east lakeshore. Any future development not included in this FEA would be subject to additional environmental review and approval by Reclamation.

To address Reclamation's concerns about safety and security associated with the dam and appurtenant facilities, there would be no public access to the dam and Basin Creek downstream of the dam to La Posta Road including certain areas associated with the Ridges Basin Inlet Conduit. A segment of the existing utility access road immediately northeast of the dam would be permanently closed to public access. The remaining segment of this road (from the point of permanent public access closure northeast of the dam to the existing boat ramp) would be closed to public vehicular access, though nonmotorized access would be permitted. This alternative would

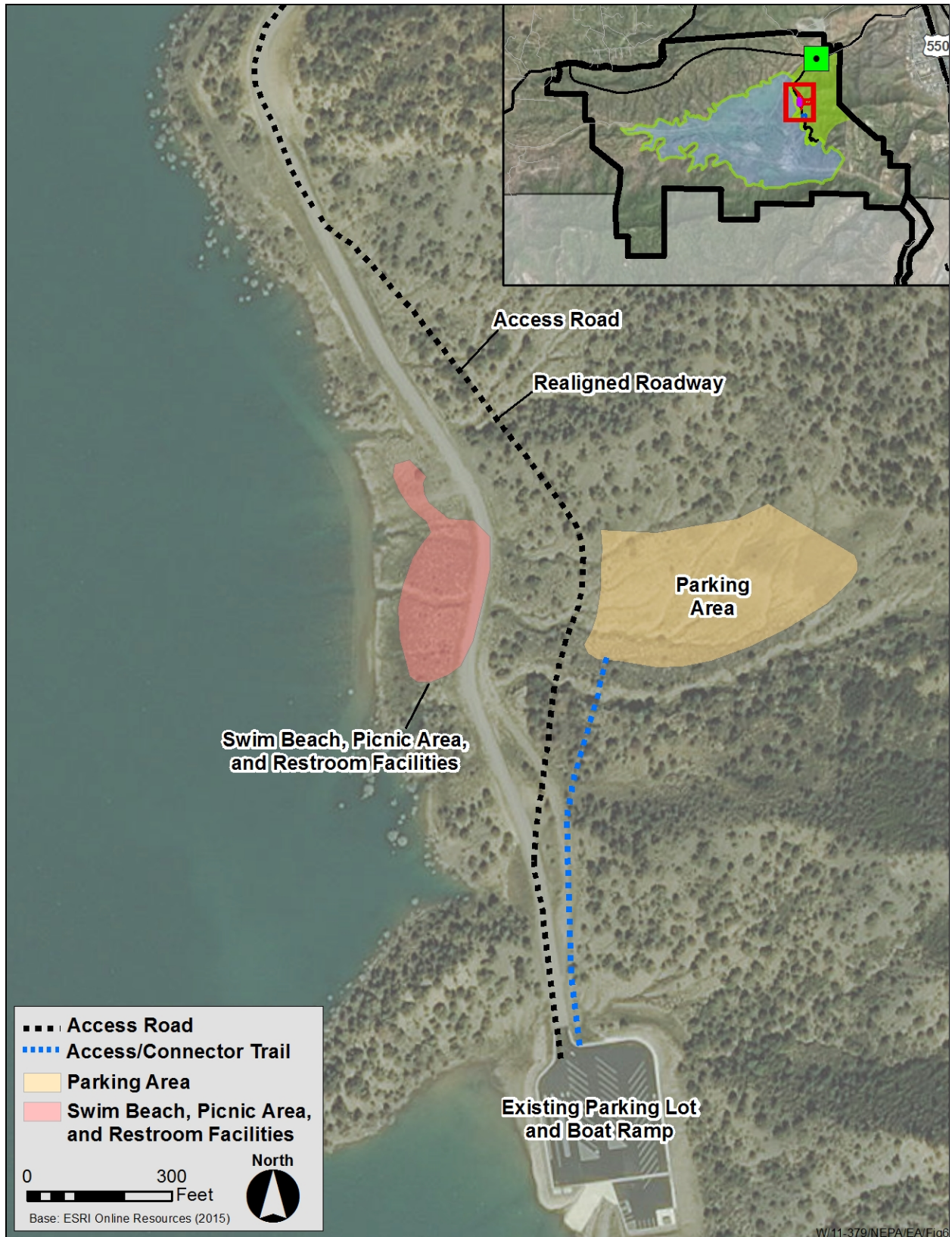


allow public access within a 25-foot wide buffer along the entire reservoir shoreline, except for the face of the dam and subject to seasonal restrictions.

Funding for development, maintenance, and management of the recreational facilities (capital and operation costs) would come from user fees, grants, and subsidies and would be contingent upon appropriation. Low-impact commercial activities such as boat rentals, scuba lessons, rescue classes, and children's day camps would be allowed under the Proposed Action and would add revenue and expand the spectrum of recreational opportunities. Large events such as tournaments and music festivals would be reviewed on a case-by-case basis with the City, the ALPOMRA and its individual members, and Reclamation.



**Figure 3. Proposed Action (2014 Recreation Plan).**



**Figure 4. Proposed Action (2014 Recreation Plan)—Swim beach area detail.**

## **2.2 Action Alternative 1—2011 Recreation Plan**

This alternative would implement the Draft Recreation Master Plan developed for Lake Nighthorse in 2011 (DHM Design 2011). This draft plan was initiated by ALPWCD and developed through a collaborative public involvement process that took place from March 2009 through April 2011 and included open houses, a public forum, issues and design workshops, which identified a public desire for a variety of recreational opportunities, including boating, swimming, multi-use trails, fishing, hunting, camping, picnicking, other activities, and special events. Under this alternative, implementation of the improvements would occur in phases, as available funding allowed.

### **2.2.1 Action Alternative 1 Activities and Restrictions**

This alternative would include the activities and restrictions identified in the proposed Action, plus overnight camping, a hardened, accessible trail and parking. Public recreational activities would include day use only, from sunrise to sunset. Activities would include hiking, running, biking on designated trails; paddle sports including canoeing, kayaking, rowing, sculling, stand-up-paddle boarding; swimming and scuba diving; and fishing. Motorized boating would be allowed every day during the open season, but the lake would be closed to all motorized boating from mid-November to mid-May (unless the CPW, U.S. Fish and Wildlife Service (USFWS), Reclamation, ALPOMRA, and the recreation manager agree to an earlier spring opening or later fall closure on an annual basis). Designated areas in the south and west portions of the project area would be closed to public access from mid-November to mid-May to protect wildlife habitat. All areas within ¼ mile of golden eagle nest sites would be closed to public access from December 1 to July 15. Temporary closures due to unforeseen events may occur periodically.

Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

Same as the Proposed Action, to address Reclamation's concerns about safety and security associated with the dam and appurtenant facilities, there would be no public access to the dam and Basin Creek downstream of the dam to La Posta Road including certain areas associated with the Ridges Basin Inlet Conduit under Action Alternative 1. A segment of the existing utility access road immediately northeast of the dam would be permanently closed to public access. The remaining segment of this road (from the point of permanent public access closure northeast of the dam to the existing boat ramp) would be closed to public vehicular access, though nonmotorized access would be permitted.

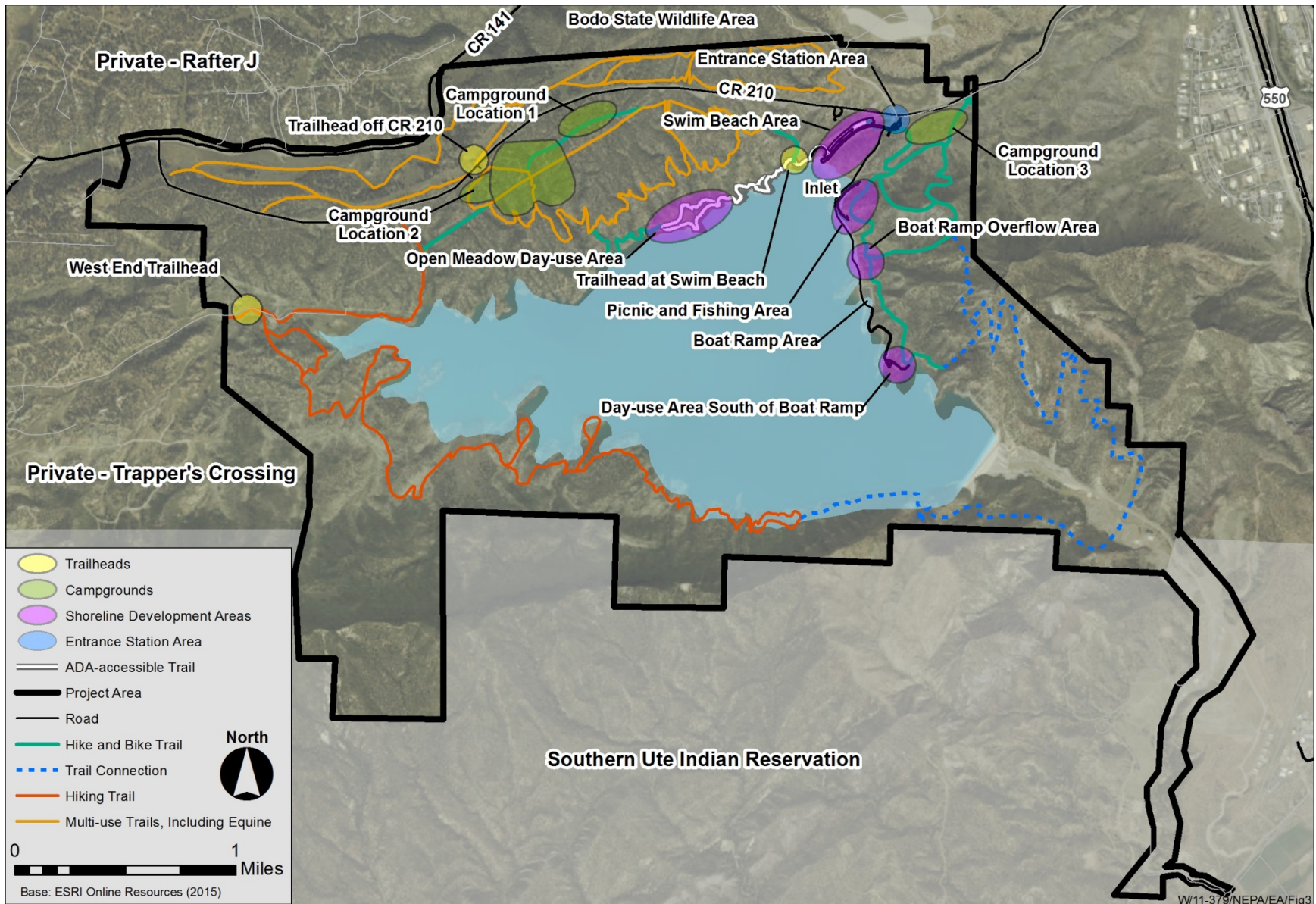
### **2.2.2 Action Alternative 1 Facilities**

As funding permits, facilities initially constructed under this alternative would include, a 2.4-mile ADA-accessible trail and trailhead, a nonmotorized boat launch area; a swim beach; a parking area to service the proposed swim beach, trail, and nonmotorized boat launch area; a vehicle turnaround and limited ADA parking at the end of the swim beach area access road; and a courtesy dock and breakwater at the existing boat ramp.

For subsequent phases, proposed facilities include a boat ramp overflow parking area; a proposed fishing and picnic area with access road, parking area, and trail; multi-use trails; a trailhead on the

north side of CR 210; a trailhead at the west end of the lake off CR 211; three campgrounds; 40 boat slips for campers at the existing boat ramp; and a day-use area south of the existing boat ramp. Figure 5 depicts the general location of the facilities proposed under all phases. Figure 6 shows the location and configuration of the swim beach, the ADA-accessible trailhead, the nonmotorized boat launch, and associated parking areas under this alternative.

As under the Proposed Action, development and operation of recreational facilities under Action Alternative 1 would occur through the establishment of a management authority under contract with Reclamation. Funding for development, maintenance, and management of the recreational facilities would come from user fees, grants, and subsidies. Low-impact commercial activities such as boat rentals, scuba lessons, rescue classes, and children's day camps would be allowed under this alternative and would add revenue and expand the spectrum of recreational opportunities. Large events such as tournaments and music festivals would be reviewed on a case-by-case basis with the recreation manager, the ALPOMRA and its individual members, and Reclamation. Capital improvements would occur in phases, contingent on funding availability. Funding sources would be the same as under the Proposed Action, and other activities and events would be allowed contingent on review and approval by the recreation manager, the ALPOMRA, and Reclamation.



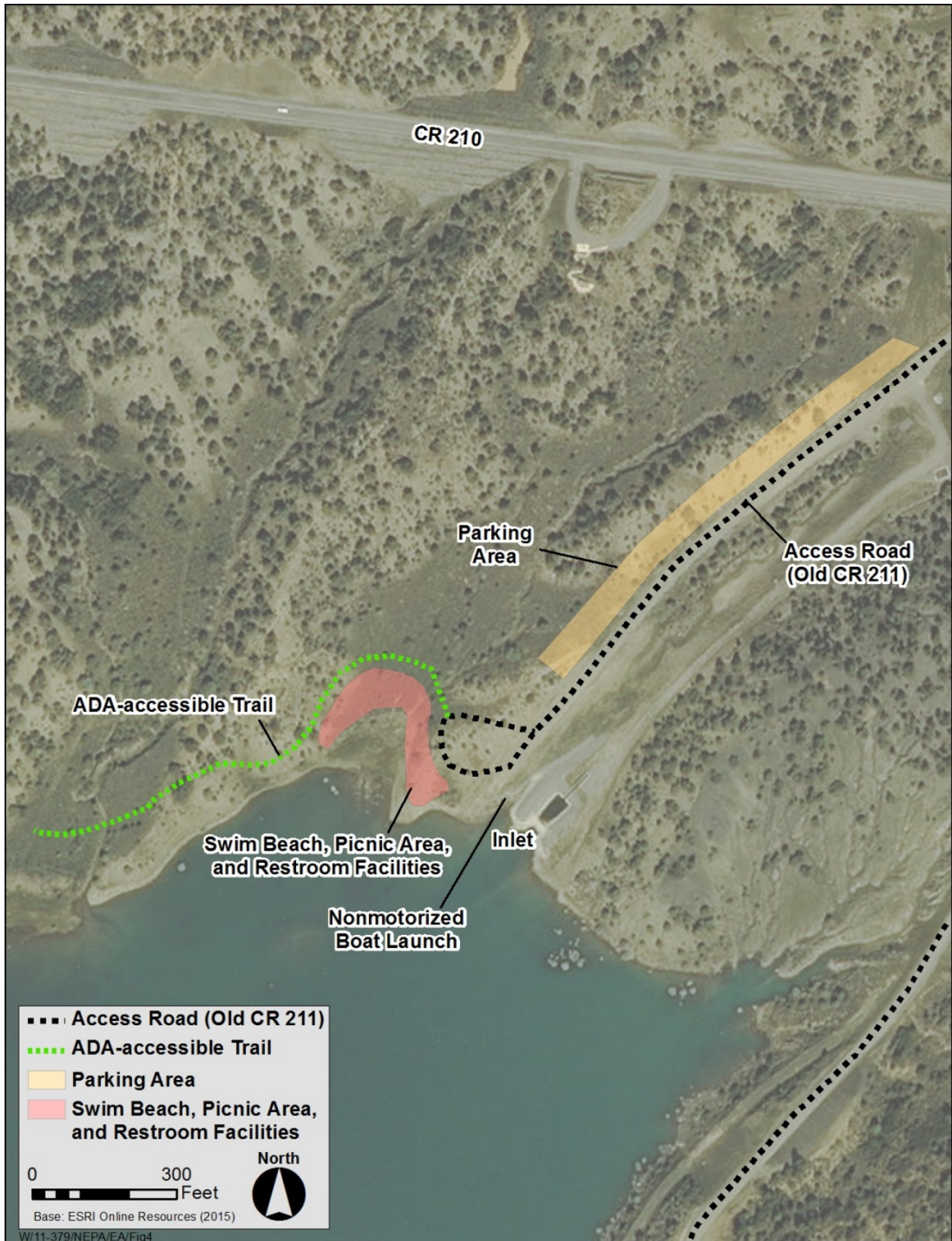


Figure 6. Action Alternative 1 (2011 Recreation Plan)—Swim beach area detail.

## **2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

Action Alternative 2 would develop recreational facilities as contemplated in the 2000 FSEIS (Reclamation 2000a) and described originally in the 1980 Final Environmental Statement and the associated 1980 Definite Plan Report (Reclamation 1980b). The scope and extent of recreational development would be similar to that of Action Alternative 1, but facilities would be located primarily along the north lakeshore rather than the east lakeshore (Figure 7). These would include hiking trails, a campground, picnic area, marina, boat ramp and parking, a public beach for swimming, and a fisherman access area. Some facilities proposed under Action Alternative 1 would not be developed under Action Alternative 2—the boat ramp courtesy dock and an overflow parking area for the existing boat ramp on the east lakeshore, the ADA-accessible trail, the nonmotorized boat launch and parking area, and the fishing/picnic/day-use areas on the east lakeshore.

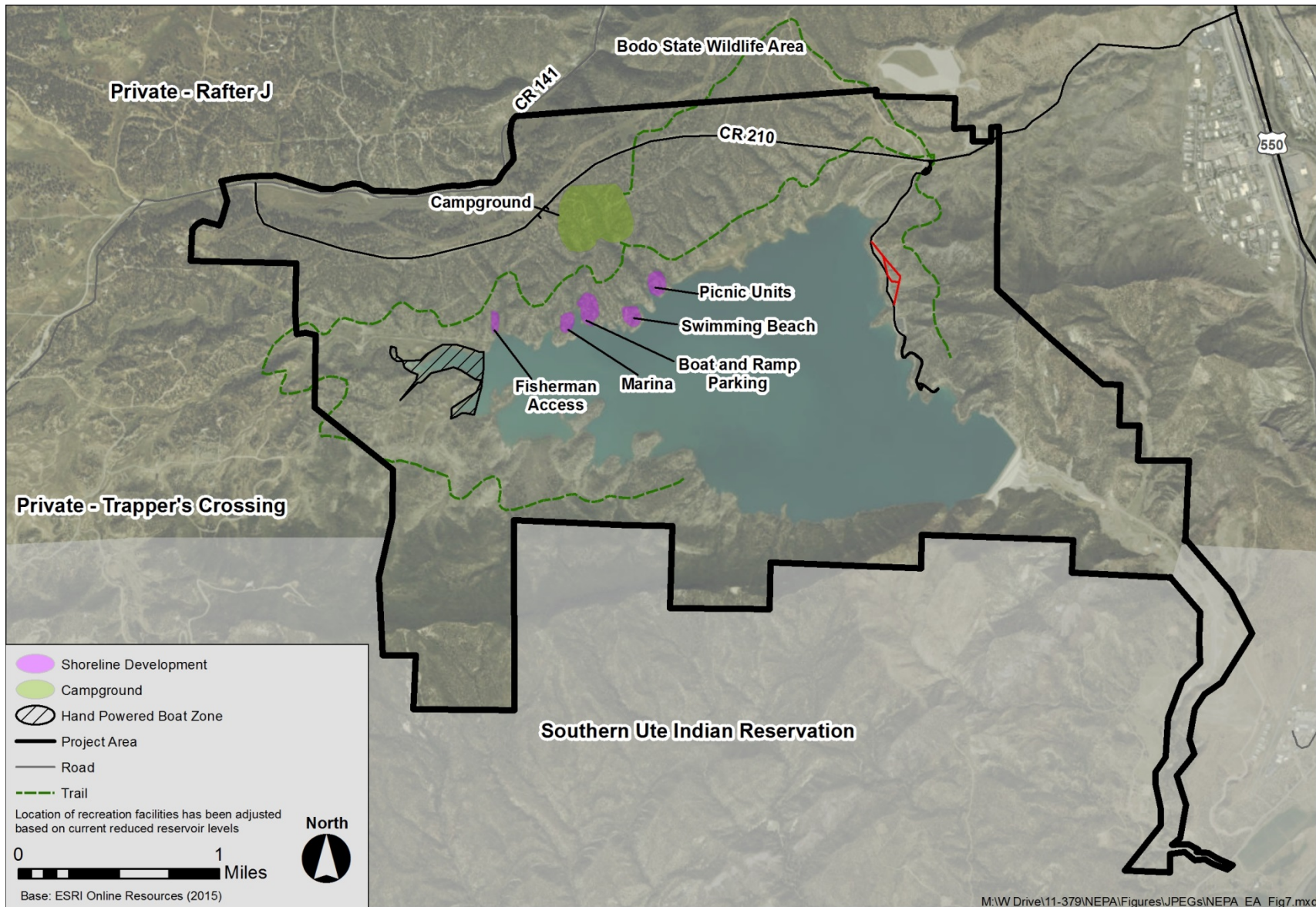
### **2.3.1 Action Alternative 3 Activities and Restrictions**

Public recreational activities under Action Alternative 3 would be the same as those under the Proposed Action. Restrictions would be the same as those under the Proposed Action.

Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

Same as the Proposed Action and Action Alternative 1, to address Reclamation's concerns about safety and security associated with the dam and appurtenant facilities, there would be no public access to the dam and Basin Creek downstream of the dam to La Posta Road including certain areas associated with the Ridges Basin Inlet Conduit under Action Alternative 2. A segment of the existing utility access road immediately northeast of the dam would be permanently closed to public access. The remaining segment of this road (from the point of permanent public access closure northeast of the dam to the existing boat ramp) would be closed to public vehicular access, though nonmotorized access would be permitted.





**Figure 7. Action Alternative 2 (2000 FSEIS Recreation Plan).**

## 2.4 No Action Alternative

Reclamation defined the No Action Alternative as no change from the current management. Current management is based on a *Federal Register* notice issued in 2003 that closed Reclamation land in Ridges Basin to public access and recreational activities indefinitely. Under the No Action Alternative, the reservoir area and area below the dam would remain closed to the public. The reservoir would be managed solely for water storage as part of the ALP Project. Fencing and gates that currently prevent public access would be maintained by Reclamation, and patrolling of the site by Reclamation and the La Plata County Sheriff's Office would continue to prevent or minimize unauthorized entry. Under the No Action Alternative, development of appropriate recreational facilities at Lake Nighthorse, as authorized by the Colorado Ute Settlement Act Amendments of 2000 (P.L. 106-554, Section 302[a][1][A][i][IV]), would not occur. This alternative would not meet the intent of the Motorboat Access Grant issued by the State of Colorado.

Reclamation acknowledges the Tribes' Brunot Treaty rights; however, the reservoir area will remain closed to all activities under the No Action Alternative.

## 2.5 Commitments Common to the Action Alternatives

Table 1 lists commitments associated with the action alternatives. The commitments pertain to all action alternatives (Proposed Action, Action Alternative 1, and Action Alternative 2), except where otherwise noted. These commitments represent measures identified as mitigation in the FSEIS or developed to address specific issues identified from public outreach and agency coordination during the 2011 recreation master planning process. Some of these measures have been adapted or modified based on the analysis in this document. Geographic boundaries of use restrictions common to the action alternatives are depicted in Figure 8.

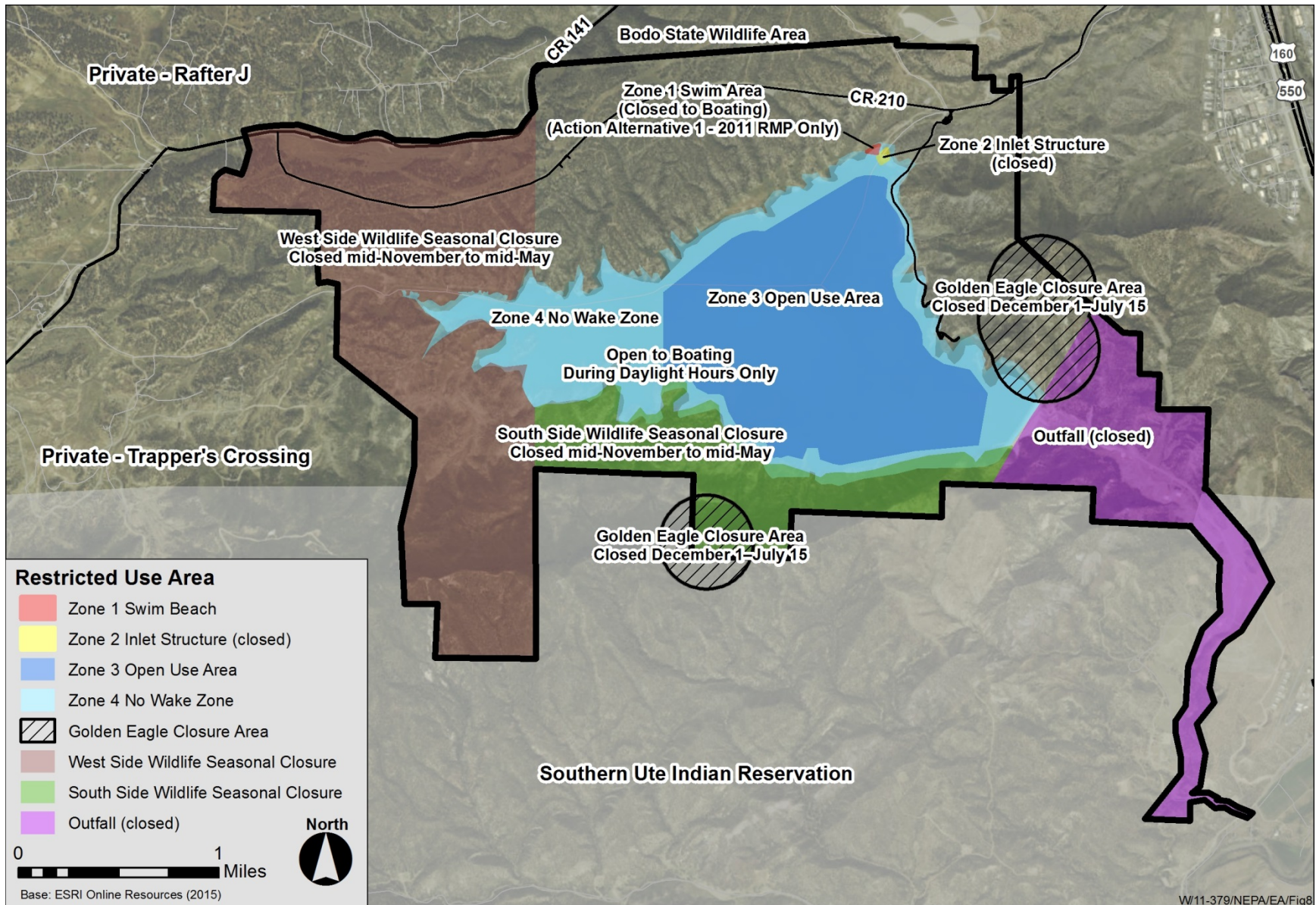


Figure 8. Use restrictions common to all action alternatives.

**Table 1. Commitments common to the action alternatives.**

<b>Measures</b>	<b>Issues/Resource(s) Targeted</b>
The lake would be closed to all motorized boating recreation from mid-November to mid-May. The lake may open earlier in the spring or stay open later in the fall if agreed by the CPW, Reclamation, and the recreation manager. <sup>1,2</sup>	Wildlife (impacts to elk and deer winter range), noise
No boats would be operated on the lake from sunset to sunrise. <sup>3</sup>	Wildlife, noise, public safety
An ANS monitoring, education, and inspection program would be implemented. <sup>3</sup>	Aquatic resources, water quality
All motor boats would be required to be equipped with mufflers that maintain sound levels below 86 decibels on the A-weighted scale (dBA) at 50 feet from the boat and below 55 dBA in neighboring residential areas (measured outdoors). <sup>3</sup>	Noise (impacts on nearby private residences)
The lake would be zoned and marked with buoys to denote no boating near any swim beach, the inlet, and the dam; no wake zones at the west end of the lake and around the shoreline; and open use areas where motorized boat travel up to 40 miles per hour (mph) would be allowed. At minimum pool (750 acres), the entire lake would be zoned as a no wake zone. <sup>3</sup>	Noise (impacts on nearby private residences), user conflicts, public safety
Breakwaters would be constructed at any swim beach and boat ramp areas. <sup>3</sup>	User conflicts, public safety
Swimming, wading, snorkeling, scuba diving, rafting, or tubing would be prohibited within 300 yards of the dam and inlet structure; within 100 yards of buoys or barriers marking public access limits; at the boat dock and boat launch site; and in designated mooring areas.	User conflicts, public safety
Motorized personal watercraft (e.g., jet skis) with open-air exhaust and two-stroke engines; houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats would not be allowed on the lake. <sup>3</sup>	Noise (impacts on nearby private residences), user conflicts, public safety
All boats would be required to operate at safe speeds, not exceeding 40 mph in open use zones and not exceeding 5 mph in no wake zones. <sup>3</sup>	Public safety
No fueling would be allowed on the lake, and all fueling shall occur in designated areas only. <sup>3</sup>	Water quality
Scuba diving would require the use of a diver's flag to warn other boaters. <sup>3</sup>	Public safety
Water skiing would be allowed only in areas of the lake zoned for open use. <sup>3</sup>	User conflicts, public safety
Flotation devices would be required for all persons being pulled or towed by a boat, and this activity shall be prohibited within 500 feet of entrances, swimming beaches, and mooring areas, and within 100 feet of any person swimming, fishing, or diving; motorized boat travel shall be required to proceed in a counterclockwise direction. <sup>3</sup>	Public safety, user conflicts
The south and west portions of the project area would be closed to public access from mid-November to mid-May and open only to foot traffic outside the seasonal closure period. No recreational facilities or other facilities, such as cabin sites, shall be developed in the project area under any of the action alternatives. <sup>1,2</sup>	Wildlife (impacts to elk and deer winter range)
All areas within ¼ mile of historic and current golden eagle nest sites shall be closed to public access from December 1 to July 15. <sup>1,3</sup>	Wildlife (impacts to golden eagle nesting habitat)

<b>Measures</b>	<b>Issues/Resource(s) Targeted</b>
Efforts would be made to avoid construction from May–July in the vicinity of elk calving areas. <sup>1</sup>	Wildlife (impacts to elk calving areas)
Snowmobiles, off-road vehicles, and aircraft would be prohibited.	Wildlife (impacts to elk and deer), noise, natural resources
Facilities, including trails, would be designed to prevent future erosion and sedimentation. A Storm Water Management Plan, if necessary, shall be prepared and implemented, and best management practices shall be installed prior to all construction activities in accordance with state and federal regulations. <sup>1, 2</sup>	Water quality
All lighting would be dark-sky compliant. Lighting shall be solar-powered, to the extent feasible. <sup>2</sup>	Visual quality
All roadways open to public and other use shall be graveled initially and improved as need arises and funding allows. <sup>2</sup>	Air quality
All structures would complement the existing landscape through the use of natural materials; parking lots and campgrounds shall be tucked into existing landforms; and utilities shall be installed underground. <sup>2</sup>	Visual quality
All landscaping would consist of native and adapted vegetation pre-approved by Reclamation. <sup>2</sup>	Natural resources, visual quality
Structures would be constructed of fire-resistant materials, and locations of existing utilities shall be verified prior to construction. <sup>1, 2</sup>	Public health and safety
Design and construction of trails would minimize erosion and sedimentation through construction in dry periods only, diversion of runoff across trails, maintenance of existing drainages, stabilization of all disturbed slopes with vegetation after construction, installation of signage and fencing to discourage social (undesignated) trails as needed. Under Action Alternatives 1 and 2, any trails north of CR 210 shall incorporate existing ranch and service roads. <sup>1, 2</sup>	Water quality, natural resources
Under Action Alternatives 1 and 2, any trails on the south and west sides of the reservoir would be designated for foot traffic only. <sup>1, 3</sup>	Wildlife
Disturbance and removal of slow-growing trees, such as pinyon pine, juniper, and ponderosa pine, would be minimized to the extent possible.	Vegetation
Dogs would be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off leash dogs would be permitted. <sup>2</sup>	Public health and safety
Trail development in the project area would be coordinated with the Southern Ute Indian Tribe, Ute Mountain Ute Tribe, Trails 2000, the City of Durango, La Plata County, ALPOMRA, and the CPW, and opportunities for linkage with other trail systems outside the project area may also be considered. <sup>2</sup>	Recreation
Wildlife-resistant trash receptacles would be used. <sup>2</sup>	Public health and safety, wildlife
Campgrounds would have hosts and shall be managed and patrolled 24 hours a day and seven days a week when open. Quiet hours shall be designated from 10 p.m. to 6 a.m. <sup>3</sup>	Public health and safety
Fire hazard mitigation plans would be developed and implemented for each campground and shall specify, at a minimum, no fires outside grills or fire rings, no unattended fires, and no discharge or use of fireworks. <sup>3</sup>	Public health and safety

Measures	Issues/Resource(s) Targeted
The recreation manager, Reclamation, and the ALPOMRA would continue to coordinate with the Colorado Department of Public Health and Environment (CDPHE) regarding inclusion of Lake Nighthorse in a statewide fish tissue monitoring program to assess bioaccumulation of mercury and to develop protective measures, if warranted. <sup>1</sup>	Public health and safety, water quality, wildlife
Reclamation would commit to providing trout to be stocked in Lake Nighthorse to provide a recreational fishery. <sup>1</sup>	Recreation
A Cultural Resource Management Plan (CRMP) would be prepared, a Programmatic Agreement would be prepared, and the 36 CFR 800 process completed. As needed, an archaeologist shall be available during all construction activities in the project area. The recreation manager shall assign staff to monitor recreational activities and enforce rules, regulations, and/or measures for the protection of cultural resources. Shoreline monitoring will be conducted pursuant to an approved CRMP.	Cultural resources
Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.	Brunot Treaty rights
Construction contractors would be required to implement measures to control fugitive dust and exhaust emissions during construction, such as water spraying of access roads and materials storage piles. <sup>1</sup>	Air quality
Reclamation would ensure that construction contractors provide blasting notification to residents, sound pre-blast alarms, and follow the construction safety plan as described in the FSEIS. Construction activities shall be scheduled to avoid or minimize loud activities in the vicinity of golden eagle nesting areas during the nesting season. <sup>1</sup>	Noise, wildlife

<sup>1</sup> Environmental commitments identified in the FSEIS.

<sup>2</sup> Design guidelines identified in the 2011 Draft Recreation Master Plan.

<sup>3</sup> Rules and regulations, including closures and use restrictions, identified in or adapted from the 2011 Draft Recreation Master Plan.

## 2.6 Alternatives Considered But Eliminated

### 2.6.1 No Motorized Boats

In response to public input, closure of the lake to motorized boats was considered early in the planning process and was reviewed based on the public comments received on the DEA (see Appendix B). While acknowledging the many comments received opposing use of motor boats, Reclamation and its managing partners believe with the restrictions identified in all action alternatives, motorized boating should be allowed.

This alternative was eliminated from further consideration because it would not meet the projected demand for this type of activity. Motorized boating is anticipated to be one of the primary drivers of recreation at Lake Nighthorse, representing 18 percent of the total estimated annual user days (nearly 29,000 of the projected 163,197 annual user days) (RPI Consulting 2010a). Elimination of

motorized boating would reduce visitor spending during the May to October (summer tourism) period. Visitor spending represents 20 percent of all spending in La Plata County during this period (RPI Consulting 2010b).

Concerns identified by the public with regard to noise and conflicts with other users are addressed in the action alternatives through requirements for sound muffling of engines, proposed establishment of no wake zones, construction of breakwaters, and prohibition of use by motorized personal watercraft, houseboats, cabin cruisers, and open-air-exhaust boats. Furthermore, funding for the existing boat ramp was obtained through a grant from Colorado State Parks (currently known as the CPW).<sup>1</sup> The associated funding is derived from motorboat fuel taxes administered by the U.S. Fish and Wildlife Service (USFWS) Sport Fish Restoration Program to develop motorized boating recreation.

### **2.6.2 Swim Beach Location at Open Meadow Day-use Area**

This alternative would implement Action Alternative 1 but would locate the swim beach in the open meadow day-use area along the north lakeshore, near the end of the proposed 2.4-mile ADA-accessible trail. This alternative would require approximately 3,500 linear feet of new road construction to access the site. It was eliminated because of the cost associated with additional roadway development and greater impacts on cultural and natural resources along the north lakeshore.

### **2.6.3 Swim Beach Location along North Lakeshore and East of Inlet Structure**

This alternative would implement Action Alternative 1 but would locate the swim beach in a cove along the north lakeshore, approximately 1/10 mile east of the inlet structure and old CR 211. The swim beach would be accessed from the north end of the boat access road. This alternative was eliminated from further consideration due to concerns with steep topography and conflicts with the existing drainage patterns.

### **2.6.4 Swim Beach Location South of the Existing Boat Ramp**

This alternative would implement Action Alternative 1 but would locate the swim beach in a large cove along the east lakeshore between the existing boat ramp and the dam, approximately ½ mile south of the boat ramp. This alternative was eliminated from further consideration due to steep topography, the proximity of identified cultural resource sites, required access through the existing boat ramp area and parking lot, and lack of suitable space for the development of parking adjacent to the site.

## **2.7 Summary of Alternatives**

Table 2 summarizes the differences between the alternatives under consideration with regard to recreational facilities developed and their location. Table 3 summarizes the environmental consequences, by resource topic, of each of the alternatives under consideration.

<sup>1</sup> In 2011, Colorado State Parks and Colorado Division of Wildlife were merged to create one agency—CPW.

**Table 2. Summary of differences among alternatives under consideration.**

<b>Elements</b>	<b>Proposed Action—2014 Recreation Plan</b>	<b>Action Alternative 1—2011 Recreation Plan</b>	<b>Action Alternative 2—2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Access	Day use. Land-based access limited to east portion of recreational area/lakeshore and a 25-foot buffer around the entire lakeshore. Picnicking allowed along shoreline, swimming and fishing allowed from shoreline and boats. Entire lake open to boating with seasonal restriction. Seasonal closures on west side for wildlife. Possible future recreational development may include overnight use.	Day use and overnight. Land-based access to most of recreational area/lakeshore, except area near/below dam. Entire lake open to boating with seasonal restriction. Seasonal closures on west side for wildlife and south and east sides for eagle nesting.	Same as Action Alternative 1.	No public access.
Trails	Trail development limited to a short trail segment connecting the proposed overflow parking area with the existing boat ramp and the parking area on the east lakeshore. Possible future recreational development may include a trail connecting Lake Nighthorse to the Animas River Trail, a looped trail system on east side of reservoir, and potential linkages with other trails outside project area.	2–4 miles of ADA-accessible trail in initial phase. Additional multi-use trails in possible future phases, resulting in a total of 28.6 miles of trail, forming complete loop around lake.	10 miles of trail on east, north, west, and south sides of lake; only partial loop around lake.	No trails developed.
Camping	None.	Future phases would include two campgrounds in north portion of recreational area and one in northeast portion near entry area.	One campground in the north portion of the recreational area.	No campgrounds developed.
Picnic/day-use sites	Phased in public swim beach and picnic area, trail connecting swim beach to overflow parking area, and day use picnic area along east lakeshore.	Open meadow day-use area on north lakeshore; swim beach/picnic sites on northeast lakeshore; picnic and fishing area on east lakeshore; and day-use area on east lakeshore south of boat ramp.	Swim beach, picnic sites, and fishing access on north lakeshore.	No picnic/day-use sites developed.



<b>Elements</b>	<b>Proposed Action—2014 Recreation Plan</b>	<b>Action Alternative 1—2011 Recreation Plan</b>	<b>Action Alternative 2—2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Other recreational facilities	None. Possible future recreational development may include breakwaters at boat ramp and swim beach and permanent entrance building/station.	Nonmotorized boat launch on north lakeshore, courtesy dock and breakwater at existing boat ramp, and permanent entrance building/station.	None developed.	None developed.

**Table 3. Summary of environmental consequences of alternatives analyzed in detail.**

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Recreation	<p>Estimated 86,308 total annual user-days initially. Total user days would increase if campground, trails, swim beach, and separate day-use area are developed as part of possible future development, but would be less than the 163,197 annual user days estimated for Action Alternative 1 due to fewer campsites, trail miles, and day-use areas overall.</p> <p>Development of facilities to support recreational opportunities including boating, fishing, and swimming. Public use of cold water fishery established and maintained in reservoir. Possible future recreational development for camping, other day use, and trails.</p> <p>Potential user conflicts are higher compared with Action Alternative 1 due to fewer overall facilities and concentration of recreational uses on the east lakeshore.</p> <p>Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.</p>	<p>Estimated 163,197 annual user days by recreationists, primarily from May through October, increasing to 197,353 user days annually by 2025.</p> <p>Development of facilities to support recreational opportunities, including boating, fishing, camping, swimming, and trail use. Public use of cold water fishery established and maintained in reservoir.</p> <p>Potential for user conflicts among pedestrians, bicyclists, and equestrians on multi-use trails and between motorized and nonmotorized boaters but would be addressed through posting and implementation of rules and regulations. Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.</p>	<p>Estimated 218,400 annual user days by recreationists, primarily from May through October, increasing to 264,264 user days annually by 2015.</p> <p>Same recreational facilities as Action Alternative 1, except fewer miles of hiking trail, fewer separate day-use areas, more picnic sites, fewer campgrounds (but more total campsites), and no ADA-accessible trail or nonmotorized boat launch. Public use of cold water fishery established and maintained in reservoir.</p> <p>Potential user conflicts are higher compared with Action Alternative 1 due to less dispersal of recreational facilities throughout the project area. Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.</p>	<p>No additional recreational facilities developed. Project area remains closed to public. No effects on recreational use patterns or distribution of market share across region.</p> <p>No public use of cold water fishery established in lake.</p> <p>Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.</p>

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Socioeconomics and Community	<p>Would contribute to continued growth of tourism sector by providing additional recreational opportunities resulting in direct, indirect, and induced economic benefits from increased employment opportunities, retail sales, and economic output.</p> <p>Additional employment opportunities would contribute to increased population growth and demand for affordable housing, transportation/ utility infrastructure, and government services.</p>	<p>Increased recreational facilities development would result in greater economic benefits (employment opportunities, retail sales, economic output) compared with the Proposed Action.</p> <p>Larger increase in population growth and demand for affordable housing, transportation/utility infrastructure, and government services compared with Proposed Action.</p>	<p>More employment opportunities, higher retail sales and economic output, more population growth and higher demand on housing, infrastructure, and government services compared with Action Alternative 1 due to higher estimated recreation user days.</p>	<p>No increase in recreational opportunities and associated economic benefits in Durango and La Plata County.</p> <p>Would not generate additional jobs in tourism or related sectors and would not contribute to population growth or existing and future demands on affordable housing, transportation/utility infrastructure, or government services.</p>
Environmental Justice	No impact on populations or communities defined under Executive Order (EO) 12898 due to their absence in project area.	Same as Proposed Action.	Same as Proposed Action.	Same as Proposed Action.
Cultural Resources	Any adverse effects on historic properties would be managed under a CRMP and agreement document under 36 CFR 800.	Any adverse effects on historic properties would be managed under a CRMP and agreement document under 36 CFR 800.	Any adverse effects on historic properties would be managed under a CRMP and agreement document under 36 CFR 800.	Any adverse effects on historic properties would be managed under a CRMP and agreement document under 36 CFR 800.
Indian Trust Assets	No effect on assets associated with water rights assigned to the Colorado Ute tribes under the Colorado Ute Indian Water rights Settlement Act.	Same as Proposed Action.	Same as Proposed Action.	Same as Proposed Action.

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Brunot Treaty rights	<p>The proposed recreation footprint (as shown in Figure 3) would be subject to annexation.</p> <p>Public access to the project area would allow tribal members to fish in the project area.</p> <p>Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.</p>	<p>Public access to the project area would allow tribal members to fish in the project area.</p> <p>Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.</p>	Same as Action Alternative 1.	The project area would remain closed to tribal members and the public for hunting and fishing. Reclamation acknowledges the Tribes' Brunot Treaty rights; however, the reservoir area will remain closed to all activities under the No Action Alternative.
Noise	<p>Operation of construction equipment would result in temporary noise increases. Operation of motorboats and motor vehicles and use of recreational facilities would result in long-term increases in ambient noise levels. Noise increases would not exceed Environmental Protection Agency (EPA) or municipal standards.</p>	<p>Same as Proposed Action except for higher noise effects on sensitive receptors (residential subdivisions) due to increase in recreational facilities developed and development would not be limited to the east lakeshore. As with Proposed Action, noise increases would not exceed EPA or municipal standards.</p>	Same as Proposed Action and Action Alternative 1, except the siting of most recreational facilities along the north lakeshore would result in higher noise levels at sensitive receptors during and after construction due to recreational use of these facilities and associated increases in traffic on CR 210.	No construction- or recreation-related increase in noise levels.

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Natural Resources	<p>Removal or disturbance of 4 acres of vegetation as part of initial development and additional acres as part of possible future development; indirect effects on vegetation from recreational use.</p> <p>Direct and indirect effects on wildlife, including removal and disturbance of habitat for deer, elk, and other species. Effects on nesting eagles mitigated through seasonal closures.</p> <p>No recreation-related effects on threatened, endangered, proposed, or candidate species.</p>	<p>Removal or disturbance of up to 128 acres of vegetation; indirect effects on vegetation from recreational use.</p> <p>Direct and indirect effects on wildlife, including removal and disturbance of habitat for deer, elk, and other species and additional traffic on CR 210. Development of trail segments through golden eagle buffer zones, but restricted from use during nesting season.</p> <p>More direct and indirect effects on wildlife and wildlife habitat compared with Proposed Action Alternative 1 due to more development of recreational facilities.</p> <p>No recreation-related effects on threatened, endangered, proposed, or candidate species.</p>	<p>Similar to Action Alternative 1, except more effects on wildlife due to siting of recreational facilities primarily on the north lakeshore, resulting in increased recreation-related traffic and associated vehicle-wildlife collisions on CR 210 and greater impacts to mule deer fawning and elk calving areas. Indirect effects on natural resources similar to Action Alternative 1.</p> <p>No recreation-related effects on threatened, endangered, proposed, or candidate species.</p>	<p>No recreation-related effects on vegetation, wildlife, or threatened, endangered, proposed, or candidate species.</p>

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Visual Quality/ Aesthetics	Modification of natural setting with development of recreational facilities on the east lakeshore, resulting in limited visual effects (in background views) for residential areas and motorists on CR 210 and CR 141. No additional sources of light would be added in the project area during nighttime hours.	Modification of natural setting with development of recreational facilities, including campgrounds (partly visible from CR 210 in foreground views and residential areas in midground views), day-use areas and parking lots (partly visible from CR 210, CR 141, and residential areas in background views), and trails (foreground views). Additional light emissions at night from recreational facilities and use.	Effects similar to Action Alternative 1, except the siting of most recreational facilities on the north lakeshore would potentially make these more visible from CR 141, CR 210, and from residential subdivisions.	No change to visual characteristics of project area.
Water Quality	Potential impacts from erosion or sedimentation and discharge of other pollutants from development/use of shoreline recreational facilities, motorized boating, and other water-based recreational facilities to WUS including wetlands that may form. These would be addressed through best management practices during construction, permanent water quality control features at developed sites, and water quality monitoring.	Similar to Proposed Action, except increased area of disturbance subject to erosion and sedimentation and greater potential impacts to WUS, including wetlands.	Same as Action Alternative 1.	No construction- or recreation-related effects on water quality.

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Air Quality	Construction of recreational facilities would result in temporary emissions of fugitive dust and engine combustion products but would be addressed by the CDPHE requirements/best management practices. Recreational activities would result in increased emissions of engine combustion products from vehicles and motorized boats but would not lead to or substantially contribute to nonattainment of air quality standards. Recreational use would contribute to greenhouse gas emissions but would not exceed the CEQ threshold.	Temporary effects from fugitive dust emissions during construction would be greater due to more ground disturbance compared with Proposed Action. Emissions from motorized boats would be similar to Proposed Action but there would be higher emissions from vehicles with Action Alternative 1.	Same as Action Alternative 1, except for higher vehicle emission compared with Action Alternative 1 due to more recreation annual user days.	No construction- or recreation-related effects on air quality.
Traffic	Increase in recreation-related traffic on roads and intersections affected by project, mostly on weekends. Development and anticipated use of recreational facilities would ultimately result in queuing issues on the eastbound leg of U.S. 550-160 and Frontage Road intersection and would begin to affect the functionality of the CR 210 and Frontage Road intersection.	Similar to Proposed Action but higher recreation-related traffic generated due to more recreational facilities developed at Lake Nighthorse.	Similar to Action Alternative 1, but higher traffic volumes due to more recreation annual user days.	No recreation-related increase in traffic or effects on the levels of service (LOS) on roadways or at intersections. Substandard LOS would still occur at U.S. 550-160 intersection in 2020 due to projected population growth.

<b>Resource Topic</b>	<b>Proposed Action— 2014 Recreation Plan</b>	<b>Action Alternative 1— 2011 Recreation Plan</b>	<b>Action Alternative 2— 2000 FSEIS Recreation Plan</b>	<b>No Action Alternative</b>
Public Health and Safety	Increased demand on law enforcement, fire protection, and emergency services. Increased potential for boating accidents, drowning, and other water-related incidents. These would be addressed through boating/use regulations. Motorized boating would create potential for hazardous materials spills. Recreation-related increase in traffic accidents.	Same as Proposed Action except larger increase in the demand on law enforcement, fire protection, and emergency services; higher potential occurrence of water-related accidents; and higher number of traffic accidents.	Similar to Proposed Action and Action Alternative 1, except higher demand on law enforcement, fire protection, and emergency services and potentially more traffic accidents due to higher recreation annual user days.	No recreation-related increase in water-related or traffic accidents and no additional demands on local law enforcement, fire protection, and emergency services. Reclamation and La Plata County Sheriff's Office would continue patrolling project area to monitor and enforce closure and maintain fencing and gates.



## 3.0 Affected Environment and Environmental Consequences

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### 3.1 Introduction

This chapter analyzes the direct and indirect effects of the alternatives on relevant resource topics. For each resource topic, the affected environment, environmental consequences, and mitigation measures (if applicable) are described. The analysis of effects is based on full build-out (initial and future phases or possible future development) under each of the action alternatives. Mitigation measures apply to all action alternatives considered, unless otherwise noted, and are additional to the commitments identified in Table 1. Cumulative effects are discussed in Chapter 4.

### 3.2 Recreation

#### 3.2.1 Affected Environment

The following discussion on recreation focuses on recreational activities considered integral to developed reservoir recreation: power/non-powerboating, fishing, camping, swimming, and trail use. The Recreation Market Assessment, Lake Nighthorse, Durango, Colorado (RPI Consulting 2010a) completed in June 2010 for the ALPWCD is the source of the estimates and projections reported. This assessment was completed for the 2011 Recreation Master Plan (Action Alternative 1). The results are discussed relative to the Proposed Action and Action Alternative 2, to the extent possible.

##### *3.2.1.1 Existing Reservoir-based Recreational Facilities*

Twelve major reservoirs, dozens of campgrounds, stocked lakes/managed fisheries, and 60 major trailheads are within the 100-mile driving radius of Lake Nighthorse. Seven of these reservoirs have recreational facilities and/or use patterns comparable to those proposed at Lake Nighthorse: Navajo, McPhee, Ridgway, Lemon, Vallecito, Mancos State Park, and Haviland Lake (RPI Consulting 2010a). Lake Nighthorse is currently not open to the public for recreational use.

##### *3.2.1.2 Market Size and Characteristics*

Based on local and regional populations, visitor populations, and existing recreational use patterns, the size of the potential recreation market for Lake Nighthorse was estimated. The recreation market is made up of a resident market and a tourist market. Travel distance between recreational facilities and regional recreationists is the primary factor in estimating the geographic extent of the resident market for recreational facilities (RPI Consulting 2010a). The results of a 2007 scientific random-sample survey indicate that 82 percent of recreationists drive 100 miles or less, and the remaining 18 percent drive more than 100 miles for weekend activities. Based on these travel tolerances, resident markets were defined for Lake Nighthorse. The local market was defined as the population within the 25-mile driving radius and coincided with the La Plata County boundaries. The regional market was defined as the population within the 25- to 100-mile driving radius. The regional market can be generally described as Southwest Colorado and Northwest New Mexico, and extends into several sovereign nations: the Navajo Nation, the Ute Mountain Ute tribal lands, and the Southern Ute Indian tribal lands (RPI Consulting 2010a).

The population within the 100-mile driving radius of Lake Nighthorse is estimated to generate more than 3 million user days annually, with users participating in the activities integral to

reservoir-based recreation. Roughly 70 percent of these reservoir-based user days are spent outside of the market reach. The remaining 30 percent, or 1,016,619 user days, are spent within the market reach (RPI Consulting 2010a).

Tourism, which draws from areas outside of the 100-mile driving radius, also generates reservoir-based recreation user days. Twenty-three percent of tourists to the region visit lakes. The potential tourist days associated with reservoir-based recreation for the Lake Nighthorse market reach is estimated at 123,039 user days annually. Combining visitor user days with resident user days reflects a user-day total of 1,139,658. Taken together, the existing area reservoirs alone account for an estimated 86 percent of the total annual user days. These represent the current use patterns at existing reservoirs in the area. These existing uses are expected to continue into the foreseeable future.

## **3.2.2 Environmental Consequences**

### ***3.2.2.1 Proposed Action—2014 Recreation Plan***

#### *3.2.2.1.1 Lake Nighthorse Market Share*

Based on the recreation market study completed for the 2011 Recreation Master Plan (i.e., Action Alternative 1), the Proposed Action would result in an estimated 86,308 total annual user-days initially. This estimate was obtained by subtracting annual user days attributed to non-RV and RV camping, outdoor swimming, and trail use from the total annual user days estimated in the recreation market study for the 2011 recreation market study, since these facilities would not be included as part of initial recreational development under the Proposed Action. Total user days would increase if a campground, trails, a swim beach, and a separate day-use area are developed as part of possible future development, but would be less than the 163,197 annual user days estimated for the 2011 Recreation Master Plan (i.e., Action Alternative 1) due to fewer campsites, trail miles, and day-use areas overall.

#### *3.2.2.1.2 Seasonality*

Water sports activities can be seasonal due to air temperature, water temperature, and traditional vacation patterns. Temperature patterns in the Durango area suggest that Lake Nighthorse would have a use season that starts in May and ends in October (or 5–6 months) (RPI Consulting 2010a).

#### *3.2.2.1.3 Future Growth in Market Share for Lake Nighthorse*

A general increase in user days over time under the Proposed Action is based on the assumptions that (1) recreation trends will continue into the future and (2) regional user days will increase at the same rate as the population (RPI Consulting 2010a). Assuming a 21percent increase in user-days (based on the recreation market study completed for the 2011 Recreation Master Plan), a total of 104,433 annual user-days would be expected by 2025 based on initial development under the Proposed Action. If a campground, trails, a swim beach, and a separate day-use area are developed in the future, the market share for Lake Nighthorse would increase but would likely remain below the 197,353 annual user days projected under full build-out of the 2011 Recreation Master Plan because fewer campsites, trail miles, and day-use areas overall would be developed under the Proposed Action.

#### *3.2.2.1.4 Recreational Amenities and Opportunities*

The Proposed Action would develop recreational amenities and opportunities at Lake Nighthorse, which is currently closed to public use. These amenities and opportunities would be limited to day

use, primarily boating and fishing. Proposed development of overflow parking near the existing boat ramp, improvement of the boat ramp access road, and installation of a courtesy dock system at the boat ramp would facilitate these uses. In addition, possible future amenities and opportunities, would be anticipated to include interpretive displays and education, trails, a swim beach with picnic sites, breakwaters at the boat ramp and swim beach, a campground, and a separate day-use picnic area. These amenities and opportunities would be similar to some of the other lakes and reservoirs in La Plata County. Though the Proposed Action would not add new types of recreation to the market, it would provide additional facilities in a new location, which would be in close proximity to Durango, the largest population base in La Plata County.

### 3.2.2.1.5 Recreational Use Conflicts

The Proposed Action would result in the potential for recreational use conflicts due to the concentration of users within the proposed recreation footprint (annexed area). Specifically, a lack of amenities for non-boaters would result in conflicts between boating and other recreation activities (i.e., fishing, parking, picnicking and swimming).

### 3.2.2.2 Action Alternative 1—2011 Recreation Plan

#### 3.2.2.2.1 Lake Nighthorse Market Share

Under this alternative, subtracting the user days associated with the existing area reservoirs from the total user days within the region results in an estimated 163,197 remaining user days annually for Lake Nighthorse. Approximately 70 percent of these user days would be expected to originate from residents living within a 50-mile radius—37 percent from the 25- to 50-mile driving radius, and 33 percent from within a 25-mile radius. Tourism would contribute only 11 percent of usage (17,619 user days). Thirty-three percent of all visits (53,112 user days) would originate within La Plata County. Table 4 breaks down the 163,197 annual user days by activity, based on the recreation market study (RPI Consulting 2010a).

**Table 4. Lake Nighthorse recreation market share.**

Activity Type	Estimated Annual User Days	Approximate Percent of Total
Fishing	38,276	23.5
Non-RV camping	34,469	21.1
Powerboating	28,770	17.6
Outdoor swimming	19,969	12.2
Non-powerboating	19,262	11.8
RV camping	16,911	10.4
Trail use	5,540	3.4
<b>Total</b>	<b>163,197</b>	<b>100</b>

Fishing, boating, and non-RV camping would be expected to be the primary drivers of recreation at Lake Nighthorse under this alternative. Camping is projected to generate more than 50,000 user days, or an average of 44 camping parties in the recreational area per night, with peaks during weekends. User days associated with powerboating are projected at 9,000 powerboats, or an average of about 50 boats per day.

#### 3.2.2.2.2 Seasonality

As with the Proposed Action, the seasonality of recreational use under Action Alternative 1 would extend from May through October.

#### *3.2.2.2.3 Future Growth in Market Share for Lake Nighthorse*

User-day projections were performed through 2025 for this alternative. Local and regional user days at Lake Nighthorse would increase by more than 18 percent between 2010 and 2025 (more than 170,000 user days annually). Not including tourist use, this reflects an increase of more than 25,000 user days annually. By 2025, tourist visitation to Lake Nighthorse under this alternative would increase by approximately 8,000 visits to more than 26,000 user days annually, assuming tourist trends remain static.

With resident and tourist use combined, the future growth projections of the recreation market share for Lake Nighthorse under this alternative would yield an estimated user-day total of 197,353 annually for 2025, or a 21 percent increase over estimates based on 2008 data (RPI Consulting 2010a). A slight shift in the ratio of geographic origin is also projected, with an increase in the number of visitors originating within the 25- to 100-mile radius, and proportionately less visitation from the immediate local region and tourism.

#### *3.2.2.2.4 Recreational Amenities and Opportunities*

As with the Proposed Action, Action Alternative 1 would develop recreational amenities and opportunities at Lake Nighthorse, which is currently closed to public use. These amenities and opportunities would include, power/non-powerboating, fishing, camping, swimming, and trail use, and would be similar to some of the other lakes and reservoirs in La Plata County. As with the Proposed Action, Action Alternative 1 would not add new types of recreation to the market, but would provide additional facilities in a new location, which would be in close proximity to Durango, the largest population base in La Plata County.

Because the development of recreational facilities would be phased over time, not all facilities would be available to the public at its initial opening. The initial development would include motorized and nonmotorized boat ramps and associated parking facilities, vault restrooms, and the first 2.4 miles of proposed hiking trail, which would be ADA-accessible. These facilities, along with the nearly 1,500 acres of surface water, would primarily support boating, fishing, and, to a somewhat lesser extent, hiking activities. Future phases would expand these recreational facilities to accommodate additional types of use and a greater number of users. In later phases, facilities to support picnicking and RV and non-RV camping would be added at Lake Nighthorse. By full build-out, there would be three day-use areas with 12 picnic shelters, 309 parking spaces, and three campgrounds with up to 130 campsites and eight picnic shelters. The trail system started in the initial phase of implementation would ultimately form a complete loop around the reservoir. Some trails would be designated for pedestrian use only or pedestrian and bike use only; others would be designated as multi-use and would accommodate pedestrians, bicyclists, and equestrians.

#### *3.2.2.2.5 Recreational Use Conflicts*

Action Alternative 1 would result in the potential for recreational use conflicts at some facilities, particularly those designated for multiple users. Multi-use trails would be expected to encounter conflicts between pedestrians, bicyclists, and equestrians. Conflicts could also be expected between motorized and nonmotorized boaters. Compared with the Proposed Action, Action Alternative 1 would result in fewer potential conflicts between some users due to greater dispersal of recreational amenities.

### **3.2.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

#### **3.2.2.3.1 Lake Nighthorse Market Share**

Estimated total annual user days per year would be higher under Action Alternative 2 (estimated 218,400) than under Action Alternative 1 (estimated 163,197) or the Proposed Action (estimated 86,308). User days by activity type (fishing, boating, camping, etc.) and source (local, regional, tourist) would likely be similar to Action Alternative 1.

#### **3.2.2.3.2 Seasonality**

The seasonality of recreational use would be the same as under the Proposed Action and Action Alternative 1, extending from May through October.

#### **3.2.2.3.3 Future Growth in Market Share for Lake Nighthorse**

Future growth in market share for Lake Nighthorse under Action Alternative 2 would be similar to the Proposed Action and Action Alternative 1. Assuming a 21 percent increase in user days, this would result in a total estimated 264,264 annual user days by 2025.

#### **3.2.2.3.4 Recreational Amenities and Opportunities**

There would be more recreational amenities and opportunities under Action Alternative 2 compared with the Proposed Action. The amenities and opportunities would differ somewhat from those under Action Alternative 1. All recreational facilities listed under Action Alternative 1 would be included with Action Alternative 2, except that there would be fewer miles of hiking trail (10 vs. 28.6), fewer separate day-use areas (one vs. three) but more picnic sites (37 vs. 20), fewer campgrounds (one vs. three) but more total campsites (196 vs. 130), and no ADA-accessible trail or nonmotorized boat launch.

#### **3.2.2.3.5 Recreational Use Conflicts**

Action Alternative 2 would result in fewer recreational use conflicts than the Proposed Action, but more than Action Alternative 1. Compared with the Proposed Action, greater dispersal of recreational uses under Action Alternative 2 would result in fewer conflicts between boating and other recreational activities. Unlike Action Alternative 1, Action Alternative 2 would concentrate non-boating uses along the north lakeshore, including all overnight use into one campground rather than three. This would result in higher frequency of encounters between recreationists compared with the more dispersed distribution of recreational facilities under Action Alternative 1.

### **3.2.2.4 No Action Alternative**

Under the No Action Alternative, no additional recreational facilities would be developed. The project area would remain closed to the public. The No Action Alternative would have no effects on recreational use patterns or distribution of market share across the region. There would be no public use of the cold water fishery established in the lake.

### **3.2.3.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- To notify all users of the potential presence of others and to minimize conflicts between users, signs shall be posted and maintained at all trailheads specifying allowable uses (hiking, biking, or multi-use) and identifying basic trail etiquette.

- User rules and regulations and designations of special use areas (e.g., no wake zones along the shore and the west end of lake) would reduce the potential for conflicts.
- Dogs shall be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off-leash dogs would be permitted.
- Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.

### **3.3 Socioeconomics and Community**

#### **3.3.1 Affected Environment**

##### ***3.3.1.1 Economic Setting***

The project area is in La Plata County, which comprises 1,087,823 acres: 18.1 percent tribal reservation land, 38.7 percent federal land, and 41.0 percent private land (U.S. Geological Survey 2012). Historically, La Plata County was supported by the mining, cattle, and timber industries. The economy diversified with the discovery and development of energy resources (oil and gas), the establishment of Fort Lewis College as a four-year college, the development of the Purgatory Ski Resort and the Durango and Silverton Narrow Gauge Railroad, and the emergence of tourism and resort development as a leading industry (Reclamation 2000a, Region 9 Economic Development District of Southwest Colorado 2011).

Tourism in La Plata County centers on the area's natural environment. Skiing at Purgatory Ski Resort is a major attraction in winter. Summer is the busiest season for tourism, and the area attracts visitors with opportunities for a variety of recreational activities such as whitewater rafting, kayaking, golf, fishing, hiking, rock climbing, and mountain biking. Regional tourist attractions include the Durango and Silverton Narrow Gauge Railroad, Mesa Verde National Park, and historic mining features (Reclamation 2000a).

Durango, with an estimated population of 17,268 in 2014, is the county seat and the largest community in La Plata County (Census Bureau, American Community Survey 2015). Durango has developed as a tourist crossroads and a regional trade center. The second-largest community in La Plata County is Bayfield, with an estimated population of 2,449 in 2011. Bayfield developed as a supply town and a social center for farmers and ranchers and a bedroom community. The third-largest community, Ignacio, with an estimated population of 702 in 2011, developed as a supply center for surrounding reservations and ranches and a crossroads for the oil and gas industry (Region 9 Economic Development District of Southwest Colorado 2013).

##### ***3.3.1.2 Jobs and Income***

The majority of employment in La Plata County is in the services, government, wholesale and retail trade, and construction sectors. Table 5 lists employment by sector for the county in 2009 (Region 9 Economic Development District of Southwest Colorado 2011). The top 10 employers in La Plata County in 2010 were the Southern Ute Indian Tribe, Mercy Medical, Durango School District 9R, Fort Lewis College, the City of Durango, Mercury Payment Systems Inc., La Plata County, Purgatory Ski Resort, Wal-Mart Stores Inc., and San Juan Basin Health (Region 9 Economic Development District of Southwest Colorado 2011).

**Table 5. La Plata County employment by industry in 2009.**

Sector	Total Employed	Percent of Total Employed
Services	13,136	40.5
Government	6,060	18.7
Wholesale and retail trade	4,236	13.1
Construction	3,227	9.9
Finance, insurance, real estate	2,178	6.7
Mining and utilities	924	2.8
Transportation and warehousing	812	2.5
Agriculture	738	2.3
Manufacturing	621	1.9
Information	514	1.6
<b>Total</b>	<b>32,446</b>	<b>100</b>

The service sector employs about 41 percent of workers in the county and represents 34 percent of the earnings. This sector includes many types of jobs and wage scales (from highly paid professionals to entry-level wage earners). Many of the service jobs in the county support tourism—in recreation, accommodations (lodging), and food services (Region 9 Economic Development District of Southwest Colorado 2011). In 2008, tourism was estimated to directly generate 28 percent of the total employment in La Plata County and was responsible for 18 percent of all jobs in the County. (RPI Consulting 2010b), though it has been estimated that as much as 57 percent of the county’s economy is dependent on the tourism industry (La Plata County 2001). In La Plata County in 2008, the impact of hunting and fishing was estimated at approximately \$25 million in direct expenditures and more than \$43 million in direct and secondary expenditures, supporting 477 jobs (BBC Research and Consulting 2008). Hunting, fishing, wildlife viewing, and other wildlife-related recreation are also important traditionally and culturally in La Plata County.

Based on an American Community Survey (ACS) five-year estimate (2009–2013), median household income in La Plata County was \$54,649 in 2013, which was lower than the median household income for Colorado that year (\$58,433) (U.S. Census Bureau 2013a). Based on ACS data, the percentage of La Plata County residents living below the poverty line in 2013 was 9.8 percent, slightly higher than the percentage for the State of Colorado (9.4 percent) that year (U.S. Census Bureau 2013).

### *3.3.1.3 Retail Sales and Economic Output*

Retail sales in La Plata County totaled \$1.3 billion in 2005, of which 52 percent consisted of retail trade and 48 percent retail services. In 2011, retail sales in La Plata County totaled \$2.1 billion; the percentage of retail trade vs. retail services is not published for that year. In 2011, food/beverage stores accounted for 19 percent and motor vehicles/parts and gas stations each accounted for 10 percent of total sales in the retail trade sector (Table 6) (Region 9 Economic Development District of Southwest Colorado 2013).

**Table 6. La Plata County sales in retail trade sectors in 2011.**

Sector	Actual Sales	Percent of Total Actual Sales
Motor vehicles/parts	\$114,687,000	15.5
General merchandisers	Not disclosed	Not disclosed
Food/beverage stores	\$139,315,000	18.8
Building materials/gardening	\$75,194,000	10.2
Gas stations	\$111,068,000	15.0
Sport/hobby shops	\$36,072,000	4.9
Miscellaneous retail stores	\$36,455,000	4.9
Nonstore outlets	\$21,486,000	2.9
Clothing	\$30,107,000	4.1
Furniture, etc.	\$14,024,000	1.9
Electronics/appliances	Not disclosed	Not disclosed
Health care products	\$34,231,000	4.5
Confidential sectors	\$127,353,000	17.2
<b>Total</b>	<b>\$739,992,000</b>	<b>100</b>

In 2005, eating/drinking services and lodging accounted for 12 percent and 6 percent of total sales, respectively, in the retail service sector (Table 7) (Region 9 Economic Development District of Southwest Colorado 2006).

**Table 7. La Plata County sales in retail service sectors in 2005.**

Sector	Actual Sales	Percent of Total Actual Sales
Wholesale	\$134,499,000	21.6
Eating/drinking services	\$76,545,000	12.3
Information	\$53,472,000	8.6
Construction	\$50,774,000	8.1
Real estate/rentals	\$49,535,000	8.0
Manufacturing	\$40,960,000	6.6
Lodging	\$39,085,000	6.3
Other services	\$31,048,000	5.0
Confidential sectors	\$30,280,000	4.9
Professional/technical	\$24,983,000	4.0
Mining	\$24,650,000	3.9
Transportation/warehousing	\$21,614,000	3.5
Administration/support/waste	\$14,392,000	2.3
Health/social assistance	\$10,763,000	1.7
Finance/insurance	\$7,998,000	1.3
Arts/entertainment	\$6,422,000	1.0
Education	\$3,894,000	0.6
Agricultural	\$1,740,000	0.3
<b>Total</b>	<b>\$622,654,000</b>	<b>100</b>

### 3.3.1.4 Population and Growth

The NEPA and CEQ regulations at 40 CFR 1508.8, require an analysis of growth-inducing effects and other changes to population density or distribution. From 1970 to 2014, the population of La Plata County grew from 19,327 to 53,989 people, a 179 percent increase (U.S. Department of Commerce, Bureau of Economic Analysis 2015). From 2000 to 2014, La Plata County population



grew 19.6 percent, while Durango grew by only 3.35 percent (Commerce, American Community Survey 2015). By 2030, the population of La Plata County is projected at 80,921 people, an 84 percent increase from 2010. The Durango population is projected at 33,995 by 2030, a 95 percent increase from 2000 (City of Durango 2007). Durango faces several service and infrastructure challenges, including accommodating visitor and residential growth within the city limits, providing sufficient affordable housing, improving traffic circulation, and providing water and sewer services in potential service areas outside of the city (Reclamation 2000a, City of Durango 2007, Region 9 Economic Development District of Southwest Colorado 2011).

## **3.3.2 Environmental Consequences**

### ***3.3.2.1 Proposed Action —2014 Recreation Plan***

#### *3.3.2.1.1 Economic Setting*

The Proposed Action would enhance tourism, one of the main economic drivers in La Plata County, by providing additional recreational opportunities for visitors and local residents. The Proposed Action would generate fewer than the 163,197 user days projected for the 2011 Recreation Master Plan (Action Alternative 1). Based on the recreation market study for the latter, user days would be expected to increase annually. The Proposed Action would support continued growth of the tourism sector and would provide additional opportunities for water-based recreation for visitors and local residents, resulting in direct, indirect, and induced economic benefits.

#### *3.3.2.1.2 Jobs and Income*

Initial recreational development under the Proposed Action would create an estimated 80 full-time-equivalent jobs. This is based on the facilities to be developed and application of a ratio of visitor to local user-days and employment multipliers identified in the recreation market study completed for the 2011 Recreation Master Plan (Action Alternative 1)(RPI Consulting 2010b). If no additional facilities were developed, future growth in the market would result in an estimated 112 full-time jobs by 2025. Possible future development of additional recreational facilities would result in additional jobs, though less than the 165 full-time equivalent jobs projected for the 2011 Recreation Master Plan (Action Alternative 1).

Jobs in the tourism industry in 2006 accounted for 23 percent of all employment in the county but were responsible for only 12 percent of total earnings. This disparity between employment and income suggests that the jobs directly created in the tourism sector would be lower-paying, though they would indirectly generate higher-paying jobs that provide services for residents (RPI Consulting 2010b).

#### *3.3.2.1.3 Retail Sales and Economic Output*

The Proposed Action would result in direct, indirect, and induced economic benefits to La Plata County from visitation to Lake Nighthorse by recreationists, primarily through an increase in retail sales. An economic impact study (RPI Consulting 2010b) estimated that implementation of the 2011 Recreation Master Plan would result in an additional \$7,798,000 in average annual expenditures in the county based on direct impacts and a total annual economic output of \$12,718,000 when a multiplier is applied for indirect and induced effects. Due to fewer campsites, trail miles, and day-use areas overall, the Proposed Action would result in less annual expenditures and a smaller total annual economic output.

Increased economic output under the Proposed Action would stem primarily from increased tourist spending in the warm season, and the majority of additional spending would be for retail goods. Increased tourism spending would also result from recreation sales occurring on-site at Lake Nighthorse, and sales at local restaurants and lodging establishments. The Proposed Action would result in increased spending and total economic output compared with the No Action Alternative. Durango would capture most of the economic activity generated under this alternative, with only a small percentage of economic activity captured by Bayfield, Ignacio, and unincorporated areas of the county.

#### *3.3.2.1.4 Population and Growth*

The Proposed Action would not result in reasonably foreseeable population growth or result in changes in population density or growth rates in Durango or La Plata County.

### **3.3.2.2 Action Alternative 1—2011 Recreation Plan**

#### *3.3.2.2.1 Economic Setting*

Action Alternative 1 would enhance tourism, one of the main economic drivers in La Plata County, by providing additional recreational opportunities for visitors and local residents. As discussed under Section 3.2—Recreation, this alternative would generate an estimated 163,197 average annual user days at Lake Nighthorse, representing about 14 percent of the regional market share (RPI Consulting 2010a). User days would be expected to increase at an average annual rate of 1.3 percent to nearly 200,000 estimated annual user days by 2025 (RPI Consulting 2010a). This alternative would support continued growth of the tourism sector and would provide additional opportunities for water-based recreation for visitors and local residents, resulting in direct, indirect, and induced economic benefits.

#### *3.3.2.2.2 Jobs and Income*

Action Alternative 1 would result in the creation of an estimated 165 full-time-equivalent jobs, which is anticipated to increase to 230 full-time jobs by 2025. This would represent a 4 percent increase in summer or warm-season tourism employment compared with 2008. Jobs in the tourism industry in 2006 accounted for 23 percent of all employment in the county but were responsible for only 12 percent of total earnings. This disparity between employment and income suggests that the jobs directly created in the tourism sector would be lower-paying, though they would indirectly generate higher-paying jobs that provide services for residents (RPI Consulting 2010b).

#### *3.3.2.2.3 Retail Sales and Economic Output*

Action Alternative 1 would result in direct, indirect, and induced economic benefits to La Plata County from visitation to Lake Nighthorse by recreationists, primarily through an increase in retail sales. An economic impact study (RPI Consulting 2010b) estimated that implementation of the 2011 recreation plan would result in an additional \$7,798,000 (in 2010 dollars) in average annual expenditures in the county based on direct impacts (jobs and earnings for lodges, restaurants, and businesses where visitors spend their money) and a total annual economic output of \$12,718,000 when a multiplier is applied for indirect and induced effects (jobs and earnings for linen services, food distributors, maintenance contractors, and other businesses that support primary tourism industries).

Increased economic output under this alternative would stem primarily from increased tourist spending in the warm season, and the majority of additional spending (57 percent) would be for

retail goods, estimated at \$4,440,000 annually. This represents 0.2 percent of the total retail sales in La Plata County in 2012 (Region 9 Economic Development District of Southwest Colorado 2013). Recreation sales occurring on-site at Lake Nighthorse would total up to \$1.8 million, and local restaurants could see an additional \$888,000 in sales. Local lodging establishments would experience an increase in sales by an estimated \$666,000 (RPI Consulting 2010b). By 2025, this alternative would generate an estimated \$10.8 million in direct spending and \$17.7 million of total economic output in 2010 dollars.<sup>2</sup> Durango would capture most of the economic activity generated under this alternative, with only a small percentage of economic activity captured by Bayfield, Ignacio, and unincorporated areas of the county.

Increased economic activity under this alternative would contribute an additional \$160,000 and \$143,000 in annual sales tax revenue for the City of Durango and La Plata County, respectively. (RPI Consulting 2010b).

#### *3.3.2.2.4 Population and Growth*

The contribution of this alternative to increased local population growth would be limited because recreation at Lake Nighthorse would generate an estimated 4 percent of all warm-season tourism jobs and 0.6 percent of all jobs in La Plata County (RPI Consulting 2010b). The Proposed Action would not induce population growth or result in changes in population density or growth rate.

### **3.3.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

#### *3.3.2.3.1 Economic Setting*

Action Alternative 2 would further enhance tourism compared with the Proposed Action and Action Alternative 1. Recreational development under this alternative was anticipated to result in 218,400 annual user days, more than the Proposed Action and 34 percent more than Action Alternative 1. Based on the recreation market study completed in 2010 (RPI Consulting 2010a), the 218,400 user days projected under Action Alternative 2 would represent about 19 percent of the regional market share. Assuming a 21 percent increase in user days (same as Action Alternative 1), a total estimated 264,264 annual user days would be expected by 2025 under this alternative.

#### *3.3.2.3.2 Jobs and Income*

Recreational development under Action Alternative 2 would create an estimated 203 full-time-equivalent jobs, more than the Proposed Action and 23 percent more than Action Alternative 1. Future growth in the market would result in an estimated 283 full-time jobs by 2025. This would represent a 5 percent increase in summer or warm-season tourism employment compared with 2008. Similar to the Proposed Action and Action Alternative 1, employment created under this alternative would be lower-paying jobs in the tourism sector, with some higher-paying indirect jobs created providing services to residents.

#### *3.3.2.3.3 Retail Sales and Economic Output*

Action Alternative 2 would result in higher retail sales and therefore more direct, indirect, and induced economic benefits to La Plata County compared with the Proposed Action and Action Alternative 1. Based on the assumptions and multipliers used in the 2010 economic impact study (RPI Consulting 2010b), this alternative would result in an estimated additional \$10,363,000 (in

<sup>2</sup> By comparison, the estimated recreational value associated with Ridges Basin before the construction of Lake Nighthorse was primarily related to hunting and was estimated at \$15,000 in 2000 dollars (Reclamation 2000a).

2010 dollars) in average annual expenditures in the county. This would translate to a total annual economic output of \$15,651,000 when a multiplier is applied for indirect and induced effects.

Increased economic output under this alternative would stem primarily from increased tourist spending in the warm season, and the majority of additional spending would be for retail goods, estimated at \$5,897,000 annually. This represents 0.3 percent of the total retail sales in La Plata County in 2012. Recreation sales occurring on-site at Lake Nighthorse would total \$1,622,000, and local restaurants could see an additional \$1,179,000 in sales. Local lodging establishments would experience an increase in sales by an estimated \$885,000. By 2025, this alternative would generate an estimated \$13.2 million in direct spending and \$20 million of total economic output in 2010 dollars.

Durango would capture most of the economic activity generated under this alternative, with only a small percentage of economic activity captured by Bayfield, Ignacio, and unincorporated areas of the county.

Estimated tax revenue under this alternative would be higher than those projected under the Proposed Action and Action Alternative 1. Increased economic activity resulting from initial recreational development would contribute an additional \$213,000 and \$189,000 in annual sales tax revenue for the City of Durango and La Plata County, respectively. Lodging tax revenue would increase annually by \$13,000 in the city and \$4,000 in the county.

#### *3.3.2.3.4 Population and Growth*

Action Alternative 2 would have a greater effect on population and growth compared with the No Action Alternative or the Proposed Action or Action Alternative 1. It would provide more new employment opportunities and a higher level of new revenue to local businesses and government compared with the Proposed Action and Action Alternative 1. Employment generated under this alternative would be primarily lower-paying direct jobs in the tourism sector, with some higher-paying indirect jobs that provide services to residents. Demands on affordable housing, transportation/utility infrastructure, and government services, and contribution to population growth would be higher compared with the Proposed Action and Action Alternative 1.

#### *3.3.2.4 No Action Alternative*

Under the No Action Alternative, there would be no increase in recreational opportunities and associated economic benefits in Durango and La Plata County because the reservoir area would remain closed to public use. This alternative would not generate any additional jobs in tourism or related sectors and would not contribute to population growth or existing and future demands on affordable housing, transportation and utility infrastructure, or government services.

#### *3.3.2.5 Mitigation Measures (Action Alternatives)*

There would be no mitigation measures for the action alternatives.

## **3.4 Environmental Justice**

### **3.4.1 Affected Environment**

Title VI of the Civil rights Act of 1964 and related statutes ensure that individuals are not excluded from participation in, denied the benefit of, or subjected to discrimination under any program or activity receiving federal financial assistance on the basis of race, color, national origin, age, sex,

and disability. EO 12898 directs that federal programs, policies, and activities do not have disproportionately high and adverse human health and environmental effects on minority and low-income populations.

The most recent data available were used for each population category of interest, as follows:

- The 2009–2014 ACS<sup>3</sup> was used to obtain information on the presence of persons living below the poverty level (U.S. Census Bureau 2015).
- Data used in this environmental justice analysis were obtained for the census tracts adjacent to or overlapping the study area—census tracts 9707.01 and 9711. These tracts are referred to in this document as selected tracts. Socioeconomic data for La Plata County and the State of Colorado were used as comparison populations (Table 8).

For this analysis, the term “moderately higher” means that the percentage of a population of interest in any one census tract is higher than the comparison population but comparable (i.e., not enough difference to be distinguished as a protected population). When the percentage of a population of interest is comparable to that of the comparison population and does not represent a majority of the population in that census tract, it is not defined as a protected population.

**Table 8. 2010 Decennial Census total minority and 2009–2014 ACS below poverty level populations.**

Area	Total Population	Total Minority <sup>a</sup>		Below Poverty Level	
		#	%	#	%
CT (9707.01)	4,478	878	19.6	314	7.0
CT (9711)	4,521	692	15.3	910	21.2
La Plata County	52,547	10,606	20.18	5,609	11.1
City of Durango	17,268	3,658	21.18	2,197	14.2
State of Colorado	5,197,580	1,592,381	30.64	663,861	13.1

Source: U.S. Census Bureau 2010, 2013, American Community Survey 2015.

# = number, % = percentage, CT = census tract. <sup>a</sup> “Total Minority” is composed of all people who consider themselves Nonwhite racially plus those who consider themselves White Hispanic.

### 3.4.1.1 Total Minority (2010 Census Data)

For this environmental justice review, a racial or ethnic minority population is an aggregate composed of the following categories: Black/African-American, American Indian and Alaska Native, Asian, Native Hawaiian and Other Pacific Islander, Other Races, Two or More Races, and Hispanic. Data from the 2010 Census indicate that minorities are present in the selected tracts. Both the percentage minority for Tracts 9707.01 (9.6 percent) and 9711 (15.3 percent) is moderately higher than the corresponding percentage for La Plata County (20.18 percent), but lower than the State of Colorado (30.64 percent). The minority percentages in these tracts or in the

<sup>3</sup> The ACS is sent every year by the U.S. Census Bureau to a subset of the U.S. population and is intended to monitor social and economic trends. Data from the ACS are only available at the census tract level as a five-year collective estimate. The latest five-year ACS data set at the time of this analysis was 2009–2014. The ACS is used in this document to supplement the Decennial Census by providing information about persons living below the poverty level.

county compared with the state do not represent a majority of the population. For these reasons, these minorities do not qualify as an environmental justice population.

#### *3.4.1.2 Below Poverty Level (ACS Data)*

Data from the ACS indicate that individuals living below the poverty level reside in the selected tracts. The percentage minority for Tract 9707.01 (7.0 percent) is lower than the corresponding percentages for the City of Durango (14.2 percent), La Plata County (11.1 percent) and the State of Colorado (13.1 percent). However, the percentage of persons living below the poverty level in Tract 9711 (21.2 percent) is higher than the comparison population for the City of Durango, La Plata County and the State of Colorado. The percentages of persons living below the poverty level in these tracts do not represent a majority of the population for the tract. These persons living in poverty do not represent a meaningfully greater percent of population no low-income populations are present in the study area or vicinity.

### **3.4.2 Environmental Consequences**

#### *3.4.2.1 Proposed Action—2014 Recreation Plan*

Because there are no minority or low-income populations in the study area, the proposal is not subject to the provisions under EO 12898.

#### *3.4.2.2 Action Alternative 1—2011 Recreation Plan*

As with the Proposed Action, there would not be a disproportionate effect on environmental justice populations protected under EO 12898.

#### *3.4.2.3 Action Alternative 2—2000 FSEIS Recreation Plan*

As with the Proposed Action, there would not be a disproportionate effect on environmental justice populations protected under EO 12898.

#### *3.4.3.4 No Action Alternative*

Because there are no minority or low-income populations in the study area, the proposal is not subject to the provisions under EO 12898.

#### *3.4.2.5 Mitigation Measures (Action Alternatives)*

There would be no proposed mitigation measures for the action alternatives.

## **3.5 Cultural Resources**

### **3.5.1 Affected Environment**

The project area is within Ridges Basin, which is potentially eligible to the National Register of Historic Places (NRHP) as a historic district. Within the district, approximately 200 archaeological sites have been identified: They span from the prehistoric to the protohistoric time periods and include four discrete periods of occupation: Archaic (6500 Before Christ [B.C.] to Anno Domini [A.D.] 1), Basketmaker II (A.D. 1 to 500), Pueblo I (A.D. 700 to 900), and Protohistoric (A.D. 1300 to 1895). Reclamation is in the process of consulting with Indian tribes that may attach religious and cultural significance to these sites.

The project area also includes historic Euro-American sites that may be eligible to the NRHP within three historic contexts: *Railroading in Ridges Basin, 1890 to 1951*; *Coal Mining in Ridges*

*Basin, 1886 to circa 1930; and Agriculture in Ridges Basin, circa 1880 to the Present.* The project area also includes an historic trail, a segment of the Old Ute Trail that passes through the basin (SWCA Environmental Consultants 2010, Reclamation 2000a).

In 2016, Section 106 consultation was conducted with the ALP consulting parties regarding the Area of Potential Effect (APE) for the Proposed Action. There are 27 previously identified historic properties, that is, sites eligible or potentially eligible for the NRHP, located in the APE of the Proposed Action.

**Table 9. Historic Properties in the Area of Potential Effects.**

Site Number	Type
5LP170	Basketmaker II/III, Pueblo I/II/III open camp
5LP171	Pueblo I limited activity
5LP174	Pueblo I habitation
5LP175	Archaic/Pueblo I open camp
5LP181	Pueblo I limited activity
5LP187	Pueblo I habitation
5LP188	Basketmaker II/Pueblo I habitation
5LP192	Historic ranch
5LP237	Pueblo I habitation
5LP238	Pueblo I habitation
5LP246	Pueblo I habitation
5LP452	Pueblo I limited activity
5LP489	Basketmaker II/III open architectural
5LP549	Pueblo I habitation, Protohistoric camp
5LP568	Basketmaker I/II/III open camp
5LP569	Pueblo I limited activity
5LP570	Basketmaker II open architectural
5LP577	Archaic limited activity
5LP578	Prehistoric limited activity
5LP579	Historic ranch
5LP588	Late Archaic to BM II and Protohistoric Ute open architectural
5LP591	Prehistoric open architectural
5LP608	Pueblo I limited activity
5LP621	Basketmaker I/II/III open architectural
5LP635	Pueblo I limited activity
5LP641	Basketmaker I/II/III open architectural
5LP6656.2	Historic ditch

### 3.5.2 Environmental Consequences

#### 3.5.2.1 Proposed Action—2014 Recreation Plan

While the goal would be to avoid affecting significant cultural resources (historic properties), Reclamation would complete the regulatory process at 36 CFR 800. The process would include developing a Cultural Resources Management Plan (CRMP), consulting on eligibility to the NRHP, applying the criteria of adverse effect, and assuming there would be adverse effects to one or more properties, consulting to resolve the effects and entering into an agreement document with consulting parties to resolve the effects.

### **3.5.2.2 Action Alternative 1—2011 Recreation Plan**

As with the Proposed Action, Reclamation would complete the regulatory process at 36 CFR 800 and enter into an agreement document with consulting parties to resolve any adverse effects to historic properties.

### **3.5.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

The effects would be the same as under the other action alternatives.

### **3.5.2.4 No Action Alternative**

Under the No Action Alternative, the project area would remain closed to public access, and no recreational facilities would be developed. An approved CRMP would be implemented by Reclamation to monitor cultural resources, and any trespass or unauthorized use would be dealt with by the appropriate law enforcement agencies.

### **3.5.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- Processes for management of historic properties would be outlined in a Cultural Resource Management Plan (CRMP). The plan would outline strategies to manage visitor impacts such as designating trails, installing educational and interpretive signage, etc.
- As needed, an archaeologist would monitor construction activities in the project area.
- The recreation manager would assign staff to monitor recreational activities for the protection of cultural resources and Reclamation will retain the authority to enforce all federal rules, regulations, and/or measures.
- Monitoring and oversight by a recreation manager and law enforcement agencies would reduce impacts from unauthorized access or trespass.

## **3.6 Indian Trust Assets**

### **3.6.1 Affected Environment**

Indian trust assets (ITAs) are legal interests in assets held in trust by the United States for American Indian tribes or individual American Indians. These assets may include real property, water rights, minerals, and hunting and fishing rights. The United States, including all of its bureaus and agencies, has a fiduciary responsibility to protect and maintain rights reserved by or granted to Indian tribes or individual tribal members by treaties, statutes, and EOs. This trust responsibility requires that all federal agencies, including Reclamation, ensure their actions protect trust assets. Secretarial Order 3175 (incorporated into the Departmental Manual [DM] at 512 DM 2) requires that the potential impacts of U.S. Department of the Interior bureau actions on ITAs must be addressed in planning and decision documents, such as this FEA.

A Colorado Ute Indian Water rights Final Settlement Agreement, signed in 1986, quantified the Colorado Ute tribes' rights to obtain water from several rivers and projects, including the ALP Project. Congress incorporated the ALP Project into the Colorado Ute Indian Water rights Settlement Act of 1988 (P.L. 100-585) (Settlement Act) to settle Colorado Ute tribal water rights claims. For this FEA, the Colorado Ute tribes' water rights are considered ITAs.



## **3.6.2 Environmental Consequences**

### ***3.6.2.1 Proposed Action—2014 Recreation Plan***

The Proposed Action would not affect ITAs associated with water rights assigned to the Colorado Ute tribes under the Colorado Ute Indian Water rights Settlement Act.

### ***3.6.2.2 Action Alternative 1—2011 Recreation Plan***

Action Alternative 1 would not affect ITAs associated with water rights assigned to the Colorado Ute tribes under the Colorado Ute Indian Water rights Settlement Act.

### ***3.6.2.3 Action Alternative 2—2000 FSEIS Recreation Plan***

Action Alternative 2 would not affect ITAs associated with water rights assigned to the Colorado Ute tribes under the Colorado Ute Indian Water rights Settlement Act.

### ***3.6.2.4 No Action Alternative***

The No Action Alternative would not affect ITAs associated with water rights assigned to the Colorado Ute tribes under the Colorado Ute Indian Water rights Settlement Act.

### ***3.6.2.5 Mitigation Measures (Action Alternatives)***

There would be no mitigation measures for the action alternatives.

## **3.7 Brunot Treaty Rights and Public Hunting**

### **3.7.1 Affected Environment**

In 1873, the United States negotiated the Brunot Agreement (aka Brunot Treaty), by which the confederated bands of the Colorado Ute tribes ceded 3.7 million acres in the San Juan Mountain region of the 1868 Ute reservation. In return, the Colorado Ute tribes reserved the right to “hunt upon said land so long as the game lasts and the Indians are at peace with the white people.” This reserved right has been interpreted to include not only hunting but also fishing, trapping, and gathering activities by which tribal members supported themselves in the region for centuries prior to the agreement. The 1873 agreement (ratified by Congress in 1874) is commonly known as the “Brunot Treaty” or “Brunot Agreement,” and the ceded land is often referred to as the “Brunot Area.”

In September 2008 and January 2013 respectively, the Southern Ute Indian Tribe and the Ute Mountain Ute Tribe each signed a Memorandum of Understanding (MOU) with the State of Colorado that preserved the tribes’ reserved rights under the Brunot Agreement, outlined an approach to Brunot Area hunting and wildlife law enforcement, and expressed the intent of the tribes and the State of Colorado to work cooperatively toward the long-term conservation of wildlife in the Brunot Area. The MOUs allow tribal members to exercise long-held rights to hunt and fish within the Brunot Area, in accordance with regulations established by each tribe.

Reclamation acknowledges the Tribes’ Brunot Treaty rights; however, the reservoir area is currently closed to all activities. Reclamation is involved in ongoing government-to-government discussions with the tribes regarding the application of Brunot Treaty rights in the project area.

## **3.7.2 Environmental Consequences**

### ***3.7.2.1 Proposed Action—2014 Recreation Plan***

As shown in Figure 3, the proposed recreation footprint would be subject to annexation. This alternative includes the water surface and a 25-foot shoreline buffer around the lake, with the exception of the dam area. This alternative would allow tribal and non-tribal members to engage in fishing in the lake. Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

### ***3.7.2.2 Action Alternative 1—2011 Recreation Plan***

Action Alternative 1 would allow public access to Reclamation lands comprising the project area. This would allow tribal and non-tribal members to engage in fishing in the lake. Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

### ***3.7.2.3 Action Alternative 2—2000 FSEIS Recreation Plan***

The effects of this alternative on Brunot rights would be the same as those described for the Proposed Action and Action Alternative 1.

### ***3.7.2.4 No Action Alternative***

Reclamation acknowledges the Tribes' Brunot Treaty rights; however, the reservoir area will remain closed to all activities under the No Action Alternative.

### ***3.7.2.5 Mitigation Measures (Action Alternatives)***

There would be no mitigation measures for the action alternatives.

## **3.8 Noise**

### **3.8.1 Affected Environment**

The project area is in a largely undeveloped and rural setting. Background noise is primarily from traffic on CR 210 and CR 141 (Wildcat Canyon Road) and natural sources such as wind. Ambient noise levels are estimated to range from 30 to 40 dBA at residences nearest to the project area (Hankard Environmental 2011). Sensitive noise receptors are primarily private residences in subdivisions immediately southwest (Trapper's Crossing) and northwest (Rafter J) of the project area. Wildlife habitat areas that may be sensitive to changes in ambient noise levels include wintering and migration areas for mule deer and elk on the south and west sides of the project area, elk calving habitat on the north end of the project area, and golden eagle nesting sites on Carbon Mountain and Basin Mountain on the east and south ends of the project area, respectively.

Acceptable noise levels vary based on the type and characteristics of the source and the receptor. The U.S. EPA considers outdoor noise levels of 55 dBA or less averaged over a 24-hour period as protective of public health and welfare for indoor living (EPA 1978). By comparison, the City of

Durango municipal code defines permissible noise in residential areas from stationary sources as 55 dBA during daytime hours (7 a.m. to 7 p.m.) and 50 dBA during nighttime hours (7 p.m. to 7 a.m.).

### **3.8.2 Environmental Consequences**

#### ***3.8.2.1 Proposed Action—2014 Recreation Plan***

Construction of recreational facilities under the Proposed Action would result in temporary noise from operation of machinery and vehicles that may be audible in the project area and adjacent residential areas. Construction activities associated with recreational development along the east lakeshore would not exceed EPA or municipal standards (55 dBA),<sup>4</sup> and would be temporary in nature. Construction-related noise levels would be lower at residences in the more distant Trapper's Crossing subdivision and for recreationists using the area, but would likely be inaudible in Durango. Construction-related noise from development of facilities would be audible to recreationists using the area. These noise effects would be temporary in nature—limited to the period of construction.

Public use of recreational facilities under this alternative would result in increased noise levels at sensitive receptors in and near the project area. Operation of motorboats on the reservoir would result in a predicted noise level of 37 dBA at the nearest residences (Hankard Environmental 2011).<sup>5</sup> This would be below EPA and municipal standards (55 dBA) and would be limited to daylight hours between May 15 and November 15. Effects of noise from temporary construction activities and recreational use on wildlife are discussed in Section 3.9—Natural Resources (Wildlife).

#### ***3.8.2.2 Action Alternative 1—2011 Recreation Plan***

Construction of recreational facilities under Action Alternative 1 would result in temporary noise from operation of machinery and vehicles that may be audible in the project area and adjacent residential areas. Construction activities associated with development of campgrounds along CR 210 would likely be audible at the nearest residences in the Rafter J private subdivision. This construction-related noise would be similar to levels from existing traffic on CR 210, would not exceed EPA or municipal standards (55 dBA), and would be temporary in nature. Construction-related noise levels may also be audible but would be lower at residences in the more distant Trapper's Crossing subdivision and for recreationists using the area, but would likely be inaudible in Durango. Construction-related noise from development of facilities during various phases of the project would be audible to recreationists using the area. These noise effects would be temporary in nature—limited to the period of construction.

Public use of recreational facilities under this alternative would result in increased noise levels at sensitive receptors in and near the project area. Operation of motorboats on the reservoir would result in a predicted noise level of 37 dBA at the nearest residences (Hankard Environmental 2011). This would be below EPA and municipal standards (55 dBA) and would be limited to daylight

<sup>4</sup> Construction noise is estimated at 90 dBA at 50 feet. Based on an estimated distance of 6,000 feet from the nearest campground along CR 210 and a standard distance attenuation of 6.0 dBA per doubling of distance, noise levels at nearest residences in the Rafter J subdivision would be between 40 and 50 dBA.

<sup>5</sup> Based on 10 motorboats scattered across the reservoir traveling at high speed and conditions where winds are calm or sensitive receptors (residences) are downwind from the source.

hours between May 15 and November 15. Additional traffic on CR 210 and use of proposed campgrounds adjacent to this roadway would increase noise levels in nearby residential areas, primarily the Rafter J subdivision. During calm or downwind conditions, campground noise would be audible from at least some residences in this subdivision during periods outside of the designated quiet hours from 10 p.m. to 6 a.m. Noise levels would be well below EPA and municipal standards and would be limited during nighttime hours. Effects of noise from temporary construction activities and recreational use on wildlife are discussed in Section 3.9—Natural Resources (Wildlife).

### **3.8.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

Effects of Action Alternative 2 on noise would be similar to Action Alternative 1. Motorboat use would be similar to that under the Proposed Action and Alternative 1 and predicted noise levels would not exceed EPA and municipal standards. Siting of most of the recreational facilities along the north lakeshore would result in higher noise levels at sensitive receptors (residential subdivisions), both during construction and after construction due to recreational use of these facilities and associated increases in traffic on CR 210. Noise levels at residential areas would not be expected to exceed EPA or municipal standards.

### **3.8.2.4 No Action Alternative**

Under the No Action Alternative, noise levels in the project area would remain at current ambient levels, which are estimated to range from 30 to 40 dBA.

### **3.8.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, construction noise would be monitored and remain below allowable levels (i.e., 55 dBA during daytime hours and 50 dBA during nighttime hours [measured outdoors] at the nearest residences).

## **3.9 Natural Resources**

### **3.9.1 Affected Environment**

Lake Nighthorse is along the Basin Creek drainage in the Ridges Basin area southwest of Durango. The project area is bordered to the north by the Bodo State Wildlife Area and to the south by Southern Ute Indian tribal lands. Areas to the west consist of relatively low density and dispersed residential developments. The U.S. 550-160 transportation corridor, Durango and outlying areas, and the Animas River corridor are east of the project area.

Full pool elevation of the reservoir is 6,882 feet above mean sea level, with an approximate surface area of 1,500 acres. The uplands surrounding Lake Nighthorse in the project area vary from moderate to steeply sloped hillsides, bluffs, and cliffs, up to an elevation of approximately 8,245 feet.

#### **3.9.1.1 Vegetation**

The project area occurs in the lower montane climatic zone, and the vegetation type is mapped as ponderosa pine forest and pinyon-juniper woodland (Colorado Natural Heritage Program 2004). Upland areas surrounding the lake are dominated by Colorado pinyon (*Pinus edulis*), Utah juniper (*Juniperus osteosperma*), Rocky Mountain juniper (*J. scopulorum*), and scattered Gambel oak (*Quercus gambellii*). Ponderosa pine (*Pinus ponderosa*) is more prominent at higher elevations away from the reservoir. More open areas along the edge of the reservoir are dominated by sagebrush (*Artemisia tridentata*) and support other larger shrubs such as rabbitbrush

(*Chrysothamnus nauseosus*), skunkbush sumac (*Rhus trilobata*), antelope bitterbrush (*Purshia tridentata*), wild crab apple (*Peraphyllum ramosissimum*), and mountain mahogany (*Cercocarpus montanus*). Smaller shrubs and forbs include snakeweed (*Gutierrezia sarothrae*), prairie sagewort (*Artemisia frigida*), white sagebrush (*A. ludoviciana*), James' buckwheat (*Eriogonum jamesii*), spearleaf buckwheat (*Eriogonum lonchophyllum*), winged buckwheat (*Eriogonum alatum*), hairy false golden aster (*Heterotheca villosa*), spreading fleabane (*Erigeron divergens*), lupine (*Lupinus* sp.), common yarrow (*Achillea millefolium*), curlycup gumweed (*Grindelia squarrosa*), and scarlet beeblossom (*Gaura coccinea*). Succulents include plains pricklypear (*Opuntia polyacantha*) and mountain ball cactus (*Pediocactus simpsonii*). Grasses include sand dropseed (*Sporobolus cryptandrus*), smooth brome (*Bromus inermis*), crested wheatgrass (*Agropyron cristatum*), blue grama (*Bouteloua gracilis*), and Indian ricegrass (*Achnatherum hymenoides*). Over time, shoreline areas may develop and support emergent wetland and or riparian plant communities.

State-listed noxious weed species that have been recorded in the project area are musk thistle (*Carduus nutans*), Canada thistle (*Cirsium arvense*), Scotch thistle (*Onopordum acanthium*), spotted knapweed (*Centaurea stoebe*), houndstongue (*Cynoglossum officinale*), hoary cress (*Cardaria draba*), yellow toadflax (*Linaria vulgaris*), downy brome (*Bromus tectorum*), common mullein (*Verbascum thapsus*), and bindweed (*Convolvulus arvensis*) (Horizon Environmental Services 2010).

#### 3.9.1.2 Wildlife

Wildlife in the project area is expected to be representative of ponderosa pine and pinyon-juniper habitats. Upland areas support habitat for a variety of birds, mammals, smaller reptiles, and invertebrates. Though wetland and riparian vegetation does not occur at this time, the reservoir is currently used by water birds such as grebes, ducks, geese, herons, cormorants, and shorebirds. Lake Nighthorse was stocked with nonnative rainbow trout (*Oncorhynchus mykiss*) in 2010.

The project area supports winter range for mule deer (*Odocoileus hemionus*) and serves as a migration area during spring and fall. An estimated 300 mule deer use the Bodo State Wildlife Area in winter, including lands acquired by Reclamation for construction and operation of Lake Nighthorse (i.e., the project area). It is estimated that about 1,000 mule deer migrate through the project area from winter range on Southern Ute Indian tribal lands to the south to summer range to the north (Reclamation 2000a).

The project area serves as year-round and migration habitat for elk (*Cervus elaphus*). In 1996, it was estimated that 100 elk resided in the Bodo State Wildlife Area and the project area year-round and that an estimated 400 elk migrated through the area in the winter and spring. Elk calving occurs in May and June in the northern portions of the project area in pinyon-juniper woodland. In 2000, the resident elk herd around Ridges Basin was estimated at 75 animals, and it was estimated that 400 elk used the basin and surrounding area as winter range. In 2011, Reclamation estimated that the resident elk herd consisted of 65 cows and eight bulls (Molly Thrash, Reclamation Environmental Protection Specialist, personal communication 2011). A movement corridor used by elk to migrate from winter range on the Southern Ute Indian tribal lands to summer range in the San Juan Mountains to the north was identified at the west end of Ridges Basin (Reclamation 2000a).

The project area supports habitat for birds of prey (raptors), including eagles. Raptor species observed include osprey (*Pandion haliaetus*), peregrine falcon (*Falco peregrinus*), golden eagle (*Aquila chrysaetos*), and bald eagle (*Haliaeetus leucocephalus*). Peregrine falcons were recorded as successfully nesting in the project area in 2011 (Ecosphere Environmental Services 2011a). A pair of golden eagles has historically nested on Carbon Mountain in the project area. Since 2003, successful nesting was documented in 2004–2006 and in 2010 and 2011 (Ecosphere Environmental Services 2011b). In 2003 and 2009, no evidence of nesting was found. In 2007, golden eagles nested but did not successfully fledge young (Graber 2010). This eagle territory was not monitored for occupancy or nest success in 2008. A new, active golden eagle nest was discovered in early 2011 along the southern project area boundary and successfully fledged one young. Bald eagles, estimated at 18 individuals, were observed foraging on the lake in the winter and early spring of 2010/2011 (Molly Thrash, Reclamation Environmental Protection Specialist, personal communication 2011). Bald eagles were recorded in the project area during 11 of 14 field surveys from April to the end of June 2011 (Ecosphere Environmental Services 2011b).

Other bird species protected from take under the Migratory Bird Treaty Act that have been found nesting in the project area include Canada goose (*Branta canadensis*), mallard (*Anas platyrhynchos*), mourning dove (*Zenaida macroura*), black-chinned hummingbird (*Archilochus alexandri*), broad-tailed hummingbird (*Selasphorus platycercus*), red-shafted flicker (*Colaptes auratus*), violet-green swallow (*Tachycineta thalassina*), black-billed magpie (*Pica pica*), mountain bluebird (*Sialia currucoides*), blue-gray gnatcatcher (*Polioptila caerulea*), green-tailed towhee (*Pipilo chlorurus*), vesper sparrow (*Poocetes gramineus*), Brewer's sparrow (*Spizella breweri*), Western meadowlark (*Sturnella neglecta*), and Brewer's blackbird (*Euphagus carolinus*) (Ecosphere Environmental Services 2011a and 2011c). Additional protected bird species are anticipated to nest in the project area.

### 3.9.1.3 Threatened and Endangered Species

Effects of the ALP Project, including the construction of Lake Nighthorse, on federally listed, proposed, and candidate species were addressed in the FSEIS (Reclamation 2000a). A USFWS Information, Planning, and Conservation (IPaC) Trust Resource Report was generated for the project area on June 1, 2015, to obtain an updated list of species. Table 10 lists species identified in the IPaC report and summarizes their potential for occurrence in the project area.

**Table 10. Threatened and endangered species and their potential for occurrence in the project area.**

Species	Status	Potential for Occurrence in Project Area
<b><i>Birds</i></b>		
Mexican spotted owl <i>Strix occidentalis lucida</i>	T	Inhabits old-growth or mature forests with uneven-aged stands, high canopy closure, multistoried levels, and high tree density. No individuals were detected during surveys completed in the project area in 1992. No suitable or designated critical habitat is present in the project area.
Southwestern willow flycatcher <i>Empidonax traillii extimus</i>	E	Found in dense riparian habitats along streams and reservoirs. No suitable or designated critical habitat is present in the project area.
Yellow-billed cuckoo <i>Coccyzus americanus</i>	T	Typically found in gallery riparian forests with cottonwood and willow. No suitable or proposed critical habitat is present in the project area.
Colorado pikeminnow <i>Ptychocheilus lucius</i>	E	Found in large riverine habitats. No suitable or designated critical habitat occurs in the project area, and this species is not known to occur in downstream reaches of the Animas River.
Razorback sucker <i>Xyrauchen texanus</i>	E	Found in large riverine habitats. No suitable or designated critical habitat occurs in the project area, and this species is not known to occur in downstream reaches of the Animas River.
<b><i>Mammals</i></b>		
New Mexico meadow jumping mouse <i>Zapus hudsonius luteus</i>	E	Found only in persistent emergent herbaceous wetlands and scrub-shrub wetlands along perennial streams. Potential habitat may occur along the lakeshore in the project area.
<b><i>Plants</i></b>		
Knowlton's cactus <i>Pediocactus knowltonii</i>	E	Known only from type locality in San Juan County, New Mexico, where it grows on gravelly soils in pinyon-juniper-sagebrush communities between 6,200 and 6,300 feet in elevation. This species has not been found in the project area, which is outside the known range.

E = federally listed as endangered, T = federally listed as threatened.

### 3.9.2 Environmental Consequences

#### 3.9.2.1 Proposed Action—2014 Recreation Plan

##### 3.9.2.1.1 Vegetation

Development of recreational facilities under the Proposed Action would remove or disturb about 4 acres of vegetation as part of initial development and additional acres of vegetation as part of possible future development. Vegetation affected would be primarily pinyon-juniper woodland and sagebrush, shrub, and herbaceous vegetation in relatively open areas along the reservoir shoreline. Disturbance associated with construction of facilities and their use would reduce or eliminate vegetation cover, change plant species composition, and increase potential dispersal of weedy plant species in the project area. Indirect effects to vegetation would occur from recreationists venturing away from developed recreational sites or facilities.

### 3.9.2.1.2 Wildlife

The Proposed Action would result in direct and indirect effects on wildlife. Direct effects from human presence would include localized disturbance/displacement of wildlife, changes in foraging and other behavior, reduced reproductive success, changes in community structure, and fragmentation of habitat (Barber et al. 2009). Indirect effects of recreation on wildlife habitat include impacts on soils (e.g., compaction, loss of surface horizons, increased runoff and erosion) and impacts to vegetation that provides food or cover (Cole and Landres 1995). These effects would be most pronounced in the direct vicinity of developed recreational facilities or sites. Some indirect effects would also occur farther removed from developed recreational sites or facilities.

Development and public use of recreational facilities under the Proposed Action would affect mule deer and elk that reside year-round in the project area. Development and use of recreational facilities would result in disturbance, localized displacement, and changes in habitat use by resident mule deer and elk. Seasonal closures on the south and west portions of the project area (from mid-November to mid-May) would reduce impacts to mule deer and elk using this portion of the project area during the more critical winter period and those migrating between summer and winter ranges during fall and spring. Development and use of recreational facilities under the Proposed Action may affect raptors nesting or foraging in the project area.

Effects on nesting eagles would be mitigated through seasonal closure (from December 1 to July 15) of areas within ¼-mile of active and historical nest sites. Studies conducted on the effects of human activity (including boating) on nesting bald eagles show minimal flush rates beyond 400 meters (1,312 feet)(Grubb and King 1991, McGarigal et al. 1991), which corresponds to the recommended ¼ mile (1,320-foot) buffer around historical and currently used golden eagle nest sites. Greater human presence and recreational development under this alternative may reduce foraging areas for golden eagles. Seasonal closure of the reservoir (from mid-November to mid-May) to boating would reduce disturbance impacts to wintering bald eagles that forage on the reservoir. Due to the establishment of a recreational fishery, the potential exists for bald eagles and ospreys to nest in the project area in the future. Future nesting by these species may warrant seasonal closures for areas surrounding nest sites.

Development and use of recreational facilities is unlikely to affect nesting peregrine falcons, whose eyries are typically found on steep cliff sites, and is unlikely to impact foraging habitat for this species. Stocking of trout in Lake Nighthorse to maintain a recreational fishery could negatively affect bald eagles through bioaccumulation of mercury and/or other trace elements. Mercury has the potential to negatively affect growth, survival, reproductive success, and behavior (EPA 1997). A nationwide study published in 1997 suggests that bald eagles have not suffered adverse toxic effects due to airborne mercury emissions (EPA 1997). A subsequent study in South Carolina found accumulation of mercury in nestling bald eagles and suggested that older birds accumulate substantially more, though it could not be determined whether measured levels were negatively impacting growth, reproduction, or development (Jagoe et al. 2002). In Maine, a negative correlation between mercury and productivity was found to be most pronounced at lakes, where mercury concentrations were highest. This study suggested that a portion of Maine's eagle population may be experiencing some reproductive impacts due to mercury exposure despite continuous growth of the bald eagle population (DeSorbo et al. 2009).



### *3.9.2.1.3 Threatened and Endangered Species*

The Proposed Action would not affect federally listed threatened or endangered species.

## **3.9.2.2 Action Alternative 1—2011 Recreation Plan**

### *3.9.2.2.1 Vegetation*

Development of recreational facilities under Action Alternative 1 would remove or disturb up to 58 acres of vegetation as part of the first phase of development and up to 70 additional acres of vegetation as part of subsequent phases. Vegetation affected would be primarily ponderosa pine forest, pinyon-juniper woodland and sagebrush, shrub, and herbaceous vegetation in relatively open areas along the reservoir shoreline. Disturbance associated with construction of facilities and public use of trails (including equestrian), campgrounds, and other amenities would reduce or eliminate vegetation cover, change plant species composition, and increase potential dispersal of weedy plant species in the project area. Effects on vegetation resulting from firewood collection by campers and public use of recreational facilities and surrounding areas (e.g., trampling) would also occur. Indirect effects to vegetation would occur from recreationists venturing away from developed recreational sites or facilities, though the development of trails and signage would limit these impacts.

### *3.9.2.2.2 Wildlife*

Action Alternative 1 would result in direct and indirect effects on wildlife. Direct effects from human presence would include localized disturbance/displacement of wildlife, changes in foraging and other behavior, reduced reproductive success, changes in community structure, and fragmentation of habitat. Indirect effects of recreation on wildlife habitat include impacts on soils and impacts to vegetation that provides food or cover. These effects would be most pronounced in the direct vicinity of roadways, trails, day-use areas, and campgrounds; along the shoreline of the reservoir; and along trails outside seasonal closure areas. Some indirect effects would also occur farther removed from developed recreational sites or facilities, though the development of trails and signage would limit these impacts.

Development and public use of recreational facilities under this alternative would affect mule deer and elk that reside year-round in the project area. Increased traffic on CR 210 from recreationists would likely result in some increase in vehicle-wildlife collisions. Development and use of trails, campgrounds, and day-use areas would result in disturbance, localized displacement, and changes in habitat use by resident mule deer and elk. Development of multi-use trails (including equestrian) north of CR 210 would likely eliminate or reduce any mule deer fawning and elk calving areas in this portion of the project area and may result in loss of breeding or nesting habitat for other wildlife species. This would also affect the southern, adjoining portion of the Bodo State Wildlife Area. Seasonal closures on the south and west portions of the project area (from mid-November to mid-May) would reduce impacts to mule deer and elk using this portion of the project area during the more critical winter period and those migrating between summer and winter ranges during fall and spring. Development of two campgrounds, a trailhead, and multi-use trails may reduce or eliminate elk calving habitat in the northern portion of the project area. Development and use of recreational facilities under this alternative may affect raptors nesting or foraging in the project area.

As with the Proposed Action, effects on nesting eagles would be mitigated through seasonal closure (from December 1 to July 15) of areas within .25 mile of active and historical nest sites.

Greater human presence and recreational development under this alternative may reduce foraging areas for golden eagles. Seasonal closure of the reservoir (from mid-November to mid-May) to boating would reduce disturbance impacts to wintering bald eagles that forage on the reservoir. Recreational use of trails during this period (e.g., hiking, snowshoeing, cross-country skiing) may result in some localized displacement of bald eagles but would not substantially reduce foraging opportunities. Wintering bald eagles in Washington rarely flushed at distances beyond about 400 feet (Becker 2002). Due to the establishment of a recreational fishery, the potential exists for bald eagles and ospreys to nest in the project area in the future. Future nesting by these species may warrant seasonal closures for areas surrounding nest sites.

As with the Proposed Action, development and use of recreational facilities under Action Alternative 1 is unlikely to affect nesting peregrine falcons, and stocking of trout in Lake Nighthorse to maintain a recreational fishery could negatively affect bald eagles through bioaccumulation of mercury and/or other trace elements.

#### *3.9.2.2.3 Threatened and Endangered Species*

Action Alternative 1 would not affect federally listed threatened or endangered species.

### **3.9.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

#### *3.9.2.3.1 Vegetation*

Development of recreational facilities under Action Alternative 2 would remove or disturb 128 acres of ponderosa forest, pinyon-juniper woodland and sagebrush, shrub, and herbaceous vegetation. Other effects on vegetation from recreational use, including the potential spread of noxious weeds, would be similar to the Proposed Action and Action Alternative 1.

#### *3.9.2.3.2 Wildlife*

Action Alternative 2 would have more direct and indirect effects on wildlife compared with the Proposed Action and Action Alternative 1. Because the same total acreage would be affected by recreational development, effects such as disturbance/displacement of wildlife; changes in behavior, reproductive success, community structure; habitat fragmentation; and indirect effects on soils would not differ substantially from Action Alternative 1. Siting of recreational facilities primarily on the north lakeshore under this alternative would have more effects on wildlife compared with Action Alternative 1 by increasing recreation-related traffic and associated vehicle-wildlife collisions on CR 210 and through greater impacts to mule deer fawning and elk calving areas. Indirect effects from recreationists venturing beyond the vicinity of developed recreational sites would be similar to Action Alternative 1.

As with the Proposed Action and Action Alternative 1, effects on nesting golden eagles and wintering bald eagles would be mitigated through seasonal closures, and this alternative would be unlikely to affect nesting or foraging peregrine falcons. The potential for indirect effects on bald eagles from stocking of trout would be the same as under the Proposed Action and Action Alternative 1.

#### *3.9.2.3.3 Threatened and Endangered Species*

As with the Proposed Action and Action Alternative 1, Action Alternative 2 would not affect federally listed threatened or endangered, proposed, or candidate species.

### **3.9.2.4 No Action Alternative**

#### **3.9.2.4.1 Vegetation**

Under the No Action Alternative, no recreational facilities would be developed. The project area would remain closed to public access and would continue to be administered by Reclamation for dam/reservoir operations only. No currently undisturbed plant communities would be affected. Reclamation would continue its integrated weed management program. Human-caused dispersal of noxious weeds would be largely limited to the existing access roads to the inlet structure, boat ramp, and dam.

#### **3.9.2.4.2 Wildlife**

Under the No Action Alternative, the project area would remain closed to public use and largely undeveloped. Impacts to wildlife would be limited to disturbance associated with maintenance of existing facilities (i.e., existing access roads, the inlet structure, dam, and associated infrastructure). No impacts to elk calving habitat in the north portion of the project area would occur, and vehicle-wildlife collisions on CR 210 related to recreational development and use would not occur. Under this alternative, no recreation-related disturbance of foraging golden and bald eagles or raptor species that may nest in the project area in the future, such as bald eagles and ospreys, would occur.

#### **3.9.2.4.3 Threatened and Endangered Species**

The No Action Alternative would not affect federally listed threatened or endangered species.

### **3.9.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.
- The recreation manager, in coordination with Reclamation, the CPW, ALPOMRA, and La Plata County, shall implement an integrated weed management plan that includes annual monitoring of the project area and areas subject to recreational development for the presence and spread of state-listed noxious weed species, development and implementation of appropriate treatments, and annual reporting. Areas near the lake shall be treated only with herbicides approved for use in or near aquatic habitats.
- Under Action Alternative 1, a horse grooming station shall be constructed and maintained at the proposed multi-use trailhead along CR 210 prior to opening the trail system for equestrian use. Signage shall be maintained that provides information on the potential spread of noxious weeds and associated impacts and certified weed-free forage, and encourages the grooming of horses.
- The recreation manager shall provide staff and/or shall coordinate with the CPW, ALPOMRA, and local law enforcement to patrol the lake and the surrounding upland areas on a year-round basis and to enforce regulations. This shall include enforcement of seasonal closures for wildlife and use restrictions in the south and west portions of the project area, and enforcement of no

wake and no boating zones, boat speed limits, boat size/type restrictions, time-of-day restrictions, and other regulations. No wake zones and no boating zones shall be clearly demarcated on the lake, and buoys demarcating any dedicated swim beach areas shall be maintained during periods when the lake is open to boating.

- Signs shall be placed along CR 210 through the project area warning motorists of potential crossings of the roadway by deer and elk.
- If new active raptor nests or nest locations are discovered, the recreation manager, in coordination with Reclamation, shall consult with the CPW and the USFWS to determine whether designation of buffers and closure to public access during the nesting season are warranted to minimize closure of recreational area(s).
- For construction activities that take place between May 15 and August 31, a qualified biologist shall survey affected areas in advance of construction to determine the presence or absence of nesting birds.
- Under Action Alternatives 1 and 2, Reclamation shall coordinate with the CPW regarding any additional measures that may be necessary to control or minimize resource damage in the portion of the project area north of CR 210.

### **3.10 Visual Quality/Aesthetics**

#### **3.10.1 Affected Environment**

Aesthetics, scenic resources, and visual quality associated with rugged mountainous terrain and other natural features are integral in defining the high quality of life for year-round residents of Durango, La Plata County, and the surrounding communities. The scenery that is characteristic of southwestern Colorado also attracts thousands of recreational visitors and, therefore, is economically valuable for maintaining tourism and recreational revenue (Reclamation 2000a). The scenic characteristics of the project area reflect a predominantly natural setting. The viewshed is dominated by open water (Lake Nighthorse), woodlands and forest, and the mountainous terrain of Carbon Mountain and Basin Mountain east and south of the reservoir, respectively. Existing developed features that modify the natural landscape include the dam and reservoir, the boat ramp, the inlet structure, access roads, fencing, and gates. The dam and reservoir are visible along segments of CR 210, CR 219, CR 141, U.S. 160, and U.S. 550, as well as from some residences in private subdivisions immediately southwest (Trapper's Crossing) and northwest (Rafter J) of the project area.

#### **3.10.2 Environmental Consequences**

##### ***3.10.2.1 Proposed Action—2014 Recreation Plan***

Development of recreational facilities under the Proposed Action would further modify the natural setting in the project area. All of the facilities proposed would be located along the east lakeshore and, therefore, would have limited visual effects in background views for residents of the Trapper's Crossing and Rafter J private subdivisions and for motorists on CR 210 and CR 141. There would be no additional sources of light in the project area during nighttime hours.

Visual impacts from permanent facilities would be reduced by the use of natural materials, siting of parking lots to conform to existing landforms, and the burying of utilities underground. Over the long-term, this would retain visual quality with a largely natural setting with limited

modification. The effects of land clearing, disturbance of natural vegetation, and cut and fill associated with construction of proposed facilities would be more visible in the short term.

### ***3.10.2.2 Action Alternative 1—2011 Recreation Plan***

Development of recreational facilities under Action Alternative 1 would further modify the natural setting in the project area. Proposed campgrounds would be in primarily forested areas and would be partially visible to motorists using CR 210 (in foreground views) and potentially visible to some residences in the Rafter J subdivision (in midground views). Most of the facilities proposed would be located along the east and north shore of the reservoir. Day-use areas and parking lots would be at least partially visible from segments of CR 210 and CR 141 and from the Trapper's Crossing and Rafter J private subdivisions, primarily in background views. Trails would likely be visible only in foreground views and would not affect visual quality from more distant vantage points. Development and use of recreation facilities would result in additional sources of light in the project area during nighttime hours.

Visual impacts from permanent facilities would be reduced by the use of natural materials, siting of parking lots and campgrounds to conform to existing landforms, and the undergrounding of utilities. Over the long-term, this would retain visual quality with a largely natural setting with limited modification. The effects of land clearing, disturbance of natural vegetation, and cut and fill associated with construction of proposed facilities would be more visible in the short term.

### ***3.10.2.3 Action Alternative 2—2000 FSEIS Recreation Plan***

Effects of Action Alternative 2 on visual quality would be similar to Action Alternative 1. Siting of most of the recreational facilities on the north lakeshore would potentially make these more visible from CR 141 and from the Rafter J and Trapper's Crossing private subdivisions in midground or background views.

### ***3.10.2.4 No Action Alternative***

Under the No Action Alternative, visual characteristics of project area would remain unchanged.

### ***3.10.2.5 Mitigation Measures (Action Alternatives)***

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.
- Final siting and design of facilities by the recreation manager shall be coordinated with Reclamation to minimize cut and fill and to ensure the use of native and complementary construction materials and dark-sky-friendly lighting.

## 3.11 Water Quality

### 3.11.1 Affected Environment

Water quality in Lake Nighthorse is currently affected by water quality in the Animas River (the water supply source), other contributing drainages such as Basin Creek, and conditions in and around the reservoir. Water is conveyed to Lake Nighthorse from the Animas River via the Durango Pumping Plant and the Ridges Basin Inlet Conduit. The Animas River from Junction Creek to the Southern Ute Indian Reservation boundary (which includes the intake structure for the Durango Pumping Plant for Lake Nighthorse) has been assessed as fully supporting agriculture and primary contact recreational uses,<sup>6</sup> not supporting water supply use, and having insufficient information to assess aquatic life (CDPHE 2012). The reach of the Animas River from Baker's Bridge in Durango to the Southern Ute Indian Reservation boundary is listed as impaired due to manganese (CDPHE 2014). Water quality in Lake Nighthorse is further affected by sedimentation and nutrient loading from drainages flowing into the reservoir and chemical, biological, and physical changes over time from inundation of soils and vegetation on the reservoir bottom (Reclamation 2000a).

Lake Nighthorse—up to the full pool elevation of the reservoir—is considered a Water of the United States (WUS) under jurisdiction of the U.S. Army Corps of Engineers (Corps) pursuant to Section 404 of the Clean Water Act (CWA). Due to relatively recent filling/inundation, no wetlands or other special aquatic sites are currently associated with the reservoir.

### 3.11.2 Environmental Consequences

#### *3.11.2.1 Proposed Action—2014 Recreation Plan*

Under the Proposed Action, water quality in Lake Nighthorse would be potentially affected by development and use of shoreline recreational facilities, motorized boating, and other water-based recreational facilities. Construction of recreational facilities and use of shoreline sites and trails by recreationists has the potential to result in increased erosion and sedimentation and discharge of sediment, nutrients, heavy metals, hydrocarbons, and other pollutants into the reservoir. Motorized boating on the reservoir could result in the occasional discharge or spills of hydrocarbon pollutants, although impacts would be minimal due to the large volume of water contained in the lake. Motorized boating could also result in the introduction of ANS, however, impacts would be avoided by implementation of mandatory boat inspections before accessing Lake Nighthorse. Construction of shoreline recreational facilities has the potential to impact WUS and wetlands that may develop at the reservoir over time. Shoreline access by anglers and other recreationists may also impact future wetland areas.

The Proposed Action would have fewer potential effects on water quality than Action Alternative 1 and Action Alternative 2, and would limit recreational facility development to realignment of a section of the boat ramp access road and construction of a boat ramp overflow parking area. Future development would be limited to the east side of the reservoir. Therefore, compared with Action Alternative 1 and Action Alternative 2, this alternative would have a reduced area of disturbance subject to potential for erosion and sedimentation. Effects of motorized boat use would be the same as Action Alternative 1 and Action Alternative 2. Possible future development of a swim beach

<sup>6</sup> A water body supporting the designated use “Recreation Primary Contact” is considered suitable for activities where ingestion of small quantities of water is likely to occur (e.g., swimming, boating, windsurfing, water-skiing).

and day-use areas along the east lakeshore would have the potential to impact WUS, including wetlands.

#### **3.11.2.2 Action Alternative 1—2011 Recreation Plan**

Action Alternative 1 would have more potential effects on water quality compared with the Proposed Action due to development of more recreational facilities and associated disturbance that may impact WUS, including wetlands that may develop at the reservoir over time.

#### **3.11.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

Effects on water quality under this alternative would be the same as Action Alternative 1.

#### **3.11.2.4 No Action Alternative**

Under the No Action Alternative, water quality in Lake Nighthorse would not be subject to erosion, sedimentation, and discharge of other pollutants related to recreational development or use.

#### **3.11.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- Water quality monitoring shall be undertaken by Reclamation in cooperation with the recreation manager, ALPOMRA, and other stakeholders. The results of water quality monitoring shall be reviewed periodically to determine whether additional measures need to be developed and implemented.
- The recreation manager shall enforce regulations that protect water quality (e.g., the 5 mph maximum boat speeds in no wake zones to minimize turbidity and shoreline erosion, prohibition of discharge of sewage, organic material, or garbage into the reservoir, implementation of ANS monitoring, ANS education, and mandatory boat inspections). The recreation manager shall coordinate with the CPW to monitor and enforce boating and fishing regulations.
- The recreation manager shall implement and monitor applicable best management practices and recommendations for the protection of water quality. The recreation manager shall provide training to its staff and shall provide and store, on-site, a boat, other equipment, and materials to address hazardous material spills (either by staff or by emergency services personnel). The boat shall be stored on-site when the lake is open for public use.
- Measures to control storm water runoff from temporary disturbance areas and permanent improvements shall be implemented and monitored in accordance with CDPHE requirements for storm water management.
- Prior to design and construction of any recreational facilities at the reservoir, the presence of jurisdictional wetlands and/or WUS shall be assessed and, if necessary, avoided or mitigated. If applicable, facilities will be designed and constructed in compliance with Reclamation's CWA Section 404 authorization for the ALP Project and/or filing an application for a Colorado discharge permit with CDPHE.

## **3.12 Air Quality**

### **3.12.1 Affected Environment**

As directed by the federal Clean Air Act (CAA), the EPA established National Ambient Air Quality Standards (NAAQS) for six “criteria” pollutants in Title 40, CFR, Part 50. These standards were adopted by the EPA to protect the public health and welfare. The six pollutants of concern are carbon monoxide, nitrogen dioxide, ozone, sulfur dioxide, lead, and particulate matter (PM<sub>10</sub>, inhalable coarse particles less than 10 but more than 2.5 microns in diameter, and PM<sub>2.5</sub>, fine particles less than 2.5 microns in diameter). States are required to adopt standards that are at least as stringent as the NAAQS.

The CAA requires that states classify air basins (or portions thereof) as either “attainment” or “nonattainment” with respect to criteria pollutants. If an air basin does not meet the NAAQS for one or more pollutants, then the area is classified as “nonattainment” for that pollutant. For nonattainment areas, states are required to formulate and submit State Implementation Plans to the EPA that outline those measures the state will use to attain and maintain compliance with the NAAQS (40 CFR Part 51). La Plata County is currently an attainment area for all criteria pollutants, and the project area is not within a Class I Airshed.

The CDPHE Air Quality Control Division monitors and regulates air quality in Colorado. Construction projects less than 25 acres in size and less than six months in duration are exempt from permitting and do not need to report air emissions, but operators must use appropriate control measures to minimize the release of fugitive dust. Development projects that range from 25 acres to 1,850 acres can qualify for a Land Development General Permit, which is subject to emissions guidelines and implementation of control measures.

EO 13514 directs federal agencies to promote pollution prevention and reduce emissions of greenhouse gases (GHGs) that result from their actions. In accordance with Section 19(i) of this EO, the CEQ defines GHGs as carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride. The CEQ has proposed an annual reference threshold of 25,000 metric tons of carbon dioxide–equivalent (CO<sub>2</sub>e) GHG emissions as a useful indicator for agencies to consider when analyzing potential action-specific GHG emissions in NEPA documents (CEQ 2010). This threshold was considered relevant by CEQ because it is a minimum standard for reporting GHG emissions from specified industries under the CAA (EPA’s Mandatory Reporting of Greenhouse Gases Final Rule, 74 Federal Register 56260). According to the CEQ draft guidance, no quantitative analysis of GHGs is necessary if emissions from a proposed action are not likely to exceed the annual presumptive threshold of 25,000 metric tons of CO<sub>2</sub>-equivalent GHGs. Globally, sources of human-induced emissions of CO<sub>2</sub>e GHGs include mainly burning of fossil fuels for power generation and transportation, with significant contributions from clearing of forests, agricultural practices, and other similar activities. In the study area, principal local sources of CO<sub>2</sub>e GHGs include combustion emissions from heavy equipment and light vehicles used in farming, construction, and personal and commercial transportation.

### **3.12.2 Environmental Consequences**

#### ***3.12.2.1 Proposed Action—2014 Recreation Plan***

Construction activities associated with development of recreational facilities under the Proposed Action would generate fugitive dust, primarily from operation of earthmoving equipment,



excavation, travel of construction vehicles and other equipment on unimproved access roads, and stockpiling of construction materials. This would represent a minor transient effect on ambient air quality in the study area. The temporary operation of construction equipment and motor vehicles would generate minor amounts of engine combustion products, including nitrogen and nitrous oxides, carbon dioxide, carbon monoxide, and reactive organic gases.

Recreational activities at Lake Nighthorse would result in an increase in emissions of engine combustion products from vehicles and motorized boats. Increased emissions would be more concentrated when recreational use is highest (mid-May to mid-November and on weekends) but would not be expected to lead to, or substantially contribute to, nonattainment for any criteria pollutant.

The CEQ has proposed an annual reference threshold of 25,000 metric tons of direct CO<sub>2</sub>e GHG emissions as a useful indicator for agencies to consider when analyzing potential action-specific GHG in NEPA documents (CEQ 2010).<sup>7</sup> The primary sources for the generation of GHG emissions with the development of recreational facilities under this alternative would be from the operation of motor vehicles by the recreational manager's operations and maintenance staff, the operation of motor vehicles by recreationists traveling to and from the site, the operation of motorized watercraft on the lake, and the burning of campfires in designated areas.

The annual emission of CO<sub>2</sub>e GHG from the Proposed Action would be substantially below the threshold proposed by the CEQ as relevant to the decision-making process. The Proposed Action would be considered to have little to no effect on climate change.

#### ***3.12.2.2 Action Alternative 1—2011 Recreation Plan***

Under Action Alternative 1, effects on air quality would be similar to the Proposed Action. Temporary effects from fugitive dust emissions during construction would be greater due to the more limited extent of ground disturbance under this alternative. Due to more development of recreational facilities, there would be greater emissions of engine combustion products from vehicles compared with the Proposed Action. Emissions from motor boats would be similar to those under the Proposed Action. As with the Proposed Action, Action Alternative 1 would not be expected to lead to, or substantially contribute to, nonattainment for any criteria pollutant; exceed the annual CO<sub>2</sub>e GHG emission threshold proposed by the CEQ; or substantially affect climate change.

#### ***3.12.2.3 Action Alternative 2—2000 FSEIS Recreation Plan***

Effects of Action Alternative 2 on air quality would be the same as Action Alternative 1, except that higher vehicle emissions would be anticipated due to more recreation annual user days under this alternative.

#### ***3.12.2.4 No Action Alternative***

Under the No Action Alternative, there would be no potential for emissions of fugitive dust or GHGs related to the development and use of recreational facilities at Lake Nighthorse. Existing access roads would experience minimal travel, due to the reservoir area being closed to the public.

<sup>7</sup> Executive Order 13514 directs federal agencies to promote pollution prevention and reduce emissions of greenhouse gases from actions under their control.

### **3.12.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- As needed, construction contractors shall obtain permit coverage from the CDPHE Air Pollution Control Division and implement best management practices.
- All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Only certified weed-free seed and mulch shall be used. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.
- Gravel entryways shall be used to prevent mud and dirt carryout onto paved surfaces. Any mud and dirt carryout onto paved surfaces shall be cleaned up daily.
- All roadways open to public and other use shall be graveled initially and improved as need arises and funding allows.

## **3.13 Traffic**

### **3.13.1 Affected Environment**

The project area is southwest of Durango on CR 210 and is accessed from the east via CR 210 (off U.S. 550-160) or from the west via CR 210 (from CR 141/Wildcat Canyon Road). U.S. 550-160 is a four-lane, non-rural principal highway that serves as a primary route to and through Durango. U.S. 550-160 has a speed limit of 50 mph at its intersection with Frontage Road, the primary access from Durango to CR 210. Frontage Road is a four-lane road at the intersection of CR 210 that decreases to a two-lane road south of the intersection. It is used primarily to serve businesses and retail shops in Bodo Industrial Park and has a speed limit of 35 mph. The intersection of Frontage Road and U.S. 550-160 is approximately 200 feet north of the intersection of Frontage Road and CR 210. CR 210 is a two-lane rural highway composed of chip seal on top of gravel. The speed limit on CR 210 is 45 mph west of the proposed Lake Nighthorse main entrance, decreases to 35 mph east of the main entrance, and decreases again to 25 mph within approximately ½ mile of Frontage Road. CR 141 is a two-lane rural highway with a speed limit of 40 mph at the CR 210 intersection (Russell Planning and Engineering 2011).

A traffic impact study (Russell Planning and Engineering 2011) has identified four intersections as being potentially affected by the project: (1) the U.S. 550-160/Frontage Road intersection, (2) the Frontage Road/CR 210 intersection, (3) the CR 210/CR 141 intersection, and (4) the proposed Lake Nighthorse main entrance/CR 210 intersection. All of these intersections currently function at acceptable LOS and are projected to function at acceptable LOS through 2032, with the exception of the U.S. 550-160/Frontage Road intersection. This intersection is anticipated to reach an unacceptable LOS at the Friday evening peak hour by 2020 (Russell Planning and Engineering 2011).

Improvements to three intersections have been recently completed or are planned for the near future. In August 2012, the Colorado Department of Transportation (CDOT) restriped the intersection at Frontage Road and CR 210 to provide a left-turn pocket for northbound Frontage

Road traffic, as well as a dedicated right-turn pocket for southbound Frontage Road traffic. This was completed in conjunction with a maintenance patch overlay (Rick Routh, Traffic Engineer, CDOT Region 5, personal communication 2012). In the summer of 2012, La Plata County redesigned and improved the intersection at CR 210 and CR 141 to provide a left-turn deceleration lane and a right-turn deceleration lane on CR 141 for movements onto CR 210. The county also plans to provide a left-turn deceleration lane at the proposed Lake Nighthorse main entrance/CR 210 intersection (Russell Planning and Engineering 2011).

### **3.13.2 Environmental Consequences**

#### ***3.13.2.1 Proposed Action—2014 Recreation Plan***

Based on a traffic study completed for the 2011 Recreation Master Plan (Action Alternative 1) (Russell Planning and Engineering 2011), the Proposed Action would result in an increase in recreation-related traffic on the roads and intersections affected by the project. Most of this increase would occur on weekends, with peak hours on Friday evenings and Monday mornings. The U.S. 550-160/Frontage Road intersection is anticipated to reach substandard LOS in 2020 in the Friday evening peak hour. Substandard LOS is anticipated at this intersection and along the entire U.S. 550-160 corridor in the Durango area even if no recreation plan is implemented (see No Action Alternative). The Frontage Road/CR 210 and the CR 210/CR 141 intersections are projected to function at an acceptable LOS through 2032, with or without implementation of a recreation plan or planned intersection improvements by CDOT and La Plata County. development and anticipated use of recreational facilities under the Proposed Action would ultimately result in queuing issues on the eastbound leg of the U.S. 550-160 and Frontage Road intersection and would begin to affect the functionality of the CR 210 and Frontage Road intersection.

#### ***3.13.2.2 Action Alternative 1—2011 Recreation Plan***

Effects on traffic from Action Alternative 1 would be similar to the Proposed Action except that there would be more recreation-related traffic on the roads and more intersections affected by the project. As with the Proposed Action, most of this increase would occur on weekends, with peak hours on Friday evenings and Monday mornings and the U.S. 550-160/Frontage Road intersection is anticipated to reach substandard LOS in 2020 in the Friday evening peak hour. If all proposed phases of the recreation plan are completed by 2020, project traffic would contribute approximately 9 percent of the Friday evening peak hour traffic on the eastbound leg of this intersection (the lowest LOS movement). As with the Proposed Action, substandard LOS at this intersection is anticipated even if this recreation plan is not implemented (see No Action Alternative), and similar issues are anticipated along the entire U.S. 550-160 corridor in the Durango area. The Frontage Road/CR 210 and the CR 210/CR 141 intersections are projected to function at an acceptable LOS through 2032, with or without implementation of a recreation plan or planned intersection improvements by CDOT and La Plata County. With development of the swim beach under this alternative, completion of a left-turn deceleration lane at the proposed Lake Nighthorse main entrance/CR 210 intersection would maintain traffic flow on CR 210. Development and anticipated use of recreational facilities under Action Alternative 1 would result in queuing issues on the eastbound leg of the U.S. 550-160 and Frontage Road intersection. This would begin to affect the functionality of the CR 210 and Frontage Road intersection, specifically for traffic traveling from Lake Nighthorse into Durango, with the addition of traffic generated from

development of the swim beach area and associated facilities (Russell Planning and Engineering 2011).<sup>8</sup>

### **3.13.2.3 Action Alternative 2—2000 FSEIS Recreation Plan**

Effects of Action Alternative 2 on traffic would be the similar to the Proposed Action and Action Alternative 1, except that higher annual user days would result in higher traffic volumes.

### **3.13.2.4 No Action Alternative**

Under the No Action Alternative, a recreation plan would not be implemented and the area would not be opened to public use; therefore, no associated increase in traffic on affected roadways and intersections would occur. However, substandard LOS would be expected to occur at the U.S. 550-160 intersection in 2020 due to projected population growth. This alternative would not result in queuing issues at the U.S. 550-160/Frontage Road intersection or the CR 210/Frontage Road intersection, and traffic traveling eastbound from CR 210 into Durango would not be affected.

### **3.13.2.5 Mitigation Measures (Action Alternatives)**

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- A traffic monitoring plan may be necessary to verify the assumptions of the completed traffic study, update the study as necessary, and identify when corrective actions are required.
- A left-turn deceleration land has been constructed by La Plata County at the Lake Nighthorse main entrance/CR 210 intersection.
- With respect to County Road 210, Reclamation will work with all parties, including La Plata County, to monitor the condition of the road and as needed seek funding for any necessary upgrades, within legal authorities.

## **3.14 Public Health and Safety**

### **3.14.1 Affected Environment**

The project area is currently closed to public access, with public safety in the surrounding areas provided by the La Plata County Sheriff's Office. The Sheriff's Office Public Safety Division employs 29 deputies and is divided into four districts covering about 1,800 square miles. Patrol deputies conduct initial criminal investigations, enforce driving under the influence and traffic offense violations on county roads and state highways, and assist the local fire, ambulance, and law enforcement agencies in the county. In 2009, deputies responded to more than 20,000 calls for service. In 2011, the Sheriff's Office responded to 483 calls along CR 210, primarily for extra patrols, security calls, and traffic complaints, including two or three criminal complaints (Lieutenant Ed Aber, La Plata County Sheriff's Office Public Safety Division, personal communication 2011).

Fire protection and emergency services are coordinated by the Durango Fire Protection District, which manages 16 stations (three staffed by paid firefighters and medics and 13 crewed by dedicated volunteers) and serves a primary response area of 325 square miles. The Animas Fire District, La Plata County's largest, had 78 calls in 1978, 800 calls in 1999, and an estimated 1,000 calls in 2000. The project area falls within the service area of Fire Station No. 1 (Bodo Park

<sup>8</sup> The traffic impact study assumed that this would occur in 2016, though this would be contingent on funding and other factors.

Station), which is staffed by paid firefighters. The Sheriff's Department is the designated fire warden in La Plata County and is ultimately responsible for all wildfire on private and state land. The project area is not under a fire district jurisdiction due to federal and state ownership. Per a MOU, control of any fires that occur would be the responsibility of the Bureau of Indian Affairs under the Southern Ute Agency's Fire Management Plan.

Fatalities and injuries occur yearly in Colorado from water transport and nonwater transport activities on open bodies of water. Water transport deaths and injuries result from falls and burns on a watercraft, being struck or crushed by watercraft, water-skier or swimmer collisions with watercraft, and other injuries resulting from the use of watercraft. Six deaths and 25 hospitalizations occur each year, on average, in Colorado from water transport incidents, which involve primarily males ages 15 to 44 (CDPHE 2005a).

In Colorado, 91 percent of drowning deaths and 98 percent of near-drowning hospitalizations result from recreational activities not related to water transport, such as water-skiing, diving, swimming, or playing in or near open water bodies (CDPHE 2005b). Drowning is the second leading cause of unintentional injury-related death among Colorado children ages 14 and under (death rate of 4.6 per 100,000 population), with only motor vehicle crashes causing more fatalities. In Colorado, nearly one-third (32 percent) of drowning deaths involving children 14 and younger occurred in larger outdoor bodies of water, such as lakes or rivers (CDPHE 2004). At this time, there are few flat-water-related incident calls at the main reservoirs in and near La Plata County (Vallecito Reservoir, Lemon Reservoir, and Navajo Reservoir) (Butch Knowlton, La Plata County Office of Emergency Management Director, personal communication 2011). The low number of calls is partially due to the remote nature of the existing reservoirs and their relatively low usage by the population of La Plata County. This situation makes La Plata County response agencies less experienced and ill-equipped for flat-water response (Courtney Krueger, La Plata County Natural Resources Planner, written communication dated December 15, 2011). The La Plata County Sheriff's Department would be responsible for search and rescue operations in the project area. Durango Fire Protection District would most likely be the most immediate and primary responder to any life safety or medical incident at or near Lake Nighthorse. However, on federal land, the Sheriff's Department would also be a primary response agency.

On average, more than 2,500 forest fires occur in Colorado each year, about two-thirds of which are lightning-caused, with the remainder caused by humans (e.g., discarded cigarettes, abandoned campfires) (Denver Museum of Nature and Science 2011). In Colorado, wildfire response is coordinated through six interagency dispatch centers, and large wildfire costs can exceed \$1 million per day (Colorado State Forest Service 2011). A recent lightning-caused wildfire occurred south of Lake Nighthorse, near the Southern Ute Indian tribal boundary (Karola Hanks, Durango Fire Protection District, personal communication 2011).

The CDPHE Water Quality Control Division (WQCD) works closely with the Colorado Department of Natural Resources (CDNR) CPW and the CDPHE Disease Control and Environmental Epidemiology Division in the collection and analysis of data and the determination of human health risks from consumption of locally caught fish. The WQCD currently tests fish tissue samples from 120 water bodies in the state for mercury, selenium, and arsenic, including Lake Nighthorse. Fish consumption advisories are issued to protect public health and to address human health risk questions associated with consuming potentially contaminated fish. Twenty-

four water bodies (approximately one in five) have required fish consumption advisories for mercury (CDPHE 2011).

The CDPHE WQCD regulates natural swim areas with regard to water quality and levels of fecal coliform that could present a hazard to public health (CDPHE 1998).

### **3.14.2 Environmental Consequences**

#### ***3.14.2.1 Proposed Action—2014 Recreation Plan***

Development and operation of recreational facilities under the Proposed Action would increase demand on law enforcement, fire protection, and emergency services. The La Plata County Sheriff's Office anticipates an increase in call activity requiring dispatch of deputies to the area, though this increase would depend on the role of the nonfederal recreation manager in law enforcement in the recreational area. At this time, the Sheriff's Office anticipates it would handle additional calls with its existing staff of deputies (Lieutenant Ed Aber, La Plata County Sheriff's Office Public Safety Division, personal communication 2011). There would also be an increase in calls to Fire Station No. 1 for fire protection and other emergency services.

The Proposed Action would provide public access and opportunity for water-based recreation at Lake Nighthorse and would increase the potential for boating accidents, drowning, and other water-related incidents. The potential for boating accidents and drowning would be reduced through boating regulations, including speed limits, no wake zones, and no boating access zones (including the swim beach area), and requirements for the use of flotation devices on watercraft. Though the lake would be closed to boating in the winter months, winter use of trails or shoreline areas may lead to some drowning or near-drowning incidents from people attempting to cross lake ice and falling through. The occurrence of water-based incidents would likely be higher at Lake Nighthorse compared with other reservoirs in the vicinity (Vallecito Reservoir, Lemon Reservoir, and Navajo Reservoir) because, being closer to Durango, it would experience heavier use by recreationists (Butch Knowlton, La Plata County Office of Emergency Management Director, personal communication 2011). For the same reason, it may also have a higher percentage of inexperienced users compared with other reservoirs in the area.

Motorized boating on Lake Nighthorse would create the potential for hazardous materials spills (fuel, oil). Neither Durango Fire Protection District nor La Plata County Office of Emergency Management currently have boats for flat-water rescue or equipment to handle hazardous materials spills (Karola Hanks, Durango Fire Protection District, and Butch Knowlton, La Plata County Office of Emergency Management Director, personal communication 2011).

Recreational use of the project area would generate additional traffic on CR 210, U.S. 550-160, Frontage Road, and the associated intersections, which would likely increase the number of traffic accidents. Maintenance of a recreational fishery would create the potential for fish consumption hazards, if the accumulation of mercury levels in fish tissue exceeds levels considered safe for human consumption. Prior to filling, vegetation was cleared from the reservoir bottom to limit mercury methylation potential. Stocking of only trout would reduce the potential for bioaccumulation of high levels of mercury in fish tissue because trout are not at the top of the fish food chain (Reclamation 2000a). Potential effects on public health would be reduced through

planned monitoring for trace elements in fish tissue for the first two years after the reservoir has filled and the issuance of fish consumption advisories, as needed.

#### ***3.14.2.2 Action Alternative 1—2011 Recreation Plan***

Additional recreational facility development under Action Alternative 1 would result in a greater increase in the demand on law enforcement, fire protection, and emergency services compared with the Proposed Action. The potential for accidents and hazardous materials spills related to boating would be similar to that of the Proposed Action. Due to development of more recreational facilities, this alternative would have a higher number of traffic accidents compared with the Proposed Action. Potential effects on public health from mercury in fish tissues would be the same as under the Proposed Action.

#### ***3.14.2.3 Action Alternative 2—2000 FSEIS Recreation Plan***

Effects of Action Alternative 2 on public health and safety would be the similar to the Proposed Action and Action Alternative 1 except higher recreation annual user days would result in higher demand on law enforcement, fire protection, and emergency services and potentially more traffic accidents.

#### ***3.14.2.4 No Action Alternative***

Under the No Action Alternative, Lake Nighthorse would remain closed to public access, and no resultant increase in water-related accidents or traffic accidents and no additional demands on local law enforcement, fire protection, and emergency services providers would occur. The potential for consumption of fish from the lake with elevated levels of mercury or other trace elements would be limited to that resulting from trespass and unauthorized fishing activities. Under this alternative, Reclamation and the La Plata County Sheriff's Office would continue patrolling the project area to monitor and enforce the closure and maintain fencing and gates.

#### ***3.14.2.5 Mitigation Measures (Action Alternatives)***

In addition to the commitments listed in Table 1, the following mitigation measures would apply to the action alternatives:

- The recreation manager shall provide staff or will coordinate with law enforcement agencies to patrol the lake and the surrounding areas and to enforce regulations. No wake zones and no boating zones shall be clearly demarcated on the lake, and buoys demarcating any dedicated swim beach area shall be maintained during periods when the lake is open to boating.
- The recreation manager shall provide training to its staff and shall provide and store, on-site, a boat, other equipment, and materials to conduct rescue operations and to address hazardous materials spills (either by staff or emergency services personnel). The boat shall be stored on-site when the lake is open for public use.
- The recreation manager shall, in coordination with Reclamation, develop and maintain a swim beach management plan for compliance with the CDPHE, Water Quality Control Division, 5 CCR 1003-5, State Board of Health Regulations Pertaining to Swimming Pools and Mineral Baths (Section 4.6, Water Quality Standards for Natural Swimming Areas). This plan shall include testing for fecal coliform (*E. coli*) concentrations at a minimum of once every seven days and no less than five times in a calendar month during use periods. At least one time per calendar month, samples shall be taken at least 24 hours prior to the beginning of a peak use period and

within 24 hours after the end of the same peak use period. The first sample of the swimming season shall be taken at least five days prior to opening the swim beach area. The swim beach shall be closed and notices shall be posted when fecal coliform concentrations exceed 235 organisms per 100 milliliters. The swim beach shall not be reopened until samples show concentrations below this threshold level. The swim beach management plan shall identify testing procedures and protocols that are in compliance with the above-referenced regulations.

- Motorized watercraft shall adhere to current CPW standards to carry required safety equipment on the vessel.



## 4.0 Cumulative Effects

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Cumulative effects result from the incremental impact of an action when added to other past, present, and reasonably foreseeable future actions, regardless of what agency (federal or nonfederal) or person undertakes such other actions. Cumulative impacts can result from individually minor but collectively significant actions taking place over a period of time (40 CFR 1508.7). The level and scale of the cumulative analysis should be commensurate with the proposed project's potential impacts, scale, and other factors. NEPA documents should consider those past, present, and future actions that incrementally contribute to the cumulative effects on resources affected by the proposed action (CEQ 1997).

Chapter 3 included consideration of past, present and ongoing actions and effects. In this chapter, reasonably foreseeable future actions that could contribute to the cumulative effects of the action alternatives include construction and operation of Lake Nighthorse and associated ALP Project facilities as described in the FSEIS (Reclamation 2000a), the La Plata West Water Authority Raw Water project (Reclamation 2016), the plans of the City of Durango (2007), and anticipated future growth in La Plata County. Cumulative effects on resource topics affected by the action alternatives are discussed in this chapter. The effects projected in the FSEIS (Reclamation 2000a) are incorporated by reference.

### 4.1 Recreation

A variety of recreational facilities and opportunities exist in La Plata County and the surrounding areas, including 12 major reservoirs, dozens of campgrounds, stocked lakes/managed fisheries, and 60 major trailheads within a 100-mile driving radius of Lake Nighthorse. Recreational facilities comparable to those proposed at Lake Nighthorse have been developed at seven of these reservoirs. Construction of Lake Nighthorse as a component of the ALP Project was anticipated to result in a loss of up to 7,000 annual user days (3,500 hunting and 3,500 nature observation) in the project area (Reclamation 2000a). Implementation of a recreation plan would result in an estimated 86,308 to 218,400 annual user days, depending on the alternative. This would represent 7 percent to 19 percent of the regional market share.

### 4.2 Socioeconomics

Cumulative effects on socioeconomics are related to past and present rural and urban development and projected future growth in the project vicinity. The population in La Plata County has grown as a result of (among other factors) oil and gas industries, mining, and growth of tourism in the area. The availability of municipal and industrial project water from the ALP Project is anticipated to contribute to future growth, including growth on Ute Mountain Ute and Southern Ute Indian tribal lands as a result of a secure and reliable water supply. The development of recreational facilities could also stimulate growth by making the area more attractive for tourism and retirement, and by providing additional opportunities for employment (City of Durango 2007, La Plata County 2001).

Cumulative effects of increased growth include economic benefits (e.g., more employment opportunities, increased retail sales, and overall economic output) and greater demand for affordable housing and public services. Availability of affordable housing has been identified as a

growth challenge, and median home sales price in Durango experienced a 220 percent increase from 2000 to 2007 (City of Durango 2007). Home and land prices in La Plata County have also continued to increase substantially while most wages have remained relatively low, a function of the tourist-based economy that relies heavily on traditionally low-paying service jobs. This has compromised the ability of many longtime residents and young adults to obtain reasonably affordable housing and has resulted in a tendency for people to move to the outlying, less-developed areas of the county where land costs less (La Plata County 2001). Population growth in Durango as well as other parts of La Plata County will continue to place greater demands on public services such as the transportation and utility infrastructure, public safety and emergency services, education, social services, animal control, and other services. Implementation of a recreation plan would contribute to population growth by creating an estimated 80 to 203 full-time jobs, depending on the alternative. This would represent 2 percent to 5 percent of all warm-season or summer tourism jobs and 0.3 percent to 0.7 percent of all jobs in La Plata County, depending on the alternative.

### **4.3 Environmental Justice**

While minority and low-income persons are present in the City of Durango and La Plata County, environmental justice populations are not present in the study area, therefore, no cumulative effects are identified.

### **4.4 Cultural Resources**

The FSEIS anticipated impacts to 80 to 90 cultural sites from dam construction, inundation, and reservoir wave action combined (Reclamation 2000a). These effects were resolved based on implementation of a programmatic agreement for construction. The effects of the alternatives (and the proposed action/undertaking) were described in Chapter 3 and none of the other reasonably foreseeable actions/undertakings are projected that would affect historic properties in the area of potential effects.

### **4.5 Indian Trust Assets**

No reasonably foreseeable actions that would have cumulative impacts on ITAs.

### **4.6 Brunot Treaty Rights and Public Hunting**

Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

### **4.7 Noise**

Past growth in rural development in the project vicinity has contributed to increased traffic volumes on CR 210 and associated increases in ambient noise levels. The action alternatives and development of recreational facilities at Lake Nighthorse would further increase ambient noise levels, though cumulative noise levels would not be expected to exceed EPA standards, La Plata County standards, or City of Durango ordinances.

## 4.8 Natural Resources

Past urban and rural development on private and tribal lands and land management and other activities on public lands have reduced native vegetation and wildlife habitat and have affected wildlife movement corridors in the project vicinity. Future growth in La Plata County and Durango is expected to contribute additional impacts to vegetation and wildlife resources, though these effects would be mitigated by the federal, state, and local emphasis on protection of natural resources and wildlife movement corridors as part of their planning strategies (La Plata County 2001, City of Durango 2007).

Construction, filling, and operation of Lake Nighthorse were expected to impact 134 acres of wetlands/riparian vegetation and 1,487 acres of upland vegetation. Construction of the Durango Pumping Plant, relocation of CR 211, and construction of new access and maintenance roads were expected to impact an additional 158 acres of upland vegetation and result in minor impacts to riparian vegetation near Wildcat Creek. Development of recreational facilities under the action alternatives would not impact wetlands/riparian vegetation but would result in the removal of between 5 and 128 additional acres of upland vegetation in the project area, depending on the alternative. These effects were considered in the FSEIS, which required replacement and enhancement of 2,700–2,900 acres to compensate for losses of wetlands and riparian and upland vegetation as part of the ALP Project. Reclamation has acquired almost 6,000 acres of upland areas and 232 acres of riparian areas and buffers. Management of these areas has included seeding on 200 acres and implementation of an Integrated Vegetation Management Plan, including weed control efforts (Reclamation 2008).

Construction and filling of Lake Nighthorse was anticipated to result in the loss of 1,487 acres of elk and deer winter range due to inundation of habitat. It was also anticipated to displace up to 500 elk and several hundred mule deer, either directly through loss of habitat or indirectly by interruption of migration routes (Reclamation 2000a). Implementation of the recreation plan under the action alternatives would result in an additional loss of between 4 and 128 acres of wildlife habitat. Increased use of the area by humans would disrupt habitat utilization and behavior and would reduce use of the project area by elk, deer, and other wildlife during the summer. Restriction of recreational uses in winter, including seasonal closures on the south and west ends of the reservoir and closure of the reservoir to boating, would protect winter use and migration corridors for elk and deer. These effects on wildlife were considered in the FSEIS and have been mitigated through the acquisition of nearly 6,000 acres of upland areas and 232 acres of riparian areas and buffers, as described previously. Management of these areas has included operation of two water wells in upland areas for wildlife enhancement purposes (Reclamation 2008).

## 4.9 Visual Quality/Aesthetics

Past, ongoing, and future urban and rural development have and will continue to modify the natural landscape in the project vicinity. Construction of Ridges Basin Dam and Lake Nighthorse, and other associated features altered the visual characteristics of the project area by modifying the predominantly natural landscape and making the reservoir the dominant visual element. Implementation of a recreation plan would further modify the visual setting through construction and maintenance of the proposed recreational facilities under each of the action alternatives but would retain a predominantly natural setting. No other reasonably foreseeable actions that would cumulatively impact visual resources have been identified.

## **4.10 Water Quality**

Past effects on water quality are related primarily to historic mining activity in the Animas River watershed. Mitigation of mining impacts has improved water quality and is anticipated to improve water quality in the future (Reclamation 2000a). Potential effects of the action alternatives on water quality in Lake Nighthorse would be addressed through monitoring and implementation of protective measures, as needed. No other reasonably foreseeable actions that would cumulatively impact water quality have been identified.

## **4.11 Air Quality**

La Plata County is currently in attainment status for criteria air pollutants and implementation of a recreation plan under the action alternatives would not contribute substantially to potential nonattainment in the future. The action alternatives would contribute to emissions of GHGs from operation of heavy equipment and vehicles during construction, operation of vehicles and watercraft for maintenance and operation of the recreational area, from passenger vehicles used by visitors to travel to and from the recreational area, from recreational use of motorized boats on Lake Nighthorse, and from other sources. The annual emission of CO<sub>2</sub>e GHGs from the project would be substantially below the 25,000 metric ton threshold proposed by the CEQ as relevant to the decision-making process. The action alternatives would be considered to have little to no effect on air quality or climate change. No other reasonably foreseeable actions that would cumulatively impact air quality have been identified.

## **4.12 Traffic**

Factors influencing cumulative effects on traffic include a seasonal influx of a significant visitor population, the convergence of federal and state highways and county roads, topographical constraints, and continued growth. Increased future development along the U.S. 550-160 corridor and in parts of the county are anticipated to result in more prevalent delays at traffic signals, resulting in LOS E and F. In January 2000, the County Planning Commission adopted the La Plata County Transportation Plan as an element of the La Plata County Comprehensive Plan. Improvements to the U.S. 550-160 corridor contemplated in this plan would improve traffic conditions but are contingent on funding (La Plata County 2001). Implementation of a recreation plan under the action alternatives would contribute to a substandard LOS in 2020 of the U.S. 550-160/Frontage Road intersection. The contribution of the action alternatives to Friday evening peak hour traffic at this intersection would be up to approximately 9 percent, and this intersection is expected to reach a substandard LOS in 2020 even if no recreation plan is implemented (Russell Planning and Engineering 2011).

## **4.13 Public Health and Safety**

Population growth in La Plata County has resulted in greater demands on agencies providing public safety and emergency services. Between 1997 and 2000, the number of incidents investigated by the La Plata County Sheriff's Office increased by 25 percent from 17,737 incidents investigated to an estimated 22,100. To meet service demands, a number of additional deputy positions in the detentions division and the public safety division were added in 2000 (La Plata County 2001). Demand for fire protection services will also continue to increase as La Plata County grows. The Animas Fire District, the county's largest, had 78 calls in 1978, 800 calls in 1999, and an estimated 1,000 calls in 2000 (La Plata County 2001). Implementation of a recreation

plan under the action alternatives would result in additional calls to the La Plata County Sheriff's Office and the Durango Fire Protection District for public safety and fire protection, though additional staffing is not being considered at this time.

# 5.0 Summary of Environmental Commitments

Table 11 lists mitigation measures described in Chapter 3 that address specific effects to resource topics as well as commitments stemming from the FSEIS and 2011 Recreation Master Plan (the latter are listed in Table 1 in Chapter 2). The mitigation measures and commitments listed in Table 11 apply to all of the action alternatives analyzed, unless indicated otherwise.

**Table 11. Mitigation measures and commitments common to all action alternatives.**

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• Trail development in the project area shall be coordinated with the Southern Ute Indian Tribe, Ute Mountain Ute Tribe, Trails 2000, the City of Durango, La Plata County, ALPOMRA, and the CPW, and opportunities for linkage with other trail systems outside the project area may also be considered.</li> <li>• Reclamation shall commit to providing trout to be stocked in Lake Nighthorse to provide a recreational fishery.</li> <li>• To notify all users of the potential presence of others and to minimize conflicts between users, signs shall be posted and maintained at all trailheads specifying allowable uses (hiking, biking, or multi-use) and identifying basic trail etiquette.               <ul style="list-style-type: none"> <li>• User rules and regulations and designations of special use areas (e.g., no wake zones along the shore and the west end of lake) would reduce the potential for conflicts.</li> </ul> </li> <li>• Any trespass or unauthorized use will be dealt with by the appropriate law enforcement agencies.</li> <li>• Dogs shall be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off leash dogs would be permitted.</li> </ul>	Recreation
<ul style="list-style-type: none"> <li>• Effects on cultural resources shall be evaluated through the process outlined in an approved Cultural Resource Management Plan (CRMP) in compliance with the National Historic Preservation Act Section 106.</li> <li>• To reduce indirect impacts to cultural resource sites from visitors traveling off designated trails and day-use areas, educational and interpretive signage shall be developed and maintained explaining the general significance of cultural resources and the protection afforded them by law.</li> <li>• As needed, cultural resource surveys shall be completed prior to future development to determine impacts on other cultural resource sites, potential for avoidance, or need for testing and data recovery.</li> <li>• As needed, an archaeologist shall be available during all construction activities in the project area. The recreation manager shall assign staff to monitor recreational activities and enforce rules, regulations, and/or measures for the protection of cultural resources. Shoreline monitoring will be conducted pursuant to an approved CRMP.</li> <li>• Monitoring and oversight by a recreation manager and law enforcement agencies would reduce impacts from unauthorized access or trespass.</li> </ul>	Cultural resources

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.</li> </ul>	Brunot Treaty rights
<ul style="list-style-type: none"> <li>• No boats shall be operated on the lake from sunset to sunrise.</li> <li>• All motor boats shall be required to be equipped with mufflers that maintain sound levels below 86 decibels on the A-weighted scale (dBA) at 50 feet from the boat and below 55 dBA in neighboring residential areas (measured outdoors).</li> <li>• The lake shall be zoned and marked with buoys to denote no boating near any swim beach, the inlet, and the dam; no wake zones at the west end of the lake and around the shoreline; and open-use areas where motorized boat travel up to 40 mph shall be allowed. At minimum pool (750 acres), the entire lake shall be zoned as a no wake zone.</li> <li>• Motorized personal watercraft (e.g., jet skis) with open-air exhaust and two-stroke engines; houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats shall not be allowed on the lake.</li> <li>• Snowmobiles, off-road vehicles, and aircraft shall be prohibited.</li> <li>• Reclamation shall ensure that construction contractors provide blasting notification to residents, sound pre-blast alarms, and follow the construction safety plan as described in the FSEIS.</li> <li>• Construction noise shall be monitored and remain below allowable levels (i.e., 55 dBA during daytime hours and 50 dBA during nighttime hours [measured outdoors] at the nearest residences).</li> </ul>	Noise

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• The lake shall be closed to all motorized boating recreation from mid-November to mid-May. The lake may open earlier in the spring or stay open later in the fall if approved by the CPW, Reclamation, and the recreation manager. During the open season, no boats shall be operated on the lake from sunset to sunrise.</li> <li>• An ANS monitoring, education, and inspection program shall be implemented.</li> <li>• The south and west portions of the project area shall be closed to public access from mid-November to mid-May and open only to foot traffic outside the seasonal closure period. No recreational facilities or other facilities, such as cabin sites, shall be developed in the project area under any of the action alternatives.</li> <li>• All areas within ¼ mile of historic and current golden eagle nest sites shall be closed to public access from December 1 to July 15.</li> <li>• Efforts shall be made to avoid construction from May–July in the vicinity of elk calving areas.</li> <li>• Snowmobiles, off-road vehicles, and aircraft shall be prohibited.</li> <li>• All landscaping shall consist of native and adapted vegetation.</li> <li>• Design and construction of trails shall minimize erosion and sedimentation through construction in dry periods only, diversion of runoff across trails, maintenance of existing drainages, stabilization of all disturbed slopes with vegetation after construction, installation of signage and fencing to discourage social (undesignated) trails as needed. Under Action Alternatives 1 and 2, any trails north of CR 210 shall incorporate existing ranch and service roads.</li> <li>• Under Action Alternatives 1 and 2, any trails on the south and west sides of the reservoir shall be designated for foot traffic only.</li> <li>• Disturbance and removal of slow-growing trees, such as pinyon pine, juniper, and ponderosa pine, shall be minimized to the extent possible.</li> <li>• Wildlife-resistant trash receptacles shall be used.</li> </ul>	<p>Natural resources (vegetation and wildlife)</p>



Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• Lake Nighthorse shall continue to be part of a statewide fish tissue monitoring program administered by the CDPHE. If significant bioaccumulation effects are identified, Reclamation and/or the recreation manager shall work with the appropriate local, state, or federal agencies to minimize the impact or otherwise offer protection to potentially impacted fish and wildlife species and to possibly post human fish consumption advisories at the reservoir.</li> <li>• Construction activities shall be scheduled to avoid or minimize loud activities in the vicinity of golden eagle nesting areas during the nesting season.</li> <li>• The recreation manager, in coordination with Reclamation, the CPW, ALPOMRA, and La Plata County shall implement an integrated weed management plan that includes annual monitoring of the project area and areas subject to recreational development for the presence and spread of state-listed noxious weed species, development and implementation of appropriate treatments, and annual reporting. Areas near the lake shall be treated only with herbicides approved for use in or near aquatic habitats.</li> <li>• Under Action Alternative 1, a horse grooming station shall be constructed at the proposed multi-use trailhead along County Road 210 prior to opening the trail system for equestrian use. Signage shall be maintained that provides information on the potential spread of noxious weeds and associated impacts, provides information on certified weed-free forage, and encourages the grooming of horses.</li> <li>• The recreation manager shall provide staff and/or shall coordinate with Reclamation, CPW, ALPOMRA, and local law enforcement to patrol the lake and the surrounding areas and to enforce regulations. This shall include enforcement of seasonal closures for wildlife and use restrictions in the south and west portions of the project area, and enforcement of no wake and no boating zones, boat speed limits, boat size/type restrictions, time-of-day restrictions, and other regulations. No wake zones and no boating zones shall be clearly demarcated on the lake, and buoys demarcating any dedicated swim beach area shall be maintained during periods when the lake is open to boating.</li> <li>• Signs shall be placed along County Road 210 through the project area warning motorists of potential crossings of the roadway by deer and elk.</li> <li>• If new active raptor nests or nest locations are discovered, the recreation manager, in coordination with Reclamation, shall consult with the CPW and the USFWS to determine whether designation of buffers and closure to public access during the nesting season are warranted to minimize closure of recreational area(s).</li> <li>• For construction activities that take place between May 15 and August 31, a qualified biologist shall survey affected areas in advance of construction to determine the presence or absence of nesting birds.</li> <li>• Under Action Alternatives 1 and 2, Reclamation shall coordinate with the CPW and ALPOMRA regarding any additional measures that may be necessary to control or minimize resource damage in the portion of the project area north of CR 210.</li> <li>• All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Only certified weed-free seed and mulch shall be used. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.</li> </ul>	<p>Natural resources (vegetation and wildlife) (continued)</p>

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• All lighting shall be dark-sky compliant. Lighting shall be solar-powered, to the extent feasible.</li> <li>• All structures shall complement the existing landscape through the use of natural materials; parking lots and campgrounds shall be tucked into existing landforms; and utilities shall be installed underground.</li> <li>• All landscaping shall consist of native or other vegetation pre-approved by Reclamation.</li> <li>• All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Only certified weed-free seed and mulch shall be used. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.</li> <li>• Final siting and design of facilities by the recreation manager shall be coordinated with Reclamation to minimize cut and fill and to ensure the use of native and complementary construction materials and dark-sky-friendly lighting.</li> </ul>	<p>Visual quality/aesthetics</p>
<ul style="list-style-type: none"> <li>• An ANS monitoring, education, and inspection program shall be implemented.</li> <li>• No fueling shall be allowed on the lake, and all fueling shall occur in designated areas only.</li> <li>• Facilities, including trails, shall be designed to prevent future erosion and sedimentation. A Storm Water Management Plan, if necessary, shall be prepared and implemented, and best management practices shall be installed prior to all construction activities in accordance with state and federal regulations.</li> <li>• Design and construction of trails shall minimize erosion and sedimentation through construction in dry periods only, diversion of runoff across trails, maintenance of existing drainages, stabilization of all disturbed slopes with vegetation after construction, installation of signage and fencing to discourage social (undesigned) trails as needed. Under Action Alternatives 1 and 2, any trails north of CR 210 shall incorporate existing ranch and service roads.</li> <li>• Reclamation, the recreation manager, and the ALPOMRA shall continue to coordinate with the CDPHE regarding inclusion of Lake Nighthorse in the statewide fish tissue monitoring program to assess bioaccumulation of mercury and to develop protective measures, if warranted.</li> <li>• Water quality monitoring shall be undertaken by Reclamation in coordination with the recreation manager, ALPOMRA, and other stakeholders. The results of water quality monitoring shall be reviewed periodically to determine whether additional control measures need to be developed and implemented.</li> <li>• The recreation manager shall enforce regulations that protect water quality (e.g., the 5 mph maximum boat speeds in no wake zones to minimize turbidity and shoreline erosion, and prohibition of discharge of sewage, organic material, or garbage into the reservoir). The recreation manager shall coordinate with the CPW to monitor and enforce boating and fishing regulations.</li> </ul>	<p>Water quality</p>

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• The recreation manager shall implement and monitor applicable best management practices and recommendations for the protection of water quality. The recreation manager shall provide training to its staff and shall provide and store, on-site, a boat, other equipment, and materials to address hazardous materials spills (either by staff or by emergency services personnel). The boat shall be stored on-site when the lake is open to public use.</li> <li>• Measures to control storm water runoff from temporary disturbance areas and permanent improvements shall be implemented and monitored in accordance with CDPHE requirements for storm water management.</li> <li>• Prior to design and construction of any recreational facilities at the reservoir shore, the presence of jurisdictional wetlands and/or other WUS shall be assessed and, if necessary, avoided or mitigated. If applicable, facilities will be designed and constructed in compliance with Reclamation’s CWA Section 404 authorization for the ALP Project and/or filing an application for a Colorado discharge permit with CDPHE.</li> </ul>	Water quality (continued)
<ul style="list-style-type: none"> <li>• All roadways open to public and other use shall be graveled initially and improved as need arises and funding allows.</li> <li>• Construction contractors shall be required to implement measures to control fugitive dust and exhaust emissions during construction, such as water spraying of access roads and materials storage piles.</li> <li>• As needed, construction contractors shall obtain permit coverage from CDPHE Air Pollution Control Division, and implement best management practices.</li> <li>• All areas disturbed by construction activities shall be stabilized immediately following construction through surface roughening, mulching, and/or application of soil binders. All disturbed areas shall be seeded with plant species native to the region within one year of completion of construction. Only certified weed-free seed and mulch shall be used. Construction contractors shall be held to standards set by Reclamation at the time for establishment of vegetation cover in disturbed areas.</li> <li>• Gravel entryways shall be used to prevent mud and dirt carryout onto paved surfaces. Any mud and dirt carryout onto paved surfaces shall be cleaned up daily.</li> </ul>	Air quality
<ul style="list-style-type: none"> <li>• A traffic monitoring plan may be necessary to verify the assumptions of the completed traffic study, update the study as necessary, and identify when corrective actions are required.</li> <li>• A left-turn deceleration land has been constructed by La Plata County at the Lake Nighthorse main entrance/CR 210 intersection.</li> <li>• With respect to County Road 210, Reclamation will work with all parties, including La Plata County, to monitor the condition of the road and as needed seek funding for any necessary upgrades, within legal authorities.</li> </ul>	Traffic

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• No boats shall be operated on the lake from sunset to sunrise.</li> <li>• The lake shall be zoned and marked with buoys to denote no boating near the swim beach, the inlet, and the dam; no wake zones at the west end of the lake and around the lakeshore; and open use areas where motorized boat travel up to 40 mph shall be allowed. At minimum pool (750 acres), the entire lake shall be zoned as a no wake zone.</li> <li>• Breakwaters shall be constructed at the swim beach and boat ramp areas.</li> <li>• Swimming, wading, snorkeling, scuba diving, rafting, or tubing shall be prohibited within 300 yards of the dam and inlet structure; within 100 yards of buoys or barriers marking public access limits; at the boat dock and boat launch site; and in designated mooring areas.</li> <li>• Motorized personal watercraft (e.g., jet skis) with open-air exhaust and two-stroke engines; houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats shall not be allowed on the lake.</li> <li>• All boats shall be required to operate at safe speeds, not exceeding 40 mph in open use zones and not exceeding 5 mph in no wake zones.</li> <li>• Scuba diving shall require the use of a diver’s flag to warn other boaters.</li> <li>• Water-skiing shall be allowed only in areas of the lake zoned for open use.</li> <li>• Flotation devices shall be required for all persons being pulled or towed by a boat, and this activity would be prohibited within 500 feet of entrances, swimming beaches, and mooring areas, and within 100 feet of any person swimming, fishing, or diving; motorized boat travel shall be required to proceed in a counterclockwise direction.</li> <li>• Structures shall be constructed of fire-resistant materials, and locations of existing utilities shall be verified prior to construction.</li> <li>• Dogs shall be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off leash dogs would be permitted.</li> <li>• Wildlife-resistant trash receptacles shall be used in all campgrounds.</li> <li>• Campgrounds shall have hosts and shall be managed and patrolled 24 hours a day and seven days a week when open. Quiet hours shall be designated from 10 p.m. to 6 a.m.</li> <li>• Fire hazard mitigation plans shall be developed and implemented for each campground and shall specify, at a minimum, no fires outside grills or fire rings, no unattended fires, and no discharge or use of fireworks.</li> </ul>	<p>Public health and safety</p>

Mitigation Measures and Commitments	Issues/Resources Targeted
<ul style="list-style-type: none"> <li>• The recreation manager, Reclamation, and the ALPOMRA shall continue to coordinate with the CDPHE regarding inclusion of Lake Nighthorse in a statewide fish tissue monitoring program to assess bioaccumulation of mercury and to develop protective measures, if warranted.</li> <li>• The recreation manager shall provide staff and/or coordinate with law enforcement agencies to patrol the lake and the surrounding areas and to enforce regulations. No wake zones and no boating zones shall be clearly demarcated on the lake, and buoys demarcating the dedicated swim beach area shall be maintained during periods when the lake is open to boating.</li> <li>• The recreation manager shall provide training to its staff and shall provide and store, on-site, a boat, other equipment, and materials to conduct rescue operations and to address hazardous materials spills (either by staff or emergency services personnel). The boat shall be stored on-site when the lake is open for public use.</li> <li>• In coordination with Reclamation, the recreation manager shall develop and maintain a swim beach management plan for compliance with the CDPHE, Water Quality Control Division, 5 CCR 1003-5, State Board of Health Regulations Pertaining to Swimming Pools and Mineral Baths (Section 4.6, Water Quality Standards for Natural Swimming Areas). This plan shall include testing for fecal coliform (E. coli) concentrations at a minimum of once every seven days and no less than five times in a calendar month during use periods. At least one time per calendar month, samples shall be taken at least 24 hours prior to the beginning of a peak use period and within 24 hours after the end of the same peak use period. The first sample of the swimming season shall be taken at least five days prior to opening the swim beach area. The swim beach shall be closed and notices posted when fecal coliform concentrations exceed 235 organisms per 100 milliliters. The swim beach shall not be reopened until samples show concentrations below this threshold level. The swim beach management plan shall identify testing procedures and protocols that are in compliance with the above-referenced regulations.</li> <li>• Motorized watercraft shall adhere to current CPW standards to carry required safety equipment on the vessel.</li> </ul>	<p>Public health and safety (continued)</p>

## **6.0 Consultation and Coordination**

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### **6.1 List of Agencies and Persons Contacted**

Information was provided on the project proposal to the following entities during the development of the 2011 Recreation Plan, the 2014 Recreation Plan, and this EA. The names of the individuals are retained in the administrative record.

#### **6.1.1 Federal Agencies**

- Advisory Council on Historic Preservation
- Bureau of Indian Affairs
- Bureau of Land Management
- Bureau of Reclamation
- National Park Service
- San Juan National Forest
- U.S. Army Corps of Engineers
- U.S. Fish and Wildlife Service

#### **6.1.2 Congressional Delegation**

- Senator Michael Bennet
- Senator Cory Gardner
- Representative Scott Tipton

#### **6.1.3 State Agencies**

- Colorado Department of Public Health and Environment
- Colorado Department of Transportation
- Colorado Parks and Wildlife
- Colorado State Historic Preservation Office
- Colorado Water Conservation Board
- New Mexico State Historic Preservation Office

#### **6.1.4 Local Government Agencies**

- City of Durango Administration
- City of Durango Parks and Recreation
- City of Durango Police Department
- Durango Fire Protection District
- La Plata County Administration
- La Plata County Engineering Department

- La Plata County Office of Emergency Management
- La Plata County Planning Department
- La Plata County Sheriff's Office

#### **6.1.5 Indian Tribes**

- Hopi Tribe
- Jicarilla Apache Nation
- Navajo Nation
- Ohkay Owingeh Pueblo
- Pueblo of Isleta
- Pueblo of Acoma
- Pueblo of Cochiti
- Pueblo of Jemez
- Pueblo of Laguna
- Pueblo of Nambe
- Pueblo of Picuris
- Pueblo of Pojoaque
- Pueblo of San Felipe
- Pueblo of San Ildefonso
- Pueblo of Sandia
- Pueblo of Santa Ana
- Pueblo of Santa Clara
- Pueblo of Taos
- Pueblo of Tesuque
- Pueblo of Zia
- Pueblo of Zuni
- Southern Ute Indian Tribe
- Ute Indian Tribe
- Ute Mountain Ute Tribe

#### **6.1.6 Other Organizations**

- Animas-La Plata Operation, Maintenance, and Replacement Association
- Animas-La Plata Water Conservancy District

- Colorado Water Resources and Power Development Authority
- La Plata Conservancy District
- San Juan Water Commission
- Trails 2000



## 7.0 Preparers

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This EA has been prepared by Reclamation with the assistance of EcoPlan Associates, Inc. The following individuals participated in the development of this document:

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## 8.0 Related Environmental Laws, Policies

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The CEQ regulations encourage agencies to “integrate the requirements of NEPA with other planning and environmental review procedures required by law.” Coordinating NEPA procedures with those of other federal environmental statutes and EOs facilitates NEPA objectives by promoting efficiencies in environmental planning and development of relevant information on which to base agency decisions. This integrative approach to NEPA ensures planning, review, and compliance processes run concurrently rather than consecutively with procedures required by other environmental laws.

The following is a list of federal laws, EOs, and other directives that apply to the action alternatives discussed in this EA:

The National Environmental Policy Act of 1969, as amended, requires federal agencies to evaluate the potential environmental consequences of major federal actions. An action becomes “federalized” when it is implemented, wholly or partially funded, or requires authorization by a federal agency. The intent of NEPA is to promote consideration of environmental impacts in the planning and decision-making process prior to project implementation. NEPA also encourages full public disclosure of the proposed action, accompanying alternatives, potential environmental effects, and mitigation.

Public and agency scoping was initiated in March 2009 as part of the development of a Draft Recreation Master Plan. The public involvement process included open houses, a public forum, issues workshops, and a design workshop. All public involvement events were held in Durango. The public was notified of each of these events through advertisements published in local newspapers and public service announcements on local radio stations. Email announcements were sent to interested parties and those individuals who previously contacted the planning team or provided contact information. The public process calendar was also advertised through posters, comment cards, and a website. Interested agencies, individuals, and organizations were notified by letter on October 31, 2011, regarding preparation of a Draft EA. Subsequently, Reclamation coordinated with various project stakeholders regarding recreation planning at Lake Nighthorse, including the City of Durango, the ALPOMRA, the Southern Ute Indian Tribe, and the Ute Mountain Ute Tribe. On June 18, 2014, a public open house/community meeting was held by Reclamation in Durango to provide an update on recreation planning at Lake Nighthorse. The Draft EA has been made available for review on the website established for the project—<http://www.usbr.gov/uc/progact/animas/index.html>, under the “Environmental Compliance” tab.

The Endangered Species Act of 1973, as amended, provides protection for plants and animals that are currently in danger of extinction (endangered) and those that may become so in the foreseeable future (threatened). Section 7 of this law requires federal agencies to ensure that their activities do not jeopardize the continued existence of threatened or endangered species or adversely modify designated critical habitat. The USFWS issued a Biological Opinion in 1999 for the Animas-La Plata Project, which made a determination of “may affect . . . not likely to adversely affect” on the endangered Southwestern willow flycatcher and determinations of “may affect” on the endangered Colorado pikeminnow and razorback sucker and the currently delisted bald eagle. The Biological Opinion determined that no other federally listed species would be affected.

In 2011, the USFWS list of endangered, threatened, proposed, and candidate species for La Plata County was reviewed by a qualified biologist to determine which listed species may occur in the Lake Nighthorse project vicinity. This review was updated in June 2015 using the USFWS IPaC system. Table 11 summarizes the potential occurrence of species currently listed as threatened or endangered or that are candidates for listing in La Plata County. With the exception of the bald eagle, no listed, proposed, or candidate species have the potential to occur in the project area. Because the bald eagle has been delisted, effects on this species are analyzed under the Natural Resources—Wildlife section.

The Migratory Bird Treaty Act of 1918, as amended (MBTA), implements various treaties and conventions between the United States and Canada, Japan, Mexico, and the former Soviet Union for the protection of migratory birds. The MBTA prohibits the take, possession, import, export, transport, selling, or purchase of any migratory bird, their eggs, parts, or nests.

Bird species protected from take under the MBTA found nesting in the project area include golden eagle, peregrine falcon, red-shafted flicker, green-tailed towhee, mountain bluebird, blue-gray gnatcatcher, and vesper sparrow. Additional protected bird species are anticipated to nest in the project area. Mitigation measures have been included to avoid take of bird species protected under the MBTA.

The Clean Air Act of 1963, as amended, requires any federal entity engaged in an activity that may result in the discharge of air pollutants to comply with all applicable air pollution control laws and regulations (federal, state, or local). It also directs the attainment and maintenance of NAAQS for six different criteria pollutants: carbon monoxide, ozone, particulate matter, sulfur oxides, oxides of nitrogen, and lead. Air quality in the project area is in attainment of NAAQS.

Short-term construction emissions (particulate matter and engine combustion products) associated with the proposed project would have localized and minor effects on the air quality in the project vicinity. The project is not located in a nonattainment area or Class I Airshed.

The Clean Water Act of 1977, as amended, strives to restore and maintain the chemical, physical, and biological integrity of the nation's waters by controlling the discharge of pollutants. The basic means to achieve the goals of the CWA is through a system of water quality standards, discharge limitations, and permits. Section 404 of the CWA identifies conditions under which a permit is required for actions that result in placement of fill or dredged material into jurisdictional WUS. In addition, a Section 401 water quality certification and a Section 402 National Pollutant Discharge Elimination System (NPDES) permit are required for activities that discharge pollutants to WUS. The EPA has delegated the responsibility to administer water quality certification and NPDES programs in Colorado to CDPHE.

Construction of recreational facilities in the project area may require compliance with CWA Sections 401 and 404. The specific permits that may be required would be determined based on a final or substantially complete design. Permits or authorization would be obtained from the Corps prior to construction of all facilities that would result in placement of dredged or fill material in WUS. To determine impacts to WUS, a Preliminary Jurisdictional Delineation (including wetlands) would be prepared and submitted to the Corps for its concurrence. A Colorado Discharge

Permit System application would be filed with the CDPHE, and a Storm Water Management Plan would be developed and implemented during project construction.

The National Historic Preservation Act of 1966, as amended, mandates that all federally funded undertakings that have the potential to affect historic properties are subject to Section 106 of the National Historic Preservation Act. Federal agencies are responsible for the identification, management, and nomination to the NRHP of cultural resources that could be affected by federal actions. Consultation with the Advisory Council on Historic Preservation and SHPO is required when a federal action may affect cultural resources in, or eligible for inclusion in, the NRHP.

La Plata Archaeological Consulting completed a Class III survey for the first phase of recreational development under Action Alternative 1. Twelve cultural properties were recorded (Table 10). Two of these sites were determined officially eligible for inclusion in the NRHP in 2009, and the remaining 10 sites were determined field eligible in 1986. One of these 10 sites was determined to be officially eligible in 2012. None of these sites would be impacted by initial recreational development under the Proposed Action. Four of these sites may be directly impacted by construction of recreational facilities during the first phase of development under Action Alternative 1. The remainder of the cultural resource sites recorded during the Class III survey would be avoided during construction but would be subject to potential indirect effects from development and use of recreational facilities in their immediate vicinity. Mitigation has been included to address these indirect impacts. Possible future development of recreational facilities under the Proposed Action, development of recreational facilities during future phases of the project under Action Alternative 1 and possible future development of facilities under Action Alternative 2 would potentially affect some of the up to 170 cultural resource sites remaining in the project area. An approved CRMP will address potential impacts to cultural resource sites in the project area determined to be eligible or potentially eligible. Through implementation of the CRMP, impacts to such sites would be avoided, as feasible, or mitigated through testing and data recovery.

The Archaeological Resources Protection Act of 1979, as amended, was enacted to “protect irreplaceable archaeological resources and sites on federal, public, and Indian lands.” This act applies to archaeological resources, defined as material remains of past human life of archaeological interest, over 100 years old, and including, but not limited to, pottery, basketry, bottles, weapons, projectiles, tools, structures, pit houses, rock paintings, graves, and human skeletal materials. The act basically prohibits (1) excavating, removing, damaging, altering, or defacing an archaeological resource or attempt to do so and (2) selling, purchasing, exchanging, transporting, or receiving an archaeological resource or offering to do so. Under the Archaeological Resources Protection Act’s Excavation and Removal provision, a permit is required, notification must be sent to any tribes that may consider the site as having religious or cultural importance, and the consent of the tribes involved must be received when the site is on Indian land.

An approved CRMP will reflect the alternative selected. This plan will include a provision for continued monitoring of archaeological sites near proposed recreational facilities and in the project area in general by Reclamation. Reclamation will provide training to recreation manager staff to monitor and enforce the provisions of the Archaeological Resources Protection Act.

The Native American Graves Protection and Repatriation Act of 1990, as amended, contains definitions and procedures for repatriation, pertaining especially to museums that receive some federal funding and may possess applicable material, including remains of Native Americans. This act focuses on (1) restitution of human remains and cultural items located in museums that receive federal funds, (2) restitution to Native Americans of newly discovered human remains and associated burial items, and (3) anti-trafficking provisions dealing both with human remains and communally owned sacred and cultural objects.

The approved CRMP will outline procedures to be implemented during development of recreational facilities for the identification of resources protected by this act, notification of affected Native American tribes, and repatriation of remains to the appropriate tribe(s). This plan will require the presence of one or more archaeological monitors during any ground-disturbing activities to identify any remains and, in coordination with the Reclamation archaeologist, help ensure implementation of notification and repatriation procedures and compliance with provisions of the Native American Graves Protection and Repatriation Act.

The Resource Conservation and Recovery Act, as amended, establishes thresholds and protocols for managing and disposing of solid waste. Solid wastes that exhibit the characteristic of hazardous waste, or are listed by regulation as hazardous waste, are subject to strict accumulation, treatment, storage, and disposal controls.

The action alternatives include mitigation to address incidental spill of hazardous materials and to provide long-term monitoring of water quality for potential contaminants from recreational activities such as motorized boating.

Executive Order 11988 (Floodplain Management) requires federal agencies to avoid, where practicable alternatives exist, the short- and long-term adverse impacts associated with floodplain development. Federal agencies are required to reduce the risk of flood loss; minimize the impacts of floods on human safety, health, and welfare; and restore and preserve the natural and beneficial values served by floodplains in carrying out agency responsibility.

The project area is located outside any designated 100-year floodplain.

Executive Order 11990 (Wetlands) requires federal agencies, in carrying out their land management responsibilities, to take action that would minimize the destruction, loss, or degradation of wetlands and take action to preserve and enhance the natural and beneficial values of wetlands.

No wetlands are known to occur in the project area at this time. Delineation, avoidance, and/or mitigation of impacts to wetlands would be required for any development activities that affect wetland areas that may form in the future.

Executive Order 12898 (Environmental Justice) requires federal agencies to identify and address, as appropriate, disproportionately high and adverse human health and environmental effects of their programs, policies, and activities on minority and low-income populations.

Because the project would not introduce disproportionately high and adverse human health and environmental effects on minority and low-income populations, there would be no adverse effect as defined by this EO.

Executive Order 13514 directs federal agencies to promote pollution prevention and reduce emissions of GHGs from actions under their control. In accordance with EO 13514, the CEQ defines GHGs as carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride.

The action alternatives would contribute to emissions of GHGs from construction activities, maintenance and operation of the recreational area, and visitor travel and use of the recreational area. The amount of GHGs generated by these sources would be substantially less than 25,000 metric tons of CO<sub>2</sub>-equivalent annual threshold proposed by the CEQ as relevant to the decision-making process.

Secretarial Order 3175 (incorporated into DM at 512 DM 2) requires that if any Department of the Interior actions impact ITAs, the agency must explicitly address those impacts in planning and decision-making, and the agency must consult with the tribal government whose trust resources are potentially affected by the federal action.

Lake Nighthorse is a component of the ALP Project, which is being built to fulfill the water rights settlement of the Ute Mountain and Southern Ute Indian tribes of southwestern Colorado. The ALP Project was authorized by the Colorado River Basin Project Act of 1968 and was designed to provide irrigation, municipal, and industrial water supplies to the Colorado Ute tribes and other project beneficiaries. A Colorado Ute Indian Water rights Final Settlement Agreement, signed in 1986, quantified the Colorado Ute tribes' rights to obtain water from several rivers and projects, including the ALP Project. Congress incorporated the ALP Project into the Colorado Ute Indian Water rights Settlement Act of 1988 (P.L. 100-585) (Settlement Act) to settle Colorado Ute tribal water rights claims. The ALP Project has been the subject of public interest and environmental review since it was initially authorized. The FSEIS for the project was completed in 2000 and included extensive coordination with the affected tribes. Though the implementation of the ALP Project has a beneficial effect, implementation of the action alternatives does not affect these Indian Trust Assets.

In 1873 the United States negotiated the Brunot Agreement, by which the confederated bands of the Colorado Ute tribes ceded 3.7 million acres in the San Juan Mountain region of the 1868 Ute reservation. In return, the Colorado Ute tribes reserved the right to "hunt upon said land so long as the game lasts and the Indians are at peace with the white people." This reserved right has been interpreted to include not only hunting but also fishing, trapping, and gathering activities by which tribal members supported themselves in the region for centuries prior to the agreement. The 1873 agreement (ratified by Congress in 1874) is commonly known as the "Brunot Treaty" or "Brunot Agreement," and the ceded land is often referred to as the "Brunot Area."

Though within the geographic extent of lands covered by the Brunot Treaty, the project area is currently closed to public access and, therefore, also closed to hunting and fishing by tribal members. Reclamation acknowledges the Tribes' Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because

it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.

The Farmland Protection Policy Act and 7 CFR 658 are intended to minimize the extent to which federal programs contribute to the unnecessary and irreversible conversion of farmland to nonagricultural purposes. Prime farmland is land that has the best combination of physical and chemical characteristics for producing food, feed, forage, and oilseed crops and is available for these uses. In general, prime farmland has acceptable soil conditions with few rocks, a favorable temperature and growing season, and an adequate and dependable water supply from precipitation or irrigation. Unique farmland is land other than prime farmland that is used for production of specific high-value foods and fiber crops.

No prime or unique farmlands occur in the project area; therefore, no compliance with the Farmland Protection Policy Act is required.

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## 10.0 Appendices

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**Appendix A – Comment Resolution Table for Animas-La Plata Project  
Stakeholder Group Review of Preliminary Draft Environmental  
Assessment**

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
<b>SUBSTANTIVE COMMENTS</b>				
1	Ute Mountain Ute Tribe (UMUT) (1-21-2015) <sup>9</sup>	Tribe favors the No Action alternative due to impacts of proposed action on cultural resources but objects to failure to include Brunot hunting rights under the No Action alternative.	Page 8, Section 2.1	<p>Reclamation acknowledges the Tribes’ Brunot Treaty rights; however, the reservoir area will remain closed to all activities under the No Action Alternative.</p> <p>The Bureau of Reclamation recognizes there are significant cultural resources present in the project area that will require protection regardless of future development plans. Reclamation, in consultation with the Animas La Plata Programmatic Agreement consulting parties, is developing a Cultural Resource Management Plan (CRMP) for Ridges Basin. The Ridges Basin CRMP will provide protocols for the monitoring and preservation of existing cultural resource sites, as well as a process for analyzing and implementing any future development. Reclamation acknowledges that it is the preference of UMUT that the No Action Alternative be selected as the preferred alternative due to the minimal impacts to sensitive cultural resources. However, regardless of the chosen alternative, Reclamation will consult with the UMUT and other interested parties under the approved CRMP and the National Historic Preservation Act prior to implementing the alternative.</p>
2	UMUT (1-21-2015) <sup>9</sup>	Tribe next favors Alternative 2 due to next greatest protection of cultural resources but objects to failure to include Brunot hunting rights under this alternative.	Page 12, Section 2.3	Reclamation acknowledges the Tribes’ Brunot Treaty rights. However, the regulation of hunting (tribal and non-tribal) on any or all parts of the project lands is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential extent of hunting activities, applicable regulations, and consistency with the tribes’ Brunot Treaty rights.
3	UMUT (1-21-2015) <sup>9</sup>	Tribe feels that Brunot hunting rights should be allowed until further consultation and formulation, not before.	Page 21, Section 2.6.5	See response to Comments No. 1 and 2.

<sup>9</sup> Presumably, the correct date of this letter should be January 21, 2016

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/Paragraph	Action/Response
4	Ute Mountain Ute Tribe (1-21-2015) <sup>9</sup>	Tribe states that their response to the EA does not constitute consultation and that BOR should continue to consult with the Tribe on all issues related to Lake Nighthorse.	N/A (general)	We agree with your comment.
5	UMUT (1-21-2015) <sup>9</sup>	Tribe states that "...there should never be any recreation on Lake Nighthorse and the area should be protected and valued as an important part of the history of these lands and the peoples who have occupied these lands since human occupation first began.".	N/A (general)	Thank you for your comment.
6	UMUT (1-21-2015) <sup>9</sup>	Tribe states that no agreement exists with regard to implementation of Brunot rights between the Tribe and the U.S. for lands within federal jurisdiction. Tribe therefore feels that regulations with regard to hunting on federal lands should be developed in consultation and in mutual agreement, not through imposition of regulations contained in an EA.	Page 21, Section 2.6.5 and page 48, Section 3.6.1	See response to Comment No. 2.
7	UMUT (1-21-2015) <sup>9</sup>	BOR must ensure Tribal Members are able to access the federal lands for hunting so long as the hunting does not violate federal law, regardless of the annexation footprint. In other words, the guiding principal for determining whether Tribal Members are permitted to exercise their treaty hunting rights within the Project Area should only be a matter of federal law and restrictions based on the annexation footprint and other consideration should only be relevant if they are relevant under federal law.	Page 8, Section 2.0 and page 48, Section 3.6.1	See response to Comment No. 2.
8	UMUT (1-21-2015) <sup>9</sup>	Tribe disfavors any action which would jeopardize water and air quality.	N/A (general)	We agree with your comment.
9	UMUT (1-21-2015) <sup>9</sup>	The Indian Trust Assets, or Brunot Treaty Hunting rights specifically, should be listed as a resource to be protected in the first sentence in the purpose and need statement.	Page 3, Section 1.3	The document has been modified to address your comment.



## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
10	UMUT (1-21-2015) <sup>9</sup>	With regard to Action Alternative 1 (2011 Recreation Plan), the Tribe objects to the conclusion that hunting cannot occur within the annexed area (presumably unless further agreement can be reached). Such prohibition should only occur if hunting under such circumstances would be a violation of federal law. Either this provision must delineate the federal laws that would presumably be violated by having hunting within the annexed area, or the prohibition should be removed.	Page 8, Section 2.2	Under the Action Alternative 1 (2011 Recreation Plan), annexation is not discussed nor is a specific recreation manager identified.  Regarding hunting, see response to Comments No. 1 and 2.
11	UMUT (1-21-2015) <sup>9</sup>	The Tribe should be included in future discussions about trail expansion.	Page 19, Table 1	The table has been modified to address your comment.
12	UMUT (1-21-2015) <sup>9</sup>	The Tribe objects to any restriction on hunting rights that are not contained in federal law. This provision should state that hunting will be allowed unless further consultation or federal law restricts hunting rights.	Page 21, Section 2.6.5	See response to Comments No. 1 and 2.
13	UMUT (1-21-2015) <sup>9</sup>	Tribe questions basis for setting the four delineated restrictions on the legal exercise of Brunot hunting rights. If there is no federal law establishing these restrictions, then they must be eliminated.	Page 48, Section 36.1	The document has been modified and the 4 delineated restrictions removed.

**Appendix A – Comments and Responses on Draft EA**

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
14	Southern Ute Indian Tribe (SUIT) (1-21-16)	The PDEA does not adequately describe the Tribe's Brunot rights, the risk of additional trespass to tribal lands from recreation development, or Reclamation's need to protect the primary project purposes. The PDEA also fails to convey the significance of the cultural resources in the area and the sensitivity of those resources to inappropriate disturbances.	N/A (general)	<p>See responses to Comments No. 1 and 2 regarding Brunot Treaty rights.</p> <p>Regarding the risk of additional trespass to tribal lands, the Table 3 of the document has been modified. Any additional trespass that occurs will be dealt with by the proper law enforcement agencies and the document has been modified accordingly.</p> <p>Regarding project purposes, compatibility with the primary purpose of the ALP Project (municipal and industrial water supply) is identified as part of the purpose and need statement in section 1.3 of the document. The alternative selected will be consistent with the purpose and need. The purpose and need includes a statement that it will “ensure compatibility with the primary purpose of the ALP Project for municipal and industrial water supply.” Recreation is incidental and subordinate to the primary purpose of the project.</p> <p>We agree that the cultural resources present are significant and need protection. Implementation of the Cultural Resources Management Plan (CRMP) and subsequent National Historic Preservation Act consultation will address cultural resource protection through pre-construction surveys, avoidance, mitigation, and long-term monitoring. Potential recreational impacts will be addressed through interpretive/educational signage, regular archaeological monitoring, and oversight by Reclamation staff, Tribal partners, the recreation manager and law enforcement agencies.</p>

**Appendix A – Comments and Responses on Draft EA**

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
15	SUIT (1-21-16)	<p>The description of the Tribe's rights to hunt, fish and gather under federal law, commonly referred to as Brunot rights, is deeply flawed. The PDEA erroneously describes the ALP Project lands as closed to the exercise of Brunot rights as though such rights do not apply to the Project lands. However, the Project lands are subject to such rights and it is only through the Tribe's exercise of its sovereign powers to self-regulate that tribal members are not currently exercising such rights on Project lands. The Tribe is willing to work with the other affected entities to find common ground on the most appropriate ways in which the Tribe and its members exercise the Tribe's Brunot rights in a mutually agreeable fashion. It is important to understand that any closure of the lands to tribal hunting, fishing and gathering will be as a result of the Tribe's decision, not that such lands are not subject to such rights. As I am sure you understand, the distinction between the scope of the rights and the manner in which the Tribe chooses to exercise those rights is extremely important to the Tribe. The PDEA fails to grasp that distinction.</p>	N/A (general)	See response to Comments No. 1 and 2.
16	SUIT (1-21-16)	<p>The PDEA is also lacking in its recognition of the potential increased risk of trespass to the Tribe's land from recreation development at ALP Project. The Project lands are directly adjacent to the Tribe's Reservation. The more intense the level of recreation development, the more likely it will be that visitors will trespass on the nearby tribal lands. This issue needs to be further developed in the PDEA and it needs to be clearly stated that recreation activities may be curtailed in the event such activities result in trespass to tribal lands.</p>	N/A (general)	See response to Comment No. 14.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
17	SUIT (1-21-16)	The PDEA also fails to adequately develop the extent to which recreation development may interfere with the primary Project purposes of settling the Tribe's and the Ute Mountain Ute Tribe's (collectively "Ute Tribes") water rights on the Animas and La Plata Rivers and to provide a municipal and industrial water supply to other entities in Colorado and New Mexico. While the PDEA indirectly addresses many of the issues that might adversely affect the ability of the Project to meet its primary purposes, there should be a direct recognition of the need to meet those purposes and an explicit retention of the ability to limit any activity that interferes with such purposes.		See response to Comment No. 14.
18	SUIT (1-21-16)	Finally, the Tribe cannot emphasize too strongly the significance of the cultural resources on the Project lands and the need to fully protect those resources from disturbance. Indeed, given the sensitivity of those resources, many members of the Ute Tribes believe that recreation activities on Project lands is not appropriate. Again, Reclamation needs to be sure that it retains authority to halt any activity that threatens the ability to protect and respect these resources.		We agree that the cultural resources present are significant and need protection. Implementation of the Cultural Resources Management Plan (CRMP) and subsequent National Historic Preservation Act consultation will address cultural resource protection through pre-construction surveys, avoidance, mitigation, and long-term monitoring. Potential recreational impacts will be addressed through interpretive/educational signage, regular archaeological monitoring, and oversight by Reclamation staff, Tribal partners, the recreation manager and law enforcement agencies.
19	SUIT (1-21-16)	Tribe does not believe that hunting has, or can be eliminated from the alternatives. Tribe's Brunot rights extend to the project lands although the Tribe has agreed to work with the other affected parties to determine the appropriate means for the exercise of those rights on the lands at issue.	Page 2, Section 2.6.5	See response to Comments No. 1 and 2.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
20	SUIT (1-21-16)	The use of the term "initially" in this table may be read to suggest that additional activities are contemplated and may be acceptable to the Tribe and other project participants. There is no agreement on any future activities or any reason to believe at this time that any such activities would be compatible with the primary project purposes or the protection of cultural and natural resources important to the Tribe.	Page 22, Table 2	The term “initially”, in Table 2, has been removed.  When additional activities or future facilities are planned, these will be coordinated with the Tribes and other stakeholders pursuant to the planning and development Memorandum of Understanding. Development of future facilities would be subject to additional public review and review under the National Environmental Policy Act (NEPA), the National Historic Preservation Act (NHPA), and other applicable Federal laws and regulations.
21	SUIT (1-21-16)	The issues associated with the cultural resources on the project lands are difficult and do not lend themselves to drawing bright lines between direct and indirect effects. There is no question that recreation is not compatible with the significance and nature of certain of the cultural resources found on the ALP Project lands. The need to respect those resources is very important.	Page 26, Table 3	Reclamation will attempt to address any direct and indirect effects to significant cultural resources through implementation of the Cultural Resource Management Plan (CRMP) and consultation under Section 106 of the National Historic Preservation Act (NHPA). Reclamation also recognizes that there are other potentially applicable statutes such as the Native American Graves Protection and Repatriation Act (NAGPRA) and the American Indian Religious Freedom Act (AIRFA), and Reclamation will consider these when consulting on the preferred alternative. Furthermore, Reclamation acknowledges that the concerns being expressed go beyond simple potential adverse effects under the NHPA. Reclamation is committed to treating the cultural resources with respect and dignity in light of the deep cultural affiliation established by the consulting Tribes and Pueblos.
22	SUIT (1-21-16)	The table fundamentally mistakes the nature of Brunot rights which apply to all ALP Project lands whether annexed or not. The table needs to be rewritten to reflect the previous comments about the scope of the Tribe's rights.	Page 27, Table 3.	Table 3 has been modified.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
23	SUIT (1-21-16)	It is not clear that a smaller and less ambitious recreation plan would increase recreational use conflicts. A smaller plan and footprint may simply reduce the number of visitors to the area. After all, there are a multitude of similar water body recreation sites in the vicinity and there is no reason to believe that a smaller plan at ALP Project would attract the same number of visitors as a larger plan.	Page 35 Recreational Use Conflicts	It is agreed a smaller plan would likely reduce total number of visitors -- there is no reason a smaller plan would attract the same number of visitors as a larger plan. However, Reclamation believes that even a reduced recreational footprint would nevertheless result in greater concentration of recreation users. It is not anticipated that a reduction of amenities would necessarily reduce visitors proportionately. And, specifically, a lack of amenities for non-boaters would result in conflicts between boaters and other users (i.e., parking for picnicking and swimming); and, reducing other users disbursement would cause greater concentrations in areas most accessible to parking and waterfront activities.
24	SUIT (1-21-16)	The potential economic benefits from recreation at ALP Project to the community appear to be vastly overstated. As noted above, there are a multitude of similar water body recreation opportunities in the area. While ALP Project is closer to the population center of Durango, it is not clear that recreation will engender new recreation related expenditures instead of simply redirecting activities from existing sites with no or limited increase in overall expenditures in the Durango area.	Page 40	The economic impact study and the recreation market assessment prepared consider the market share captured by this project in light of the overall regional market demand.
25	SUIT (1-21-16)	The Tribe continues to believe that the most sensitive issue associated with recreation at ALP Project remains the protection of the cultural resources While the PDEA adequately describes the technical issues associated with the protection of these resources, it does not adequately emphasize the significance of the need to protect and respect these resources.	Page 47, Table 10	See response to Comment No. 18.
26	SUIT (1-21-16)	Once again, the PDEA misstates the nature of the Tribe's Brunot rights	P. 49, Section 3.6.1.	Section 3.6.1 has been modified. Also, see response to Comments No. 1 and 2.
27	SUIT (1-21-16)	Once again, the PDEA misstates the Tribe's Brunot rights and the fact that the existence of certain closures is only because the Tribe has chosen to close the areas, not because the rights don't exist.	P. 50, Section 3.6.2.	Section 3.6.2 has been modified. Also, see response to Comments No. 1 and 2.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
28	SUIT (1-21-16)	We are concerned with the lack of capacity to handle hazardous spills. We assume that proceeding with recreation development will require the City to provide assurances that it now has the proper equipment and training.	P. 71, Section 3.13.2.	Table 12 on page 84 includes the following mitigation measure that addresses this concern: <i>“The recreation manager shall provide training to its staff and shall provide and store, on-site, a boat, other equipment, and materials to conduct rescue operations and to address hazardous materials spills (either by staff or emergency services personnel). The boat shall be stored on-site when the lake is open for public use”.</i>
29	Animas-La Plata Operation Maintenance and Replacement Association (ALPOMRA) (1-22-16)	All boat fueling should occur outside the entrance station.	Page 18, Table 1 Page 81, Table 12	This mitigation measure has been revised to state: <i>“No fueling shall be allowed on the lake, and all fueling shall occur in designated areas only.”</i>
30	ALPOMRA (1-22-16)	Whenever there is coordination or notice required with other parties, the Association should be included as one of those parties.	Pages 78-84, Table 12	The ALPOMRA has been added whenever notice or coordination is required with other parties.
31	City of Durango (1-20-16)	City requests insertion of the following paragraph describing the evolution of the 2014 conceptual recreation plan: <i>“Following the release of the Lake Nighthorse Recreation Master Plan prepared by the Animas-La Plata Water Conservancy District – Final Draft May 2011, discussions ensued with the member entities of the Animas-La Plata Operation, Maintenance and Replacement Association and the Bureau of Reclamation. Consensus was reached to establish the framework for proceeding with recreation at Lake Nighthorse to minimize impacts on the primary purposes of the project. These discussions led to the creation of the Lake Nighthorse Conceptual Recreation Plan – October 2014 Draft prepared by the City of Durango and the Bureau of Reclamation.”</i>	Page 7, Section 1.6	Section 1.6 has been modified and the language added.

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No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
32	City of Durango (1-20-16)	City requests revision to the environmental commitments as follows: “ <i>Motorized personal watercraft (e.g., jet skis) with open-air exhaust and two-stroke engines; houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats shall not be allowed on the lake</i> ”.	Page 18, Table 1	Table 1 has been modified and the required measure has been added.
33	City of Durango (1-20-16)	City requests the following environmental commitment be added to Table 1: “ <i>Dogs shall be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off leash dogs would be permitted.</i> ”	Pages 18-19, Table 1	Table 1 lists measures identified as mitigation in the FSEIS or developed to address specific issues identified from public outreach and agency coordination during the 2011 recreation master planning process. Therefore, the requested new measure has been added to Section 3.2.2 and Table 12 (Chapter 5) of the document.
34	City of Durango (1-20-16)	City requests the following environmental commitment be added to Table 1: “ <i>Motorized watercraft shall adhere to current State of Colorado Parks and Wildlife standards to carry required safety equipment on the vessel.</i> ”		Table 1 lists measures identified as mitigation in the FSEIS or developed to address specific issues identified from public outreach and agency coordination during the 2011 recreation master planning process. Therefore, the requested new measure has been added to Section 3.13.2 and Table 12 (Chapter 5) of the document.
35	City of Durango (1-20-16)	City requests that the mitigation measure on nesting raptors be revised to state: “ <i>If new raptor nests or nest locations are discovered, the recreation manager, in coordination with Reclamation, shall consult with the CPW and the USFWS to determine whether designation of buffers and closure to public access during the nesting season are warranted to minimize closures of future recreational improvement areas.</i> ”	Page 60, Section 3.8.2	The requested revision has been made to Section 3.8.2 of the text and in Table 12 (Chapter 5).
36	City of Durango (1-20-16)	City requests to add a bullet to mitigation measures to clarify the opportunity to use the Reclamation wetland bank associated with the construction of the Animas-La Plata Project for future improvements in areas where wetlands emerge over time.	Page 63, Section 3.10.2	Reclamation does not have a wetland bank associated with the ALP Project.



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No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
37	City of Durango (1-20-16)	Add an additional bullet to clarify current and future planned water quality testing to be routinely performed by Reclamation.	Page 72, Section 3.13.2	This requested revision was not made. Section 3.10.3 and Table 12 (Chapter 5) already includes the following measure: “ <i>Water quality monitoring shall be undertaken on at least an annual basis by Reclamation in coordination with the recreation manager and the ALPOMRA. The results of water quality monitoring shall be reviewed on an annual basis to determine whether additional control measures need to be developed and implemented (e.g., limiting the number of boats on the reservoir at one time, regulating carbureted and electronic injection two-stroke engines).</i> ”
38	City of Durango (1-20-16)	Insert comments in the table previously noted. The language pertaining to jet skis includes: “ <i>Motorized personal watercraft (e.g., jet skis) with open-air-exhaust and two-stroke engines; houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats shall not be allowed on the lake</i> ”. The language pertaining to dogs on leash includes: “ <i>Dogs shall be required to be kept on a 6-foot-maximum leash, unless a designated dog play/swim area is established where off leash dogs would be permitted.</i> ”	Pages 78-84, Section 5.0, Table 12	The document and Table has been modified and the requested language included.
39	Colorado Parks and Wildlife (CPW) (1-19-15) <sup>10</sup>	Portions of Action Alternative 1 (2011 Recreation Plan) do not conform to the FEIS; and thus, the anticipated recreational and facility development impacts cannot be tiered to that NEPA document. Please refer to previous comments for more discussion regarding Action Alternative 1 (Attachment 1).	N/A (general)	Thank you for your comment. The purpose of tiered NEPA documents is to analyze changes to the previous document(s).

<sup>10</sup> Presumably the correct date for this letter should be January 19, 2016.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
40	CPW (1-19-15) <sup>10</sup>	The Mitigation Area (MA) acquired by Reclamation to offset loss of wildlife habitat from the Animas-La Plata (ALP Project) project has never been opened for public hunting. Portion of the Bodo State Wildlife Area (SWA) have been closed to the public and sportsmen for over 15 years. If the MA cannot be opened for public hunting, Reclamation should seek other opportunities to restore to sportsmen this unique public land hunting opportunity in GMU 741.	N/A (general)	Thank you for your comment. Reclamation is continuing to work toward providing access to the Mitigation Area.
41	CPW (1-19-15) <sup>2</sup>	The Recreation Plan for Lake Nighthorse needs to include recreational hunting opportunities. Depending on the alternative selected, Lake Nighthorse could support waterfowl hunting and the surrounding Reclamation lands could support small game and some limited big game opportunity. Hunting can occur at Lake Nighthorse and the surrounding Reclamation lands in a manner that is safe, benefits the community, helps achieve the project's purpose, and is compatible with other recreational opportunities.	N/A (general)	The regulation of hunting (tribal and non-tribal) is being deferred because it requires further discussion and coordination between Reclamation, the recreation manager, the Tribes, CPW, and other stakeholders to determine the potential scope and extent of hunting activities, applicable regulations, and consistency with the tribes' Brunot Treaty rights.
42	CPW (1-19-15) <sup>10</sup>	CPW would like to see, at a minimum, waterfowl hunting added into all of the action alternatives prior to the EA going out for public review and comment. CPW, USFWS, SUI, UMUT, and the public have made numerous requests to Reclamation to allow hunting at Lake Nighthorse. Reclamation recognized and advocated for hunting in its response (1997) to the USFWS recommendation under the Fish and Wildlife Coordination Act. The public has a desire to hunt in this area; it was committed to in the FEIS and should be a central focus of any recreation plan for Lake Nighthorse.	N/A (general)	See response to Comment No. 41.

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No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/Paragraph	Action/Response
43	CPW (1-19-15) <sup>10</sup>	CPW recognizes that SUIIT and UMUT wish to exercise their hunting and fishing rights under Brunot at Lake Nighthorse and on the surrounding BOR lands. CPW supports hunting and fishing activities in these areas and feels that it's Reclamation's responsibility that these activities continue and are promoted to the benefit of tribal members and the public.	N/A (general)	See response to Comments No. 1 and No. 2.
44	CPW (1-19-15) <sup>10</sup>	CPW supports seasonal closures on west and south sides and golden eagle nesting areas. However, CPW questions the rationale for closing the lake to recreationists from November 16 to May 15 and encourages Reclamation to modify the EA to allow lake use during this time.	Pages 15-20, Section 2.5	Recommendations made by the U.S. Fish and Wildlife Service in the Fish and Wildlife Coordination Act Report for the ALP Project, prepared in 2000, include the closure of all recreational facilities from November 15 to May 1. Consequently, under the Preferred Alternative, the surrounding lands and lake are closed from November to May. Any change will need to incur further discussion.
45	CPW (1-19-15) <sup>10</sup>	Some trail development in the action alternatives exceeds impacts disclosed in the FEIS. If trail are developed north of CR210, CPW requests that Reclamation fence its boundary with Bodo SWA. Land north of CR 210 should have extended seasonal closures to protect wintering deer and elk. If trails are constructed and open seasonally, CPW recommends mitigation measures such as setbacks, use of natural barriers (vegetation, topography), wildlife friendly fencing to preserve Bodo SWA habitat values.	N/A (general)	The Preferred Alternative does not include any recreation development north of County Road 210.
46	San Juan Water Commission and La Plata Conservancy District (SJWC-LPCD) (1-21-16)	Request to insert following text: <i>"The Animas-La Plata Project was built to provide municipal and industrial water supplies to project beneficiaries, protecting water quality interests is an essential part of a recreation plan at Lake Nighthorse."</i>	Page 3, Section 1.5	Document not modified because the suggested text is already included in Section 1.3 of the document (Purpose and Need for Action).
47	SJWC-LPCD (1-21-16)	Commenter asks if in environmental commitments there is a boat length limit and requests that "off-road" vehicles be defined, for example ATV, UTV, motorized bikes, etc.	Page 18, Table 1	No limit on boat length is identified. The term "off-road vehicles" will not be defined, in order to capture any type of vehicle that may be used off-road.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
48	SJWC-LPCD (1-21-16)	Commenter states that environmental commitments should specify that fueling should be required to occur outside entrance station.	Page 18, Table 1	This mitigation measure has been revised to state: <i>“No fueling shall be allowed on the lake, and all fueling shall occur in designated areas only.”</i>
49	SJWC-LPCD (1-21-16)	Commenter states that environmental commitments should be revised to state that <i>“All roadways open to public and other use shall be graveled initially and paved or <u>chipped sealed</u> as need arises and funding allows.”</i>	Page 19, Table 1	This measure has been revised to state: <i>“All roadways open to public and other use shall be graveled initially and improved as need arises and funding allows.”</i>
50	SJWC-LPCD (1-21-16)	ALPOMRA should be included as a party under “Trail Development”.	Page 78, Table 12	Table 12 has been modified in include ALPOMRA under “Trail Development”.
51	SJWC-LPCD (1-21-16)	“Off-road vehicles” definition should be updated in noise and natural resource sections.	Page 79, Table 12	See response to Comment No. 47.
52	SJWC-LPCD (1-21-16)	ALPOMRA should be included or notified if lake may open earlier in the spring.	Page 79, Table 12	Document has been modified to include ALPOMRA in the notification process.
53	SJWC-LPCD (1-21-16)	ALPOMRA should be included as a party or notified under the majority of the bullet points on natural resources.	Page 80, Table 12	Document has been modified: ALPOMRA was added to the applicable bullet points.
54	SJWC-LPCD (1-21-16)	ALPOMRA should be included as a party or notified under the majority of the bullet point on visual quality /aesthetics.	Page 81, Table 12	Document has been modified: ALPOMRA was added to the applicable bullet points.
55	SJWC-LPCD (1-21-16)	Fueling should be required to occur <u>outside</u> entrance station under water quality.	Page 81, Table 12	Document has been modified and the mitigation measure revised to state: <i>“No fueling shall be allowed on the lake, and all fueling shall occur in designated areas only.”</i>
56	SJWC-LPCD (1-21-16)	ALPOMRA should be included as a party or notified under the traffic monitoring plan.	Page 83, Table 12	Table 12 has been modified in include notifying ALPOMRA under the traffic monitoring plan.
57	Tom Brossia Animas-La Plata Water Conservancy District	Commenter requests that waterfowl hunting be added in the current EA.	N/A (general)	See response to Comment No. 41.
<b>MINOR COMMENTS</b>				
58	City of Durango (1-20-16)	Correct spelling of “Haviland Lake”	Page 31, Section 3.2	Document has been modified to reflect correct spelling.
59	City of Durango (1-20-16)	Replace “Durango Mountain Resort” with “Purgatory Ski Resort”	Pages 36 and 37, Section 3.3.1	Document has been modified to reflect the correct name throughout the document.

## Appendix A – Comments and Responses on Draft EA

No.	Reviewer/Date	Comment/Proposed Revision	Page/Section/ Paragraph	Action/Response
60	City of Durango (1-20-16)	Correct typo, bullet should state: <i>“The 2009 – 2013 ACS was used...”</i>	Page 43, Section 3.4.1	The bullet has been corrected.
61	City of Durango (1-20-16)	Remove extra period.	Page 46, first paragraph under “No Action Alternative”	The extra period was removed.
62	City of Durango (1-20-16)	Correct typo to read “(Russell Planning and Engineering 2011).”	Page 67, Section 3.12.1	The spelling has been corrected.
63	City of Durango (1-20-16)	Replace “Durango Fire and Rescue Authority” with “Durango Fire Protection District”	Pages 69, 70, 71, 77	Document has been modified to reflect the correct name throughout the document.
64	City of Durango (1-20-16)	Statement regarding water related incidents is confusing as it appears that these activities are water transport-related rather than nonwater transport-related recreational activities. The suggested revision is: <i>“In Colorado, 91 percent of drowning deaths and 98 percent of near-drowning hospitalizations result from water transport-related recreational activities such as water-skiing, diving, swimming or playing in or near open water bodies.”</i>	Page 69, Section 3.13.1	The suggested revision is not correct. The statement refers to water-related recreational activities not associated with water transport. Statement clarified as follows: <i>“In Colorado, 91 percent of drowning deaths and 98 percent of near-drowning hospitalizations result from recreational activities not related to water transport, such as water-skiing, diving, swimming or playing in or near open water bodies.”</i>
65	City of Durango (1-20-16)	On page 79, at the bottom of the page, there is an extra period on the last bullet sentence which should be removed “Wildlife-resistant trash receptacles shall be used.”	Page 79, Section 5.0, Table 12	The extra period has been removed.
66	U.S. Fish and Wildlife Service (1-26-16, verbal comments to Kathleen Ozga, BOR)	No USFWS related issues as long as the FSEIS environmental commitments are maintained. USFWS supports keeping recreation development to a minimum and would thus support Action Alternative 2 as the preferred alternative.	N/A (general)	We acknowledge your comment.

## Appendix B. Comments and Responses

# **Lake Nighthorse Recreation Plan Final Environmental Assessment**

## **Appendix B. Comments and Responses**

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# Appendix B. Comments and Responses

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## 1. Comment-Response Process

This appendix describes the public comment and response process to finalize the EA (FEA). Section 1.1 defines terms useful in understanding this document and the changes made to the DEA. Section 1.2 describes how the comments were acquired, categorized, addressed, and documented. Section 1.3 provides guidance on the use of this document. Section 2 presents summary comments and responses to comment categories raised by multiple commenters. Section 3 presents individual responses. Section 4 is the scanned and marked comment documents.

### 1.1. Definitions

Several terms are helpful in assisting commenters find their comments and understanding the responses.

#### ***Comment***

A distinct statement or question about a particular topic, such as:

- Purpose and need for action
- Merits of alternatives
- Any aspect of potential environmental impacts arising from the alternatives
- Reclamation's use of facts, methods, or analyses in the EA
- Reclamation's implementation of the NEPA process
- Matters outside the scope of the EA

#### ***Commenter or Public***

This term includes any and all potentially interested or affected parties, whether private citizens, state, local or tribal governments, environmental groups, water users or irrigation districts, civic and community organizations, businesses, etc.

#### ***Comment Category***

The resource topic or issue to which a comment is addressed. This may include the NEPA process including alternatives, the affected environment section of the EA, or a specific resource category such as water quality.

#### ***Comment Document***

A printed version of comments submitted by a commenter. This may be a letter, email, or transcript of oral comments at a public hearing. A comment document may contain any number of comments.

#### ***Duplicate Comment Document***

A comment document that is the same in wording or so similar as to be virtually identical to another comment document. Examples are an email that was repeated

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verbatim or a petition through which more than one individual indicates agreement with the same comment.

### ***Substantive Comment***

A comment relevant to the scope of the EA, environmental analysis, or NEPA process that merits a response. Comments that offer support or opposition to an alternative are not substantive comments. Substantive comments are those that:

- Question, with reasonable basis, the accuracy or adequacy of the information in the EA;
- Present reasonable alternatives other than those in the EA;
- Merit changes or revisions to one or more of the alternatives.

A non-substantive comment is one that is a “vote” for an alternative or that merely expresses support or opposition to the alternatives.

### ***Summary Comment, Summary Response***

A summary capturing the essence of similar comments on a given comment category and the summary response to those comments.

## **1.2. The Analytical Process**

Reclamation released the DEA on March 25, 2016. The DEA was made available online or was sent out by the Western Colorado Area Office. The original deadline for receipt of comments was April 25, 2016. Based on several comments requesting and extension of the comment period, Reclamation extended the comment period to May 25, 2016, providing a two month public comment period.

### **1.2.1 Responding to Comments**

Each comment document was read by the interdisciplinary team to understand the overall intent and perspective of the commenter. Again, all forms of comment documents were included in this process, including emails, letters, video submittals, and attachments to comment documents. Within each comment document, all substantive comments were numbered and assigned a comment category.

In compliance with 40 CFR 1503.4, possible responses to substantive comments include:

- Modifying alternatives;
- Developing and evaluating new alternatives not previously given serious consideration in the EA;
- Supplementing, improving, or modifying the analyses;
- Making factual corrections to the EA;
- Explaining why the comment does not warrant further agency response or indicating those circumstances that trigger agency reappraisal or further response

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### 1.3 How to Use this Document and Find Your Comment

Table B-1 correlates names of commenters (individuals or organizations) with the assigned comment document number. Commenters should locate their comment document number in Table B-1, and then locate the scanned copy of their comment document to identify individual comments. Comment documents are arranged numerically based on date of receipt.

Within each comment document, comments are numbered consecutively. Individual responses are in Section 3. Where multiple comments were received on the same comment category, the reader may be referred to the summary comment and response section (Section 2). This helps create a more concise response section and helps guide the reader to the sections of the FEA where the information may have changed based on responses to the comments. Summary comments and responses are presented in Section 2 alphabetically by topic.

## 2. Summary Comments and Responses

Reclamation received 285 comment documents containing 449 individual comments since the DEA was published. Twenty duplicate comment documents were received and one comment document was a petition signed by 450 persons. This section presents comment categories and responses where multiple comments were made about the same topic. The comment numbers are listed here and on the scanned copies of the comment documents (Section 4). For example, comment number 101.01 is the first comment within comment document 101. The organization is alphabetically by comment category in the FEA.

### **Category: Aquatic Nuisance Species**

Comment Numbers: 351-2, 359-2

**Summary comment:** Commenters are concerned about the control of invasive mussels and how boat inspections will be conducted, paid-for, and staffed.

**Response:** Section 3.11 Water Quality has been amended in response to these comments.

### **Category: Alternatives, Action Alternative 1 – 2011 Recreation Plan**

Comment Numbers: 103-1, 105-1, 116-1, 150-1, 165-1, 172-1, 189-1, 192-1, 194-1, 195-2, 196-1, 219-3, 269-1, 126-1, 169-1, 257-1, 325-1

**Summary comment:** Seventeen comments were received regarding Action Alternative 1 – Recreation Plan. All seventeen expressed support for the alternative, however, 4 of them wanted Alternative 1 amended to include trails. See also comment category on trails.

**Response:** Comments noted, but no change made to FEA because trails are already included in this alternative.

### **Category: Alternatives, No Action Alternative**

Comment Numbers: 101-1, 111-1, 167-1, 170-1, 177-1, 221-1, 243-1, 262-1, 357-1

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**Summary comment:** Nine comments were received regarding the no action alternative. Eight of the nine comments expressed support for the no action alternative. Commenters wanted the area to remain undeveloped and not open to recreation. One of the commenters would support seasonal closures, restrictions on motors, or limiting motorized vessels to alternating days. Comment number 221-1 requires individual response.

**Response:** Individual comment 221-1 resulted in changes to text in Section 2.4 of the FEA. See also Section 3 of this Appendix.

**Category: Alternatives, Proposed Action**

Comment Numbers: 108-1, 217-1, 249-1, 249-2, 254-1, 305-2, 351-1, 102-2, 102-5, 123-1, 173-1

**Summary comment:** Eleven comments were received on the Proposed Action – 2014 Recreation Plan. All eleven supported the proposed action. Four comments were received to open area to recreation as soon as possible

**Response:** No change to text based on summary comment.

**Category: Camping**

Comment Numbers Pro-Camping: 110-2, 154-2, 213-3, 213-5, 213-7, 231-1, 238-2, 239-2, 261-3, 280-2, 284-3, 338-1, 369-3, 370-4

Comment Numbers Against Camping: 158-2, 230-3, 273-4, 282-2, 292-2, 323-3, 349-3, 354-2, 364-2

**Summary comment:** Twenty-two total comments were received related to camping. Fourteen of these favor some form of camping or campgrounds. Nine comments opposed camping or campgrounds. Of the fourteen commenters favoring camping or campgrounds, three commenters favored developed campgrounds with RV facilities. The majority favor tent camping or less-developed facilities.

Nine comments opposed campgrounds but supported day-use.

**Response:** No change to text based on summary comment.

**Category: Climate Change**

Comment Number: 378-5

**Summary comment:** One comment mentioned increased emissions from vehicles and motorized watercraft could affect climate change.

**Response:** As discussed in Section 3.12 Air Quality, the annual emission of CO<sub>2</sub>-equivalent greenhouse gases (GHG) from the Proposed Action would be substantially below the 25,000 metric tons of CO<sub>2</sub>-equivalent GHGs threshold proposed by the Council on Environmental Quality as relevant to the decision-making process. The Proposed Action would be considered to have little to no effect on climate change.

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**Category: Cultural Resources**

Comment Numbers: 138-1, 218-1, 238-5, 262-2, 262-3, 363-2, 372-10, 378-6

**Summary comment:** Eight comments expressed concern about the identification, protection, and consultation on cultural resources located in Ridges Basin. Two comments specifically mentioned the Old Spanish National Historic Trail and Reclamation's mitigation commitments for adverse effects.

**Response:** Reclamation recognizes there are significant cultural resources present in the project area that will require protection regardless of future development plans. Reclamation, in consultation with the Animas La Plata Programmatic Agreement consulting parties, has developed a Cultural Resource Management Plan (CRMP) for Ridges Basin. The Ridges Basin CRMP provides protocols for the monitoring and preservation of existing cultural resource sites, as well as a process for analyzing and implementing any future development. Reclamation, in consultation with the Animas La Plata Programmatic Agreement consulting parties, is also developing a new Programmatic Agreement (PA) and NAGPRA Plan of Action for operations and maintenance activities involving Lake Nighthorse and associated facilities.

Implementation of the CRMP and subsequent National Historic Preservation Act consultation under the PA will address cultural resource protection through pre-construction surveys, avoidance, mitigation, and long-term monitoring. Potential recreational impacts will be addressed through interpretive/educational signage, regular archaeological monitoring, and oversight by Reclamation staff, Tribal partners, the recreation manager and law enforcement agencies.

Pre-construction cultural resource surveys identified Site 5LP4213, also known as the Old Ute Trail/Old Spanish Trail. This site was determined to be an eligible property to the National Register of Historic Places. The creation of the reservoir submerged portions of site 5LP4213 resulting in an adverse effect to a historic property. Through consultation under the ALP-Programmatic Agreement, the adverse effects to site 5LP4213 are mitigated through historical documentation and interpretive signage. The historical documentation is published in the ALP-Cultural Resource Public Volume entitled *SAH-GWAH-GHOWHIDZ The Green Basin*. Educational signage related to site 5LP4213 is present in the ALP Tribute Garden. Consultation on the mitigation of adverse effects to site 5LP4213 was completed prior to ALP construction, which commenced in October 2001. The Old Spanish National Historic Trail was designated a National Historic Trail on December 4, 2002. Site 5LP4213 was not yet part of the National Historic Trails System and Reclamation did not consult with the National Park Service for adverse effects to a designated historic trail.

**Category: Facilities, Including Marina**

Comment Numbers: 102-1, 102-3, 103-4, 191-1, 320-3, 359-4, 359-7, 141-2, 299-2, 359-3, 369-4, 370-5, 379-1, 141-4, 239-3

**Summary comment:** Fourteen comments included specific suggestions to develop various types of infrastructure such as, a breakwater at the existing boat ramp, structures at the entrance station, picnic areas, off-leash dog area, and a disc golf

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course. Six of the twelve comments concerned marinas and capability of overnight boat housing and boat slips. One comment suggested that buildings be constructed with natural materials to blend in with the environment.

**Response:** No change to text based on summary comment. Improvements at the entrance station are currently under construction, and include a boat inspection and decontamination facility. Installation of a breakwater is anticipated as a future project. All future buildings or structures such as designated picnic areas will be constructed to visually blend in the surrounding landscape (as shown in Appendix 3). All future development would be subject to additional environmental review and approval by Reclamation.

Under the proposed action and in coordination with the recreation manager the conceptual plan includes construction and operation of a boat dock. The plan presently includes 18 slips. Overnight use or availability of a dry dock has yet to be determined.

**Category: Hunting and Fishing**

Comment Numbers: 139-1, 178-1, 249-5, 289-3, 363-4, 363-7, 372-2, 372-4, 372-5, 372-7, 372-8

**Summary comment:** Four commenters were specifically in favor of waterfowl hunting, and three others were in favor of opening the area to hunting in general. One commenter was not in favor of granting Brunot Treaty hunting rights to Tribal members, while two commenters were supportive of recognizing these rights.

**Response:** Sections 2.1, 2.2, 2.3, and Appendix A in the DEA are identical in acknowledging the Tribe's Brunot Treaty rights and describing that the regulation of hunting (Tribal and non-Tribal) on any or all parts of the project lands must be deferred pending further discussion, consultation, and coordination among Reclamation, the recreation manager, the Tribes, Colorado Parks and Wildlife (CPW), and other stakeholders. With respect to fishing, Reclamation is stocking 50,000 rainbow trout per year in Lake Nighthorse and the Animas River and is committed to continue to do so into the future, under all alternatives.

**Category: Management Plan**

Comment Numbers: 134-1, 213-1, 213-2, 213-6, 213-10, 213-11, 215-2, 223-2, 251-2, 271-2, 359-5, 359-6, 359-8, 362-1, 362-5, 363-1, 363-3

**Summary comment:** Seventeen comments were received regarding development of an overarching management plan or specific element of planning for recreation in the project area. Comments ranged from the need to develop mission and vision statement to specific management actions such as, vegetation management, interpretive and educational exhibits, managing concessionaires, and providing opportunities for businesses for both rental of water sport equipment to teaching rowing or outreach to local schools. One comment was received regarding the need for management or mitigation of noise and trespass with the Tribes and local property owners, and coordinating for planning regarding land use.

**Response:** Recreation management at Lake Nighthorse will occur pursuant to a long-term lease agreement between the United States and the non-federal

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recreation managing entity. The lease agreement will include comprehensive terms and conditions for the transfer of administration of recreation management and specify how the recreation area will be operated and maintained. For example, the recreation manager will ensure that land use and administration of the recreation area will conform to all applicable Federal laws, regulations, policies and Executive Orders, and the environmental commitments for the Animas La-Plata (ALP) Project. Within the designated recreation area, the recreation manager will ensure compatibility with the primary purpose of the ALP Project for municipal and industrial water use while managing and protecting natural and cultural resources, sacred sites, and other Tribal cultural and traditional values. In addition, the recreation manager will be responsible for public use, law enforcement, weed control and invasive species, concession operations, and work with Reclamation and the Tribes regarding interpretative and educational exhibits.

**Category: NEPA Process, Public Involvement**

Comment Numbers: 136-1, 142-1, 147-1, 155-1, 372-1

**Summary comment:** Four commenters requested more time to review the DEA. Comment number 372-1 from CPW stated that the DEA could not be tiered to the Final Supplemental Environmental Impact Statement (FSEIS) for the Animas La Plata Project because the alternative selected in the FSEIS included public and Tribal hunting.

**Response:** The public comment period on the DEA was extended for a total of two months.

In response to CPW’s comment number 372-1 we offer the following explanation regarding the validity of the tier.

The DEA stated on page 1 that it was tiered off the FSEIS. The concept of a tier (40 CFR 1508.28 and 43 CFR 46.140) is that rather than prepare a single EIS as the basis for approving an entire, large project, an agency conducts two or more rounds of environmental review—or “tiers.” In this case, the DEA updates and examines the specific recreational issues in greater detail than were covered in the FSEIS back in 2000. The tier and incorporation by reference from the FSEIS are valid for more than just the hunting issues raised by CPW. Here is our rationale.

The FSEIS (page 4-22 Section 4.6.37 entitled Affected Environment Hunting Rights) stated that under existing court decisions, the Ute Mountain Ute Tribe would exercise its Federal hunting rights under the Brunot Treaty of 1874 within the limits set by the consent decree (CA 78-C-0220). Under this decree, Tribal members are subject to the same restrictions provided by the State; however, hunting permits are issued by the Ute Mountain Ute Tribe and violations are prosecuted by the Tribe. At the time the FSEIS was published (2000), Ridges Basin was open to hunting subject to State regulation, and was located within the Brunot Agreement area. Fishing rights were not addressed in the consent decree. The FSEIS stated (page 4-22) that the Southern Ute Indian Tribe had reached a



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settlement with State of Colorado (CA 3858), whereby the Tribe agreed to refrain from exercising its Brunot Treaty hunting and fishing rights in the ALP project area, i.e., the area beyond the exterior boundary of the Southern Ute Indian Reservation.

On page 4-30 (Section 4.6.4.3.1) the FSEIS stated that Refined Alternative 4/Selected Alternative would negatively impact the Colorado Ute Tribe's hunting and fishing rights. The FSEIS on page 4-30 stated any project development would negatively impact the Ute Mountain Ute Tribe's hunting and fishing resources, or access to such resources, within the Brunot Agreement area. The FSEIS recognized that there would likely be adverse impacts to the tribes' hunting opportunities should ALP be constructed.

Some 16 years later, the DEA does not recognize such an adverse effect because decisions allowing or restricting hunting have not been made. None of the action alternatives specify where or when hunting would be allowed or disallowed. These decisions will probably be analyzed in yet another tiered environmental review.

**Category: Boat Motors (Yes, No, Restricted Watercraft, Alternating Days, and Zoning)**

Comment Numbers No Motors: 148-1, 158-1, 160-1, 164-1, 168-1, 180-1, 181-1, 182-1, 183-1, 188-1, 195-1, 201-1, 203-1, 204-1, 210-1, 211-1, 216-1, 231-3, 239-1, 240-1, 246-1, 247-1, 252-1, 253-1, 255-1, 256-1, 258-1, 259-1, 263-1, 264-1, 265-1, 267-1, 269-4, 274-1, 275-1, 276-1, 280-1, 282-1, 289-1, 295-1, 296-1, 297-1, 298-1, 303-1, 305-1, 308-1, 309-1, 311-1, 312-1, 313-1, 314-1, 317-1, 318-1, 321-1, 322-1, 324-1, 326-1, 327-1, 328-1, 329-1, 330-1, 331-1, 332-1, 333-1, 334-1, 335-1, 337-1, 340-1, 342-2, 343-1, 344-1, 345-1, 346-1, 347-1, 352-1, 353-1, 354-1, 355-1, 356-1, 356-2, 361-1, 362-9, 364-1, 364-4, 365-1, 368-1, 371-1, 376-1, 378-2, 378-3, 381-1, 381-2, 383-1, 384-1, 385-1

Comment Numbers Restricted Watercraft: 109-1, 110-1, 113-1, 125-1, 141-1, 151-1, 154-1, 171-2, 175-1, 176-1, 176-4, 185-1, 186-1, 187-2, 190-1, 198-1, 199-1, 202-1, 205-1, 207-1, 209-1, 213-8, 214-1, 220-1, 222-1, 223-1, 225-2, 228-2, 229-1, 230-1, 231-4, 234-1, 236-1, 237-1, 238-1, 241-1, 242-1, 245-1, 248-1, 250-1, 251-1, 261-1, 266-1, 268-1, 271-1, 271-4, 272-1, 273-1, 281-1, 284-1, 287-2, 292-1, 293-1, 299-1, 302-1, 302-2, 304-1, 306-1, 315-1, 316-1, 319-1, 320-1, 323-1, 346-2, 349-1, 359-1, 373-1, 375-1, 377-1, 378-1, 385-2

Comment Numbers Yes Motors: 106-1, 107-1, 184-1, 249-4, 254-2, 369-1, 374-1

Comment Numbers Alternating Days: 152-1, 163-1, 187-1, 193-1, 244-1, 307-1, 342-1, 348-1, 364-3, 215-1

Comment Numbers Zoning: 104-1, 206-1, 212-1, 212-2, 213-9, 260-2, 336-2, 362-2, 362-3, 370-1

**Summary comment:** Two hundred fifty five comments were received on motorized versus nonmotorized boating on the lake. One hundred fifty seven comments received support nonmotorized watercraft. While some are adamantly opposed to any motors, many have requested a no wake, or zoning restrictions so that motorized recreationists and nonmotorized anglers, sailors, stand up paddle

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boarders, kayakers, canoers, rowers, and swimmers would be able to enjoy the lake equally. Many of the commenters were concerned about noise and contamination of the drinking water by spills from motor fuel.

Seventy-one commenters support a nonmotorized lake but are willing to compromise by restricting gas-powered engines under ten horsepower or small electric trolling motors at slow speeds that would result in a wakeless and quiet lake and not impact nonmotorized recreational supporters such as kayakers, canoers, stand up paddle boarders, and swimmers.

Seven commenters support motorized boating and generally do not want restrictions on horsepower, length or type of boat, rather they want existing noise level laws enforced.

Twenty commenters recommend alternating days between motorized and nonmotorized watercraft use on the lake or separating the lake into motorized and nonmotorized zones.

**Response:** Reclamation is interested in multiple uses of Lake Nighthorse and recognizes the public's interest in recreational opportunities provided by the lake and the nearby residents' comments about preserving quiet. To allow the maximum number of users, Reclamation and its managing partners will not restrict the lake to exclusively motorized or nonmotorized uses. Currently, all action alternatives involve zoning the lake into motorized and wake-free zones.

**Category: Roads**

Comment Numbers: 141-6, 362-6, 362-7, 362-8

**Summary comment:** A private individual and La Plata County were concerned about the additional traffic on County Road 210 and the associated impacts to the existing chip seal surface. The existing chip seal surface has started to fail and it was suggested that the road be repaved with a more durable asphalt surface capable of handling the anticipated increased traffic associated with recreational use of Lake Nighthorse. La Plata County also requested Reclamation make a more concrete commitment to work with partners to address the potential issue of increased vehicle travel to Lake Nighthorse contributing to a substandard level of service at the U.S. 550-160/Frontage Road intersection by year 2020. La Plata County was also concerned about insufficient information available to determine the level of impacts to County Road 211, if any.

**Response:** With respect to County Road 210, Reclamation relocated the road and granted an easement to La Plata County. With these actions, Reclamation ceded the authority to maintain or improve the road to La Plata County. In the future, Reclamation along with the County would monitor the condition of the road and as needed seek funding for any necessary upgrades, within legal authorities.

Under the proposed action, Lake Nighthorse will be accessed at the entrance station located off of County Road 210 from the East via Bodo Park or from the West via County Road 141 in Wildcat Canyon. It is understood that the number of vehicles using CR 210 will increase after Lake Nighthorse is opened to public use and that

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increase in traffic will indirectly impact the intersection at U.S. 550-160/Frontage Road. Reclamation recognizes the County's concerns related to the future level of service at the U.S. 550-160/Frontage Road intersection. However, under the proposed action, the increase in traffic will be minimal as compared to the other action alternatives and other factors influencing cumulative effects on traffic including seasonal influx of a significant visitor population, convergence of federal and state highways and county roads, topographical constraints, and continued growth. The contribution of the action alternatives to Friday evening peak hour traffic at this intersection would be up to approximately 9 percent, however, this intersection is expected to reach a substandard level of service in 2020 even if no recreation plan is implemented. It is also understood a traffic monitoring plan may be necessary to verify the assumptions of the completed traffic study, update the study as necessary, and identify when corrective actions are required.

The proposed action does not contain plans to develop a west end trailhead and fishing access from the western portion of County Road 211.

**Category: Safety**

Comment Numbers: 138-2, 138-3, 176-3, 271-, 339-2, 362-4, 363-6, 364-5, 364-6

**Summary comment:** Nine comments were received about safety of those using the lake and wildfire.

**Response:** Reclamation shares the concern with public safety. In response, the recreation manager shall provide or coordinate law enforcement and public safety services. It is anticipated that this shall include Tribal, Federal, State, and local resources working together with cooperative jurisdiction.

Reclamation has entered into a MOU among the BIA, Southern Ute, and Ute Mountain Ute Tribes for wildfire suppression. Reclamation also has a license agreement with the Durango Fire Protection District allowing for the construction of a fire station and associated fire protection services along County Road 141. The proposed action prohibits open fires. If a picnic area were developed, minimum restrictions would include: no fires outside grills or fire rings, no unattended fires, and no discharge or use of fireworks.

**Category: Socioeconomics**

Comment Numbers: 269-2, 273-2, 341-3, 372-6, 378-4

**Summary comment:** Five comments were received questioning the data in Section 3.3 of the DEA.

**Response:** The Socioeconomics and Community section was reviewed and data was updated as necessary.

**Category: Swimming**

Comment Numbers: 269-3, 320-4, 322-2, 370-2, 377-3, 380-1, 381-3, 382-1

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**Summary comment:** Eight comments were received supporting swimming, and most of these support a designated swimming beach located in a protected area out of the wind.

**Response:** See section 2.1 the Proposed Action, and Figures 3 and 4 in the DEA. All action alternatives include the activity of swimming. The proposed action includes the future development of a public swim beach constructed on the eastern shoreline, including shade structures with picnic areas and a restroom.

**Category: Trails**

Comment Numbers: 112-1, 114-1, 115-1, 117-1, 118-1, 119-1, 121-1, 127-1, 129-1, 130-1, 141-3, 141-5, 143-1, 144-1, 145-1, 149-1, 175-2, 176-2, 179-1, 181-2, 219-1, 219-2, 224-1, 225-1, 226-1, 227-1, 228-1, 230-2, 232-1, 233-1, 234-2, 235-1, 238-3, 238-4, 261-2, 266-2, 273-3, 286-1, 287-1, 288-1, 322-3, 323-, 324-2, 341-1, 341-2, 341-4, 349-2, 354-3, 370-3, 372-9, 124-1, 128-1, 137-1, 140-1, 171-1, 197-1, 200-1, 231-2, 239-4, 249-3, 289-2, 336-1, 369-1, 377-2, 131-1, 132-1, 133-1, 135-1, 146-1, 156-1, 157-1, 159-1, 161-1, 162-1, 166-1, 189-2, 213-4, 284-2, 320-2, 326-2

**Summary comment:** Eighty comments were received regarding trails. Only one comment objected to designated trails. The majority of comments were in favor of a system of hiking or multi-use trails. Fourteen comments supported bike trails, both mountain bike and single track. Another 14 comments supported horse trails. Two comments supported cross-county ski trails.

**Response:** As described in Section 2.0 of the DEA, include natural surface trails connecting Lake Nighthorse to the Animas River Trail, trails on the east side of the reservoir, potential linkages with other trails outside the project area, and a trail connecting the future swim beach with the overflow parking area. Future trail development would be subject to site-specific environmental review. Funding for development, maintenance, and management of the recreational facilities (capital and operation costs) would come from user fees, grants, and subsidies.

In one of the comment documents, Trails 2000 (a 501(c)(3)) organization in Durango, CO with a mission to plan, build and maintain trails) volunteered to partner with Reclamation to build and maintain the trail system, educate trail users; and encourage connectivity on road, path, and trail.

**Category: Water Quality**

Comment Numbers: 122-1, 150-2, 153-1, 260-1, 339-1, 363-5

**Summary comment:** Six comments were specifically made about water quality, but additional comments regarding motorized recreation concerned water quality. The comments may be summarized by the one submitted by the Southern Ute Tribe (363-5): there needs to be an environmental commitment to monitor water quality to ensure compatibility of motorized recreation (and all uses of the reservoir) with the primary project purpose of delivering M&I water. There also needs to be a commitment to address any adverse effects of spills or releases of oil, gas or other regulated contaminants.

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**Response:** Water quality monitoring shall be undertaken by Reclamation in coordination with the recreation manager, ALPOMRA, and other stakeholders. The results of water quality monitoring shall be reviewed periodically to determine whether additional control measures need to be developed and implemented.

**Category: Wildlife**

Comment Numbers: 216-2, 258-2, 264-2, 320-5, 372-3

**Summary comment:** Five commenters made specific comments requesting protection of wildlife and having the BODO Wildlife Area continue to be a wildlife management area. CPW commented that the winter closures proposed in all action alternatives would not be necessary and the lake could be opened to motorized boating year round.

**Response:** Reclamation remains committed to protecting wildlife as documented in the FSEIS page 5-12, Section 5.4.5. Reclamation remains committed that recreational facilities and the new alignment for County Road 211 are restricted to minimize disruption of deer and elk habitat use and behavior. Based on the comment from CPW, Reclamation and the other managing partners will reevaluate winter closures.

### **3. Individual Responses**

In this section, each comment number and category is provided, along with the response.

#### **Response to Comment 221-1**

The commenter made the point that the no action alternative was not that the reservoir would be closed but rather the reservoir would be open to the public but no recreation facilities would be constructed. The commenter was primarily concerned with hunting and cited 24 CFR 24-4(i) [sic 43 CFR 24-4(i)] which provides for public use of federal lands in accordance with state and federal laws and permits hunting so long as it is compatible with the primary objectives for which the lands are administered.

In the DEA and retained in the FEA, the identification of the No Action Alternative as continuing with no recreation was based on the Council on Environmental Quality's (CEQ) Forty Most Asked Questions Concerning CEQ's National Environmental Policy Act Regulations (46 FR 18026, March 23, 1981, as amended). CEQ states there are two distinct interpretations of no action that an agency must consider, depending upon the nature of the proposal. The first situation is continuation of management plans or ongoing programs, the second involves Federal decisions on proposals for projects where the proposed activity would not take place. For the DEA, the CEQ's first situation appeared to be the best fit for the proposed action.

Even if the commenter were correct that the BOR's initial intent was to indefinitely close the lands to recreation only until construction was completed, according to CEQ's definition, continuing to keep the lands closed indefinitely as BOR has been doing since 2003, and not implementing a new action or change by opening these

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lands to recreation both constitute “no action” situations. Consequently, the interdisciplinary team felt that the no action alternative as described in Section 2.4 in the DEA was appropriately identified based on both situations described in of CEQ's definition of "no action" that an agency must consider. However, the section was edited in response to this comment and our rationale is further explained here.

A Federal Register Notice was issued by Reclamation on June 23, 2003 (68 FR 39970), that closed Reclamation land in Ridges Basin, La Plata County Colorado to public access and activities indefinitely. This notice was posted in accordance with 43 CFR 423.3(b). The State of Colorado was consulted per 43 CFR 24.4(i)(4). The Department of Natural Resources Division of Wildlife acknowledged the closure via correspondence dated September 5, 2008. Specifically, the State notified the public that federal land under Reclamation’s jurisdiction located in Game Management Unit 74 was closed to hunting. Therefore, under the CEQ’s first interpretation of “no action” this closure is continued as described under the no action alternative.

**Table B-1. Numbering of Comment Documents and Individual Comments, Comment Category, and Comment Summary**

ID	Document No.	Comment No.	Name	Category	Comment Summary
1	101	1	O'Neill, T.	Alt NA	Support least developed alternative.
2	102	1	Japhet, M.	facilities	Change proposal to include breakwater at existing boat ramp for public safety.
3	102	2	Japhet, M.	Alt PA open ASAP	Amend proposal to facilitate a more timely opening of lake to public recreation.
4	102	3	Japhet, M.	facilities	Temporary entrance station consisting of a portable shed or sunshade can be placed at gated entrance off CR211. This structure can double as aquatic nuisance inspection station.
5	102	4	Japhet, M.	facilities	With regard to parking, the existing parking lot at the boat ramp would serve as a self-regulating daily limit to the number of users.
6	102	5	Japhet, M.	Alt PA open ASAP	Repay Wallop-Breaux money to Colorado for depreciation of unused facilities. Accelerate opening.
7	103	1	Krichman, M.	Alt 1 2011	Support Plan Number 1. Would be fine with a more limited approach that would allow hiking, land activities, and nonmotorized boating.
8	104	1	Brook, D.	zone uses	Separate nonmotorized boat ramp and motorized boat ramp.
9	105	1	Koeppen, R.	Alt 1 2011	Support Alternative 1 from 2011.
10	106	1	Soignier, A.	motors-yes	Support allowing motorized boating.
11	107	1	Wurtz, M.	motors-yes	Recommend that water skiing be made available.
12	108	1	Wilson, J.	Alt PA	Support 2014 Recreation Plan providing for careful growth and further development if deemed appropriate.
13	109	1	Holland, Y	motors-restrict	Restrict boating to electric motors, canoes, and kayaks to preserve water quality.
14	110	1	Sewell, K.	motors-restrict	Recommend no jet boats and that motorized vessels have horsepower limited to 10. A quiet area should be created in the southwest sector where no motor boats are allowed.
15	110	2	Sewell, K.	camping	Develop a "leave no trace" wilderness camp for kids as a historic educational experience. (See also 213-2)
16	111	1	Kiehm, G.	Alt NA	Purchased property in the area and want Lake Nighthorse to stay undeveloped.
17	112	1	Reuter, M.	trails	Support trail component of Action Alternative 1.

ID	Document No.	Comment No.	Name	Category	Comment Summary
18	113	1	Houston, A.	motors-restrict	Hope personal watercraft and power boats not allowed. Would make exception for electric trolling motors and possibly outboard motors less than 5 horsepower.
19	114	1	Grannis, D.	trails	Support trail or trail system.
20	115	1	Brunton, J.	trails	Support trail or trail system.
21	116	1	Koons, B.	Alt 1 2011	Support Alternative 1.
22	117	1	Amos, C.	trails	Support trail or trail system.
23	118	1	Otoole, T.	trails	Support trail or trail system.
24	119	1	Steckler, G.	trails	Support trail or trail system.
25	120	1	Steckler, G.		Duplicate of 119.
26	121	1	Catsman, G.	trails	Support trail or trail system.
27	122	1	Dahlquist, J.	water quality	Support Proposed Alternative. Biggest concern is possible contamination by motor boats and engines since the water is to be used for drinking water.
28	123	1	Skinner, D.	Alt PA open ASAP	Open lake soon. It is a great place for birdwatching.
29	124	1	Speicher, J.	trails, bike	Support trail or please allow us to realize some value in the well-managed use by cyclists and hikers.
30	125	1	Norris, E.	motors-restrict	Support nonmotorized lake. You have struck a good compromise that will work for most folk. Wonder about the speed limit of 40 mph. Seems that 30 mph would be plenty fast for most skiers. Too many boats buzzing around such a small area could also be a challenge to some boaters and present safety issues.
31	126	1	Furtney, S.	Alt 1 2011 trails	Support Alternative 1. Know that in 2010 the City of Durango developed a Parks and Open Space Master Plan. One part of the plan identified priorities. The number one priority was trails for hiking and biking.
32	127	1	Herringer, W.	trails	Support trail or trail system.
33	128	1	Speicher, G.	trails, bike	Consider including mountain bike trail all around the lake.
34	129	1	Coleman, M.	trails	Support trail or trail system.
35	130	1	Daniel, B.	trails	Support trail or trail system.
36	131	1	Boulder, L.	trails, horse	Support trail or trail system (horses).

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ID	Document No.	Comment No.	Name	Category	Comment Summary
37	132	1	Sherer, J.	trails, horse	Support trail or trail system (horses, hikers, bikers).
38	133	1	Robinson, T.	trails, horse	Support trail or trail system (horses).
39	134	1	Speegle, R.	management plan	Visitation will impact vegetation and riparian environment. This will determine when and where the day use area will be developed to meet demand and reduce impacts to the shoreline.
40	135	1	Leming, C.	trails, horse	Support trail or trail system (horses).
41	136	1	Johnson, K.	NEPA process	Extend public comment period.
42	137	1	Ulery, S.	trails, bike	Support trail or trail system (bikes)
43	138	1	Todt, M.	cultural	Concerned about City of Durango providing proper protection of cultural resources. Initiate a site steward program.
44	138	2	Todt, M.	safety	Concerns about the City of Durango ensuring the safety of all who use the lake.
45	138	3	Todt, M.	safety	Concerns about motor boat noise and water pollution, and potential danger to swimmers, kayakers, and wildlife. Suggest the City of Durango present a plan regarding law enforcement and hire and train staff to monitor lake users.
46	139	1	Turner, P.	hunting	Support the right to hunt waterfowl.
47	140	1	Nielsen, J.	trails, bike	Support trail or trail system (bikes).
48	141	1	Hall, G.	motors-restrict	Use the boat ramp for small fishing boats only. Area does not need noisy motorized boats.
49	141	2	Hall, G.	facilities-marina	Allow for day use only with capability of overnight boat housing.
50	141	3	Hall, G.	trails	Support trail and trail system.
51	141	4	Hall, G.	facilities-picnic	Support picnic areas.
52	141	5	Hall, G.	trails	The fence that encloses the land between County Road 141 and 210 should be removed and land opened to the public with trails put in.
53	141	6	Hall, G.	roads	Pave County Road 210.
54	142	1	Culver, J.	NEPA process	Extend public comment period.
55	143	1	Sigle, S.	trails	Support trail or trail system.
56	144	1	Hjermstad, E.	trails	Support trail or trail system.
57	145	1	Tobin, D.	trails	Support trail or trail system plus camping and picnicking in addition to water recreation.
58	146	1	Zerr, F.	trails, horse	Support trail or trail system (horses).

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ID	Document No.	Comment No.	Name	Category	Comment Summary
59	147	1	Sherman, P.	NEPA process	Extend public comment period.
60	148	1	Anderson, J.	motors-no	Support kayaking, paddle boarding, hiking trails, and shore fishing.
61	149	1	Greer, A.	trails	Support trail or trail system.
62	150	1	Hoehlein, R.	Alt 1 2011	Supports Action Alternative 1 - 2011 Recreation Plan.
63	150	2	Hoehlein, R.	water quality	Since water quality is a high priority, it will be interesting to see how motorized boats will impact conditions.
64	151	1	Graham, S.	motors-restrict	Support wakeless lake.
65	152	1	Gerhardt, M.	alt days	Support Action Alternative 1, but would like to see nonmotorized of Alternative 2 added into Alternative 1. Support 1 or 2 completely nonmotorized days per week.
66	153	1	Atkins, B.	water quality	Request water quality monitoring.
67	154	1	Linden, D.	motors-restrict	Support nonmotorized boating to keep chemicals out of the water. If motorized boating is allowed, it should be wakeless.
68	154	2	Linden, D.	camping	Develop camping on the north side should be low impact with adequate pit toilets and trails to connect to the shore and trails. Support trail or trail system.
69	155	1	Hoehlein, R.	NEPA process	Extend public comment period.
70	156	1	Berg, A.	trails, horse	Support trail or trail system (horses).
71	157	1	Stransky, T	trails, horse	Support trail or trail system (horses).
72	158	2	Schwarz, A.	camping, no	Opposed to motorized boating and campgrounds.
73	158	1	Schwarz, A.	motors-no	Opposed to motorized boating and campgrounds.
74	159	1	Eisenmann, J.	trails, horse	Support trail or trail system (horses).
75	160	1	Shipps, N.	motors-no	Support nonmotorized boats.
76	161	1	Wanner, C.	trails, horse	Supports trail or trail system (horses).
77	162	1	Rodas, T.	trails, horse	Supports trail or trail system (horses).
78	163	1	Janeczek, B.	alt days	Lake should be wake free or there could be alternating days of motorized use.
79	164	1	Wolgamott, J.	motors-no	Supports nonmotorized boats.
80	165	1	Wilde, R.	Alt 1 2011	Supports Action Alternative 1 - 2011 Recreation Plan and expedite decision.
81	166	1	Watters, L.	trails, horse	Support trail or trail system (horses).

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ID	Document No.	Comment No.	Name	Category	Comment Summary
82	167	1	Kuss, A.	Alt NA	Do not support recreation. Maintain the area as a wildlife and cultural preserve.
83	168	1	Claus, J.	motors-no	Do not support motorized traffic on or around the lake. Have parking areas and boat ramp for nonmotorized boats.
84	169	1	Brown, S.	Alt 1 2011 trails	Support Action Alternative 1 - 2011 Recreation Plan including trails.
85	170	1	Schwarz, A.	Alt NA	Support No Action Alternative.
86	171	1	Pearson, C.	trails, bike	Support trail or trail system (hiking and biking).
87	171	2	Pearson, C.	motors-restrict	Support nonmotorized use and slower motorized use.
88	172	1	Noisom, L.	Alt 1 2011	Support Action Alternative 1 - 2011 Recreation Plan, without motorized boating initially.
89	173	1	Allen, C.	Alt PA open ASAP	Open lake as soon as possible.
90	174	0	Todt, M.		Duplicate of 138.
91	175	1	Joline, H.	motors-restrict	Power boats should have a speed limit and keep lake accessible for canoes, kayaks, and sailboats.
92	175	2	Joline, H.	trails	Support trail or trail system (hikers).
93	176	1	Ruddell, S.	motors-restrict	Prohibit jet skis and loud motors.
94	176	2	Ruddell, S.	trails	Support trail or trail system.
95	176	3	Ruddell, S.	safety	Law enforcement needs to patrol the lake to prevent conflicts among motorized and nonmotorized users and neighbors.
96	176	4	Ruddell, S.	motors-restrict	Increase the no wake zone to 300 feet from shore along the perimeter of the lake.
97	177	1	Judge, J.	Alt NA	Support the No Action Alternative
98	178	1	Downey, B.	hunting	Support waterfowl hunting.
99	179	1	Brinton, M.	trails	Support trail and trail system.
100	180	1	Keck, R.	motors-no	Support nonmotorized boats.
101	181	1	Pearcy, R.	motors-no	Support nonmotorized boats.
102	181	2	Pearcy, R.	trails	Support trail or trail system.
103	182	1	Branch, B.	motors-no	Support nonmotorized boats.
104	183	1	Van Winegarden, D.	motors-no	Support nonmotorized boats.
105	184	1	Fry, K.	motors-yes	Support motorized boating.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
106	185	1	Ellison, L.	motors-restrict	Limit boat motors to low horsepower and low wake.
107	186	1	Cross, J.	motors-restrict	Limit boat motors to low horsepower and no wake.
108	187	1	Otteson, G.	alt days	Alternate motorized and nonmotorized use on the lake.
109	187	2	Otteson, G.	motors-restrict	Boat traffic should only be counter clockwise.
110	188	1	Sauzo, L.	motors-no	Supports nonmotorized boats.
111	189	1	Furtney, J.	Alt 1 2011	Support Action Alternative 1 - 2011 Recreation Plan
112	189	2	Furtney, J.	trails, horse	Support trail or trail system (horses).
113	190	1	Kawell, S.	motors-restrict	Do not allow motor boats over 10 horsepower. Keep it quiet for wildlife and visitors.
114	191	1	Sporl, J.	facilities	Install a disc golf course.
115	192	1	Wehmeyer, P.	Alt 1 2011	Support Action Alternative 1 - 2011 Recreation Plan,
116	193	1	Tregillus, L.	alt days	Oppose motorized boating; however, if motorized boats are allowed, keep such use limited to 1 or 2 days per week.
117	194	1	Daly, M.	Alt 1 2011	Support Action Alternative 1 - 2011 Recreation Plan
118	195	1	Vierling, J.	motors-no	Support nonmotorized boats.
119	195	2	Vierling, J.	alt 1 2011	Support Alternative 1 - 2011 Recreation Plan.
120	196	1	Deller, J.	Alt 1 2011	Support Alternative 1 - 2011 Recreation Plan.
121	197	1	Engel, T.	trails, bike	Support trail or trail system (bikes).
122	198	1	Martin, K.	motors-restrict	Support a no wake boating lake or nonmotorized lake.
123	199	1	Otteson, G.	motors-restrict	If motorized boats are allowed, keep such use limited to 1 or 2 days per week.
124	200	1	Smith, K.	trails, bike	Support trail or trail system (bikes).
125	201	1	Morrison, J.	motors-no	Support nonmotorized boats.
126	202	1	Self, L.	motors-restrict	Prefer no loud boats.
127	203	1	Self, S.	motors-no	Prefer quiet boating only.
128	204	1	Prentice, B.	motors-no	Prefer quiet boating only.
129	205	1	Reott, M.	motors-restrict	Prefer no motorized boating, but support a low or no wake option for the motorized boating.
130	206	1	LaFrance, T.	zone uses	Support power boating, however, could support a quiet end at the lake.
131	207	1	Bregar, D.	motors-restrict	Would like the lake to be wake free.
132	208	1	Rosenberg, R.	motors-no	Support nonmotorized boats.

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133	209	1	Brown, H.	motors-restrict	Oppose high speed watercraft.
134	210	1	Rosenberg, R.	motors-no	Duplicate of 208.
135	211	1	Garlick, B.	motors-no	Would like the lake to be wake free, better yet, prohibit motorized watercraft period.
136	212	1	Buickerood, J.	zone uses	Supports Action Alternative II; however, recommends modifying it to reduce the motorized area to 1/4 of the area shown on the map and reduce speed limit to 10 mph.
137	212	2	Buickerood, J.	zone uses	Lift restrictions on the dam structure while allowing closures of the spillway, intake/release structures.
138	213	1	Sewell, K.	management plan	Provide a mission statement of preserving through education the natural environment, historical and cultural significance of the Ridges Basin volunteer support.
139	213	2	Sewell, K.	management plan	Consider interpretive and education team recommendations including: education about minimizing environmental impact, generating revenue to permit education on culture history, using buses to transfer the majority of visitors. The idea would be to add a third day to visitors experience to the typical train and Mesa Verde experience.
140	213	3	Sewell, K.	camping	Allow overnight camp stays.
141	213	4	Sewell, K.	trails, horse	Support trail or trail systems (horses).
142	213	5	Sewell, K.	camping	If cabin sites are permitted, they should be tepees or temporary buildings following the "leave no trace" doctrine, working with the 2 Colorado Ute Tribes.
143	213	6	Sewell, K.	management plan	A maximum number of user days would be allocated equal to 10-20 per day times 3.5 months times 30.5 days per month especially during elk calving or mule deer fawning times.
144	213	7	Sewell, K.	camping	Only dead and down wood should be allowed for fires and waste must be hauled out.
145	213	8	Sewell, K.	motors-restrict	Limit boat motors to low horsepower and other water activity must be by kayak, canoe, or human powered craft in designated areas.
146	213	9	Sewell, K.	zone uses	Zone motor boats to the south or west side allowing a wilderness experience elsewhere.

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147	213	10	Sewell, K.	management plan	Entice the film industry to the lake, which would provide incentives for development of film studios in Durango.
148	213	11	Sewell, K.	management plan	Develop a fresh water aquaculture industry thus enhancing the experience with fishing adventures.
149	214	1	Kordes, S.	motors-restrict	No wake lake, use the lake for kayaking, and stand up paddle boarding.
150	215	1	Brew, D.	alt days	Alternate motorized and nonmotorized use on the lake.
151	215	2	Brew, D.	management plan	Educate visitors about geology, archaeology, biology, and water.
152	216	1	Curtis, G.	motors-no	Support nonmotorized boats.
153	216	2	Curtis, G.	wildlife	Provide wildlife refuge.
154	217	1	Shelley, P.	Alt PA	Supports 2014 Recreation Plan Alternative.
155	218	1	Franklin, M.	cultural	Draft EA does not acknowledge Old Spanish Trail or include mitigation for damage to the trail.
156	219	1	Furtney, S.	trails	Extend the recreational footprint to 1 mile around the full pool specifically for a natural surface trail.
157	219	2	Furtney, S.	trails	Incorporate hard surface trail connecting the Animas River trail to the lake. (See also #126-1)
158	219	3	Furtney, S.	Alt 1 2011	Support Action Alternative 1 - 2011 Recreation Plan. If these can't be approved, include them as future recreational improvements in future phases.
159	220	1	Graves, D.	motors-restrict	Prefer small motors only.
160	221	1	Reeves, A.	Alt NA	No Action Alternative is misconstrued and instead should be that the reservoir would be open to the public and no recreation facilities would be constructed and hunting would be allowed.
161	222	1	Caudill, J.	motors-restrict	Support wakeless boating.
162	223	1	Culver, J.	motors-restrict	Support small horsepower engines under 10 horsepower.
163	223	2	Culver, J.	management plan	Want to see school kids engaged in contests creating low tech, no engine craft to get around the lake, and people rowing canoes and duckies.
164	224	1	Mackay, J.	trails	Support Alternative 1 with the addition of trails from the 2011 plan.
165	225	1	Bassett, B.	trails	Support a nonmotorized shared use trail around the lake.
166	225	2	Bassett, B.	motors-restrict	Request a no wake lake.
167	226	1	Lewis, K.	trails	Support Alternative 1 with the addition of trails.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
168	227	1	Raleigh, S.	trails	Support trails.
169	228	1	Kelly, M.	trails	Supports trails (hiking).
170	228	2	Kelly, M.	motors-restrict	Support nonmotorized boating or at least keep it as a no wake zone.
171	229	1	Gustin, M.	motors-restrict	Support nonmotorized boating or less than 5 horsepower.
172	230	1	Butler, R.	motors-restrict	Limit motor size, noise level and speed, and expand the no wake zone.
173	230	2	Butler, R.	trails	Encourage nonmotorized vehicles on trails, no drones, and smallest footprint for facilities.
174	230	3	Butler, R.	camping, no	Support no overnight camping.
175	231	1	Gregg, M.	camping	Support self-contained campers with no generators, and tent camping.
176	231	2	Gregg, M.	trails, bike	Support hiking and biking trails with a nonmotorized trail between Durango and the lake.
177	231	3	Gregg, M.	motors-no	Support swimming and fishing, and nonmotorized recreation.
178	231	4	Gregg, M.	motors-restrict	High horsepower boats would have a detrimental impact on the environment.
179	232	1	Hofman, N.	trails	Support trails.
180	233	1	Kordes, S.	trails	Support trails (hiking).
181	234	1	Kordes, R.	motors-restrict	Support wakeless boating and motor boats should be limited to non-planing speeds.
182	234	2	Kordes, R.	trails	Support trails.
183	235	1	McKnight, R.	trails	Support trails.
184	236	1	Fischer, T.	motors-restrict	Support wakeless lake for uses such as canoes, sailboats, and small boats with low horsepower.
185	237	1	Corra, A.	motors-restrict	Support no wake policy, limited motor size, and anglers, paddle boarders, kayakers, canoeists, and swimmers.
186	238	1	Helm, T.	motors-restrict	Support low impact boating, allowing only canoes, kayaks, sailboats, and low horsepower motors. No marina.
187	238	2	Helm, T.	camping	Support campgrounds for tent and RV use, with handicapped access, composting restrooms, water, and RV dump station. Have campsites well dispersed.
188	238	3	Helm, T.	trails	Support hiking trails, but not mountain bikes.
189	238	4	Helm, T.	trails	Support handicapped access for fishing from the shore.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
190	238	5	Helm, T.	cultural	Prevent access to cultural resources and educate visitors.
191	239	1	van Bonno, N.	motors-no	Support no gas powered motor boats.
192	239	2	van Bonno, N.	camping	Support tent camping with no RVs.
193	239	3	van Bonno, N.	facilities-picnic	Support picnic and swimming areas and an off leash dog area.
194	239	4	van Bonno, N.	trails, bike	Support hiking, biking, and ski trails.
195	240	1	Winslow, R.	motors-no	Support nonmotorized boating. Object to motorized boats that would disturb birds.
196	241	1	Cowing, M.	motors-restrict	Support no wake lake, noise pollution would impact wildlife.
197	242	1	McDowell, S.	motors-restrict	Support wake free lake.
198	243	1	Stout, P.	Alt NA	Seems inappropriate to open area for recreation or further disturbance.
199	244	1	Harris, M.	alt days	Support nonmotorized use or alternate days of motorized use.
200	245	1	Van Zee, K.	motors-restrict	Restrict boating to electric motors or less than 10 horsepower.
201	246	1	Garlick, B.	motors-no	Stop motorized boating to prevent mussel infestation, noise and pollution.
202	247	1	Rodey, G.	motors-no	Support nonmotorized boating, and kayaking, rowing, sailing, fishing, and swimming.
203	248	1	Thorsen, M.	motors-restrict	Support nonmotorized boating or battery powered motors.
204	249	1	Pope, R.	Alt PA	Support original 2014 Plan.
205	249	2	Pope, R.	Alt PA	In favor of the proposed alternative, but build all facilities near the water intake area and minimize disturbing any more land.
206	249	3	Pope, R.	trails, bike	Support hiking and biking trails.
207	249	4	Pope, R.	motors-yes	Support motorized boats, but ban open exhaust boats.
208	249	5	Pope, R.	hunting	Not in favor of granting Indian hunting rights on this land, we should all have equal rights.
209	250	1	Steels, G.	motors-restrict	Support motorized boating, but limit to 70 horsepower.
210	251	1	Harris, S.	motors-restrict	Support motorized boats with low or no wake zones.
211	251	2	Harris, S.	management plan	Support the City to manage recreation.
212	252	1	Bollinger, C.	motors-no	Support nonmotorized boating, fishing, canoeing, bird watching, hiking, and picnicking.
213	253	1	Nobes, A.	motors-no	Support nonmotorized boating and RVs.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
214	254	1	Christiansen, G.	Alt PA	Support both Proposed Action and Action Alternative 1 in spirit of multiple use.
215	254	2	Christiansen, G.	motors-yes	Motorized boating should be allowed.
216	255	1	Krest, S.	motors-no	Support nonmotorized boating, canoers, kayakers, sailors, and swimmers. (submitted twice)
217	256	1	Bielenberg, S.	motors-no	Support nonmotorized use. (Petition with 450 signatures.)
218	257	1	Harries, R.	Alt 1 2011 trails	Support Action Alternative 1 with recreation opportunities and trails.
219	258	1	Olajos, M.	motors-no	Support nonmotorized vehicle use and provision of safe drinking water.
220	258	2	Olajos, M.	wildlife	Wildlife should be considered in the management plan.
221	259	1	Atkinson, S.	motors-no	Support no wake vehicles, no electric motors, no oil, gas, or pollutants in the water.
222	260	1	Fontana, L.	water quality	Prevent contamination of drinking water from fecal coliform bacteria, gasoline, fuel additives, and oil.
223	260	2	Fontana, L.	zone uses	Boats, swimmers, and bathing should not be allowed within 1 mile of the public water supply.
224	261	1	Handrick, M.	motors-restrict	Support nonmotorized vehicles such as kayaks, stand up paddle boards, sailboats, or just electric motors.
225	261	2	Handrick, M.	trails	Support trails.
226	261	3	Handrick, M.	camping	Limit camping to small area with no RVs.
227	262	1	The Hopi Tribe	Alt NA	Support no recreation on the lake. Support the No Action Alternative.
228	262	2	The Hopi Tribe	cultural	Support identification and avoidance of prehistoric archaeological sites, and further tribal consultation.
229	262	3	The Hopi Tribe	cultural	Concerned with NAGPRA compliance.
230	263	1	Lee, R.	motors-no	Support nonmotorized boats.
231	264	1	Felty, A.	motors-no	Support nonmotorized boating or no wake lake.
232	264	2	Felty, A.	wildlife	Support protecting wildlife.
233	265	1	Lee, R.	motors-no	Support nonmotorized boating and kayaks, anglers, and swimmers.
234	266	1	Paulson, D.	motors-restrict	Support nonmotorized boats or low horsepower.
235	266	2	Paulson, D.	trails	Do not support too many trails. There should be a large portion of the shore without trails or roads and off limits to canoers giving wildlife a place to nest and rest.

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236	267	1	Dunn, J.	motors-no	Support nonmotorized boats.
237	268	1	Markward, A.	motors-restrict	Support nonmotorized boating or electric motors, or low horsepower.
238	269	1	City of Durango	Alt 1 2011	Support Action Alternative 1.
239	269	2	City of Durango	socioeconomics	Check population and demographics in DEA against numbers in this comment letter.
240	269	3	City of Durango	swimming	Support swim beach, day use and picnic area, natural and hardened trails, information displays, campgrounds, nonmotorized boat launch, and breakwaters.
241	269	4	City of Durango	motors-no	Support nonmotorized boats.
242	270	1	Krest, S.		Duplicate of 255.
243	271	1	Sherman, P.	motors-restrict	Support electric motors only with no wake speeds to preserve water quality.
244	271	2	Sherman, P.	management plan	Provide opportunity for local businesses to teach water sports such as kayaking, rowing, and nonmotorized boating to youth.
245	271	3	Sherman, P.	safety	Concerned with cost to City of Durango with law enforcement and fire.
246	271	4	Sherman, P.	motors-restrict	Support no wake lake with minimal recreational use to protect water, wildlife, and esthetics.
247	272	1	Conner, L.	motors-restrict	Support nonmotorized boats or electric motors to prevent petroleum contamination and mussels.
248	273	1	Rodman, B.	motors-restrict	The recreation plan should fall somewhere between the Proposed Action and Action Alternative 1; however, do not support motorized boats, or limit boats to 10 mph and no more than 10 boats.
249	273	2	Rodman, B.	socioeconomics	Question the lake would attract significant non local visitors. Most visitors will be local and there will not be a significant positive impact to the local economy.
250	273	3	Rodman, B.	trails	Support trail or trail system (hiking).
251	273	4	Rodman, B.	camping, no	No campgrounds.
252	274	1	Kopke, J.	motors-no	Support nonmotorized boats.
253	275	1	Puskas, J.	motors-no	Support nonmotorized boats and kayaking, hiking, and enjoying the beauty of the lake.
254	276	1	Morrison, M.	motors-no	Support nonmotorized boats.
255	277	1	Rigby, M.		Duplicate of 273.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
256	278	1	Brown, B.		Duplicate of 273.
257	279	1	Roulstin, C		Duplicate of 273.
258	280	1	Moriarty, T.	motors-no	Support nonmotorized boats.
259	280	2	Moriarty, T.	camping	Support camping.
260	281	1	Cure, H.	motors-restrict	Support no motorized boats or motors limited to 4-cycle 10 horsepower.
261	282	1	Shadiv, J.	motors-no	Support nonmotorized boats.
262	282	2	Shadiv, J.	camping, no	Does not want campgrounds.
263	283	1	Burgess, K.		Duplicate of 273.
264	284	1	Chavez, M.	motors-restrict	Support jet skis and kayaks.
265	284	2	Chavez, M.	trails, horse, ski	No ATVs, but horse trails, cross country skiing, and snow shoeing.
266	284	3	Chavez, M.	camping	Both tent and RV should be allowed.
267	285	1	Scoller, L.		Duplicate of 273.
268	286	1	Turgeon, M.	trails	Support trail and trail system from Action Alternative 1 - 2011 Recreation Plan.
269	287	1	Nelson, J.	trails	Support multi use trails.
270	287	2	Nelson, J.	motors-restrict	Limit motor size to 10 horsepower.
271	288	1	Schaldach, T.	trails	Support trails from the 2011 Master Plan.
272	289	1	DeBelina, S.	motors-no	Support nonmotorized boats.
273	289	2	DeBelina, S.	trails, bike	Allow hiking, biking, and horse trails.
274	289	3	DeBelina, S.	hunting	Support hunting.
275	290	1	Johnson, D.		Duplicate of 273.
276	291	1	Lagow, C.		Duplicate of 273.
277	292	1	Ritchey, J.	motors-restrict	Support nonmotorized boating, but if gas engines are allowed should not exceed 6 horsepower, and be 4 cycle. Entire lake should be no wake. Number of motor boats should be limited.
278	292	2	Ritchey, J.	camping, no	No overnight camping.
279	293	1	Oliver, J.	motors-restrict	Support no wake lake with more basic launch facilities such as a modest boat ramp to provide for kayaking, stand up paddle boarding, swimming, and canoeing.
280	294	1	Rabern, D.		Duplicate of 292.
281	295	1	Sadler, S.	motors-no	Support nonmotorized (no loud speed boats).

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ID	Document No.	Comment No.	Name	Category	Comment Summary
282	296	1	Tregillus, P.	motors-no	Support nonmotorized boats.
283	297	1	Conradi, H.	motors-no	Support nonmotorized boats.
284	298	1	Der Ohanesian, M.	motors-no	Support nonmotorized boats.
285	299	1	Wanger, M.	motors-restrict	Support motorized boating, but limit to 30 horsepower.
286	299	2	Wanger, M.	facilities-marina	There should be slips that boat owners can rent.
287	300	1	Harris, T.		Duplicate of 239.
288	301	1	Montle, J.		Duplicate of 273.
289	302	1	Janeczek, A.	motors-restrict	Support nonmotorized boating, but small electric motors are acceptable with no wake zones.
290	302	2	Janeczek, A.	motors-restrict	Boat ramp should be for kayaks, canoes, and similar; no wake boats.
291	303	1	Stein, E.	motors-no	Support nonmotorized boats.
292	304	1	Baker, E.	motors-restrict	Support no motors, but if we must can accept no wake boats.
293	305	1	Carlson, S.	motors-no	Support no motors, so people may kayak, swim, canoe, and experience nature.
294	305	2	Carlson, S.	Alt PA	Support the guiding principles as identified under the Proposed Action - 2014 Recreation Plan.
295	306	1	Moore, G.	motors-restrict	Support no motors, however, if there must be motors, find a way to keep motors small, speeds low, and noise levels down.
296	307	1	Outwater, A.	alt days	Support designated long distance swimming area or alternating days when motorized boats are not permitted.
297	308	1	Paak, L.	motors-no	Support nonmotorized boats.
298	309	1	Martin, K.	motors-no	Support nonmotorized boats.
299	310	1	Kinser, C.		Duplicate of 273.
300	311	1	Schultz, D.	motors-no	Supports nonmotorized boats.
301	312	1	Blanchard, B.	motors-no	Support nonmotorized boats.
302	313	1	Milliet, C.	motors-no	Support nonmotorized boats and request investigation of allowing fuel in the water system.
303	314	1	Eskey, T.	motors-no	Support nonmotorized boats.
304	315	1	Hartman, W.	motors-restrict	Support 25 horsepower fishing boats as the maximum on the lake.
305	316	1	Belcher, T.	motors-restrict	Support motor craft not greater than 6 horsepower.
306	317	1	Casey, C.	motors-no	Support nonmotorized boats.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
307	318	1	Ward, T.	motors-no	Support nonmotorized boats.
308	319	1	Busson, D.	motors-restrict	Support nonmotorized or electric motors only due to pollution, noise, and wake.
309	320	1	Pulliam, V.	motors-restrict	Want boats restricted to sailboats, canoes, kayaks, windsurfers. If motor boats are permitted, should be less than 20-ft long, have restricted engine size and type, 5-15 mph speed restriction and area restriction, have no wake zones within 150-ft of shore, docks, and swimming areas.
310	320	2	Pulliam, V.	trails-no	Do not support designated trails.
311	320	3	Pulliam, V.	facilities	Develop lake with modest and essential amenities such as toilet facilities and boat inspection station and remainder of the land will be a wildlife area.
312	320	4	Pulliam, V.	swimming	Activities should be restricted to swimming, scuba diving, fishing, and cruising, and marked by buoys.
313	320	5	Pulliam, V.	wildlife	Colorado Parks and Wildlife recommendations to protect wildlife should be implemented.
314	321	1	Jones, K.	motors-no	Supports nonmotorized use now and possible motorized use later.
315	322	1	Larson, J.	motors-no	Support nonmotorized boats and kayakers, canoers, and paddle boarders.
316	322	2	Larson, J.	swimming	Lake use should be limited to day use by picnickers, hikers, and swimmers.
317	322	3	Larson, J.	trails	Support the creation of a nature trail.
318	323	1	Morrow, J.	motors-restrict	Support nonmotorized boats and kayaking, paddle boarding, and fishing with boats with low horsepower motors and 4-cycle engines.
319	323	2	Morrow, J.	trails	Support trail and trail system.
320	323	3	Morrow, J.	camping, no	Campgrounds should not be in the plan.
321	324	1	Aweida, J.	motors-no	Support nonmotorized boats, swimmers, paddle boaters, and anglers.
322	324	2	Aweida, J.	trails	Support trail and trail system.
323	325	1	Howell, A.	Alt 1 2011 trails	Support Action Alternative 1 - 2011 Recreation Plan, but exclude user specific trails.

ID	Document No.	Comment No.	Name	Category	Comment Summary
324	326	1	Johnson, K.	motors-no	Support nonmotorized boats including rowers, canoeists, trolling, lakeshore anglers, and sailboats. Want low impact recreation and a no wake lake. A nonmotorized boat launch also needs to be a part of the plan.
325	326	2	Johnson, K.	trails-ski	Support cross country skiing.
326	327	1	Andersen, K.	motors-no	Support nonmotorized boats and a no wake zone.
327	328	1	Triola, D.	motors-no	Support a no wake lake.
328	329	1	Campbell, T.	motors-no	Support nonmotorized boats.
329	330	1	Johnson, S.	motors-no	Support nonmotorized boats.
330	331	1	McKane, T.	motors-no	Support nonmotorized boats due to petrol chemical contaminants in the drinking water supply.
331	332	1	Musgrave, C.	motors-no	Supports nonmotorized boats, kayakers, tubers, stand up paddle boards, and canoes.
332	333	1	Kernan, A.	motors-no	Support nonmotorized boats.
333	334	1	Foster, J.	motors-no	Support nonmotorized boats.
334	335	1	Sidwell, R.	motors-no	Support no wake boating.
335	336	1	Stern, I.	trails, bike	Support trail development in Action Alternative 1. Want a natural surface trail open to pedestrians, cyclists, and horses connecting to the Animas River Trail.
336	336	2	Stern, I.	zone uses	Support large zone for nonmotorized boat use.
337	337	1	Erb, H.	motors-no	Support nonmotorized boats.
338	338	1	Rodman, B.	camping	Support campgrounds so long as they don't attract users of motor boats.
339	339	1	Karraker, M.	water quality	Concerned with water quality monitoring, introduction of aquatic invasive species, and trash if motorized boats are allowed.
340	339	2	Karraker, M.	safety	Who will handle law enforcement, medical response, fee collection? Need a recreation ranger to provide education and safety.
341	340	1	Bonnett, J.	motors-no	Support nonmotorized boats.
342	341	1	Durango Trails 2000	trails	Support Alternative 1 with inclusion of multi-use trail north of County Road 210 with a Phase 1 of 10 miles and all 26.8 miles included.
343	341	2	Durango Trails 2000	trails	Page 51, Section 3.3.2, add trails after water based recreation.
344	341	3	Durango Trails 2000	socioeconomics	Final EA should address economic benefits of recreation and the initial 10 miles of trail.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
345	341	4	Durango Trails 2000	trails	Trails 2000 should be identified as volunteering to provide trail planning, development and maintenance of all trails.
346	342	1	Brown, B.	alt days	Support nonmotorized boats or majority of lake should be no wake or alternate days of motorized use.
347	342	2	Brown, B.	motors-no	Power boats jeopardize water quality and lead to the introduction of mussels.
348	343	1	Davison, R	motors-no	Supports nonmotorized boats.
349	344	1	Parkinson, L.	motors-no	Support nonmotorized boats, picnic facilities, swimming beach, and nonmotorized boat launch.
350	345	1	Spence, N.	motors-no	Support nonmotorized boats or a no wake requirement so that anglers, sail boaters, paddle boaters, and swimmers will be able to enjoy the lake equally.
351	346	1	George, C.	motors-restrict	Support nonmotorized boats or require boats be confined to low speeds.
352	346	2	George, C.	motors-no	Concerned with effluent produced by power craft is not conducive to drinking water.
353	347	1	Rostker, P.	motors-no	Support nonmotorized boats for kayakers, sail boats, rowers, and swimmers.
354	348	1	Pratt, J.	alt days	Support entire lake as a no wake zone. If not possible, then alternate weekends with nonmotorized boating.
355	349	1	Monger, M.	motors-restrict	Support nonmotorized boats with public swimming beach or must have motors limited to 10 mph and no more than 10 boats at a time.
356	349	2	Monger, M.	trails	Support hiking trails.
357	349	3	Monger, M.	camping, no	No need to add campgrounds.
358	350	1	Abshagen, B.		Duplicate of 323.
359	351	1	Mapel, T.	Alt PA	Support Proposed Action Alternative.
360	351	2	Mapel, T.	AIS	Concerned with control of mussels and staffing capabilities.
361	352	1	McKigney, J.	motors-no	Support nonmotorized boats, fishing, hiking, swimming, paddle boards and canoes.
362	353	1	Ochsner, F.	motors-no	Support limited to no motor boats because the lake would make an excellent site for competitive rowers and crew teams,
363	354	1	Honisch, B.	motors-no	Support nonmotorized boat use.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
364	354	2	Honisch, B.	camping, no	Support day use for the lake and no camping.
365	354	3	Honisch, B.	trails	Support trail plan for multi-modal use.
366	355	1	Kummel, C.	motors-no	Support nonmotorized boating
367	356	1	Wolvin, W.	motors-no	Support nonmotorized boating and human powered craft.
368	356	2	Wolvin, W.	motors-no	Concerned with petro chemicals from gas powered boats contaminating drinking water.
369	357	1	Yarsa, J.	Alt NA	Support the No Action Alternative. Would also favor a proposal which contains provisions that limit excess noise from lake users: day use only, seasonal closures, no gas powered watercraft (or limit to certain days), mufflers required, and no alcohol.
370	358	1	Stephenson, E.		Duplicate of 273.
371	359	1	Truax, G.	motors-restrict	Support nonmotorized boating or electric motors with limited horsepower.
372	359	2	Truax, G.	AIS	Concerned about mussel control and boat inspections.
373	359	3	Truax, G.	facilities-marina	Consider a rental fleet of electric boats or low horsepower, gas powered fishing boats.
374	359	4	Truax, G.	facilities	Buildings should be constructed with natural materials to blend into the environment.
375	359	5	Truax, G.	management plan	Interpretive areas are desirable for school field trips and the general public.
376	359	6	Truax, G.	management plan	Consider marketing opportunities and ways to make it easy for locals to show off their lake.
377	359	7	Truax, G.	facilities	Ease into capital expenditures and wait for users to show where demand is for facilities.
378	359	8	Truax, G.	management plan	Consider a rowing club and developing new water sports for local schools.
379	360	1	Andreason, A.		Duplicate of 269.
380	361	1	Suggs, D.	motors-no	Support nonmotorized boats.
381	362	1	La Plata County	management plan	Should consider mitigating impacts (including noise and trespass issues) to property owners on the west side of the management area in the Trappers Crossing Subdivision.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
382	362	2	La Plata County	zone uses	Request facilities and regulations accommodating multiple types of watercraft, ensuring nonmotorized uses have the same opportunity as motorized.
383	362	3	La Plata County	zone uses	Consider no wake areas and horsepower limitations to protect nonmotorized uses and prevent erosion.
384	362	4	La Plata County	safety	Manage wildfire risks particularly in day use and camping areas.
385	362	5	La Plata County	management plan	Contact La Plata County Planning Department regarding possible need to conduct location and extent review under Land Use Code 82-9.
386	362	6	La Plata County	roads	Question traffic section in DEA and level of service.
387	362	7	La Plata County	roads	Concern regarding maintenance associated with chip seal on County Road 210 as a result of increased recreation traffic.
388	362	8	La Plata County	roads	Insufficient information to determine impacts to County Road 211, if any, from the proposed west end trail head and fishing access.
389	362	9	La Plata County	motors-no	Support nonmotorized boats as an alternative that would cause least damage to biological and physical environment.
390	363	1	Southern Ute Indian Tribe	management plan	Recreational development must not interfere with Project's primary water supply purpose.
391	363	2	Southern Ute Indian Tribe	cultural	Significant cultural resources must be protected.
392	363	3	Southern Ute Indian Tribe	management plan	Tribal lands adjacent to Project lands must be protected from trespass.
393	363	4	Southern Ute Indian Tribe	hunting	Brunot Treaty rights must be resolved with deference to those rights.
394	363	5	Southern Ute Indian Tribe	water quality	All commitments to mitigation measures must be implemented to ensure compatibility of recreation with ALP's primary purpose as an M&I water supply including provisions to monitor water quality and to address any adverse spills and other emergencies.
395	363	6	Southern Ute Indian Tribe	safety	DEA fails to address law enforcement on ALP lands which are not proposed for annexation by the City. Additional security must be provided for that area. Tribe proposes contracting with the Tribe to allow Tribal rangers to patrol.
396	363	7	Southern Ute Indian Tribe	hunting	Reclamation should commit to work with CPW to address the question of public hunting.
397	364	1	Morrissey, T.	motors-no	Support nonmotorized boats.
398	364	2	Morrissey, T.	camping, no	Support day use but not camping.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
399	364	3	Morrissey, T.	alt days	Consider alternating time periods of motorized and nonmotorized boats.
400	364	4	Morrissey, T.	motors-no	Concerned about impacts of motorized gas engines on water quality and drinking water.
401	364	5	Morrissey, T.	safety	Concerned with law enforcement and patrols.
402	364	6	Morrissey, T.	safety	Concerned with wildfires and if camping is permitted, no open fires should be allowed.
403	365	1	Beller, L.	motors-no	Support entire lake classified as a no wake zone allowing anglers, sailors, wind surfers, rafts, and swimmers to enjoy recreation without noise and pollution.
404	366	1	Livera, J.		Duplicate of 365.
405	367	1	Mathews, K.		Duplicate of 365.
406	368	1	Stephens, L.	motors-no	Support a no wake zone.
407	369	1	McGlamery, O.	motors-yes	Support motorized boating and many different types of uses including ski boats, sail boats, stand up paddle boards, canoes, and swimmers.
408	369	1	McGlamery, O.	trails, bike	Support hiking and biking trails.
409	369	3	McGlamery, O.	camping	Support a nice campground.
410	369	4	McGlamery, O.	facilities-marina	Support boat rentals that would cut down on the number of boats and stand up paddle boards that would need to be inspected for mussels.
411	370	1	McGlamery, M.	zone uses	Support motorized boats, however, limit personal watercraft to certain areas of the lake. Also supports speed limits and wakeless areas.
412	370	2	McGlamery, M.	swimming	Support swimming and a swimming and picnicking beach.
413	370	3	McGlamery, M.	trails	Support trail and trail system.
414	370	4	McGlamery, M.	camping	Support campgrounds.
415	370	5	McGlamery, M.	facilities-marina	Would like to see a marina with boat slips, dry storage, and buoys.
416	371	1	Berkhahm, S	motors-no	Support no wake lake.
417	372	1	Colorado Parks and Wildlife	NEPA process	Action Alternative 1 does not conform to the FEIS and the effects of this action would significantly impact the human environment and these effects have not been analyzed in the FEIS. Thus, portions of this alternative cannot be tiered due to failure to include hunting.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
418	372	2	Colorado Parks and Wildlife	hunting	Table 1, Sections 3.7.1 and 3.7.2 should be changed to allow public hunting and exercise of Brunot Treaty hunting rights by the Tribes, Hunting regulations will be developed in coordination with the Tribes, CPW, et al.
419	372	3	Colorado Parks and Wildlife	wildlife	Support seasonal closures to protect terrestrial wildlife and golden eagles. We encourage modifying the alternatives to allow lake use from November 16 to May 15. The west side and south side closures will ensure these areas function as big game winter habitat and a migration corridor. We also support proposed golden eagle nest closures.
420	372	4	Colorado Parks and Wildlife	hunting	Bodo State Wildlife Area was critically important to wildlife management in Game Management Unit 741 and provided the only public hunting opportunity in that GMU. The ALP resulted in the loss of this unique public hunting area. If the mitigation lands cannot be opened for public hunting, BOR should seek other opportunities to restore the unique hunting opportunity in GMU 741. The lake could support waterfowl hunting and the surrounding BOR land could support small game and limited big game opportunities.
421	372	5	Colorado Parks and Wildlife	hunting	Support waterfowl seasons run from October to January, which is a low use period for other water based recreation.
422	372	6	Colorado Parks and Wildlife	socioeconomics	Check economic section for hunting income.
423	372	7	Colorado Parks and Wildlife	hunting	Hunting geese and waterfowl provides a management tool to control waterfowl populations and preserve water quality. At a minimum, would like waterfowl hunting added to all action alternatives.
424	372	8	Colorado Parks and Wildlife	hunting	CPW recognizes Brunot Treaty hunting and fishing rights and supports these activities in the area.
425	372	9	Colorado Parks and Wildlife	trails	Trail development in the Action Alternatives exceeds impacts in the FEIS. Should trails be developed north of County Road 210, we request fencing the boundary with Bodo SWA, These lands should be restricted or have seasonal closure to protect wintering deer and elk. Recommend managing social trails and formal trails to not degrade wildlife habitat in Bodo SWA.

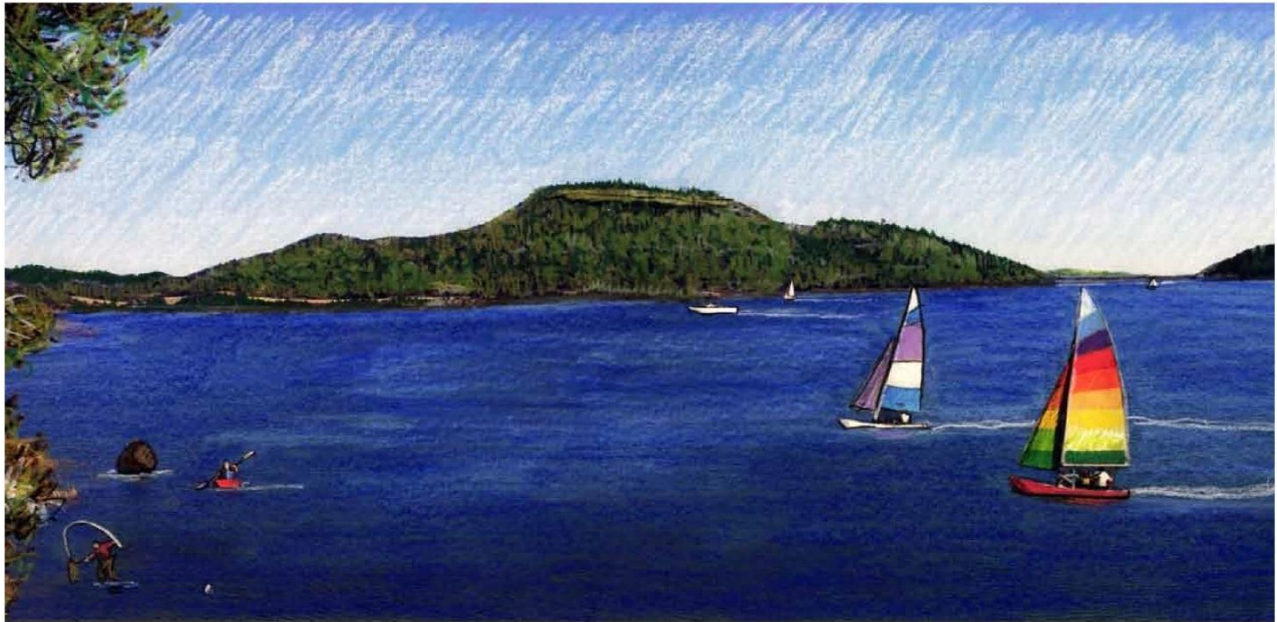
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ID	Document No.	Comment No.	Name	Category	Comment Summary
426	372	10	Colorado Parks and Wildlife	cultural	In the Cultural Resource Management Plan, there should be a commitment to protect wildlife habitat as well as cultural resources.
427	373	1	Pollak, W.	motors-restrict	Support limited trolling motors and canoeing, paddle boarding, kayaking, and rowing.
428	374	1	Edwards, P.	motors-yes	Support motor boats, but do not limit lengths, horsepower, or type of boats. Should enforce existing noise level laws and leave the rest alone.
429	375	1	Byrd, J.	motors-restrict	Bodo family ranch should stay wild for wildlife; therefore, support nonmotorized boats or low horsepower electric motors
431	376	1	Olson, E.	motors-no	Support nonmotorized use. (Petition with 450 signatures.)
432	377	1	Costa, J.	motors-restrict	Support slow speed boating.
433	377	2	Costa, J.	trails, bike	Support hiking and biking trails. All the land between the Lake and Wildcat Canyon should be open to hiking.
434	377	3	Costa, J.	swimming	Support swimming beach separated in a protected area out of the wind.
435	378	1	Chilcoat, R.	motors-restrict	Support a no wake lake with small electric trolling motors at slow speeds that would not impact other users.
436	378	2	Chilcoat, R.	motors-no	Concerned with toxic spills of oil and gas. Water quality should be a high priority.
437	378	3	Chilcoat, R.	motors-no	Air quality impacts from gas engines are mentioned but not minimized as are noise impacts.
438	378	4	Chilcoat, R.	socioeconomics	There is no economic information on nonmotorized boating as related to user days and visitor spending. The DEA does not mention the economic benefits of making the lake a nonmotorized mecca.
439	378	5	Chilcoat, R.	climate change	There is no mention of climate change and how the increased tourism and motorized recreation would add to the overall impacts of climate change.
440	378	6	Chilcoat, R.	cultural	DEA omits the Old Spanish Historic Trail. There should be consultation with the NPS and BLM regarding this trail.
441	379	1	Shubert, K.	facilities-marina	Support recreation on the lake including a marina.
442	380	1	Mimmack, J.	swimming	Please open to day use for swimming, hiking and nonmotorized craft ASAP.
443	381	1	Ulery, S.	motors-no	Support nonmotorized boats.

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ID	Document No.	Comment No.	Name	Category	Comment Summary
444	381	2	Ulery, S.	motors-no	Contamination of motor fuel should not be allowed in drinking water reservoir.
445	381	3	Ulery, S.	swimming	Would like to see swimming beaches, hiking trails, mountain biking (single track), picnicking with restrooms, limited car access to picnicking area, and boat ramps.
446	382	1	Andreason, A.	swimming	Support swimming, picnicking, trails, camping, and small motor boats.
447	383	1	Else, P.	motors-no	Support nonmotorized boats.
448	384	1	LeMaire, B.	motors-no	Support nonmotorized boats.
449	385	1	Radcliff, J.	motors-no	Support nonmotorized boats and vehicles.
450	385	2	Radcliff, J.	motors-restrict	Electric motors could be allowed, but water quality should be checked for contaminants.

**Appendix C. Lake Nighthorse Conceptual Recreation Plan – October  
2014, Draft**



# **Lake Nighthorse**

## **Conceptual Recreation Plan**

**October 2014 Draft**

## Introduction

The City of Durango Parks and Recreation Department in collaboration with the Bureau of Reclamation prepared this draft conceptual plan for recreation facilities and management at Lake Nighthorse. As follows are several documents which provided the foundation for the development of the Lake Nighthorse Conceptual Recreation Plan:

- Draft Lake Nighthorse Recreation Master Plan prepared by the Animas-La Plata Water Conservancy District (May 2011);
- Preliminary Draft Environmental Assessment for Lake Nighthorse Recreation Master Plan prepared by the Bureau of Reclamation (October 2012);
- Animas-La Plata (ALP) Project Final Supplemental Environmental Impact Statement (FSEIS) prepared by the Bureau of Reclamation (2000);
- Recreation Market Assessment, Lake Nighthorse, Durango, Colorado Prepared by RPI Consulting for the Animas-La Plata Water Conservancy District (June 2010);
- Draft Lease Agreement between United States of America and City of Durango, Colorado, for Administration of Recreation at Lake Nighthorse (In progress, available upon completion 2014);
- Draft Lake Nighthorse Annexation Agreement (In progress, available upon completion 2014); and
- Draft Memorandum of Agreement (MOA) among Animas La-Plata Operation, Maintenance, and Replacement Association and City of Durango and Ute Mountain Ute Tribe and Southern Ute Indian Tribe and Bureau of Reclamation for Recreation Planning and Development at Lake Nighthorse for Animas-La Plata Project, Colorado and New Mexico (In progress, available upon completion 2014).

## Background

Ridges Basin Dam and Lake Nighthorse were constructed by the Bureau of Reclamation (Reclamation) as a component of the Animas-La Plata (ALP) Project. The ALP Project was built to fulfill the water rights settlement of the Ute Mountain Ute and the Southern Ute Indian Tribes of southwestern Colorado (Colorado Ute Tribes) and to provide a municipal and industrial water supply to various entities in the region. Reclamation prepared a Final Supplemental Environmental Impact Statement in 2000, and subsequently signed a Record of Decision which envisioned development and management of recreation by a nonfederal entity. The reservoir area encompasses approximately 5,500 acres, and the water surface area is 1,500 acres at normal high water elevation and 750 acres at minimum pool.

In 2004, Ridges Basin Reservoir was renamed Lake Nighthorse, in honor of Ben Nighthorse Campbell, the former U.S. senator from Colorado who served as the primary author for the Settlement Act and its amendments. Construction of the dam and reservoir started in May 2003 and the initial reservoir filling was completed in June 2011.

In 2008, Colorado State Parks declined to accept the development and management of recreation at Lake Nighthorse and agreed to allow Reclamation to seek other nonfederal partners. The State gave Reclamation a \$3 million Motorboat Access grant for construction of a boat ramp, a parking area, a vault restroom, and an access road. Construction of the boat ramp project was completed in June 2013.



Recognizing the potential of the reservoir to serve as an important recreational amenity, the Animas-La Plata Water Conservancy District initiated public meetings in 2009 and contracted for the preparation of a recreation master plan in 2010 for development and management of recreation at Lake Nighthorse. The final Draft Lake Nighthorse Recreation Master Plan was completed in May 2011. Since then, considerable discussion has been ongoing with individual members of the Animas La-Plata Operation, Maintenance, and Replacement Association and Reclamation regarding recreation at Lake Nighthorse in an effort to determine what level of recreation might be appropriate and compatible with the project's primary purpose.

The City of Durango recognized that a nonfederal recreation manager for Lake Nighthorse has not been found by the Bureau of Reclamation. Several nonfederal agencies were approached by Reclamation and all entities declined to accept the management and development of recreation at Lake Nighthorse. In 2012, the City of Durango Parks and Recreation Department received the National Gold Medal Award for Excellence in the Field of Park and Recreation Management, granted by the American Academy for Park and Recreation Administration in partnership with the National Recreation and Park Association. This most prestigious award is given to only one Parks and Recreation agency in the entire nation each year by population. Durango Parks and Recreation received the award for cities less than 25,000. The Durango Parks and Recreation Department has the expertise to manage Lake Nighthorse and there is significant community interest in opening the facility to the public for recreation.

The City of Durango is a member on the Animas-La Plata Operation, Maintenance and Replacement Association (Association) and has an interest in the future of recreation at Lake Nighthorse. Other representatives on the Association include the Ute Mountain Ute Tribe, Southern Ute Indian Tribe, La Plata Conservancy District, Navajo Nation, Animas-La Plata Water Conservancy District, San Juan Water Commission, and the Colorado Water Conservation Board. The members of the Association represent the project beneficiaries for whom the project was constructed.

In 1874, Congress approved an agreement between the United States and certain Ute Indians in Colorado, known as the Brunot Agreement, pursuant to which the Utes ceded certain land to the United States and reserved a right to hunt on the land. The Brunot Agreement enables members of the Ute Indians to hunt, fish and gather, by which the Utes supported themselves in the region for centuries. Almost all of the federal property encompassing Lake Nighthorse is located within the Brunot area and subject to the Brunot Agreement rights. Reclamation, the Tribes, and the City area are having ongoing discussions regarding implementation of these rights.

## Recreation Management and Development

Discussions regarding the City of Durango exploring the feasibility of accepting the responsibility for management and development of recreation at Lake Nighthorse were initiated with Reclamation in 2011. The management and development of recreation at Lake Nighthorse is a complex negotiation process involving multiple stakeholders. Consensus has been reached to establish the framework for proceeding with recreation at Lake Nighthorse in a cautious and respectful manner. The management and development of recreation at Lake Nighthorse is intended to occur in manner consistent with the primary purpose of the project, and will be managed in accordance with the following guiding principles:

## Guiding Principles

- Protection of cultural resources.
- Ensure compliance with all applicable local, state, and federal development standards and environmental regulations and requirements.
- Monitor and protect water quality.
- Honor Brunot Agreement/Treaty rights.
- Promote ecological sustainability and preserve wildlife habitat.
- Provide ongoing care, stewardship, law enforcement, and patrol the property consistent with City parks and open space areas.
- Provide improvements within the development area to enable public access to recreational amenities.
- Ensure that recreation management and development does not adversely impact the primary purpose of the ALP Project for municipal and industrial water supply.

Pursuant to the draft MOA and ongoing discussions, the Recreation Planning and Development Committee (Committee) will include representation from the Animas-La Plata Operation, Maintenance and Replacement Association, City of Durango, Ute Mountain Ute Tribe, Southern Ute Indian Tribe, and Reclamation. The purpose of the Committee is to review and discuss recreation planning and development at Lake Nighthorse to ensure compatibility with the primary purpose of the ALP Project for municipal and industrial water supply, including initial development and any future development of recreation facilities. Lake Nighthorse is currently outside the jurisdictional boundaries of the City of Durango. In order for the City to undertake the administration of recreation at Lake Nighthorse in accordance with the terms of the Lease Agreement between Reclamation and the City of Durango, annexation of the property into the City is necessary to facilitate the provision of municipal services and, in particular, law enforcement. The annexation of federal land encompassing Lake Nighthorse is limited to the recreation area and facilities to be managed by the City of Durango.

## Initial Recreation Development

The development of recreational improvements at Lake Nighthorse will be phased to ensure compatibility with the primary purpose of the ALP Project, subject to the availability of funding, and consistent with the decisions of the Committee. Initially, Lake Nighthorse will be open for day use only, including minimum facilities necessary for public health and safety, law enforcement, and protection of the environment. The map below illustrates the current and future recreation area, highlighted in green.

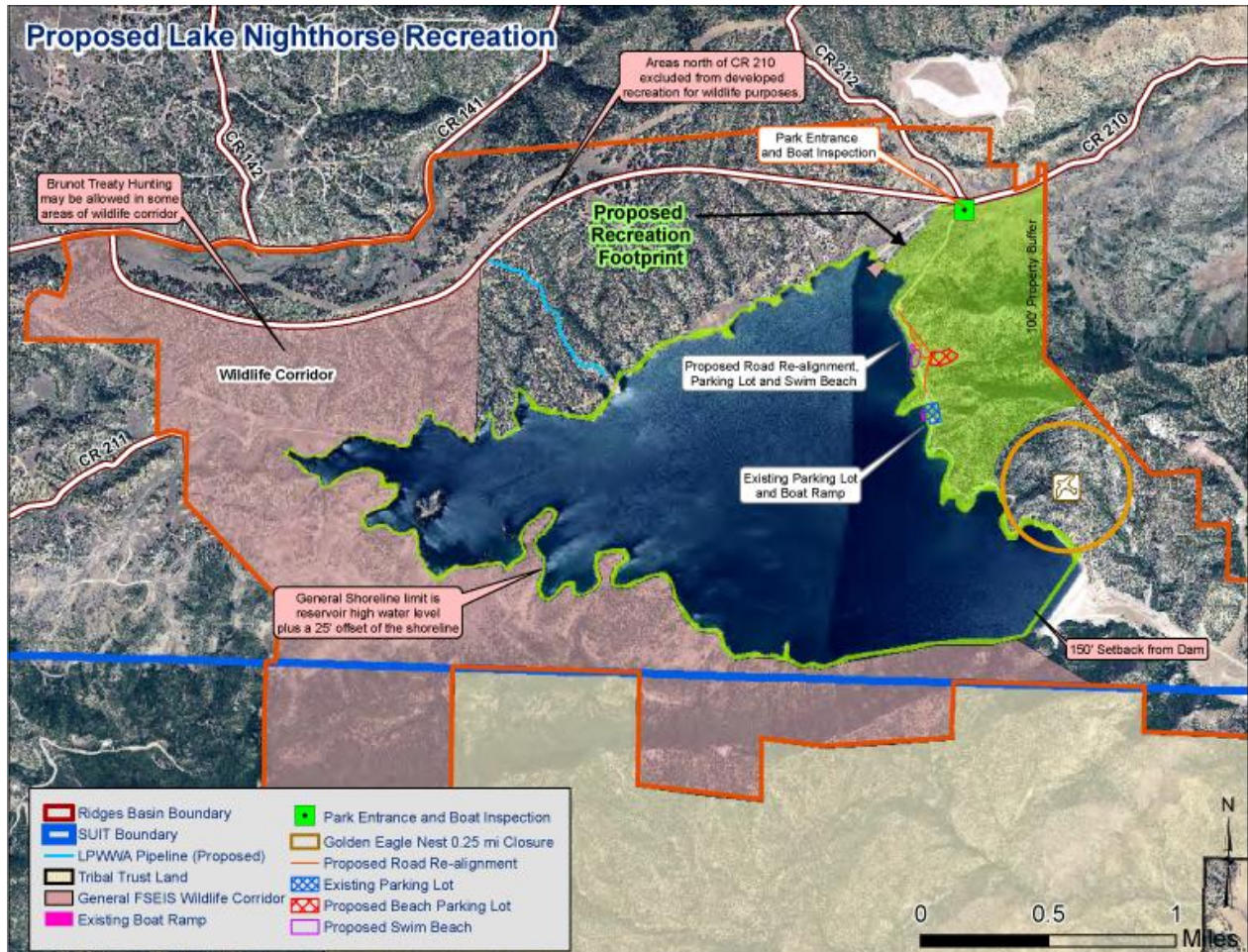


Figure 1: Proposed Recreation Footprint

The initial phase of recreation development to enable Lake Nighthorse to be open to the public has been funded by a variety of sources to Reclamation (\$3,350,000), City of Durango (\$285,000), and La Plata County road improvements involving the CR 210 turn lane into Lake Nighthorse (\$350,000).

Below is an overview of the basic necessary improvements to open Lake Nighthorse to the public:

### **Aquatic Nuisance Species Inspection Station and Decontamination Area**

Reclamation will coordinate with the Committee to plan and develop at the entry to Lake Nighthorse an aquatic nuisance species (ANS) inspection station and decontamination area. Near the existing access to CR 210, the Lake Nighthorse entrance will be located to ensure that all vehicular traffic will pass through the entrance and all motorized boats will be inspected for potential presence of ANS on vessels. The decontamination area will capture and contain all fluids associated with the treatment for ANS.

## Water Quality

Reclamation will continue its ongoing water quality activities for monitoring and protection purposes. The following provides a description of Reclamation's water quality activities associated with the Animas-La Plata Project and Lake Nighthorse.

### Lake Nighthorse

Since 2009, Reclamation has periodically conducted water quality sampling at Lake Nighthorse which includes a petroleum product monitoring element. The data gathered will provide a baseline to compare future monitoring. A regular water quality sampling program will start when the reservoir opens for public use. The sampling will include monitoring for potential pollutants such as benzene, toluene, ethyl benzene, and xylenes which are some of the volatile organic compounds found in petroleum derivatives such as gasoline.

Reclamation does not believe there will be adverse impacts on water quality due to the use of motor boats on the reservoir. However, if applicable water quality parameters are exceeded, Reclamation will work with the appropriate entity/entities to resolve the issue(s) while involving the recreation manager and project stakeholders.

In order to establish a baseline for E. coli, initial sampling occurred on the reservoir in late September 2014 and will be conducted again in October and November, weather permitting. After the E. coli data is gathered, the next step will be to analyze all the collected data and provide the information to project stakeholders.

After the reservoir opens for public use, appropriate sampling will be conducted for E. coli and additional sampling will include monitoring for invasive species such as quagga and zebra mussels. Water sampling for larval mussel detection will include lab analyses to ascertain the potential for mussel survival in the reservoir with emphasis on key parameters including calcium, pH, temperature, dissolved oxygen, and nutrients. The data gathered from the sampling will be analyzed and provided to project stakeholders.

### Animas River

Reclamation developed and implemented a program to monitor water quality in the Animas River from the Durango Pumping Plant (DPP) to the confluence with the San Juan River for five years after the DPP began operation in 2011. This sampling includes monitoring general water quality (major constituents, heavy metals, nutrients, and total organic carbon) and radiochemistry (radioactive materials). Weather permitting; sampling is done year round on a monthly basis. Two sites are located upstream from the Durango Pumping Plant (DPP); one is located behind the Doubletree Hotel and the other is near the DPP. The third site is located about ½ a mile downstream from the DPP.

Reclamation also samples the Animas River at two other locations on a quarterly basis; one site is located upstream from the DPP at East 32nd Street and the other site is located near Farmington, New Mexico, upstream from confluence of the Animas and San Juan Rivers.

After Lake Nighthorse opens for public use, sampling on the Animas River will also include larval mussel detection and lab analyses to ascertain the potential for mussel survival in the river with emphasis on key

parameters including calcium, pH, temperature, dissolved oxygen, and nutrients. The data gathered from the river sampling will be analyzed and provided to project stakeholders. In the event larval mussels are found in the river, Reclamation will work with the appropriate entity/entities to address potential introduction in the reservoir.

### Cultural Resources

The City of Durango will work with Reclamation and the Tribes to ensure protection of cultural resources pursuant to the Ridges Basin Cultural Resource Management Plan. Below is a schematic overview of the Section 106 Process that is required by the Bureau of Reclamation.

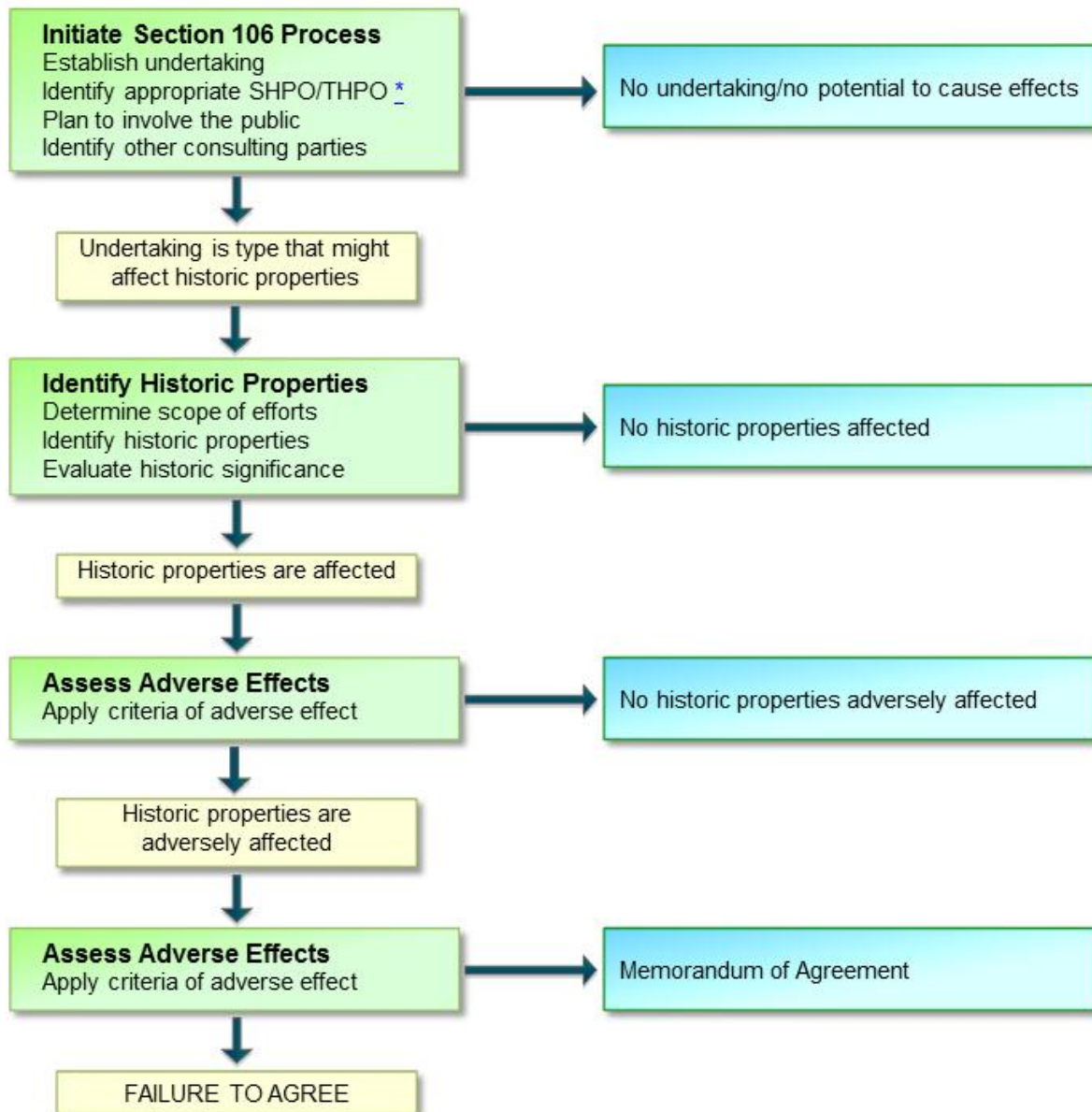
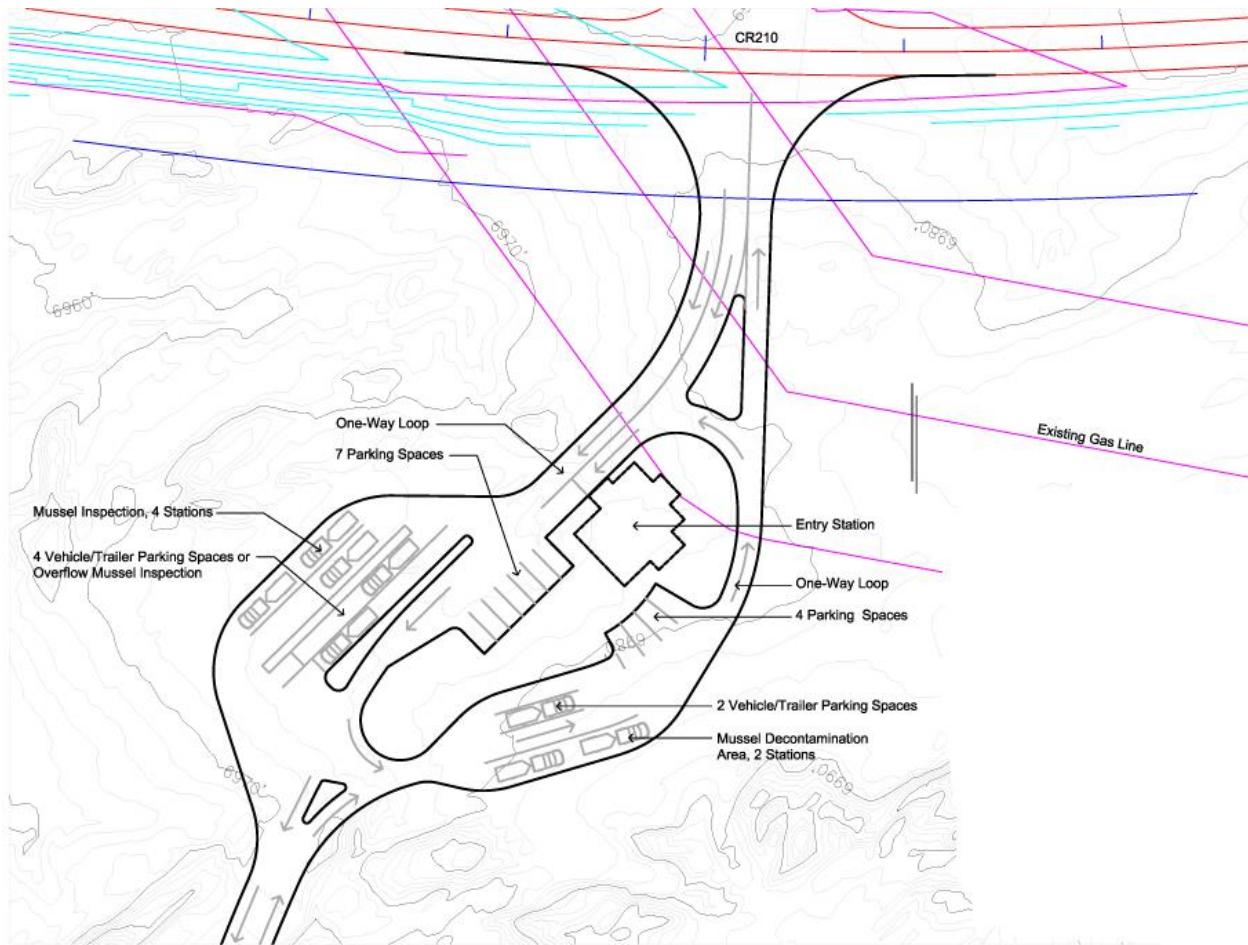


Figure 2: Cultural Resources Section 106 – National Historic Preservation Act

In general, the goal for future development of recreation amenities at Lake Nighthorse would be to avoid disturbance of existing cultural resources to the extent feasible.

### Entrance Area

The City of Durango will coordinate with the Committee to plan and develop an entrance station to include a temporary building(s) for staff to greet visitors to Lake Nighthorse, collect fees, conduct ANS boat inspections, equipment storage, etc. The entrance area will also provide a designated space for fueling motorized boats by the public with their personal portable gas containers.



**Lake Nighthorse - Entry Station**


City of Durango  
December 12, 2013 

Figure 3: Entry Station

## Overflow Parking

The City of Durango will coordinate with the Committee to plan and develop an overflow parking area to accommodate the parking demands for the site and eliminate the potential of parking congestion on the primary boat ramp access road. There will be a non-motorized trail adjacent to the road linking the overflow parking lot to the existing paved parking lot at the boat ramp.

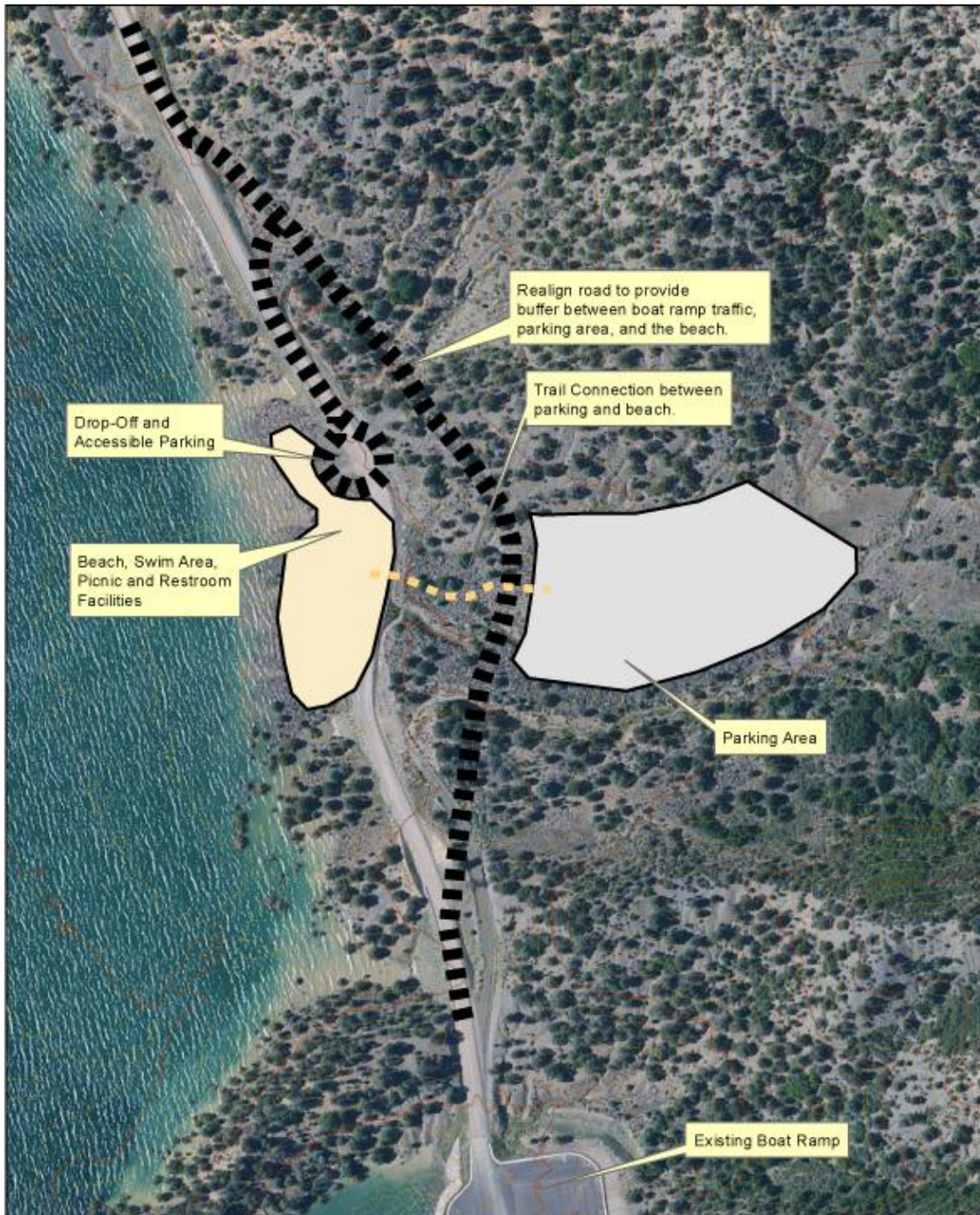


Figure 4: Overflow Parking Area

## Road Improvements

The City of Durango will coordinate with the Committee to plan and improve the boat ramp access road from the entrance at CR 210 to the paved parking lot at the boat ramp. The road will be re-graded and finished with a chip seal surface to mitigate dust and alleviate the wash-board condition of the existing gravel road.

## Boat Dock and Buoys

The City of Durango will coordinate with the Committee to plan and develop a courtesy dock system at the boat ramp to enable efficient, effective, and safe launching and removal of boats from the water. Safety buoys will be placed in the water to identify the slow wakeless zone near the boat ramp.



Figure 5: Boat Dock

## Commitments

The following environmental commitments and recommendations were identified in the FSEIS or developed to address specific concerns expressed by ALP Project stakeholders and the public:

- The lake and recreation area would be initially designated as day use only. The lake would be closed to all boating recreation from mid-November to mid-May.
- The City would provide law enforcement within the annexed area, and all areas outside of the annexation footprint will remain closed to public access unless a land manager can be secured.



- An ANS monitoring, education, and inspection program would be implemented.
- All motor boats would be required to be equipped with mufflers that maintain sound levels below 86 decibels on the A-weighted scale (dBA) at 50 feet from the boat and below 55 dBA in neighboring residential areas.
- The lake would be zoned and marked with buoys to denote no boating near the swim beach, the inlet, and the dam; no wake zones at the west end of the lake and around the lake shoreline; and open use areas where motorized boat travel up to 40 miles per hour (mph) would be allowed. At minimum pool (750 acres), the entire lake would be zoned as a no wake zone.
- Breakwaters would be constructed at the swim beach and boat ramp areas.
- Swimming, wading, snorkeling, scuba diving, rafting, or tubing would be prohibited within 300 yards of the dam and inlet structure; within 100 yards of buoys or barriers marking public access limits; at the boat dock and boat launch site; and in designated mooring areas.
- Motorized personal watercraft (i.e. jet skis); houseboats that are used as a human dwelling; cabin cruisers with full living quarters on board, including plumbing; and open-air-exhaust boats would not be allowed on the lake.
- All boats would be required to operate at safe speeds, not exceeding 40 mph in open use zones and not exceeding 5 mph in no wake zones.
- No fueling would be allowed on the lake, and all fueling would be required to occur at the entrance station.
- Water quality was monitored for four years after construction (lake filling) was completed. This data will provide a baseline for future monitoring. Potential pollutants from combustible engines (benzene, toluene, ethyl benzene, and xylenes) would be monitored on a regular basis.
- Scuba diving would require the use of a diver's flag to warn other boaters.
- Water-skiing would be allowed only in areas of the lake zoned for open use.
- Flotation devices would be required for all persons being pulled or towed by a boat, and this activity would be prohibited within 500 feet of entrances, swim beach, and mooring areas, and within 100 feet of any person swimming, fishing, or diving; motorized boat travel would be required to proceed in a counterclockwise direction.
- Efforts would be made to avoid construction from May – July in the vicinity of elk calving areas.
- Snowmobiles, off-road vehicles, and aircraft would be prohibited. Facilities would be designed to prevent future erosion and sedimentation. All parking lots and roads would be set back a minimum of 150 feet from the full pool elevation and would provide treatment of runoff. A storm water management plan would be prepared and implemented, and best management practices would be installed prior to all construction activities in accordance with state and federal regulations.
- All lighting would be dark-sky compliant. Lighting would be solar-powered, to the extent feasible.
- All roadways open to public and other use would be graveled initially and paved as need arises and funding allows.
- All structures would complement the existing landscape with the use of natural materials; and utilities would be installed underground.
- All landscaping would consist of native and adapted vegetation.
- Structures would be constructed of fire-resistant materials, and locations of existing utilities would be verified prior to construction.

- Disturbance and removal of slow-growing trees, such as pinyon pine, juniper, and ponderosa pine, would be minimized to the extent possible.
- Dogs would be required to be kept on a 6-foot maximum leash.
- Reclamation would commit to providing trout to be stocked in Lake Nighthorse to provide a recreational fishery.
- Effects on cultural resources would be evaluated through the process outlined in the Ridges Basin Cultural Resource Management Plan in compliance with the National Historic Preservation Act Section 106. All areas to be disturbed would be field surveyed prior to construction disturbance, and construction monitoring would be conducted where deemed appropriate.
- Construction contractors would be required to implement measures to control fugitive dust and exhaust emissions during construction, such as water spraying of access roads and materials storage piles. Construction activities would be scheduled to avoid or minimize loud activities in the vicinity of golden eagle nesting areas during the nesting season.

## Future Recreation Development

It is anticipated that future phases of recreation development will include the following improvements. Expansion of recreation beyond the initial development described previously (see Figure 1) will only occur with coordination of the Committee and approval by Reclamation.

### Interpretive Displays/Education

In consultation with the Tribes, implement and support an education and outreach program to inform the public of the historical significance of Lake Nighthorse including the cultural resource stewardship responsibility, activities, and accomplishments.

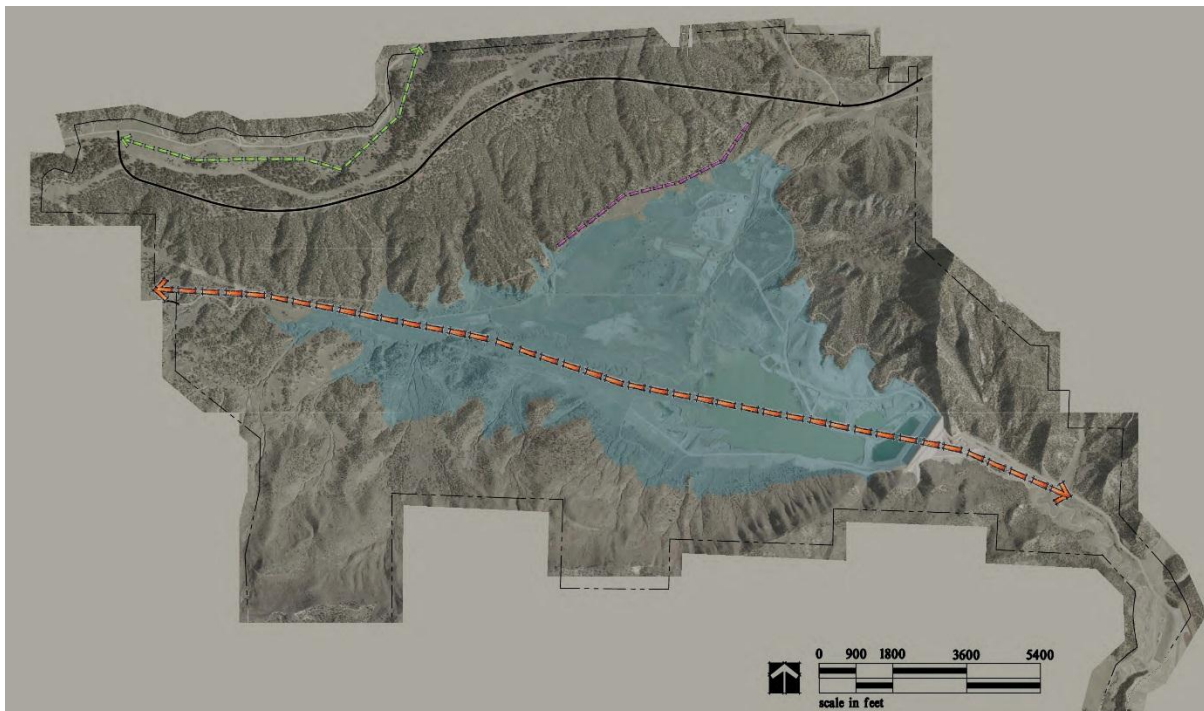


Figure 6: Interpretive Signage

### Natural Surface Trail

A natural surface trail may be constructed to connect Lake Nighthorse to the Animas River Trail, and a looped natural surface trail system would be constructed on the east side of the Lake linking recreational amenities and enhancing the user experience. Opportunities for linkage with other trail systems outside the project area would be considered.

### Swim Beach

A public swim beach may be constructed on the eastern shoreline, including shade structures with picnic areas and a restroom. A trail would link the swim beach to the overflow parking area with an underpass to avoid an at-grade crossing of the main boat ramp access road. Breakwater would be installed to mitigate wave action.



Figure 7: Beach Area Concept

### Breakwater

Two locations for breakwater may be installed. The initial installation would be located to alleviate wave action at the boat ramp for launching and the removal of boats from the water. The second location would be at the swim beach.

A public campground with access near the entrance station may be developed to accommodate multiple day visits to Lake Nighthorse. The campground would provide potable water, electricity and toilets and would accommodate both RV sites and tent camping. Campgrounds would have hosts and would be managed and patrolled 24 hours a day and seven days a week when open. Quiet hours would be designated from 10 p.m. to 6 a.m. Fire hazard mitigation plans would be developed and implemented and would specify, at a minimum, no fires outside grills or fire rings, no unattended fires, and no discharge or use of fireworks. The eventual possibility of campground development could be dependent on issues including but not limited to cultural resources, topography, and erosive soils.

### **Permanent Entrance Building**

A permanent park building may be constructed at the entrance station to include administrative office space, public restrooms and an informational display about Lake Nighthorse.

### **Picnic Areas**

Day use picnic areas with picnic shelters and a restroom may be located adjacent to the shoreline along the road to the dam. A gate would be installed on the road to the dam with signage to clarify no public access near the dam.

## **Conclusion**

The development and management of recreation at Lake Nighthorse is within reach and requires the following steps:

- Concurrence among stakeholders on the Lake Nighthorse Conceptual Recreation Plan prepared by the City of Durango.
- Completion of the Environmental Assessment for the Lake Nighthorse Recreation Plan.
- Execution of the Lease Agreement between United States of America and City of Durango, Colorado, for Administration of Recreation at Lake Nighthorse.
- Execution of the Lake Nighthorse Annexation Agreement between the City of Durango and the United States of America.
- Execution of the Memorandum of Agreement Among Animas-La Plata Operation, Maintenance, and Replacement Association and City of Durango and Ute Mountain Ute Tribe and Southern Ute Indian Tribe and Bureau of Reclamation for Recreation Planning and Development at Lake Nighthorse (to create the Committee).
- Finalization of planning and design, including environmental and cultural clearances, of the initial phase of recreation development to enable Lake Nighthorse to open for public use.
- Construction of the initial phase of recreation development projects to open Lake Nighthorse to the public.