Final
Supplemental Environmental Impact Statement
DOI-BLM-NV-0000-2013-0001-EIS

Ruby Pipeline Project

November 2013

U.S. Department of the Interior
Bureau of Land Management
Nevada State Office
Reno, Nevada

BLM

Nevada State Office

FINAL
SUPPLEMENTAL ENVIRONMENTAL IMPACT STATEMENT
RUBY PIPELINE PROJECT

DOI-BLM-NV-0000-2013-0001-EIS

Lead Agency: U.S. Department of the Interior, Bureau of Land Management
Nevada State Office, Reno, Nevada

Cooperating Agencies: U.S. Forest Service, Fremont-Winema National Forest
Nevada Department of Wildlife
Utah Division of Wildlife Resources
Wyoming Game and Fish Department

Project Location: Lincoln & Uinta Counties, WY
Box Elder, Cache & Rich Counties, UT
Elko, Humboldt & Washoe Counties, NV
Lake & Klamath Counties, OR

Abstract:

This Final Supplemental Environmental Impact Statement (SEIS) for the Ruby Pipeline Project was prepared by the Bureau of Land Management (BLM) in response to a ruling from the Ninth Circuit Court of Appeals (case nos. 10-72356, 10-72552, 10-72762, 10-72768, and 10-72775). The ruling directed the BLM to undertake a revised cumulative effects analysis of the Ruby Pipeline Project Final Environmental Impact Statement (EIS) as it related to the cumulative loss of sagebrush steppe vegetation and habitat. This Final SEIS contains supplemental information about the original and present condition of the sagebrush steppe vegetation and habitat, and analyzes the cumulative impacts of the Ruby Pipeline Project based on the supplemental information and comments on the Draft SEIS from interested stakeholders. This Final SEIS tiers to and incorporates by reference the information and analyses contained in the Ruby Pipeline Project Final EIS.

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RUBY PIPELINE PROJECT

Lincoln & Uinta Counties, WY
Box Elder, Cache & Rich Counties, UT
Elko, Humboldt & Washoe Counties, NV
Lake & Klamath Counties, OR

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ACRONYMS AND ABBREVIATIONS

BLM	Bureau of Land Management
Reclamation	Bureau of Reclamation
Certificate	Certificate of Public Convenience and Necessity
CEQ	Council on Environmental Quality
CFR	Code of Federal Regulations
EIS	Environmental Impact Statement
FERC	Federal Energy Regulatory Commission
Final EIS	Final Environmental Impact Statement
FWS	U.S. Fish and Wildlife Service
kV	kilovolt
NEPA	National Environmental Policy Act
PGH	preliminary general habitat
POD	Plan of Development
PPH	preliminary priority habitat
ROD	Record of Decision
Ruby	Ruby Pipeline, L.L.C.
SEIS	Supplemental Environmental Impact Statement
USFS	U.S. Forest Service
WWEC	West-wide Energy Corridor

INTRODUCTION

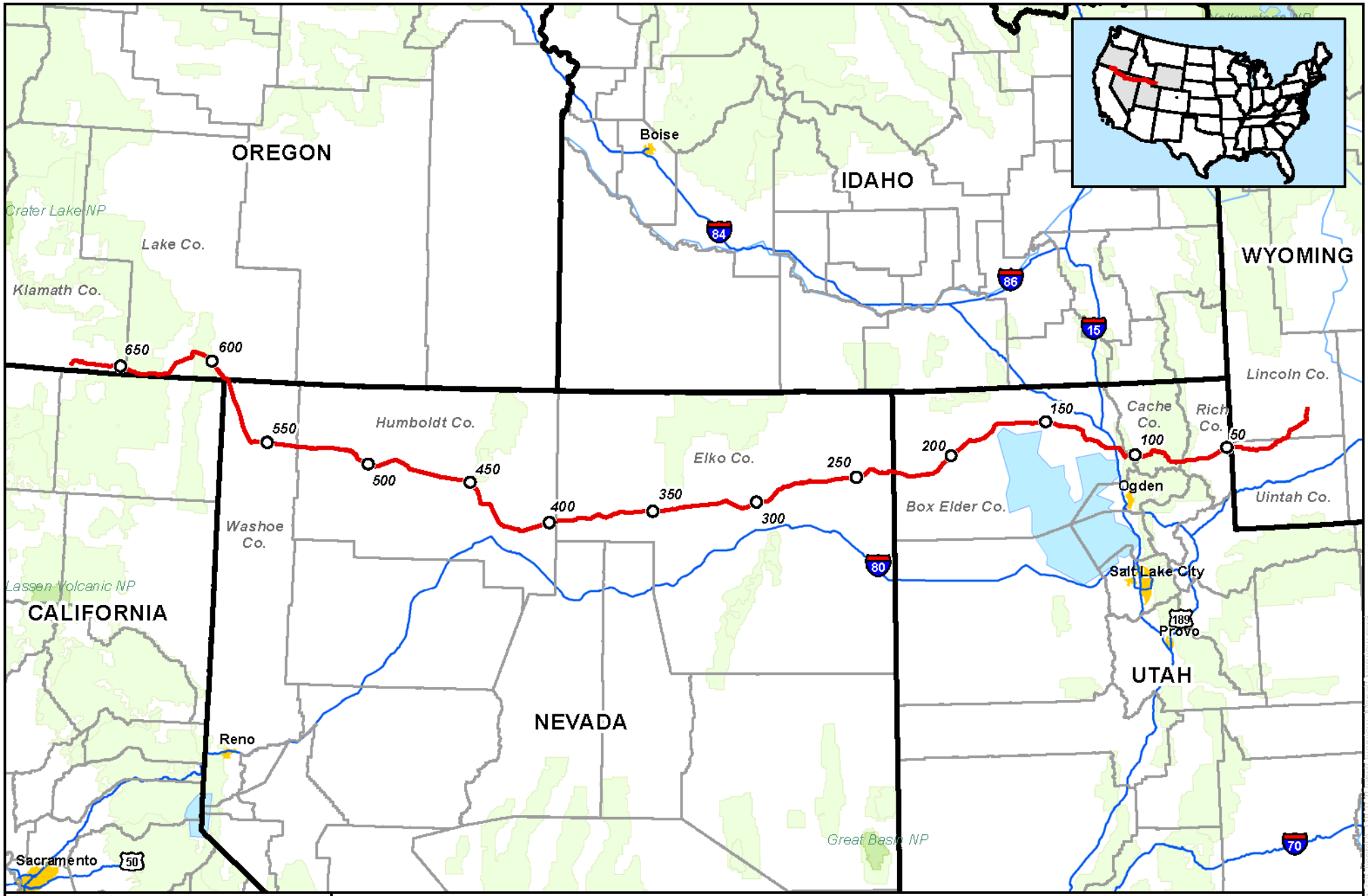
This DraftFinal Supplemental Environmental Impact Statement (SEIS) for the Ruby Pipeline Project was prepared by the Bureau of Land Management (BLM) in response to a ruling from the Ninth Circuit Court of Appeals (case nos. 10-72356, 10-72552, 10-72762, 10-72768, and 10-72775). The ruling directed the BLM to undertake a revised cumulative effects analysis of the Ruby Pipeline Project Environmental Impact Statement (EIS) as it related to the cumulative loss of sagebrush steppe vegetation and habitat. Because this cumulative effects analysis is intended to supplement only a specific part of the cumulative effects analysis in the Ruby Pipeline Project Final EIS, (Final EIS), it has been prepared in a manner consistent with that goal. This analysis tiers to and incorporates by reference the information and analyses contained in the Ruby Pipeline Project Final EIS.

The Ruby Pipeline Project is a 678-mile-long, 42-inch-diameter interstate natural gas pipeline beginning near Opal, Wyoming, running through northern Utah and northern Nevada, and terminating near Malin, Oregon (see Figure 1). The project crosses about 368 miles of federal land.

The Federal Energy Regulatory Commission (FERC) is the federal agency responsible for evaluating applications to construct and operate interstate natural gas pipeline facilities. Certificates are issued under Section 7(c) of the Natural Gas Act if the FERC determines that the project is required for the public convenience and necessity. On January 27, 2009, Ruby Pipeline, L.L.C. (Ruby) filed an application with the FERC for a Certificate of Public Convenience and Necessity (Certificate) for its Ruby Pipeline Project. The FERC prepared an EIS to assess the environmental impact associated with the proposed project. The BLM, Bureau of Reclamation, (Reclamation), U.S. Fish and Wildlife Service (FWS), U.S. Forest Service, (USFS), Natural Resource Conservation Service, Army Corps of Engineers, Utah Public Lands Policy Coordination Office, and Lincoln County (Wyoming) Board of County Commissioners participated as cooperating agencies in the preparation of the EIS because of jurisdiction over part of the project area or because of special expertise with respect to environmental resources in the project area.

The BLM adopted the EIS in accordance with Title 40, Code of Federal Regulations (CFR), Section 1506.3 to meet its responsibilities under the National Environmental Policy Act (NEPA).

The Ruby Pipeline Project was approved by the FERC on April 5, 2010 and the Right-of-Way Grant and Plan of Development (POD) were approved by a BLM Record of Decision (ROD) on July 12, 2010. The BLM Nevada State Director, as the designated federal official, signed the ROD and authorized the right-of-way for the construction, operation, maintenance, and termination of the pipeline and associated facilities across lands under jurisdiction of the BLM, the U.S. Forest Service, the Bureau ofUSFS, Reclamation, and the FWS in the Wyoming, Utah, Nevada, and Oregon. Construction started in the summer of 2010 and was completed in the summer of 2011. The pipeline went into service on July 28, 2011.



Milepost

Ruby Pipeline

0 30 60 Miles

1 inch = 60 miles

Figure 1

Ruby Pipeline Project

Project Location Map

Source: Z:\Clients\A_D\CIG\Ruby\Overview_Map\OverView.mxd

Date: (5/8/2013)

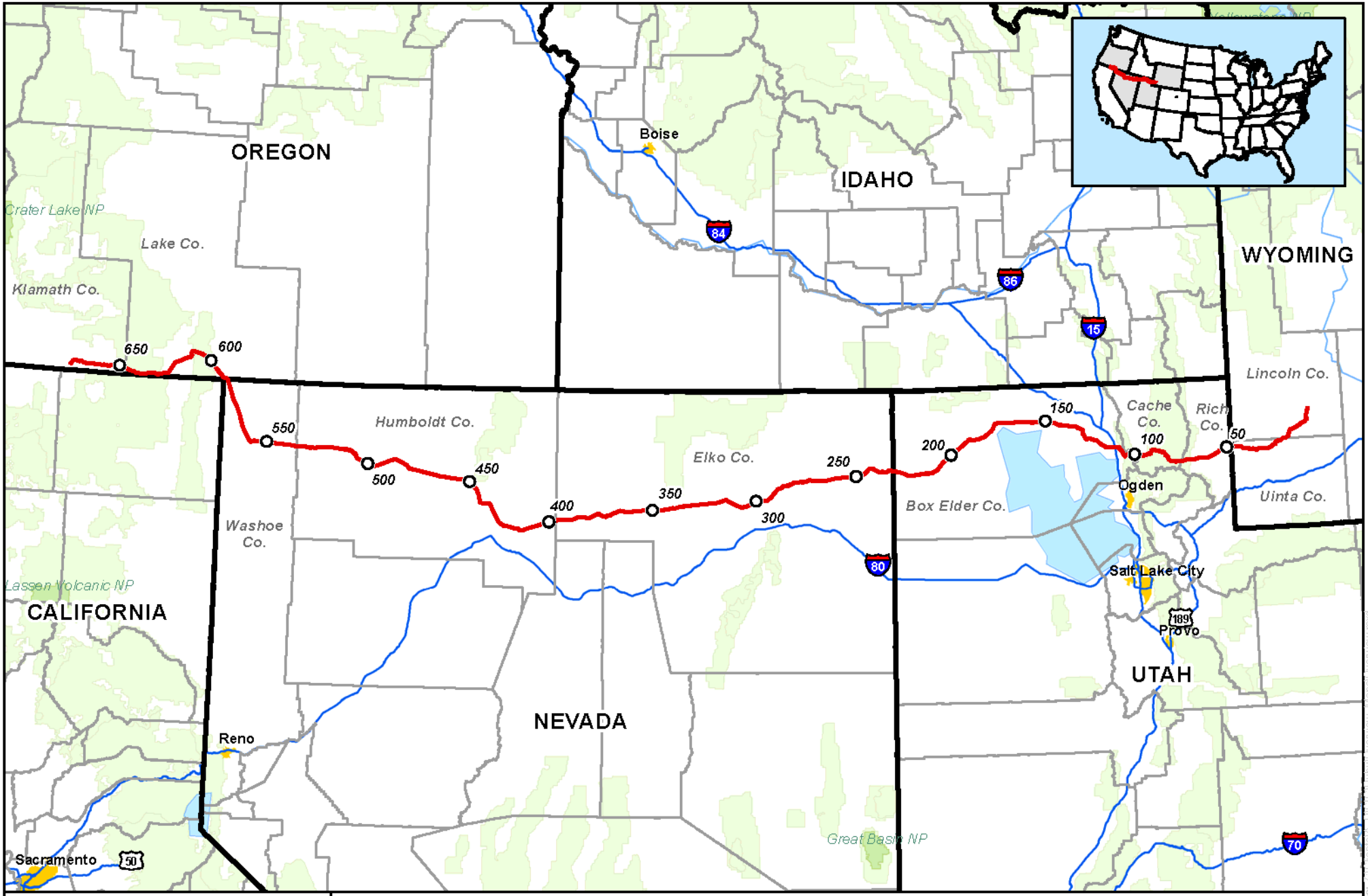


Figure 1
Ruby Pipeline Project
Project Location Map

Source: Z:\Clients\A_D\CG\Ruby\Overview_Maps\Overview.mxd
Date: (9/27/2013)

The Center for Biological Diversity, Defenders of Wildlife et al.,, and Summit Lake Paiute Tribe, among other groups, filed petitions for review of the FWS's Biological Opinion and the BLM's ROD in the United States Court of Appeals for the Ninth Circuit. In October 2012, the Ninth Circuit denied most of the petitioners' challengesclaims, including all claims brought under the National Historic Preservation Act, and the Clean Water Act, except for two challenges to the Biological Opinion and one challenge to the BLM's ROD.

In a published opinion, the court remanded and vacated the Biological Opinion to the FWS, and remanded and vacated the BLM's ROD because it relied on the Biological Opinion. The court held that FWS's consideration of Ruby's Endangered Species Act Conservation Action Plan measures as cumulative effects in the 2010 Biological Opinion was arbitrary and capricious. The court also found that the 2010 Biological Opinion did not adequately consider whether groundwater withdrawals associated with hydrostatic testing and dust abatement would impact listed fish that occur in surface waters.

In an unpublished opinion, the court remanded the ROD to the BLM to undertake a revised cumulative effects analysis as it relates to the cumulative loss of sagebrush steppe vegetation and habitat. In the unpublished opinion, the court found that the Final EIS did not provide sufficient quantified or detailed data about the cumulative loss of sagebrush steppe vegetation and habitat and did not provide information on how much acreage sagebrush steppe used to occupy, or what percentage has been destroyed.

The court subsequently stayed vacature of the FWS's Biological Opinion until the FWS issues a revised Biological Opinion and the BLM's ROD until the BLM issues a revised ROD, each on a schedule approved by the court. The BLM is providing a 45-day comment period on the Draft SEIS. At the close of that comment period, the BLM will review and respond to comments, and prepare the Final SEIS for publication, before issuing a new ROD in November of 2013.

On July 5, 2013, the BLM published a Notice of Availability announcing the availability of the Draft SEIS that evaluated the cumulative loss of sagebrush steppe vegetation and habitat and provided information on how much acreage sagebrush steppe used to occupy and what percentage has been destroyed. The release of the Draft SEIS initiated a formal 45-day public comment period that ended on August 19, 2013. The public was asked to submit comments via email, regular mail, or the ePlanning NEPA Register. The BLM encouraged interested parties to submit substantive comments.

The BLM received 31 submissions from the public, agencies, tribes, organizations, and businesses during the comment period. Substantive comments were considered during preparation of this Final SEIS. Appendix A summarizes the comments and the responses to those comments.

PURPOSE AND NEED

The purpose and need for the Ruby Pipeline Project remains unchanged from that stated in the Final EIS. As directed by the United States Court of Appeals for the Ninth Circuit, in Center for Biological Diversity et al. v. BLM, Case Number 10-72356 (2012) (consolidated), The BLM has prepared this DraftFinal SEIS for the Ruby Pipeline Project to respond to the court's

directionruling described above and to provide a cumulative effects discussion of sagebrush steppe vegetation and habitat that more thoroughly meets the requirements of the NEPA. This DraftFinal SEIS specifically includes quantified and detailed data about the cumulative loss of sagebrush steppe vegetation and habitat, and information on how much acreage sagebrush steppe used to occupy and what percentage has been destroyed.

DECISION TO BE MADE

The Final EIS, in conjunction with this Draft SEIS and subsequent Final SEIS,This Final EIS will serve as the foundation for the BLM's decision on whether to reissue the BLM right-of-way granted to Ruby for the project and, if so, to determine under what terms and conditions, specifically whether additional post-construction mitigation is warranted.

CUMULATIVE EFFECTS

The NEPA requires that federal agencies consider the cumulative impacts of proposals under their review. According to Council on Environmental Quality (CEQ) regulations implementing NEPA, the scope of the environmental analysis must consider cumulative actions, even if they are seemingly insignificant, if they may have cumulatively significant impacts when viewed with the proposed action (Title 40, CFR, Section 1508.25). Cumulative impacts are defined by the CEQ as the impact on the environment that results from the incremental impact of the action when added to other past, present, and reasonably foreseeable actions regardless of what agency or person undertakes such other actions (Title 40, CFR, Section 1508.7). If significant adverse cumulative impacts are identified, cumulative impact analyses are used to determine if the project can be modified such that the impacts can be avoided or if additional or more appropriate project mitigation is necessary.

Cumulative Actions

This DraftFinal SEIS evaluates the impact of the Ruby Pipeline Project when added to other past, present, and reasonably foreseeable actions. Past actions have been aggregated in order to describe the impact of historic activities on the existing environment. The CEQ explicitly does not require that all actions be individually described since the impacts of previous and ongoing actions are represented in the existing environment, which is already described in the environmental analysis [1]. Consistent with the CEQ's guidance, the Ninth Circuit Court of Appeals in 2008 held that an agency may aggregate its cumulative effects analysis of past projects pursuant to CEQ regulations, and that in doing so, the analysis of cumulative impacts of historical events satisfies the "hard look" standard [2]. This DraftFinal SEIS uses that approach. For the purpose of this DraftFinal SEIS, past actions that have been attributed to sagebrush steppe disturbance generally are: conversion to cropland and other development (including mining and energy projects); livestock grazing (cattle and sheep); grazing by wild horses and burros; the introduction of non-native plants (mainly cheatgrass (*Bromus tectorum*)); changes in wildfire cycles; and juniper-pinyon encroachment.

The starting point for identifying present and reasonably foreseeable future actions in this DraftFinal SEIS was the list of actions in the cumulative impact analysis in the Final EIS (see page 4-295). This includes projects with potential to disturb sagebrush steppe vegetation within the

same counties crossed by the Ruby Pipeline Project. The counties crossed by the Ruby Pipeline Project represent a reasonable area of impact where the projects could interact with each other in the sagebrush steppe ecosystem. This is also referred to as the "cumulative impact area" in this DraftFinal SEIS. The Final EIS also used county boundaries to define the geographic extent of the analysis in the Final EIS because "effects of more distant projects… would not contribute significantly to impacts associated with the proposed project." The list from the Final EIS was updated based on new information available to the BLM. Updates included removing future actions that had been cancelled, as well as adding new actions that were not previously known or planned. To be considered "reasonably foreseeable," a proposed project applicant must have applied for a permit from local, state, or federal authorities or the project must be publicly known. The temporal extent of the analysis covers the expected duration of direct and indirect impacts from the projects. Table 1 lists present and reasonably foreseeable future actions that may cumulatively impact sagebrush steppe vegetation and habitat in the cumulative impact area.

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
ENERGY PROJECTS				
Bryant Mountain Pumped Storage Hydroelectric	Klamath, OR	Enlargement of an existing upper reservoir; construction of a new lower reservoir; and installation of a subterranean powerhouse, power tunnels, and electric transmission lines	2,030	Unknown
Canada – Pacific Northwest – Northern California Transmission Project	Klamath, OR	Installation of an approximately 1,000-mile-long electric power line from British Columbia to California	4,400	2009 – 2015
China Mountain Wind Project	Elko, NV	Eight existing and construction of three proposed meteorological towers to support development of a 185-turbine wind farm	50	Unknown
Energy Gateway Project	Lincoln, WY Uinta, WY Box Elder, UT	Installation of an approximately 1,900 miles of new electric power lines across the western United States	6,900	2007 – 2014
Eureka Pipeline Project	Elko, NV	Installation of an approximately 17-mile-long pipeline from the terminal of NEPPNorth Elko Pipeline Project at Barrick to Gold Quarry	120	2014
Lorella Pumped Storage Hydroelectric	Klamath, OR	Construction of an upper reservoir, lower reservoir, spillways, powerhouse, power tunnels, and a 4-mile-long electric transmission line	600	Unknown
Mary's River Oil and Gas Development	Elko, NV	Drilling up to 20 oil and gas wells and construction or upgrade of new access roads to the wells	200	2014 – 2034
Midnight Point and Mahogany Geothermal Exploration Project	Lake, OR	Drilling, testing, and monitoring of up to 16 geothermal wells, including improvement to existing access roads and the installation of new access roads	60	2013 – 2016
Moxa Arch Area Infill Gas Development Project	Lincoln, WY Uinta, WY	Installation of up to1,861 new natural gas wells and the installation and operation of additional ancillary facilities in southwestern WY	12,123	2010 – 2020

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
North Elko Pipeline	Elko, NV	Installation of an approximately 24-mile-long, 12-inch-diameter natural gas pipeline from the Ruby Pipeline at a main line valve near Willow Creek Reservoir to the Barrick Goldstrike mill	250	2013
Oregon Community Wind Energy Project	Lake, OR	Construction of 6 or 7 wind turbines near Big Valley and associated power line right-of-way paralleling Deep Creek to Adel Substation	<10	2014 – 2015
Pacific Connector Pipeline Project	Klamath, OR	Installation of an approximately 230-mile-long natural gas pipeline from near Malin, OR to an liquefied natural gas export terminal on the coast	8,100	2015 – 2017
Pacific Direct Current Intertie Upgrade	Lake, OR	Maintain and upgrade the existing Bonneville Power Administration power line from Columbia River south to the northern NV border	4,800	2013 – 2015
Ruby Interconnect Pipeline	Uinta, WY	Installation of an approximately 5.3-mile-long, 16-inch diameter natural gas pipeline extending from the Canyon Creek Compressor Station to a interconnect meter with the existing Ruby Pipeline	100	2012 – 2013
Ryckman Creek Storage Field Project	Uinta, WY	Construction of a new natural gas storage facility involving up to 10 new wells and 9 miles of piping that would have an initial working gas capacity of 19 billion cubic feet	155	2011 – 2013
Sheep Mountain Powerline	Uinta, WY	Installation of an approximately 2.5-mile-long, 13.8 kilovolt (kV) overhead electric distribution line from the Chevron Distribution Interconnect to the Ruby Interconnect Metering Station	12	2012 – 2013
Southwest Intertie Project	Elko, NV	Installation of an approximately 515-mile-long electric power line from southern ID to southern NV	2,500	2009 – 2013
Swan Lake Pumped Storage Hydroelectric	Klamath, OR	Construction of an upper reservoir and two dams; a lower reservoir and two dams; large diameter hydraulic conveyance; a powerhouse; a transformer gallery; a switchyard; 33 miles of electric transmission line; and access roads	2,060	Unknown
Zephyr Transmission Line Project	Lincoln, WY Elko, NV	Installation of an approximately 950-mile-long electric power line from WY to southern NV	6,600	2017 – 2020
		ENERGY PROJECT TOTAL	**51,069**	
MINING, MINERAL EXPLORATION & RELATED ACTIVITIES				
Adelaide Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, and drill pads	200	2013 – 2017
Angel Wing Mineral Exploration	Elko, NV	Hardrock mineral exploration activities including cross country travel, roads, and drill pads	818	2014 – 2019

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
Arturo Mine	Elko, NV	Expansion of existing gold mine, including expansion of the existing open-pit; construction of two new waste rock disposal facilities; construction of a new heap leach pad and gold processing facilities; upgrading and re-aligning haul road; construction and/or relocation of support facilities; construction and installation of new power transmission lines; and continued surface exploration within the project area	2,775	2013 – 2021
Buffalo Mountain Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	25	1992 – 2015
Chimney Creek North Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	250	1994 – 2024
Converse Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	50	1998 – 2018
Haystack Coal Mine	Uinta, WY	Open pit coal mine, including access road and power lines	600	2012 – 2013
Hollister Underground Mine	Elko, NV	Transitioning of existing underground exploration project into an underground gold and silver mining operation; existing facilities, such as the portal, water treatment facilities, rapid infiltration basins, waste-rock storage facility, and shop would be utilized; proposed facilities include a production shaft, road improvements, the construction of 11.6 miles of electric power transmission lines, continued surface and underground exploration, water removal of up to 1,100 gallons per minute, the discharge of water into Little Antelope Creek, and construction of ancillary facilities	222	2013 – 2033
Huntington Valley Seismic Survey	Elko, NV	The 3-D seismic program would gain a better understanding of the subsurface geology to determine if there is oil and gas potential and to determine the best locations for exploratory drilling	650	2013
King's Valley Uranium Exploration	Humboldt, NV	Mineral exploration activities, including cross-country travel, roads, drill pads, and trenches	250	2013 – 2023
Kinsley Mineral Exploration	Elko, NV	Hardrock mineral exploration activities, including cross country travel, roads, and drill pads	2,830	2013 – 2018
Long Canyon Mine	Elko, NV	Gold mining operations, including open-pit mine, would include one open pit, a heap leach pad, one waste rock dump, a tailings storage facility, aan approximately 43-mile-long, 12-inch-diameter, natural gas pipeline, and other ancillary facilities	1,600	2013 – 2027

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
Marigold Mine	Humboldt, NV	Hardrock mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities	2,100	1988 – 2020
Midas Mine	Elko, NV	Expand underground capabilities in the vicinity of the Midas mine, including constructing and operating up to seven ventilation raises, one portal, access roads, a haul road from the portal, power lines to the ventilation raises, and surface exploration activities	80	2013 – 2018
Pinson Mine	Humboldt, NV	Hardrock mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities; underground operations are continuing on private land; those operations include administrative sites and other ancillary facilities	1,050	1983 – 2020
Pinson Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	60	1997 – 2018
Preble Mine	Humboldt, NV	Open-pit mining operation, waste-rock disposal areas, heap-leach pads, other areas for processing, and other ancillary facilities	220	1984 – 2015
Rabbit Basin Sunstone Mineral Exploration	Lake, OR	Feldspar mineral exploration activities including cross-country travel, access roads, and excavation	80	2013 – Foreseeable Future
Rossi Mine Expansion	Elko, NV	Barite mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities	1,900	2015
Sleeper Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities including cross-country travel, roads, drill pads, and trenching	150	2003 – 2023
Snowstorm Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, and drill pads	200	2014 – 2024
Trenton Canyon Mine	Humboldt, NV	Hardrock mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities	2,700	1993 – 2015
Trenton Canyon Mineral Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	950	1995 – 2023
Tucker Hill Perlite Mine	Lake, OR	Expansion of an existing 23-acre perlite mine to 70 acres with activities consisting of quarry expansion; drilling and bulk sampling (including drill roads and pad); and removal and stockpiling of growth media	70	2013 – 2028

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
Turquoise Ridge JV Mine	Humboldt, NV	Hardrock mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities	2,000	1987 – 2035
Twin Creek Mine	Humboldt, NV	Hardrock mineral mining operations, including open-pit mines, waste-rock disposal areas, heap-leach pads, other areas for processing, administrative sites and other ancillary facilities	13,300	1986 – 2018
Washoe County Gravel Pits	Washoe, NV	Renewal of up to 17 existing gravel pit licenses, including expansion of up to 13 existing gravel pits	130	2012 – 2022
Western Lithium Clay Mine	Humboldt, NV	Hardrock mineral mining operations, including an open-pit mine, waste-rock disposal area, and an area for processing, sorting, storage, and shipping of product	110	2014 – 2034
Western Lithium Exploration	Humboldt, NV	Hardrock mineral exploration activities, including cross-country travel, roads, drill pads, and trenching	75	2010 – 2015
		MINING, MINERAL EXPLORATION & RELATED ACTIVITIES TOTAL	**35,445**	
LIVESTOCK GRAZING & WILD HORSE ECO-SANCTUARY				
Livestock Grazing	All Counties	Permit issuance and renewal for public land open to grazing	22,158,000	2013 – Foreseeable Future
Northeast Nevada Wild Horse Eco-Sanctuary	Elko, NV	Establish a privately operated eco-sanctuary to accommodate up to 900 non-reproducing wild horses (all one sex or sterilized)	525,000	2014 – Foreseeable Future
		LIVESTOCK GRAZING & WILD HORSE ECO-SANCTUARY	**22,683,000**	
RESTORATION & HABITAT IMPROVEMENT PROJECTS				
Aspen Enhancement Warner*	Lake, OR	Management activities to enhance aspen stands	500	2011 – Present
Cheatgrass and Other Weed Species Treatment Elko Noxious Weeds* Lake Co. Medusahead* Paradise Medusahead	All Counties	Cheatgrass and other weed species treatment to reduce the risk of wildfires by reducing undesirable dense grassy cover and promoting perennial herbaceous species; may be accomplished by mowing or hand thinning, herbicide spraying, high intensity short duration grazing, and seeding with native grasses	>100,000	2013 – Foreseeable Future

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
Creek and Riparian Enhancement Deming Ranch* Fourth of July* Holiday Ranch* Honey Creek Fish Psg.* Houret Ranch* Mary's River Div.* N. Fork Willow Rd.* Pitch Log Creek* Taylor Div.* Thomas Creek* Trib. N. Fork Willow* Upper Lost River* Upper Willow Utley Weir* Willow Creek Fish Psg.*	Elko, NV Washoe, NV Lake, OR Klamath, OR	Habitat restoration project, including adding passage and screening to creek diversions, stream bank stabilization, and riparian area restoration	>12,300	2005 – 2013
Fire Emergency Stabilization and Rehabilitation Projects Box Elder* Buckskin Fire Buffalo Fire China Garden Coyote Point Dixie Eden Valley Elko Wildfire* Hanson Fire Holloway Fire* Horse Creek Hot Springs Izzenhood Long Canyon Fire Lost Fire* Martin Creek North Red Cow Rock Creek Santa Rosa Smith Spring Creek Thomas Canyon Tom's Basin Wildfire* Tuscarora* Virgin Creek Water Pipe Weiland	All Counties	Sagebrush and bitterbrush planting, seeding, exclosure rebuilding, etc.	>150,000	2013 – Foreseeable Future
Fuelbreak Mowing Able Creek Brown's Valley China Garden Highway 95 Highway 140 Highway 290 Highway 447 Paisley Desert Paradise Valley Provo Stonehouse	All Counties	Fuelbreak mowing at various locations immediately adjacent to existing roads to prevent large-scale wildfires in sagebrush habitat	Unknown	2013 – Foreseeable Future

TABLE 1 – PRESENT AND REASONABLY FORESEEABLE ACTIONS WITHIN THE CUMULATIVE IMPACT AREA

Project / Activity†	County & State Where Project Coincides with Ruby Pipeline Project	Description	Approx. Size (acres)	Date of Project
Grazing Exclosure Antelope Creek* Bar 2 Ranch* Bull Spring* Nut Mtn. & Calcutta* Pinto Springs River Springs Ranch*	Washoe, NV Lake, OR Klamath, OR	Exclusion area from livestock grazing to allow sagebrush and/or riparian habitat recovery	425	2013
Juniper Reduction Big Bally* Box Elder Sage-Grouse* Bridge Creek Bull Creek Corral Allotment Corral & Home Camp* Crawford Mountain* Express Canyon* Green Mountain Grouse Creek* Hayes Butte Highway 31 Hopeless* Horse Camp Rim* Lost River Basin * North Grouse Creek* North Warner* Sage-Grouse Riparian* Silver Creek South Warner Rim* Southwest Gerber Vya Willow Valley East*	Box Elder, UT Rich, UT Washoe, NV Lake, OR Klamath, OR	Juniper reduction at various locations using hand, mechanical, and fire in primarily sagebrush steppe to improve habitat	>158,000	2013 – Foreseeable Future
Sage-grouse Diversion Elko* Humboldt*	Elko, NV Humboldt, NV	Install diverters on up to 428 miles of fence to deter sage-grouse collisions	N/A	2013 – 2015
		RESTORATION & HABITAT IMPROVEMENT PROJECTS TOTAL	**>420,725**	

† By way of comparison, the Ruby Pipeline Project affected a total of about 15,739 acres during construction, of which about 9,225 acres was within sagebrush steppe.
* Identifies conservation projects funded partly or entirely by Ruby.

ENERGY PROJECTS

Energy projects identified in Table 1 can be categorized into: high-voltage electric transmission lines, oil and gas transmission pipelines, energy exploration and development, natural gas storage, pumped storage hydroelectric, and wind energy facilities.

High-voltage electric transmission lines carry electricity long distances and begin and end in substations that serve either electric generation or load centers. These transmission lines vary from 115 kV to 500 kV. Transmission lines can carry electricity from coal-fired power plants, hydroelectric power plants, solar power plants, and wind farms. Transmission line poles (or structures) usually are between 60 and 140 feet tall. Structures can be metal or wood, single-poled or multi-poled, and single-circuited (carrying one set of transmission lines) or double-circuited (with two sets of lines). Construction and operation of transmission lines requires a

linear right-of-way free of trees and other obstructions so that the poles and lines can be installed, accessed, and maintained. New access roads or improvements to existing access roads are frequently required for construction and operation activities. The right-of-way varies in width depending on the easement, the size of the poles, the presence of other nearby utilities, and the land use. With the exception of keeping the right-of-way free of trees and other obstructions, the right-of-way usually can be restored to its preconstruction condition after the electric transmission line is installed.

Oil and gas transmission pipelines are used to transport liquid petroleum products and natural gas long distances. These networks typically start at an initial injection station where product is injected into the line and end at a final delivery station where the product is distributed. Other major pipeline components include pump stations for liquids and compressor stations for natural gas that are used to help move the product through the pipe, block valves capable of isolating portions of the pipeline should a leak occur, and other valves and stations used for regulating pressure within the pipeline or allowing the product being transported to be delivered or inspected. Pipelines are typically buried within a designated right-of-way. The right-of-way varies in width depending on the easement, the size of pipe, the presence of other nearby utilities, and the land use. The construction right-of-way is usually restored to preconstruction conditions, except that the area directly over the pipeline is kept clear of deep-rooted vegetation to allow the pipeline to be safely operated, aerially surveyed, and properly maintained.

Energy exploration and development projects often involve drilling of wells from well pads on which drilling rigs, trucks, and production equipment is situated. A well pad generally consists of a few acres of land that is cleared, leveled, and surfaced for the equipment. Oil and gas development projects often require access roads, surface impoundments, waste gas flares, storage tanks, small-diameter gathering pipelines, and pump or compressor stations. Energy exploration and development also can include geophysical investigations, which may involve laying out 3-D seismic cable and driving vibration trucks off road.

Natural gas is usually stored underground, in large storage reservoirs. There are three main types of underground storage: depleted oil and/or gas reservoirs, aquifers, and salt caverns. Depleted oil and gas reservoirs account for a majority of storage facilities. These facilities usually consist of injection and recovery wells, access roads, pipelines, metering facilities, and compressor stations. A large facility may consist of numerous wells, roads, pipelines and compressors within fenced sites dispersed over the reservoir field.

Pumped storage hydroelectric is a type of power generation that stores excess electrical energy in the form of water potential energy. At times of low electrical demand, excess electricity is used to pump water into the higher reservoir. At times of high electrical demand, water is released back into the lower reservoir through a turbine to generate electricity. Pumped storage hydroelectric facilities typically consist of an upper reservoir, an intake tunnel leading from the upper reservoir to the powerhouse, a powerhouse with one or more turbines for generating electricity, a discharge tunnel leading from the powerhouse to a lower reservoir, and a control room. Although pumped storage hydroelectric is a net consumer of energy, the system increases revenue by using electricity when prices are lowest, storing it in the form of water potential energy, and then regenerating and selling electricity when prices are highest.

Wind energy facilities consist of a collection of turbines that are used for production of electric power. Turbines have power ratings ranging from 250 watts to 5 megawatts. On large-scale facilities, the turbines are interconnected by a communications network and a medium voltage (34.5-kV) collection system, typically buried underground, which carry power generated by the turbines to a substation. At the substation, this medium-voltage electrical current is increased in voltage with a transformer for connection to the high voltage transmission system which feeds into the existing grid. A large wind farm may consist of a few dozen to several hundred individual wind turbines, and cover an extended area of hundreds of square miles. Turbines can be added to an existing facility as electricity demand grows. Other components of wind energy facilities include a permanent system of access roads used for routine maintenance; operations and maintenance facilities; and a transmission line connecting the facility to the grid. Usually the existing land uses around the facility pads can be maintained during facility operation. The typical lifespan of a utility-scale wind energy facility is 20 to 30 years.

In total, the energy projects identified in Table 1 would disturb approximately 51,069 acres. The typical useful lifespan of energy facilities once constructed ranges from 20 to 50 years or longer. Depending on the type of facility being decommissioned, energy facilities may or may not be removed and the area reclaimed after their useful life.

In addition to known energy projects, there are many thousands of acres of oil and gas leases that have not yet been developed but may be developed at some time in the future. Although the leases are in place and development could technically take place at any time, the market drivers to exploit them are presently unknown. Therefore, it is not possible to quantify the additional amount of environmental impact due to other oil and gas development beyond those projects identified in Table 1. Further, before any lease is developed, the BLM would need to undertake site-specific environmental analysis.

MINING, MINERAL EXPLORATION, AND RELATED ACTIVITIES

The Mining Law of 1872 makes public lands that are open to mineral-entry available for development and extraction of metallic and nonmetallic locatable minerals. The law also encourages mining companies to initiate exploration and development of such minerals. Mining and mineral exploration activities often involve cross-country travel; road construction and improvement; drill pad construction and drilling; trenching; open-pit excavation; underground excavation; ventilation construction; leach pad development; milling facilities; waste rock dumps; tailing storage facilities; and administrative sites. Sites can range in size from just a few acres to several thousand acres. The typical lifespan of a mine is variable and can range from a few years to several decades. Mines are usually not fully reclaimed after the end of their useful life.

There is no requirement for notifying the BLM of casual use exploration and development activities that cause only negligible disturbance of public lands and resources. For activities other than casual use, either a notice (for activities 5 acres or less) or plan of operations (for activities greater than 5 acres) is required. Activities requiring notice are small and usually transitory by nature, and execution of the projects identified in the notices is unreliable. Therefore, they are not included in Table 1. Activities requiring a plan of operations, however, are larger, better known, and more reliable, and are included in Table 1. Preparation of a plan

of operations typically requires some level of NEPA analysis. In total, the mining and mineral exploration projects identified in Table 1 would disturb approximately 35,445 acres.

LIVESTOCK GRAZING AND WILD HORSE ECO-SANCTUARY

Within the counties crossed by the Ruby Pipeline Project, The BLM currently administers 1,101868 allotments totaling 22.2 million acres of land within the cumulative impact area. Permits and leases generally cover a 10-year period and are renewable if the BLM determines that the terms and conditions of the expiring permit or lease are being met and land health standards are being maintained. or if progress is being made toward meeting and maintaining land health standards. The BLM's overall objective in managing grazing is to ensure the long-term health and productivity of the land and to create multiple environmental benefits that result from healthy watersheds. The terms and conditions for grazing on BLM lands (such as stipulations on forage use and season of use) are identified in the permits and leases issued by the BLM. Grazing is expected to continue into the foreseeable future, although the location and amount of grazing that takes place each year on BLM-managed lands can be affected by such factors as drought, wildfire, and market conditions. Some of the 868 allotments within the cumulative impact area are known not to meet the standards for healthy rangelands and guidelines for livestock management [3] [4] . The grazing system on these allotments will be reviewed and modified, as necessary, if they are not meeting applicable standards for rangeland health when those permits come up for renewal.

In addition to commercial livestock, numerous wild horses and burros roam BLM rangelands in the western United States. The BLM's goal is to ensure and maintain healthy wild horse populations on healthy public lands. The BLM uses an "adoption program" as the primary tool for placing these animals into private care or into joint public-private sponsored eco-sanctuaries. A wild horse eco-sanctuary, known as the Northeast Nevada Wild Horse Eco-Sanctuary, is being proposed in Elko County, Nevada. This eco-sanctuary would be a privately operated facility that could accommodate up to 900 non-reproducing wild horses (all one sex or sterilized).

In total, livestock grazing and the wild horse eco-sanctuary identified in Table 1 would affect approximately 22,683,000 acres of land.

RESTORATION AND HABITAT IMPROVEMENT PROJECTS

A number of restoration and habitat improvement projects have been identified in the counties crossed by the Ruby Pipeline Project. These restoration and habitat improvement projects include activities such as cheatgrass treatment, post-fire stabilization and rehabilitation, fuelbreak mowing, juniper removal, meadow restoration, and grazing exclosures. Some of the projects are being undertaken using funds provided by Ruby as part of cooperative conservation agreements between Ruby, the BLM, and state agencies (see Appendix M of the Final EIS). In total, the restoration and habitat improvement projects identified in Table 1 could benefit more than 420,725 acres of sagebrush steppe.

Existing Affected Environment (and the Influence of Past Actions on the Existing Environment)

Sagebrush steppe is named after the most dominant plant found in its ecosystem, sagebrush, and the ecological region it represents, steppe – a dry, mostly treeless grassland. Sagebrush steppe is characterized by sagebrush shrubs interspersed among widely spaced bunchgrasses. It is host to a remarkable variety of plant and animal species [5]; over 400 species of plants and 250 species of animals reside in the ecosystem. Plants common to sagebrush steppe include: Wyoming big sagebrush (*Artemisia tridentata* ssp. *wyomingensis*), basin big sagebrush (*A. tridentata* ssp. *tridentata*), Lahontan sagebrush (*A. arbuscula* ssp. *longicaulis*), low sagebrush (*A. arbuscula*), mountain big sagebrush (*A. tridentata* ssp. *vaseyana*), bitterbrush (*Purshia tridentata*), and rabbitbrush (*Chrysothamnus nauseosus*). Animals commonknown to occur in sagebrush steppe include: greater sage-grouse (*Centrocercus urophasianus*), pronghorn (*Antilocapra americana*), mule deer (*Odocoileus hemionus*), burrowing owl (*Athene cunicularia*), and pygmy rabbit (*Brachylagus idahoensis*). Some animals of the sagebrush steppe require sagebrush to survive. Examples of sagebrush obligate species are sage-grouse, pygmy rabbits, sage thrashers (*Oreoscoptes montanus*), sage sparrows (*Artemisiospiza belli*), sagebrush voles (*Lemmiscus curtatus*), and sagebrush lizards (*Sceloporus graciosus*) [6].

TwoThree environmental factors required for sagebrush steppe are: (1) a highly variable semi-arid climate, (2) a prevalence of cold-season precipitation, and (23) long fire-free intervals [7] [8]. The highly variable semi-arid climate is characterized by inconsistency in annual precipitation, with rapid fluctuation between wet years that favor shallow, fibrous-rooted, herbaceous plants, and dry years that favor the more deeply rooted shrubs [7]. Sagebrush steppe is heavily influenced by cold-season storms, which support cool season bunch grasses and woody species in the herbaceous understory [8]. Long fire-free intervals range from 25 years [9] to 100 years [7] [10] and much longer [11].

Most sagebrush steppe soils are Xerolls [7]. Xerolls are a suborder of Mollisols (grassland soils with a thick, dark surface horizon), formed in a xeric (dry) moisture regime [12]. Soil characteristics of sagebrush steppe are important because, where vegetation has been highly disturbed, the soil profile can be used to identify the potential for recovery [7].

The amount of sagebrush steppe in North America is thought to vary between about 99 million acres [13] and 165 million acres [14]. Pre-settlement sagebrush steppe communities generally had a vigorous herbaceous layer of perennial grasses and forbs intermixed with a moderate sagebrush cover [7] [15] [16]. The patchwork of quality sagebrush areas remaining today is a landscape of habitat islands for sagebrush obligate species [17].

In 1999, Neil West [7] estimated the changes that have occurred to sagebrush steppe in the western United States since the time of European settlement. West divided the sagebrush steppe ecosystem into nine categories based on an estimated 111 million acres of pre-settlement sagebrush steppe vegetation and habitat [7] [18]. Of the nine categories, four represent intact to slightly depleted states of sagebrush steppe that could be restored via management approaches that require a lesser investment of energy resources [7]. These categories accounted for just over 30 percent of the total area (33.3 million acres) [7]. The remaining five categories represent substantial degradation that would require expensive and/or

risky resource investments, and accounted for about 70 percent of the total area (77.7 million acres) [7]. West observed that pristine sagebrush steppe ecosystems may no longer exist [7].

This DraftFinal SEIS evaluates the historic and current extent of sage-grouse distribution and habitat in order to estimate the historic and current extent of sagebrush steppe within the cumulative impact area. Sage-grouse distribution can be used as a proxy for sagebrush steppe in the cumulative impact area because the greater sage-grouse is strongly correlated with sagebrush steppe in the counties crossed by the Ruby Pipeline Project. The maps of *historic* sage-grouse distribution evaluated in this DraftFinal SEIS were compiled by Dr. Michael A. Schroeder, research biologist for the Washington State Department of Fish and Wildlife [19]. Schroeder's maps represent the sage-grouse's maximum distribution from the early 1800s to the late 1990s based on a variety of other sources and publications [19]. The maps of *current* sage-grouse habitat used in this DraftFinal SEIS were developed by the BLM and state agencies. These maps depict preliminary priority habitat (PPH) and preliminary general habitat (PGH) for the greater sage-grouse. PPH comprises areas that have been identified as having the highest conservation value to maintaining sustainable greater sage-grouse populations as identified by the BLM and state wildlife agencies [20]. These areas include breeding, late brood-rearing and winter concentration areas. PGH comprises areas of occupied seasonal or year-round habitat outside of priority habitat [20]. The maps of current sage-grouse habitat may include areas where the sagebrush component has been compromised by exotic grasses, conifer encroachment, and/or wildfire; however, the PPH and PGH designations provide a consistent metric across the cumulative impact area for areas that retain their importance to sagebrush obligate species within the sagebrush steppe ecosystem, particularly sage-grouse.

Based on sage-grouse maps, sagebrush steppe is estimated to have historically occupied about 30.8 million acres, or 76 percent, of the total land area within the cumulative impact area (see Figure 2). Today, it occupies about 19.3 million acres or 48 percent (see Figure 3). The loss of sagebrush steppe can be attributed to human causes beyond the natural disturbance cycles [21]. Conversion to cropland and other development (including mining and energy projects); livestock grazing (cattle and sheep); grazing by wild horses and burros; the introduction of non-native plants (mainly cheatgrass (*Bromus tectorum*)); changes in wildfire cycles; and juniper-pinyon encroachment are most frequently identified as main causes of loss and degradation.

CONVERSION TO CROPLAND AND OTHER DEVELOPMENT

Agricultural and other development resulted in historic losses of sagebrush steppe ecosystems in the western United States [22]. Biologists estimate that up to 17 percent of the original sagebrush steppe vegetation and habitat in the western United States has been lost to agriculture, urbanization, and other industrial development [23]. Sagebrush steppe is generally not considered suitable for farming without irrigation, and most farming in the cumulative impact area is by irrigated agriculture [24] [25]. Based on the latest agricultural census, there are about 1.4 million acres of cropland in the cumulative impact area, representing about 4 percent of the total land area [24]. This is a reduction from about 1.7 million acres reported in the 2002 census [24]. In addition to cropland, sagebrush steppe has experienced conversion for other purposes, including mining, energy extraction, road development, and urbanization [26] [27] [28]. An estimated 344,745 acres in the cumulative impact area (or about 1 percent of the total land area) has been developed for variety of non-agricultural uses [29].

LIVESTOCK GRAZING

Livestock grazing has resulted in direct and indirect impacts on sagebrush steppe. Prior to European settlement, grazing of sagebrush steppe was primarily by wildlife browse. European settlement, however, brought with it livestock grazing, mainly cattle and sheep. Livestock were

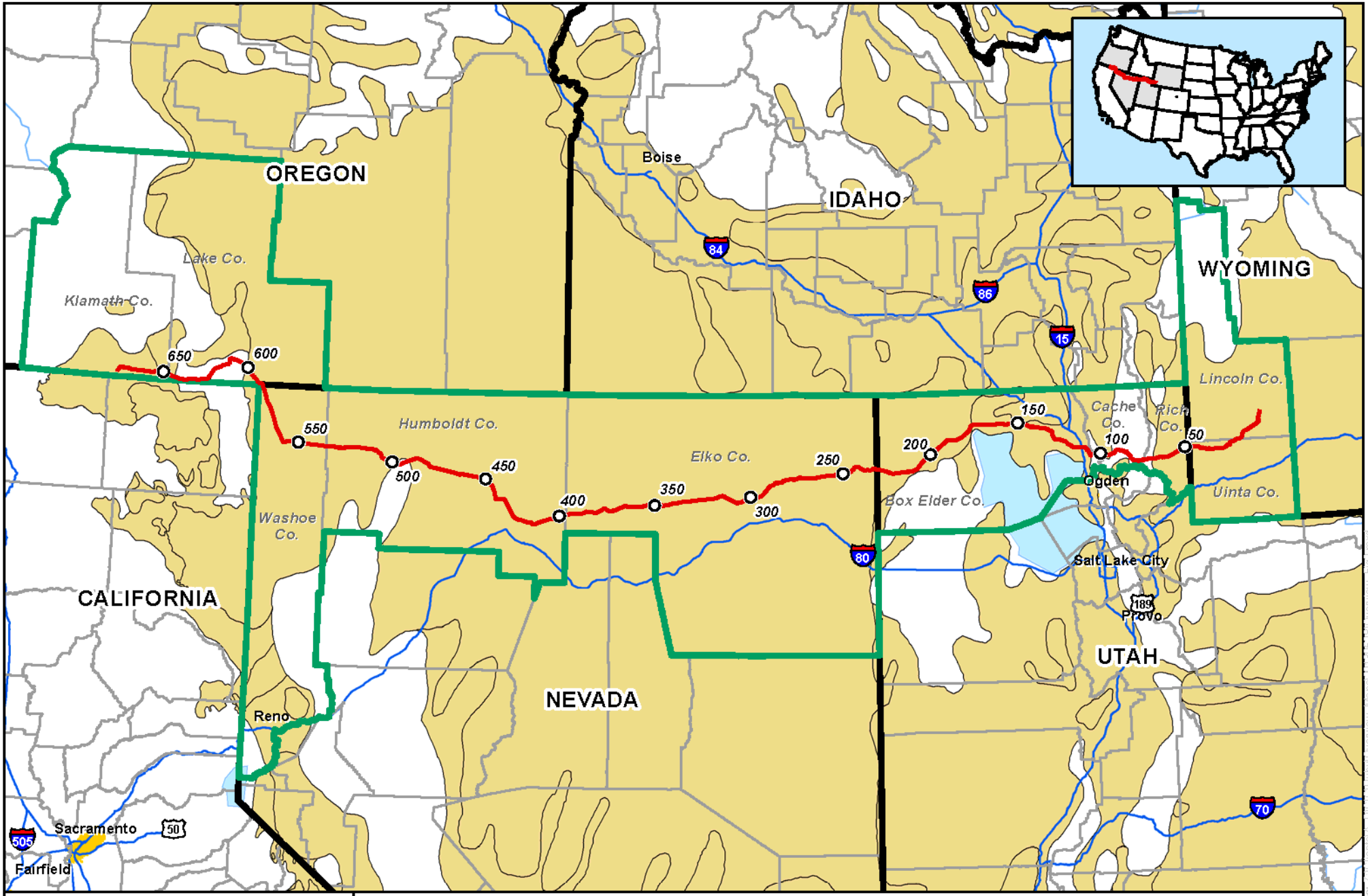


Figure 2
Ruby Pipeline Project
Historic Extent of Sagebrush Steppe within the Cumulative Impact Area

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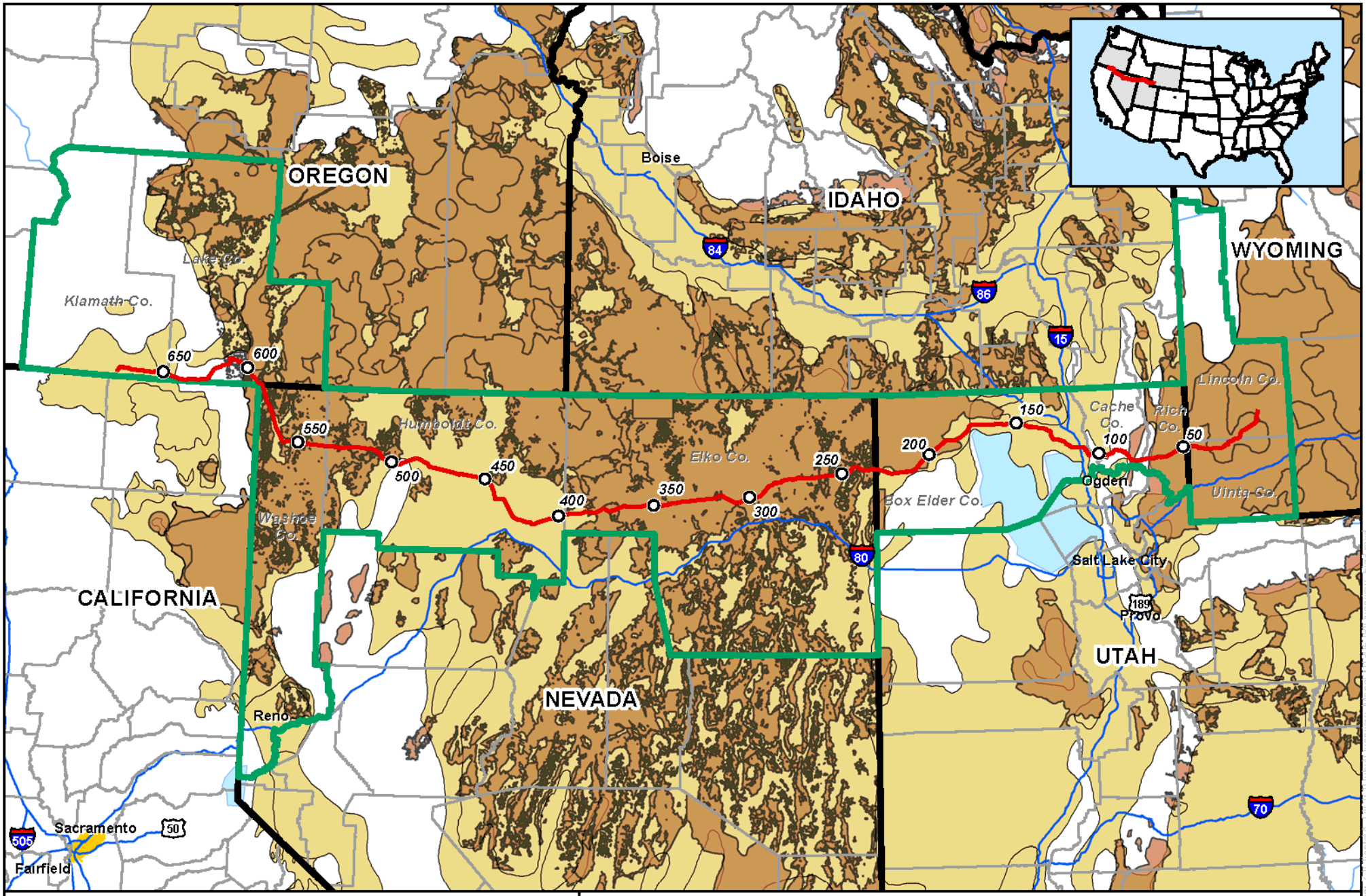

Milepost
Ruby Pipeline
Cumulative Impact Area
Current Sagebrush Steppe Range
Historic Sagebrush Steppe Range
N
0 32.5 65 Miles
1 inch = 65 miles

Figure 3
Ruby Pipeline Project
Current Extent of Sagebrush Steppe within the Cumulative Impact Area

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Date: (9/27/2013)

introduced into the West in the 1500s when the Spanish established missions [30]. The livestock industry in the western United States grew substantially in the years after the Civil War [31] and into the first part of the 1900s. In the early days, the animals roamed freely and were only rounded up for branding and marketing . The livestock industry grew rapidly due to the large profits created by a seemingly unlimited supply of free forage on federal lands [31]. By the late 1800s, rangeland in the western United States was severely overcrowded [31]. By the 1930s, drought and economic depression had taken hold of America, and the number of livestock in the West had decreased dramatically [32].

The unregulated grazing that took place before enactment of the Taylor Grazing Act of 1934 caused unintended damagechanges to the sagebrush steppe. In more recent yearsthe early days, the animals roamed freely and were only rounded up for branding and marketing [31]. The Final EIS prepared for the Ruby Pipeline Project recognized that grazing can be "highly destructive" to sagebrush habitat (page 3-36). Since passage of the Taylor Grazing Act, grazing practices have been revised to allow sagebrush steppe to be grazed and prosperwith much less impact. Today, laws that apply to the BLM's management of grazing on public lands include the Taylor Grazing Act of 1934, the NEPA of 1969, the Endangered Species Act of 1973, the Federal Land Policy and Management Act of 1976, and the Public Rangelands Improvement Act of 1978. On public lands, the BLM's overall objective is to ensure long-term health and productivity, using rangeland health standards and guidelines developed with input from citizen-based Resource Advisory Councils across the western United States. and other interested parties [33]. These standards and guidelines address maintaining and promoting adequate amounts of vegetative ground cover; subsurface soil conditions; riparian wetland function; stream channel morphology; hydraulic and nutrient cycling; seedling establishment; water quality; habitat for threatened, endangered, candidate, and other special status species; and native plant and animal communities [34]. Current healthy management techniques include methods such as seed dissemination, rest rotation, early season grazing, fencing to control livestock movement, and water development to improve livestock distribution across the landscape [33]. Livestock grazing can result in environmental benefits. For example, intensively managed "targeted" grazing can be used to control some invasive plant species or reduce the fuels that contribute to severe wildfires [33].

Livestock that graze native sagebrush steppe tend to focus on the more palatable herbaceous grasses and avoid the less palatable woody species, thus the sagebrush shrubs are freed from competition and achieve dominance relatively quickly (10 to 15 years) if left unchecked [7]. Historically, overgrazing by livestock resulted in a reduced herbaceous understory and a commensurate increase in sagebrush cover . In some cases, [17] [35] [36]. With virtually no herbaceous understory to help carry natural wildfires, the range became fireproofed [37] and the overly dense sagebrush propagated while limiting the establishment of native herbaceous perennials [38]. In some circumstances, this may have created habitat more favorable for some species such as mule deer and sage-grouse [39] [40]. But in others, the excessive overgrazing led to the disappearance of perennial grasses and a dramatic, self-perpetuating increase in sagebrush [38] and encroachment of adjacent juniper and pinyon forest. With virtually no herbaceous understory to help carry natural wildfires, the overly dense sagebrush propagated while limiting the establishment of native herbaceous perennials into some areas [37] [41]. Biologists estimate that approximately 70 percent of the area covered by sagebrush in the

western United States has been altered by livestock grazing [23]. This equates to about 21.6 million acres of historic sagebrush steppe within the cumulative impact area.

WILD HORSES AND BURROS

Wild horses and burros roam open rangelands throughout the western United States, and have done so for the past several centuries. Although the modern horse evolved in North America, it became extinct on the continent about 10,000 years ago [42]. In the 1500s, Spanish explorers reintroduced horses to North America as domesticated animals [43]. Over time, domestic animals either escaped from or were intentionally released by the early explorers and later settlers [44].

Wild horses and burros have almost no natural predators, and left unchecked, their herd sizes can double almost every 4 years [45]. By 1900, there were between an estimated 2 and 5 million feral horses in the United States [46]. However, their numbers quickly declined as ranchers competed with them for resources for their domestic cattle and sheep [47]. By the mid-1900s, their numbers fell drastically until intervention by the U.S. government with the passing of the Wild and Free-roaming Horses and Burros Act in 1971. With the passing of the Act, Congress declared that "wild free-roaming horses and burros are living symbols of the historic and pioneer spirit of the West; that they contribute to the diversity of life forms within the Nation and enrich the lives of the American people; and that these horses and burros are fast disappearing from the American scene." The U.S. government's management of wild horse and burro populations quickly became a controversial subject. On the one hand, many citizens recognize the animals as a treasured American icon and wanted them preserved. On the other hand, environmental advocates (public for land conservation, wildlife organizations, public land ranchers) see them as a potentially destructive non-native species with impacts similar to cattle and sheep grazing as well as competition for resources for livestock and native wildlife.

About 40,600 wild horses and burros roam BLM rangelands in the western United States as of February 2013 [45]. Of that total, over 11,000 are within the cumulative impact area. The BLM's goal is to ensure and maintain healthy wild horse populations on healthy public lands by managing wild horse and burro populations in accordance with the land's capacity to support them [48] in relation to a multiple use mandate of the public lands. Like livestock, wild horses and burros tend to focus on the more palatable herbaceous grasses and forbs and tend to avoid the less palatable woody species. Historically, overgrazing by wild horses and burros has reduced or eliminated herbaceous understory and facilitated an increase in sagebrush cover. With no natural predator to control their numbers, wild horse and burro populations continue to increase at an annual rate of approximately 20% and in many areas exceed their established appropriate management levels (AMLs) and are impacting key perennial forage species and critical riparian areas. The BLM is currently restricted in its management of wild horse and burro populations due to reduced budgets and off-range holding space limitations which has drastically reduced theiragency efforts to control the populations and alleviate the impacts on the public lands. Controlling population growth rates is a key management priority and the BLM is actively researching techniques that can be used in future management on the public lands.

INVASIVE SPECIES

The reduction in native ground cover from livestock overgrazing in the early days also created conditions suitable for the invasion of nonnative annual grasses [17] [35] [36]. Grazing and livestock trampling also resulted in the destruction of biological surface crusts, which created conditions more suitable for introduction and spread of non-native plants [49]. Cheatgrass in particular gained a strong foothold in the sagebrush steppe ecosystem and is widely considered one of the most problematic nonnative species in the western United States. Cheatgrass was accidentally introduced to North America through ship ballasts from Asia, and the first introduction is thought to have come from ballast dumps near St. Louis [50]. Infestations in the early days were often found in wheat fields and near railroads [50]. Wheat seed was often contaminated with cheatgrass seed [50]. Straw infested with cheatgrass was used as packing material for goods transported via railroad [50]. Once introduced, wind, wildlife, and other natural processes aided in the dissemination of cheatgrass. Today, biologists have also established clear connections between the distribution of invasive plants and land use features such as roads, well pads, pipelines, and electric transmission lines [51]. The greatest richness of invasive plants is associated with two-track roads, mainly because they often receive little to no weed management, whereas maintained utility rights-of-way, often receive weed treatment [51]. Further, roads are more of a threat for noxious weeds than utility lines because they are frequently used by vehicles that can carry and introduce seeds from other areas. Utility rights-of-way are typically reclaimed and are not to be used as a vehicle path, except in certain instances when maintenance is necessary.

Cheatgrass spread rapidly through sagebrush steppe because it was pre-adapted to the environmental conditions of the ecosystem [50]. Cheatgrass out-competes most native grasses for available nutrients and goes to seed earlier than native grasses [52]. Cheatgrass produces a lot of seed that germinates in the fall, puts up some leaves, and grows to maturity in early spring at cool soil temperatures (except in areas where the winters are extremely cold and the plants die, such aswhich can be the case in parts of northern Nevada) [53]. During droughts, cheatgrass can use up all the available soil moisture before native species begin growing, and cheatgrass is more responsive to fire than most native species [53]. In short, cheatgrass is exceptionally adept at out-competing most native species for soil moisture, and once established, it will inhibit the survival of seedlings of perennial herbaceous species [54]. Native plants and populations differ in their ability to tolerate cheatgrass. For example, Sandberg bluegrass (*Poa secunda*) has been known to suppress cheatgrass, and big squirreltail (*Elymus multisetus*) is known to be good at both tolerating and competing with cheatgrass [55]. Remnant native populations growing in invaded areas may be an important source of genotypes for restoration of invaded communities, but not all remnant populations will provide competitive specimens [55]. In addition to cheatgrass, other invasive species that have disrupted the sagebrush steppe ecosystem include Russian thistle (*Salsola* spp.), tumble mustard (*Sisymbrium altissimum*), knapweed (*Centaurea* spp.), and medusahead (*Taeniatherum caput-medusae*) as well as others.

Many areas invaded by cheatgrass and other invasive species have been seriously altered and no longer support the vegetation of the natural community [56]. At high densities, cheatgrass dominance can lead to complete community type conversions from perennial bunchgrass to

cheatgrass monocultures [56]. Cheatgrass can maintain dominance for many years on sites where native vegetation has been eliminated or reduced by livestock grazing or fire [56]. The presence and dominance of cheatgrass affects many aspects of community structure, process, and function including diversity of plant and animal species and disturbance to natural fire regimes [56]. The cumulative impact area, and northern Nevada in particular, represents an area that is perhaps the most heavily impacted by cheatgrass in the United States [57] [58].

Cheatgrass is a dominant factor in the ecosystem and has resulted in an estimated 18 percent loss of sagebrush steppe since European settlement [23]. This equates to to about 5.6 million acres of historic sagebrush steppe within the cumulative impact area.

Restoring the health of areas affected by cheatgrass is one of the BLM's highest priorities. The two most common forms of noxious and invasive weed treatments on BLM lands are reseeding as part of post-fire stabilization/rehabilitation and application of herbicides on infested areas [59]. The goal of post-fire stabilization/rehabilitation is the reestablishment of perennial vegetation, which, in turn, competes with cheatgrass and prevents cheatgrass establishment and competes with the cheatgrass [59].

WILDFIRES

Cheatgrass also has increased the frequency and intensity of wildfires [54]. After decades of uncontrolled livestock grazing into the mid-1900s, many areas had virtually no herbaceous understory to help carry natural wildfires [33] [31]. However, cheatgrass often eventually invaded and dominated the understory many of these areas and provided the fuel to allow larger, more frequent fires to occur earlier in the year [7]. Because big sagebrush species do not re-sprout following a wildfire event, these species rely on recruitment and reestablishment solely from nearby seed sources or active restoration efforts. The recovery of these sagebrush-steppe communities is often pre-empted by the shortened fire return interval, ultimately depleting the seed source and converting burned areas to annual grass. Cheatgrass is estimated to have influenced fire dynamics across almost 50 percent of the entire sagebrush biome [23]. This equates to about 9.7 million acres within the cumulative impact area.

Historically, sagebrush steppe vegetation in the Great Basin was impacted by wildfires at return intervals of 25 years [9] to 100 years . These [7] [10]. The historic fire regimes maintained a patchy distribution of shrubs and predominance of grasses [25]. Fire return estimates in some mountain big sagebrush communities have been documented to be as short as 10 to 20 years [60], and recent studies suggest that the historic fire return intervals may have been even longerbe exceptionally long in some areas – 171 to 342 years for areas dominated by Wyoming big sagebrush and 137 to 217 years for areas dominated by mountain big sagebrush [11]. In any case, the fire regime that characterizes sagebrush steppe is exceptionally complex [23].

Today, areas infested by cheatgrass tend to burn at more frequent intervals [10]. Most locations within the cumulative impact area have a fire return interval that has been reduced to well below100 years [61]. Studies within the cumulative impact area in Nevada reflect a relatively lower frequency and fire size in the decade of the 1980s with a dramatic increase (more than tripling) in 1990s that remains high to the present day (nearly quadruple the 1980s rate) [62]. The general area of fire activity is within an apparent storm track, which bisects the

state from west to east [62]. While certain spikes of fire activity are obvious, of note are the general increases in recent fire activity in populations that were last burned long ago [62].

Some studies have concluded that the fire return interval is now so short in some sagebrush steppe locations that reestablishment of native vegetation after a burn has become unlikely unless the area is actively managed [10] [63]. Within the past 10 years, fires have been so prolific within the cumulative impact area, particularly western Utah and eastern and central Nevada, that they burned approximately 3.7 million acres of sagebrush steppe, some areas more than once. The acreages of sagebrush steppe affected by invasive grasses and consequent wildfires eclipse all other natural and anthropogenic effects [58]. To actively manage these effects, the BLM undertakes a broad range of activities. Fuels management through cheatgrass control is one major activity; however, the program also includes fire suppression preparedness, prevention, and education; community assistance and protection; and safety.

JUNIPER-PINYON ENCROACHMENT

Several studies have reported a decline in fires in areas heavily grazed by livestock and not overrun by cheatgrass [60] [64]. The introduction of livestock in the late 1800s greatly reduced fine fuels in many areas [23]. With virtually no herbaceous understory to help carry natural wildfires, the overly dense sagebrush propagated while limiting the establishment of native herbaceous perennials [38]. The longer fire return intervals allowed juniper-pinyon woodlands to encroach into sagebrush steppe and increase in dominance [23]. Juniper and pinyon eventually displace sagebrush, grasses, and forbs needed by greater sage-grouse and other sagebrush wildlife [65]. Utah juniper (*Juniperus osteosperma*), western juniper (*J. occidentalis*), single-leaf pinyon (*Pinus monophylla*) and two needle pinyon (*P. edulis*) are the primary conifer species invading the sagebrush biome [23]. Juniper-pinyon forests presently occupy about 2.4 million acres within the cumulative impact area [66] [67]. Estimates of woodland expansion vary regionally throughout the western United States, ranging 60 to 90 percent beyond their original footprint. Specific information [23]. This equates to encroachment into between about woodland expansion0.9 million and 1.1 million acres of sagebrush steppe within the cumulative impact area was not available for this SEIS.

Environmental Effects (of Present and Reasonably Foreseeable Future Actions)

Past actions that shaped the sagebrush steppe ecosystem into what it is today are discussed in the Existing Affected Environment section above. Present and reasonably foreseeable future actions that continue to shape the sagebrush steppe ecosystem are discussed here. For the purpose of this DraftFinal SEIS, these actions can be grouped into four main categories: energy projects; mining, mineral exploration, and related activities; livestock grazing and wild horse eco-sanctuary; and restoration and habitat improvement projects. Table 2 identifies the aggregate acreage of sagebrush steppe directly affected by each category as presented in Table 1. The impacts of past, present, and reasonably foreseeable future actions is addressed in the section titled Summary of Impacts (of Past, Present, and Reasonably Foreseeable Future Actions).

TABLE 2 – CUMULATIVE IMPACT ACREAGES

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Category of Action	Estimated Acres of Sagebrush Steppe that Would Be Directly Affected by Present and Reasonably Foreseeable Actions within the Cumulative Impact Area	Expressed as a Percentage of the Total Amount of Sagebrush Steppe in the Cumulative Impact Area
Energy Projects (including the Ruby Pipeline Project*)	33,603	0.17%
Mining, Mineral Exploration & Related Activities	16,920	0.09%
Livestock Grazing & Wild Horse Eco-Sanctuary	13,553,711	70.20%
Restoration & Habitat Improvement Projects	>420,725	2.18%

* The Ruby Pipeline Project accounts for about 9,225 acres of direct impact on sagebrush steppe within the cumulative impact area. This equates to about 0.05 percent of the total amount sagebrush steppe within the cumulative impact area.

ENERGY PROJECTS

The primary direct impact from construction of the Ruby Pipeline Project on sagebrush steppe is from the cutting, clearing, and removal of existing vegetation within the construction right-of-way and workspaces. Other direct impacts are from improving existing roads or creating new roads to the construction right-of-way. An estimated 9,225 acres of sagebrush steppe was directly affected by construction of the Ruby Pipeline Project (see Table 2). This represents 0.05 percent of the total 19.3 million acres of sagebrush steppe within the cumulative impact area. The Final EIS prepared for the Ruby Pipeline Project considered design features to minimize impact on the environment. For example, to minimize impacts on the environment, including sagebrush steppe, the Ruby Pipeline Project was co-located with or sited immediately adjacent to other existing roads and utilities wherever practicable. Co-location ofand siting adjacent to existing facilities is a generally accepted means to control the location of development and limit impacts on sensitive resources by keeping disturbance within established corridors. Installation of new pipeline alongwithin or near an existing, cleared right-of-way (such as other pipeline, electric transmission line, road, or railroad) may be environmentally preferable to construction of a new right-of-way, and construction effects and cumulative impacts can normally be reduced by use ofusing or sitinglocating next to a previously cleared right-of-way. Likewise, long-term or permanent environmental impacts can normally be reduced by avoiding the creation of a new right-of-waycorridor through previously undisturbed areas. The Ruby Pipeline Project was co-located or sited next to other existing roads and utilities along about 44 percent of its entire route. (through all vegetation types). Within sagebrush steppe vegetation alone, about 58 percent of the route in sagebrush steppe habitat was co-located withor sited next to other rights-of-way.

The Final EIS prepared for the Ruby Pipeline Project evaluated the possibility of routing the pipeline within West-wide Energy Corridor (WWEC). The WWEC is a collection of non-contiguous energy corridors identified by the U.S. Department of Energy, U.S. Department of Defense, BLM, and U.S. Forest ServiceUSFS in 11 western states (Arizona, California, Colorado, Idaho, Montana, Nevada, New Mexico, Oregon, Utah, Washington, and Wyoming). The WWEC includes more than 6,000 miles of 3,500-foot-wide corridor on federal land; however, the corridor is not contiguous and does not extend onto interposing private orand non-federal

parcels. Despite the potential benefits of co-location within the WWEC, the non-contiguous nature of the WWEC can make utilizing the corridor for long projects across multiple federal parcels impractical. Project proponents must still obtain rights-of-way on interposing private lands that do not have a corridor designation. The Final EIS found that following the WWEC would have resulted in a pipeline about 151 miles longer than the proposed route, which would include an additional 73 miles of non-federal land. This additional pipeline length also would necessitate more compression (e.g., installation of aboveground compressor stations), which would, in turn, increase long-term air emissions. The Final EIS concluded that, all environmental factors considered, routing along the WWEC would not confer an environmental advantage over the proposed route.

In addition to co-locating with existing rights-of-way where practical, the Final EIS considered reducing impacts of the Ruby Pipeline Project through certain management practices focused on active restoration and revegetation of the right-of-way. However, even with most of the land affected by the Ruby Pipeline Project being reclaimed and allowed to return to its original staterevegetate, the effects of construction are expected to be long-term due to the time required to reestablish the vegetation characteristics of the native community types. The arid environment in the project vicinity is not conducive to plant growth, and regeneration of vegetation and transition back to a sagebrush steppe state following construction is expected to be slow. Moreover, the regeneration expectation of seeded or planted natural vegetation in the project area varies greatly and can be ineffective. Natural regeneration of these areas may take 50 years or longer. Site-specific conditions such as grazing, rainfall amounts, elevation, weeds, and soil type could extend impacts beyond 50 years, or, if ideal, could aid reclamation success and shorten restoration timeframes. Several Indian tribes noted this concern during consultation for this SEIS, and raised related concerns such as the spread of non-native species. More information onabout these specific concerns is provided in the Native American Consultation section of this SEIS.

Direct impacts from energy projects other than the Ruby Pipeline Project identified in Table 1 would be similar to those of Ruby, except that clearing for non-pipeline projects would be limited to aboveground structure sites and access roads because the entire width of the right-of-way or project site does not typically require clearing and the infrastructure is spanned above and across the landscape. Co-location and other mitigation measures would be implemented to the extent practical on these other projects through various federal, state, and/or local permitting processes, thereby reducing the degree and duration of impacts. In total, the Ruby Pipeline Project plus other energy projects identified in Table 1 would disturb a combined 66,808 acres of land. For the purpose of this DraftFinal SEIS, we have assumedthe assumption was made that sagebrush steppe affected by the energy projects listed in Table 1 would be affected proportionally to its occurrence in the study area in order to gain a perspective of how much sagebrush steppe would be affected. Using this method, about 33,603 acres of sagebrush steppe would be affected by the Ruby Pipeline Project and other energy projects combined (see Table 2). This equates to about 0.17 percent of the total amount of sagebrush steppe in the cumulative impact area. These projects would be required to reclaim most disturbed areas following construction and represent a relatively minor impact compared to the historic invasion of cheatgrass across more than 50 percent of the landscape, recent

wildfires that have affected vast amounts of sagebrush steppe, and the historic expansion of juniper and pinyon into sagebrush steppe by 60 to 90 percent [23].

Indirect impacts from energy projects on wildlife would occur as a result of the removal and fragmentation of sagebrush habitat. Relatively intact sagebrush steppe habitats are essential for survival of sage-grouse and other species uniquely adapted to the environment, and are important for mule deer, elk, and other species [14]. As the sagebrush steppe becomes scarce and fragmented, species that rely on the habitat for their food and shelter also become scarce, and predators are able to more easily prey on species that remain, further stressing the balance [68]. Studies have shown that fragmentation of the landscape, which can result from the development of large-scale energy projects, particularly influences predation and nest success by providing predators with beneficial features, such as better visibility [69] [70] [71]. Further, artificial structures (e.g., infrastructure, transmission lines, disturbed ground) can increase the abundance, diversity, or hunting efficiency of predators [72] [73]. Human-altered landscapes have a greater abundance of predators and risk of predation may be greater in these areas [71]. Ground-nesting species such as greater sage-grouse may be exceptionally vulnerable to predation in landscapes that have been altered by human development [71]. There is some evidence to suggest that predator control, such as for protecting livestock and grazing, can favor sage-grouse [74].

Impacts on riparian areas within the sagebrush steppe may be more consequential than other areas. Riparian areas are important because of the habitat (food, cover, and migratory corridor) they provide to many plant and animal species. Riparian habitat tends to support greater biodiversity (a wider range of species) than the surrounding areas because of the abundance of water. Although the extent of riparian areas in sagebrush steppe is less than many other ecosystems, the riparian areas have a greater significance for some functional values [30]. They are especially important for neotropical migratory birds because the riparian areas are scattered amidst great expanses of arid land [30]. They also provide crucial habitat for 50 to 75 percent of vertebrate species found in the western intermontane region, including many species designated as endangered, threatened, or sensitive [30]. Livestock often favor riparian areas because of the availability and abundance of shade, lush vegetation, and water [30]. Areas where riparian vegetation is removed by energy projects likely would experience a localized reduction of biodiversity. Depending on vegetation cover, the duration of impact could range from short-term to permanent. Impacts would be short-term in areas comprised of quick-growing herbaceous (grassy) vegetation, but would be long-term or permanent where slow-growing (such as sagebrush) vegetation is cleared. The Final EIS for the Ruby Pipeline Project indicated that about 206 acres of woody riparian land would be affected by Ruby. A number of mitigation measures were stipulated in the Final EIS to minimize impacts on thesewoody riparian areas, including placing restrictions on the construction right-of-way width in certain woody riparian areas; requiring the replanting of woody vegetation after construction; protecting replanted areas from grazing and browsing during restoration; and monitoring the success of restoration for 5 years after construction.

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Wildlife most affected by the removal and fragmentation of habitat would be sagebrush-obligate species that also are listed as sensitive by the BLM within the study area. BLM-sensitive species generally depend on specialized or unique habitats that are considered to be at risk by the BLM [75]. Within the cumulative impact area, sagebrush-obligate species that also are BLM-sensitive species include greater sage-grouse, Brewer's sparrow (*Spizella breweri*), sage sparrow, sage thrasher, pygmy rabbit, and northern sagebrush lizard (*Sceloporus graciosus graciousus*). Detailed information about habitat requirements and threats to each of these species can be found at various sources and are incorporated here by reference [28] [76] [77] [78] [79] [80].

Each of the sensitive sagebrush-obligate bird species listed above varies somewhat in its habitat preference. For example, sage thrashers use sagebrush habitats, but they also may utilize pinyon-juniper woodlands and arid to semi-arid shrubs and grasslands [78]. Sage sparrows on the other hand prefer contiguous areas of tall, dense sagebrush [77]. Direct and indirect impacts on these species, including recent declines in sage-grouse populations and other sagebrush-obligate species, have been linked to energy development [71]. Removal of sagebrush associated with these projects would reduce available breeding, nesting, and/or forage habitat for these species in and around energy development projects, and would increase predation. Research suggests that habitat alteration that removes live sagebrush and reduces patch size is negative for all sagebrush obligates, specifically greater sage-grouse, Brewer's sparrow, sage sparrow, and sage thrasher [81]. Reproductive success of these sagebrush-obligate birds is lower in fragmented landscapes than in contiguous landscapes [82]. Operational activity associated with energy infrastructure (e.g., traffic and noise) is known to displace wildlife and alter habitat use patterns [83]. Such effects generally cover areas substantially larger than the area directly impacted [83] because many species avoid areas affected by human activities even when habitat remains intact.

Greater sage-grouse is perhaps the obligate species of highest concern within the cumulative impact area. In 2010, the FWS concluded that the greater sage-grouse warrants protection under the Endangered Species Act, but proposing the species for protection is precluded by the need to take action on other species facing more immediate and severe extinction threats [84]. As a result, the greater sage-grouse was placed on the list of species that are candidates for Endangered Species Act protection. The FWS reviews the status of all candidate species, and will propose the species for protection when funding and workload priorities for other listing actions allow [84]. In 2012, the BLM established policies and procedures in an Instruction Memorandum to be applied to ongoing and proposed authorizations and activities that affect the greater sage-grouse to ensure that interim conservation policies and procedures are implemented when field offices authorize or carry out activities on public land while the BLM develops and decides how to best incorporate long-term conservation measures for greater sage-grouse into applicable Land Use Plans. This direction promotes sustainable greater sage-

grouse populations and conservation of its habitat while not closing any future options before the planning process can be completed.

Greater sage-grouse require variety in sagebrush community landscape to meet seasonal and inter-seasonal requirements for food, cover, and nesting [85]. As such, the landscape for sage-grouse encompasses large areas, from 10's to 100's of square kilometers, to provide for multiple aspects of species life requirements, such as seasonal habitats [85]. The current range of greater sage-grouse consists of approximately 56 percent of the estimated potential habitat available prior to European settlement [28]. The U.S. Geological Survey has divided the sage-grouse range into seven sage-grouse management zones based on similarities in geography, climate, topography, and floristics [85]. The cumulative impact area crosses four of these zones and at least three spatially connected breeding habitats with three genetically similar subpopulations [85].

Sage-grouse have been an integral part of the traditional Native American life and culture and have played important roles in ceremonial practices, as medicine, and as a subsistence resource. Sage-grouse historically have been a common food in the diet of many Native Americans, including the Northern Paiute and Western Shoshone. Sage-grouse generally were hunted in the springtime at leks, and the meat was dried and could be eaten as long as supplies lasted, although quantitative information on the significance of sage-grouse in the Northern Paiute diet, past or present, is lacking. In addition, sage-grouse wings were used as fans in hunting, and the feathers were used on the ends of arrows by several bands. Sage-grouse also play prominent roles in oral tradition. For example, the Northern Paiute have several stories explaining how the sage-grouse saved fire during the world flood. Other stories have the sage-grouse as a character in a story explaining how pine nuts came into the world. In addition to oral tradition, sage-grouse have influenced Northern Paiute and Western Shoshone dance. Sage-grouse strutting is the basis of the Round Dance (also called the Circle Dance). The timing and meaning of the Round Dance varies, but the dance is tied to marking seasonal subsistence activities and is imbued with cosmological ideas related to renewal of the world and human's relationship to the Creator/God [86].

Impacts on greater sage-grouse from development projects include displacement of individuals from preferred habitat, interference with localized migration/movement, disruption to courtship, nest abandonment, chick mortality, and injury from accidental encounters. Impacts also can be cultural and socioeconomic in nature because of the importance of sage-grouse to traditional Native American culture and life. The degree of impact depends on the proximity of the activities to individuals and their habitat.

Although conclusive data establishing minimum sizes of sagebrush-dominated landscapes necessary to support viable populations of sage-grouse are unavailable [85], evidence suggests that habitat fragmentation and destruction has contributed to significant sage-grouse population declines over the past century [28]. Studies on greater sage-grouse showed marked drops in male lek attendance within 2 and 3 miles of energy development projects [87] [88] (a lek is a traditional place where male sage-grouse assemble during the mating season to engage in competitive displays to attract females). Studies also showed that there is a delay of 2 to 10 years between energy development and its measurable effects on lek attendance [88]. On the other hand, instances also have been documented where rights-of-way have provided suitable

sage-grouse lek habitat; leks have been documented on rights-of-way where there were no previous records of leks [89]. Although the studies referenced here are associated with energy development projects, the same types of effects would be expected for other development projects involving ground disturbance and human activity (e.g., roads, mining, urbanization, etc.).

Assuming a 3 mile effect radius, the present and future development projects listed in Table 1 could result in edge effects, such as male lek attendance, covering an area of over 2.2 million acres (or 12 percent) of sagebrush steppe. The degree of impacts within the 3 mile radius would be expected to decrease as the distance from the edge of the development increased, and areas that are restored to pre-construction conditions once a project is completed do not present permanent impacts on sage-grouse so long as the area is properly restored and successfully revegetated and human activity and intrusion do not continue [90]. Areas that are not restored or where human activity is persistent (e.g., ongoing traffic or noise) reduces the effective habitat on a long-term or permanent basis.

Pygmy rabbits and northern sagebrush lizards are somewhat less mobile than birds, and also could be impacted by removal of sagebrush habitat. Pygmy rabbits are especially susceptible to predation in areas with little shrub cover [91]. Shrub cover would not be present in disturbed areas for several years or decades following construction; consequently, the disturbed areas, especially on long, linear electric transmission lines and oil and gas transmission pipelines, could create barriers to rabbit and lizard movement until revegetation is similar to adjacent conditions. Recently, however, telemetry studies by the Nevada Department of Wildlife have documented pygmy rabbits travelling freely across rights-of-way [89]. Further, fresh pygmy rabbit signs (droppings) were observed in Spring 2013 on parts of the Ruby pipeline right-of-way that were planted with sagebrush seedlings (including big sagebrush) and perennial grasses and forbs, suggesting that reclamation efforts can enhance forage diversity for pygmy rabbits where the surrounding habitat is less than ideal [89]. These studies are in their preliminary stages, however, and the data is not conclusive.

Indirect impact on sagebrush steppe also may result from disturbance of soils, which provides opportunities for invasive species to become established with less competition from natives. Cheatgrass is known to be exceptionally adept at out-competing native species and disrupting biodiversity of the ecosystem.

One potential benefit of removing vegetation from transmission line rights-of-way is that the corridor can act as a fuelbreak for controlling wildfires, particularly in areas of heavy cheatgrass infestation where fire return intervals are short. In the event of a wildfire, the de facto fuelbreak provided by the cleared right-of-way corridor can help slow down or stop wildfires, and allow firefighter anchor points in areas with contiguous intact sagebrush cover. Fuelbreaks help extend the burn cycle to more natural intervals and preserve slow growing sagebrush species that are essential to the environment. Although fuelbreaks may be considered to have a direct, negative impact where vegetation is cleared from the land, the fuelbreak benefits much larger blocks of land by helping limit the size of future wildfires. Rights-of-way can even be managed (such as by patterned mowing) to allow for future fuelbreak effects to prevent large scale block burns. Most pipeline and electric transmission line projects, however, are actively revegetated with herbaceous cover across their entire width following construction. As a result, the benefit may be short term.

MINING, MINERAL EXPLORATION, AND RELATED ACTIVITIES

Direct impacts on sagebrush steppe from mining and mineral exploration activities would be similar to those impacts associated with energy projects as described above, except that open pit mines are typically not backfilled or fully reclaimed at the end of the mine life. In total, mining and mineral exploration projects in Table 1 would disturb about 35,445 acres. Assuming that sagebrush steppe would be affected proportionally across the study area, about 16,920 acres of sagebrush steppe would be affected by mining and mineral exploration projects (see Table 2). This equates to about 0.09 percent of the total amount of sagebrush steppe in the cumulative impact area.

Indirect impacts on wildlife would be similar to the impacts from energy projects, except that mining and mineral exploration activities would not fragment the landscape in the same manner as the long, linear electric and pipeline corridors, nor would they provide the same type of fuelbreak benefits as those projects. However, mining projects often provide conveniently located and reliable sources of water for firefighting efforts, and in certain instances have heavy equipment readily available for firefighting.

LIVESTOCK GRAZING AND WILD HORSE ECO-SANCTUARY

Livestock and wild horses that graze in sagebrush steppe tend to consume grasses and avoid the shrubs. Historically, this resulted in a sagebrush dominated landscape in overgrazed lands. Today, however, livestock grazing is conducted in a manner aimed at achieving a balance of herbaceous and shrubby species and maintaining the health of the land. Because topography, climate, soils, water availability, and other factors vary from location to location and from year to year, ranchers and land managers are required to change grazing practices to achieve the desired condition of the land. Public land is managed according to certain standards and guidelines for soils and vegetation conditions, species diversity, riparian area conditions, and water quality. Where standards are met, no changes in grazing patternsmanagement may be warranted. However, where standards are not met, changes may be needed to achieve viable, healthy, productive, and diverse populations of native and desired plant and animal species, including sagebrush-obligate sensitive species. Changes in livestock management may involve altering grazing patterns as well as implementing certain improvements, such as installation or removal of fences and cattleguards; development of springs, wells, water lines, troughs, and ponds; and reestablishing vegetation by active seeding. The BLM currently has permits and leases covering about 22.2 million acres of land in the cumulative impact area, of which about 13.3 million acres is sagebrush steppe. Specifics about future grazing are not precisely known, except that grazing has declined within the cumulative impact area in recent years [24], but continues to be an important use of public land and likely would continue in the future in a manner similar to the present. Future specific decisions about grazing, however, will be determined by based on the condition of the land and the standards and guidelines put in place to ensure the health of the land.

In addition to commercial livestock, numerousthe BLM manages wild horses and burros roam BLM rangelands in the western United States (about 37,300 as of the last census). Specific information about the numbers of wild horses and burros within the cumulative impact area was not available for this SEIS. Wild horses and burros have almost no natural predators, and

left unchecked, their herd sizes can double almost every 4 years . The BLM's goal ison public land to ensure and maintain healthy wild horse populations on healthy public lands by managing wild horse and burro herd populations in accordance with the land's capacity to support them. To help ensure that herd sizes are in balance with the land, the BLM uses an "adoption program" as the primary tool for placing these animals into private care or into joint public-private sponsored eco-sanctuaries. The BLM is considering a single proposal for a large 525,000-acre public-private eco-sanctuary within the cumulative impact area where excess wild horses and burros would be allowed to graze and roam., while existing herd management areas for wild horses and burros would be maintained according to current policies. Of this total, at least 250,611 acres is estimated to be sagebrush steppe. Under the proposal, the eco-sanctuary would be operated by a private entity that would be responsible for improving and maintaining fencing and water wells, and overseeing management of the horses, which would remain under federal ownership. The proposal would result in the adjustment and/or modification of portions of the existing Spruce-Pequop, Goshute, and Antelope Valley herd management areas to create a new modified herd management area to be managed as an eco-sanctuary. The proposed eco-sanctuary would not affect recreational access, would include hunting, and would not affect current or future mining interests in the area.

RESTORATION AND HABITAT IMPROVEMENT PROJECTS

Several of the projects identified in Table 1 are designed specifically to improve sagebrush steppe habitat. These projects involve activities such as cheatgrass treatment, fuelbreak mowing, juniper removal, meadow restoration, post-fire emergency stabilization and rehabilitation projects, and grazing exclosures. In total, restoration and habitat improvement projects would benefit more than 420,725 acres of sagebrush steppe. This amounts to about 2.18% of the total amount of sagebrush steppe in the cumulative impact area. Some of the projects are being undertaken using funds provided by Ruby as part of cooperative conservation agreements between Ruby, the BLM, and state agencies (see Table 1 in this SEIS and Appendix M of the Final EIS), and are intended to mitigate the impacts associated with the loss of habitat function from the pipeline and to provide conservation benefits to greater sage-grouse, pygmy rabbit, and other species. Ruby is required to provide up to $22.9 million in funding for restoration and habitat improvement projects as well as habitat studies in the vicinity of the pipeline. This fundingTo date, $8.7 million has been earmarked for present and future projects that would provide benefit, in part, for more than 90,300 acres of sagebrush steppe, including sagebrush obligate sensitive species. This amounts to about 0.47% of the total amount of sagebrush steppe in the cumulative impact area. The remaining $14.2 million has not yet been assigned to specific projects, but will be used for sage-grouse and pygmy rabbit habitat restoration and will provide benefit to additional sagebrush steppe.

Off-site mitigation projects are peer-reviewed by the appropriate agency to determine which projects should get funded. Agencies involved with project review include the Nevada Department of Wildlife, Wyoming Landscape Conservation Initiative, Wyoming Game and Fish Department, Oregon Department of Fish and Wildlife, Utah Division of Wildlife Resources, and Utah Watershed Initiative. Even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush

steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original, pre-European settlement condition.

Summary of Impacts (of Past, Present, and Reasonably Foreseeable Future Actions)

Cumulative impacts of past, present, and reasonably foreseeable future actions would be significant. It is clear that the cumulative impacts of past actions alone on sagebrush steppe vegetation and habitat have been significant – about 11.5 million acres (37 percent) of sagebrush steppe has been lost within the cumulative impact area based on sage-grouse distribution and habitat mapping (see Figures 2 and 3), and nearly all the remaining 19.3 million acres of sagebrush steppe has been degraded to some extent [7]. Perhaps the most notable cause of sagebrush steppe decline can be attributed to wildfires. It should be noted, however, that [62], but grazing, mining, energy projects, and other actions also have played a role. Grazing, for example, was recognized in the Ruby Pipeline Project Final EIS as potentially "highly destructive" to sagebrush habitat (page 3-36). Sagebrush steppe is a dynamic ecosystem that has a wide variety of successional stages and states. Vegetation present in any area is a function of climate, soils, available plant species, and disturbance regimes. The limitations posed by and interrelationships between these four factors dictate the plant communities present on any given site at any given time. Traditional thoughts on plant ecology held that each combination of these factors supports one "climax" plant community. However, current range science holds that a site may support multiple stableany one of a multitude of vegetation states, with disturbances and other factors controlling which state a site is in and how and when the community transitions from one state to another. Movement between these various states is not necessarily linear and may require high energy inputs, such as fire or mechanical treatments, for a site to move from one stable state to another. In other words, movement may not always be accomplished through passive changes in management.Vegetation states vary in their ability to resist change and one state can transition to another as a result of natural processes (like wildfire) or human interaction (like ranching) [92]. Some vegetation states may be desirable (such as high-quality sagebrush steppe) and others may be undesirable (such as cheatgrass monoculture). However, a desirable state often is not stable and requires very little disturbance to transition to another state, whereas an undesirable state often is stable and requires high energy inputs to transition to a desirable state.

With regard to present and reasonably foreseeable future actions, cumulative impacts would notalso may be significant. Agriculture, grazing, mining, energy projects, and wildfires are expected to occur in the future within the cumulative impact area. However, it is worth noting that agricultural use and livestock grazing have been on the decline [24], and both activities are expected to continue in the future in a manner similar to the present. And even though livestock grazing, (including grazing associated with wild horsehorses and burro eco-sanctuary,burros) would impact more than 13.6 of the 19.3 million acres of sagebrush steppe (see Tables 1 and 2) and), it will continue to be administered by the BLM in a manner to promote the long-term health and productivity of the land. Thus, it is expected that grazing within the cumulative impact area in the future will be less impactful when compared to historic, past grazing. Even though the Ruby Pipeline Project and other energy and mining actions would continue a historic trend toward a reduction of sagebrush steppe vegetation and habitat. In total, these projects would affect directly impact an estimated 50,523 acres of

sagebrush steppe, of which the Ruby Pipeline Project accounts for about 18 percent (see Tables 1 and 2). In total, the Ruby Pipeline Project and other energy and mining actions would affectthey would affect only about 0.26 percent of the existing 19.3 million acres of sagebrush steppe vegetation and habitat in the cumulative impact area. These activities are overshadowed by losses to wildfire that occur every year. In the past 3 years alone, about 1.4 million acres of sagebrush steppe burned in the cumulative impact area. This is more than 28 times the amount that would be lost in the foreseeable future due to energy development and mining. Wildfires will occur in the future and those fires may have major effects on large areas of sagebrush steppe. Although wildfires can be caused by natural or anthropogenic events, they are not actions per se and it is not precisely clear when or where they will occur. The amount of post-fire emergency stabilization and rehabilitation that occurs each year in response to wildfires is limited and is based on funding from Congress, which varies annually. To date, Ruby has provided about $1.6 million of additional funding for post-fire emergency stabilization and rehabilitation projects., which are intended protect sagebrush steppe habitat and sagebrush obligate species, and to restore sagebrush steppe habitat. This additional funding was provided through Ruby's cooperative conservation agreements and has benefitted more than 56,600 acres of land.

A number of other restoration and habitat improvement projects are expected to occur within the cumulative impact area that would benefit sagebrush steppe vegetation and habitat. In total, these projects would benefit more than 420,725 acres (see Tables 1 and 2) of sagebrush steppe by treating cheatgrass areas, removing juniper, stabilizing and rehabilitating burned areas, and providing forage and cover for sagebrush dependent species. A majority of this acreage is for juniper removal and fire stabilization/rehabilitation. Ruby is presently undertaking efforts to actively restore and revegetate most of the 9,225 acres of sagebrush steppe directly impacted by its project, except for about 61 acres that were permanently converted for aboveground facilities. Additionally, Ruby is partly or fully funding more than 42 other restoration and habitat improvement projects benefitting more than 90,300 acres of sagebrush steppe (almost 10 times the footprint of the direct impact area).) and will be partly or fully funding substantial additional restoration and habitat improvement projects in the future.

When adding past, present, and reasonably foreseeable actions together, the cumulative impacts on sagebrush steppe vegetation and habitat would be significant. This is largely due, in large part, to past impacts, which alone are significant and have, to some extent, left no areas of sagebrush steppe untouched. Although some of the present and reasonably foreseeable impactsactions could have some significant adverse impacts, others would be beneficial to sagebrush steppe. Although Ruby will fund projects that will benefit more than 10 times the direct impact area of the Project, the scale of beneficial impacts would still be outweighed by the cumulative adverse impacts. By way of comparison, Beneficial impacts would affect only about 1 percent of the land within the cumulative impact area historically occupied by sagebrush steppe. Further, beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state.

This DraftFinal SEIS addresses the court's direction to provide quantified and detailed data about the cumulative loss of sagebrush steppe vegetation and habitat and information on how much acreage sagebrush steppe used to occupy, and what percentage has been destroyed. This

Draft SEIS is consistent with the Final EIS in concluding that cumulative impacts on sagebrush steppe vegetation and habitat would be significant. This Draft SEIS alsoIt also includes detailed information on past, present, and reasonably foreseeable actions within the cumulative impact area defined in the Final EIS for the Project, which have resulted in and may in the future cause significant impacts.

The direct and indirect impacts of the Project remain the same as those discussed in the Final EIS. This Final SEIS is consistent with the Final EIS in concluding that clearing of sagebrush steppe for the Ruby Pipeline Project could result in long-term impacts on the environment because this vegetation type could take as long as 50 years or more to return to preconstruction conditions. The mitigation required inby the original Final EIS contemplatedFERC Certificate and BLM ROD is intended to address these significant, long-term impacts. The mitigation is described in the Final EIS, and includes, but is not limited to, activities such segregating topsoil from subsoil during construction to preserve the native seed bank in the topsoil; reseeding areas disturbed by construction with species similar to those in the surrounding natural plant communities; planting shrubs to aid in the reestablishment of sagebrush and other shrubby species; implementing measures to control the spread of invasive weeds during and after construction; and funding for off-site mitigation, such as the restoration and habitat improvement projects identified in Table 1. Because there are no impacts in excess of those discussed in the Final EIS, no additional mitigation is described in this Draft SEIS.

For the Ruby Pipeline Project, Ruby is obligated to restore its right-of-way and has submitted bonds to the BLM that will not be released until the BLM determines that restoration goals have been met. This obligation is documented in the Certificate issued by the FERC and the Right-of-Way Grant issued by the BLM. The standard operating procedures for monitoring and reporting and restoration goals of the project are detailed in Ruby's Long Term Monitoring Plan, Appendix W of the Plan of Development. The Certificate of Public Convenience and Necessity, Right-of-Way Grant and Long Term Monitoring Plan are available on the BLM's Ruby Project website: http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html.

Vegetation monitoring will occur annually during the growing season for five years after the seeding and seedling transplanting is completed. If revegetation performance criteria have not been met after five years, annual monitoring will continue until the FERC and the appropriate land managing agencies (including the BLM) concur that restoration and reforestation goals have been achieved for a given right-of-way segment. Both Ruby and the FERC publish annual restoration monitoring reports which are submitted to the BLM and posted on the FERC's website: http://www.ferc.gov/.

The impacts of the Ruby Pipeline Project are consistent with those disclosed in the Final EIS. This Final SEIS clarifies and quantifies past, present, and reasonably foreseeable cumulative impacts to sage brush steppe habitat within the cumulative impact area. The FERC Certificate and Right-of-Way Grant required substantial mitigation intended to benefit sage brush steppe. No additional mitigation associated with the Ruby Pipeline Project is described in this Final SEIS. Other present and future actions will undergo required environmental reviews and may be subject to mitigation requirements of their own.

CONSULTATION AND COORDINATION

Following is a summary of consultation and coordination activities conducted with Native American tribes, agencies, and individuals during preparation of this SEIS.

Native American Consultation

The BLM sent a certified letter, dated March 13, 2013, to notify 36 tribes of BLM'S intent to develop a SEIS for the Ruby Pipeline Project and to initiate government-to-government consultation. The BLM identified tribes to contact based on previous participation in the Ruby Final EIS as summarized in Table 4.10.3-1 of the Final EIS.that document. Follow-up phone calls were made to the tribes and project information was also distributed and discussed as part of government-to-government consultations between the BLM and the following tribes. The BLM sent a certified letter, dated July 1, 2013 to notify the 36 tribes of the public comment period on the Draft SEIS and to extend the offer of government-to-government consultation. The BLM included a digital copy of the Draft SEIS and a hard copy if previously requested. BLM followed-up with tribes and distributed additional information as requested as part of government-to-government consultations with the tribes listed below. Consultation with tribes is ongoing.

TABLE 3 – NATIVE AMERICAN CONSULTATIONS

Tribe	BLM Office	Date	Contact
Summit Lake Paiute Tribe	Black Rock Field Office	March 16, 2013	Meeting with Tribal Council
Confederated Tribes of the Goshute Indian Reservation	Elko District Office	April 5, 2013	Meeting with Tribal Council
Pyramid Lake Paiute Tribe	Winnemucca District Office	April 10, 2013	Meeting with Elwood Lowrey (Chairman), Terry James (Vice Chairman), Scott Carey, and John Mosley
Fort McDermitt Indian Reservation	Winnemucca District Office	April 15, 2013	Meeting with Maxine Smart (Acting Chairwoman) and Duane Masters
Shoshone Tribe of the Wind River Reservation	Kemmerer Field Office	April 15, 2013	Phone conversation with Darwin St. Clair
Elko Band Council	Elko District Office	April 17, 2013	Meeting with Davis Gonzales (Vice Chair), Alfreda Jake, Evelyn Temoke-Roche, Paula Brady, Vernon Thompson, and Nick McKnight
Summit Lake Paiute	Winnemucca District Office	April 20, 2013	Tribal Council, including Randi Desoto (Chairwoman) and Will Cowan (Resource Specialist)
Confederated Tribes of Warm Springs	Klamath Falls Resource Area Office	April 22, 2013	Email to Sally Bird
Battle Mountain Band Council	Elko District Office	April 24, 2013	Meeting with Mike Young (Chairman), Michael Price, Lorrie Carpenter, Delbert Holley, Florine Maine, Gregory Holley, Stanford Knight, Donna Hill
The Klamath Tribes	Klamath Falls Resource Area Office	April 29, 2013 & May 1, 2013	Email/phone exchange with Perry Chocktoot Jr.
Pit River Tribe	Surprise Field Office	May 2, 2013	Meeting with the Tribal Council
Confederated Tribes of the Goshute Indian Reservation	Elko District Office	May 3, 2013	Meeting with Ed Naranjo (Chairman), Madeline Greymountain (Vice-Chair), Amos Murphy, Richard Henriod, Lavar Tom

TABLE 3 – NATIVE AMERICAN CONSULTATIONS

Tribe	BLM Office	Date	Contact
Fallon Paiute-Shoshone Tribe	Winnemucca District Office	May 17, 2013	Meeting with representatives.
Summit Lake Paiute Tribe	Winnemucca District Office	May 21, 2013	The BLM sends information as requested to William Cowan and Randi Desoto.
Cedarville Rancheria	Surprise Field Office	June 3, 2013	Meeting with Katie Hall.
Ft. Bidwell Indian Reservation	Surprise Field Office	July 13, 2013	Meeting with Tribal Chairman and Council.
Summit Lake Paiute Tribe	Winnemucca District Office	July 20, 2013	Meeting with the Tribal Council and Will Cowan
Ft. McDermitt Indian Reservation	Winnemucca District Office	July 22, 2013	Meeting with Maxine Smart (Acting Chairwoman)
Pit River Tribe	Surprise Field Office	August 1, 2013	Meeting with Tribal Council
Summit Lake Paiute Tribe	Winnemucca District Office	August 2, 2013	Vegetation studies provided to Randi Desoto as requested
Pyramid Lake Paiute Tribe	Winnemucca District Office	August 7, 2013	Meeting with Terrence James (Vice-Chair)
Fallon Paiute-Shoshone Tribe	Winnemucca District Office	August 9, 2013	Meeting with Tribal Council and Cultural Committee
Summit Lake Paiute Tribe	Winnemucca District Office	August 19, 2013	Delgadina Gonzales provides BLM with information for the SEIS
Fallon Paiute-Shoshone Tribe	Winnemucca District Office	August 19, 2013	In response to meeting with the BLM on August 9, Nathan Strong provides the BLM with information for the SEIS
Confederated Tribes of the Goshute Indian Reservation	Wells Field Office	September 24, 2013	Phone conversation with Ed Naranjo (Chairman)

As part of the consultation process prior issuing the Draft SEIS, the Summit Lake Paiute Tribe indicated that the seed mixes generally used by industry and agencies for reclamation do not restore the sagebrush steppe habitat to its original state. The Tribe noted that seed mixes often contain crested wheatgrass (*Agropyron cristatum*) and forage kochia (*Bassia prostrate*), which are not native to sagebrush steppe. The Tribe also noted that seed mixes often do not contain seeds of plants used for food, medicine, or in ceremonies important to tribal lifestyle. These plants include, but are not limited to, little leaf horsebrush (*Tetradymia glabrata*), yampa root (*Perideridia gairdneri*), rabbitbrush (*Chrysothamnus* spp.), yellow cress (*Rorippa* spp.) and native sunflowers (*Helianthus* spp.). Northern Paiutes who still hold traditional beliefs also point out that the native vegetation removed in the course of development is sacred, but that vegetation from reseeding after development projects is not sacred since it was not put there by the Creator. The Ft. McDermitt Indian Reservation made general comment about the ineffectiveness of mitigation on the Ruby pipeline right-of-way. The Klamath Tribes also responded with concerns about non-native plant species, impacts on habitat for mule deer and sage-grouse, and for impacts on traditional root-gathering areas in the sagebrush steppe habitat.

The seed mixes used on the Ruby Pipeline Project near the Summit Lake Reservation do not contain crested wheatgrass or forage kochia, although these species are in seed mixes in some other locations farther away (e.g., fuelbreaks and low precipitation areas). The seed mixes near the Summit Lake Reservation also do not contain little leaf horsebrush, yampa root, rabbitbrush, yellow cress, or native sunflowers, although yampa root was specially planted by

Ruby in a location farther away (e.g., the Barrel Springs area). All project seed mixes are identified in appendices D, E, Q, and W of the BLM's POD.

On July 1, 2013, the BLM sent the tribes a certified letter transmitting the Draft SEIS and extended the offer to consult with the tribes. The BLM tribal consultation points of contact for each participating office followed up with tribes in their respective jurisdictions. In response to the BLM's second invitation to consult on the Draft SEIS:

- The Pit River Tribe, Cedarville Rancheria Tribe indicated they had no comments on the Draft SEIS.
- The Elko Band Council, South Fork Band Council, Wells Band Council, Battle Mountain Band Council, and Te-Moak Tribe of the Western Shoshone indicated they would review the materials provided. They did not submit comments on the Draft SEIS.
- The Confederated Tribes of the Goshute, Fallon Paiute-Shoshone Tribe, Fort Bidwell Paiute Tribe, Fort McDermitt Paiute-Shoshone Tribe, Pyramid Lake Paiute Tribe, and Summit Lake Paiute Tribe submitted comments. Their comments are summarized below:
    - Tribes question the BLM's distinction that the impacts of the Ruby Project would not be significant to sagebrush steppe habitat when considering present and reasonably foreseeable future actions, but cumulative impacts to sagebrush steppe would be significant when considering past, present, and reasonably foreseeable future actions. Commenters suggested that, when considering present and reasonably foreseeable future actions, the impact from Ruby Pipeline should be considered significant.
    - Tribes request either that the BLM report back on the effectiveness of restoration and mitigation efforts or include additional mitigation to address recommended changes to the significance determination and the effectiveness of current restoration efforts.
    - Additionally, tribes request that more native plants be incorporated into the seed mixes used for restoration. They also suggest that tribal monitors should be used for the collection of native seeds and restoration and monitoring activities.
    - Several tribes stressed the cultural and religious significance of sagebrush steppe habitat to the tribes. Tribes also remark that the pipeline created an irreparable impacts to the land.
    - Tribes affirmed their right to government-to-government consultation. In particular, the Confederated Tribes of the Goshute Reservation claim that the BLM did not consult with the tribe in good faith.

The BLM revised text in the Final SEIS in response to comments from tribes. The BLM also followed up with the chairman for the Confederated Tribes of the Goshute Reservation. The tribe's chairman told the BLM that the statement that the BLM had not consulted was a mistake, that the BLM had consulted with them, and that they have no additional issues. The BLM offered to meet for additional consultation (information sharing) session and the chairman stated that would not be necessary (personal communication, Ed Naranjo to Bryan Mulligan).

The FERC and BLM are monitoring restoration of the right-of-way and will continue to do so as specified by the FERC's Certificate of Public Convenience and Necessity and the BLM's PODROD. Future decisions about restoration will be based on the results of monitoring and other relevant information, including information gained through consultation with federally recognized Native American tribal governments.

Agency Consultation

The BLM identified cooperating agencies based on participation in the Ruby Pipeline Project EIS. On April 8, 2013 BLM mailed invitations to participate in the SEIS effort to the following agency offices:

- Bureau of Reclamation, Klamath Basin Area Office
- Nevada Department of Wildlife
- Oregon Department of Fish and Wildlife
- U.S. Department of Agriculture, Forest Service, Fremont-Winema National Forest
- U.S. Department of Agriculture, Forest Service, Uinta-Wasatch-Cache National Forest
- FWS, Mountain-Prairie Region
- Utah Division of Wildlife Resources
- Wyoming Game and Fish Department

The BLM followed up with an email to these agencies on April 9, 2013. As of the date of this Draft SEIS, The following agencies accepted BLM's invitation and are participating in the development of the Draft SEIS:

- Nevada Department of Wildlife
- U.S. Department of Agriculture, Forest Service, Fremont-Winema National Forest
- Utah Division of Wildlife Resources (via Utah Public Lands Policy Coordination Office)
- Wyoming Game and Fish Department

Agencies declining the invitation include:

- Oregon Department of Fish and Wildlife
- FWS, Mountain-Prairie Region

The following agencies did not reply to the invitation:

- Bureau of Reclamation, Klamath Basin Area Office
- U.S. Department of Agriculture, Forest Service, Uinta-Wasatch-Cache National Forest

Cooperating agencies have assigned points-of-contact to participate in ongoing interdisciplinary team calls and have been provided an opportunity to review and comment on preliminary administrative versions of the Draft and Final SEIS. The BLM has also involved the cooperating agencies in acquiring data for the SEIS.

Public Outreach

The public was first notified of the Draft SEIS effort on April 30, 2013 when the Environmental Protection Agency published the "Notice of Intent to Prepare a Draft Supplemental Environmental Impact Statement for the Ruby Pipeline Project" in the *Federal Register* (78 FR 25301). In addition, the BLM Nevada State Office issued a press release and postcards notifying the public of this effort. The BLM used an updated version of the mailing list contained in Appendix A of the Ruby Final EIS for this mailing.

On April 3, 2013, June 28, 2013, and August 27, 2013 the BLM provided the Ninth Circuit Court of AppealAppeals and the litigants an update on the status of the Ruby Pipeline SEIS Project.

On July 5, 2013, the BLM and EPA published the "Notice of Availability of the Draft Supplemental Environmental Impact Statement

After Draft SEIS publication, tribes, agencies, and the public will be provided an opportunity to comment on this Draft SEIS. The comment period will end 45 days after publication of the Notice of Availability of the Draft SEIS for the Ruby Pipeline Project" in the *Federal Register*. (78 FR 40496) announcing the availability of the Draft SEIS for public review and comment. In addition, the BLM will issueissued a press release and send post card notifications to the revised project mailing list. The 36 tribes will also receivereceived a copy of the Draft SEIS and a letter extending the offer of government-to-government consultation. The release of the Draft SEIS initiated a formal 45-day public comment period that ended on August 19, 2013. The public was asked to submit comments via email, regular mail, and the ePlanning NEPA Register. The BLM encouraged interested parties to submit substantive comments.

The Draft SEIS will bewas made available to the public via the BLM Ruby Project website: http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html, and the ePlanning NEPA Register at: http://on.doi.gov/10QtaTb. Consistent with the Final EIS distribution, the Draft SEIS will bewas available at libraries and other locations. The list of additional locations can be found on the following pages and the project website.

The BLM received 31submissions from the public, agencies, tribes, organizations, and businesses during the comment period. Substantive comments were considered during preparation of this Final SEIS. Appendix A summarizes the comments and the responses to those comments.

Publication and distribution of the Final SEIS and public notification of the release of the Final SEIS was consistent with the approach used for the Draft SEIS.

LIBRARIES AND FEDERAL OFFICES THAT WILL RECEIVERECEIVED A COPY OF THE RUBY DRAFT AND FINAL SEIS

- Brigham City Carnegie Library, 26 E. Forest Street, Brigham City, Utah
- Cokeville Branch Library, 240 E. Main Street, Cokeville, Wyoming
- Colorado State University Library, Morgan Library, 1201 Center Avenue Mall, Ft. Collins, Colorado
- Elko County Library, 720 Court Street, Elko, Nevada
- Eureka County Library, 210 S. Monroe Street, Eureka Nevada
- Great Basin College Library, McMullen Hall, 1500 College Parkway, Elko, Nevada
- Humboldt County Library, 85 E. Fifth Street, Winnemucca, Nevada
- Klamath Community Library, Bonanza Branch, 31703 Hwy 70, Bonanza, Oregon
- Klamath County Library, 126 S. Third Street, Klamath Falls, Oregon
- Lander County Library, 625 S. Broad Street, Battle Mountain, Nevada
- Library of Congress, 101 Independence Avenue SE, Washington, DC
- Library of Congress, Madison Building, Exchange & Gift Div., Fed Doc Sec, C Street, Washington, DC
- Lincoln County Library, 519 Emerald Street, Kemmerer, Wyoming
- Logan City Library, 255 N. Main Street, Logan, Utah
- Lyon County Library, Dayton Valley Branch, 321 Old Dayton Valley Road, Dayton, Nevada
- Malin Branch Library, 2507 Front Street, Malin, Oregon
- Nevada Department of Wildlife, 1100 Valley Road, Reno, Nevada
- Nevada State Library, 100 N. Stewart Street, Carson City, Nevada
- Oregon State University, 121 The Valley Library, Corvallis, Oregon
- Pershing County Public Library, 1125 Central Avenue, Lovelock, Nevada
- Public Lands Policy Coordination Office, 5100 State Office Building, Salt Lake City, Utah
- Regional Planning Community, Library, 85 E. 5th Street, Winnemucca, Nevada
- Sacramento City College Library, 3835 Freeport Boulevard, Sacramento, California
- Salt Lake City Public Library, 210 East 400 South, Salt Lake City, Utah
- Siskiyou County Library, 719 Fourth Street, Yreka, California
- Southern Oregon University, Government Documents/ Hannon Library, 1250 Siskiyou Boulevard, Ashland, Oregon
- Sublette County Public Library, 155 S. Tyler Avenue, Pinedale, Wyoming
- Susanville Library District, 1618 Main Street, Susanville, California
- Sweetwater County Public Library, 300 N. First Street, Green River, Wyoming
- Tremonton City Library, 210 N. Tremont Street, Tremonton, Utah
- U.S. Bureau of Land Management, Black Rock Field Office, 5100 E. Winnemucca Boulevard, Winnemucca, Nevada
- U.S. Bureau of Land Management, Elko District Office, 3900 E. Idaho Street, Elko, Nevada
- U.S. Bureau of Land Management, Humboldt Field Office, 5100 E. Winnemucca Boulevard, Winnemucca, Nevada

- U.S. Bureau of Land Management, Kemmerer Field Office, 312 Highway 189 N., Kemmerer, Wyoming
- U.S. Bureau of Land Management, Klamath Falls Resource Area Office, 2795 Anderson Avenue, Ste. 25, Klamath Falls, Oregon
- U.S. Bureau of Land Management, Lakeview District Office, 1301 S. G Street, Lakeview, Oregon
- U.S. Bureau of Land Management, Nevada State Office, 1340 Financial Boulevard, Reno, Nevada
- U.S. Bureau of Land Management, Oregon State Office, 333 SW First Avenue, Portland, Oregon
- U.S. Bureau of Land Management, Salt Lake Field Office, 2370 South 2300 West, Salt Lake City, Utah
- U.S. Bureau of Land Management, Surprise Field Office, 602 Cressler Street, Cedarville, California
- U.S. Bureau of Land Management, Tuscarora Field Office, 3900 E. Idaho Street, Elko, Nevada
- U.S. Bureau of Land Management, Utah State Office, 440 West 200 South, Suite 500, Salt Lake City, Utah
- U.S. Bureau of Land Management, Wells Field Office, 3900 E. Idaho Street, Elko, Nevada
- U.S. Bureau of Land Management, Winnemucca District Office, 5100 E. Winnemucca Boulevard, Winnemucca, Nevada
- U.S. Bureau of Land Management, Wyoming State Office, 5353 Yellowstone Avenue, Cheyenne, Wyoming
- U.S. Bureau of Reclamation Library, 6th and Kipling Street, Building 67, Denver, Colorado
- U.S. Department of Interior, Natural Resource Library, Gifts and Exchange Section, 1849 C Street, NW, Washington, DC
- U.S. Department of Interior, Natural Resources Library, 1849 C Street NW, Washington, DC
- U.S. Department of Interior, U.S. Bureau of Land Management, Building 50, Denver Federal Center, Denver, Colorado
- U.S. Forest Service, Fremont-Winema National Forests, 1301 S. G Street, Lakeview, Oregon
- U.S. Geological Survey Library, 950 National Center, Room 1D 100, 12201 Sunrise Valley Drive, Reston, Virginia
- Uinta County Library, 701 Main Street, Evanston, Wyoming
- University of California, Acquisitions Bancroft Library, Berkeley, California
- University of Nevada- Las Vegas Library, 4505 S. Maryland Parkway, Las Vegas, Nevada
- University of Nevada- Las Vegas, James Dickinson Library, 4505 Maryland Parkway, Las Vegas, Nevada
- University of Nevada Libraries, Mathewson-IGT Knowledge Center/0322, Business & Government Information Center, 1664 N. Virginia Street, Reno, Nevada
- University of Nevada- Reno, DeLaMare Library/262, 1664 N. Virginia Street, Reno, Nevada

- University of Nevada- Reno, Life & Health Sciences Library Fleischmann Agriculture Bldg., Reno, Nevada
- University of Oregon Library, 1501 Kincaid Street, Eugene, Oregon
- University of Wyoming Libraries, Dept. 3334, 1000 E. University Avenue, Laramie, Wyoming
- USDA National Agricultural Library, Abraham Lincoln Building, 10301 Baltimore Avenue, Beltsville, Maryland
- Washoe County Libraries, Downtown Reno Library, 301 S. Center Street, Reno, Nevada
- Washoe County Libraries, Gerlach Community Library, 555 E. Sunset Blvd, Gerlach, Nevada
- Weber County Library, North Branch Library, 475 East 2600 North, North Ogden, Utah
- Weber County Library, Ogden Valley Branch Library, 131 South 7400 East, Huntsville, Utah
- Weber County Main Library, 2464 Jefferson Avenue, Ogden, Utah
- Wells Branch Library, 208 Baker Street, Wells, Nevada
- West Wendover Branch Library, 590 Camper Drive, West Wendover, Nevada
- Western Wyoming College Library, 2500 College Drive, Rock Springs, Wyoming
- Wyoming Game and Fish Department, 5400 Bishop Boulevard, Cheyenne, Wyoming

REFERENCES

[1] Council on Environmental Quality, Guidance on Consideration of Past Actions in Cumulative Impacts Analysis, 2005.

[2] League of Wilderness Defenders-Blue Mountains Biodiversity Project versus the United States Forest Service, 2008.

[3] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, "Nevada and Northeastern California Greater Sage-Grouse - Draft Land Use Plan Amendment and Environmental Impact Statement," Bureau of Land Management, Reno, Nevada, 2013.

[4] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, "Utah Greater Sage-Grouse - Draft Land Use Plan Amendment and Environmental Impact Statement," Bureau of Land Management, Salt Lake City, Utah, 2013.[3] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, "Nevada and Northeastern California Greater Sage-Grouse - Draft Land Use Plan Amendment and Environmental Impact Statement," Bureau of Land Management, Reno, Nevada, 2013.

[4] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, "Utah Greater Sage-Grouse - Draft Land Use Plan Amendment and Environmental Impact Statement," Bureau of Land Management, Salt Lake City, Utah, 2013.

[5] S. A. Trimble, The Sagebrush Ocean: A Natural History of the Great Basin, University of Nevada Press, 1999.

[6] M. M. Rowland, L. H. Suring, M. Leu and S. T. Knick, "Sagebrush-Associated Species of Conservation Concern," in Sagebrush Ecosystem Conservation and Management, Lawrence, KS, Allen Press, 2011, pp. 46-68.

[7] N. E. West, "Synecology and Disturbance Regimes of Sagebrush Steppe Ecosystems," Proceedings: Sagebrush Steppe Ecosystem Symposium, Boise State University, pp. 15-26, 1999.

[8] J. W. Burkhardt, "Herbivory in the Intermountain West: An Overview of Evolutionary History, Historic Cultural Impacts, and Lessons From the Past," Idaho Forest, Wildlife and Range Experiment Station, College of Natural Resources, University of Idaho, Boise, 1996.[8] J. W. Burkhardt, "Herbivory in the Intermountain West: An Overview of Evolutionary History, Historic Cultural Impacts, and Lessons From the Past," Idaho Forest, Wildlife and Range Experiment Station, College of Natural Resources, University of Idaho, Boise, 1996.

[9] D. B. Houston, "Wildfires in Yellowstone National Park," Ecology, pp. 1111-1117, 1973.

[10] S. G. Whisenant, "Changing Fire Frequencies on Idaho's Snake River Plains: Ecological Management Implications," in Proceedings: Symposium on Cheatgrass Invasion, Shrub Die-off, and Other Aspects of Shrub Biology and Management, Ogden, 1990.

[11] B. E. Bukowski and W. L. Baker, "Historical Fire Regimes, Reconstructed from Land-survey Data, Led to Complexity and Fluctuation in Sagebrush Landscapes," Ecological Applications, pp. 546-564, 2013.

[12] M. D. Licker, McGraw-Hill Dictionary of Scientific & Technical Terms, 6th Edition, New York: The McGraw-Hill Companies, Inc., 2003.

[13] J. D. McIver, M. Brunson and S. C. Bunting, "The Sagebrush Steppe Treatment Evaluation Project (SageSTEP): A Test of State-and Transition Theory," U.S. Department of Agriculture, Forest Service, Fort Collins, 2010.

[14] National Wildlife Federation, "Global Warming and Sagebrush Steppe Habitat," 13 March 2013. [Online]. Available: http://www.nwf.org/Wildlife/Threats-to-Wildlife-and Habitat/Sabebrush-Steppe.aspx. [Accessed 13 March 2013].

[15] J. F. Franklin and C. T. Dyrness, "Natural Vegetation of Washington and Oregon," U.S. Department of Agriculture, Forest Service, Portland, 1973.

[16] R. O. Harniss and R. B. Murray, "Thirty Years of Vegetal Change Following Burning of Sagebrush-grass Range," Journal of Range Management, pp. 322-325, 1973.

[17] A. R. Sands, S. Sather-Blair and V. Saab, "Sagebrush Steppe Wildlife: Historical and Current Perspectives," in Proceedings: Sagebrush Steppe Ecosystems Symposium, Boise, 1999.

[18] N. E. West, "Western Intermountain Sagebrush Steppe," in Ecosystems of the World: Temperate Deserts and Semi-deserts, N. E. West, Ed., Amsterdam, Elsevier Science, 1983, pp. 351-374.

[19] M. A. Schroeder, Current and Historic Distribution of Greater and Gunnison Sage-grouse in North America, Olympia, WA: Washington State Department of Fish and Wildlife, 2002.

[20] Bureau of Land Management, Greater Sage-Grouse Interim Management Policies and Procedures, Washington, DC, 2011.

[21] E. D. McArthur, "Sagebrush Systematics and Distrubance," Proceedings: Sagebrush Steppe Ecosystems Symposium, Boise State University, pp. 9-14, 1999.

[22] U.S. Geological Survey, "Energy, Land Use, and Sagebrush Ecosystems: Finding the Delicate Balance," 2013. [Online]. Available: http://www.fort.usgs.gov/SageEnergy/. [Accessed 29 April 2013].

[23] J. W. Connelly, S. T. Knick, M. A. Schroeder and S. J. Stiver, Conservation Assessment of Greater Sage-grouse and Sagebrush Habitats, Cheyenne: Western Association of Fish and Wildlife Agencies. Unpublished Report., 2004.

[24] National Agricultural Statistics Service, "2007 Census of Agriculture," U.S. Department of Agriculture, Washington, DC, 2009.

[25] Oregon Department of Fish and Wildlife, "Oregon Conservation Strategy," Oregon Department of Fish and Wildlife, Salem, 2006.

[26] A. H. Winward, "Management of Sagebrush Steppe Vegetation," in Sagebrush Steppe Ecosystems Symposium, Boise, 1999.

[27] Washington Department of Fish and Wildlife, "Washington Department of Fish and Wildlife," 2013. [Online]. Available: http://wdfw.wa.gov/conservation/research/projects/shrubsteppe/. [Accessed 29 April 2013].

[28] U.S. Fish and Wildlife Service, "Greater Sage-grouse (Centrocercus urophasianus) Conservation Objectives: Final Report," U.S. Fish and Wildlife Service, Denver, 2013.

[29] J. Fry, G. Xian, S. Jin, J. Dewitz, C. Homer, L. Yang, C. Barnes, N. Herold and J. Wickham, "Completion of the 2006 National Land Cover Database for the Conterminous United States," Photogrammetric Engineering & Remote Sensing, vol. 77, no. 9, pp. 858-864, 2011.
[29] J. Fry, G. Xian, S. Jin, J. Dewitz, C. Homer, L. Yang, C. Barnes, N. Herold and J. Wickham, "Completion of the 2006 National Land Cover Database for the Conterminous United States," Photogrammetric Engineering & Remote Sensing, vol. 77, no. 9, pp. 858-864, 2011.

[30] U.S. Department of the Interior, "The Impact of Federal Programs on Wetlands: A Report to Congress by the Secretary of the Interior," U.S. Department of the Interior, Office of Environmental Policy & Compliance, Shepardstown, WV, 1994.

[31] Bureau of Land Management, "History of Public Land Livestock Grazing," 17 July 2009. [Online]. Available: http://www.blm.gov/nv/st/en/prog/grazinghistory_of_public.html. [Accessed 13 March 2013].

[32] D. Child, "Sustainable Rangeland Management: The U.S. Example," 2005.
[32] D. Child, "Sustainable Rangeland Management: The U.S. Example," 2005.

[33] Bureau of Land Management, "Fact Sheet on the BLM's Management of Livestock Grazing," 5 February 2013. [Online]. Available: http://www.blm.gov/wo/st/en/prog/grazing.html. [Accessed 12 April 2013].

[34] J. M. Feller, "Recent Developments in the Law Affecting Livestock Grazing on Western Riparian Areas," Wetlands, vol. 18, no. 4, pp. 646-657, 1998.

[35] J. P. Blaisdell, R. B. Murray and D. E. McArthur, "Managing Intermountain Rangelands - Sagebrush-grass Ranges," U.S. Department of Agriculture, Forest Service, Ogden, 1982.

[36] J. A. Young, "History and Use of Semiarid Plant Communities - Changes in Vegetation," in Proceedings: Ecology and Management of Annual Rangeland, Ogden, 1994.

[37] J. W. Burkhardt and E. W. Tisdale, "Causes of Juniper Invasion in Southwestern Idaho," Ecology, vol. 57, no. 3, pp. 472-484, 1976. [37] J. W. Burkhardt and E. W. Tisdale, "Causes of Juniper Invasion in Southwestern Idaho," Ecology, vol. 57, no. 3, pp. 472-484, 1976.

[38] J. A. Young, "Historical Sagebrush Ecosystems: Human Influences," in Proceedings: Sagebrush Steppe Ecosystems Symposium, Boise, 1999.

[39] G. E. Gruell, "Post-1900 mule deer irruptions in the Intermountain West: Principal Cause and Influences (General Technical Report INT-GTR-206)," U.S. Department of Agriculture, Forest Service, Intermountain Research Station, Ogden, UT, 1986.

[40] D. A. Klebenow and J. W. Burkhardt, "Sage-Grouse on the Sheldon National Wildlife Refuge," U.S. Fish and Wildlife Service Contract Number 14-16-00178107, Boise, 1982.[39] G. E. Gruell, "Post-1900 mule deer irruptions in the Intermountain West: Principal Cause and Influences (General Technical Report INT-GTR-206)," U.S. Department of Agriculture, Forest Service, Intermountain Research Station, Ogden, UT, 1986.

[40] D. A. Klebenow and J. W. Burkhardt, "Sage-Grouse on the Sheldon National Wildlife Refuge," U.S. Fish and Wildlife Service Contract Number 14-16-00178107, Boise, 1982.

[41] J. C. Chambers, "Sagebrush Steppe: a Story of Encroachment and Invasion," Fire Science Brief, pp. 1-6, December 2008.

[42] National Park Service, "Feral Horses," Theodore Roosevelt National Park, 5 September 2013. [Online]. Available: http://www.nps.gov/thro/naturescience/feral-wild-horses.htm. [Accessed 6 September 2013].

[43] The Wildlife Society, "Feral Horses: Get the Facts," 2010. [Online]. Available: joomla.wildlife.org/documents/policy/feral_horses_1.pdf. [Accessed 6 September 2013].

[44] U.S. Geological Survey, "America's Wild Horses and Burros: Research for Management," Fort Collins Science Center, [Online]. Available: http://www.fort.usgs.gov/WildHorsePopulations/. [Accessed 6 September 2013].

[45] Bureau of Land Management, "Wild Horse and Burro Quick Facts," 2013. [Online]. Available: http://www.blm.gov/wo/st/en/prog/whbprogram/history_and_facts/quick_facts.html. [Accessed 25 May 2013].

[46] J. W. Evans, Horses: A Guide to Selection, Care, and Enjoyment, New York: W.H. Freeman/Owl Book, 2002.

[47] F. Lynghaug, The Official Horse Breeds Standards Guide, Minneapolis: Voyageur Press, 2009.

[48] Bureau of Land Management, "Rangeland and Herd Management," 2012. [Online]. Available: http://www.blm.gov/wo/st/en/prog/whbprogram/herd_management.html. [Accessed 25 May 2013].[42] National Park Service, "Feral Horses," Theodore Roosevelt National Park, 5 September 2013. [Online]. Available: http://www.nps.gov/thro/naturescience/feral-wild-horses.htm. [Accessed 6 September 2013].

[43] The Wildlife Society, "Feral Horses: Get the Facts," 2010. [Online]. Available: joomla.wildlife.org/documents/policy/feral_horses_1.pdf. [Accessed 6 September 2013].

[44] U.S. Geological Survey, "America's Wild Horses and Burros: Research for Management," Fort Collins Science Center, [Online]. Available: http://www.fort.usgs.gov/WildHorsePopulations/. [Accessed 6 September 2013].

[45] Bureau of Land Management, "Wild Horse and Burro Quick Facts," 2013. [Online]. Available: http://www.blm.gov/wo/st/en/prog/whbprogram/history_and_facts/quick_facts.html. [Accessed 25 May 2013].

[46] J. W. Evans, Horses: A Guide to Selection, Care, and Enjoyment, New York: W.H. Freeman/Owl Book, 2002.

[47] F. Lynghaug, The Official Horse Breeds Standards Guide, Minneapolis: Voyageur Press, 2009.

[48] Bureau of Land Management, "Rangeland and Herd Management," 2012. [Online]. Available: http://www.blm.gov/wo/st/en/prog/whbprogram/herd_management.html. [Accessed 25 May 2013].

[49] M. D. Reisner, J. B. Grace, D. A. Pyke and P. S. Doescher, "Conditions Favoring Bromus Tectorum Dominance of Endangered Sagebrush Steppe Ecosystems," Journal of Applied Ecology, pp. 1-11, 2013.

[50] F. Menalled, J. Mangold and E. Davis, "Cheatgrass: Identification, Biology and Integrated management," Montana State University, Extension, Bozeman, 2008.

[51] D. J. Manier, C. Aldridge, P. Anderson, G. Chong, C. Homer, M. O'donnell and S. Schell, "Land Use and Habitat Conditions Across the Southwestern Wyoming Sagebrush Steppe: Development Impacts, Management Effectiveness and the Distribution of Invasive Plants," Natural Resources and Environmental Issues, vol. 17, no. 1, p. Article 4, 2011.

[52] Bureau of Land Management, "Cheatgrass," 1 Octobe 2009. [Online]. Available: http://www.blm.gov/wy/st/en/programs/weeds_pests/Cheatgrass.html. [Accessed 29 April 2013].

[53] Bureau of Land Management, "BLM Nevada's War Against Weeds," 19 March 2009. [Online]. Available: http://www.blm.gov/nv/st/en/prog/more_programs/invasive_species.html. [Accessed 15 March 2013].

[54] National Park Service, "Cheatgrass," 13 March 2013. [Online]. Available: http://www.nps.gov/asko/NatRes/EPMT/Species_bios/Bromus%20tectorum.pdf. [Accessed 13 March 2013].

[55] N. Shaw and M. Pellant, "Great Basin Native Plant Selection and Increase Project: 2012 Progress Report," U.S. Department of Agriculture, Rocky Mountain Research Station and U.S. Department of the Interior, Bureau of Land Management, Boise, ID, 2013.

[56] K. Zouhar, "Bromus Tectorum," 2003. [Online]. Available: http://www.fs.fed.us/database/feis/plants/graminoid/brotec/all.html. [Accessed 15 March 2013].

[57] The University of Georgia - Center for Invasive Species and Ecosystem Health, "EDDMapS: Early Detection & Distribution Mapping System," 2013. [Online]. Available: http://www.eddmaps.org/distribution/uscounty.cfm?sub=5214. [Accessed 7 October 2013].

[58] P. J. Comer, P. J. Crist, M. Reid, J. Hak, H. Hamilton, B. Unnasch and I. Varley, "Central Basin and Range Rapid Ecoregional Assessment Report," U.S. Department of the Interior, Bureau of Land Management, 2012.[57] The University of Georgia - Center for Invasive Species and Ecosystem Health, "EDDMapS: Early Detection & Distribution Mapping System," 2013. [Online]. Available: http://www.eddmaps.org/distribution/uscounty.cfm?sub=5214. [Accessed 7 October 2013].

[58] P. J. Comer, P. J. Crist, M. Reid, J. Hak, H. Hamilton, B. Unnasch and I. Varley, "Central Basin and Range Rapid Ecoregional Assessment Report," U.S. Department of the Interior, Bureau of Land Management, 2012.

[59] Bureau of Land Management, "BLM Nevada's War Against Weeds," 2013. [Online]. Available: http://www.blm.gov/nv/st/en/prog/more_programs/invasive_species.print.html. [Accessed 23 April 2013].

[60] R. F. Miller and J. A. Rose, "Fire History and Western Juniper Encroachment in Sagebrush Steppe," Journal of Range Management, vol. 52, pp. 550-559, 1999. [60] R. F. Miller

and J. A. Rose, "Fire History and Western Juniper Encroachment in Sagebrush Steppe," Journal of Range Management, vol. 52, pp. 550-559, 1999.

[61] Landfire, "LANDFIRE Mean Fire Return Interval (LANDFIRE.US_110MFRI)," 2008. [Online]. Available: http://landfire.cr.usgs.gov/NationalProductDescriptions13.php. [Accessed 15 May 2013].

[62] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, GIS Data Created in the Analysis of the Alternatives, Affected Environment, and Impact Analysis on the BLM's eGIS Server Using Data from the U.S. Depatrment of the Interior, nevada State Office and California Alturas, Eagle Lake, and Surprise Field Office, 2013. [62] U.S. Department of the Interior, Bureau of Land Management and U.S. Department of Agriculture, Forest Service, GIS Data Created in the Analysis of the Alternatives, Affected Environment, and Impact Analysis on the BLM's eGIS Server Using Data from the U.S. Depatrment of the Interior, nevada State Office and California Alturas, Eagle Lake, and Surprise Field Office, 2013.

[63] D. Quinney, "Then and Now: Changes in Vegetation and Land Use Practices in Southwestern Idaho Sagebrush Lands, with Emphasis on Sagebrush and Former Sagebrush Lands of the Snake River Birds of Prey National Conservation Area North of the Snake River," in Proceedings: Sagebrush Steppe Ecosystem Symposium, Boise, 1999.

[64] R. F. Miller and R. J. Tausch, "The Role of Fire in Pinyon and Juniper Woodlands: A Descriptive Analysis," Tall Timbers Research Station Miscellaneous Publication No. 11, pp. 15-30, 2001.

[65] A. Kerr and M. Salvo, "Managing Western Juniperto Restore Sagebrush Steppe and Quaking Aspen Stands," Sagebrush Sea Campaign, 2007.

[66] C. o. N. R. R. L. Utah State University, "'PROVISIONAL' Digital Landcover Dataset for the Southwestern United States," 2004. [Online]. Available: http://earth.gis.usu.edu/swgap/.

[67] U. G. Survey, "Gap Analysis Program- Land Cover Data v2.2," [Online]. Available: http://gapanalysis.usgs.gov/gaplandcover/viewer/. [Accessed 2013].[66] C. o. N. R. R. L. Utah State University, "'PROVISIONAL' Digital Landcover Dataset for the Southwestern United States," 2004. [Online]. Available: http://earth.gis.usu.edu/swgap/.

[67] U. G. Survey, "Gap Analysis Program- Land Cover Data v2.2," [Online]. Available: http://gapanalysis.usgs.gov/gaplandcover/viewer/. [Accessed 2013].

[68] J. W. Connelly, M. A. Schroeder, A. R. Sands and C. E. Braun, "Habitat and Management: Sage Grouse Management," Wildlife Society Bulletin, pp. 967-985, 2000.

[69] A. Chalfoun, F. R. T. III and M. J. Ratnaswamy, "Nest Predators and Fragmentation: A Review and Meta-analysis," Conservation Biology, vol. 16, pp. 306-318, 2002.

[70] S. E. Stephens, D. N. Koons, J. J. Rotella and D. W. Willey, "Effects of Habitat Fragmentation on Avian Nesting Success: A Review of the Evidence at Multiple Spatial Scales," Biological Conservation, vol. 115, pp. 101-110, 2003.

[71] S. L. Webb, C. V. Olson, M. R. Dzialak, S. M. Harju, J. B. Winstead and D. Lockman, "Landscape Features and Weather Influence Nest Survival of a Ground-nesting Bird of Conservation Concern, the Greater Sage-grouse, in Human-altered Environments," Ecological Processes, pp. 1-4, 2012.

[72] S. Larivière, L. R. Walton and F. Messier, "Selection by Striped Skunks (Mephitis mephitis) of Farmsteads and Buildings as Denning Sites," The American Midland Naturalist, vol. 142, pp. 96-101, 1999.

[73] P. Coates and D. J. Delehanty, "Nest Predation of Greater Sage-grouse in Relation to Microhabitat Factors and Predators," Journal of Wildlife Management, vol. 74, pp. 240-248, 2010.

[74] M. Kidston, "Predation Leading Cause of Grouse Mortality, USDA Study Suggests," Billings Gazette, 15 December 2011. [Online]. Available: http://billingsgazette.com/news/state-and-regional/wyoming/predation-leading-cause-of-grouse-mortality-usda-study-suggests/article_495e46f0-78cf-5edf-ab3e-c314789ee5a1.html. [Accessed 13 November 2013].

[75] Bureau of Land Management, "Manual 6840: Special Status Species Management," U.S. Department of the Interior, Bureau of Land Management, Washington, DC, 2012.

[76] B. Walker, "Effects of management practices on grassland birds: Brewer's Sparrow," 12 August 2004. [Online]. Available: http://www.npwrc.usgs.gov/resource/literatr/grasbird/brsp/brsp.htm. [Accessed 22 April 2013].

[77] J. W. Martin and B. A. Carlson, "Sage Sparrow (Artemisiospiza belli), The Birds of North America Online (A. Poole, Ed.)," 1998. [Online]. Available: http://bna.birds.cornell.edu/bna/species/326. [Accessed 24 April 2013].

[78] T. D. Reynolds, T. D. Rich and D. A. Stephens, "Sage Thrasher (Oreoscoptes montanus): The Birds of North America Online (A. Poole, Ed.)," 1999. [Online]. Available: http://bna.birds.cornell.edu/bna/species/463. [Accessed 22 April 2013].

[79] U.S. Fish and Wildlife Service, "12-Month Finding on a Petition to List the Pygmy Rabbit as Endangered or Threatened," U.S. Fish and Wildlife Service, Washington, DC, 2010.

[80] U.S. Geological Survey, "North Dakota's Federally Listed Endangered, Threatened, and Candidate Species – 1995, Northern Sagebrush Lizard (Sceloporus graciosus graciosus)," 2 February 2013. [Online]. Available:

http://www.npwrc.usgs.gov/resource/wildlife/nddanger/species/scelgrac.htm. [Accessed 23 April 2013].

[81] C. E. Braun, O. O. Oedekoven and C. L. Aldridge, "Oil and Gas Development in Western North America: Effects on Sagebrush Steppe Avifauna with Particular Emphasis on Sage-grouse," Colorado State University, Fort Collins, 2002.

[82] M. W. Vander Haegen, "Fragmention by Agriculture Influences Reproductive Success of Birds in a Shrubsteppe Landscape," Ecological Applications, pp. 934-947, 2007.

[83] H. Sawyer, R. M. Nielson, F. Lindzey and L. L. McDonald, "Winter Habitat Selection of Mule Deer before and during Development of a Natural Gas Field," The Journal of Wildlife Management, vol. 70, no. 2, pp. 396-403, 2006.

[84] U.S. Fish and Wildlife Service, "Greater Sage-Grouse," 23 April 2013. [Online]. Available: http://www.fws.gov/mountain-prairie/species/birds/sagegrouse/. [Accessed 5 September 2013].

[85] D. J. Manier, D. J. Wood, Z. H. Bowen, R. M. Donovan, M. J. Holloran, L. M. Juliusson, K. S. Mayne, S. J. Oyler-McCance, F. R. Quamen, D. J. Saher and A. J. Titolo, "Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (Centrocercus urophasianus)," U.S. Geological Survey, Reston, Virginia, 2013.

[86] U.S. Department of the Interior, Bureau of Land Management and U.S. Deptartment of Agriculture, Forest Service, Nevada and Northeastern California Greater Sage-Grouse Administrative Draft Land Use Plan Amendment and Environmental Impact Statement, Elko: U.S. Department of the Interior, Bureau of Land Management, 2013.

[87] B. L. Walker, D. E. Naugle and K. E. Doherty, "Greater Sage-Grouse Population Response to Energy Development and Habitat Loss," The Journal of Wildlife Management, vol. 71, no. 8, pp. 2644-2654, 2007.[84] U.S. Fish and Wildlife Service, "Greater Sage-Grouse," 23 April 2013. [Online]. Available: http://www.fws.gov/mountain-prairie/species/birds/sagegrouse/. [Accessed 5 September 2013].

[85] D. J. Manier, D. J. Wood, Z. H. Bowen, R. M. Donovan, M. J. Holloran, L. M. Juliusson, K. S. Mayne, S. J. Oyler-McCance, F. R. Quamen, D. J. Saher and A. J. Titolo, "Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (Centrocercus urophasianus)," U.S. Geological Survey, Reston, Virginia, 2013.

[86] U.S. Department of the Interior, Bureau of Land Management and U.S. Deptartment of Agriculture, Forest Service, Nevada and Northeastern California Greater Sage-Grouse Administrative Draft Land Use Plan Amendment and Environmental Impact Statement, Elko: U.S. Department of the Interior, Bureau of Land Management, 2013.

[87] B. L. Walker, D. E. Naugle and K. E. Doherty, "Greater Sage-Grouse Population Response to Energy Development and Habitat Loss," The Journal of Wildlife Management, vol. 71, no. 8, pp. 2644-2654, 2007.

[88] S. M. Harju, M. R. Dzialak, R. C. Taylor, L. D. Hayden-Wing and J. B. WInstead, "Thresholds and Time Lags in Effects of Energy Development on Greater Sage-Grouse Populations," The Journal of Wildlife Management, vol. 74, no. 3, pp. 437-448, 2010.

[89] K. Wilkenson, Interviewee, Personal Communicatoin. [Interview]. 14 May 2013.

[90] J. W. Connelly, Interviewee, Telephone communication between John Beaver (WESTECH) and J. W. Connelly (Idaho Department of Fish and Game) for the Ruby Pipeline Project Final Environmental Impact Statement. [Interview]. 2 February 2009.[90] J. W. Connelly, Interviewee, Telephone communication between John Beaver (WESTECH) and J. W. Connelly (Idaho Department of Fish and Game) for the Ruby Pipeline Project Final Environmental Impact Statement. [Interview]. 2 February 2009.

[91] D. A. Denaith and M. McGee, "Species Assessment for Pygmy Rabbit (Brachylagus idahoensis) in Wyoming," U.S. Department of the Interior, Bureau of Land Management, Cheyenne, 2004.

[92] The Nature Conservancy and U.S. Deparment of Agriculture Research Service, "The Landscape Toolbox: State and Transition Models," [Online]. Available: http://www.landscapetoolbox.org/framework/state_and_transition_models. [Accessed 7 October 2013].[92] The Nature Conservancy and U.S. Deparment of Agriculture Research Service, "The Landscape Toolbox: State and Transition Models," [Online]. Available: http://www.landscapetoolbox.org/framework/state_and_transition_models. [Accessed 7 October 2013].

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APPENDIX A – COMMENT AND RESPONSE DOCUMENT

ATTACHMENT A

COMMENT AND RESPONSE DOCUMENT

RUBY PIPELINE PROJECT

U.S. Department of the Interior
Bureau of Land Management
Nevada State Office
Reno, Nevada

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ACRONYMS AND ABBREVIATIONS

BiOp	Biological Opinion
BLM	Bureau of Land Management
CEQ	Council on Environmental Quality
Certificate	Certificate of Public Convenience and Necessity
CIA	Cumulative Impacts Area
CFR	Code of Federal Regulations
EIS	Environmental Impact Statement
FERC	Federal Energy Regulatory Commission
FWS	U.S. Fish and Wildlife Service
HMA	Herd Management Area
NEPA	National Environmental Policy Act
NHPA	National Historic Preservation Act
MLA	Mineral Leasing Act
POD	Plan of Development
Project	Ruby Pipeline Project
ROD	Record of Decision
ROW	right-of-way
Ruby	Ruby Pipeline, L.L.C.
SEIS	Supplemental Environmental Impact Statement
USFS	United States Forest Service

BACKGROUND

History

The Ruby Pipeline Project (Project) is a 678-mile long, 42-inch diameter interstate natural gas pipeline that crosses 368 miles of Federal land beginning near Opal, Wyoming, through northern Utah and northern Nevada, and terminates near Malin, Oregon.

In response to a memorandum opinion issued by the Ninth Circuit Court of Appeals (Center for Biological Diversity, et al. v. U.S. Bureau of Land Mgmt., et al., Case No. 10-72356 [consolidated]), the BLM prepared a Draft Supplemental Environmental Impact Statement (SEIS) for the Project to provide a cumulative effects section that more thoroughly analyzes the cumulative impacts to sagebrush steppe habitat and vegetation.

On July 5, 2013, the BLM published a Notice of Availability announcing the availability of the Draft SEIS for public review and comment. The release of the Draft SEIS initiated a formal 45-day public comment period that ended on August 19, 2013. The BLM followed SEIS procedures as outlined by the Council on Environmental Quality (CEQ) 40 Code of Federal Regulations (CFR) § 1502.9, which requires preparation of a draft and final SEIS using the same procedures outlined for draft and final statements with the exception of a formal scoping period since the issues to be addressed in the SEIS are court mandated. The public was asked to submit comments via email, regular mail, and the ePlanning National Environmental Policy Act (NEPA) Register.

The BLM encouraged interested parties to submit substantive comments on the Draft SEIS. A description of substantive comments was posted on the BLM Ruby Project website and summarized in the Dear Reader Letter accompanying the Draft SEIS. The description of substantive comments is as follows:

According to BLM guidance (Handbook H-1790-1), substantive comments address one or more of the following:

- the accuracy of information in the EIS;
- the adequacy of, methodology for, or assumptions used for the environmental analysis;
- new information relevant to the analysis;
- reasonable alternatives in addition to those analyzed in the EIS; and/or
- changes or revisions in one or more of the alternatives.

Comments that are not considered substantive include the following:

- comments in favor of or against the proposed action or alternatives without reasoning that meet the criteria listed above;
- comments that only agree or disagree with BLM policy or resource decisions without justification or supporting data that meet the criteria listed above;
- comments that don't pertain to the project area or the project;
- comments that take the form of vague, open-ended questions.

To be most helpful, comments on the Draft SEIS should be as specific as possible, mentioning particular pages, sections, or chapters. Comments may address the adequacy of specific analysis in the Draft SEIS (refer to CEQ regulations at 40 CFR § 1503.3).

METHODOLOGY

During the comment period, the BLM received 31 submissions from the public, agencies, tribes, organizations, and businesses. The BLM Project Manager Team, composed of representatives of the Washington and Nevada State Offices, and BLM third-party contractors (Merjent and Galileo Project, LLC) read all of the submissions. Using the guidelines discussed above, the BLM determined which comments were substantive. All submissions were entered into a database that recorded individual comments, the submission's author and address, and corresponding key word(s).

The BLM followed CEQ regulations found at 40 CFR § 1503.4 and developed responses and/or revised the Draft SEIS in response to substantive comments. During this process, the comments were sorted by key word to aid the BLM in identifying trends and seeing the full range of public opinion regarding particular topics. Reviewing comments in this manner facilitated the development of comprehensive responses.

The BLM appreciates the time and effort the public put into their comments. Comments that did not meet the definition of substantive comments discussed above are summarized in the Additional Comments section.

ORGANIZATION OF THE COMMENTS AND RESPONSES

Comments are divided into three sections as follows:

Copies of Letters from Agencies and Tribes. In accordance with BLM policy, only letters received from federal, state, local agencies and from Native American Tribes are reprinted in full in Exhibit A. Portions of the letters from Native American Tribes contain sensitive cultural information and have been redacted. The letters received and reprinted are (in order of appearance in Exhibit A):

- Brigham City Corporation
- Confederated Tribes of the Goshute Reservation
- Environmental Protection Agency
- Fallon Paiute-Shoshone Tribe
- Fort Bidwell Paiute Tribe
- Fort McDermitt Paiute-Shoshone Tribe
- Nevada Division of State Lands
- Pyramid Lake Paiute Tribe
- Summit Lake Paiute Tribe
- Wyoming Game and Fish Department

Substantive Comments and Responses: Substantive comments are sorted by topic in this section including comments from agencies, tribes, businesses, organizations, and individuals. Each comment has an identifying code to allow tracking of the comments and responses in a database with each respondent and each piece of correspondence. Please note that comments may have been consolidated or edited for grammar and clarity.

Summary of Additional Comments: Comments that did not meet the substantive comment guidelines above are summarized by topic at the end of this section.

COMMENTS AND RESPONSES

Substantive Comments

Additional Considerations

ADDITIONAL CONSIDERATIONS COMMENT 1:
Page 21, last paragraph: We suggest adding ", as presented in Table 1" to the end of the 2nd last sentence.

RESPONSE:
The Environmental Effects section of the SEIS was updated to include this comment.

ADDITIONAL CONSIDERATIONS COMMENT 2:
My family and I have property holdings in Jungo, Nevada and it is not clear to me how wide the ROW is or is going to be. The railroad is also in that area. Does the pipeline go through there?

RESPONSE:
The Project is about 35 miles north of Jungo, Nevada. During construction, Ruby used a nominal 115-foot-wide ROW. The permanent ROW is 50 feet wide.

ADDITIONAL CONSIDERATIONS COMMENT 3:
Other un-quantified risks of exporting gas from Opal, Wyoming would include security risks from terrorist organizations known to be active in the Pacific Rim, yet ignored by BLM and FERC documents. Also un-assessed are the risks of domestic civil unrest (and accompanying riot damage or ecological sabotage) in response to gas cost spikes and economic upheaval, due to exporting United States' gas needed at home.

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS. Reliability and Safety are discussed in the Final EIS; the SEIS tiers to the Final EIS by reference. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project. Also, see the response to Health and Safety Comment 1.

ADDITIONAL CONSIDERATIONS COMMENT 4:
I demand that the BLM, pursuant to the MLA regulations in 43 CFR 2886.17(a-b),suspend or terminate the ROW grant/permit to Ruby where there is noncompliance with applicable laws, regulations, or ROW terms, conditions or stipulations. The Draft SEIS does not meet NEPA requirements; the Project does not satisfy MLA environmental protection regulations; the Project has not properly complied with NHPA Section 106; and Secretarial Order 3317 (and other consultation policies) has not been adhered to properly. Furthermore, Ruby's project activities constitute a significant threat to the human environment, and until those threats can be resolved or properly mitigated, the BLM must not reissue any ROW grant/permit to Ruby. If the impacts cannot be resolved or mitigated, the ROW must be subject to change or termination.

RESPONSE:
The comment does not identify specific deficiencies to be addressed. The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS. The SEIS complies with pertinent laws and regulations, including NEPA, NHPA, and the MLA.

The BLM recognizes the cultural and religious importance of sagebrush steppe habitat to Native American Tribes and their concerns regarding restoration. The BLM consulted with Native American Tribes in preparing the Final SEIS and the BLM continues to work with the tribes through government-to-government consultation regarding the Project and restoration efforts. Consultation is done in accordance with BLM Manual Handbook H-8120-1 and Secretarial Order 3317. For a summary of the BLM's government-to-government consultation, please see the Consultation and Coordination sections of the Final EIS and Final SEIS.

Tribes raised cultural issues with the initial ROD and ROW, including claims that the BLM violated Section 106 of the NHPA or failed to adequately undertake government-to-

government consultation, in the Ninth Circuit Court of Appeals. The court held that the BLM fulfilled its obligations with respect to these issues.

Air Quality

AIR QUALITY COMMENT 1:
If the Ruby or another pipeline should come under attack and be compromised, and methane gas delivered by Ruby to the North Elko Pipeline or the Pacific Connector Gas Pipeline should leak, we would not only risk a massive explosion, but we would also cause tremendous, irreparable damage to our global climate, especially combined with methane release from melting Arctic ice as a cumulative impact. Methane Gas is another major concern addressed in President Obama's Climate Change Plan why have architects of the Project environmental analysis ignored this real and tremendous threat to our biosphere?

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

Air quality and climate change are discussed in the Final EIS; the SEIS tiers to the Final EIS by reference. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

AIR QUALITY COMMENT 2:
And so, environmental impacts from both pipeline projects are intimately interrelated and must be considered as cumulative impacts of an overall project. Further, increased traffic and resulting carbon dioxide emissions from three confirmed gold mine expansions near the proposed North Elko Pipeline, along with any other residential, commercial or industrial development near the North Elko Pipeline and Project convergences are not included in either of the projects' EISs. Three other potential mine reopening/expansions' traffic carbon dioxide contributions are not considered among the cumulative impacts, either. Thus, the two pipelines' cumulative impacts, in the Draft SEIS and Final EIS are incomplete. These further cumulative impacts must be consistent with President Obama's Climate Change Plan, which sets reduced overall United States' carbon dioxide emissions as a main goal for limiting global impacts; and, they must be completed with the fully informed, free and prior consent of the Duck Valley and the other Shoshone Paiute tribes.

RESPONSE:
The North Elko Pipeline is one of the energy projects identified in Table 1 of the SEIS and was considered in the cumulative impact analysis, as have all publicly known projects of which we are aware, including mine expansions and other development (See the Energy and Mining Comment Section for projects the public asked the BLM to review).

The purpose of the SEIS is to respond to the deficiencies identified by the Ninth Circuit Court of Appeals and revise the cumulative effects analysis of the Final EIS as it relates to the

cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

Air quality and climate change are discussed in the Final EIS; the SEIS tiers to the Final EIS by reference. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

Biological Opinion

BIOLOGICAL OPINION COMMENT 1:
The impact of the Project on the water tables in Northern Nevada is not addressed in the current report. The SEIS did not supply ample information as how groundwater extraction and means of withdraw were to happen and how it would affect water tables.

RESPONSE:
The Ninth Circuit Court of Appeals determined that the Final EIS did not include adequate data on the cumulative effects to sagebrush steppe vegetation and habitat. The court did not conclude that the discussion of groundwater extraction in the Final EIS was deficient or in violation of NEPA. The purpose of the SEIS is to respond to the deficiency identified by the court and revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat. See the Introduction and Purpose and Need sections of the Final SEIS for additional information. Analysis outside of that purpose is beyond the scope of the SEIS.

The Ninth Circuit Court of Appeals, in a separate opinion, remanded the BiOp for the pipeline to the FWS for further analysis of the impacts of groundwater withdrawals. The FWS released a revised BiOp to the public on July 5, 2013. The revised BiOp is available on the FERC's website (www.ferc.gov). The FWS concluded in the Revised BiOp that the Project used less water than anticipated in the 2010 BiOp.

BIOLOGIC OPINION COMMENT 2:
As pertinent, in reapproving the Project ROW, the cumulative impacts of the Pipeline to the sagebrush steppe habitat, the SEIS should have coincided with the release of the BiOp supplied by the FWS. At this time, the release of the BiOp is unknown since the ROD was based on the BiOp. The BiOp is important to its accompaniment to the Cumulative Impacts documents

RESPONSE:
The FWS and BLM have coordinated their efforts to issue a revised BiOp and decision on whether to reissue the ROW grant. Both actions are being completed in accordance with a court-approved schedule. The FWS released the revised BiOp on July 5, 2013 and FERC made it available on their website (www.ferc.gov) that day. The BLM recognizes its obligations under the Endangered Species Act (ESA) and will consider the Revised BiOp in making any decision to re-issue the ROW grant. Please note, however, that the only deficiency identified by the Ninth Circuit Court of Appeals regarding the Project Final EIS pertained to the cumulative effects to sagebrush steppe habitat and vegetation and not to any species listed under the ESA. Thus, the

analysis in the Revised BiOp is outside the scope of the Final EIS cumulative effects analysis directed by the court and was not included in the SEIS.

Cumulative Effects

CUMULATIVE EFFECTS COMMENT 1:
The Draft SEIS (and Final EIS) omitted any detail on past actions, their incremental impacts, and total resource impacts from past actions. Instead, the BLM used an improper and minimalistic approach: "Past actions have been aggregated in order to describe the impact of historic activities on the existing environment." Draft SEIS at 4. This aggregated approach is a very course-grained method to generalize impacts from past actions and no quantified information whatsoever was provided as to vegetation rehabilitation status from past actions, which invariably show high rates of non-successful rehabilitation.

RESPONSE:
Past actions are not discussed individually in the SEIS; rather they have been aggregated in order to describe the impact of historic activities on the existing environment. According to CEQ guidance, "Agencies are not required to list or analyze the effects of individual past actions unless such information is necessary to describe the cumulative effects of all past actions combined. Agencies retain substantial discretion as to the extent of such inquiry and the appropriate level of explanation. […]. Generally, agencies can conduct an adequate cumulative effects analysis by focusing on the current aggregate effects of past actions without delving into the historical details of past actions." See "Guidance on the Consideration of Past Actions in Cumulative Effects Analysis", CEQ, June 24, 2005. Also see the responses to Scope of Analysis Comments 1 and 6.

CUMULATIVE EFFECTS COMMENT 2:
The heart of a cumulative effects analysis is to address the incremental impacts of the Project to "other past, present, and reasonably foreseeable actions". Adding to the baseline conditions, the increments, resource totals and grand sums must then be compared to regulatory caps (or possible constraints from management and conservation plans) and be evaluated as to their significant adverse impacts on resources. The Draft SEIS fails to accomplish the Ninth Circuit Court of Appeals' direction in this respect.

RESPONSE:
There is no quantified regulatory cap on sagebrush steppe loss. The Final SEIS addresses the court's direction to provide quantified and detailed data about the cumulative loss of sagebrush steppe vegetation and habitat and information on how much acreage sagebrush steppe used to occupy, and what percentage has been destroyed. It also includes detailed information on past, present, and reasonably foreseeable future actions within the cumulative impact area defined in the Final EIS for the Project, which have resulted in and may in the future cause significant impacts.

CUMULATIVE EFFECTS COMMENT 3:
Page 22, 1st paragraph: This "0.05 percent" figure suggests a tiny impact. We cannot disagree with the correctness of the number, as calculated here. We do, however, claim that it is

misleading as it does not include the effects outside the actual ROW. It is well known that actions within ROW's have effects outside their boundaries. These effects are especially multiplied when a ROW has a linear shape such as for pipelines, transmission lines, roads, etc. Effects beyond these borders can go out to different lengths, depending on the type of effect. For instance, invasive weeds first occupy the ROW corridor and then spread into the adjacent lands. Some species avoid the corridor itself and also a certain area beyond the corridor. The tiny percentage of the pipeline ROW is actually multiplied, and we think that there are quantitative measures of this multiplicative effect. Please include this analysis and augment the 0.05 percent figure with a more realistic estimate of the scale of the impact.

RESPONSE:
The Energy Projects subsection of the Environmental Effects section of the Final SEIS was updated to provide an estimate of the potential edge effect of indirect impacts caused by fragmentation.

CUMULATIVE EFFECTS COMMENT 4:
Page16. Although a good estimate of the amount of sagebrush steppe converted to cropland is given, the amount due to other causes (mining, energy extraction, road development, and urbanization) is left unstated. Can't this amount of other conversion be quantified for the 3 counties in the analysis area? Is it available in any publication? It seems as though satellite photography could quantify this. Even a gross estimate here would be helpful.

RESPONSE:
The Final SEIS was updated to include an estimate of the amount of development from non-agricultural uses within the CIA. These revisions may be found in Conversions to Cropland and Other Development subsection of the Affected Environment section of the Final SEIS.

CUMULATIVE EFFECTS COMMENT 5:
Page 22, 1st paragraph: There's a discussion of co-location of the Project route with other projects, saying that 58 % was co-located with existing ROWs; therefore, 42% was not. We suspect most of that 42% was in Nevada where the impact on sagebrush steppe was gravest. Please do a state-by-state breakdown of this co-location.

RESPONSE:
In Nevada, 61% of the Project route in sage-brush steppe is co-located with existing ROWs. Nevada is the state where the most co-location occurred within sagebrush steppe habitat. The Final SEIS was not revised in response to this comment.

CUMULATIVE EFFECTS COMMENT 6:
There are several factors that must be included in the revised cumulative effects analysis to provide a more realistic analysis of impacts on sagebrush habitat. First, the impacts of climate change on the acreage of sagebrush steppe must be included. Second, the analysis must use existing data on the effective return to sagebrush steppe that restoration and habitat improvement projects have achieved. Third, a continued loss and redistribution of water resources has impacts on sagebrush steppe and must be included in the cumulative effects analysis.

RESPONSE:
Neither the Draft nor Final SEIS suggest that sagebrush steppe will remain in areas presented in Figure 3 without further disturbances. Further, the Draft SEIS indicated that beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state. The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition. Most widely accepted literature and research does not cite climate change or the redistribution of water resources as having had a substantial historical impact on sage brush steppe. Climate change is further addressed in the Final EIS.

CUMULATIVE EFFECTS COMMENT 7:
The BLM fell short of identifying all of the effects or all of the projects' impacts within the CIA, including large projects with large-scale impacts. An obvious exclusion was the Clark, Lincoln, and White Pine Counties Groundwater Development Project. Impacts identified in this water project's EIS are expected to extend into Elko County, NV, and Box elder County, UT, and those significant impacts would interact with and contribute to significant adverse cumulative impacts relating to the Project and cumulative impacts on sagebrush vegetation and habitat. In fact, this particular water project, and its impacted sagebrush vegetation and habitat areas (plus its other resource impacts), are significantly closer to Project than say impacts within the Lake Tahoe Basin (southern part of Washoe County included in the CIA) to pipeline mile 550.

RESPONSE:
The Final EIS prepared for the Clark, Lincoln, and White Pine County Groundwater Development Project did not identify any individual or cumulative impacts on vegetation within Elko County, Nevada or Box Elder County, Utah. The CIA evaluated in the SEIS is identical to the CIA evaluated in FERC's Final EIS for the Project, which concluded that the effects of more distant projects would not contribute significantly to impacts associated with the proposed project. In the unpublished opinion, the court did not question the manner in which the CIA was defined. The court only found that the Final EIS did not provide sufficient quantified or detailed data about the cumulative loss of sagebrush steppe vegetation and habitat and did not provide information on how much acreage sagebrush steppe used to occupy, or what percentage has been destroyed.

Determination of Significance

DETERMINATION OF SIGNIFICANCE COMMENT 1:
In total, 420,725 acres of restoration and habitat improvement to sagebrush steppe is occurring within the CIA. This represents far more acreage than is calculated for energy development project impacts. BLM's statement that the pipeline will contribute toward a reduction in sagebrush steppe habitat is contradicted by the detailed data within the SEIS that clearly show that restoration and improvement acreage far outweighs the impacted acreage, nearly all of which will also be reclaimed. Rather, the data in the SEIS shows a net gain in benefits to sagebrush steppe habitat from the pipeline project.

RESPONSE:
While Ruby's off-site mitigation will be larger than its footprint, it is uncertain how successful the sage brush steppe habitat restoration will be. Numerous factors, such as soil chemistry and nutrients, precipitation, temperature, exposure to sunlight, etc. all play a role in the reseeding success.

The Draft SEIS acknowledges uncertainty with habitat improvement project success and indicated that beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state. The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

DETERMINATION OF SIGNIFICANCE COMMENT 2:
We disagree with the SEIS's statement on page 28 that, "The Ruby Pipeline Project and other energy and mining actions would continue a historic trend toward a reduction of sagebrush steppe vegetation and habitat." The pipeline impacts only 0.05% of the sagebrush steppe within the CIA, and the entirety of the project's disturbed acreage will be reclaimed with the exception of approximately 61 acres converted to permanent aboveground facilities. Details of these reclamation plans are contained in appendices F, L, and T of the Final EIS. Page 4-80 of the Final EIS states clearly that successful revegetation will not be declared until long-term monitoring determines that "the cover and density of non-noxious vegetation within the construction ROW is similar to the adjacent undisturbed land."

RESPONSE:
While sagebrush will be restored along the ROW, the original habitat will not be fully restored since the seed mixes contain non-native plants, and the seed mixes do not contain the full spectrum of plants that were cleared from the ROW. The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

DETERMINATION OF SIGNIFICANCE COMMENT 3:
Page 29, 2nd paragraph: Clarity is essential in this summary section. In the last sentence, "...impacts in excess of…" is unclear. Does this mean impacts of the pipeline itself or cumulative impacts?

RESPONSE:
The Summary of Impacts section of the Final SEIS was updated to clarify why no additional mitigation is described in the Draft SEIS.

DETERMINATION OF SIGNIFICANCE COMMENT 4:
The table indicates that grazing is by far the most widespread, impacting over 70% of the sagebrush steppe in the CIA, though grazing is also acknowledged to have some environmental benefit, such as reducing wildfire risk when managed properly. Energy projects, by comparison, impact only 0.17%, and the 9,225 acres affected by construction of the Ruby Pipeline represent just 0.05% of the sagebrush steppe in the CIA. It is clear that the pipeline project's impacts are insignificant within the context of cumulative impacts. (14.05) Page 27 of the SEIS further acknowledges that, "Perhaps the most notable cause of sagebrush steppe decline can be attributed to wildfires." Given this analysis, it cannot be argued that the Project represents a significant impact to sagebrush steppe within the CIA relative to other uses and causes.

RESPONSE:
The Final EIS on page ES-5 states: "Depending on site-specific conditions, construction impacts on sagebrush steppe habitat would be significant as the habitat can take 50 years or longer to be restored." Nothing in the cumulative effects analysis counters this original statement.

DETERMINATION OF SIGNIFICANCE COMMENT 5:
Page 28, last paragraph: There is an admission here that the total impact, including past activities, is significant. Because the analysis must include past, present, and future actions, this is the main conclusion. We feel that it should be stated farther up in this summary section.

RESPONSE:
The Summary of Impacts section of the Final SEIS was revised based on these comments.

DETERMINATION OF SIGNIFICANCE COMMENT 6:
When considering past, present, and foreseeable impacts, BLM concludes," ... the cumulative impacts on sagebrush steppe vegetation and habitat would be significant." But because the BLM concludes current and foreseeable impacts are not significant, it states, "[b]ecause there are no impacts in excess of those discussed in the Final EIS, no additional action are described in this Draft SEIS." We ask the BLM to reconsider this significance determination. BLM should reconsider its analysis in light of the factors specified in the CEQ NEPA regulations found at 40 CFR § 1508.27. We believe that when these factors are considered, it is clear the Project will have significant impacts to the sagebrush ecosystem, even if the analysis is confined to only present and reasonably foreseeable future actions.

RESPONSE:
First, the Summary of Impacts section of the Final SEIS has been revised to clarify the long-term impacts of the Ruby Pipeline Project and the cumulative impacts discussed in the Final SEIS. The Draft and Final SEIS acknowledge that past actions have had a significant cumulative impact on the sage brush steppe habitat. The Final SEIS was revised to note that cumulative impacts from present and reasonably foreseeable future actions also may be significant.

Second, NEPA is a procedural statute that does not dictate specific outcomes. *See Robertson v. Methow Valley Citizens Counsel*, 490 U.S. 332, 350 (1989). NEPA requires that agencies take a hard look at project impacts, including cumulative impacts, but it does not require an agency to

mitigate impacts caused by any and all past actions. "Mitigation includes specific means, measures or practices that would reduce or eliminate effects of the proposed action or alternatives." (See BLM NEPA Handbook H-1790-1 at 61). Generally, in an EIS "all relevant, reasonable mitigation measures that could improve the project are to be identified," (BLM NEPA Handbook H-1790-1 at 62).

The Final EIS identified and discussed substantial mitigation to address project impacts to sagebrush steppe vegetation and habitat, and the FERC and the BLM required substantial mitigation for impacts to sagebrush steppe vegetation and habitat in the Certificate and ROD, respectively. The mitigation discussed in the Final EIS and required by the FERC and the BLM is reasonable given the impacts disclosed in the Final EIS and Final SEIS. As such, there is no need to identify and discuss additional mitigation.

DETERMINATION OF SIGNIFICANCE COMMENT 7:
Neither the Final EIS/ROD nor the Draft SEIS provided proper mitigation. The Draft SEIS intentionally excluded any mitigation whatsoever even after a partial revision of the cumulative impacts analysis, which helped to clarify some of the real impacts - the revised analysis showed even greater significant adverse impacts on sagebrush vegetation and habitat than the Final EIS/ROD. Instead, the Draft SEIS deferred to the insufficient mitigation in the Final EIS/ROD stating: "Because there are no impacts in excess of those discussed in the Final EIS, no additional mitigation is described in this Draft SEIS." We strongly disagree.

RESPONSE:
First, the Summary of Impacts section of the Final SEIS has been revised to clarify the long-term impacts of the Ruby Pipeline Project and the cumulative impacts discussed in the Final SEIS. The Draft and Final SEIS acknowledge that past actions have had a significant cumulative impact on the sage brush steppe habitat. The Final SEIS was revised to note that cumulative impacts from present and reasonably foreseeable future actions also may be significant.

Second, NEPA is a procedural statute that does not dictate specific outcomes. *See Robertson v. Methow Valley Citizens Counsel*, 490 U.S. 332, 350 (1989). NEPA requires that agencies take a hard look at project impacts, including cumulative impacts, but it does not require an agency to mitigate impacts caused by any and all past actions. "Mitigation includes specific means, measures or practices that would reduce or eliminate effects of the proposed action or alternatives." (BLM NEPA Handbook H-1790-1 at 61). Generally, in an EIS "all relevant, reasonable mitigation measures that could improve the project are to be identified," (BLM NEPA Handbook H-1790-1 at 62).

The Final EIS identified and discussed substantial mitigation to address project impacts to sagebrush steppe vegetation and habitat, and the FERC and the BLM required substantial mitigation for impacts to sagebrush steppe vegetation and habitat in the Certificate and initial ROD, respectively. The mitigation discussed in the Final EIS and required by the FERC and the BLM is reasonable given the impacts disclosed in the Final EIS and Final SEIS. As such, there is no need to identify and discuss additional mitigation.

Finally, the comment does not identify any specific measures beyond those already identified to further mitigate impacts.

Energy and Mining Projects

ENERGY AND MINING PROJECTS COMMENT 1:
Connecting pipelines include the North Elko Pipeline traversing northern Utah and Nevada for domestic gas usage, and the Pacific Connector Pipeline.

RESPONSE:
These projects are included in the analysis of cumulative effects as it relates to the cumulative loss of sagebrush steppe habitat in the CIA. See Table 1 in the Final SEIS.

ENERGY AND MINING PROJECTS COMMENT 2:
Page 5: Table 1 includes no geothermal projects. I believe there are several under construction or recently completed in the 3 counties defined as the "CIA". The website https://www.nvenergy.com/renewablesenvironment/renewables/geothermal.cfm lists several in Washoe and Pershing counties. Why were they not included?

RESPONSE:
Table 1 in the Draft SEIS included the Midnight Point and Mahogany Geothermal Exploration Projects in Lake County, Oregon. We have reviewed the website referenced in the comment to determine if additional geothermal projects should be added to Table 1. Based on our review, it appears that all of the projects listed on the website have already been constructed and would not be included in Table 1, which lists only present and reasonably foreseeable actions.

Past actions are not discussed individually in the SEIS; rather they have been aggregated in order to describe the impact of historic activities on the existing environment. CEQ guidance states, "Agencies are not required to list or analyze the effects of individual past actions unless such information is necessary to describe the cumulative effect of all past actions combined. Agencies retain substantial discretion as to the extent of such inquiry and the appropriate level of explanation. […]Generally, agencies can conduct an adequate cumulative effects analysis by focusing on the current aggregate effects of past actions without delving into the historical details of past actions."

We note that Pershing County, Nevada is not within the geographic boundaries of the CIA and, therefore, any projects in Pershing County are outside the scope of the SEIS.

ENERGY AND MINING PROJECTS COMMENT 3:
Page 26, 2nd paragraph: But the claim of “0.09 percent” is totally misleading as Table 2 does not include past activities in this category; and they are substantial in northern Nevada. Please reword to make clear that past actions are not included and that inclusion of such would change the figure significantly

RESPONSE:

Table 2 is in the section titled "Environmental Effects (of Present and Reasonably Foreseeable Future Actions)" and the header for column two states that the table pertains only to "Estimated Acres of Sagebrush Steppe that Would Be Directly Affected by Present and Reasonably Foreseeable Actions within the Cumulative Impact Area."

ENERGY AND MINING PROJECTS COMMENT 4:
Gas recovered by hydraulic fracking from Opal, Wyoming would be delivered by the Project and the North Elko Pipeline; without the authorization and completion of the Project, gas could not be delivered to and through the North Elko Pipeline. In fact, a Final Decision and actual construction of the North Elko Pipeline has been delayed, awaiting completion of the Project EIS process.

RESPONSE:
The North Elko Pipeline is one of the energy projects identified in Table 1 of the SEIS and has been considered in the cumulative impact analysis as it relates to the cumulative loss of sagebrush steppe vegetation and habitat in the CIA, as have all publicly known projects of which we are aware, including mine expansions and other development. Please note that the Ruby Pipeline is built and in operation.

ENERGY AND MINING PROJECTS COMMENT 5:
The Rossi Mine Expansion Project the Arturo Mine Project, the Hollister Underground Mine Project are known to be expanding, and potentially the Dee Gold Mine, Goldstrike Mine and Newmont's Midas Mine could be reopened and expanded. Traffic from mine expansions will increase, and increased mining employment could bring nearby commercial and residential development, including more roads and their associated carbon dioxide and other impacts. These cumulative impacts were completely omitted in both the Ruby Pipeline Draft Supplement EIS and North Elko Pipeline EISs.

RESPONSE:
The Rossi Mine, Arturo Mine, Hollister Underground Mine, and Midas Mine were all included in Table 1 of the Draft SEIS and addressed in the analysis. The Dee Gold Mine referenced in the comment appears to be the same project as the Arturo Mine, and the Goldstrike Mine is in Eureka County, Nevada, which is outside the CIA.

The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it related to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

Fire

FIRE COMMENT 1:
Page 21, 2nd paragraph: The claim is made here that "wildfires eclipse all other natural and anthropogenic effects" on eastern and central sagebrush ecosystems in the CIA. This claim will

diminish the relative cumulative impact of the pipeline; but, by previous paragraphs, the fire threat is actually anthropomorphic. Please make the connection between grazing and fire as an anthropomorphic effect.

RESPONSE:
The purpose of the statement that "invasive grasses and consequent wildfires eclipse all other natural and anthropogenic effects" is to provide relative perspective to the reader. The anthropomorphic connection between invasive species and wildfire (and grazing) is well established throughout the SEIS.

FIRE COMMENT 2:
Page 21, 3rd paragraph: The last sentence of this paragraph states that no information was available for the study area on juniper-pinyon encroachment. But satellite imagery or aerial photography over the past 2-3 decades should reveal juniper-pinyon encroachment on the sagebrush steppe. There must be some recent studies on this. The helpful briefing at http://www.firescience.gov/projects/briefs/00-1-1-03_FSBrief27.pdf
contains information leading one to think that information is available for northern Nevada on this topic.

RESPONSE:
The Juniper-Pinyon Encroachment subsection of the Affected Environment section of the Final SEIS has been updated to include additional information on woodland expansion.

FIRE COMMENT 3:
The Draft SEIS over-states the historic return intervals for the mountain big sagebrush. The mountain big sagebrush indicated prehistoric fire frequency was closer to 10 to 15 years, and in the drier Wyoming sagebrush type, the interval was closer to 30 to 60 years. BLM should consider the work done by Burkhardt and Tisdale regarding the prehistoric fire frequency for the mountain big sagebrush and the Idaho sagebrush steppe. See J. Wayne Burkhardt and E. W. Tisdale, Causes of Juniper Invasion in Southwestern Idaho, 57 Ecology 472-84 (May 1976).

RESPONSE:
The Wildfires subsection of the Affected Environment section of the Final SEIS was updated to include additional information on historic fire frequency.

Grazing by Livestock

GRAZING BY LIVESTOCK COMMENT 1:
Page 13: One of the four categories (set out in Table 1) of impacts analyzed is grazing by cattle and wild horses and burros. Livestock grazing acreage dwarfs everything else combined on public land in the area of analysis. BLM states that grazing has no negative impacts (although it covers 23 million acres) because of BLM's management - enforcing standards and guidelines for healthy rangelands (p. 16). How can this impact be so easily dismissed? Because of human resource limitations, BLM does little monitoring; so how does it know if grazing meets these management objectives now or in the past? We have been told that the BLM/USFS Sage-Grouse EIS (draft EIS to be released in September 2013) will disclose that most of Nevada's grazing allotments do NOT meet standards and guidelines. We ask that the BLM (and the USFS) supply

more detailed and more realistic information on actual grazing impacts in order to make the cumulative impacts analysis sound. Similarly, for wild horses and burros, the control of numbers in most HMAs has been difficult to impossible; and yet their impact is summarily dismissed by merely claiming that "BLM's goal is to ensure and maintain healthy wild horse populations on healthy public lands" (p. 14). Unfortunately, we know this goal is not being achieved, and the SEIS need to be forthright on this.

RESPONSE:
The Final EIS was updated to include additional information about healthy rangelands and guidelines for livestock management. (See the Livestock Grazing and Wild Horse Eco-Sanctuary subsection of the Cumulative Effects section of the Final SEIS). A section on Wild Horses and Burros that includes information on HMAs was added to the Affected Environment section of the Final SEIS. This information was considered in the Final SEIS analysis.

GRAZING BY LIVESTOCK COMMENT 2:
Page 16: Under the heading of Livestock Grazing, the 2nd paragraph says that, paraphrasing, current grazing practices have allowed the sagebrush steppe to "prosper" on allotments. "Prosper"? We think most conservation groups, and even many agency scientists, would question this claim. This may be true in certain areas, but to say that sagebrush steppe rangelands "prosper" in general is not supportable.

RESPONSE:
The Livestock Grazing subsection of the Affected Environment section of the Final SEIS was revised to remove the term "prosper."

GRAZING BY LIVESTOCK COMMENT 3:
The Draft SEIS states: "Permits and leases generally cover a 10 year period and are renewable if the BLM determines that the terms and conditions of the expiring permit or lease are being met and land health standards are being maintained. The BLM's overall objective in managing grazing is to ensure the long term health and productivity of the land and to create multiple environmental benefits that result from healthy watersheds." This is not accurate. Permits and leases are required to meet, maintain, or make progress towards maintaining rangeland health standards. BLM Handbook 4180-I.III.C-D (Jan. 19, 2001). The riparian standards focus on proper functions condition, while uplands address vegetation, diversity, health and vigor of the plants. The standards require identification of the causal factors that led to failing to maintain, meet, or not make progress towards meeting the rangeland health standards. It is not accurate to state that permits and leases will be renewed only if the land health standards are being maintained, because grazing permits are renewed if a permittee is making progress towards meeting the standards. Further, the terms and conditions for grazing on BLM lands that are identified in the permits and leases are those that are set forth in regional or state-based rangeland health standards and guidelines. See Draft SEIS at page 13. These will vary along the pipeline route to reflect local conditions.

RESPONSE:
The text in the Livestock Grazing and Wild Horse Sanctuary section was revised to clarify that permits and leases are renewable if the BLM determines that progress is being made toward

meeting and maintaining land health standards.

GRAZING BY LIVESTOCK COMMENT 4:
Any grazing exclosure area should be designed to also measure who is eating what, e.g. livestock, big game, and wild horses. See Draft SEIS at 10. Only excluding livestock grazing from sagebrush and/or riparian habitat will not aid in recovery if the adverse impact on this habitat is also due to grazing by big game and/or wild horses. As previously stated, big game and wild horses have no restrictions on their grazing pattern and could graze on the range year-long. Such unrestricted grazing could adversely impact the sagebrush steppe.

RESPONSE:
The Affected Environment section of the Final SEIS was updated to include a discussion of the impacts of wild horses and burros on the existing environment. This information was considered in the Final SEIS analysis.

GRAZING BY LIVESTOCK COMMENT 5:
The section on livestock grazing's impact to sagebrush steppe is inaccurate due to its premise that cattle and sheep grazing have the same impacts to sagebrush steppe. See Draft SEIS, at 15. Sheep browse sagebrush and cattle rarely eat it.

RESPONSE:
Sagebrush palatability to grazing livestock, including both cattle and sheep, is generally considered to be low. Certain chemical compounds found in sagebrush (terpenes) are thought to give sagebrush low palatability. While it may be true that sheep may be more accepting of sagebrush in their diet than cattle, both sheep and cattle generally must be encouraged to graze sagebrush over herbaceous understory plants, thus the SEIS considers the impacts to be about the same.

GRAZING BY LIVESTOCK COMMENT 6:
The Draft SEIS does note that livestock grazing can lead to increased sagebrush cover because the livestock tend to focus on the more palatable herbaceous grasses. The Draft SEIS should also discuss the impact the introduction of livestock grazing to the West in the mid-1800s had on sage-grouse populations. Livestock grazing started in the West about 1860 and the range was fully stocked by the mid-1880s. Grazing allowed the sagebrush cover to increase and caused a decrease in the herbaceous grasses, thus fireproofing the range. This increased sagebrush growth created favorable conditions for mule deer and sage-grouse habitat. This could have been the cause of the increased sage-grouse sightings in the late 1800s and early 1900s. Another factor that favored sage-grouse populations would have been increased predator control to protect the livestock operations.

RESPONSE:
The Draft SEIS noted (p. 16) that livestock were introduced into the West in in 1500s when the Spanish established missions, and by the late 1800s, rangeland in the western United States was severely overcrowded. The Livestock Grazing subsection of the Cumulative Actions section of the Affected Environment section of the Final SEIS was revised to note that, in some areas, grazing reduced the herbaceous understory and changed the fire regime, thereby temporarily

creating habitat more favorable for some species such as mule deer and sage-grouse in some circumstances. It was also revised to note that predator control is one factor that can favor sage-grouse.

GRAZING BY LIVESTOCK COMMENT 7:
The rangeland in western United States may have been severely overcrowded by livestock in the late 1800s, but this was changed by the combined effects of two severe droughts and a national Depression. The severe droughts ran from 1932 to 1938 and devastated millions of acres throughout the Great Plains. Western farmers and ranchers lost their crops, lost the water in their wells, and lost their livestock. During this same time period, the Great Depression was occurring and causing serious economic problems. The ranchers that still had animals and rangeland remaining after the drought were hesitant to invest the little money they had on ranching opportunities due to the failing market. There was no feed for livestock due to the drought and no money to buy feed due to the Great Depression. The Draft SEIS should note these facts in its historical overview of livestock grazing.

RESPONSE:
The Livestock Grazing subsection of the Affected Environment section of the Final SEIS was updated to provide a broader historical account of grazing into the 1900s.

Grazing by Wild Horses and Burros

WILD HORSE AND BURRO COMMENT 1:
I hereby notify the BLM and all interested parties that the 2013 SEIS has failed to acknowledge or take into consideration an additional endangered species that lives in and has the potential for harm from the Project activities – the Equus africanus, also known as the wild burro. Per the 1971 Congressional Wild Horse and Burro law, it is a federal crime to harass or harm this animal on its legally designated land. The Project crosses through numerous BLM wild horse and burro herd areas including but not limited to the Black Rock Range West, Warm Springs Canyon, Wall Canyon, Nut Mountain, and Massacre Lakes HMAs totaling 298,000 acres of wild horse and burro habitat. Because of the threat to this critically endangered species by the Project the SEIS is inadequate and must be changed to include mitigation measures for this species and to ignore this substantial issue is a violation of the NEPA law as well as the 1971 Congressional Law.

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

Analysis of effects to wild horses and burros was included in the Final EIS; the SEIS tiers to the Final EIS by reference.

Please note that the FWS does not consider populations of Equus africanus (formally Equus assinus) in the United States to be Threatened or Endangered; the Endangered populations are in Somalia, Ethiopia, and Sudan. See Notice of Clarification of Status of Wild Burros (Federal

Register, 43 FR 15973, March 24, 1977) and Notice of Clarification of Status of Wild Burros (Federal Register, 77 FR 33100, June 5, 2012) for additional information.

WILD HORSE AND BURRO COMMENT 2:
In discussing the future action of the wild horse eco-sanctuary, the Draft SEIS states that the specific information for the numbers of wild horses and burros in the affected areas was not available. See page 27. BLM should know the number of wild horses in the affected areas, because it must make sure the appropriate management levels are not exceeded each year.

RESPONSE:
The Affected Environment section of the Final SEIS was updated to include a discussion of the impacts of wild horses and burros on the existing environment. About 40,600 wild horses and burros roam BLM rangelands in the western United States as of the last census. Of that total, over 11,000 are within the cumulative impact area.

WILD HORSE AND BURRO COMMENT 3:
In the first paragraph of this section, the list of past actions that have attributed to sagebrush steppe disturbance is missing a few important actions. See Draft SEIS at 4. The increased numbers of grazing animals, wild horses, ungulates, and other wildlife, and the spread of invasive species by wind, wildlife, and birds also disturb sagebrush steppe. Livestock grazing is carefully managed while wild horses, ungulates, and other wildlife can graze year-long on the range, not be confined to pasture rotation, and have no forage utilization limits. The excessive grazing from wild horses and other ungulates are negatively impacting sage-grouse habitat as their populations have increased. On summer brood rearing habitat, excess horses severely impact upland springs and riparian vegetation. On winter range, when heavy snow restricts access, the wildlife are confined to more wind-swept, open areas where browsing can completely destroy sagebrush cover. For example, elk concentrations on wintering areas like the Hardware Ranch in Utah or in western Wyoming have completely removed sagebrush from the plant community.

RESPONSE:
The Affected Environment section of the Final SEIS was updated to include a discussion of the impacts of wild horses and burros on the existing environment. This information was considered in the Final SEIS analysis.

WILD HORSE AND BURRO COMMENT 4:
The Draft SEIS also cannot limit the discussion on maintaining rangeland health and sagebrush steppe habitat standards to just livestock grazing. It must also recognize that wild horse numbers throughout the affected area typically exceed appropriate management levels and the carrying capacity of affected rangelands. Grazing by wild horses, ungulates, and other wildlife can greatly impact the rangeland health and sage-grouse habitats if other causal factors such as energy development or wild horses are the causal factor.

RESPONSE:

The Affected Environment section of the Final SEIS was updated to include a discussion of the impacts of wild horses and burros on the existing environment. This information was considered in the Final SEIS analysis.

Greater Sage-Grouse

GREATER SAGE-GROUSE COMMENT 1:
Of the 9 categories of sagebrush-steppe identified only 4 are slightly depleted that could be restored with a smaller energy investment (30%), yet 5 categories require risky investments (70%). With these numbers it would seem that the BLM is not doing its job of protecting our public lands. Sage-grouse depends on the sagebrush-steppe ecosystem to survive. So far they are not being protected very well. It seems livestock grazing is not doing what it is supposed to do and instead is impacting the area. "Biologists estimate that approximately 70 percent of the area covered by sagebrush in the western United States has been altered by livestock grazing". This equates to about 21.6 million acres of historic sagebrush steppe within the CIA." Pg23. Now cheatgrass affects 50% of the sagebrush-steppe bio dome. 9225 acres were disturbed by Ruby.

The monies received are not being put to exclusive use of restoring this area. The restoration is expected to take 50 years. The reseeding does not conform to the original seed mix in original areas. Seemingly from the BLM's information the contractors or the BLM is reseeding where ever it wants with whatever is convenient.

RESPONSE:
The BLM's multiple-use mission mandates that public land resources be managed for a variety of uses, such as energy development, livestock grazing, recreation, and timber harvesting, while protecting a wide array of natural, cultural, and historical resources. The BLM manages the land today in accordance with current national priorities and uses the best available science to develop management plans and practices in support of those priorities. We acknowledge that all members of the public do not always agree with the national priorities, our management plans and practices, or the science supporting our management plans and practices.

Seeding is occurring in accordance with approved plans. Off-site mitigation projects are peer-reviewed by the appropriate agency to determine which projects should get funded. Agencies involved with project review includes the following: Nevada Department of Wildlife; Wyoming Landscape Conservation Initiative, Wyoming Game and Fish Department, Oregon Department of Fish and Wildlife, Utah Division of Wildlife Resources, and Utah Watershed Initiative. The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring.

GREATER-SAGE-GROUSE COMMENT 2:
Ruby brought their heavy equipment through the very grounds that were full of sage-grouse and let them over the rims on my ranch for those 2 1/2 months when BLM and the Nevada Department of Wildlife denied the use of county roads due to sage-grouse breeding. Bureau of land management (Surprise Valley Field Office, Cedarville, CA) chose to turn their head and didn't do anything to shut Ruby down when they knew this was happening. This situation had to affect the sage-grouse breeding to a great degree. I would like for the FERC to do a walk

through on my property at the ranch as well as through the BLM area of ROW. I have requested this of them as well.

RESPONSE:
The FERC's site inspection of the commentators' property is documented in the FERC's July 2013 Field Inspection Report posted on the FERC's website (www.ferc.gov).

The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. The BLM had no legal authority to prevent Ruby from working on private, state or county lands during sage-grouse lekking season. On Federal lands, Ruby was allowed at limited locations to work during the lekking season with timing restrictions.

GREATER-SAGE-GROUSE COMMENT 3:
Please supply ample information as to the impact to sage-grouse.

RESPONSE:
The Draft SEIS included a discussion on the impacts to greater sage-grouse to the extent that greater sage-grouse would be impacted by the cumulative loss of sagebrush steppe vegetation and habitat. The Energy Projects subsection of the Environmental Effects section of the Final SEIS was updated with some additional information on this topic. Greater sage-grouse are discussed further in the Final EIS; the SEIS tiers to the Final EIS by reference. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

GREATER-SAGE-GROUSE COMMENT 4:
The Draft SEIS notes that energy projects' operational activity is known to displace wildlife and alter habitat use patterns due to increased traffic and noise. Draft SEIS at 25. Specifically, it states that studies show drops in sage-grouse male lek attendance within two and three miles of energy development projects. Id. There is no data that supports the conclusion that background noise impacts sage-grouse populations or shows what noise levels are harmful. If there is any impact, it is not limited to energy projects but includes all anthropomorphic activities (recreation, highways, cattle drives, etc.) and varies by the duration. For instance, sage-grouse are found near the Jackson Airport, where noise levels exceed 65 dBA over a 24 hour period and certainly a gun during hunting season will also exceed that level, especially in a rural setting. The Draft SEIS cannot limit its discussion on noise impacts to energy development. It must disclose the fact that other anthropomorphic activities' noise levels may also have an impact on sage-grouse populations

RESPONSE:
The Energy Projects subsection of the Environmental Effects section of the Final SEIS was revised to indicate that development and human activities besides energy projects also may affect sage-grouse.

GREATER-SAGE-GROUSE COMMENT 5:
The Environmental Effects Section hardly mentions drought, West-Nile virus, or predation, which are some of the largest causes of sage-grouse population declines. Predation is briefly discussed under the Energy Development Section where the Draft SEIS mentions how large-

scale projects influence predation and nest success. However, drought and West-Nile virus are not mentioned at all. The project area, specifically Wyoming, suffers from the lack of precipitation as well as periodic drought, which can severely impact the growth of sagebrush and lead to sage-grouse population declines. The alleged decrease of sage-grouse population also coincided with the spread of the West-Nile virus in Wyoming. There is little documentation of any deaths from this disease, but it is reasonable to assume that it would have a similar impact on sage-grouse as it did with song birds in Wyoming.

Therefore, Draft SEIS cannot limit its Environmental Effects and Summary of Impact section to just livestock grazing, energy development, and wildfires, as sage-grouse habitat and populations are also largely impacted by predation, drought, and West-Nile virus.

RESPONSE:
The BLM prepared the SEIS in response to an unpublished opinion issued by the Ninth Circuit Court of Appeals finding that the Project Final EIS did not include an adequate discussion of the cumulative loss of sagebrush steppe vegetation and habitat or information on how much acreage sagebrush steppe used to occupy and what percentage has been destroyed. The Final SEIS includes a discussion on the impacts to greater sage-grouse to the extent that greater sage-grouse would be impacted by the cumulative loss of sagebrush steppe vegetation and habitat.

The Energy Projects subsection of the Environmental Effects Final SEIS was updated with some additional information on greater sage-grouse.

GREATER-SAGE-GROUSE COMMENT 6:
The EPA encourages BLM to consider some of the more recent scientific literature developed by other Department of Interior agencies seeking to inform the regional implementation of the national greater sage-grouse planning strategy that are not cited in the references to this Draft SEIS. In particular, USGS Open File Report 2013-1 098, Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (Centrocercus urophasianus).

RESPONSE:
Coincidentally, the report referenced in this comment was released only days before the Draft SEIS went to print. We have reviewed the report and incorporated additional information into the Final SEIS where appropriate (for example, see the Energy Projects subsection of the Environmental Effects section).

GREATER-SAGE-GROUSE COMMENT 7:
The EPA recommends that the BLM include in the Final EIS a discussion regarding BLM's Instruction Memorandum No. 2012-043 that requires assessment of the impacts of the ongoing use of an existing ROW to Greater Sage-Grouse habitat and to minimize such impacts to the extent allowed by law when renewing or amending the ROW.

RESPONSE:
The BLM considered these impacts in the Energy Projects subsection of the Environmental Effects section of the Final SEIS.

Health and Safety

HEALTH AND SAFETY COMMENT 1:
If the Ruby or another pipeline should come under attack and be compromised, and methane gas delivered by Ruby to the North Elko Pipeline or the Pacific Connector Gas Pipeline should leak, we would not only risk a massive explosion, but we would also cause tremendous, irreparable damage to our global climate, especially combined with methane release from melting Arctic ice as a cumulative impact. Methane Gas is another major concern addressed in President Obama's Climate Change Plan, why have architects of the Project environmental analysis ignored this real and tremendous threat to our biosphere?

Thus, cumulative impacts of gas exports must be weighed heavily against economic and actual security concerns, quantified as domestic cumulative impacts under scarcity and climate change scenarios, so that domestic gas supplies will be protected and prioritized as a matter of national security

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS. See also the response to Additional Considerations Comment 3.

Methodology

METHODOLOGY COMMENT 1:
The quantities of sagebrush vegetation and habitat were not calculated correctly nor are the methods for those calculations disclosed. Table 1 of the Draft SEIS lists a number of projects including cheatgrass and weed treatments, juniper reductions, and rehabilitation projects that allegedly provided certain increases in sagebrush vegetation and habitat. A major error in this approach is to assume a 1: 1 ratio of project area to project benefit - the mere size of the project does not translate into the direct benefit for sagebrush steppe vegetation and habitat as the Draft SEIS assumes. Furthermore, it is unclear as to what the acreages in Table 1 refer to regarding projects that have destroyed sagebrush vegetation and habitat. Is the approximate size of the project the amount of sagebrush vegetation destroyed due to the project, or are there other parameters that have gone into the calculation of area? It is unclear as to how Figures 2 and 3 were used in the calculations of sagebrush vegetation and habitat losses/gains. A proper analysis must disclose these types of specific information - the methodologies used - to allow the public and our Tribe a reasonable opportunity to evaluate and comment on this Draft SEIS.

RESPONSE:
The Draft SEIS indicated that beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state. The Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

The acreages in Table 1 are the total approximate size of the each project based on best available information. Based on sage-grouse maps, sagebrush steppe is estimated to have historically occupied about 30.8 million acres, or 76 percent of the total land area within the CIA (see Figure 2 in the Final SEIS). Today it occupies about 19.3 million acres or 48 percent (see Figure 3 in the Final SEIS). This data was used to directly determine sagebrush steppe losses of past projects, and also was used to directly determine or to extrapolate sagebrush steppe impacts of present and future projects. Extrapolation was based on the proportion of current sagebrush steppe to non-sagebrush steppe within the CIA.

METHODOLOGY COMMENT 2:
Not only has the BLM failed to properly analyze cumulative impacts and failed to require proper mitigation, but the BLM also has precluded our Tribe and the general public from having any fair or reasonable opportunity to evaluate and comment on whether the BLM's finding of "no additional mitigation" is actually warranted. The BLM has not provided applicable Project documents to the Confederated Tribes of the Goshute Reservation. No information has been available regarding conservation agreements and habitat improvement projects between Ruby and other parties. Up until the comment deadline for this Draft SEIS, the BLM has further withheld certain mitigation and monitoring plans by not providing them on the BLM's Ruby Pipeline Project website. In fact, the BLM's website for "Attachment 5 - POD" was "Last updated: 08-02-20 12". As part of that POD, the various plans are identified on the website as Appendix A- Appendix W. However, out of those 23 plans, only 9 are available and 14 are "to be posted". Several of the ' to be posted' plans are pertinent to the cumulative effects revision of the Draft SEIS. Moreover, we have no information on the terms and conditions that are being considered as part of any reissued ROW grant to Ruby, or any prospective changes to the stipulations that accompanied the original ROW to Ruby.

RESPONSE:
The BLM notified the public and Native American Tribes of the BLM's intent to prepare an SEIS and invited the public and Native American Tribes to comment on the Draft SEIS. See the Consultation and Coordination section of the Final SEIS for a summary of the BLM's consultation and coordination efforts.

The Final SEIS and the Decision to Reissue Right-of-Way Grant explain why the BLM has decided that additional mitigation is not necessary and was not assessed in the Final SEIS. The conservation agreements between Ruby and the BLM have been and are available on the BLM Project Website. The BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) was updated in September, 2013, to include the missing POD documents mentioned above.

Native American Concerns

NATIVE AMERICAN CONCERNS COMMENT 1:
The pipeline, which runs directly north of the Tribe's Reservation, has created a scar on the natural landscape. In addition to the adverse aesthetic impacts that the pipeline has created, the pipeline resulted in severe impacts to sagebrush steppe vegetation and habitat. Efforts to revegetate the segment of pipeline within the view shed of the Reservation have not been successful and have included the introduction of non-native vegetation. The value of the

sagebrush steppe habitat to Tribal members is great due to the use of sage in religious and ceremonial practices. The protection of sage of all species types are of high importance. Because many of the indigenous seeds are in many instances not readily available, we believe that the BLM should fund and engage Tribal experts to harness appropriate seeds and work with Tribal personal to re-vegetate the affected area.

RESPONSE:
The BLM recognizes the cultural and religious importance of sage brush steppe habitat to Native American Tribes and their concerns regarding restoration. The BLM consulted with Native American Tribes in preparing the Final SEIS. The BLM continues to work with the tribes through government-to-government consultation regarding the Project and restoration efforts. Consultation is done in accordance with BLM Manual Handbook H-8120-1 and Secretarial Order 3317. For summaries of the BLM government-to-government consultation, please see the Consultation and Coordination sections of the Final EIS and Final SEIS. The tribes raised cultural issues with the initial ROD and ROW, including claims that the BLM violated Section 106 of the NHPA or failed to adequately undertake government-to-government consultation, in the Ninth Circuit Court of Appeals. The court held that the BLM fulfilled its obligations with respect to these issues.

The use of tribal monitors to monitor the restoration of the ROW was not brought up during the development of the Final EIS, or during consultations for the Long Term Monitoring Plan. Please note the following: 1) the BLM does not require proponents to hire tribal monitors; 2) the BLM's decision will not result in new ground disturbance or impacts to cultural properties or sacred sites; and 3) the BLM actively monitors the condition of the ROW and does spot checks on Ruby's restoration and monitoring reports. The tribes are welcome to bring to the BLM's attention any area of the ROW with which they have a concern.

In future projects and actions, the BLM can evaluate the possibility of using more native plants in the restoration/revegetation process. Through the tribal consultation process, the tribes can provide input to the BLM on what plants they feel need to be restored to an area. The tribes must realize that for proponent driven projects, the BLM only specifies the seed mixes and the proponent is responsible for hiring a contractor to do the seeding/restoration. The BLM does not determine who a proponent hires to do any part of their project.

The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. Also see the responses to Requests for Additional Mitigation Comments 1 and 3 and Native American Concerns Comment 8.

NATIVE AMERICAN CONCERNS COMMENT 2:
Additionally, in Consultation and Coordination with any new Duck Valley Shoshone Paiute Tribal Chairman or Council, the United States BLM and United States FERC must follow and implement both of these agencies' Tribal Consultation and Coordination Plans, referring to the White House Council on Native American Affairs along with the White House Domestic Policy Council, and President Obama's Executive Order of June 26, 2013 Section 1(a) and (e), in furthering President Clinton's Executive Order 11375.

RESPONSE:
The BLM recognizes the cultural and religious importance of sage brush steppe habitat to Native American Tribes and their concerns regarding restoration. The BLM consulted with Native American Tribes in preparing the Final EIS. The BLM continues to work with the tribes through government-to-government consultation regarding the Project and restoration efforts. Consultation is done in accordance with BLM Manual Handbook H-8120-1 and Secretarial Order 3317. For summaries of the BLM government-to-government consultation, please see the Consultation and Coordination sections of the Final EIS and Final SEIS.

NATIVE AMERICAN CONCERNS COMMENT 3:
The Ft. McDermitt Paiute-Shoshone Tribe is a federally recognized Indian Tribe whose aboriginal homelands encompass the entire project area. The Tribe's current reservation lands include areas of Nevada and Oregon, our Tribe still uses our aboriginal territory for hunting, fishing, gathering, sacred/religious purposes, and other uses. Tribal use occurs around the area. It is clear from the Draft SEIS that there will be severe and irreparable environmental impacts from the proposed project that would affect our Tribe. As such, our Tribe has significant concerns about the proposed degradation of cultural resources and losses to our living community.

RESPONSE:
The BLM recognizes the cultural and religious importance of sage brush steppe habitat to Native American Tribes and their concerns regarding restoration. The BLM consulted with Native American Tribes in preparing the Final EIS. The BLM continues to work with the tribes through government-to-government consultation regarding the Project and restoration efforts. Consultation is done in accordance with BLM Manual Handbook H-8120-1 and Secretarial Order 3317. For summaries of the BLM government-to-government consultation, please see the Consultation and Coordination sections of the Final EIS and Final SEIS.

Please note that the project is built and in operation.

NATIVE AMERICAN CONCERNS COMMENT 4:
Throughout sagebrush steppe habitat, a number of stream beds may have been disturbed. Whether these streams are perennial, intermittent, and ephemeral; restoration of these valuable areas are of major significance. The mitigation through restoration efforts should be of high priority due to impact of water flow management and ultimate functionality of that surface water.

RESPONSE:
The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. As described in the Long Term Monitoring Plan (Appendix W of the POD), stream crossings and riparian areas are part of the monitoring program. In November, 2013, the BLM posted previous monitoring reports and field inspection reports on the BLM project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html). The BLM also notes that

Ruby Pipeline monitoring and field inspection reports are regularly posted on the FERC's website (www.ferc.gov).

NATIVE AMERICAN CONCERNS COMMENT 5:
The BLM has failed to uphold its trust obligation to the Confederated Tribes of the Goshute Reservation on this Project.

RESPONSE:
Government to government consultation was sought with the Confederated Tribes of the Goshute Reservation before the BLM issued the initial ROW grant. Those consultations are described in Section 4.10.3 of the Final EIS. Tribes raised cultural issues with the initial ROD and ROW, including claims that the BLM violated Section 106 of the NHPA or failed to adequately undertake government-to-government consultation, in the Ninth Circuit Court of Appeals. The court held that the BLM fulfilled its obligations with respect to these issues.

For the SEIS, letters were sent on March 13, 2013 and July 3, 2013 and consultation meetings were held with Confederated Tribes of the Goshute Reservation on April 5, 2013 and May 3, 2013. The BLM also contacted the Chairman of the Confederated Tribes of the Goshute Reservation on September 24, 2013 and offered to consult further. See the Consultation and Coordination section of the Final SEIS for additional information on the BLM's consultation efforts.

NATIVE AMERICAN CONCERNS COMMENT 6:
The BLM failed to provide any cumulative impacts analysis of sagebrush habitat in reference to tribal use and occupancy of that habitat. Historic and current tribal occupancy and use of sagebrush habitat must be provided in the SEIS such that an acceptable baseline condition is developed and compared against the Project effects, incremental impacts, and total resource impacts. The BLM has attempted to conduct a cumulative effects analysis that does not take into account some of the salient parameters, especially the increment of irreplaceable damage done to our ancestral homelands within the sagebrush steppe.

RESPONSE:
The Ninth Circuit Court of Appeals required the BLM to further examine the cumulative impacts to sagebrush steppe habitat and vegetation, and the Final SEIS acknowledges the traditional use of sage brush and other sage brush steppe habitat plants. The BLM has consulted with the tribes and sought their input on important plants that should be considered in future seed mixes. See the Consultation and Coordination section of the Final SEIS for a summary of the BLM's consultation efforts.

Tribes raised cultural issues with the initial ROD and ROW, including claims that the BLM violated Section 106 of the NHPA or failed to adequately undertake government-to-government consultation, in the Ninth Circuit Court of Appeals. The court held that the BLM fulfilled its obligations with respect to these issues.

NATIVE AMERICAN CONCERNS COMMENT 7:

The Federal government violated its duty to consult with the Confederated Tribes of the Goshute Reservation and acted in bad faith regarding the Project. Please submit to Confederated Tribes of the Goshute Reservation any copies of letters that have been sent from the Advisory Council on Historic Preservation to the BLM in reference to the Ruby.

RESPONSE:
Guidance in the National Programmatic Agreement for Implementation of the NHPA, directs the BLM to consult with relevant State Historic Preservation Officers, Indian tribes, and other consulting parties for all undertakings that will adversely affect properties that are eligible for listing in the National Register, and for the development of any procedures such as project specific programmatic agreements. In the Final SEIS, the BLM is not proposing to approve any additional construction or other ground-disturbing activity that will result in new impacts to cultural properties. The BLM understands that tribes are concerned about sagebrush steppe vegetation and sage-grouse . The BLM invited all tribes who were initially consulted on the Project to engage in consultation for the SEIS. The BLM initiated consultation (in accordance with Secretarial Order 3317 and BLM H-8120-1) with the tribes well in advance of the Draft SEIS comment period. Letters were sent to the tribes on March 3, 2013 and July 1, 2013 inquiring if they wanted to consult on the SEIS. After receipt of the Confederated Tribes of the Goshute Reservation's comments on the Draft SEIS, the BLM contacted the tribe and offered to provide additional information. The Chairman of the Confederated Tribes of the Goshute Reservation replied that the BLM had consulted with the tribe and that they had no additional issues. The Chairman declined the BLM's offer to meet.

Tribes raised cultural issues with the initial ROD and ROW, including claims that the BLM violated Section 106 of the NHPA or failed to adequately undertake government-to-government consultation, in the Ninth Circuit Court of Appeals. The court held that the BLM fulfilled its obligations with respect to these issues.

NATIVE AMERICAN CONCERNS COMMENT 8:
The simple comparison of numbers- acres of habitat destroyed vs. acres of restoration efforts - is not a fair or adequate way to conclude whether cumulative impacts are significant. We are a land-based people. Particular land areas, much of which is sagebrush steppe, are essential for our traditional practices and identity. The Project destroyed a portion of our homelands. The project can be built and other people can move; but not us because these lands are our home - it is where we go for traditional and religious uses, it is where our ancestors lived, and it is where our ancestors are buried. Habitat restoration and improvement projects may mend habitat in some areas in part, but those projects are not mending the land in the areas and in the manner important to our people. Our Tribal ancestral homelands and use of lands were irreparably damaged and significantly impacted. The cumulative impacts of past actions were adversely significant; the impacts of Project-specific actions are adversely significant; the cumulative impacts of present and future actions are overwhelmingly adverse and significant. And those impacts have been cleared by BLM based in part on restoration and rehabilitation plans that do not adequately mitigate the habitats that were destroyed (e.g., Final EIS Appendix L. Ruby Draft Restoration and Revegetation Plans: Wyoming, Utah, Nevada, and Oregon).The BLM has negated their duty to examine the real and cumulative impacts on the human environment in this Draft SEIS and require appropriate mitigation.

RESPONSE:
The BLM recognizes the cultural and religious importance of sage brush steppe habitat to Native American Tribes and their concerns regarding restoration. The BLM consulted with Native American Tribes in preparing the Final EIS. The BLM continues to work with the tribes through government-to-government consultation regarding the Project and restoration efforts. Consultation is done in accordance with BLM Manual Handbook H-8120-1 and Secretarial Order 3317. For summaries of the BLM government-to-government consultation, please see the Consultation and Coordination sections of the Final EIS and Final SEIS.

Please note the BLM actively monitors the condition of the ROW and does spot checks on Ruby's restoration and monitoring reports. The tribes are welcome to bring to the BLM's attention any area of the ROW with which they have a concern.

The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. The Summary of Impacts section of the Final SEIS has been revised to clarify the long-term impacts of the Ruby Pipeline Project and the cumulative impacts discussed in the Final SEIS. See the responses to Requests for Additional Mitigation Comments 1 and 3 and Native American Concerns Comment 1.

Restoration and Mitigation: Requests to Include Additional Mitigation in the Final SEIS and ROD
REQUESTS FOR ADDITIONAL MITIGATION COMMENT 1:
This document goes to great lengths to convince the reader that the Project's impact is "individually minor". We regret that the emphasis has been placed thusly and used to justify the conclusion that no further mitigation is required. Because the analysis here (and in the original EIS), shows that the impacts of past and present activities have been "collectively significant", we believe this document should focus more on that. We urge that additional mitigation be added to reduce cumulative impacts to a less than significant amount.

The SEIS clearly establishes that the cumulative impacts of Project plus other past, present, and future projects are significant. The ROD for the SEIS should require that there will be ongoing reclamation monitoring or analysis/research efforts, with the results of those analyses published in a publically accessible format. "A monitoring and enforcement program shall be adopted and summarized where applicable for any mitigation. See 40 CFR § 1505.2.

RESPONSE:
First, the Summary of Impacts section of the Final SEIS has been revised to clarify the long-term impacts of the Ruby Pipeline Project and the cumulative impacts discussed in the Final SEIS. The Draft and Final SEIS acknowledge that past actions have had a significant cumulative impact on the sage brush steppe habitat. The Final SEIS was revised to note that cumulative impacts from present and reasonably foreseeable future actions also may be significant.

Second, NEPA is a procedural statute that does not dictate specific outcomes. *See Robertson v. Methow Valley Citizens Counsel*, 490 U.S. 332, 350 (1989). NEPA requires that agencies take a hard look at project impacts, including cumulative impacts, but it does not require an agency to

mitigate impacts caused by any and all past actions. "Mitigation includes specific means, measures or practices that would reduce or eliminate effects of the proposed action or alternatives." (BLM NEPA Handbook H-1790-1 at 61). Generally, in an EIS "all relevant, reasonable mitigation measures that could improve the project are to be identified," (BLM NEPA Handbook H-1790-1 at 62).

The Final EIS identified and discussed substantial mitigation to address project impacts to sagebrush steppe vegetation and habitat, and FERC and the BLM required substantial mitigation for impacts to sagebrush steppe vegetation and habitat in the Certificate and initial ROD, respectively. The mitigation discussed in the Final EIS and required by FERC and the BLM is reasonable given the impacts disclosed in the Final EIS and Final SEIS. As such, there is no need to identify and discuss additional mitigation.

Finally, the Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. See the responses to Native American Concerns Comments 1 and 8 and Requests for Additional Mitigation Comment 3.

REQUESTS FOR ADDITIONAL MITIGATION COMMENT 2:
The impacts from the Project must be examined to determine how the Project can be modified to avoid and reduce impacts, or design proper mitigation that would offset the incremental amounts, resource totals, and grand sum of impacts. Because the Project has been constructed and went into service in July 2011, post-construction relief in the form of mitigation was identified by the Ninth Circuit Court of Appeals as pertinent to the revision of the Project EIS by preparing the SEIS. The Court did not weigh in on whether terminating the Ruby Pipeline ROW or modifying the pipeline route/ROW would accomplish relief at the time they issued their order/opinion, other than to say that the Tribes - Summit Lake Paiute Tribe and Fort Bidwell Paiute Tribe - had not requested such action as part of any injunctive or declaratory relief. Thus, conducting a proper cumulative impact analysis and including appropriate mitigation, at minimum, is essential before any reissuance of the ROW to Ruby.

RESPONSE:
First, the Summary of Impacts section of the Final SEIS has been revised to clarify the long-term impacts of the Ruby Pipeline Project and the cumulative impacts discussed in the Final SEIS. The Draft and Final SEIS acknowledge that past actions have had a significant cumulative impact on the sage brush steppe habitat. The Final SEIS was revised to note that cumulative impacts from present and reasonably foreseeable future actions also may be significant.

Second, NEPA is a procedural statute that does not dictate specific outcomes. *See Robertson v. Methow Valley Citizens Counsel*, 490 U.S. 332, 350 (1989). NEPA requires that agencies take a hard look at project impacts, including cumulative impacts, but it does not require an agency to mitigate impacts caused by any and all past actions. "Mitigation includes specific means, measures or practices that would reduce or eliminate effects of the proposed action or alternatives." (BLM NEPA Handbook H-1790-1 at 61). Generally, in an EIS "all relevant, reasonable mitigation measures that could improve the project are to be identified," (BLM NEPA Handbook H-1790-1 at 62).

The Final EIS identified and discussed substantial mitigation to address project impacts to sagebrush steppe vegetation and habitat, and FERC and the BLM required substantial mitigation for impacts to sagebrush steppe vegetation and habitat in the Certificate and initial ROD, respectively. The mitigation discussed in the Final EIS and required by FERC and the BLM is reasonable given the impacts disclosed in the Final EIS and SEIS. As such, there is no need to identify and discuss additional mitigation.

Regarding the modification of the pipeline route, the Ninth Circuit Court of Appeals stated "[a]t this point, an analysis of alternatives would no longer inform decision-making regarding the pipeline's location." *Center for Biological Diversity, et al. v. BLM, et al*., Case No. 10-72356, at 5 (2012) (unpublished opinion).

REQUESTS FOR ADDITIONAL MITIGATION COMMENT 3:
Before the BLM makes any decision or takes any action regarding the Ruby Pipeline SEIS or ROW permit, we request the following: Ruby Pipeline must be required to provide proper mitigation of sagebrush steppe habitat in an area and manner selected by the Confederated Tribes of the Goshute Reservation. Because the pipeline corridor destroyed Confederated Tribes of the Goshute Reservation's ancestral homelands at least between mile 150 to mile 350 of the pipeline, or 200 miles of the pipeline corridor, we request mitigation at a minimum ratio of 3: 1, or approximately 10, 908 acres.

RESPONSE:
As the land managing agency, the BLM has the legal authority to determine the appropriate level of mitigation. Through the consultation process and the scoping process the BLM can consider the impacts of the action on Confederated Tribes of the Goshute Reservation and other tribes, to develop appropriate mitigations. See the response to the Native American Concerns Comment 1and 8 and Requests for Additional Information Comment 1.

The Final EIS identified and discussed substantial mitigation to address project impacts to sagebrush steppe vegetation and habitat, and the FERC and the BLM required substantial mitigation for impacts to sagebrush steppe vegetation and habitat in the Certificate and ROD, respectively. The mitigation discussed in the Final EIS and required by the FERC and the BLM is reasonable given the impacts disclosed in the Final EIS and Final SEIS. As such, there is no need to identify and discuss additional mitigation.

Through off-site mitigation funds, Ruby has funded, either partially or entirely, the restoration of 90,300 acres of sagebrush steppe vegetation and habitat. This is greater than a 9:1 ratio. We acknowledge that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

REQUESTS FOR ADDITIONAL MITIGATION COMMENT 4:
The EPA recommends BLM consider increasing the 10:1 offset ratio of habitat restoration acreage compared to Project disturbance acreage in light of the scientific literature produced by

both the BLM national technical team and other reputable ecosystem scientists. The literature acknowledges the long time frames required to reestablish the vegetation characteristics of priority habitat for restoration projects in this arid environment. It also documents a considerable amount of uncertainty in the appropriate offset ratios to replace the loss of ecosystem support services and the results of previous habitat equivalency analyses used in the Ruby conservation measures plan.

RESPONSE:
As discussed in the SEIS, Ruby is required to provide up to $22.9 million in funding for restoration and habitat improvement projects as well as habitat studies in the vicinity of the pipeline. To date, $8.7 million has been earmarked for known present and future projects that would provide benefit, in part, for more than 90,300 acres of sagebrush steppe. This equates to a 9:1 ratio. The remaining $14.2 million has not yet been assigned to specific projects, but presumably would provide benefit for additional acreage that would cause the project to surpass a 10:1 ratio. The Draft SEIS acknowledges uncertainty with habitat improvement project success and indicated that beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state. The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

Restoration and Mitigation: Post Construction Restoration and Mitigation Effectiveness

RESTORATION AND MITIGATION EFFECTIVENESS COMMENT 1:
It has been nearly two years since the pipeline was installed through Brigham City, Utah. The City was informed that the FERC would oversee and monitor the vegetation restoration of the pipeline construction route where the natural condition and habitat has been disturbed. There is great concern with the restoration of the pipeline ROW pertaining to revegetation as the pipeline enters into the community from Flat Bottom Canyon along the west slope of the Wasatch Front (Wellsville section) mountain range. In addition, the dyer's wood noxious weed/plant has increased and spread through areas of disturbance beyond what seems to be the natural rate spreading along the mountain side. Brigham City seeks the FERC's assistance on this matter to address the pipeline's commitment and the FERC's commitment to communities that vegetation restoration will be complied with as was instructed.

RESPONSE:
A representative from the FERC contacted the commentator on July 29, 2013.

The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring.

RESTORATION AND MITIGATION MONITORING COMMENT 2:
A second area of mitigation that the BLM should consider requiring for the Project relates to the Wyoming Landscape Conservation Initiative (WLCI). The WLCI is a long-term science

based effort to assess and enhance aquatic and terrestrial habitats at a landscape scale in southwest Wyoming, while facilitating responsible development through local collaboration and partnerships (http://www.wlci.gov/). This program has become a key means for maintaining and restoring sagebrush habitats in western Wyoming where the Project is found. Therefore, the BLM should require Ruby to participate in this program, and perhaps contribute financial resources to it. BLM could also consider whether this program could be extended to the other states traversed by the Project.

RESPONSE:
A cooperative conservation agreement was established to fund restoration projects in the states crossed by the pipeline; this is discussed in the Restoration and Habitat Improvement Sections of the Final SEIS. Through this agreement, Ruby contributed to the program mentioned in the comment; see the POD, Appendix X, Sage-Grouse and Pygmy Rabbit Plan, which is available on the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html). For additional details on this program in Wyoming, contact Wyoming Wildlife- The Foundation.

RESTORATION AND MITIGATION MONITORING COMMENT 3:
Page 27, 2nd paragraph: The SEIS says that Ruby-funded restoration and habitat improvement projects "would benefit" more than 420,725 acres. These include cheatgrass treatment, post-fire stabilization and rehabilitation, fuel-break mowing, juniper removal, meadow restoration, and grazing exclosures. Were the projects effective, or not? There is no discussion of the success of these projects, or if too early to tell, of what monitoring means is being used to judge their effectiveness.

RESPONSE:
The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring.

The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

Monitoring of off-site mitigation projects is done on a case by case basis. For example, in Nevada seven of eight off-site mitigation projects have a monitoring component. The off-site mitigation projects are reviewed, selected, and monitored in accordance with the Conservation Agreement, which is part of Ruby's POD (and is available on the BLM Ruby Project website; http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html). See the response to Restoration and Mitigation Monitoring Comment 6.

RESTORATION AND MITIGATION MONITORING COMMENT 4:
Page 27, 2nd paragraph: It should be mentioned that this 420,725 is only about a tiny percent of the total of sagebrush steppe (1.9 million acres) in the CIA of study. Below the 90,300 acres

that Ruby mitigation will benefit is also only a tiny percentage. These percentages should be stated because above the argument was made that the Project ROW was tiny in comparison to total sagebrush steppe acreage in the CIA of study.

RESPONSE:
The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS was revised to include percentages.

RESTORATION AND MITIGATION MONITORING COMMENT 5:
The quantification of maintenance and gains of sagebrush steppe vegetation and habitat acreage is improper. The Draft SEIS suggests that sagebrush steppe will remain in the areas presented in Figure 3 without further disturbances. The Draft SEIS also suggests that the restoration and habitat improvement projects translate into 1:1 gains for sagebrush steppe; in other words, just because 420,725 acres may undergo restoration and habitat improvements does not translate into 420,725 acres of sagebrush steppe. This must be corrected in the cumulative effects analysis.

RESPONSE:
Neither the Draft nor Final SEIS suggest that sagebrush steppe will remain in areas presented in Figure 3 without further disturbances. Further, the Draft SEIS indicated that beneficial impacts would result only in incremental improvements to sagebrush steppe vegetation and habitat, not restoration to its original state.

The Restoration and Habitat Improvement subsection of the Environmental Effects section of the Final SEIS has been updated to further clarify that, even though the goal of restoration and habitat improvement projects is to enhance sagebrush steppe quantity and quality, the degree to which sagebrush steppe will be improved is variable and it is unlikely that the projects will individually or cumulatively restore sagebrush steppe to its original pre-European settlement condition.

RESTORATION AND MITIGATION MONITORING COMMENT 6:
The EPA recommends that the BLM review: United States Geologic Survey Open File Report 2013-1 098, Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (Centrocercus urophasianus), recommends that consistent planning criteria for locating energy corridors, facilities, and infrastructure be used to realize minimal impacts to intact sagebrush communities and associated sage-grouse populations. Most significantly for the Project, this Report emphasizes the importance of monitoring the effectiveness of restoration projects to insure that the amount of treated and restored lands have provided the required ecosystem service values before additional sagebrush habitat is disturbed.

RESPONSE:
The Final EIS contains the environmental analysis for siting the Ruby Pipeline; the SEIS tiers to the Final EIS by reference. The report reference above was not available during development of the Final EIS. However, the BLM has reviewed the report and incorporated additional

information into the Final SEIS where appropriate (for example, see the Energy Projects subsection of the Environmental Effects section).

Monitoring of off-site mitigation projects is done on a case by case basis. For example, in Nevada seven of eight off-site mitigation projects have a monitoring component. The off-site mitigation projects are reviewed, selected, and monitored in accordance with the Conservation Agreement, which is part of Ruby's POD (and is available on the BLM Ruby Project website; http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html). The Summary of Impacts section of the Final SEIS was revised to include clarification of the responsibilities of Ruby with regards to restoration and ROW monitoring. See the response to Restoration and Mitigation Monitoring Comment 3.

Requests for Additional Information

REQUEST FOR ADDITIONAL INFORMATION COMMENT 1:
Before the BLM makes any decision or takes any action regarding the Ruby Pipeline SEIS or ROW permit, we request the following: 1. BLM has indicated that the Ruby Pipeline ROW grant/permit has been suspended and is subject to reissuance (see 78 FR 40496 and Draft SEIS). We ask the BLM to submit a statement to the Confederated Tribes of the Goshute Reservation that details whether or not Ruby's ROW has been suspended, including any letter from BLM to Ruby regarding this issue and details on what operations/actions have been halted as a result of any suspended ROW and any applicable timeline for the ROW reissuance. Please include applicable authorities. Also, please include a copy of Ruby's ROW grant/permit and associated terms, conditions and stipulations.

RESPONSE:
The Ninth Circuit Court of Appeals remanded and vacated the BLM's ROD to the BLM. The court subsequently stayed vacature of the BLM's ROD until the BLM supplements the cumulative effects analysis in the Final EIS, as it pertains to sagebrush steppe habitat and vegetation, and decides whether to reissue the ROW grant. Until that time or the court orders otherwise, the BLM's ROD remains in-effect. The ROD and ROW grant are available on BLM's website

REQUEST FOR ADDITIONAL INFORMATION COMMENT 2:
The BLM has precluded our Tribe and the general public from having any fair or reasonable opportunity to evaluate and comment on whether the BLM's finding of "no additional mitigation" is actually warranted. The BLM has not provided applicable Project documents to the Confederated Tribes of the Goshute Reservation. No information has been available regarding conservation agreements and habitat improvement projects between Ruby and other parties. Up until the comment deadline for this Draft SEIS, the BLM has further withheld certain mitigation and monitoring plans by not providing them on the BLM's Ruby Pipeline Project website. In fact, the BLM's website for "Attachment 5 -POD" was "Last updated: 08-02-20 12". As part of that POD, the various plans are identified on the website as Appendix A- Appendix W. However, out of those 23 plans, only 9 are available and 14 are "to be posted". Several of the ' to be posted' plans are pertinent to the cumulative effects revision of the Draft SEIS. Moreover, we have no information on the terms and conditions that are being considered as part of any reissued ROW grant to Project, or any prospective changes to the stipulations that

accompanied the original ROW to Ruby.

We request that the BLM send to the Confederated Tribes of the Goshute Reservation three copies of a data disc (CD/DVD) of all Project documents so that we can have a meaningful and adequate opportunity to review and comment on this Draft SEIS and identify any additional mitigation and ROW stipulations.

Once we receive the information, we request a reasonable amount of time to provide further input on mitigation and ROW terms, conditions and stipulations.

RESPONSE:
The tribe was on the mailing list used to transmit the Draft EIS, Final EIS, ROD and Historic Properties Treatment Plan. The BLM also sent letters to notify the tribe that these documents were available and where the documents could be found along with an offer to consult with the tribe. After receipt of the Confederated Tribes of the Goshute Reservation's comments on the Draft SEIS, the BLM contacted the tribe and offered to provide additional information. The Chairman of the Confederated Tribes of the Goshute Reservation replied that the BLM had consulted with the tribe and that they had no additional issues. The Chairman declined the BLM's offer to meet.

The BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) was updated to include the missing POD documents related to the July 27, 2012 decision mentioned above. In November, 2013, the BLM posted previous monitoring reports and field inspection reports on the BLM project website (address above) and notes that Ruby Pipeline monitoring and field inspection reports are regularly posted on the FERC's website (www.ferc.gov). Also see the response to METHODOLOGY COMMENT 2 for additional information.

Sagebrush Steppe Vegetation and Habitat

SAGEBRUSH STEPPE COMMENT 1:
The discussion about the two environmental factors required for sagebrush steppe is missing one of the most significant factors. The preponderance of cold-season precipitation in the semi-arid intermountain west is the predominant controlling factor for sagebrush steppe. Cold season precipitation favors deep-rooted shrubs or woody plants, but the amount of precipitation is generally insufficient to support forests, In contrast, the grasslands exist because of growing season or warm-season precipitation.

RESPONSE:
The Affected Environment section of the Final SEIS was revised to include information on cold-season precipitation as an environmental factor required for sagebrush steppe.

SAGEBRUSH STEPPE COMMENT 2:
In the discussion on sagebrush steppe soils, the Draft SEIS must recognize that most of the region in the affected area is made up of alkaline soils, which do not support sagebrush. The failure to recognize this is one of the reasons why current estimates for sage-grouse habitat are often overestimated. Even the maps of historic and current sage-grouse habitat relied upon in

the Draft SEIS remain controversial. The maps depicting the historical habitat range and current preliminary priority habitat and preliminary general habitat for the sage-grouse have no objective data supporting the premise of a maximum distribution

RESPONSE:
It is true that some sagebrush species do not thrive in alkali soils (pH in excess of 8.5), but others will tolerate alkali soils, and a few species grow well in alkali soils, such as silver sagebrush (Artemisia cana) and early sagebrush (Artemisia longiloba). The maps of historic and current habitat in the SEIS are based on the most current and best scientific data compiled by interdisciplinary team experts from a variety of federal and state agencies.

SAGEBRUSH STEPPE COMMENT 3:
Therefore, a careful analysis of the historic records shows that sage-grouse were scattered and difficult to find throughout the West in the early 1800s and it was not until the late 1800s to the early 1900s that sage-grouse populations were more abundant.

This is just an example of the controversy surrounding the historic and current maps of sage-grouse habitat and the lack of data supporting the premise of a maximum distribution from the early 1800s to the late 1900s. The Draft SEIS should not use these maps as they do not accurately represent the historical and current estimates of habitat occupied by sage-grouse.

RESPONSE:
The comment does not provide sufficient references or documented information to be used in the Final SEIS. The maps of historic and current sage-grouse habitat in the SEIS are based on the most current and best scientific data compiled by an interdisciplinary team of experts from a variety of federal and state agencies.

Scope of the Analysis

SCOPE COMMENT 1:
Page 5 and ff. (Table 1): Table 1 fails to list past actions that most definitely contribute to the cumulative impacts. These must be considered in assessing whether some thresholds are being topped. The CEQ regulations specifically say "past".

RESPONSE:
Past actions are not discussed individually in the SEIS; rather they have been aggregated in order to describe the impact of historic activities on the existing environment. CEQ guidance states, "Agencies are not required to list or analyze the effects of individual past actions unless such information is necessary to describe the cumulative effect of all past actions combined. Agencies retain substantial discretion as to the extent of such inquiry and the appropriate level of explanation. […] Generally, agencies can conduct an adequate cumulative effects analysis by focusing on the current aggregate effects of past actions without delving into the historical details of past actions." See "Guidance on the Consideration of Past Actions in Cumulative Effects Analysis", CEQ, June 24, 2005. Also see the response to Cumulative Effects Comment 1 and Scope of Analysis Comment 6.

SCOPE COMMENT 2:

Most of the Sagebrush-Steppe impacts cited in Table 1 are future impacts not related to the existing Project. The discussion includes much more impacts than the Project. This seems to be an attempt to minimize the Project impact.

RESPONSE:
According to CEQ regulations implementing NEPA, the scope of the environmental analysis must include cumulative actions, even if they are seemingly insignificant, if they may have cumulatively significant impacts when viewed with the proposed action (Title 40, CFR, § 1508.25). This is further discussed in the Cumulative Actions section of the Final SEIS.

SCOPE COMMENT 3:
What is the percent of Ruby related sagebrush steppe habitat to the total sage brush habitat in all of the western states? It has to be a minute figure. The "wild" horses are ruining more sage brush habitat than all of the pipelines in the western states combined.

RESPONSE:
The Ninth Circuit Court of Appeals did not find fault with the CIA as described in the Final EIS. The cumulative impacts area, defined as the counties crossed by the Project, is the same CIA used in the Final EIS. See the Cumulative Actions section of the Final SEIS for further information. Therefore, determining the percentage of sagebrush steppe habitat on the Project as compared to the total sage brush habitat in the western United States is outside the scope of the SEIS.

The Affected Environment section of the Final SEIS was updated to include a discussion of the impacts of wild horses and burros on the existing environment.

SCOPE COMMENT 4:
Also, there is something odd about the CIA stopping at the borders between California and Nevada and between California and Oregon… Surely the cumulative impact does not recognize state borders! Is there a separate map for California?

RESPONSE:
The Ninth Circuit Court of Appeals did not find fault with the CIA as described in the Final EIS. The CIA, defined as the counties crossed by the Project, is the same CIA used in the Final EIS. See the Cumulative Actions section of the Final SEIS for further information. The FERC determined the CIA for the EIS in consultation with other government agencies in the counties in which ground disturbance occurred.

SCOPE COMMENT 5:
Page 5: As a footnote to Table 1, state the actual acreage affected by the Ruby Pipeline (about 10,000 acres) in order to compare with the acreages listed in this table.

RESPONSE:
Table 1 of the Final SEIS was revised to include a footnote indicating that about 9,225 acres of sagebrush steppe are affected by the Project.

SCOPE COMMENT 6:
The CIA is arbitrary. The CIA fails to provide any real or meaningful geographic extent within which some project impacts would occur, and fails to identify specific project locations or interactive impacts. The purpose of generating a CIA and cumulative impacts therein is not to trace county lines and list projects within those arbitrary jurisdictional boundaries; the purpose of the CIA is to generate a geographic area within which impacts from past, present and reasonably foreseeable future projects stand to add a possible incremental and interactive impact to the proposed action. The distance from the county boundaries and Project vary widely- In western Washoe County, NV (- pipeline mile 550) the pipeline is several hundred miles from the county's southern border, but in the last miles of pipeline that run through Oregon are no more than a few miles from counties in California, but the California counties were excluded from the CIA's geographic extent. The Draft SEIS must revise these fundamental cumulative effect errors.

RESPONSE:
The Ninth Circuit Court of Appeals did not find fault with the CIA as described in the Final EIS. The CIA, defined as the counties crossed by the Project, is the same CIA used in the Final EIS. See the Cumulative Actions section of the Final SEIS for further information. The FERC determined the CIA for the EIS in in consultation with other government agencies as the counties in which ground disturbance occurred.

Socioeconomics

SOCIOECONOMICS COMMENT 1:
New Information that needs to be considered in deciding whether to complete the Project to transport natural gas for domestic or overseas usage, includes the implications of connecting pipelines as cumulative impacts, the implementation of the aforementioned Obama Administration's Climate Change policies and Federally Recognized Tribes policies, as well as President Obama's trade policies currently in final stages of negotiations, known as the Trans-Pacific Partnership.

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS. Reasonably foreseeable pipeline projects are identified in the SEIS and analyzed as described in the purpose of the SEIS.

Please note that analysis of socioeconomic effects was included in the Final EIS, and that the SEIS tiered to the Final EIS by reference. More specifically, impacts to socioeconomics are discussed in Section 4.9 of the Final EIS. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project. Note that the pipeline is built and in service.

SOCIOECONOMIC COMMENT 2:
Further, domestic gas supplies are limited and actually in decline, as are all fossil fuels, despite what developers want investors to believe. What are the synergistic impacts of natural gas

scarcity in the United States coupled with systemic disruption from coalescing climate caused cataclysms? Study of places where these combined impacts are already in play could yield impressive estimates, yet have not been attempted for Ruby Pipeline gas export scenarios. In a republic where national security concerns trump our domestic security nets in budget talks, where privacy protections fall before intelligence technologies, surely our domestic fuel supplies and current-crises-underway merit our analysis when planning a several hundred mile-long Ruby Pipeline across the West towards foreign energy markets?

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

Please note that analysis of socioeconomic effects was included in the Final EIS, and that the SEIS tiered to the Final EIS by reference. More specifically, impacts to socioeconomics are discussed in Section 4.9 of the Final EIS. See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

SOCIOECONOMIC COMMENT 3:
Page 22, last paragraph: It is claimed that the reason why Ruby did not pick the West Wide Energy Corridor (WWEC) as its route was because there was no "environmental advantage." Actually the WWEC was not used because of financial reasons - much more costly to obtain ROWs across private checkerboard lands and added length to the pipeline route. We are not sure why any economic considerations are in the SEIS anyway. If the lesser environmental argument for the chosen route is admitted, then it seems that the SEIS should also be doing a cumulative impact analysis on the alternative WWEC route.

RESPONSE:
The Final EIS concluded that the WWEC would not confer an environmental advantage over the proposed route and there was no basis for recommending a route on the WWEC.

Vegetation and Invasive Species

VEGETATION COMMENT 1:
If juniper-pinyon reduction sought that restoration efforts be focused on areas that have high priority for ecological health and success and its value and benefit to wildlife and riparian ecological processes. Protection of watershed should be mapped.

RESPONSE:
We assume that the commenter is recommending that these resources should be mapped by watershed. The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

VEGETATION COMMENT 2:
Page 19, 2nd paragraph: Can the BLM please explain why the pipeline ROW at 110' wide, and similar linear ROW's, is not a greater source of invasive plants than two-tracks roads which are on the order of 10' wide?

RESPONSE:
The authors of the study cited suggest that two-track roads are a greater source of invasive plants because they likely receive little to no weed management. Other sources, such as maintained utility ROW, often receive weed treatment. Further, roads are more of a threat for noxious weeds than utility lines because they are frequently used by vehicles that can carry and introduce seeds from other areas. Utility ROW are typically reclaimed and are not used as a vehicle path, except in certain instances when maintenance is necessary.

VEGETATION COMMENT 3:
Page 25, last paragraph: The SEIS argues the ROW cleared of vegetation has benefits as a firebreak and could be mowed to keep it bare dirt. But the gist of the SEIS is that vegetation restoration is required for the ROW. How will the Final SEIS resolve this apparent conflict?

RESPONSE:
The Draft SEIS indicated that most transmission line projects are actively revegetated across their entire width following construction, and as a result, the firebreak benefit may be short term.

VEGETATION COMMENT 3:
In the section on impacts to sagebrush steppe by invasive species, the Draft SEIS must include the fact that wind, wildlife, and birds remain the most significant factors in the dissemination of invasive species. See Draft SEIS, at 19. Livestock grazing is not the only activity that causes or allows the introduction and spread of invasive plant species.

RESPONSE:
The Invasive Species subsection of the Affected Environment section of the Final SEIS was revised to identify biogenic vectors for the spread of invasive plants.

VEGETATION COMMENT 4:
The cheatgrass does begin growth in the fall/winter or early spring and uses up moisture that would support the later germinating native bunchgrass seedlings. However, it is the native bunch seedlings that cheatgrass out-competes, not the established perennials.

RESPONSE:
The Invasive Species subsection of the Affected Environment section of the Final SEIS was revised in response to the comment.

Visual Effects

VISUAL EFFECTS COMMENT 1:
Please consider the cumulative visual impacts from development activities (temporary and permanent). Some notable activities include proliferation of new roads, poorly-sited and

designed structures, lack of co-location of infrastructure and improper lighting, to name a few. A lighting plan should be submitted indicating the types of lighting and fixtures, the locations of fixtures, lumens of lighting, and the areas illuminated by the lighting plan. Any required FAA lighting should be consolidated and minimized wherever possible.

RESPONSE:
The purpose of the SEIS is to revise the cumulative effects analysis of the Final EIS as it relates to the cumulative loss of sagebrush steppe vegetation and habitat (see the Introduction and Purpose and Need sections of the Final SEIS). Analysis outside of that purpose is beyond the scope of the SEIS.

Please note that analysis of visual effects was included in the Final EIS, and that the SEIS tiered to the Final EIS by reference. More specifically, impacts to visual resources are discussed in Section 4.8.4 of the Final EIS and visual effect related mitigation is included in the POD (Appendix P). See the BLM Ruby Project website (http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html) for other documents related to the Project.

Also note that the Ruby Pipeline is built and in service.

Non-Substantive Comments

Commenters Question the Need for the SEIS

- This impact study after the fact seems more like the BLM is trying to get money from the private sector. When we hear about the court of appeals then we know that the government is out to steal money from the only people who produce a product in society.
- The court rightly pointed out when ruling on whether the Final EIS failed to "rigorously explore and objectively evaluate all reasonable alternatives" that such a discussion regarding location is moot. Construction is completed, the pipeline is in the ground, and any further analysis of alternatives is unhelpful regarding the pipeline's location. The pipeline is a vital method of transporting Rocky Mountain natural gas to markets across the West, helps to ensure consumer access to domestic natural resources, and positively contributes to the regional and national economies. No tangible benefit will be obtained by reversing the decision to grant the ROW.
- While I know that the environmental groups have pursued this through the Ninth Circuit Court of Appeals, this whole business of revisiting the study area for sagebrush steppe habitat is a total waste of tax payer money. What would be the outcome if the pipeline had a significant impact on the sage brush habitat? Remove the pipe that is already flowing natural gas?

General Comments on the SEIS Analysis without New Information

- Kinder Morgan has invested $22 million for projects to restore the damaged sagebrush. No more money should be wasted on this project. BLM has done a very good job overall on this major project. We need the revenue it creates.

- We appreciate the BLM's consideration and inclusion of our previous comments. We have no additional terrestrial wildlife or aquatic concerns pertaining to the SEIS.
- This EIS seems to be an attempt to whitewash the problems created by Ruby and the permit process. Yes gas is a utility and can build pipelines, but there are regulations that must be adhered to, to protect our Federal Lands. I would like to see Ruby forced to fix what they broke for the privilege of crossing our lands saving them a large amount of money.
- We believe that the SEIS goes a long way towards filling in the inadequacies of the original EIS insofar as cumulative impacts are concerned, and we commend the BLM for drawing together this additional information. Certainly, the reader gains a greater appreciation for the current state of natural resources on the high desert steppe. But, clearly, it should have been in the original EIS.
- We strongly believe that the efforts undertaken by Ruby LLC to actively restore and revegetate the great majority of the sagebrush steppe acreage impacted by the project in tandem with offsite restoration and habitat improvement projects satisfactorily address concerns regarding the pipeline's role in cumulative impacts. We therefore urge BLM to reissue the ROW for the project and refrain from imposing further mitigation requirements.
- The Ninth Circuit Court of Appeals rightly pointed out when ruling on whether the Final EIS failed to "rigorously explore and objectively evaluate all reasonable alternatives" that such a discussion regarding location is moot. Construction is completed, the pipeline is in the ground, and any further analysis of alternatives is unhelpful regarding the pipeline's location. The pipeline is a vital method of transporting Rocky Mountain natural gas to markets across the West, helps to ensure consumer access to domestic natural resources, and positively contributes to the regional and national economies. No tangible benefit will be obtained by reversing the decision to grant the ROW.

General Comments on Sagebrush Steppe Habitat and Native Plants

- We also feel that there is a great need for protection of the herbs, medicinal plants, sage hen, sage-grouse, deer, antelope, fox, wild horses, and burros as well as all other animal-species that are in the area considered for the Pipeline.
- All these indigenous plants and animals are used by the Indigenous natives of the land and have cultural significance. All these that are mentioned have spiritual and cultural significance to the Tribe. Tribes are a living culture still using traditional ceremonies. We are here for the preservation and protection of all sensitive cultural sites.
- Gathering by Northern Paiutes and Western Shoshones is through ancestral practices; therefore regardless of existing governmental boundaries, gathering of medicines and other cultural resources should not impact in sagebrush steppe habitat.
- I've attached a document containing vegetation listings as requested at our last consultation meeting on 8/9. Listing of vegetation seeds for consideration in future revegetation mixes. Borrowing directly from Catherine Fowler's book, In the Shadow of Fox Peak, (Nevada: 2002).

Comments on the Ruby Pipeline Project

- The Project did more for our area that any other contractor has to date. Our roads were better and the land they sued looks much improved. The pipeline has been better in every way.
- I oppose any ROW for this project. Taxpayers are tired of national open space being used by oil & gas profiteers to run their lines. They should be using private land. But they seek to make a killing by putting it through public land and our government agencies just keel over for the profiteers.
- Almighty God set this sagebrush habitat in storage for us all in the West. Thus the Project did no harm to the Americas. If the plaintiffs are true to their filings, they will support this great undertaking, now in place.

LIST OF COMMENTERS

Name	Affiliation
Alice Iveson Gladwell	
Amy L. Heuslein	BIA Western Regional Office
Andrea Randall	Southern Nevada Water Authority
Beth Rivers	Indigenous Support Coalition of Oregon
Brian Meinhart	Western Energy Alliance
Bruce Pendery	Wyoming Outdoor Council
David von Seggern	Toiyabe Chapter, Sierra Club
Delgadina Gonzales	Summit Lake Paiute Tribe
Diane Benson	Bureau of Waste Management, Nevada Division of Environmental Protection
Ed Naranjo	Confederated Tribes of the Goshute Reservation
Elwood Lowery	Pyramid Lake Paiute Tribe
F. Grant Cook	
Jean Public	
Jim Brown	JnR Hotel
Jim Watson	
John Hadder	Great Basin Resource Watch
Kathy Gregg	
Kent Connelly	Coalition of Local Governments
Leroy Parkinson	
Les Martin	
Loyette Meza	Fort Bidwell Paiute Tribe
Mark Bradley	Brigham City Corporation
Mark Konishi	Wyoming Game and Fish Department
Maxine Smart	Fort McDermitt Paiute-Shoshone Tribe of Nevada and Oregon
Michael Allen	
Nathan G. Strong	Fallon Paiute-Shoshone Tribe
Peter M.(Mac) Lacy	Oregon Natural Desert Association

Sherry Oster	
Skip Canfield	Nevada Division of State Lands- Department of Conservation and Natural Resources
Susan Austin Genevish	
Suzanne J. Bohan	Environmental Protection Agency
William Cowan	Summit Lake Paiute Tribe

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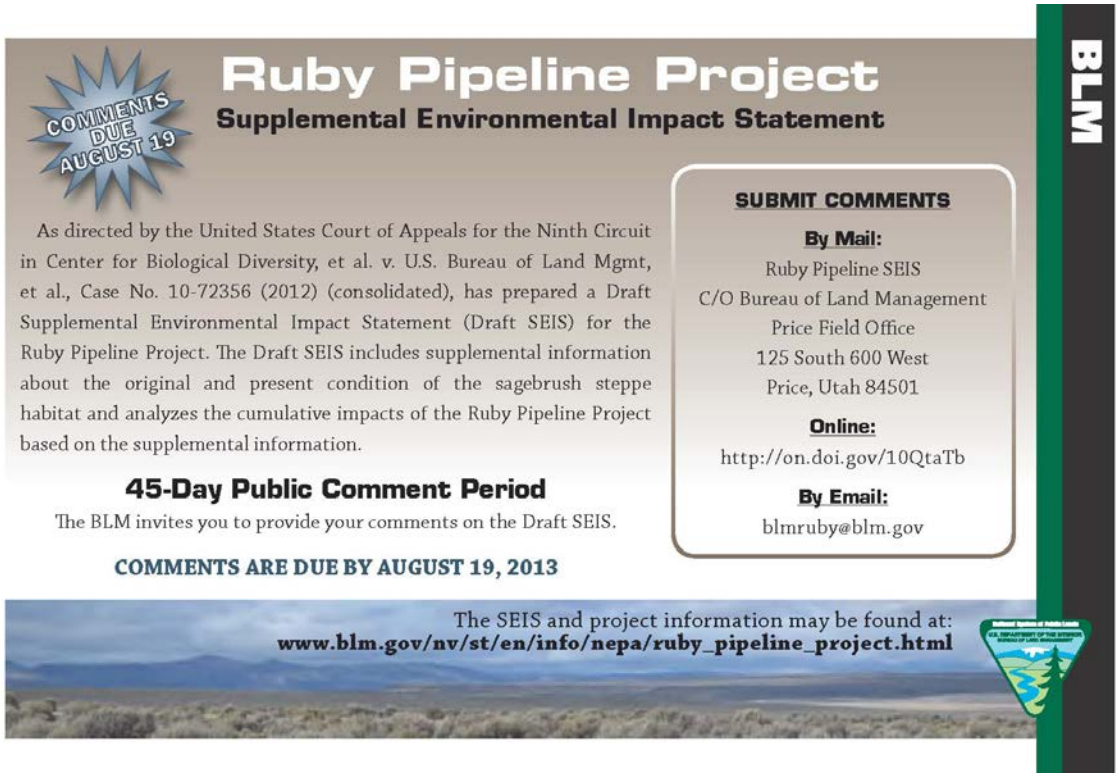

Ruby Pipeline SEIS
Mark Mackiewicz, PMP
Bureau of Land Management
Price Field Office
125 South 600 West
Price, UT 84501

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Press Release

U.S. DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT NEWS RELEASE
Nevada State Office

Release Date: 07/05/13
Contacts: Mark Mackiewicz, 435-636-3616, mmackiew@blm.gov

BLM Seeks Comments on Draft Supplemental EIS for the Ruby Pipeline Project

Reno, Nev.— The Bureau of Land Management (BLM) is seeking public comments on the Draft Supplemental Environmental Impact Statement (Draft SEIS) for the Ruby Pipeline Project. The Draft SEIS has a limited scope that includes updated information on the historical extent of sagebrush steppe habitat, and present and reasonably foreseeable future actions that could impact sagebrush steppe habitat. The Draft SEIS also contains an updated cumulative effects analysis based on this information, including indirect impacts on sagebrush steppe obligate species. The BLM's decision whether to reissue the ROW Grant and require additional mitigation will be based on this analysis.

The Draft SEIS is in response to a Ninth Circuit Court of Appeals Decision that found the Ruby Pipeline Final Environmental Impact Statement did not provide sufficient quantified or detailed data about the cumulative loss of sagebrush steppe vegetation and habitat. The pipeline has been constructed and is currently operational. It includes an approximately 678-mile long, 42-inch diameter interstate natural gas pipeline that crosses 368 miles of federal land beginning near Opal, Wyoming, extends through northern Utah and northern Nevada, and terminates near Malin, Oregon.

The comment period begins July 5 and **ends August 19**. Written comments received during this 45-day period will be considered during the development of a final SEIS. The Draft SEIS may be viewed at: http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html.

Copies of the Draft SEIS are also available for review at the following locations:

- BLM Kemmerer Field Office, 312 Hwy 189 N, Kemmerer, WY, 83101;
- BLM Salt Lake Field Office, 2370 South 2300 West, Salt Lake City, UT, 84119;
- BLM Elko District Office, 3900 E. Idaho Street, Elko, NV, 89801;
- BLM Winnemucca District Office, 5100 E. Winnemucca Blvd, Winnemucca, NV, 89445;
- BLM Lakeview District Office, 1301 S. G St., Lakeview, OR, 97630;
- BLM Klamath Falls Resource Area Office, 2795 Anderson Ave., Ste. 25, Klamath Falls, OR, 97603;
- BLM Surprise Field Office, 602 Cressler St., Cedarville, CA, 96104
- Additional locations where hard copies of the Draft SEIS can be viewed can be found on the project website or by contacting the project manager.

Before including your address, phone number, e-mail address, or other personal identifying information in your comment, be advised, that your entire comment--including your personal information—may be made publicly available at any time. While you can ask us in your comment to withhold from public review your personal identifying information, we cannot guarantee that we will be able to do so.

Comments should be mailed to Ruby SEIS, c/o Bureau of Land Management Price Field Office, 125 South 600 West, Price, Utah 84501; emailed to blmruby@blm.gov, or through the BLM Ruby website: http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html

For further information, contact Mark Mackiewicz, PMP, Project Manager at (435) 636-3616, Bureau of Land Management Price Field Office, 125 South 600 West, Price, Utah 84501; email mmackiew@blm.gov.

The BLM manages more than 245 million acres of public land, the most of any Federal agency. This land, known as the National System of Public Lands, is primarily located in 12 Western states, including Alaska. The BLM also administers 700 million acres of sub-surface mineral estate throughout the nation. The BLM's multiple-use mission is to sustain the health, diversity, and productivity of the public lands for the use and enjoyment of present and future generations. In Fiscal Year 2012, activities on public lands generated $4.6 billion in revenue, much of which was shared with the States where the activities occurred. In addition, public lands contributed more than $112 billion to the U.S. economy and helped support more than 500,000 jobs.
—BLM--

Last updated: 07-05-2013

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NOA Notice

Jean Sonneman,

Bureau of Land Management, Information Collection Clearance Officer.

[FR Doc. 2013–16133 Filed 7–3–13; 8:45 am]

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DEPARTMENT OF THE INTERIOR

Bureau of Land Management

[LLNVE02000 L5110000.GN0000LVEMF1300570 241A; 13–08807; MO# 4500050125; TAS: 14X5017]

Notice of availability of the Final Environmental Impact Statement for the Proposed Hollister Underground Mine Project, Elko County, NV

AGENCY: Bureau of Land Management, Interior.

ACTION: Notice of Availability.

SUMMARY: In accordance with the National Environmental Policy Act of 1969, as amended, and the Federal Land Policy and Management Act of 1976, as amended, the Bureau of Land Management (BLM) has prepared a Final Environmental Impact Statement (EIS) for the Hollister Underground Mine Project and by this notice is announcing its availability.

DATES: The BLM will not issue a final decision on the proposal for a minimum of 30 days from the date that the Environmental Protection Agency publishes their notice in the **Federal Register**.

ADDRESSES: Copies of the Final EIS for the Hollister Underground Mine Project are available for public inspection at the BLM Elko District Office. Interested persons may also review the FEIS on the Internet at *http://www.blm.gov/nv/st/en/fo/elko_field_office/blm_information/nepa.html.*

FOR FURTHER INFORMATION CONTACT: For further information contact Janice Stadelman, Project Manager; telephone 775–753–0346; address 3900 Idaho Street, Elko, NV 89801; email: *jstadelm@blm.gov.* Persons who use a telecommunications device for the deaf (TDD) may call the Federal Information Relay Service (FIRS) at 1–800–877–8339 to contact the above individual during normal business hours. The FIRS is available 24 hours a day, 7 days a week, to leave a message or question with the above individual. You will receive a reply during normal business hours.

SUPPLEMENTARY INFORMATION: Rodeo Creek Gold Inc. proposes an amendment to their plan of operations for the Hollister Underground Mine Project, which is located 47 miles northwest of Elko, Nevada in Elko County. The proposed amendment would expand existing underground exploration activities into an underground gold and silver mining operation. Most of the infrastructure to support a mining operation was authorized and built to conduct the underground exploration activities. The proposed project would create approximately 222 acres of surface disturbance. The project is expected to operate for 20 years and would provide an estimated 220 jobs.

The proposal is in conformance with the 1986 Elko Resource Area Resource Management Plan.

The Proposed Action consists of underground mining, constructing a new production shaft, improving existing roads, building a 120 kilovolt (kV) electrical power transmission line and a 24.9 kV distribution line to the mine site, upgrading ancillary facilities, and continuing both surface and underground exploration. The proposed project would augment the existing mine water management facilities that include water treatment facilities and rapid infiltration basins by adding underground dewatering wells and by obtaining a National Pollutant Discharge Elimination System permit to authorize discharge of groundwater to Little Antelope Creek. Mined ore would be hauled using highway-legal trucks to existing off-site milling facilities via existing roads that would be improved as needed. No on-site processing facilities are proposed.

The Draft EIS for the Hollister Underground Mine Project was available for review on June 1, 2012 (77 FR 32665). A 45-day comment period occurred. The BLM received a total of 33 comment submittals (e.g. letter, comment form or email). Key issues identified by individuals, groups or organizations, Tribe members, and governmental entities include: potential impacts to cultural resources and the traditional cultural properties, access, discharge to surface water, seeps and springs, post-closure groundwater contamination, air quality, and support for the project.

Comments on the Draft Supplemental EIS received from the public and internal BLM review were considered and incorporated as appropriate into the Final EIS. Public comments resulted in the addition of clarifying text, but did not significantly change the analysis.

The agency preferred alternative is the Proposed Action and the Backfill Alternative. The Backfill Alternative would require the shafts to be completely backfilled.

Following a 30-day Final EIS availability and review period, a Record of Decision (ROD) will be issued. The decision reached in the ROD is subject to appeal to the Interior Board of Land Appeals. The 30-day appeal period begins with the issuance of the ROD.

Authority: 40 CFR 1506.6; 40 CFR 1506.10.

Richard E. Adams,

Field Manager, Tuscarora Field Office.

[FR Doc. 2013–16126 Filed 7–3–13; 8:45 am]

BILLING CODE 4310–HC–P

DEPARTMENT OF THE INTERIOR

Bureau of Land Management

[LLNV930000 L51010000.ER0000 241A; 13–08807; MO# 4500051040; TAS: 14X5017]

Notice of Availability of the Draft Supplemental Environmental Impact Statement for the Ruby Pipeline Project, NV

AGENCY: Bureau of Land Management, Interior.

ACTION: Notice of Availability.

SUMMARY: In accordance with the National Environmental Policy Act of 1969, as amended (NEPA), and the Federal Land Policy and Management Act of 1976, as amended, the Bureau of Land Management (BLM) has prepared a Draft Supplemental Environmental Impact Statement (EIS) for the Ruby Pipeline Project and by this notice is announcing the opening of the comment period.

DATES: To ensure comments will be considered, the BLM must receive written comments on the Ruby Pipeline Project Draft Supplemental EIS within 45 days following the date the Environmental Protection Agency publishes its Notice of Availability in the **Federal Register**. The BLM will announce any future meetings or hearings and any other public involvement activities at least 15 days in advance through public notices, media releases, and/or mailings.

ADDRESSES: You may submit comments related to the Ruby Pipeline Project Draft Supplemental EIS by any of the following methods:

- *Web site: http://www.blm.gov/nv/st/en/info/nepa/ruby_pipeline_project.html.*
- *Email: blmruby@blm.gov.*
- *Mail:* Ruby SEIS, c/o Bureau of Land Management Price Field Office, 125 South 600 West, Price, Utah 84501.

Locations where copies of the Ruby Pipeline Project Draft Supplemental EIS are available are listed under **SUPPLEMENTARY INFORMATION.**

FOR FURTHER INFORMATION CONTACT: Mark Mackiewicz, PMP, Project Manager at 435–636–3616, Bureau of

Land Management Price Field Office, 125 South 600 West, Price, Utah 84501; or by email at *mmackiew@blm.gov*. You may contact Mr. Mackiewicz to have your name added to our mailing list.

Persons who use a telecommunications device for the deaf (TDD) may call the Federal Information Relay Service (FIRS) at 1–800–877–8339 to contact the above individual during normal business hours. The FIRS is available 24 hours a day, 7 days a week, to leave a message or question with the above individual. You will receive a reply during normal business hours.

SUPPLEMENTARY INFORMATION: The BLM has prepared a Draft Supplemental EIS to correct the deficiencies in the Ruby Pipeline Final EIS identified by the Ninth U.S. Circuit Court of Appeals. The Draft Supplemental EIS includes supplemental information about the original and present condition of the sagebrush steppe habitat and analyzes the cumulative impacts of the Ruby Pipeline Project based on the supplemental information. The Draft Supplemental EIS will serve as the foundation for the BLM's decision on whether to reissue the right-of-way (ROW) granted to Ruby for the project and, if so, to determine what terms and conditions would be required.

The Federal Energy Regulatory Commission (FERC) is responsible for authorizing construction and operation of interstate natural gas pipelines. Accordingly, the FERC served as the lead agency for Ruby Pipeline LLC's (Ruby) application for the Ruby Pipeline Project. The FERC used the Final EIS it prepared (January 28, 2010) to issue its Certificate for the Ruby Pipeline Project on April 5, 2010. The Certificate authorized Ruby to construct an approximately 678-mile long, 42-inch diameter interstate natural gas pipeline that crosses 368 miles of Federal land beginning near Opal, Wyoming, extending through northern Utah and northern Nevada, and terminating near Malin, Oregon.

The BLM has primary responsibility for issuing right-of-way ROW grants and temporary use permits for natural gas pipelines across most Federal lands pursuant to Section 28 of the Mineral Leasing Act of 1920, as amended (30 U.S.C. 185 *et seq.*). Ruby applied to the BLM for a ROW grant for the Ruby Pipeline Project on December 3, 2007. The Federal lands crossed or used as access for the project include lands managed by the BLM; Bureau of Reclamation (Reclamation); the United States Fish and Wildlife Service (USFWS) Sheldon National Wildlife Refuge; and the United States Department of Agriculture, Forest Service (USFS), specifically the Fremont-Winema National Forests, the Uinta-Wasatch-Cache National Forest, and the Modoc National Forest. Based on the Final EIS issued by the FERC, the BLM issued a Ruby Pipeline Project Record of Decision (ROD) and ROW grant for the use of lands under the administration of the BLM, Reclamation, USFWS, and the USFS on July 12, 2010.

The project has been constructed and is currently in operation. However, the BLM Ruby Pipeline Project ROD and ROW grant were appealed to the Ninth U.S. Circuit Court of Appeals in 2011, and, on October 22, 2012, the court found that the Ruby Pipeline Final EIS does not provide sufficient quantified or detailed data about the cumulative loss of sagebrush steppe vegetation and habitat. Consistent with an April 29, 2013, order staying an earlier opinion vacating the BLM's original ROD, the Ninth Circuit directed the BLM to prepare a revised ROD by November 21, 2013, that addresses the identified deficiencies in the NEPA analysis. The Supplemental EIS is part of the process of responding to that order.

To the extent applicable, the BLM will use the NEPA commenting process to satisfy the public involvement process for Section 106 of the National Historic Preservation Act as provided for in 36 CFR 800.2(d)(3) and Secretarial Order 3317. Native American tribal consultations will be conducted in accordance with policy, and tribal concerns will be given due consideration, including impacts on Indian trust assets.

Please note that public comments and information submitted including names, street addresses, and email addresses of persons who submit comments will be available for public review and disclosure at the above address during regular business hours (8 a.m. to 4 p.m.), Monday through Friday, except holidays.

Copies of the Ruby Pipeline Project Draft Supplemental EIS are available at the following BLM offices:

- Kemmerer Field Office, 312 Hwy 189 North, Kemmerer, Wyoming
- Salt Lake Field Office, 2370 South 2300 West, Salt Lake City, Utah
- Elko District Office, 3900 East Idaho Street, Elko, Nevada
- Winnemucca District Office, 5100 East Winnemucca Boulevard, Winnemucca, Nevada
- Lakeview District Office, 1301 S. G Street, Lakeview, Oregon
- Klamath Falls Resource Area Office, 2795 Anderson Avenue, Suite 25, Klamath Falls, Oregon
- Surprise Field Office, 602 Cressler Street, Cedarville, California
- Additional locations where hard copies of the Draft Supplemental EIS can be viewed can be found on the project Web site or by contacting the project manager.

Before including your address, phone number, email address, or other personal identifying information in your comment, you should be aware that your entire comment—including your personal identifying information—may be made publicly available at any time. While you can ask us in your comment to withhold your personal identifying information from public review, we cannot guarantee that we will be able to do so.

Authority: 40 CFR 1502.9, 43 CFR 2880.

Amy Lueders,
Nevada State Director.

[FR Doc. 2013–16129 Filed 7–3–13; 8:45 am]
BILLING CODE 4310–HC–P

DEPARTMENT OF THE INTERIOR

Bureau of Land Management

[LLCAC07000 L913100000 EI0000 LXSIGEOT0000]

Notice of Availability of the Final Environmental Impact Statement/ Environmental Impact Report for the Casa Diablo IV Geothermal Development Project, Mono County, CA

AGENCY: Bureau of Land Management, Interior.

ACTION: Notice of Availability.

SUMMARY: In accordance with the National Environmental Policy Act of 1969, as amended (NEPA); the Federal Land Policy and Management Act of 1976, as amended; and the California Environmental Quality Act of 1970 (CEQA), the Bureau of Land Management (BLM), the United States Forest Service (USFS), and the Great Basin Unified Air Pollution Control District (GBUAPCD), a California State agency, have prepared a Final Environmental Impact Statement (EIS)/ Environmental Impact Report (EIR) for the proposed Casa Diablo IV Geothermal Development Project near the town of Mammoth Lakes in Mono County, California, and by this notice are announcing its availability.

DATES: The BLM will not issue a final decision on the proposal for a minimum of 30 days after the date that the Environmental Protection Agency publishes its notice of availability in the **Federal Register**.

EXHIBIT A

LETTERS FROM AGENCIES AND TRIBES

RUBY PIPELINE PROJECT

U.S. Department of the Interior
Bureau of Land Management
Nevada State Office
Reno, Nevada

To Whom It May Concern,

It has been nearly two years since the pipeline was installed through Brigham City, Utah. The City was informed and learned that FERC would oversee and monitor the vegetation restoration of the pipeline construction route where the natural condition and habitat has been disturbed. There is great concern with the restoration of the pipeline right-of-way pertaining to revegation as the pipeline enters into the community from Flat Bottom Canyon along the west slope of the Wasatch Front (Wellsville section) mountain range. The mountain range is a very visible backdrop to our community and has been greatly impacted with this project. In addition, the dyer's woad noxious weed/plant has increased and spread through areas of disturbance beyond what seems to be the natural rate spreading along the mountain side.

Brigham City seeks FERC's assistance on this matter to address the pipeline's commitment and FERC's commitment to communities that vegetation restoration will be complied with as was instructed. Thank you for your consideration on this concerning matter.

Sincerely,

Mark Bradley

Brigham City Corporation

City Planner

Phone: 435-734-6616

Fax: 435-723-8132

2 QEHKD0 RI 0 D RU HQQLV) IIHDQG &LW $ GP LQLWDWRU %UXFH/ HRQDUG

CONFEDERATED TRIBES
of the
GOSHUTE RESERVATION
P.O. BOX 6104
IBAPAH, UTAH 84034
PHONE (435) 234-1138
FAX (435) 234-1162

September 2, 2013

Mark Mackiewicz
Senior National Project Manager
Bureau of Land Management
Price Field Office
125 South 600 West
Price, Utah 84501

Sent via pdf email to: mmackiew@blm.gov

RE: Confederated Tribes of the Goshute Reservation Comments on the Ruby Pipeline Project Draft Supplemental Environmental Impact Statement (DOI-BLM-NV-0000-2013-001-EIS); Request for Information

Dear Mr. Mackiewicz:

The Confederated Tribes of the Goshute Reservation ("CTGR") reviewed the Ruby Pipeline Project Draft Supplemental Environmental Impact Statement (DOI-BLM-NV-0000-2013-0001-EIS; hereinafter "Draft SEIS"). We appreciate the opportunity to provide comments on this Draft SEIS, especially in light of the fact that Ruby pipeline runs through our ancestral and treaty homelands and that impacts to our lands and resources have not been properly mitigated.

The CTGR is a federally recognized Indian Tribe and sovereign tribal government. Our Reservation was formed by executive orders and it includes portions of Utah and Nevada, but our resources, interests and use of lands are not confined to the

Reservation boundaries that are protected by a treaty and by the federal trust responsibility. The Tribe's ancestral and treaty homelands include a large area of Nevada and Utah; our territory and cultural use areas encompass large parts of the Ruby pipeline Right of Way; and our territory includes substantial land areas and resources within the Project's Cumulative Impacts Area. Our Tribe still relies on our aboriginal territory, including areas of the Ruby Pipeline ROW and other areas impacted by the Project, for hunting, fishing, gathering, religious and healing ceremonies, sacred uses, and other purposes essential to our Native American cultural identity and survival.

As the federal agency, the BLM has an legal and moral trust obligation to protect the CTGR's rights, interests and resources. That trust responsibility invariably extends to all BLM actions, permits and decisions that implicate Tribal resources and interests; however, the BLM has failed to uphold its trust obligation to the CTGR on this Ruby Pipeline Project. As the federal trustee, the CTGR expected the BLM to require proper mitigation of resource impacts from this large-scale pipeline project – a project that directly destroyed at least 9,225 acres of sagebrush steppe, dredged and filled waterbodies and wetlands, impacted groundwater resources, impacted sensitive or endangered species and their habitats, eliminated a large swath of non-sagebrush habitat, and rendered other cultural and sacred resources that are important to our Tribe as permanently defunct or in disrepair. What remains is an extensive strip of irreparable damages to our resources and interests through our ancestral homelands, and a Ruby Pipeline Draft SEIS that does not comply yet again with requirements for cumulative impacts analysis, mitigation, and consultation pursuant to the National Environmental Policy Act (NEPA) and the National Historic Preservation Act (NHPA).

I. BLM Failed to Conduct A Proper Revised Cumulative Effects Analysis

Based on information presented in the Draft SEIS, we understand that the series of Ruby Pipeline Project EISs – Final EIS, Draft SEIS and Final SEIS – will be the basis for BLM's decision as to whether the BLM will reissue the Ruby Pipeline Right-of-Way (ROW) and under what terms and conditions that ROW might be reissued. Further, the BLM identified that these Ruby Pipeline EISs, including this Draft SEIS and associated

comments, will be used to determine "whether additional post-construction mitigation is warranted." Draft SEIS at 3. A Final SEIS would be published subsequently.

The BLM indicated that its directive was to generate a draft SEIS of limited scope that specifically "revised cumulative effects analysis ... as it related to the cumulative loss of sagebrush steppe vegetation and habitat." Draft SEIS at 1. The heart of a cumulative effects analysis is to address the incremental impacts of the Project to "other past, present, and reasonably foreseeable actions". Adding to the baseline conditions, the increments, resource totals and grand sums must then be compared to regulatory caps (or possible constraints from management and conservation plans) and be evaluated as to their significant adverse impacts on resources. The Draft SEIS fails to accomplish the Court's direction in this respect and fails to provide sufficient cumulative effects analysis for the following reasons:

1. The cumulative effects analysis fails to quantify or specify past actions. The analysis must include all "past, present, and reasonably foreseeable actions" within a specified area. The Draft SEIS listed projects, counties, descriptions, approximate areas, and dates of "present and reasonably foreseeable actions within the cumulative impact area". Yet Draft SEIS (and Final EIS) omitted any detail on past actions, their incremental impacts, and total resource impacts from past actions. Instead, the BLM used an improper and minimalistic approach: "Past actions have been aggregated in order to describe the impact of historic activities on the existing environment." Draft SEIS at 4. This aggregated approach is a very course-grained method to generalize impacts from past actions and no quantified information whatsoever was provided as to vegetation rehabilitation status from past actions, which invariably show high rates of non-successful rehabilitation. The CTGR strongly disagrees with the BLM's interpretation of the NEPA/CEQ regulations and case law regarding past actions as they pertain to cumulative impacts. Thus, 'past actions' portion of the cumulative impacts analysis must be revised to meet regulatory requirements.

2. The Cumulative Impact Area (CIA) is arbitrary. The Draft SEIS at 4 justifies the development of the CIA's geographic extent as follows: "The counties crossed by the Ruby Pipeline Project represent a reasonable area of impact where the projects [present and future actions] could interact with each other in the sagebrush steppe ecosystem....[And] the 'effects of more distant projects...would not contribute significantly to impacts associated with the proposed project." But the purpose of generating a CIA and cumulative impacts therein is not to trace county lines and list projects within those arbitrary jurisdictional boundaries; the purpose of the CIA is to generate a geographic area within which impacts from past, present and reasonably foreseeable future projects stand to add a possible incremental and interactive impact to the proposed action. The distance from the county boundaries and Ruby pipeline vary widely – in eastern Boxelder County, UT (~ pipeline mile 85) the pipeline is several miles from county's southern border, but in western Washoe County, NV (~ pipeline mile 550) the pipeline is several hundred miles from the county's southern border. Or, the last miles of pipeline that run through Oregon are no more than a few miles from counties in California, but the California counties were excluded from the CIA's geographic extent. Based on this flawed CIA, the BLM identified projects and baseline regimes that are identified as either reducing or increasing sagebrush vegetation. The CIA fails to provide any real or meaningful geographic extent within which some project impacts would occur, and fails to identify specific project locations or interactive impacts. The Draft SEIS must revise these fundamental cumulative effect errors.

3. The cumulative effects analysis fails to quantify or specify all of the effects. Even using the presently flawed CIA, the BLM fell short of identifying all of the effects or all of the projects' impacts within the CIA, including large projects with large-scale impacts. An obvious exclusion was the Clark, Lincoln, and White Pine Counties Groundwater Development Project. Impacts identified in this water project's EIS are expected to extend into Elko County, NV, and Boxelder County, UT, and those significant impacts would interact with and contribute to significant adverse cumulative impacts relating to the Ruby Pipeline Project and cumulative

impacts on sagebrush vegetation and habitat. In fact, this particular water project, and its impacted sagebrush vegetation and habitat areas (plus its other resource impacts), are significantly closer to Ruby pipeline than say impacts within the Lake Tahoe Basin (southern part of Washoe County included in the CIA) to pipeline mile 550. These are clear defects in the cumulative impacts analysis that must be rectified.

4. The quantities of sagebrush vegetation and habitat were not calculated correctly nor are the methods for those calculations disclosed. Table 1 of the Draft SEIS lists a number of projects including cheatgrass and weed treatments, juniper reductions, and rehabilitation projects that allegedly provided certain increases in sagebrush vegetation and habitat. A major error in this approach is to assume a 1:1 ratio of project area to project benefit – the mere size of the project does not translate into the direct benefit for sagebrush vegetation and habitat as the Draft SEIS assumes. Furthermore, it is unclear as to what the acreages in Table 1 refer to regarding projects that have destroyed sagebrush vegetation and habitat. Is the approximate size of the project the amount of sagebrush vegetation destroyed due to the project, or are there other parameters that have gone into the calculation of area? It is unclear as to how Figures 2 and 3 were used in the calculations of sagebrush vegetation and habitat losses/gains. A proper analysis must disclose theses types of specific information – the methodologies used – to allow the public and our Tribe a reasonable opportunity to evaluate and comment on this Draft SEIS.

5. The quantification of maintenance and gains of sagebrush vegetation and habitat acreage is improper. The Draft SEIS suggests that sagebrush steppe will remain in the areas presented in Figure 3 without further disturbances. The Draft SEIS also suggests that the restoration and habitat improvement projects translate into 1:1 gains for sagebrush steppe; in other words, just because 420,725 acres may undergo restoration and habitat improvements does not translate into 420,725 acres of sagebrush steppe. This must be corrected in the cumulative effects

analysis and there are several factors that must be included in the revised cumulative effects analysis to provide a more realistic analysis of impacts on sagebrush habitat. First, the impacts of climate change on the acreage of sagebrush steppe must be included. Second, the analysis must use existing data on the effective return to sagebrush steppe that restoration and habitat improvement projects have achieved. Third, a continued loss and redistribution of water resources has impacts on sagebrush steppe and must be included in the cumulative effects analysis.

II. BLM Must Disclose Cumulative Impacts on Sagebrush Habitat as They Relate to Historic and Current Tribal Use/Occupancy

A basic tenet of the NEPA is to identify, evaluate and mitigate project impacts of the human environment. The BLM failed to provide any cumulative impacts analysis of sagebrush habitat in reference to tribal use and occupancy of that habitat. Historic and current tribal occupancy and use of sagebrush habitat must be provided in the SEIS such that an acceptable baseline condition is developed and compared against the Project effects, incremental impacts, and total resource impacts. The BLM has attempted to conduct a cumulative effects analysis that does not take into account some of the salient parameters, especially the increment of irreplaceable damage done to our ancestral homelands within the sagebrush steppe.

III. Federal Government Violated Its Duty to Properly Consult With CTGR

The Federal government violated its duty to consult with the CTGR and acted in bad faith regarding the Ruby Pipeline Project. The preparation of the Draft SEIS requires that the BLM adhere to the NHPA Section 106 process, Interior Secretarial Order 3317, and other consultation requirements provided in Executive Orders and Presidential Memoranda. However, the Notice of Availability of the Draft SEIS (78 FR 40496) indicated that the BLM intended to use the commenting period for this Draft SEIS to satisfy its Section 106 and Secretarial Order 3317 obligations. Under Table 3, the BLM listed tribal consultations on the Ruby Pipeline Project Draft SEIS; CTGR was listed

twice: 1) April 5, 2013 with a meeting with BLM Elko District Office; 2) May 3, 2013 again in the Elko District Office. Draft SEIS at 29-30. These were not government-to-government consultation meetings regarding the Ruby Pipeline Project.

IV. BLM Failed to Require Mitigation

The impacts from the Ruby Pipeline Project must be examined to determine how the Project can be modified to avoid and reduce impacts, or design proper mitigation that would offset the incremental amounts, resource totals, and grand sum of impacts. Because the Ruby Pipeline Project has been constructed and went into service in July 2011, post-construction relief in the form of mitigation was identified by the Ninth Circuit Court as pertinent to the revision of the Project EIS by preparing the SEIS. The Court did not weigh in on whether terminating the Ruby Pipeline ROW or modifying the pipeline route/ROW would accomplish relief at the time they issued their order/opinion, other than to say that the Tribes – Summit Lake Paiute Tribe and Fort Bidwell Tribe – had not requested such action as part of any injunctive or declaratory relief. Thus, conducting a proper cumulative impact analysis and including appropriate mitigation, at minimum, is essential before any reissuance of the ROW to Ruby Pipeline.

Neither the Final EIS/ROD nor the Draft SEIS provided proper mitigation. The Draft SEIS intentionally excluded any mitigation whatsoever even after a partial revision of the cumulative impacts analysis, which helped to clarify some of the real impacts – the revised analysis showed even greater significant adverse impacts on sagebrush vegetation and habitat than the Final EIS/ROD. Instead, the Draft SEIS deferred to the insufficient mitigation in the Final EIS/ROD stating: "Because there are no impacts in excess of those discussed in the Final EIS, no additional mitigation is described in this Draft SEIS." We strongly disagree.

The final determination of whether cumulative impacts are significant is incorrect and misguided in part. The BLM summarizes the cumulative impacts in this way: (1) "It is clear that the cumulative impacts of past actions on sagebrush steppe vegetation and habitat have been significant"; (2) "With regard to present and reasonably foreseeable future actions, cumulative impacts would not be significant." Draft SEIS at 27-28.

Regarding BLM's conclusion of no significant impacts from present and future actions, we fully disagree. The simple comparison of numbers – acres of habitat destroyed vs. acres of restoration efforts – is not a fair or adequate way to conclude whether cumulative impacts are significant. We are a land-based people. Particular land areas, much of which is sagebrush steppe, are essential for our traditional practices and identity. The Ruby Pipeline Project destroyed a portion of our homelands. The project can be built and other people can move; but not us because these lands are our home – it is where we go for traditional and religious uses, it is where our ancestors lived, and it is where our ancestors are buried. Habitat restoration and improvement projects may mend habitat in some areas in part, but those projects are not mending the land in the areas and in the manner important to our people. Our Tribal ancestral homelands and use of lands were irreparably damaged and significantly impacted. The cumulative impacts of past actions were adversely significant; the impacts of Project-specific actions are adversely significant; the cumulative impacts of present and future actions are overwhelmingly adverse and significant. And those impacts have been cleared by BLM based in part on restoration and rehabilitation plans that do not adequately mitigate the habitats that were destroyed (e.g., *FEIS Appendix L. Ruby's Draft Restoration and Revegetation Plans: Wyoming, Utah, Nevada, and Oregon*). The BLM has negated their duty to examine the real and cumulative impacts on the human environment in this Draft SEIS and require appropriate mitigation.

Not only has the BLM failed to properly analyze cumulative impacts and failed to require proper mitigation, but the BLM also has precluded our Tribe and the general public from having any fair or reasonable opportunity to evaluate and comment on whether the BLM's finding of "no additional mitigation" is actually warranted. The BLM has not provided applicable Project documents to the CTGR. No information has been available regarding conservation agreements and habitat improvement projects between Ruby and other parties. Up until the comment deadline for this Draft SEIS, the BLM has further withheld certain mitigation and monitoring plans by not providing them on the BLM's Ruby Pipeline Project website. In fact, the BLM's website for "Attachment 5 – Plan of Development (POD)" was "Last updated: 08-02-2012". As part of that POD, the various plans are identified on the website as Appendix A – Appendix W. However, out

of those 23 plans, only 9 are available and 14 are "to be posted". Several of the 'to be posted' plans are pertinent to the cumulative effects revision of the Draft SEIS. Moreover, we have no information on the terms and conditions that are being considered as part of any reissued ROW grant to Ruby Pipeline, or any prospective changes to the stipulations that accompanied the original ROW to Ruby.

V. Concluding Remarks and Request for Information

On behalf of the Confederated Tribes of the Goshute Reservation, I demand that the BLM, pursuant to the Mineral Leasing Act regulations in 43 C.F.R. 2886.17(a-b), suspend or terminate the ROW grant/permit to Ruby Pipeline where there is noncompliance with applicable laws, regulations, or ROW terms, conditions or stipulations. The Draft SEIS does not meet NEPA requirements; the Project does not satisfy Mineral Leasing Act environmental protection regulations; the Project has not properly complied with NHPA Section 106; and Secretarial Order 3317 (and other consultation policies) has not been adhered to properly. Furthermore, Ruby Pipeline's project activities constitute a significant threat to the human environment, and until those threats can be resolved or properly mitigated, the BLM must not reissue any ROW grant/permit to Ruby. If the impacts cannot be resolved and mitigated, the ROW must be subject to change or termination.

Before the BLM makes any decision or takes any action regarding the Ruby Pipeline SEIS or ROW permit, we request the following:

1. BLM has indicated that the Ruby Pipeline ROW grant/permit has been suspended and is subject to reissuance (*see* 78 FR 40496 and Draft SEIS). We ask the BLM to submit a statement to the CTGR that details whether or not Ruby's ROW has been suspended, including any letter from BLM to Ruby regarding this issue and details on what operations/actions have been halted as a result of any suspended ROW and any applicable timeline for the ROW reissuance. Please include applicable authorities. Also, please include a copy of Ruby's ROW grant/permit and associated terms, conditions and stipulations.

2. Please submit to CTGR any copies of letters that have been sent from the Advisory Council on Historic Preservation to the BLM in reference to the Ruby Pipeline Draft SEIS.
3. Ruby Pipeline must be required to provide proper mitigation of sagebrush steppe habitat in an area and manner selected by the CTGR. Because the pipeline corridor destroyed CTGR's ancestral homelands at least between mile 150 to mile 350 of the pipeline, or 200 miles of the pipeline corridor, we request mitigation at a minimum ratio of 3:1, or approximately 10,908 acres.
4. We request that the CTGR have an opportunity to fully participate in all aspects of cultural and environmental projects, including but not limited to: (1) cultural resource surveys, inventories, data recovery, artifact curation and handling; (2) human remain and burial discoveries, handling, protection and repatriation; and (3) vegetation/habitat restoration and rehabilitation projects.
5. There are other mitigation and/or terms, conditions and stipulations of the ROW that are necessary once we have had an opportunity to review all pertinent documentation and the Draft SEIS has been revised. We request that the BLM send to the CTGR three copies of a data disc (CD/DVD) of all Ruby Pipeline Project documents so that we can have a meaningful and adequate opportunity to review and comment on this Draft SEIS and identify any additional mitigation and ROW stipulations.

Please remit all requested information to Chairman Ed Naranjo at the address above and/or by email to: ednaranjo@goshutetribe.com. Once we receive the information, we request a reasonable amount of time to provide further input on mitigation and ROW terms, conditions and stipulations. We expect the BLM to work cooperatively and expeditiously with the CTGR on this matter. Thank you.

Sincerely,

Ed Naranjo, Chairman

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
REGION 8
1595 WYNKOOP STREET
DENVER, CO 80202
Phone 800-227-8917
http://www.epa.gov/region08

RECEIVED
AUG 2 2 2013
BLM
PRICE, UT

AUG 19 2013

Ref: 8EPR-N

Mark Mackiewicz, PMP
National Project Manager
Bureau of Land Management
Price Field Office
125 South 600 West
Price, UT 84501

Re: Draft Supplemental Environmental Impact Statement for the Ruby Pipeline Project
CEQ # 20130198

Dear Mr. Mackiewicz:

In accordance with our responsibilities under the National Environmental Policy Act (NEPA), 42 U.S.C. Section 4321, et. seq., and Section 309 of the Clean Air Act, 42 U.S.C. Section 7609, the U.S. Environmental Protection Agency Region 8 (EPA) has reviewed the Draft Supplemental Environmental Impact Statement (Draft SEIS) prepared by the Bureau of Land Management (BLM) in response to a ruling from the Ninth Circuit Court of Appeals on the cumulative loss of sagebrush steppe vegetation and habitat on the interstate Ruby pipeline and associated facilities located in Wyoming, Utah, Nevada, and Oregon.

The pipeline and associated facilities were built and are operated by Ruby Pipeline, L.L.C. (Ruby) to add significant natural gas transportation capacity to meet growing demands for natural gas in the Pacific Northwest. The project involved the construction of 675 miles of 42 - inch diameter pipeline and associated aboveground facilities. Construction of the proposed project has disturbed 17,000 acres of land including 9,225 acres of sagebrush steppe vegetation and greater sage grouse habitat. This Draft SEIS informs the BLM decision whether to reissue the BLM right-of-way (ROW) granted to Ruby and whether specific terms and conditions for additional post-construction mitigation is warranted.

The Draft SEIS considers past actions that have contributed to sagebrush steppe habitat disturbance. Past actions have been aggregated into general categories to describe the historical impact on the existing environment. These categories include conversion of public lands to cropland and mining and energy development, livestock grazing, introduction of non-native, invasive plant species, changes in management of wildfire cycles, and the natural encroachment of juniper-pinyon forest into the sagebrush steppe ecosystem. The Draft SEIS concludes on page 27 that the cumulative impacts of these past actions have been significant enough to lose 11.5 million acres (37 %) of sagebrush steppe within the cumulative impact area that was analyzed.

The Draft SEIS analysis of present and reasonably foreseeable future actions has been substantially extended from the short list of eight projects disclosed in Table 4.13-1 in the Final EIS. New information available to BLM was used to update and expand this list to over fifty actions. Draft SEIS Table 1 is the resulting disclosure of present and reasonably foreseeable future actions. Cumulative impact acreages for four general categories of actions have been analyzed: (1) energy projects, (2) mining and exploration, (3) livestock grazing and wild horse sanctuaries, and (4) habitat restoration and improvement projects. The Draft SEIS discloses that the Ruby Project Cooperative Conservation Agreement requires Ruby to fund $22.9 million for some of the habitat conservation and improvement projects. These projects would benefit more than 90,300 acres of sagebrush steppe according to the Draft SEIS. The EPA recommends BLM consider increasing the 10:1 offset ratio of habitat restoration acreage compared to Ruby project disturbance acreage in light of the scientific literature produced by both the BLM national technical team and other reputable ecosystem scientists. The literature acknowledges the long timeframes required to reestablish the vegetation characteristics of priority habitat for restoration projects in this arid environment. It also documents a considerable amount of uncertainty in the appropriate offset ratios to replace the loss of ecosystem support services and the results of previous habitat equivalency analyses used in the Ruby conservation measures plan.

EPA encourages BLM to consider some of the more recent scientific literature developed by other Department of Interior agencies seeking to inform the regional implementation of the national greater sage grouse planning strategy that are not cited in the references to this Draft SEIS. In particular, USGS Open File Report 2013-1098, Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (*Centrocercus urophasianus*)[1], recommends that consistent planning criteria for locating energy corridors, facilities, and infrastructure be used to realize minimal impacts to intact sagebrush communities and associated sage-grouse populations. Most significantly for the Ruby project, this Report emphasizes the importance of monitoring the effectiveness of restoration projects to insure that the amount of treated and restored lands have provided the required ecosystem service values before additional sagebrush habitat is disturbed.

The Draft SEIS acknowledges BLM's determination that the proposed project will not adversely impact federally-listed species, adversely modify designated critical habitat, threaten the viability of BLM, USFS, or state-listed species, nor produce any direct or indirect effects that would be contrary to a cooperating agency's conservation needs. The Draft SEIS concludes that there are no cumulative impacts beyond those already discussed in the Final EIS, and therefore no additional mitigation is warranted. We recommend that the BLM reconsider its conclusion regarding the need for mitigation in light of the charter of the BLM National Greater Sage Grouse Planning Strategy to develop new or revised regulatory mechanisms to conserve and restore the greater sage-grouse and its habitat on BLM-administered lands on a range-wide basis over the long-term. Recent scientific literature from the National Technical Team[2] is also available to help inform project planning decisions.

Finally, the EPA recommends that the BLM include in the Final EIS a discussion regarding BLM's Instruction Memorandum No. 2012-043 that requires assessment of the impacts of the ongoing use of an existing ROW to Greater Sage-Grouse habitat and to minimize such impacts to the extent allowed by law when renewing or amending the ROW. The provisions of this Instruction Memorandum will be

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U.S Geological Survey, [1], Summary of Science, Activities, Programs, and Policies That Influence the Rangewide Conservation of Greater Sage-Grouse (*Centrocercus urophasianus*) Manier, D.J.,1* D.J.A. Wood,2 Z.H. Bowen,3* R.M. Donovan,1 M.J. Holloran,4 L.M.Juliusson,5 K.S. Mayne,5S.J. Oyler-McCance,3 F.R. Quamen,2 D.J. Saher,6 A.J. Titolo5

[2] Report on National Greater Sage-Grouse Conservation Measures, Sage-grouse National Technical Team, December 21, 2011

important in helping to ensure protection of important Greater Sage-Grouse habitat.

Consistent with Section 309 of the Clean Air Act, it is the EPA's responsibility to provide an independent review and evaluation of the potential environmental impacts of this project. In accordance with our policies and procedures for reviews under NEPA and Section 309 of the Clean Air Act, the EPA is rating this Draft SEIS as "Lack of Concern" (LO). The "LO" rating indicates that our review has not identified any potential environmental impacts requiring substantive changes to the Draft SEIS, however the review has pointed out reasons for consideration of additional mitigation measures. Our review suggests that the addition of clarifying language or information would make the Final SEIS more complete. If you have any questions regarding our comments, please contact me at 303-312-6704 or James Hanley of my staff at 303-312-6725.

Sincerely,

for Suzanne J. Bohan, Director
NEPA Compliance and Review Program
Office of Ecosystems Protection and Remediation

U.S. Environmental Protection Agency Rating System for Draft Environmental Impact Statements

Definitions and Follow-Up Action*

Environmental Impact of the Action

LO - - Lack of Objections: The Environmental Protection Agency (EPA) review has not identified any potential environmental impacts requiring substantive changes to the proposal. The review may have disclosed opportunities for application of mitigation measures that could be accomplished with no more than minor changes to the proposal.

EC - - Environmental Concerns: The EPA review has identified environmental impacts that should be avoided in order to fully protect the environment. Corrective measures may require changes to the preferred alternative or application of mitigation measures that can reduce these impacts.

EO - - Environmental Objections: The EPA review has identified significant environmental impacts that should be avoided in order to provide adequate protection for the environment. Corrective measures may require substantial changes to the preferred alternative or consideration of some other project alternative (including the no-action alternative or a new alternative). EPA intends to work with the lead agency to reduce these impacts.

EU - - Environmentally Unsatisfactory: The EPA review has identified adverse environmental impacts that are of sufficient magnitude that they are unsatisfactory from the standpoint of public health or welfare or environmental quality. EPA intends to work with the lead agency to reduce these impacts. If the potential unsatisfactory impacts are not corrected at the final EIS stage, this proposal will be recommended for referral to the Council on Environmental Quality (CEQ).

Adequacy of the Impact Statement

Category 1 - - Adequate: EPA believes the draft EIS adequately sets forth the environmental impact(s) of the preferred alternative and those of the alternatives reasonably available to the project or action. No further analysis of data collection is necessary, but the reviewer may suggest the addition of clarifying language or information.

Category 2 - - Insufficient Information: The draft EIS does not contain sufficient information for EPA to fully assess environmental impacts that should be avoided in order to fully protect the environment, or the EPA reviewer has identified new, reasonably available alternatives that are within the spectrum of alternatives analyzed in the draft EIS, which could reduce the environmental impacts of the action. The identified additional information, data, analyses or discussion should be included in the final EIS.

Category 3 - - Inadequate: EPA does not believe that the draft EIS adequately assesses potentially significant environmental impacts of the action, or the EPA reviewer has identified new, reasonably available alternatives that are outside of the spectrum of alternatives analyzed in the draft EIS, which should be analyzed in order to reduce the potentially significant environmental impacts. EPA believes that the identified additional information, data, analyses, or discussions are of such a magnitude that they should have full public review at a draft stage. EPA does not believe that the draft EIS is adequate for the purposes of the National Environmental Policy Act and/or Section 309 review, and thus should be formally revised and made available for public comment in a supplemental or revised draft EIS. On the basis of the potential significant impacts involved, this proposal could be a candidate for referral to the CEQ.

* From EPA Manual 1640 Policy and Procedures for the Review of Federal Actions Impacting the Environment. February, 1987.

Comment document in response to the Ruby Pipeline Draft SEIS

Listing of vegetation seeds for consideration in future re-vegetation mixes.

Borrowing directly from Catherine Fowler's book, *In the Shadow of Fox Peak*, (Nevada: 2002):

Lowland vegetation (Table 11 & pp. 73-75)

Carved Seed (Glyptopleura marginata)

Prince's plume (Stanyela pinnata)

Onion (Allium anceps & A. nevadense)

Cymopterus (Cymopterus corrugatus)

Lily (Calochortus leichtlinii & C. nuttallii)

Broomrape (Orobanche fasciculata & O. corymbosa)

Thistle (Cirsium spp.)

White-stemmed blazing star (Mentzelia albicaulis)

Indian ricegrass (Oryzopsis hymenoides)

Prickly pear (Opuntia polyacantha)

Tansy mustard (Descurainia pinnata)

Saltbush (Atriplex argentea)

Dock (Rumex maritimus)

Wheatgrass (Agropyron spp.)

Bluegrass (Poa spp.)

Witchgrass (Panicum capillare)

Orcutt's erigrostis (Erogrotis orcuttiana)

Great Basin wildrye (Elymus cinerus)

Big sagebrush (Artemisia tridentata)

Four-wing saltbush (Atriplex canescens)

Shadscale (Atriplex confertifolia)

Goosefoot (Chenopodium nevadense)

Sunflower (Helianthus annuus)

Ephedra (Ephedra viridis)

Silver buffaloberry (Shepherdia argentea)

Wolfberry (Lycium andersonii)

Cooper wolfberry (Lycium cooperi)

Wild rose (Rosa woodsii)

Upland vegetation (Table 14 & pp. 81-84)

Nevada desert parsley (Lomatium ravenii)

Spring beauty (Claytonia umbellata)

Yampa (Perideridia bolanderi)

Bitterroot (Lewisia rediviva)

Onion (Allium parvum & A. biseptum & A. platycaule)

Canadian thistle (Cirsium occidentale)

Sego lily (Calochortus leichtlinii)

Balsamroot (Balsamorhiza sagittata & B. hirsuta)

Wooly mule's ears (Wyethia mollis)

Great Basin wildrye (Elymus cinereus)

Indian ricegrass (Oryzopsis hymenoides)

Silver buffaloberry (Shepherdia argentea)

Pinyon (Pinus monophylla)

Blue elderberry (Sambucus cerulea)

Serviceberry (Amelanchier alnifolia)

Chokecherry (Prunus virginiana)

Wild rose (Rosa woodsii)

Currant (Ribes aureum)

Sagebrush gooseberry (Ribes velutinum)

Juniper (Juniperus utahensis)

Prairie sunflower (Helianthus petiolaris)

Marsh vegetation (pp. 64-70)

Common cane (Phragmites australis)

Cattails (Typha latifolia & T. domingensis)

Bulrush (Scirpus maritimus & S. pungens & S. acutus & S. paludosus)

Wapato (Sagittaria latifolia)

Chufa Fatsedge (Cyperus esculentus)

Curly Dock (Rumex maritimus)

Pickleweed (Allenrolfea occidentalis)

Saltbush (Atriplex argentea)

Seepweed (Suaeda depressa & S. torreyana)

Chapter 10 lists 46 plants with medicinal uses, most contained in the listings above. One not listed above and noted in the consultation meeting is Western mugwort (Artemisia ludoviciana). This plant has significant ceremonial uses and is observed to be declining in stands.

Granted, these listings were collected in study specific to the Toi-Ticutta band of Northern Paiute, but there should be correlation with other Great Basin tribes in areas of similar elevations. In addition to Fowler's book, another resource that may contain lists more specific to the Fort McDermitt and Summit Lake Tribes would be:

Medicinal Uses of Plants by Indian Tribes of Nevada by Percy Train, James R. Henrichs, and W. Andrew Archer. Lawrence, Mass: Quarterman Publications, Inc., 1957. LCCN 78066077.

Submitted by Nathan G. Strong, NAGPRA Co-ordinator, Fallon Paiute-Shoshone Tribe, on behalf of the Fallon Paiute-Shoshone Tribal Cultural Committee.

8/19/2013

From: mehall@blm.gov on behalf of NVSORuby, BLM_NV <blm_nv_nvsoruby@blm.gov>
Sent: Monday, August 19, 2013 5:56 PM
To: Peter Rocco; Grace Ellis
Subject: Fwd: comment from Ft. Bidwell Paiute Tribe, Ft. Bidwell, CA

---------- Forwarded message ----------
From: **Loyette Meza** <onehorse2013@gmail.com>
Date: Mon, Aug 19, 2013 at 11:13 AM
Subject: comment from Ft. Bidwell Paiute Tribe, Ft. Bidwell, CA
To: blmruby@blm.gov

Hello,
For the Ruby Pipeline Project,
I am not sure what the email is for the comment period, so therefore I am sending this email on behalf of the Ft. Bidwell Paiute Tribe. If there is a different email for the comment period, could you please send it to me so it can be sent to the right address?
Our comment is from our Cultural Committee for the Tribe. And the comment is that there is a need for more tribal monitors accompanying the biologists and archeologists at all survey sites. Just because we are a California based Tribe, these areas in Nevada/Oregon are still our aboriginal territories. We also feel that there is a great need for protection of the herbs, medicinal plants, sagehen, grouse, deer, antelope, fox, wild horses, and burros as well as all other animal-species that are in the area considered for the Pipeline. We have a contact person with whom anyone can call for comment or questions.
Kenny Sam
541-417-2611
ksamgb7@yahoo.com
530-279-6310-Tribal Office

Fort McDermitt Paiute and Shoshone Tribe

P.O. Box 457
McDermitt, Nevada 89421
Phone: (775) 532-8259 • Fax (775) 532-8487

Ruby SEIS
c/o BLM Price Field Office
125 South 600 West
Price, Utah 84501

RE: Comments on the Draft Supplemental Environmental Impact Statement for the Ruby Pipeline Project DOI-BLM-NV-0000-2013-0001-EIS

The Fort McDermitt Paiute and Shoshone Tribe has reviewed the Draft Supplemental Environmental Impact Statement for the Ruby Pipeline Project DOI-BLM-NV-0000-2013-0001-EIS.

Our Tribe is a federally recognized Indian Tribe whose aboriginal homelands encompass the entire project area. The Tribe's current reservation lands include areas of Nevada and Oregon, our Tribe still uses our aboriginal territory for hunting, fishing, gathering, sacred/religious purposes, and other uses. Tribal use occur around the area. It is clear from the DSEIS that there will be severe and irreparable environmental impacts from the proposed project that would affect our Tribe. As such, our Tribe has significant concerns about the proposed degradation of cultural resources and losses to our living community. Our specific comments are detailed below.

All these indigenous plants and animals are used by the Indigenous natives of the land and have cultural significance.

- Sagebrush
- Horse Brush
- Grease Wood
- Red Willow
- Yellow Willow
- Tules
- Reeds
- Juniper Trees
- Pinion Trees
- Mushrooms
- Indian Tea
- Yampa
- Bitter Root
- Camas
- Onions
- Garlic
- Wild Rye Grass
- Desert Parsily
- Sun Flower
- Mountain Elder Berries
- Choke Cherries
- Current Berries
- Sage Grouse and their dance grounds (LEKS) and nesting areas

- Birds
- Migratory Birds
- Big Horn Sheep
- Antelope
- Deer
- Rock Chuck
- Rabbits
- Squirrels
- Chipmunks
- Horned Toads
- Toads/Frogs
- Lizards
- Desert Rat
- Ants
- Ant Mounds
- Artifacts
- Water bodies
    - Seeps
    - Springs
    - Creeks
    - Ponds
    - Wetlands
    - Rivers
    - Lakes

- Trail Markers
- Trails (Spiritual)
- Rock Stackings

All these that are mentioned have spiritual and cultural significance to the Tribe. Tribes are a living culture still using traditional ceremonies. We are here for the preservation and protection of all sensitive cultural sites.

The Federal Tribal Consultation Right is ongoing.

The Tribe questions the post construction ground disturbance activities and the restoration of the Ruby ROW, plus access roads to MLV's, and tribal monitors are to be used and compensated.

Respectfully submitted,

Maxine Smart,
TRIBAL CHAIRPERSON
Fort McDermitt Paiute and Shoshone Tribe of Nevada and Oregon

cc; File
Duane Masters Sr., Environmental Director
Dale Barr, Tribal Cultural Liaison

Mark:

The Nevada State Clearinghouse received the comments below regarding this SEIS,

Skip Canfield

Nevada State Clearinghouse

State Land Use Planning Agency

Nevada Division of State Lands

Department of Conservation and Natural Resources

901 South Stewart Street, Suite 5003

Carson City, NV 89701

775-684-2723

http://clearinghouse.nv.gov

www.lands.nv.gov

Note: The SEIS does not contain sufficient information on the following topics:

The Nevada Division of State Lands and the State Land Use Planning Agency offer the following comments:

Please consider the cumulative visual impacts from development activities **(temporary and permanent)**. Some notable activities include proliferation of new roads, poorly-sited and designed structures, lack of co-location of infrastructure and improper lighting, to name a few.

The following mitigation measures are suggested:

Utilize appropriate lighting:

- Utilize consistent lighting mitigation measures that follow "Dark Sky" lighting practices.

- Effective lighting should have screens that do not allow the bulb to shine up or out. All proposed lighting shall be located to avoid light pollution onto any adjacent lands as viewed from a distance. All lighting fixtures shall be hooded and shielded, face downward, located within soffits and directed on to the pertinent site only, and away from adjacent parcels or areas.

- A lighting plan should be submitted indicating the types of lighting and fixtures, the locations of fixtures, lumens of lighting, and the areas illuminated by the lighting plan.

- Any required FAA lighting should be consolidated and minimized wherever possible.

In addition, the following mitigation measures should be employed.

Utilize building materials, colors and site placement that are compatible with the natural environment:

- Utilize consistent mitigation measures that address logical placement of improvements and use of appropriate screening and structure colors. Existing utility corridors, roads and areas of

disturbed land should be utilized wherever possible. Proliferation of new roads should be avoided.

- For example, the use of compatible paint colors on structures reduces the visual impacts of the built environment. Using screening, careful site placement, and cognitive use of earth-tone colors/materials that match the environment improve the user experience for others who might have different values than what is fostered by built environment activities.

- Federal agencies should require these mitigation measures as conditions of approval for all permanent and temporary applications.

Skip Canfield

State Land Use Planning Agency

Pyramid Lake Paiute Tribe
Post Office Box 256
Nixon, Nevada 89424
Telephone: (775) 574-1000 / 574-1001 / 574-1002
FAX (775) 574-1008

July 22, 2013

Amy Leuders
BLM Nevada State Director
Ruby SEIS
C/O BLM Price Field Office
125 South 600 West
Price, UT 84501

RE: SEIS Ruby Pipeline

Dear Ms. Leuders,

The Pyramid Lake Paiute Tribe would like to exercise its right to tribal consultation under National Environmental Policy Act (NEPA). In April 2013, your BLM staff met with our Tribe prior to the preparation of the SEIS. We would like to extend our appreciation in the foresight of considering the value of policy mandates and the spirit of cooperation and effective communication.

Therefore, please contact the Tribal Secretary, Michele Smith, for the Pyramid Lake Paiute Tribe to set the best available times for your staff and ours. It is imperative that we work to strengthen a relationship that is of a regular and meaningful basis. In 2000, President Obama had released Executive Order 13175 to direct agencies to implement a plan of action as how they were going to address agency Tribal consultation. Please provide the Tribe a copy of your agency's consultation plan development and implementation goals or policies.

We again thank you for your preparation in meeting goal directives. Ms. Smith can be reached at (775) 574-1000, ext. 101, or by email: tribalsecretary@plpt.nsn.us.

Respectfully,

Elwood Lowery, Tribal Chairman

cc: Mark Hall, BLM Winnemucca Office

ENCLOSURES

In addition, the Tribe would like to submit comments to the Supplemental Environmental Impact Statement, as requested by your letter dated July 1, 2013.

COMMENT 1:

As pertinent, in reapproving the Ruby Pipeline Right-of-Way (ROW), the cumulative impacts of the Pipeline to the sagebrush steppe habitat, the SEIS should have coincided with the release of the Biological Opinion (BO) supplied by the FWS. At this time, the release of the BO is unknown since the record of decision was based on the BO. The BO is important to its accompaniment to the Cumulative Impacts documents.

COMMENT 2:

In regards to Cultural Resources, the value of the sagebrush habitat to Tribal members is great due to the use of sage in religious and ceremonial practices of Northern Paiutes and Western Shoshone. Sage can be sought in various areas and Tribes may seek medicines from afar, based on prescribed spiritual advice. The protection of sage of all species types are of high importance. Therefore, it would be important to know what types of sage would be replanted to meet the needs to the tribes.

COMMENT 3:

Although rare in nature, a supplemental EIS is redistributed through court order. On October 2012, after the Ruby Pipeline was completed, and now is present operation, how does BLM plan to assess the impacts since those are now known and how are restoration efforts mitigated?

COMMENT 4:

It was noted that approximately 337.8 million gallons of groundwater along the pipeline was going to be withdrawn. The SEIS did not supple ample information as how extraction and means of withdraw were to happen.

COMMENT 5:

What aquifers was this to affect? Especially, knowing that indeed a relationship with surface waters and ground water occurs (ultimately impacting animals and plants). If withdrawn, what are these impacts? How are these to be mitigated?

COMMENT 6:

The gross acreage of disturbance is enormous. Following the excavation and installation pipeline at a length and width along a 678 mile disturbed footprint, it would be favorable to re-vegetate as quickly as possible when conditions are conducive. It also would be necessary to plant with resilient high dormancy native seed.

COMMENT 7:

In relation to Comment 6; should this not happen, BLM and others may have to subsidize the costs of extensive treatments throughout this corridor than costs to be incurred by Ruby developers.

COMMENT 8:

Throughout sagebrush steppe habitat, a number of stream beds may have been disturbed. Whether these streams are perennial, intermittent, and ephemeral; restoration of these valuable areas are of major significance. The mitigation through restoration efforts should be of high priority due to impact of water flow management and ultimate functionality of that surface water.

COMMENT 9:

If juniper-pinion reduction sought that restoration efforts be focused on areas that have high priority for ecological health and success and its value and benefit to wildlife and riparian ecological processes. Protection of watershed should be mapped.

COMMENT 10:

Gathering by Northern Paiutes and Western Shoshones is through ancestral practices; therefore, regardless of existing governmental boundaries, gathering of medicines and other cultural resources should not impact in sagebrush steppe habitat.

COMMENT 11:

Please supply ample information as to the impact of sage grouse. The EIS Chapter 2 was recently released with an unknown number of pages of total number of pages. Thus, SEIS only has 6 pages reference in the index of the document.

SUMMIT LAKE PAIUTE TRIBE
Primary Administrative Office
1708 H Street, Sparks, NV 89431-4337
(775) 827-9670 • (775) 827-9678 (Fax)

SUMMIT LAKE PAIUTE COUNCIL
Chairman: Warner Barlese • Vice-Chairperson: Ernie Barlese
Secretary/Treasurer: Jerri Lynn Barlese • Council Member: Jerry L. Barr • Council Member: Randi DeSoto

August 20, 2013
VIA EMAIL

Gene Seidlitz, District Manager
Winnemucca District
Bureau of Land Management
5100 East Winnemucca Blvd.
Winnemucca, NV 89445

RE: Comments on Draft Supplemental EIS for the Ruby Pipeline Project

Dear Mr. Seidlitz,

On behalf of the Summit Lake Paiute Tribe (Tribe) I am submitting the following comments on the Bureau of Land Management's (BLM) Draft Supplemental Environmental Impact Statement (Draft SEIS) for the Ruby Pipeline Project. As you know, the Draft SEIS is in response to a Ninth Circuit Court of Appeals Decision that found the Ruby Pipeline Final Environmental Impact Statement did not provide sufficient quantified or detailed data about the cumulative loss of sagebrush steppe vegetation and habitat. The Tribe was a party to that litigation and has a long history of commenting on the original EIS in opposition to the pipeline, which has since been constructed and is currently operational.

As you have personally witnessed, the pipeline, which runs directly north of the Tribe's Reservation, has created a scar on the natural landscape. In addition to the adverse aesthetic impacts that the pipeline has created, the pipeline resulted in severe impacts to sagebrush steppe vegetation and habitat. Efforts to re-vegetate the segment of pipeline within the viewshed of the Reservation have not been successful and have included the introduction of non-native vegetation. On August 17, 2013, representatives of your office, Gerald Dixon and Mark Hall, obtained verbal comments from the Summit Lake Paiute Tribal Council. In addition, the Tribe gave Mr. Hall a list of native species indigenous to the area that should be used to re-vegetate this area along the area of disturbance created by the pipeline (a revised copy of that list is attached). Because many of the indigenous seeds are in many instances not readily available, we believe that the BLM should fund and engage Tribal experts to harness appropriate seeds and work with Tribal personal to re-vegetate the affected area.

Insofar as Draft SEIS will serve as the foundation for the BLM's decision on whether to reissue the right-of-way for the project and determine what terms and conditions it will require, we

respectfully request that these measures be incorporated as enforceable mitigation measures in the Final EIS.

Sincerely,

William Cowan for

Randi DeSoto
Chairwoman

Enc.

cc Gerald Dixon, Field Manager, BLM Black Rock Field Office
Mark Hall, Archeologist, BLM

Native Plants, Trees, Shrubs, Forbs, and Grasses Utilized by the Paiutes Of Summit Lake for Medicinal, Edible, Clothing, and Ceremonial Purposes

Plant Name	Plant Genus/Species/Family	Paiute Word
Big Sagebrush	Artemesia Tridentate	sawabi
Bighead clover	Trifolium macrocephalum	poziidapi
Biscuitroot	L. cous	tsuga
Bitterbrush	Pershia Tridentata	sawabi
Bitterroot	Lewisia rediviva	kanici
Blazing star	Mentzelia laevicaulis	guuha
Bolander's Yampah	Periderdia bolanderi	yampah
Buckberry	Shepherdia canadensis	waipui
Cattail	Typha Latifolia	toibe
Chokecherry	Prunus Virgiana	tooisabui
Cottonwood	Populus angustifolia	sunabe
Coyote Willow	Salix sp.	siibe
Curly Dock / Squaw Currant	Rumex	atsapui
Elderberry	Sambucus nigra ssp. cerulea	hooboo
Gairdner's Yampah	P gairdneri	pamahayampa
Golden currant	Ribes aureum	pokopisa
Greasewood	Sacrobatus vermiculatus	tonobe
Great Basin Wild Rye	Elymus cinereus	waiya
Hawthorn blackberry	crataegus douglasii	kwinaa pisa
Huckleberry	V membranaceum	tokabonoma
Indian Balsam	Lycium andersonii	todza
Indian Balsamroot	Balsamorhiza sagattata	kusiaki
Indian hemp	Apocynum cannabinum	wihowi
Indian Plum	Prunus subcordata	tuyu
Indian Rice Grass	Oryzopsis Hymenoides	wea
Indian Sunflower	Eriophyllum	aku
Indian Tea, Mormon	Ephedra sp.	tsoodoope
Indian, Coyote, Wild Tobacco	Nicotiana Attenuate	puihibamo
Juniper	Juniperus occidentalis	tuupi
Low Sagebrush	Artemesia Arbuscula	sawabi
Mariposa Lily	Calochortus bruneaunis	koogi
Osha/ Indian celery	Ligusticum nudicauli	hunibui
Pahute weed	Suaeda depressa	waada
Penstemon	Penstemon specious	namogot
Pinyon Pine	Pinus Monophylla	tubape
Ponderosa pine	Pinus ponderosa	wogope

Native Plants, Trees, Shrubs, Forbs, and Grasses Utilized by the Paiutes Of Summit Lake for Medicinal, Edible, Clothing, and Ceremonial Purposes

Plant Name	Genus/Species/Family	Paiute Word
Quaking aspen	Populus tremuloides	sinabi
Rabbit brush	Chrysothamnus nauseosus	sigupi
Rock onion	A Macrum	naguutiva
Salt brush	Atriplex sp	suuhuu
Seep weed	Mimulus guttatus	waada
Sego Lily	Calochortus nuttail	koogi
Small camas, Quamash	Camassia quamash	paazigo
Squaw currant	Ribes cereum	atsapui
Sugar cane/common reed	Phragmites australius	wokokobu
Swamp onion	A madidum	sii
Tapernip onion	Allium acuminatum	kiiga
Tule	Scripus validus	saibi
Tumbling mustard	Sisymbrium altissimum	atsa
Wild Garlic	Allium canadense	utze
Wild mint	Mentha arvensis	pakwana
Wild Onion	Allium nevadense	padu'zu
Wild Potatoe	Chlorogalum pomeridianum	yapa
Wild rose	Rosa woodsii	tziabii
Willow tree	Salix sp.	sagape
Yampa/Desert Parsely	Perideridia	kwi dapoo
Yarrow (Western)	Achillea Milleflium	wodaa kwasiba
Yellow bell	Fritillaria pudica	winida

Summit Lake Paiute culture is inherently tied to the wildlife and natural resources surrounding Summit Lake.
Traditional cultural belief considers all elements of an ecosystem are interconnected, that certain species of wildlife and plants are relatives and spiritual messengers. Many of the tribal members respect the natural world by paying reverence to wildlife phenomena as divine inspiration and prefer to eat wild, traditional foods from ancestral homelands.
Paiutes used every resource advantageously and with little to no waste; shelters were made from readily available materials to protect them from seasonal extremes. The Paiutes would relocate their families to accommodate seasonal changes in the food supplies. Paiutes also used materials from the earth as part of their spiritual rituals, customs, and healing practices. Plants were used as food, and medicinal purposes. Paiutes combined spirituality with play and work with happiness. Harvest time would begin with prayer and song; they would feast, dance, visit, and engage in many social activities. Everyone participated in the harvest that involved traditional practices and ceremonies before collecting, cleaning, roasting, winnowing, grinding, drying, and packaging. Each animal and plant resource was used for food, shelter, tools, clothing, trade, spiritual practices and medicinal rituals. Much of the tribal life centered around the lake, river, and marshes where fish were abundant. Fishing took place year round, especially when the wild seeds failed due to lack of rainfall.

Existing environments of the Summit Lake Paiute Reservation.
The Summit Lake Paiute Reservation is made up of three ecosystems that work together; they are the Sagebrush, Lacustrine (Lake), and Aspen-Willow Riparian (Streamside) Ecosystems. An ecosystem is a community of living and non-living things that live in the same area and work together for survival. An ecosystem can be large and have many things living in them, or they can be small and just have a few things living in them. The ecosystems on the Summit Lake Reservation have adapted to live and work together for survival which keeps the ecosystems healthy.
The Sagebrush Ecosystem, a big sagebrush grass community, is found in great abundance on the reservation. The ecosystem is made up of sagebrush, grasses, herbs, and forbs. Most Sagebrush ecosystems have been broken up into smaller pieces and in some cases they are disappearing altogether following heavy grazing, wildfires, and other natural or manmade disturbances. The Sagebrush Ecosystem on the Summit Lake Paiute Reservation is part of the largest intact area of this important community, one that has been left in a fairly natural state.
The Lacustrine (Lake) Ecosystem of Summit Lake and the surrounding shoreline is home to a wide variety of plants, animals, and most notably the Lahontan Cutthroat Trout, which are important to the Tribe and protected by the Endangered Species Act. Summit Lake is the main surface water body on the Reservation. It is located approximately in the center of the Reservation at an elevation of 5,700 feet above sea level. The size of the lake varies dependent on climate; it averages between 600 and 9oo acres. The lake itself is fairly shallow, the estimated average depth of 15 to 20 feet, and is just over 40 feet at the deepest point. With no outlet for water to leave the lake, Summit Lake became what is known as a Desert Terminal Lake, meaning no water flows out of it. The lake is fed by two perennial (flow year-round) stream systems or sub-watersheds, they are Mahogany and Snow creek.
The Aspen-Willow Riparian (Streamside) Ecosystem of Summit Lake is extremely important because the vegetation acts as a buffer zone that protects the creek from sediment and pollutants. There are two creeks on the Reservation: Mahogany Creek and Snow Creek which are fed by snowmelt high in the mountains of the Black Rock Range and flow down the mountain, across the Reservation, and finally into Summit Lake. The ecosystems beside each of these creeks are different from that of the lake or sagebrush. In the riparian zone, lush grasses generally cover the stream bank and extend out way from it. In some places Aspen and Willow trees also grow beside the creeks. The shade and stable banks that are provided by such a healthy riparian area is crucial for keeping water temperatures low enough and the water clean enough for the Lahontan Cutthroat to live in.

WYOMING GAME AND FISH DEPARTMENT

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August 8, 2013

WER 11767
Bureau of Land Management
Price Field Office
Notice of Availability of the
Draft Supplemental Environmental Impact Statement
Ruby Pipeline Project

Mark A. Mackiewicz
Project Manager
Bureau of Land Management
Price Field Office
125 South 600 West
Price, Utah, 84501

Dear Mr. Mackiewicz:

The staff of the Wyoming Game and Fish Department has reviewed the Draft Supplemental Environmental Impact Statement (SEIS) for the Ruby Pipeline Project. We appreciate your consideration and inclusion of our previous comments. We have no additional terrestrial wildlife or aquatic concerns pertaining to the SEIS.

Thank you for the opportunity to comment. If you have any questions or concerns, please contact Amanda Withroder, Staff Biologist, at (307) 473-3436.

Sincerely,

for Mark Konishi
Deputy Director

MK/mf/gb