Record of Decision For the Utah Lake Drainage Basin Water Delivery System

Utah Reclamation Mitigation and Conservation Commission January, 2005

I. Introduction

This Record of Decision (ROD) documents the Utah Reclamation Mitigation and Conservation Commission's selection of the Spanish Fork Canyon–Provo Reservoir Canal Alternative (Proposed Action) as presented in the Utah Lake Drainage Basin Water Delivery System (Utah Lake System or ULS) 2004 Final Environmental Impact Statement, FES 04-41, (ULS FEIS). The ULS FEIS was filed with the Environmental Protection Agency on September 30, 2004. The ULS FEIS meets the requirements of the National Environmental Policy Act (NEPA); serves as the compliance document for the Clean Water Act as provided in section 404(r); provides compliance for the withdrawal and revocation of National Forest System lands; provides compliance with Section 7 of the Endangered Species Act, the Historic Preservation Act, and the Fish and Wildlife Coordination Act; and provides compliance to enter into contracts, agreements and permits that would be required for the construction and operation of the Utah Lake System. The Utah Reclamation Mitigation and Conservation Commission (Mitigation Commission), the Central Utah Water Conservancy District (District), and the Department of the Interior (Interior) are the Joint-Lead Agencies responsible for NEPA compliance and implementation of the Utah Lake System.

The Mitigation Commission, through this ROD, selects the Proposed Action as presented in the ULS FEIS and approves the completion of the Utah Lake System through the combined efforts of the Mitigation Commission, the District, and Interior. This ROD explains the basis for this decision and establishes certain parameters under which the Utah Lake System will be constructed and operated. Interior's Assistant Secretary - Water and Science issued a separate ROD for the Utah Lake System on December 22, 2004, also selecting the Proposed Action. The Assistant Secretary=s separate decision is necessitated by the responsibility and authority of the Department of the Interior for other aspects of the project beyond the scope of the Mitigation Commission to mitigate for reclamation projects.

The ULS FEIS concludes that of all the alternatives evaluated in the ULS FEIS, the Proposed Action provides the most economical water supply, the most fish and wildlife benefits, and is the environmentally preferable alternative.

II. Background

The Central Utah Project (CUP) was authorized for construction as a participating project under the Colorado River Storage Project Act of 1956 (CRSPA). The CUP, as authorized in 1956 and as supplemented in 1968, consisted of six individual units: 1) the Vernal Unit; 2) the Jensen Unit; 3) the Upalco Unit; 4) the Uintah Unit; 5) the Ute Indian Unit; and 6) the Bonneville Unit.

The Bonneville Unit of the Central Utah Project (CUP) is located in central and northeastern Utah. The unit includes facilities to develop and more fully utilize waters tributary to the Duchesne River in the Uinta Basin of Utah, to facilitate a transbasin diversion from the Colorado River Basin to the Bonneville Basin, and to develop and distribute project water in the Bonneville Basin. For planning and coordination purposes the Bonneville Unit was initially divided into six systems according to location and function. These systems are 1) the Starvation Collection System, 2) the Strawberry Collection System, 3) the Ute Indian Tribal Development Activities, 4) the Diamond Fork System, 5) the Municipal and Industrial System (M&I System), and 6) the Irrigation and Drainage System (I&D System).

The Central Utah Project Completion Act (CUPCA) of 1992 (Titles II through VI of P.L. 102-575), as amended, authorized funding for the completion of the Bonneville Unit, established the Mitigation Commission, de-authorized the Ute Indian Unit and other project facilities, required local cost sharing, and established various additional environmental commitments. The Mitigation Commission was created under CUPCA to assure that fish and wildlife impacts due to the CUP are mitigated. The Mitigation Commission is the lead agency responsible for planning, funding and implementing most of the environmental commitments for the ULS, which are summarized in Attachment 1 to this ROD and which are incorporated in the ROD by reference. The District and/or Interior are responsible for planning, funding and implementing several of the environmental commitments for the ULS

Pursuant to CUPCA, the I&D System was replaced with the Spanish Fork Canyon-Nephi Irrigation System (SFN System) in 1995 when Sevier and Millard Counties chose to withdraw from the District and were removed from the service area. However, planning on the SFN System was discontinued in 1998, and a new planning process was initiated in 2000 on the Utah Lake System.

The Utah Lake System was authorized in Section 202(a)(1)(B)(iii) of CUPCA, as amended. It is the last of the six original systems of the Bonneville Unit of the Central Utah Project and provides project water for municipal and industrial purposes, irrigation, hydroelectric power, fish and wildlife, and recreation. The Utah Lake System evolved from and would replace the I&D System, which was first identified in the Bonneville Unit Final Environmental Impact Statement in 1973. The other five Bonneville Unit systems are complete and operating (the last remaining element of the original Ute Indian Tribal Development Activities, as amended by CUPCA, is in the latter stages of NEPA compliance at this time). The Utah Lake System is now proposed to deliver the remaining uncommitted Bonneville Unit water as a municipal and industrial water supply directly to the Wasatch Front communities.

III. Purpose and Need

Following a September 2000 public meeting, and after requests for project water were received and analyzed, the Joint-Lead Agencies developed an initial purpose and need statement. This purpose and need statement and the results of the water needs analysis were presented at a public meeting on October 17, 2001, where additional public comment was solicited. Based upon this additional public input, the purpose and need statement was modified; it defines the underlying needs to which the selected plan and any alternatives must respond, and the attendant purposes of the Utah Lake System. As such, it has served as a guide throughout the planning/NEPA process.

The Proposed Action and other action alternatives respond to the following needs:

- 1. To complete the Bonneville Unit by delivering 101,900 acre-feet on an average annual basis from Strawberry Reservoir to the Wasatch Front Area and project water from other sources to meet some of the municipal and industrial (M&I) demand in the Wasatch Front Area.
- 2. To implement water conservation measures.
- 3. To address all remaining environmental commitments associated with the Bonneville Unit.
- 4. To maximize current and future M&I water supplies associated with the Bonneville Unit.

The purposes of the project that have been identified are:

- 1. To protect water quality of surface and underground water resources that may be affected by Bonneville Unit completion.
- 2. To provide creative methods, facilities and incentives to implement water conservation measures, reuse and conjunctive use of water resources.
- 3. To participate in the implementation of the June Sucker Recovery Implementation Program.
- 4. To provide previously committed in-stream flows within the Bonneville Unit area and statutorily mandated in-stream flows, and assist in improving fish, wildlife and related recreational resources.
- 5. To provide for the United States to acquire adequate District water rights in Utah Lake to implement the ULS and other water rights as authorized by CUPCA.
- 6. To continue to provide Bonneville Unit water in accordance with existing contracts.
- 7. To develop project power.

IV. Alternatives Considered in the ULS FEIS

Proposed Action - Spanish Fork Canyon-Provo Reservoir Canal Pipeline Alternative

The Spanish Fork Canyon-Provo Reservoir Canal Pipeline Alternative has an average transbasin diversion of 101,900 acre-feet, which consists of a delivery of: 30,000 acre-feet of M&I water for secondary use to southern Utah County and 30,000 acre-feet of M&I water to Salt Lake County water treatment plants; 1,590 acre-feet of M&I water already contracted to southern Utah County cities; and 40,310 acre-feet of M&I water to Utah Lake for exchange to Jordanelle Reservoir. A portion of the 40.310 acre-feet delivered to Utah Lake would be delivered via lower Hobble Creek to provide spawning habitat for the endangered June sucker (*Chasmistes liorus*), and via lower Provo River where it would help maintain minimum instream flows for June sucker spawning and other fishery and aquatic benefits. The 30,000 acre-feet (less the water returned to Interior under the Section 207 Program) of M&I water utilized in southern Utah County would be used in the cities' secondary water systems. Use of this water as a potable supply in the future would require additional NEPA compliance. Under the Proposed Action, Interior would acquire all of the District's secondary water rights in Utah Lake. These rights would amount to a maximum of 57,073 acre-feet. The acquired water rights would be used to exchange project water to Jordanelle Reservoir. All remaining environmental commitments associated with the Bonneville Unit would be completed and previously committed in-stream flows within the Bonneville Unit area and statutorily mandated in-stream flows would be provided.

The Proposed Action Alternative would include the following features: 1) Sixth Water Hydropower Plant, Substation, and Transmission Facilities, 2) Upper Diamond Fork Hydropower Plant and Transmission Facilities, 3) Spanish Fork Canyon Pipeline, 4) Spanish Fork-Santaguin Pipeline, 5) Santaguin-Mona Reservoir Pipeline, 6) Mapleton-Springville Lateral Pipeline, and 7) Spanish Fork–Provo Reservoir Canal Pipeline. These features would deliver ULS M&I secondary water to southern Utah County cities, deliver water to Hobble Creek to provide June sucker spawning flows and supplemental flows during other times of the vear, deliver water for supplemental flows in the lower Provo River along with acquired or conserved water to assist June sucker spawning and rearing and for general fishery and aquatic improvements, deliver M&I raw water to the Provo Reservoir Canal and the Jordan Aqueduct for conveyance to water treatment plants in Salt Lake County, and provide water to generate electric power at two hydropower plants in the Diamond Fork System with the associated transmission facilities. Three pipelines (Spanish Fork Canyon, Spanish Fork – Santaguin, and Mapleton-Springville) would convey up to 10,200 acre-feet of Strawberry Valley Project (SVP) water shares contractually assigned or made available to South Utah Valley Municipal Water Association (SUVMWA) or its member cities/municipalities in southern Utah County on a space-available basis.

The land that will be required to construct and operate the features of the Proposed Action Alternative consists of National Forest System lands, State of Utah Department of Transportation lands, City and County lands, and privately owned lands. Permanent rights-of-way will be

required for the features, and temporary rights-of-way will be required during construction to provide space for equipment operation and staging areas. Some of the National Forest System lands that will be required have previously been withdrawn. As legally required, Interior is working with the Forest Service and the Bureau of Land Management (BLM) to withdraw the additional lands required for the project and to revoke previous withdrawals that are not needed for the project.

Bonneville Unit Water Alternative

The Bonneville Unit Water Alternative would convey an average transbasin diversion of 101,900 acre-feet consisting of: 15,800 acre-feet of M&I water to southern Utah County to be used in secondary water systems; 1,590 acre-feet of M&I water already contracted to the southern Utah County cities; and 84,510 acre-feet of M&I water delivered to Utah Lake for exchange to Jordanelle Reservoir. It would conserve water in the Provo River basin and deliver it along with acquired water to assist June sucker spawning and rearing in lower Provo River; conserve water in a Mapleton-Springville Lateral Pipeline and convey water to support in-stream flows in Hobble Creek to assist recovery of the June sucker; and generate electric power at two hydropower plants in the Diamond Fork System. It would involve construction of three new pipelines and two new hydropower plants with associated transmission facilities. Under this alternative, Interior would acquire up to 15,000 acre-feet of the District's secondary water rights in Utah Lake to provide a firm annual yield of 15,800 acre-feet of M&I water for secondary water systems in southern Utah County. All remaining environmental commitments associated with the Bonneville Unit would be completed and previously committed in-stream flows within the Bonneville Unit area and statutorily mandated in-stream flows would be provided.

The Bonneville Unit Water Alternative would include the following features: 1) Sixth Water Hydropower Plant, Substation, and Transmission Facilities, 2) Upper Diamond Fork Hydropower Plant and Transmission Facilities, 3) Spanish Fork Canyon Pipeline, 4) Spanish Fork—Santaquin Pipeline, and 5) Mapleton—Springville Lateral Pipeline. These features would deliver ULS M&I secondary water to southern Utah County cities, deliver Bonneville Unit water to Hobble Creek to provide June sucker flows, and generate and deliver electric power from two hydropower plants. Three of the pipelines would convey up to 10,200 acre-feet of Strawberry Valley Project (SVP) water shares contractually assigned or made available to SUVMWA or its member cities/municipalities in southern Utah County on a space available basis.

No Action Alternative

No new water conveyance features would be constructed under the No Action Alternative. The 15,800 acre-feet of available Bonneville Unit water would remain in Strawberry Reservoir to provide a firm supply of previously contracted water without any shortages. Some of the Bonneville Unit M&I exchange water would be routed through the Strawberry Tunnel to meet in-stream flow needs in Sixth Water and Diamond Fork creeks. The remaining Bonneville Unit M&I exchange water would be conveyed through the Syar Tunnel and Diamond Fork System and discharged into Diamond Fork Creek at the outlet near Monks Hollow for in-stream flows or

discharged from the Diamond Fork Pipeline and Spanish Fork River Flow Control Structure into Diamond Fork Creek at the mouth of Diamond Fork Canyon. If the No Action Alternative was selected, the privately owned irrigation diversions on lower Spanish Fork River would be modified to bypass and measure the 86,100 acre-feet of project water delivered to Utah Lake, and to allow fish passage as previously agreed by the Mitigation Commission, Interior and the District in the 1999 Diamond Fork FS-FEIS and ROD. These modifications to the privately owned irrigation diversions would not be required under the Proposed Action Alternative. The No Action Alternative would conserve water in the Provo River basin and deliver it along with acquired water to assist June sucker spawning and rearing in the lower Provo River. Interior would not acquire any of the District's secondary water rights in Utah Lake and no water would be conveyed to Hobble Creek. The No Action Alternative would be operated the same as the Interim Proposed Action described in the Diamond Fork 1999 FS-FEIS. All remaining environmental commitments associated with the Bonneville Unit would be completed and previously committed in-stream flows within the Bonneville Unit area and statutorily mandated in-stream flows would be provided.

Other Alternatives

While considering the various methods to distribute the ULS water supply, numerous alternatives were identified and studied that would develop and deliver the remaining Bonneville Unit water supply plus District-owned water in Utah Lake that would be acquired by Interior. These alternatives that were considered may have met the need and some of the purposes, but were eliminated because of one or more of the following reasons: 1) it would not be economically acceptable, 2) the construction and long-term maintenance would be technically difficult and pose long-term operation and maintenance unknowns, 3) it would not be reliable over the project life, 4) it would be unacceptable to the public and resource management agencies, and 5) it would have had unacceptable adverse impacts on environmental resources. The ULS FEIS lists the eight alternatives that were eliminated from detailed analysis and summarizes information related to the estimated construction and water costs for each alternative.

V. Decision

It is the decision of the Mitigation Commission to select the Proposed Action as presented in the Utah Lake System September 2004 Final Environmental Impact Statement. The Mitigation Commission also approves cooperation with Interior and the District to execute the necessary contracts and agreements, and to construct and operate the Utah Lake System in accordance with statutory and environmental commitments. In making this decision, the Mitigation Commission has reviewed all the alternatives and their predicted environmental, economic, and social impacts, and considered the comments submitted by interested parties. The negative impacts of the Proposed Action are minimal while the environmental mitigation and conservation enhancements, the water benefits including the water conservation and recycling measures, and the hydropower benefits are substantial. Therefore, the Proposed Action is adopted.

In selecting the Proposed Action, the Joint-lead Agencies have made specific environmental commitments, which by agreement and statutory provision, are binding on them. The environmental commitments are partially documented in Volume 2, Appendix A on pages A-1 through A-15 of the ULS FEIS. Attachment 1 to this ROD lists all the commitments, including the environmental commitments, and is included and made a part of this ROD. The Joint-Lead Agencies will implement these commitments. If the recommendations made by value engineering studies provide significant project and/or environmental benefits, or reduce project costs, the Joint-Lead Agencies by mutual agreement will modify the Proposed Action accordingly with additional NEPA compliance.

In the future, the Utah Lake System will be operated so as to provide the statutorily mandated minimum flows, the flows committed to for the endangered June sucker, the supplemental flows in the lower Provo River identified in the ULS FEIS, the water conservation and recycling measures contractually committed to by the District and its petitioners, and the Mitigation Commission will continue to be an active partner with the other Joint-Lead Agencies, U.S. Fish and Wildlife Service (USFWS), and Utah Division of Wildlife Resources. In addition, this ROD also reiterates the Joint-Lead Agencies' previous commitment to operate the Bonneville Unit in a manner that is equal to or less than the hydrologic regime for Sixth Water and Diamond Fork Creeks that is described and documented in detail in the "Draft Water Supply Appendix - March 1998, Supplement to the 1988 Bonneville Unit Definite Plan Report".

VI. Basis for Decision

The Mitigation Commission has reviewed all of the alternatives that were considered, their predicted environmental, economic, and social consequences, and the risks and safeguards inherent in them. The Mitigation Commission has considered the comments received on the ULS DEIS and ULS FEIS; the technical documents; the authorizing legislation; the recommendations from the Mitigation Commission's staff; and other relevant materials.

The entire list of project purposes and needs is set out in section III.A. above. The Proposed Action is the only alternative that meets all of these purposes and needs. The Proposed Action meets all the previous and additional environmental commitments and does so in a more environmentally acceptable way than the other alternatives that were considered. The Proposed Action has minimal adverse environmental impacts; minimizes and mitigates significant impacts; and provides additional environmental conservation and enhancement. The Proposed Action also provides the largest project M&I water supply for the least cost per acre-foot to the petitioners, provides full repayment of the reimbursable costs of the M&I water, and provides for up-front cost sharing by the District.

¹ Section 205 of CUPCA requires a Definite Plan Report to be prepared by the District. In compliance with this requirement, in November 2004, a Supplement to the 1988 Definite Plan Report was finalized, approved, and made available.

The following paragraphs summarize the major impacts of the Proposed Action, both those considered to be adverse and those considered to be beneficial.

The Proposed Action will provide significant increases in habitat for June sucker, an endangered species, in the lower Provo River and in Hobble Creek, tributaries of Utah Lake. Providing instream flows in the Provo River would cause a 181 to 192 percent increase in weighted usable area (WUA) in May and a 96 to 122 percent increase in WUA in June for the moderate flow – mid-depth habitat on an annual basis for June sucker specific spawning habitat between the Tanner Diversion and Utah Lake compared to baseline conditions. Minor decreases of habitat for early life stages would be offset by large predicted habitat gains for spawning June sucker. Game fish biomass and total fish biomass are projected to increase by 19,496 pounds in the project area. There would be a significant impact on angler day use on the Provo River. It is estimated that the Proposed Action would increase angler day use by 36,342 days per year in reaches with public access. Total net angler-days per year would increase by 36,438 (+27 percent) under the Proposed Action.

The Proposed Action could have significant impacts on leatherside chub habitat in the Spanish Fork River from a 32 percent to 66 percent decrease in flows. Although the change in habitat is not expected to be substantial (i.e., greater than 25 percent of habitat in the eco-region), the impact can be considered significant. To offset potential impacts on leatherside chub, the Joint-Lead Agencies commit to supporting the Utah Division of Wildlife Resources in evaluating population and habitat status, or determining threats and/or identifying conservation actions that could protect, and where appropriate, enhance leatherside chub. This would occur first in the Spanish Fork River, but if necessary, in other streams of the Utah Lake drainage. No other sensitive species would be significantly impacted by the Proposed Action.

A total of 0.27 acres comprised of 12 small, scattered non-jurisdictional wetlands would be temporarily lost, but then restored upon completion of construction; 1.03 acres comprised of 16 small, scattered, non-jurisdictional wetlands would be permanently lost from construction of the Mapleton-Springville Lateral Pipeline, and drain/discharge structures associated with other pipelines. The permanent loss of 1.03 acres of wetlands would be a significant impact. The Mitigation Commission has already completed wetland mitigation for the impacts and there would be "no net loss of wetlands". Ten acres of the 85.5-acre Mona Springs complex acquired by the Mitigation Commission has been improved for wetlands values, resulting in a mitigation ratio of approximately 9.7 to 1. This is substantial mitigation for both temporary and permanent loss of small, scattered, non-jurisdictional wetlands that currently have low functional value and do not support any threatened, endangered, or sensitive (TES) species.

The Proposed Action would result in a loss of 2.4 acres of wildlife habitat scattered throughout the impact area of influence. This habitat has marginal wildlife values and abundant equivalent or higher value habitat is available adjacent to all features constructed for this alternative. Impacts on game and non-game wildlife home ranges would be minimal. Construction and operation of the alternative would not cause a substantial disturbance to wildlife habitats; habitat disturbance would not exceed the significance criteria.

The Proposed Action would reduce total phosphorus (TP) concentrations in Utah Lake from existing conditions, would not change the net TP load into Utah Lake, would cause slight increases and decreases in cumulative total dissolved solids (TDS) concentrations in Utah Lake, and would decrease the net TDS load into Utah Lake. The Proposed Action would have the least water quality impact on the aquatic ecosystem in Utah Lake. The change in TP concentrations in Hobble Creek would be the same for the practicable alternatives. In the Spanish Fork River, there would be no exceedances of water quality standards under the Proposed Action.

VII. Implementation

The construction and operation of the Proposed Action by the District will be pursuant to and in accordance with this ROD which includes the commitments listed in Attachment 1; the ROD issued by Interior's Assistant Secretary for Water and Science on December 22, 2004; the ULS FEIS; the 2004 Supplement to the Definite Plan Report (2004 DPR Supplement); the Implementation Contract No. WS-04-140; the Cost-Sharing Agreement No. 04_FC-UT-1170; the additional contracts, agreements, permits, and approvals enumerated in Tables 1-36 and 1-37 of the ULS FEIS; and such written approvals as required by the Mitigation Commission.

VIII. Environmentally Preferable Alternative

The Proposed Action is the Environmentally Preferable Alternative. It provides the greatest environmental benefits and least impacts of all the alternatives.

Regulations promulgated by the Council on Environmental Quality require an agency that has prepared an EIS to identify in the ROD the alternative or alternatives considered to be environmentally preferable (40 CFR '1505.2(b)). The environmentally preferable alternative is the alternative that would promote the national environmental policy as expressed in §101 of NEPA. Typically this means the alternative that causes the least damage to the biological and physical environment, and best protects, preserves, and enhances historic, cultural and natural resources.

Considering the full range of water and hydropower benefits, fish and wildlife benefits, habitat improvements, measures to recover the endangered June sucker, and other measures to protect other threatened, endangered, and sensitive species that are provided by the Proposed Action, it is the environmentally preferable alternative.

IX. Commitments including Mitigation/Environmental and Monitoring Commitments

This ROD documents the considerations which led the Mitigation Commission to choose to proceed with the Proposed Action Alternative. When implementing that action, certain specific requirements must be set out which govern implementing activities including the Standard Operating Procedures that were incorporated into the description of the Proposed Action Alternative. However, in choosing to proceed, it is impossible to know in detail every aspect of the contracting, construction, or other activities necessary to implement the Proposed Action Alternative. Therefore, certain overarching commitments must be made which guide the agency in carrying out these aspects of the selected alternative. The Mitigation Commission's adoption of the Proposed Action is contingent upon the fulfillment of all previous as well as new commitments contained in or referenced in this ROD.

Attachment 1 to this ROD lists all the specific commitments, including the environmental commitments, of the ULS and is included and made a part of this ROD.

X. Public Involvement

The EIS public involvement process consisted of several phases. Public participation began with scoping. During the scoping period, the Joint-Lead Agencies conducted meetings, workshops, and other public forums to help identify issues and alternatives before making initial decisions about the scope of alternatives which could be considered in the ULS DEIS. The Joint-Lead Agencies, then, analyzed the information gathered during the scoping phase and used it to determine the issues and alternatives that they would consider and address in the ULS DEIS.

The ULS DEIS received further public review and comment. During the review period for the ULS DEIS, a public meeting, or formal hearing, was convened to seek oral and written comments from the affected interest groups and individuals. Following the comment period the Joint-Lead Agencies analyzed and responded to comments and revised the ULS DEIS as necessary to develop the ULS FEIS. Finally, a ROD was prepared documenting and explaining the final decision. The ROD is provided to all the cooperating agencies and entities that commented on the ULS FEIS and is available to the public.

Public involvement throughout the EIS process ensured that the process was open and that the Joint-Lead Agencies considered information from all interested persons, including other Federal agencies, Indian Tribes, State and local government, the scientific community, professional organizations, environmental organizations, and citizens at large.

Public involvement for the Utah Lake System is detailed in Chapter 4 of the ULS FEIS which contains copies of public comments received on the ULS DEIS, and the responses thereto. A notice of intent to prepare an EIS for the Utah Lake System and initiate scoping was published in the Federal Register on August 23, 2000 (FR 00-21458). The Joint-Lead Agencies initiated the public process by conducting four scoping meetings. Two of these were conducted as informal 10

open houses – one in September 2000 provided background information on the Central Utah Project and received initial requests for Bonneville Unit water, and the other in October 2001 provided information on the Utah Lake System, presented the results of the water needs analysis, and accepted public comments. Formal scoping meetings held in February 2002 were planned to provide specific information on ULS water delivery concepts and solicit specific responses on those concepts from the public and agency representatives.

Public and agency input at the scoping meetings from interested citizens, organizations and government agencies was carefully reviewed and analyzed by the Joint-Lead Agencies to identify and determine any issues, concerns, or opportunities. The identified issues and concerns were divided into 23 resource disciplines representing distinct aspects of the human and natural environment. These issues and concerns were used to determine the scope of the impact analysis within each resource discipline.

The ULS DEIS was filed with the U.S. Environmental Protection Agency on March 25, 2004. A notice announcing the availability of the ULS DEIS was published in the Federal Register on March 30, 2004 (FR 04-7034). The notice invited the public to review and comment on the ULS DEIS during a 78-day comment period from March 25, 2004 until June 11, 2004. The notice also announced that public hearings would be held on April 28 and 29, 2004, for the purpose of receiving comments on the ULS DEIS. The District provided any person or entity not on the mailing list with a copy of the ULS DEIS and its supporting documents upon request, and made copies available for inspection at Interior's local office in Provo, Utah, at the District office in Orem, and at the Mitigation Commission office in Salt Lake City, Utah.

Two public hearings were held on the ULS DEIS, one in Sandy City and one in Spanish Fork City, Utah. Table 4-5 in the ULS FEIS summarizes the hearing details. A total of 28 comment letters on the ULS DEIS were received. These letters are identified in Table 4-6 of the ULS FEIS. The comments have been extracted from each comment letter and retyped, with each comment followed by a response. The complete comment letters listed in Table 4-6 are reprinted in Appendix I of the ULS FEIS. On September 30, 2004, Interior filed the 2004 ULS FEIS with the EPA. Copies of the ULS FEIS were sent to Federal agencies, State and local governments, environmental organizations, and the general public, including all people and organizations who commented on the ULS DEIS.

Two letters of comment were received on the ULS FEIS. One letter was received from the Strawberry Water Users Association (SWUA) and one from the Environmental Protection Agency. Interior responded directly to both commenters, representing the Joint-Lead Agencies, and addressed the issues raised in the comment letters; those responses are covered in detail in Interior's ROD issued December 22, 2004.

XI. Consultation

Table 4-3 in the ULS FEIS lists the coordination and consultation meetings that were held in the process of preparing the ULS FEIS. In addition, the following information describes the studies that were completed to comply with Federal laws and executive orders.

Fish and Wildlife Coordination Act - The District and the Mitigation Commission coordinated with the Fish and Wildlife Service (FWS) on fish and wildlife resources and habitat that would be affected by the Proposed Action and other alternatives. The FWS has prepared a Planning Aid Memorandum to comply with the Fish and Wildlife Coordination Act. The recommendations were incorporated into the ULS FEIS.

Endangered Species Act of 1973 As Amended - The District requested a list of threatened and endangered species from the FWS that are located in the impact area of influence, and prepared a draft Biological Assessment and submitted it to the FWS for their review and comment. The FWS has prepared a concurrence letter on the Biological Assessment to provide compliance with Section 7 of the Endangered Species Act of 1973 as amended. The concurrence letter is included in Appendix F of the ULS FEIS.

National Historic Preservation Act - The District consulted with the Advisory Council on Historic Preservation (ACHP) and the Utah State Historic Preservation Office (SHPO) on cultural resources that could be affected by the ULS Alternatives. The signed MOA with the SHPO is included in Appendix G of the ULS FEIS.

Clean Water Act - A water quality analysis has been prepared and integrated into Chapter 3 of the ULS FEIS. In addition, Appendix C of the ULS FEIS includes a 404(b)(1) analysis and 401 water quality certification as required under the Clean Water Act.

Executive Order 11988, Floodplain Management - Protection of floodplains and their management has been incorporated into the formulation of alternatives described in Chapter 1 of the ULS FEIS and has been integrated into the resource impact analysis in Chapter 3 of the ULS FEIS

Executive Order 11990, Protection of Wetlands - A detailed wetlands analysis has been performed on wetlands and riparian areas that could be impacted by the ULS Alternatives and has been integrated into Chapter 3 of the ULS FEIS. In addition, a 404(b)(1) analysis has been prepared on all of the alternatives analyzed in this ULS FEIS and is included in Appendix C of the ULS FEIS as part of the requirements for a 404(r) exemption from the 404 permit application process.

Indian Trust Assets Consultation - Consultation with the five Native American tribes by Interior and the District concerning Indian Trust Assets that may be affected by the proposed ULS Alternatives was completed. Formal consultation letters and information were sent to each tribe requesting a meeting with each tribe to discuss the ULS project and answer concerns and 12

questions. Copies of the letters and responses are included in Appendix G of the ULS FEIS and the results of the consultations are documented in Section 3.24 of Chapter 3 of the ULS FEIS.

XII. Administrative Review

This ROD is the final step in the administrative process. There are no further opportunities for administrative review.

XIII. Administrative Record

Arrangements for the review of the administrative record for the ULS FEIS can be made by contacting Mr. Mark Holden, Utah Reclamation Mitigation and Conservation Commission, 102 West 500 South Suite 315, Salt Lake City, Utah, 84101. Incorporated by reference in the administrative record are the ULS FEIS, associated comments, responses, and technical memorandums.

XIV. Signature

By signing this Record of Decision, I select the Proposed Action Alternative (Spanish Fork Canyon-Provo Reservoir Canal Alternative) to complete the Utah Lake System, as presented in the ULS FEIS, and approve Mitigation Commission cooperation with Interior and the District as they proceed with the construction and operation of the Utah Lake System, in accordance with statutory and contractual obligations.

Jody L. Williams, Chair

Utah Reclamation Mitigation and Conservation Commission

Jody L. Williams

Date

1-27-2005

Utah Lake System Commitments Including Mitigation, Environmental, and Monitoring Commitments

This attachment to the ULS ROD lists all the commitments, including the environmental commitments. The following list of commitments includes information provided in parenthesis at the end of each commitment which lists the responsible entity, the source of the commitment, and the reference number from the 2004 DPR Supplement, Fish and Wildlife Appendix.

Strawberry Aqueduct and Collection System (SACS)

- 1. Mitigate wildlife losses in accordance with the January 1987 "Wildlife Mitigation Plan for Strawberry Aqueduct and Collection System, Municipal and Industrial System, and Diamond Fork System, Bonneville Unit, Central Utah Project." (Commission, 1988 DPR, 2004 DPR1)
- 2. Provisions for bypasses of sufficient water to protect 50 percent of historic trout habitat in Strawberry River, Currant Creek, Rock Creek, and West Fork Duchesne River. (District, 1988 DPR, 2004 DPR2)
- 3. Remaining Acquisition of Angler Access: Acquire remaining 2 miles of access. (Commission, 1988 DPR/1999 Final EA on the Angler Access Mitigation Program/SACS, 2004 DPR4)
- 4. Develop 140 acres of riparian and marsh vegetation adjacent to Starvation Reservoir to replace habitat losses for the DRACR Program, a part of the Starvation Collection System. (Commission/Interior, 1988 DPR, 2004 DPR7)
- 5. Six waterfowl management areas will be established along the Duchesne River to mitigate for waterfowl losses resulting from operation of the Strawberry Aqueduct and Collection System. (Commission/Interior, 1988 DPR, 2004 DPR8)
- 6. Until it is resolved whether existing law will require that said entire 44,400 acre-feet of water remain in the Duchesne River until its confluence with the Green River, the District will re-divert above said confluence in accordance with Section 6 of the 1990 Streamflow Amendment.. (District/Interior, 1990 Streamflow Amendment, 2004 Supplement to 1988 Duchesne River Biological Opinion, 2004 DPR9)
- 7. A minimum of 25 cfs will be maintained in Rock Creek at the Forest Service/Indian reservation boundary. (District/Interior, 1965 Deferral Agreement, 2004 DPR10)

Municipal and Industrial System

- 8. Manage Jordanelle Reservoir lands for wildlife within management boundary area. (Commission/Reclamation, 1988 DPR, 2004 DPR16)
- 9. Fishery mitigation will consist of maintenance of minimum flows of 125 cfs between Jordanelle Dam and Deer Creek Reservoir, 100 cfs between Deer Creek Dam and Olmsted Diversion, and 25 cfs during the winter from Olmsted Diversion to Utah Lake. (District/Interior/Reclamation, 1987 M&I FS-FEIS/1988 DPR/CUPCA, 2004 DPR19)
- 10. Post-project fishery studies on the Brown Trout will be conducted below Deer Creek Dam. The studies will examine the impacts of summer habitat loss, winter habitat gain, and assess the feasibility of habitat improvement through streamflow modification. (Commission/District, 1987 M&I FS-FEIS, 1988 DPR, 2004 DPR20)
- 11. Angler access to 10 miles of Provo River downstream of Jordanelle Dam to Deer Creek Reservoir. (Commission, 1988 DPR/1998 PRRP ROD, 2004 DPR21)

- 12. Replacement of Middle Provo River Diversion Dams. (Commission, 1988 DPR/1998 PRRP ROD, 2004 DPR22)
- 13. Deer Mortality reduction on highways around Jordanelle Reservoir. (Commission, 1988 DPR/1989 M&I FWCA/1997 FWS Memo, 2004 DPR23)

Diamond Fork System

- 14. A monitoring program would be established to ensure satisfactory water quality in Diamond Fork. The water quality monitoring program committed to in the 1990 final supplement (Reclamation 1990) and Interior 1995 Diamond Fork Pipeline ROD will be continued. (District, DF 1999 ROD, 2004 DPR26)
- 15. Stream channel rehabilitation work should be accomplished on lower Diamond Fork to ensure that appropriate benefits [attributable to the Diamond Fork Pipeline] are achieved and maintained. (Commission, 1988 DPR/DF 1990 ROD, 2004 DPR28)
- 16. An interagency team consisting of representatives from the joint-lead agencies (District, Interior, and Mitigation Commission), FS, FWS, and Utah Division of Wildlife Resources should be organized to determine flow needs within Sixth Water and Diamond Fork creeks and the Spanish Fork River to benefit aquatic, terrestrial, and riparian resources. (Commission, DF 1999 ROD, 2004 DPR31)
- 17. Water quality monitoring will continue downstream of Strawberry Tunnel, Sixth Water Aqueduct, and the Diamond Fork Tunnel Outlet to determine potential DO concentration impacts and how far downstream low DO levels are found. (Commission/District, DF 1999 ROD, 2004 DPR32)
- 18. If low DO levels are found downstream from tunnel outlets, baffles or oxygen aerators should be installed to bring DO concentrations up to levels that are not detrimental to fish and other aquatic resources. (District/Commission, DF 1999 ROD, 2004 DPR33)
- 19. Conduct a water quality and temperature-monitoring program throughout the Diamond Fork System. (Commission/District, DF 1999 ROD, 2004 DPR34)
- 20. Acquire public access to the lower five miles of Diamond Fork Creek. (Commission, 1988 DPR, 2004 DPR35)
- 21. Provide Diamond Fork recreation facilities compatible with the conservation of natural resources. (Commission, DF 1999 ROD, 2004 DPR36)
- 22. The joint-lead agencies will plan for a long-term monitoring program to determine the effects on riparian vegetation including species composition, riparian corridor width, and vegetation density; spawning gravels; and leatherside chub habitat and populations from flow modifications within the impact area of influence. (Commission, DF 1999 ROD, 2004 DPR37)
- 23. The joint-lead agencies will continue to coordinate with the FWS regarding results of the monitoring program and recommendations to mitigate any documented impacts on Leatherside chub habitat. (Commission, DF 1999 ROD, 2004 DPR38)
- 24. The joint-lead agencies will mitigate any losses or detrimental impacts on wetland and riparian habitats that cannot be restored. (Commission, DF 1999 ROD, 2004 DPR39)
- 25. The Mitigation Commission will continue to consult with Interior, District, FWS, FS, Utah Division of Wildlife Resources, and others to plan and implement restoration of Sixth Water and Diamond Fork creeks, and to the extent possible, the Spanish Fork River. (Commission, DF 1999 ROD, 2004 DPR40)

- 26. Monitoring during the construction period prior to project operation will continue to establish a credible baseline for Ute ladies'-tresses. (District/Commission, DF 1999 ROD, 2004 DPR41a)
- 27. Data collection following project implementation will include measurements of actual stream elevations relative to Ute ladies'-tresses orchid colony locations. If there are significant discrepancies, the model should be modified and a new impact assessment completed. Additionally, the joint-lead agencies should perform aerial mapping at a resolution sufficient to record stream channel geomorphology, vegetation community, and orchid colony locations in several-year intervals to help better understand changes and evaluate their significance in relation to restoration and conservation goals. (Commission, DF 1999 ROD, 2004 DPR41b)
- 28. Changes in vegetative communities in occupied or potentially suitable orchid habitat will be measured along Diamond Fork Creek and Spanish Fork Canyon. (Commission, DF 1999 ROD, 2004 DPR41c)
- 29. The natural variation in Ute ladies'-tresses orchid demography, population vigor and habitat will be characterized under baseline conditions and under actual operations. (Commission, DF 1999 ROD, 2004 DPR41d)
- 30. The Three Forks colony will be monitored to better understand the process of loss of viability and eventual extirpation of colonies. Monitoring should focus on the rate of loss, identifying which parameters are best to measure to determine if loss is occurring. (Commission, DF 1999 ROD, 2004 DPR41e)
- 31. Conservation measures in addition to altering flows and rescue/transplant should be considered, such as vegetation manipulation, providing supplemental water to colonies, and mechanical reconfiguration of portions of the stream channel or floodplain surfaces, if monitoring data show streamflow hydrology is adversely affecting the Ute ladies'-tresses orchid population. (Commission, DF 1999 ROD, 2004 DPR41f)
- 32. If pollination is determined to be a limiting factor to long-term orchid viability and successful colonization of new habitats, then the joint-lead agencies will consider actions to enhance pollinator habitat or numbers as appropriate. (Commission, DF 1999 ROD, 2004 DPR41g)
- 33. A methodology should be developed that will monitor changes in Ute ladies'-tresses orchid habitat quality, and the methodology should be used to establish habitat quality parameters of the population. (Commission, DF 1999 ROD, 2004 DPR41h)
- 34. Population viability parameters and "red-flag" conditions should be established for the Ute ladies'-tresses orchid habitat quality parameters. (Commission, DF 1999 ROD, 2004 DPR41i)
- 35. The accuracy of the predicted effects analysis of the Ute ladies'-tresses orchid should be measured. (Commission, DF 1999 ROD, 2004 DPR41j)
- 36. Timing for performing the most accurate canyon-wide Ute ladies'-tresses orchid counts should be evaluated. (Commission, DF 1999 ROD, 2004 DPR41k)
- 37. The relationship between river hydrology, depth to soil water, soil moisture, soil characteristics and Ute ladies'-tresses orchid colonies should be correlated. (Commission, DF 1999 ROD, 2004 DPR411)
- 38. The joint-lead agencies, in cooperation with the State of Utah and the FWS, will work toward establishment of a refugium in Red Butte Reservoir for June sucker. (District, DF 1999 ROD, 2004 DPR44)

39. Any future development of the Bonneville Unit of CUP will be contingent on the Recovery Implementation Program making "sufficient progress" towards recovery of June sucker. (District/Interior/Commission/FWS, DF 1999 ROD, 2004 DPR45)

Wasatch County Water Efficiency Project and Daniel Replacement Project

- 40. The Mitigation Commission will be signatory to the Conservation Agreements for Colorado River and Bonneville Cutthroat trout and as such will work to implement suitable mitigation for the impact on naturally re-producing cutthroat trout in upper Daniels Creek, within the Provo River drainage if possible. (Commission, 1997 WCWEP-DRP FEIS & ROD/CUPCA, 2004 DPR53)
- 41. Areas outside the impact area but within Heber Valley that contain populations of leatherside chub that would benefit from habitat enhancement would be enhanced and protected in accordance with an agreement to be finalized with the U.S. Fish and Wildlife Service and Utah Division of Wildlife Resources. (Commission, 1997 WCWEP-DRP FEIS & ROD, 2004 DPR55)
- 42. A [wetlands] monitoring plan will be established to evaluate the success of mitigation measures. Such mitigation measures will be modified as needed to ensure successful mitigation. (District/Commission, 1997 WCWEP-DRP FEIS & ROD, 2004 DPR56)

Provo River Restoration Project

- 43. Develop a comprehensive monitoring and reporting program in cooperation with the U.S. Army Corps of Engineers, Utah Division of Wildlife Resources, FWS, recreation groups, and county officials to evaluate and provide information and management guidance on the following: success of revegetation and erosion control measures; control of noxious weeds and undesirable plants; aquatic and terrestrial habitat mitigation; aquatic and terrestrial species responses to the project; and threatened, endangered, and candidate species status and trends. (Commission, CUPCA, 2004 DPR58)
- 44. The restoration project will be carried out in adherence to the numerous Standard Operating Procedures (SOPs) described in the FEIS and ROD's. (Commission, 1998 PRRP ROD, 2004 DPR59)
- 45. Designs for fish passage facilities will be incorporated into plans for all diversion structures that are modified by the Project. (Commission, 1998 PRRP ROD, 2004 DPR61)
- 46. In order to avoid the likelihood of adverse impacts on Ute ladies'-tresses orchid, several actions identified in the Commission's 1998 PRRP ROD will be followed. (Commission, 1998 PRRP ROD, 2004 DPR62)
- 47. In order to avoid, reduce and mitigate potential impacts of the PRRP on spotted frog, several actions identified in the Commission's 1998 PRRP ROD would be incorporated. (Commission, 1998 PRRP ROD, 2004 DPR63-63g)

Uinta Basin Replacement Project

- 48. In-stream flow commitments by Moon Lake Water Users Association, District, and Interior in the Lake Fork River between Moon Lake Reservoir and the Big Sand Wash Feeder Diversion Structure will be maintained. Providing these in-stream flows is considered project mitigation for the impacts created by the Moon Lake Project. (District/Commission, 2001 UBRP Final EA and FONSI, 2004 DPR64)
- 49. In-stream flow commitments by Moon Lake Water Users Association, District, and Interior in the Yellowstone River between Yellowstone Feeder Canal Diversion and the Big Sand Wash Feeder Diversion Structure will be maintained. Providing these in-stream flows is considered project mitigation for the impacts created by the Moon Lake Project. (District, 2001 UBRP Final EA and FONSI, 2004 DPR65)

- 50. Four existing high mountain lakes (Brown Duck, Island, Kidney, and Clements lakes) in the upper Lake Fork River watershed and nine existing high mountain lakes in the upper Yellowstone River watershed (Bluebell, Drift, Five Point, Superior, Farmers, East Timothy, White Miller, Deer, and Water Lilly lakes) that are located in the High Uinta Wilderness will be stabilized as a fish and wildlife/wilderness enhancement measure. (Commission, 2001 UBRP Final EA and FONSI, 2004 DPR69 DPR69m)
- 51. Mitigate for impacts to wetlands associated with the UBRP Project. (Commission, 2001 UBRP Final EA and FONSI, 2004 DPR70)
- 52. Interior and the District will participate in carrying out the reasonable and prudent alternative identified by the U.S. Fish and Wildlife Service in their 1998 Duchesne River Basin Final Biological Opinion [as amended] for the four listed Colorado River fish species. (Interior/District/Commission, 2001 UBRP Final EA and FONSI, 2004 DPR73)

Utah Lake System

- 53. The District will comply with the State of Utah's water conservation goals of reducing per capita water use within the District's Bonneville Unit service area by 12.5 percent by year 2020 and by 25 percent by year 2050. (District, ULS Repayment Contract/Petitions & 2004 ULS FEIS, 2004 DPR76)
- 54. Beginning in 2005, the District will prepare an annual report for the Utah Division of Water Resources and Interior on the average annual per capita water use within the District's service area by each of the District's petitioners of ULS water. (District, ULS Repayment Contract/Petitions & 2004 ULS FEIS, 2004 DPR77)
- 55. The District, working with Interior, and owners/operators of wastewater treatment plants, shall by the year 2033 recycle 18,000 acre-feet of return flows from the Bonneville Unit Project Water and shall continue to maintain recycling the 18,000 acre-feet through water year 2050; and demonstrate its progress from 2016 through 2030. (District/Interior, ULS Repayment Contract & 2004 ULS FEIS, 2004 DPR78, DPR79)
- 56. Provide 12,165 acre-feet of water in Jordanelle and Deer Creek reservoirs to be used for June sucker spawning and rearing flows in the Provo River. (District/Interior, 2004 ULS FEIS, 2004 DPR80)
- 57. The Mitigation Commission and the District will continue to acquire water to provide flows in the lower Provo River to meet the 75 cfs target flow. (Commission/District, 2004 ULS FEIS, 2004 DPR81)
- 58. Provide 3,300 acre-feet of water toward the 75 cfs target flow in the lower Provo River. (Commission/District, 2004 ULS FEIS, 2004 DPR82)
- 59. An annual average of 16,000 acre-feet of Bonneville Unit water would be delivered to the lower Provo River through the Spanish Fork-Provo Reservoir Canal Pipeline, when water is needed in Utah Lake for exchange to Jordanelle Reservoir, and when the lower Provo River is below the 75 cfs target flow. (Commission/District, 2004 ULS FEIS, 2004 DPR83)
- 60. An annual average of 12,037 acre-feet of water would be delivered from Strawberry Reservoir through the Mapleton-Springville Lateral Pipeline to Hobble Creek to Utah Lake, of which 4,000 acre-feet will be available annually for June sucker spawning and rearing in Hobble Creek. (Interior/District, 2004 ULS FEIS, 2004 DPR84)
- 61. The Mitigation Commission will provide 10 acres of the 85 acre Mona Springs Wetland Unit which was acquired for protection of the wetlands complex for mitigation of 1.03 acres of non-jurisdictional permanent wetland loss and 0.27 acres of temporary wetland impacts. (Commission, 2004 ULS FEIS, 2004 DPR85)

- 62. The District is fully committed to participating with the Utah Division of Water Quality in the state's Total Maximum Daily Load (TMDL) study and has joined the Stakeholders Advisory Committee established by the State to guide the TMDL study. (District, 2004 ULS FEIS, 2004 DPR86)
- 63. The Joint-Lead Agencies, in cooperation with the June Sucker Recovery Implementation Program (JSRIP) and U.S. Fish and Wildlife Service (FWS), have initiated a study to determine the feasibility of providing fish passage or removing the Fort Field Diversion Dam on the lower Provo River for June sucker spawning and rearing. (Commission, 2004 ULS FEIS, 2004 DPR87)
- 64. A Ute ladies'-tresses orchid monitoring program should be carried forward for a number of years (to be determined jointly by the District, Mitigation Commission and FWS) similar to the pre-operation study in Diamond Fork. If the changes to the Ute ladies'-tresses orchid population in Spanish Fork Canyon exceed the variation expected from pre-operation analysis and the critical values established, management guidelines presented in the 1999 Diamond Fork Biological Opinion may be implemented to compensate for impacts. (District/Commission, 2004 ULS FEIS, 2004 DPR88)
- 65. If post-operation monitoring results in measured parameters exceeding pre-set critical values for Ute ladies'-tresses orchid populations in Spanish Fork Canyon, the Diamond Fork System operation has the flexibility to supplement flows in the Spanish Fork River. Other measures, such as a rescue/transplant program, could be initiated. (Commission, 2004 ULS FEIS, 2004 DPR89)
- 66. To offset potential impacts on leatherside chub, the Joint-Lead Agencies will support the Utah Division of Wildlife Resources in evaluating population and habitat status, or determining threats and/or identifying conservation actions that could protect and where appropriate enhance leatherside chub habitat. (Commission, 2004 ULS FEIS, 2004 DPR90)
- 67. The District and Interior will re-consult with the Native American Tribes if there are significant changes in ULS Proposed Action facility locations. (Interior, 2004 ULS FEIS, 2004 DPR91)
- 68. Appropriate Best Management Practices (BMPs) must be incorporated to minimize the erosion-sediment load to any adjacent waters during project activities. Appropriate water quality parameters of adjacent waters should be monitored to determine effectiveness of BMPs. (District/Commission, ULS 401 Water Quality Certification, 2004 DPR92)