# **BEIPC Coeur d'Alene Basin Calendar Year 2017 Work Plan**

#### INTRODUCTION

This plan covers proposed environmental cleanup and improvement activities in the Coeur d'Alene Basin scheduled for CY 2017 by the Basin Environmental Improvement Project Commission (BEIPC) and coordinating agencies in accordance with their responsibilities as stated in the Memorandum of Agreement (dated August 2002). Actions noted in the plan are intended to implement the goals and objectives of the BEIPC's 2017-2021 Five Year Work Plan. This plan has been prepared by the Executive Director working with the coordinating agencies with review, input and approval by the Technical Leadership Group (TLG) and review and input from the Citizen Coordinating Council (CCC). The work plan is organized as follows:

Part 1 – Environmental cleanup work performed through the federal Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) by the Environmental Protection Agency (EPA) and State of Idaho through the Idaho Department of Environmental Quality (IDEQ) or work performed by the Coeur d' Alene Work Trust (Trust) and Potentially Responsible Parties (PRP).

Part 2 - Other Activities and Responsibilities

Part 1 includes work to implement the Record of Decision (ROD) for Operable Unit 3 (OU-3) and the Upper Basin ROD Amendment (RODA) for OU-2 and 3.

Part 2 includes work and responsibilities concerning management of Coeur d'Alene Lake by the CDA Tribe and State of Idaho, restoration of natural resources by the Natural Resource Trustees and work the BEIPC has assumed based on recommendations from the National Academy of Sciences (NAS) Study and requests from citizens and communities of the Basin.

The five-year plan outlines activities and work proposed to be implemented over the next five years; however, it does not sequence these activities. This one-year plan establishes and maintains the sequencing of activities that will be needed to complete the activities and work approved in the five-year plan. It may not address all work items noted in the five-year plan because some will not be initiated until later years.

### PART 1 – ENVIRONMENTAL CLEANUP WORK

For Part 1, the scope of the proposed work corresponds to the source and level of funding anticipated for CY 2017 and work anticipated to be performed by the responsible parties. The proposal includes the following work:

- Human Health Issues including Residential and Community Property and Private Water Supply Remediation, Basin Property Remediation Program (BPRP); Mine and Mill Site Characterization; Paved Road Remediation Program; Remedy Protection Program; Blood Lead Screening in Children; Recreation Use Activities; and Fish Tissue Sampling.
- Repository Development and Management

- Remedial actions in the Upper Basin including source control actions, water treatment, and related human health activities provided for in the Upper Basin RODA.
- Remedial actions and/or Pilot Projects in the Lower Basin.
- Basin Environmental Monitoring

# **1.1 HUMAN HEALTH ISSUES**

Remediation of human health exposures is a remedial action priority as defined in the OU-3 ROD. It includes maintaining the Institutional Controls Program (ICP) managed by the Panhandle Health District (PHD) and conducting cleanup in residential, community and recreational areas in the Upper and Lower Basin and the Paved Road Remediation Program. The RODA addresses source control remedies, water treatment remedies, ecological cleanup projects, and related human health activities and the Remedy Protection Program.

### 1.1.1 Residential and Commercial Property Remediation

During 2016, IDEQ and EPA worked to transition the sampling portion of the Basin Property Remediation Program (BPRP) to the Coeur d'Alene Work Trust (Trust). In May of this year, the sampling, plot plans and documentation were transitioned to the Trust. In 2016, the Trust's BPRP managed program remediated approximately 76 properties. This resulted in approximately 1.1 million square feet being remediated. 59 Properties were also sampled during the 2016 season, resulting in approximately 1,820 samples and 35 water samples collected and tested.

In 2017, IDEQ will continue an oversight and coordination role initiated in 2015. IDEQ staff worked to help the Trust transition into full management of the remediation side and will continue to be instrumental in transition of the sampling and documentation program.

The goal for 2017 is to complete at least 1,000,000 square feet of remediation on 75 properties. The program will sample 80 to 100 properties that qualify for remediation.

In 2017, IDEQ will continue to encourage property owner hold outs to have their properties sampled and remediated (if necessary) before the program winds down. This would allow completion of most properties before the BPRP goes into a "trickle" mode.

### 1.1.2 Mine and Mill Site Characterization

The purpose of this task is to obtain site-specific information to identify mine and mill sites that might pose a threat to human health, prioritize sites that are in close proximity to residential properties and may require remediation to address human health exposures, and ensure that completed human health remedies are not re-contaminated by migration of contaminants from mine and mill sites.

Since more than 1,000 mining-impacted sites are catalogued for the Bunker Hill Superfund Site (BHSS), sites that might pose a threat to human health were identified using one of the following categories:

• Site is located within 200 feet of a residence.

- Site is located within 1,000 feet of a residence.
- Site intersects a road and/or stream.
- Site is up-gradient of a residential area.

To perform characterization, the *Sampling Analysis Plan/Quality Assurance Project Plan* (SAP/QAPP) *for Upper CDA Basin Mine and Mill Sites for Characterization of Human Health Risks* was prepared to direct the following activities: historic desktop research, access agreements, site visits to determine potential human health concerns, and sampling (if necessary).

By fall 2016, site visits under this SAP/QAPP will be complete and include: 75 sites in the Upper Basin (OU-3) and 22 sites in the Box (OU-1 and OU-2). These sites were identified as needing a visit based on desktop research. Samples were collected at some of the sites based on needs determined during the site visit.

During 2017, information and laboratory data compiled for this characterization will be used to prioritize sites for further action to address human health risks. The purpose of prioritization is to assist with project sequencing as EPA and IDEQ determine the next steps for each site. Next steps may include further characterization, remedial action, referral to other programs, or categorization as a current low priority for human health. Although some sites will be categorized as a low priority for human health based on the observations at the time of the site visit, the status may change in the future based on changes in site use (e.g., new residential buildings, new recreational uses, etc.). Human health concerns may be re-evaluated in the future based on these changes.

Some sites were identified as high priority human health concerns immediately following receipt of laboratory data and have already been referred to the appropriate Bunker Hill programs or other agencies.

### 1.1.3 Paved Roadway Surface Remediation Program

The BEIPC, EPA and IDEQ developed a Roadway Surface Remediation Strategy in 2012 in recognition of some road damage caused by heavy truck traffic during remediation work and potential ongoing risk posed by deterioration of paved roads in remediated areas (593 road segments). The purpose of the program is to address the deterioration of paved road surfaces that are underlain by contamination. Work is intended to ensure road surfaces continue to serve as barriers that reduce or eliminate exposures. The local road jurisdictions are responsible for implementing the program and continuing operations and maintenance of the paved road segments as barriers.

In 2013 through 2016, 370 roads segments in the Box and the Basin were reconstructed or repaired with 111 segments completed in 2016. 50 segments approved for work in Kellogg and Mullan for 2016 were not completed because of significant delays due to complications with existing infrastructure and ground conditions which affected the water and sewer installations that were occurring coincidental to road work. Kellogg's and Mullan's 2016 programs will be completed in 2017 along with their 2017 work.

In addition to completing the Kellogg and Mullan 2016 programs in 2017, the Paved Roads Program will address work on 87 roads segments in the Box and 49 segments in the Basin in 2017. Many of these roads projects continue to be done in concert with sewer and water projects funded through bond elections and USDA Rural development Grants.

### **1.1.4 Remedy Protection Projects**

Remedy Protection is a high priority in the Bunker Hill Superfund Cleanup Implementation Plan (SCIP). The objective of this work is to protect the installed human health related remedy from recontamination and scouring caused by heavy precipitation and tributary flooding. All Remedy Protection projects are now complete in the Box. In 2017, work on projects in the Upper Basin portion of OU-3 noted in the RODA will continue with construction work on the upper portion of Mill Creek in Mullan, Printers Creek in Wallace, Rosebud Creek in Osburn, and Valley View Road in Hunt Gulch near Kingston. Construction in 2017 will include Blackcloud Creek 2.5 miles up the Ninemile drainage from Wallace if property owner access is granted. 2017 work will also include design work on Tiger Creek in Mullan if the primary property owner grants access for Remedy Protection work which will protect the neighborhood above Drager Field.

Preparation of an Explanation of Significant Differences (ESD) or other decision document will be completed and signed by EPA in 2017, finalizing the remedy selection decision for Valley View Road in Hunt Gulch.

# 1.1.5 Blood Lead Screening in Children

The Panhandle Health District (PHD) has been screening children for elevated blood lead levels in the CDA Basin since 1996 as a public health service through the Lead Health Intervention Program (LHIP). The purpose of the screening is to identify children with elevated blood lead levels and provide follow-up from a public health professional to identify ways to reduce lead exposures. The screening program also provides data to assess the effectiveness of the Basin cleanup efforts. The cleanup action decisions are not based on annual blood lead testing results. Rather, the goal is to prevent lead exposures that could result in elevated blood lead levels.

In 2012 the Centers for Disease Control (CDC) established a new threshold value for blood lead levels in young children. According to CDC's fact sheet, "This new level is based on the population of children aged 1-5 years in the U.S. who are in the top 2.5% of children when tested for lead in their blood. Currently, that is 5 micrograms per deciliter of lead in blood. Previously, CDC's blood lead level of concern was 10 micrograms per deciliter. In response to this change the PHD has used the 5 micrograms per deciliter as the trigger for follow up since 2012.

Currently, LHIP tests children and prenatal women living within the Basin on a year round basis. Children living outside the BHSS boundaries who recreate in the CDA Basin are also eligible for free screening by scheduling an appointment with the Kellogg PHD office. The annual summer screening will be conducted again in 2017 and will offer a \$30 incentive for each qualifying child between the ages of 6 months to 6 years of age. Screening in 2016 was conducted at the Shoshone Medical Center (SMC). The PHD screened 106 individuals residing in the Basin during the annual campaign, with 81 of those being between the ages of 6 months to 6 years, 19 over 6 years of age, and 6 prenatal women. In addition, PHD screened 114 children between 6

months and 6 years, 19 individuals over 6 years of age, and 1 prenatal woman in the Box portion of the site.

### **1.1.6 Recreation Use Activities**

In early 2016, EPA, IDEQ, PHD, and the Trust (collectively referred to as the Recreation Sites Team) began developing a strategy to address and manage human health risks from exposure to lead and other metals that can occur during recreational activities throughout the Upper and Lower Coeur d'Alene Basin. A document summarizing the proposed strategy (EPA, IDEQ, PHD and the Trust, 2016) has been prepared by the Recreation Sites Team and was issued in September 2016 for public and stakeholder comments and suggestions. The strategy document seeks input on the following:

- Priority recreational sites, activities, and/or concerns
- Needs for maintained recreation areas to replace highly contaminated areas
- Actions to add to the risk management "toolbox"
- Locations to apply certain actions or ideas for pilot projects
- Recommendations of priority sites and/or concerns to provide to other stakeholders who own or manage recreational properties.

Community outreach and education is an important way to help people manage health risks while recreating in the Basin. A robust outreach and education program has been in place for years and will continue to be implemented and expanded as part of implementing this strategy.

The following tasks are planned for 2017: 1) review of stakeholder comments and additional data gathering, 2) development of an Implementation Plan for actions at recreation sites, and 3) begin pilot projects or initial actions during the summer of 2017.

The CDA Tribe joined the Recreation Sites Team during development of the implementation plan and will continue to be involved during future planning and implementation.

### Reference:

2016 CDA Basin Recreational Sites Strategy, Bunker Hill Mining and Metallurgical Complex Superfund Site, September 2016; EPA, IDEQ, PHD, and Trust.

### 1.1.7 Fish Tissue Sampling

The selected remedy in the OU-3 ROD includes educational resources and health advisories to manage the potential for metals exposure through consumption of fish. During the spring and summer of 2016, fish tissue samples were collected basin-wide from the South Fork Coeur d'Alene River, Coeur d'Alene River and Chain Lakes, Coeur d'Alene Lake, and Spokane River in Idaho in accordance with the Idaho Fish Consumption Advisory Project (IFCAP) protocol. Sample collection was performed by Idaho Department of Fish and Game, IDEQ, and the Coeur d'Alene Tribe. Fish species collected were selected based on fish present in each water body, fish harvested for consumption, and fish life histories. Laboratory analytical results are expected in 2017.

During 2017, IFCAP will prepare a Health Consultation Report in coordination with the Tribe. Health advisories for fish consumption are issued by the Idaho Department of Health and Welfare through IFCAP and the Tribe. The current fish consumption guidelines published for Coeur d'Alene Lake and statewide for bass will be modified or expanded as needed. The goal of IFCAP and the Tribe is to protect the public from adverse health risks associated with consuming contaminated fish.

For more information on the IFCAP protocol visit: http://healthandwelfare.idaho.gov/Health/EnvironmentalHealth/FishAdvisories/tabid/180/ default.aspx

### **1.2 REPOSITORY DEVELOPMENT AND MANAGEMENT**

### Background

There are currently three operational repositories within the OU-3 area, Big Creek Repository (BCR), East Mission Flats Repository (EMFR) and Lower Burke Canyon Repository (LBCR). The Page Repository provides for disposal of remedial and ICP wastes in the Box. In 2015, disposal of relatively inert asphalt concrete and road base in the aforementioned repositories was minimized by developing two Limited Use Repositories (LURs) in East Osburn and Government Gulch. In addition, a community fill project (CFP) was developed adjacent to the Government Gulch LUR to accommodate ICP wastes generated by the City of Kellogg's infrastructure projects that are being constructed coincidental to its paved roads program. These LURs and the CFP will continue to be operational in 2017 and 2018.

Repository development and management is an ongoing process that must meet the demand for disposal of historic mining related contamination for the Basin environmental and human health related cleanup program. This includes the BPRP, other cleanup actions performed by IDEQ, EPA, and the Trust. It also includes waste generated by private parties and local government agencies under the ICP. Coordinated operation and expansion of existing repositories or the construction of new repositories provides for a continued and cost effective cleanup and control of contamination.

The siting, development and use of LURs will continue to be a major task for the agencies and the Trust while the Basin Paved Roads Program generates over 50,000 cubic yards (cy) of asphalt concrete and base materials every year for the next one to two years. The Government Gulch LUR will continue to provide for disposal of more than 120,000 cy in 2016 - 2018. IDEQ and the Trust are currently scoping out a new site for LURs in the Upper Basin to be utilized in 2017 and 2018 to accommodate approximately 50,000 – 100,000 cy of roads program wastes.

BCR is located at the mouth of Big Creek Canyon and primarily serves the Upper Basin. The BCR has received waste since 2002. The total designed waste disposal capacity is approximately 600,000 cy. The BCR is estimated to reach the total design capacity of 600,000 cy in 2017. The Trust is currently reviewing the BCR waste disposal plan and existing footprint in order to increase the original volume estimate above 600,000 cy. The Trust is evaluating the possible expansion of BCR to fill up an area on the east side of the repository which could allow for an estimated additional 125,000 cy. Additional capacity near BCR was identified several years ago just southwest of the original site on the west side of Big Creek. This location is

identified as the Big Creek Repository Annex (BCRA). During 2014 the development of the BCRA included the development of the repository design, relocation of utilities at the site and construction of an access road bridge over Big Creek. The work was completed in the spring of 2015 and BCRA has been receiving waste. The BCRA uses the existing BCR access, decontamination, and ICP staging facilities as well as the current Operator. The initial design waste capacity of the BCRA is approximately 200,000 cy. Development of the BCRA was completed in 2015 and coarse and durable construction wastes were disposed there in 2016.

EMFR is located north of Interstate 90 off Exit 39, near Cataldo and primarily serves the Lower Basin. The EMFR has been receiving waste since 2009. The designed waste capacity is approximately 410,000 cy. At the current and estimated future waste disposal rates the EMFR is estimated to reach the design capacity in approximately 30 years.

LBCR is located in Burke Canyon on the Star Tailings Impoundment near the community of Woodland Park. Design activities by the Trust for LBCR began in late 2012 and continued through 2014. The total design waste capacity is more than one million cubic yards. Construction of the first phase of the repository by the Trust including site access roads, ICP disposal area, decontamination facilities, and employee facilities were completed in the fall 2014. Approximately 13,500 cy of wastes were received from upper and lower Basin projects in 2015. As of September 14, approximately 56,000 cy of wastes were received from upper and lower Basin projects in 2016, which has been disposed in basin repositories and LURs.

The Page Repository, which has been operating for almost 20 years, is located just west of Smelterville. Having reached its previous design capacity in 2010, Page was been expanded to dispose an additional 700,000 cy of waste. Because of policy change to use LURs to dispose of over 150,000 cy of relatively inert asphalt concrete and road base from the Box Paved Roads Program, the service life of the Page West Expansion was likely extended by 10 years, for a total life expectancy of about 45 years.

### Objectives

The Repository Work Plan focuses on the following objectives:

- (1) Box repository operations
- (2) Continued development of Box repository capacity to support remedial action projects in the near term and sustain ICP support in-perpetuity
- (3) Facilitate the disposal of inert road wastes in LURs
- (4) Operating BCR, BCRA, EMFR, and LBCR
- (5) Beginning Final closure of BCR, expected final closure in 2017
- (6) Increasing repository volume in the Upper Basin
- (7) Updating of the Waste Management Strategy (WMS) including considerations for waste reduction or consolidation.

Specific tasks to achieve these objectives are summarized below:

### **Box Repository Operations**

The estimated annual waste disposal capacity needed at the Page Repository and Government Gulch LUR for 2017 through 2020 is approximately 66,000 cy which include about 16,000 cy of ICP wastes, and 50,000 cy of Paved Roads waste. Page Repository and Government Gulch LUR operations will include but are not limited to the following tasks:

- Receipt and placement of Remedy Protection, Paved Roads and ICP wastes
- Segregation and appropriate re-use or disposal of non-soil waste such as wood and root wads, concrete, asphalt, large (greater than 6 inch) rock fragments and miscellaneous demolition debris
- Equipment decontamination, site stabilization, erosion and sediment control installation
- Surface and ground water monitoring and associated reporting.
- Waste stream management to minimize disposal and maximize re-use of high volume waste materials.

#### **Increasing Box Repository Capacity**

To accommodate the anticipated waste volume, Expansion Cell(s) #1 and #2 at Page have been founded and are accepting ICP wastes. Furthermore, the 6.5 acre area in Government Gulch has been developed to accommodate approximately 80,000 cy of road wastes generated in 2017 in the Box. The Government Gulch LUR was developed complete with a ground water interception system to prevent groundwater from contacting historic wastes from the Phosphoric Acid Plant and the Zinc Plant, and it was developed with a permanent storm water management system to service the 6.5 acres fill site.

Page expansion requires careful planning and coordination to limit construction costs while maintaining sufficient capacity. Although construction of the foundation for expansion cell #3 will not be necessary for at least 10 years, repository expansion will occur in two to three acre phases. Each phase will be initiated by constructing a foundation layer consisting of a "starter berm" from two to four foot concrete blocks, filled behind by a "mattress" layer of 1 inch plus to 12 inch minus materials. The starter berms and mattress materials have been designed to exceed geotechnical criteria for structural stability and to platform placed wastes above the 50 year flood conditions that may be realized in the West Page Swamp. Cost effective construction of the foundation layer depends on segregation of waste generated during remedial actions and re-use of appropriate material during mattress construction. If sufficient repository capacity is not available, mattress material must be purchased adding significant cost to the expansion. The pace of cost effective repository expansion could be accelerated if sufficient quantities of segregated waste are available for foundation construction.

#### **Basin Repository Operations**

Although the number of properties being remediated under BPRP is significantly dwindling, remediation of approximately 75 properties in the Lower and Upper Basin property remediation in 2017 will generate an estimated 5,000 to10,000 cy of waste material. A total Basin ICP waste

volume projections are as high as 5,000 cy per year for disposal at Basin repositories. As stated previously paved road projects in the Upper Basin could generate approximately 50,000 cy of waste for disposal in LURs. There is significant uncertainty in waste volume projections for infrastructure (ICP) waste. However, Basin repositories may have to accommodate as much as 60,000 cy from all projects in the Basin. Anticipating those needs, the Basin repository operations include but are not limited to the following tasks:

- Receipt and placement of BPRP, Remedy Protection, Paved Roads and ICP wastes
- Segregation and appropriate re-use or disposal of non-soil waste such as wood and root wads, concrete, asphalt, large (greater than 6 inch) rock fragments and miscellaneous demolition debris
- Equipment decontamination, site stabilization, erosion and sediment control installation
- Surface and ground water monitoring and associated reporting.
- Placing waste to consume all remaining capacity at BCR
- A ten year transition of total operations from BCR to the LBCR and the BCRA

# **Closure of BCR**

The BCR was estimated to reach original design capacity of 600,000 cy in 2017. As noted above the Trust is currently reviewing the original BCR design placement plan in order to increase capacity at the BCR which could allow for at least another year of operation. The Trust is also working to develop a closure plan for the BCR which provides for this expansion.

### **Increasing Upper Basin Repository Capacity**

Increasing Basin repository capacity will be needed to dispose of the waste material generated by the cleanups identified in the OU-3 ROD and the Upper Basin RODA. The Upper Basin RODA adopted a two-part approach to waste management that utilizes both the Waste Consolidation Areas (WCA) and repositories. Waste generated by remedial actions in the East Fork of Nine Mile Creek is being disposed of in the WCA developed by the Trust. In order to address the waste disposal needs for other cleanup actions, a repository siting process driven by public input identified two new repository sites to support cleanup activities in the Upper Basin. One repository is the LBCR which began receiving waste materials in 2015. Baseline site characterization data was collected at Osburn Tailings Impoundment (OTI) and a 30% design was completed in 2011. Due to a change in remedial project planning from the RODA process, and to coordinate closely with Hecla Mining Co. activities at the Star Mine Complex in Burke, the OTI design was put on hold to focus on the more immediate needs for repository capacity in Canyon Creek. During 2015 the Trust began evaluating and collecting data towards the possibility of improving and expanding the existing Silver Valley Natural Resource Trustee (SVNRT) repository in Canyon Creek. This area in combination with the existing LBCR will likely be able to handle all waste generated in Canyon Creek. Should it be determined that development of this area into a long-term repository is viable public comment will be sought at the time of the 30% conceptual design. This is expected to occur sometime in 2017.

The repository design program is a dynamic process driven by many factors, including waste stream volume estimates, priority cleanup site locations, funding availability and active mine site activities. As cleanup implementation plans are finalized and waste stream volume generation schedules are developed, repository designs, technical evaluations, and property acquisition will

proceed at the repository sites currently identified through the public planning process or new sites best located to serve the cleanup program in the 10 year planning period.

#### Waste Management Strategy Update

The WMS is a key document that guides repository siting and waste disposal or re-use. It contains the most current estimates of future waste volumes and implementation schedule forecasts within geographic areas. The WMS will be updated to incorporate additional information regarding the projected waste volumes generated by OU-2 and OU-3 remedial activity and remaining repository capacities. The revised WMS is being developed jointly by IDEQ and EPA and in coordination with the Trust, PHD and the TLG and/or Repository Project Focus Team (PFT), when appropriate.

### **1.3 ENVIRONMENTAL REMEDIATION ACTIONS**

Environmental remediation actions include work in the Upper Basin described in the RODA and work in the Lower Basin described in the OU-3 ROD.

#### **1.3.1 Upper Basin Remedies**

This work includes remediation identified for the Upper Basin which includes the South Fork Coeur d'Alene River (SFCDAR) and its tributaries above its confluence with the North Fork.

The Upper Basin RODA identified \$635 million of work in the Upper Basin including potential work at 125 mine and mill sites. The EPA SCIP identifies the priority setting process and outlook for sequencing the work over the next 10 years and the list of mine and mill sites to be addressed has been reduced to 95 through assessments activities. This document is updated on an annual basis as part of the adaptive management process to incorporate lessons learned as the work moves forward<sup>1</sup>. Additional information about the RODA and prioritization of cleanup actions including technical memos, meeting presentations, and community involvement documents are located at the following web site:

http://yosemite.epa.gov/R10/CLEANUP.NSF/sites/bh+rod+amendment

The goals of the RODA include:

- Prioritizing Upper Basin/Box source areas for cleanup to improve water quality and address risks to human health and the environment,
- Moving forward on the OU-2 Phase 2 cleanup to improve water quality in the SFCDAR
- Addressing changes in water treatment to accommodate additional contaminated water,
- Focusing on source control actions that address particulate lead which poses a risk to human health and ecological receptors, and
- Protecting remedies in community areas from tributary flooding and heavy precipitation events.

The prioritized cleanups under the RODA are expected to provide significant improvement to surface water quality and will reduce the contribution of contaminated groundwater to surface

<sup>&</sup>lt;sup>1</sup> An update including lessons learned from 2014 is currently being prepared and will be available in December or January.

water. There will also be reduced particulate lead in the CDA River and downstream areas as a result of this work. These actions in turn are expected to reduce the recontamination potential in the Lower Basin and other downstream areas and reduce risks to humans and wildlife from exposure to contaminated mine waste.

This BEIPC 2017 work plan focuses on those cleanup actions that have either already started or been planned for the coming year. The following is expected to be the focus of the work in 2017:

1. The Trust began cleanup of the Success Site and associated riparian areas in 2016. It is expected that this work will take four years to complete.

2. In 2017, the Trust will continue characterization work in the EFNM watershed, focusing on the Interstate Mill Site and Tamarack area.

3. In 2017, the Trust will continue to characterize the SVNRT repository site in Canyon Creek and work with EPA to evaluate alternative for cleanup at the site. The 30% design for the cleanup will be completed by the end of 2016. In the interim, to prevent exposure, the area has been fenced to eliminate the current unauthorized use by pedestrians and ATV's.

4. Planning and design for upgrades to the Central Treatment Plant (CTP) continue in accordance with the 2012 update of the CTP Master Plan. The CTP upgrades are necessary to treat additional influent flow from the Groundwater Collection System (GCS), improve system reliability, meet current, more stringent discharge requirements, and operate in High-Density Sludge (HDS) mode. The performance work statement for the upgrades was completed in August 2015 and was included in a request for proposals issued to the contractor pool for the design-build-operate contract. Proposals are being reviewed by the Corps of Engineers and the award will be issued after reviews are completed. These upgrades have been necessary for some time to provide dependable and more efficient water treatment for the Bunker Hill Mine water, and the and groundwater to be collected from the GCS near the Central Impoundment Area (CIA). The Bunker Hill Mine water has been and continues to be treated at the CTP. The upgraded CTP will be designed to treat influent flows at rates that nearly triple the current rate of base flows from the Bunker Hill Mine. Excess flow from the Bunker Hill Mine will be diverted to in-mine storage. The plant is currently not capable of meeting discharge standards when being operated in HDS mode but the upgraded plant when operating in HDS mode will result in much less sludge production, more efficient operating conditions, and the need for fewer sludge ponds being constructed over time. Following treatment, the effluent (combined mine water and extracted groundwater) will be discharged from the CTP to the SFCDAR in compliance with current water quality standards. On an average basis, the GCS is expected to result in significant removal of dissolved metals, the most notable of which is zinc that is currently being discharged to the SFCDAR from groundwater interaction, as discussed in the following paragraph.

5. The conceptual design for the GCS was completed in 2014 and the final design and construction of the remedy will be integrated with the CTP upgrades under the same design-build-operate contract. The proof-of-concept design includes an 8,000-linear feet cutoff wall between the CIA and Interstate 90 (I-90), a series of extraction wells, and a conveyance pipeline to the CTP that extends along the north side and over the top of the CIA. Groundwater flow and strength (concentration of metals) predicted by the mathematical model represents the range from base flow/strength (late summer/winter) through maximum flow/strength (spring runoff).

By considering seasonal and annual variability and groundwater monitoring well data from south of I-90, the estimated metals loading to the gaining reach of the SFCDAR ranges from 150 to 450 pounds per day (lbs/day). A significant unknown is the potential source of metals in tailings under and north of I-90 that will not be captured by the groundwater collection system. However, the optimistic target is to capture up to 90% of the predicted load to this gaining reach from south of I-90.

## 1.3.2 Lower Basin Remedies

Work described in the OU-3 Interim ROD for the Lower Basin includes actions for wetlands and lateral lakes, river banks, splay areas and river bed dredging. Objectives of remediation in the Lower Basin focus on improving water quality and reducing particulate lead and other heavy metals in the Basin ecosystem.

EPA continued to invest in data gathering efforts in 2016 to address key data gaps pertaining to the relationship between Basin ecology and ongoing effects and movement of historic mining related contamination. This is a multi-year effort, described in the Enhanced Conceptual Site Model (ECSM, EPA release 2010), focused on filling critical data gaps and computational model development to better understand and predict contaminated sediment transport in the Lower Basin. Such modeling and data collection will further enhance the Conceptual Site Model (working hypothesis) for contaminated sediment locations, concentrations and transport, and will support the selection of pilot projects, future cleanup decision making, project prioritization, and future decision documents. The results of these data gathering efforts continue to be shared with the subgroups of the BEIPC (e.g. Lower Basin PFT, TLG and CCC), interested stakeholders, and citizen groups after they are compiled and synthesized. In 2015, the 2-dimensional hydraulic model calibration was completed and the 2-dimensional sediment transport model is scheduled for completion in the first half of 2017.

In 2017, EPA staff will continue to assess key factors associated with selection and implementation of potential pilot projects at several sites in the Lower Basin and will be determining viability of those sites, in coordination with the Restoration Partnership. The Lower Basin PFT will continue to assist the TLG and provide updates on new technologies, pilot projects for consideration, and project ideas in order to implement the ROD for OU-3 where remedial actions are identified and where the potential for recontamination is low. The Lower Basin PFT will continue to pursue the identification of both pilot projects and larger scale projects in the Lower Basin that could benefit from remedial action and restoration work and are of low risk of recontamination. This will be accomplished while continued cleanup priorities focus on human health and addressing source stabilization in the Upper Basin and decreasing recontamination potential in the near term.

Documents that will be generated as a result of the Lower Basin work include the model development report, data reports and other technical memorandums that are generated as more is learned about contaminated sediment transport and source areas in the Lower Basin. These documents will be available to the subgroups of the BEIPC (e.g. Lower Basin PFT, TLG and CCC), interested stakeholders and citizen groups.

The actions being planned and undertaken in the Upper Basin discussed in earlier sections are expected to improve water quality and reduce the movement of contaminated sediments downstream into the Lower Basin. Thus, the Upper Basin cleanup is expected to complement

cleanup activities in the Lower Basin by reducing the loading of contaminated materials to the watershed and reducing the potential for recontamination from the Upper Basin to the Lower Basin.

In 2016, EPA began work on development of a strategic plan that will further build on the work that has been produced or is already underway related to the Lower Basin. The plan will identify high level goals for work in the Lower Basin, identify work to be initiated over the next 3-5 years, outline a process for developing a decision matrix or tool for prioritizing projects and remedial actions that may be completed over the next 20-30 years, and detail a stakeholder and community engagement process. During plan development, EPA will seek input from the broader community to ensure that community values are incorporated into the plan. EPA will also seek input from the Lower Basin PFT, CCC and other stakeholders on the plan before finalizing it. EPA anticipates the strategic planning development process to be completed by the end of 2017. EPA is not selecting new remedies for the Lower Basin through this strategic planning process, but prioritizing, evaluating, and implementing actions that have been previously selected in the decision document and pilot projects as part of its remedial investigation/feasibility study process. The 2002 ROD provides a large degree of flexibility in how EPA chooses to approach development and implementation of remedies in the Lower Basin. However, EPA may select supplemental actions, which are not explicitly identified by the ROD, and which may require additional ROD amendments or ESD.

EPA is also in the planning stages for reviewing several pilot projects in the Lower Basin including beach augmentation/modifications, river bed pilot project analysis, and floodplain soil capping and amendments. In late 2015, EPA initiated a treatability study in Lane Marsh to study the efficacy of using an incremental thin-layer capping approach for reducing exposure to waterfowl in sensitive wetland environments. This study will continue into 2017 and include collaboration with EPA's Office of Research and Development to bench-test the use of soil amendments to reduce bioavailability of toxic metals in contaminated soils and sediments. Long-term projects such as agricultural to wetland projects will also be considered for planning in 2017.

The wetland restoration project construction on property owned by the Idaho Department of Fish and Game near Robinson Creek was completed in early 2016. Restoration activities and maintenance will be ongoing to ensure vegetation gets established. The property acquisition and restoration work was only made possible through the collaboration of multiple entities including EPA, Idaho Fish and Game, Idaho Transportation Department, the Restoration Partnership, and AVISTA. EPA provided Superfund dollars, through IDEQ, to construct the wetlands in return for the wetland mitigation credits required for the expansion of the Page Repository. On the ground work includes but is not limited to; 1) the development of a series of wetland and island features, 2) planting of native vegetation (e.g., water potato which is a culturally significant species to the CDA Tribe and a vital source of nutrition to Tundra Swans and other water fowl), and 3) stream alterations of Robinson Creek. The wetland restoration will create clean waterfowl habitat. This project is an excellent example of collaboration between multiple entities and it will provide valuable experience for learning how to get the most out of natural resource restoration funds.

### **1.4 BASIN ENVIRONMENTAL MONITORING**

EPA has been working over the last several years to optimize the current sampling program by reducing the overall effort while continuing to update data quality objectives to better meet both remedial action effectiveness and long term monitoring needs of the cleanup. For over ten years, EPA has implemented the Basin Environmental Monitoring Program (BEMP) to meet the following objectives:

- Assess long-term status and trends of surface water, sediment, groundwater and biological resource conditions in the Basin.
- Evaluate progress toward meeting remedial action objectives (RAOs), applicable or relevant and appropriate requirements (ARARs), and preliminary remediation goals (PRGs).
- Improve the understanding of Basin environmental processes and variability to improve the effectiveness and efficiency of remedial actions.
- Provide data for CERCLA required Five-Year Reviews of remedy performance.

Extensive data from the site has been collected, analyzed and presented in the 2015 Five Year Review. EPA has been working with an optimization team from EPA headquarters and monitoring agencies to evaluate the BEMP data and explore changes to the program that reduce redundant or outdated monitoring from phase 1 remediation work.

In 2016, EPA began implementing recommended changes from the optimization review. The recommendations will help streamline and focus monitoring efforts in the Basin. Below are the overarching recommendations from the optimization effort:

- Distinguish monitoring required to assess Remedial Action performance and efficacy versus long-term progress toward remedial goals.
- Develop monitoring objectives for all monitoring based on information needed for site management decisions and regulatory requirements.
- Define baseline datasets for each monitoring program and medium.
- Articulate assumptions and expectations about chemical quality and ecological responses to remedial efforts.
- Describe how data will be managed and analyzed.
- Identify management actions potentially resulting from the outcome of data analyses.

At the end of 2015, EPA issued a new Bunker Hill Superfund Site-wide Quality Management Plan Environmental Monitoring Program Management Plan and is currently developing a new **a** Site-wide Data Management Plan which should be completed by the end of 2016. Both of these documents incorporate the optimization team recommendations. EPA is also developing a new Bunker Hill Superfund Site-wide Environmental Monitoring Program Management Plan and plans to have the document completed in 2017. EPA is also currently developing Remedial Action (RA) effectiveness monitoring plans for cleanup efforts in East Fork Ninemile Creek and planned upgrades to the CTP.

EPA continues to make available the analytical results from site surface water, sediment, groundwater and biological resource sampling through WQX, EPA's Water Quality Exchange; human health-related data will not be included in this database. EPA no longer has regional support to make environmental monitoring data available through a web page. Site

environmental monitoring data are accessible via WQX and EPA Headquarters can assist interested stake holders in accessing the information. Stakeholders can call 800-424-9067 for support. Given the lack of regional support for data management, EPA is working with EPA Headquarters to transition to a new data management system for the site and is currently working with data management agencies on this transition.

# PART 2 – OTHER ACTIVITIES AND RESPONSIBILITIES

For Part 2, the scope of this work plan recognizes a number of work items that the BEIPC will be involved in and items of work needed to accommodate some of the recommendations of the NAS study; it also includes implementation of the Lake Management Plan by the State of Idaho and CDA Tribe and the activities of the Natural Resource Trustees (Restoration Partnership).

The plan includes the following work:

- Lake Management Activities
- Flood Control, and Infrastructure Revitalization
- Communications and Public Involvement
- Restoration Partnership

### 2.1 LAKE MANAGEMENT ACTIVITIES

The OU-3 Interim ROD did not include CDA Lake in the Selected Remedy nor is there a remedy identified in the Upper Basin RODA. The OU-3 Interim ROD anticipated that the State, Tribe, federal agencies, and local governments would implement a Lake Management Plan (LMP) outside the CERCLA (Superfund) process using separate regulatory authorities. The updated LMP was approved in 2009 and implementation has been underway. Implementation of the LMP is an adaptive management process and adjustments may be necessary as monitoring and other data are obtained and analyzed.

As referenced in Subsection 4.5.1 of the 2009 LMP, many of the agencies, governments, and other stakeholders that address water quality in CDA Lake are represented on the BEIPC, TLG or CCC. As such, these various BEIPC forums represent unique opportunities for LMP coordination and implementation which IDEQ and the Tribe intend to fully utilize. In addition, LMP staff will continue to coordinate with county representatives and Watershed Advisory Groups, as appropriate.

Objectives of the LMP (as outlined in Section 3) include the following:

- 1. Improve Scientific Understanding of Lake Conditions through Monitoring, Modeling, and Special Studies.
- 2. Establish and Strengthen Partnerships to Maximize Benefits of Actions under Existing Regulatory Frameworks.
- 3. Develop and Implement a Nutrient Reduction Action Plan.
- 4. Increase Public Awareness of Lake Conditions and Influences on Water Quality.
- 5. Establish Funding Mechanisms to Support the LMP Goal, Objectives, and Strategies.

Below are activities envisioned for implementation of the LMP in 2017. These activities are categorized under objectives 1, 3, and 4 from the LMP. Objectives 2 and 5 are intertwined throughout all objectives, and there are other crossovers between objectives. In addition to the items listed below, the Tribe, State of Idaho, EPA, and Counties will continue to meet in 2017 to discuss evaluations of the LMP effectiveness in light of on-going monitoring information, management action plan reviews, and other applicable data.

#### Increase Scientific Understanding (Objective 1):

- 1. IDEQ and the Tribe will continue joint water quality monitoring throughout Coeur d'Alene Lake for metals, nutrients, and physical parameters (see tributary monitoring under Objective 3 below). In the summer of 2017, the Tribe will also install their data logger buoy in the southern portion of the lake to collect parameters such as water temperature and dissolved oxygen at multiple depths. *\*Supports Objective 5*
- The Tribe and IDEQ will continue utilizing the ELCOM-CAEDYM and LOADEST models. These models are utilizing real-time data that is collected from Coeur d'Alene Lake including the establishment of four meteorological stations. These models will assist staff with developing the nutrient reduction action plan. Supports Objective 3
- 3. In early 2017 (January-February), LMP staff will share plans for core LMP monitoring with the TLG and CCC once a preliminary schedule is developed by IDEQ and the Tribe.
- 4. A lake trends report, *Coeur d'Alene Lake Management Program: Summary of Lake Status and Trends, 2008-2014*, was provided to BEIPC and TLG representatives in spring of 2016 (State of Lake Water Quality Update, as outlined in section 5.1 of the LMP). A QA report was provided to the TLG for transparency in data quality used to develop the report from 2012-2014 (QA for previous data had already been reported). A draft update to the trends report that includes 2015 data will be provided to the TLG in early 2017 for feedback prior to distribution to the BEIPC. \**Supports Objective 2*
- 7. Staff will continue to evaluate the Lake Trend data to look further into water year variability and relationships among measured parameters in order to help inform stakeholders on possible causative factors for observed trends.
- 8. Both the Tribe and IDEQ are collaborating with the University of Idaho EPSCoR "Managing Idaho Landscapes for Ecosystem Services (MILES)" project, which continues through 2018. The project supports joint outreach activities, special studies, and will be used to leverage support for additional research. *\*Supports Objectives 2, 4, and 5*
- 9. IDEQ and the Tribe will continue to partner with area research universities to pursue funding to support research on nutrient sources in the watershed, nutrient cycling in lakebed sediments, and strengthening the predictive ability of ELCOM-CAEDYM. *\*Supports Objectives 2, 3, 4, and 5*
- 10. In 2015, Kootenai and Shoshone County representatives raised questions regarding different methods used for phosphorus analyses by the labs utilized by IDEQ and the Tribe. Through ongoing QA/QC, LMP staff are analyzing data between the labs. A detailed analysis will be presented to the TLG in the spring of 2017.

#### **Nutrient Reduction and Implementation (Objective 3)**

- 1. A comprehensive GIS-based basin-wide estimate of nutrient loading was developed in 2016. The results will be distributed to the BEIPC, TLG and CCC in early 2017. The nutrient inventory is a dynamic resource and staff will update as new information becomes available in the future. *\*Supports Objectives 1, 2, and 5*
- The LMP team will utilize the nutrient source inventory above to identify critical data gaps both spatially and temporally that could lead to developing new sites for future monitoring of nutrient loading, e.g. tributaries to CDA Lake..
  \*Supports Objectives 1, 2, and 5
- 3. In support of the Nutrient Source Inventory, IDEQ will establish a monitoring site in Wolf Lodge Creek in 2017, pending a signed access agreement.
- 4. LMP staff will continue to communicate nutrient load estimate results to Watershed Advisory Groups and other potential partners for feedback and project identification as information is obtained.
- 5. LMP staff will use the Nutrient inventory data, along with feedback and potential projects identified through communication with stakeholders such as WAGs, county representatives, homeowner groups, and others as the building blocks for a nutrient reduction action plan. Plan development will be initiated in spring of 2017. *\*Supports Objectives 2 and 5*
- 6. The LMP team will participate in Coeur d'Alene Basin Watershed Advisory Group discussions in order to coordinate implementation opportunities. LMP staff will provide support on implementation of selected projects that align with LMP goals, as opportunities arise. *\*Supports Objectives 2 and 5*
- 7. The Tribe and IDEQ partnered with Eastern Washington/North Idaho Girl Scouts on a pilot project in 2015 that involved the removal of invasive yellow flag iris and the installation of a vegetative buffer that features aesthetically pleasing native vegetation and recreational access. The team will continue to monitor this pilot project to ensure success in plant establishment, and to assist in maintenance needs. The project will be used as a demonstration site to encourage more implementation projects. *\*Supports Objectives 2 & 4*
- 8. LMP work plans and activities will be presented to the CCC for input in early 2017. \**Supports Objective 2*
- 9. The LMP identifies an audit of its Management Action Tables (MATs) every 5 years. The audit process continued through 2016. Audit information will be presented to the BEIPC and others in 2017.\**Supports Objective 2*
- Stabilization projects along eroding banks will be evaluated and prioritized in collaboration with Avista Corporation, the Natural Resource Conservation Service (NRCS), the Soil & Water Conservation Districts, the Counties, and landowners. Potential project sites have been identified, and coordination with landowners is ongoing. \*Supports Objective 2
- 11. The Tribe will continue to implement and evaluate the invasive Aquatic Plant Survey and Treatment Program in the southern lake, and IDEQ will continue implementing aquatic plant surveys within northern pool bays. IDEQ coordinates with ISDA on invasive aquatic plant control programs. \**Supports Objectives 1 & 2*.

- 12. The LMP Coordinators will continue to be involved in the Lower Basin PFT and the TLG and support implementing projects identified in the 2002 OU-3 Interim ROD. *\*Supports Objective 2*
- 13. LMP staff will coordinate with the Restoration Partnership in anticipation that the NRDA Trustees finalize the restoration plan in 2017. \* *Supports Objective 2 & 5*
- 14. The LMP team will collaborate with area Conservation Districts, NRCS, and Ecology on outreach and monitoring as part of the Resource Conservation Partnership Program (RCPP), an NRCS-funded initiative in the Coeur d'Alene/Spokane River drainage that will increase the availability of funding for Farm Bill conservation programs. *\*Supports Objective 2*

#### Increase Public Awareness (Objective 4)

- The LMP Education/Outreach Program, Lake\*A\*Syst (a home owner's guide to environmental stewardship within the Coeur d'Alene Basin), developed in 2013, is undergoing revisions based on stakeholder feedback. Revisions will be reviewed with stakeholders in 2017. A revised electronic version will be posted on the Our Gem website, and paper copies will be printed for distribution at various venues. \*Supports Objectives 1 & 2
- LMP staff will continue providing support for development of an outdoor classroom adjacent to the UI Harbor Center in Coeur d'Alene and will be collaborating closely with the City of Coeur d'Alene and other partners to select storm water and Low Impact Development (LID) elements that will be incorporated into the site. *\*Supports Objectives 2 & 3*
- 3. LMP staff will partner with Spokane River Forum, CDA Vision 2030, and other agencies and stakeholders to plan and host a 2017 "Our Gem Symposium" to share information and get feedback from the basin-wide community. The tentative timeframe for the conference is fall 2017 in Coeur d'Alene. *\*Supports Objectives 2 and 3*
- 4. LMP staff will continue to partner with University of Idaho to support Basin high schools by providing workshops and guidance to teachers and students involved in field-based watershed science. \**Supports Objective 2*
- 5. LMP staff will participate in other joint educational and outreach opportunities as time allows. *Supports Objective 2*
- 6. The Local Gems program for local businesses will continue through 2017. This program recognizes businesses and organization that are taking action to protect basin water quality. \**Supports Objectives 2 & 3*
- 7. LMP activity updates will continue to be provided to various groups throughout the year. *\*Supports Objective 2*

Continued coordination with BEIPC forums will maximize opportunities for information exchange and advice for all the parties that participate in the BEIPC activities. Future coordination with the BEIPC recognizes that IDEQ and the Tribe retain their respective decision making authorities under CERCLA and the Clean Water Act (CWA) with regards to implementation.

### 2.2 FLOOD CONTROL AND INFRASTRUCTURE REVITALIZATION

The BEIPC through the office of the Executive Director continues to pursue support and funding for an analysis of flood control needs and the existing levee system in the South Fork CDA River and Pine Creek. The Executive Director will continue to work to develop an approach to dealing with potential flooding problems and levee management in the Upper Basin. The BEIPC will continue to assist Upper Basin communities and utilities in pursuing funding to implement the Upper Basin Drainage Control and Infrastructure Revitalization Plan (DCIRP).

### 2.3 COMMUNICATIONS AND PUBLIC INVOLVEMENT

During 2017, the BEIPC Assistant to the Executive Director and agency Community Involvement Coordinators (CICs) will work together to carry out public involvement, communication, and education related to BEIPC and agency activities. Agency CICs may include staff from EPA, IDEQ, and the Panhandle Health District.

The Office of the BEIPC Executive Director, the Citizen Coordinating Council (CCC) and agency CICs continue to be the focus organizations to facilitate the public involvement process in the Basin. The BEIPC Executive Director, Assistant, Project Focus Team Chairpersons, and CCC Chairperson may request CIC support for public outreach regarding BEIPC activities. The CICs may in turn request BEIPC support for their agencies' public involvement activities.

In 2016, EPA funded a facilitator to provide support to the BEIPC/CCC. The facilitator is supporting the BEIPC by conducting an assessment of its public involvement efforts and making recommendations. The outcome of the assessment may or may not impact future BEIPC public involvement activities. Following is a partial list of some community engagement activities and coordination opportunities for 2017. There may be additions to the list after evaluation of the assessment is completed.

- As required by legislation, the BEIPC will hold quarterly meetings open to the public. The CCC will hold meetings open to members and the public as issues or opportunities arise or discussions are warranted with a minimum of three meetings per year.
- The BEIPC will coordinate its annual tour of the Basin cleanup taking place in August, with publicity support from the CICs and technical support from agency project managers. The tour is open to everyone.
- The BEIPC/CCC and agency CICs will sponsor activities such as open houses, workshops, training, or public meetings, as needed. The BEIPC Assistant and CICs may assist each other to coordinate public education and outreach associated with these events.
- The BEIPC/CCC will lead the development, production and distribution of BEIPC related activity brochures and meeting announcements and agendas and the agency CICs will lead the development, production and distribution of agency items. The BEIPC/CCC and agency CICs will create and process public notices, newspaper ads, and posting to their websites of meetings and other information. The BEIPC/CCC will also distribute information by e-mail to CCC members and interested parties. The BEIPC Assistant will update and maintain the BEIPC website.

- CICs will continue to support the CCC meetings, support BEIPC communications, and explore ways to maximize the CCC's value to interested local people. Upon request, CIC's may support BEIPC with suggestions for publicizing BEIPC events and meetings, participate in distributing meeting announcements, posting to social media, or by proposing communications strategies. Additionally, upon request, CICs may be available to help implement any recommendations proposed by the assessment noted above which are adopted by the BEIPC.
- Upon request, the BEIPC Executive Director will make presentations to public groups and participate in educational forums such as school district Science, Technology, Engineering and Math (STEM) fairs, etc. Assistance from agency CICs may be requested for these efforts. The Director will participate in quarterly press availability sessions, as scheduled by EPA.
- The BEIPC and agency CICs will participate in a joint booth for public outreach/education at the North Idaho Fair.
- The EPA will publish BEIPC/CCC information upon request in its triannual Basin Bulletin and on the CDA Basin Facebook page.
- The EPA may continue to fund a CCC facilitator, pending the recommendations of the assessment and upon request of the BEIPC.
- CIC's work directly with EPA, IDEQ, PHD, and BEIPC project managers as needed to tailor communications outreach and/or education for specific projects under the programs listed in this work plan. Outreach activities are often reported and discussed at CCC meetings.

### 2.4 RESTORATION PARTNERSHIP (Partnership)

The Restoration Partnership (Partnership) is composed of the Coeur d'Alene Basin Natural Resource Trustees: the United States (represented by the U.S. Forest Service, U.S. Fish and Wildlife Service and U.S. Bureau of Land Management), the Coeur d'Alene Tribe, and the State of Idaho (represented by the Idaho Department of Fish and Game and Idaho Department of Environmental Quality). For more information, refer to www.restorationpartnership.org.

In the coming year, objectives of the Partnership are to:

- Continue to engage in restoration projects under the 2007 Interim Restoration Plan
  - Schlepp Agriculture to Wetland Conversion Project: The major restoration work on the Schlepp project is complete and the project is in the long-term operations and maintenance phase. A 10-year Restoration and Management Plan for the project will be finalized in 2017. Wetlands habitat management and success monitoring will continue.

- Robinson Creek Wetlands Restoration Project: The Partnership's main contribution to this project was funding in 2014 to purchase a small portion of the property needed for successful wetlands restoration on this site. Now part of the IDFG Coeur d'Alene River Wildlife Management Area, IDFG is completing wetlands restoration of the site with assistance from IDEQ and funds associated with mitigation for expansion of Page Repository expansion. Work in 2017 includes wetland plantings, weeds management, and water level control.
- Coordinate restoration with cleanup activities through participation in BEIPC and associated committees, and regular communication with EPA.
- Respond to public comments of the Draft Restoration Plan and DEIS.
- Finalize and release the Restoration Plan and EIS.
- Publish the Record of Decision and adopt the Restoration Plan.
- Develop strategic work plans.
- Engage in project solicitation process.
- Commence implementation of the Restoration Plan.

This list reflects the objectives of the Partnership; however, the timing of these activities is tentative and likely to change given the scale of the restoration plan and scope of the program.