Draft Memorandum

To: Molycorp Trustee Group, Rebecca Neri Zagal, Will Fetner, Ben Kuykendall, George Long, Karen Fisher, Russ MacRae, Kirk Minckler

From: David Chapman, Hillary Browning, Diana Lane, Stratus Consulting Inc.

Date: 5/25/2005

Subject: Restoration Planning Project Descriptions

1. Introduction

The Molycorp Trustee Group is currently leading the process of restoration planning and implementation for the Questa Molycorp natural resource damage assessment. Typically, the restoration planning effort entails seven major steps, which include:

- Identification of restoration goals
- Development of restoration project selection/evaluation criteria
- Identification of potential restoration projects
- Evaluation of potential restoration projects according to criteria
- Scaling of restoration projects to offset natural resource injuries
- Development of maintenance, monitoring and oversight needs and plans
- Costing of restoration implementation, maintenance, monitoring and oversight activities.

Previous memoranda have identified restoration goals and evaluation criteria (see Section 3). Currently the Trustees are identifying, evaluating, and prioritizing restoration projects to compensate for natural resource injuries that may have resulted from releases from the Molycorp site in Questa, New Mexico.

To identify and help evaluate potential restoration projects, a preliminary restoration planning field trip took place from April 13 to April 14, 2005 to visit the sites of potential restoration projects that have been proposed. Names and contact information of the field trip participants is provided in Table 1.

Our key objective on this trip was to gather additional information about these potential projects. Questions such as the following were discussed:

- What are current conditions at the site?
- What opportunities for improvements or enhancements exist at the site?
- What are the expected project benefits?
- What types of monitoring or maintenance would be required?
- What types of survey or design requirements would there be?
- Are there any possible feasibility problems with carrying out the project?
- How long might benefits last?

Table 1. List of participants on the April 13-April 14, 2005 site visits of potential restoration projects

Hillary Browning Stratus Consulting hbrowning@stratusconsulting.com 303-381-8000	Bob Haddad AGS rhaddad@charter.net 805-474-9104
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- Is the project ongoing?
- Are any site data available to document current or expected future conditions?
- Is any project costing information available?

The sites visited on the trip were not comprehensive of all restoration possibilities – additional sites and projects will also be considered as part of the restoration claim. In addition, the sites and projects discussed on this trip have not been selected as preferred options. The purpose of this trip was information gathering, not project selection. Figure 1 shows a map of the area visited on this trip.

The purpose of this memorandum is to describe information that has been collected about each of the proposed restoration projects in preparation for project evaluation and scaling. Table 2 lists these projects grouped by general project type and the resources that are expected to benefit from the proposed restoration action. Section 2 of this memorandum describes each potential restoration project, incorporates observations made on the field trip (if visited), identifies next steps to be taken, and provides a brief discussion of scaling considerations. Section 3 presents the restoration project acceptance and evaluation criteria that will be used to rank and determine the selected projects.

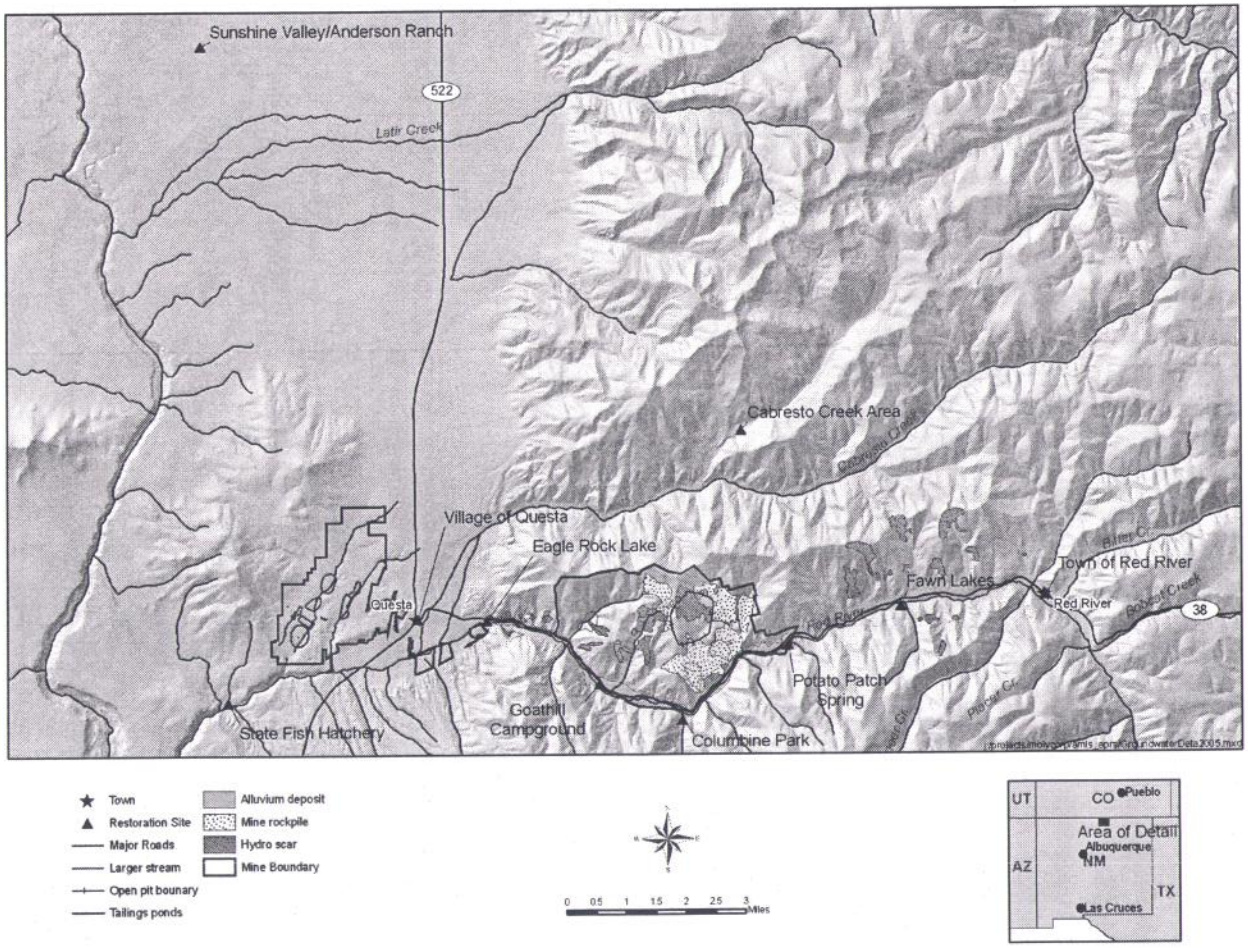


Figure 1. Map of the potential restoration sites visited during the April 13-April 14, 2005 field trip.

Table 2. List of projects that meet acceptance criteria and affected resources grouped by general project type

Project title	Resources addressed by project			
	Surface water	Terrestrial	Groundwater	Recreation
Habitat improvements to ponds and lakes				
Cabresto Creek cutthroat trout enhancement	1			
Fawn Lakes – habitat improvements	1	1		1
Potato Patch Spring habitat creation	1	1		1
Goathill Pond habitat creation	1	1		1
Eagle Rock lake habitat improvement and creation	1	1		1
Hunts pond improvements	1	1		1
Shuree ponds improvement; Valle Vidal area	1			1
Projects to benefit instream communities and/or riparian habitat				
Columbine Park Pond Complex habitat creation	1	1		
Red River habitat improvements in the town of Red River	1	1		
State fish hatchery fish ladder construction	1			?
Village of Questa Red River habitat improvements	1	1		?
Mainstem Red River Embeddedness Treatment/Study	1			
Rio Costilla aquatic enhancement	1	1		
McCrystal creek headgate	1			
Comanche Creek cutthroat migration barrier	1			
Restore Rio Grande cutthroat trout in Comanche Creek	1			
Projects to benefit surface water quality for streams and rivers				
Stream Crossing Improvements – Comanche Creek and North Ponil Creek	1			
Forest Service Road Reconstruction near ranger station	1			
Obliterate road and return to natural contours – Chuck Wagon Creek and Gold Creek	1			
Mitigation of off-road vehicle impacts to the watershed	1	1		
General Road improvements in the watershed	1	1		
Rio Grande box recreational facilities development	1			1
Cebolla Mesa trail improvement	1			1

Table 2. List of projects that meet acceptance criteria and affected resources grouped by general project type (cont.)

Project title	Resources addressed by project			
	Surface water	Terrestrial	Groundwater	Recreation
Projects to improve or protect terrestrial or wetland habitat				
Sunshine Valley/Anderson ranch wetland site	1	1		
Improve winter range for bighorn sheep		1		
Alluvial fan habitat enhancement along the Red River	1	1		1
Projects to conserve water use, benefit groundwater quality, or develop groundwater resources for human use				
Well and distribution system for Lama			1	
Village of Questa water distribution improvement			1	
Development of Water Conservation Ordinances	1		1	
Village of Questa WWTP upgrade			1	
Red River WWTP sludge-drying basin lining			1	
Red River underground storage tank remediation			1	
Septic system concerns in Lama or San Cristobal			1	
Construction of small retention dams for groundwater storage	1		1	
Public education about beavers and restoration	1		1	
Projects primarily related to recreation or tourism				
Funding for promotion of outdoor activity related tourism	1			1

2. Project Descriptions and Site Visit Observations

2.1 Proposed sites visited by the group April 13-April 14, 2005

No. 1: Sunshine Valley/Anderson Ranch wetland site

Land ownership: Molycorp

Possible improvement activities could include:

- Expanding habitat features
- Increasing amount of emergent vegetation
- Securing site in perpetuity for wildlife values.

Date/time visited; GPS coordinates;

04/13/05; 12:00 pm N305201
W1053700

Resources addressed: Primary resource: terrestrial habitat, especially relevant for compensating riparian or wetland injuries. Secondary resource: surface water habitat, especially relevant for macroinvertebrates, amphibians, and birds, but not for fish. Public access would be limited.

Site description: Unusual groundwater-fed wetland site surrounded by sagebrush, site has stayed wet through drought conditions. The open water areas are surrounded by a dike and are approximately 2 feet deep. Emergent cattails are present through the wetland area. Entire ranch property is 1,260 acres, approximately 1 mile N-S by 2 miles E-W; 6-8 miles N-NW of Questa. There is one larger and deeper pond that was excavated. Wetland area is approximately 10 acres and is located in the north central portion of the Ranch.

Site history: Anderson Ranch was purchased by Molycorp in the late 1960s or early 1970s for groundwater rights, which were then transferred to the Molycorp mill. Before Molycorp's purchase, the area was irrigated for hay production. Land is currently grazed informally without official Molycorp permission.

Site natural features: Elk come through this area for grazing. Large number and variety of birds. May have rare birds nesting including possibility of a snipe nest. No evidence of bullfrog; habitat would be suitable for boreal toad reintroduction. Extremely unusual wetland habitat – no comparable locations nearby.

Site restoration possibilities: Protect land in perpetuity for wildlife values, by transferring ownership or an easement to a conservation organization and specifying no grazing in perpetuity. Excavate additional areas with sinuosity and deeper pot-holes to increase habitat area and features. Manage the property actively to prohibit cattle grazing and control public access for designated uses such as bird-watching only. Irrigation practices should be watched – new or increased irrigation from adjacent properties could potentially pose a problem in the future.

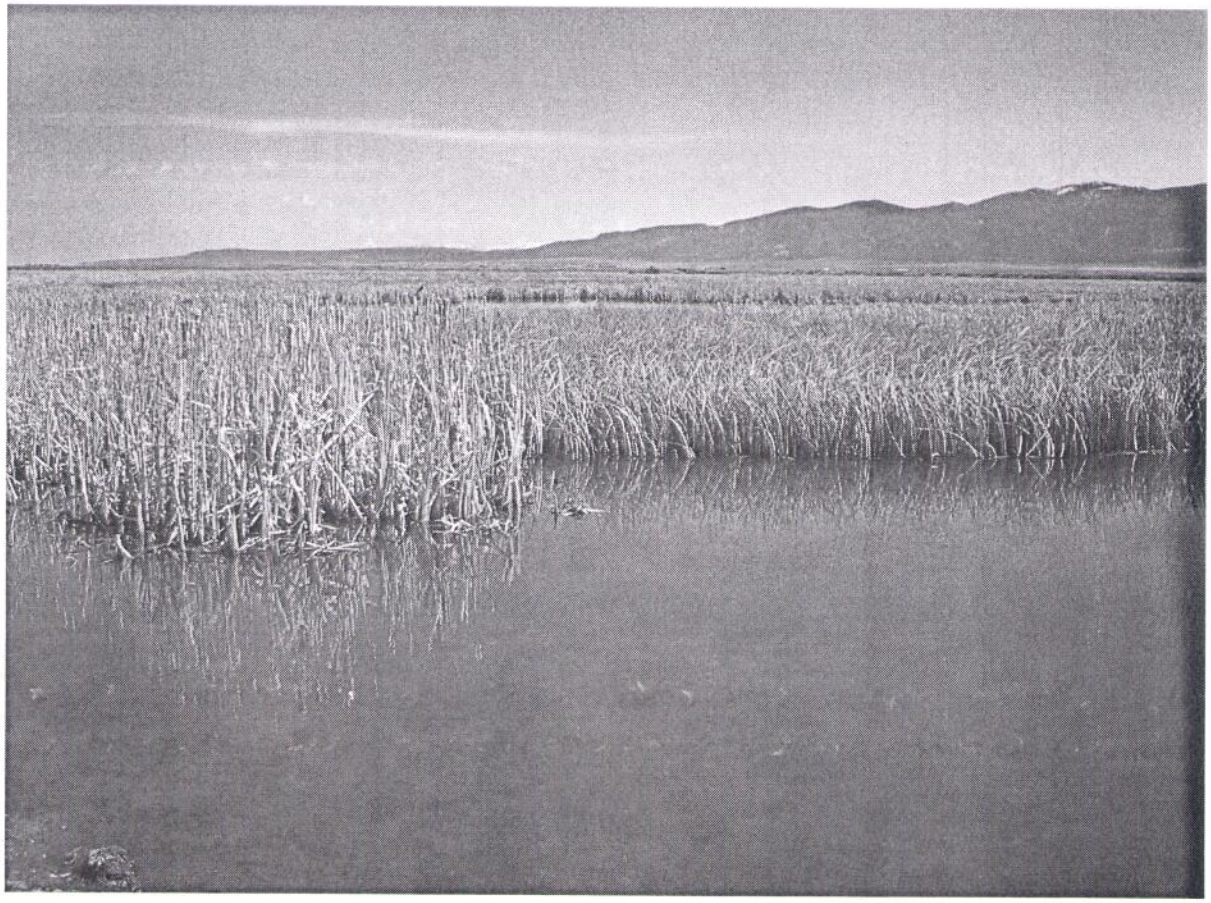
Next steps for project: Bob Haddad will talk to Molycorp about possibility of including this site in a restoration settlement. There is some possibility that Molycorp is considering trading grazing rights at this property to an outside party in exchange for use of a different piece of property. This would have a strong adverse effect on the potential for success at this restoration site even if the portion of grazed land were fenced off from the wetland areas. We need to delineate wet areas and determine how much habitat is present currently and opportunities for expansion. Russell Jones at Stratus Consulting has investigated the cost of satellite imagery; Bob Haddad is looking into getting the area flown to get current aerial photography. Sampling water for water quality parameters would be helpful to confirm that water quality is suitable for wildlife habitat; contamination is not expected.

Monitoring and maintenance: Monitoring is needed to determine effects of removing grazing on vegetation response and population studies for small mammals and birds – especially in proximity to wetland site. Also, in wetland spot mapping for birds and responses to grazing removal over time. Low-level color IR to map existing wetland and monitor changes over time. New Mexico jumping mouse (forest sensitive species) might be present. The property would have to be closely managed to prevent unauthorized grazing and use.

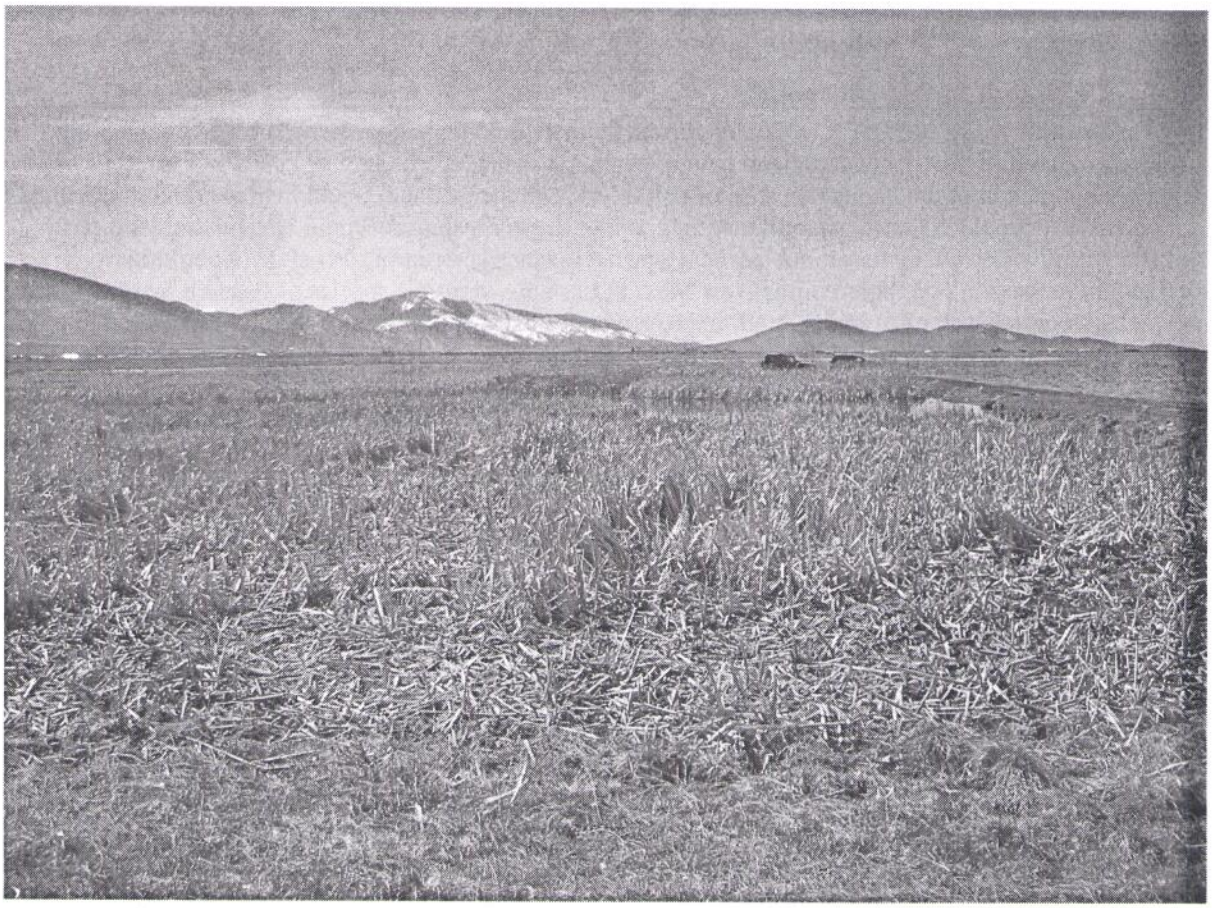
Date/time visited; GPS coordinates;

04/13/05; 12:00 pm N305201
W1053700

Scaling/restoration credit ideas: Protection of current habitat could be assigned credit based on avoiding risk of development; credit for expanded wetland habitat would be based on area of new habitat. Grazing nearby could limit the potential of the habitat because of risk of cattle in the wetland. Small mammal and bird habitat in the drier areas also would benefit from eliminating grazing. Brewer's sparrow could be a possible indicator species (see http://www.royalbcmuseum.bc.ca/end_species/species/sparr.html). Possible opportunity for reintroduction/increase in population of the New Mexico Jumping Mouse, a species of concern that is sensitive to grazing and requires water nearby. Overall, improvement of biological diversity would be expected in upland site. Excellent location for research on effects of removing grazing on vegetation response and population studies for small mammals and birds – especially in proximity to wetland site. Also, in wetland spot mapping for birds and responses to grazing removal over time. Low-level color IR to map existing wetland and monitor changes over time.



Sunshine Valley/Anderson Ranch property facing northeast



Sunshine Valley/Anderson Ranch, looking south from the north end

No. 2: Cabresto Creek area

Land ownership: USFS

Possible improvement activities could include:

- General opportunities for riparian and instream improvement.
- Development of several ponds via excavation of gravel, construction of spawning channels and fish barriers. Use of Cabresto Creek and groundwater.

Date/time visited; GPS coordinates:
04/13/05; 9:00 am

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access would be limited in area of Rio Grande Cutthroat Trout spawning habitat.

Site description: Cabresto Creek is a stream area with opportunities for improvements to benefit Rio Grande cutthroat trout (RGCT). The upper portion of Cabresto contains Rio Grande Cutthroat Trout, but brook trout also are present. Brook trout were found in this reach for the first time in 2004. The lower portion of the creek intersects with Cabresto Flats where brown trout and brook trout are present. Upstream of Cabresto Lake turn-off, there are approximately 6 – 8 miles of stream habitat. In general, water quality is considered to be good. There are some issues with erosion and sedimentation from roads.

Site natural features: The stream contains good water quality and habitat appropriate for Rio Grande cutthroat trout. The upper portion of Cabresto Creek contains RGCT, which is the state fish of New Mexico, but not officially listed as threatened or endangered.

Site restoration possibilities: Two possible projects could be done separately or combined. 1. Install ponds and off-channel habitat features to benefit fish. Proposed project involves two 1-acre ponds, approx. 12 ft. deep, plus a 6 ft. spawning channel; this would be a flow-through system using only Cabresto water (no additional water needed). 2. Install a dam/fish barrier to reclaim upper portion of Cabresto Creek for Rio Grande Cutthroat Trout and reduce hybridization. Brown trout are still present, but population numbers could possibly be kept low. This project might have very positive public relations benefits for Molycorp and the Trustees. There also may be a possibility to use Cabresto Lake as a water storage reservoir for the project. The NM DG&F could be a potential partner especially if RGCT could be harvested and re-introduced elsewhere in the state.

Molycorp thought that they might be able to provide more water to Cabresto Creek below the last irrigation diversion (approximately 2 miles of dry stream during lowest flow). However, this could be risky because upstream users might take the downstream water.

Date/time visited; GPS coordinates:
04/13/05; 9:00 am

Next steps: Need to consider possibility that pond habitat for cutthroat might induce anglers to catch and keep fish, which would not be permitted. Need to double check land status on Cabresto flats (Ben Kuykendall). Need to consider issues with private land upstream. It is important to note that the project(s) should not affect the amount of Cabresto water reaching Questa (should not interfere with irrigation needs), but there could be public concerns that the project will be impounding water and reducing irrigation needs. Need to identify appropriate location of fish barrier; this will depend on physical characteristics of the stream and numbers of brown/brook trout at that location. Current politics within New Mexico Game and Fish prohibit the use of piscicides, therefore, the reach upstream of the fish barrier needs to have low populations of brown and brook trout that can be managed with the use of alternative methods such as electrofishing. Need to check the "genetic purity" of the RGCT in this creek.

Monitoring and maintenance: Annual monitoring of spawning channels and fish barriers to determine if functioning effectively; annual monitoring of fish populations.

Scaling/restoration credit ideas: Scaling for ponds and off-channel habitat could be based on expected number of RGCT raised, and the percentage increase over baseline populations. Scaling for expansion of habitat could be based on area of new habitat.

Looking towards Cabresto Creek from the road

No. 3: Town of Red River and surrounding areas

Land ownership: Varies

Possible improvement activities could include:

- Red River habitat improvements in the town of Red River through increase in riparian vegetation and instream habitat improvements.

Date/time visited; GPS coordinates:
04/13/05; approx. 2:00 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access would be allowed.

Site description: Two sites were visited on the Red River within the town of Red River. The first site is the sampling site known as RR1. The second site was at Millet Creek, where the Red River is channelized. Both of these areas are affected by episodic poor water quality releases from Bitter Creek, which is upstream.

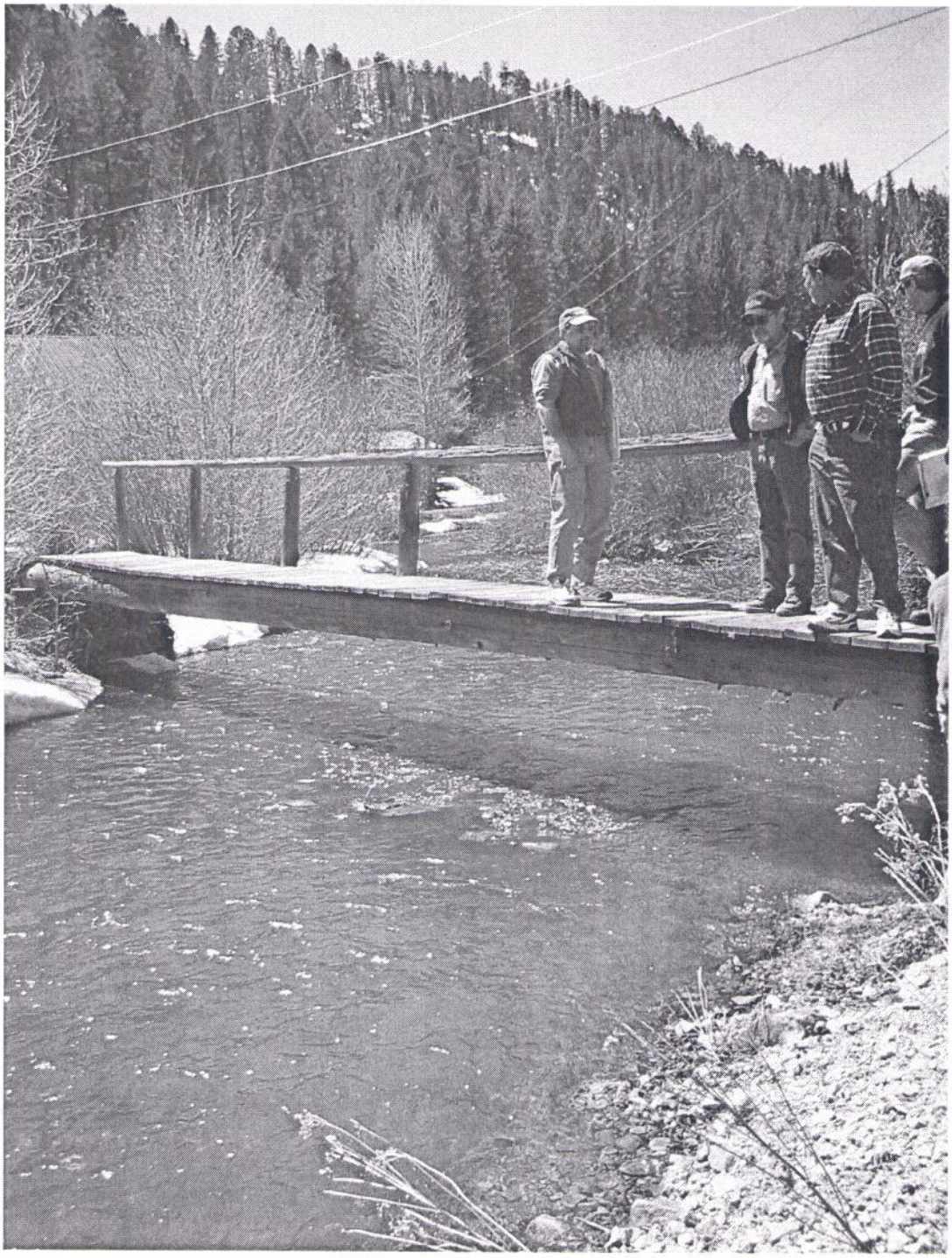
Site natural features: At RR1, the river is not channelized but lacks holding/resting habitat for trout. At the second site, the creek is channelized and also lacks holding habitat. Water quality is poor during runoff in Millet Creek, which flows intermittently and brings in poor quality water with low pH and high metals concentrations.

Site restoration possibilities: At RR1, habitat could be enhanced through the placement of instream woody debris. Chadwick estimated a cost of 10-15 k/mile. At Millet Creek confluence, log drops or "upstream Vs" could be placed low down in the creek bed to create pool habitat for trout. These habitat features could benefit the stocked fish in the area and allow them to rest longer within these habitat sections.

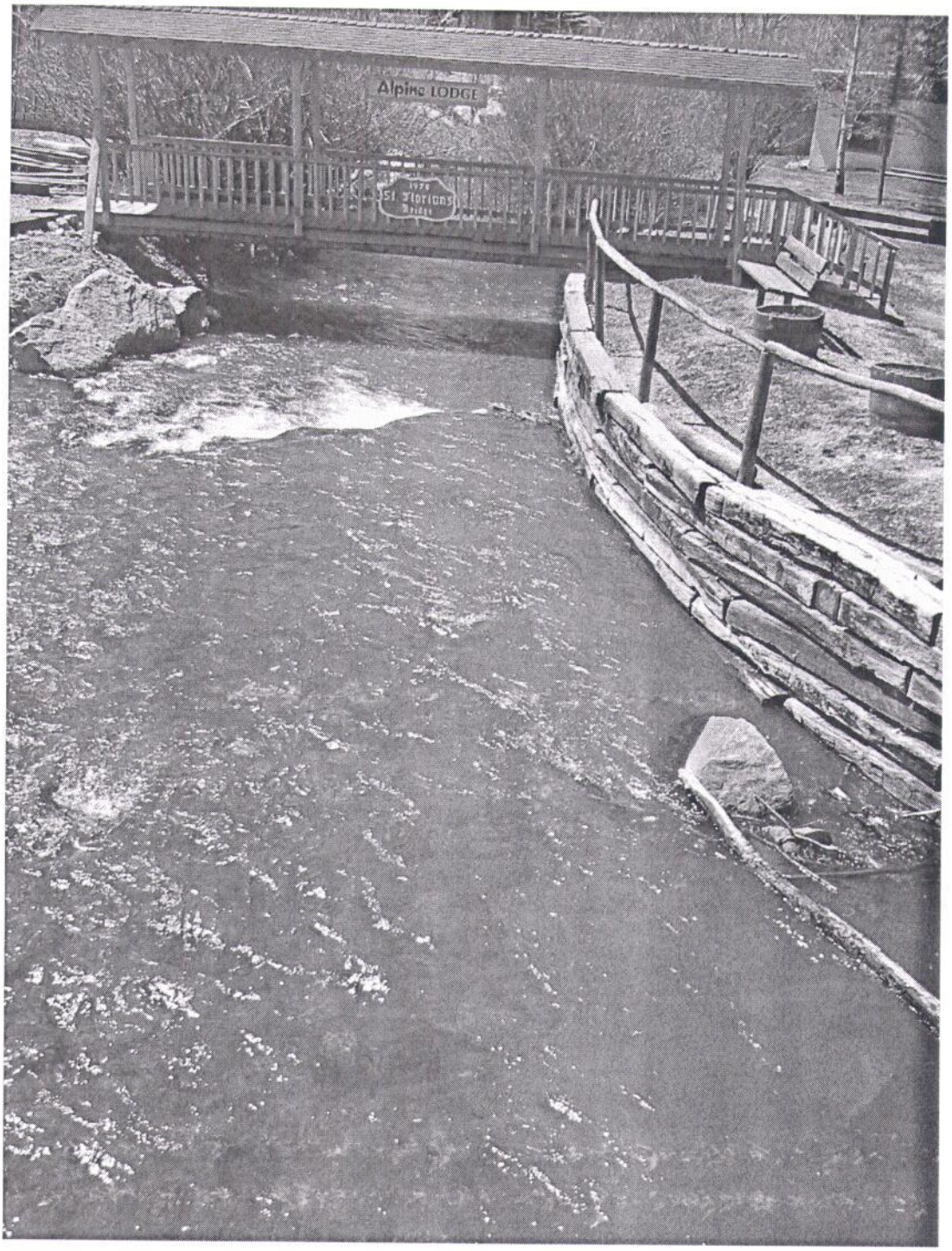
Next steps: None noted.

Monitoring and maintenance: Annual monitoring of instream improvements and fish populations.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected increase in standing density of stocked fish in these reaches of the river. Benefit for put-and-take fishery only.



The Red River near sampling site RR-1 at the upstream end of the town of Red River



The Red River immediately downstream of the Millet Creek confluence; note the turbid water on the right side discharged from Millet Creek.

No. 4: Fawn Lakes area

Land ownership: USFS

Possible improvement activities could include:

- Riparian habitat enhancement near Fawn Lakes
- Alluvial fan habitat enhancement on south side of Red River
- Ramp removal
- Relocation of diversion head gate slightly downstream and proper alignment of structure
- Dredging and deepening of upper lakes
- Dam/access perimeter trail improvement (reconstruction, removal of overflow culvert, construction of spillway with bridge at opposite side)
- North Shore stabilization and deepening
- Creation of boardwalk and interpretive signage
- Securing permanent water rights.

Date/time visited; GPS coordinates:
04/13/05; approx. 2:30 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially relevant for riparian and alluvial fan habitat. Public access would be allowed.

Site description: Fawn Lakes is a popular recreational site adjacent to the Red River, owned by the USFS. The site consists of two ponds that are fed through a diversion from the Red River, and a wetland below the second pond. The site receives heavy recreational use during the summer, and is heavily stocked with catchable rainbow trout. There also are some white suckers that reproduce naturally; trout do not reproduce in the lake.

Site natural features: Fawn Lakes contains open water habitat with a delta forming near the pond inlet because of sediment coming from the diversion structure. Surrounding Fawn Lakes is conifer and cottonwood habitat, where the young conifers have become overly dense. There is an active beaver complex at the lower Fawn Lakes wetland.

Date/time visited; GPS coordinates:
04/13/05; approx. 2:30 pm

Site restoration possibilities: Molycorp presented restoration possibilities that were summarized on a GIS site map they produced. Proposed project ideas include upgrading the existing diversion structure to improve flow and to prevent episodic debris flow from entering the lakes; removing the sediment delta where the diverted water enters the lake; constructing a handicap accessible perimeter trail, constructing additional accessible fishing piers, creating a dike to keep flood water out of the lower pond and wetland, and constructing a boardwalk and interpretive signage noting the habitat features of the wetland area, such as beaver activity. Also, the ponds could be dredged and deepened to increase the possible stocking density by creating more fish habitat.

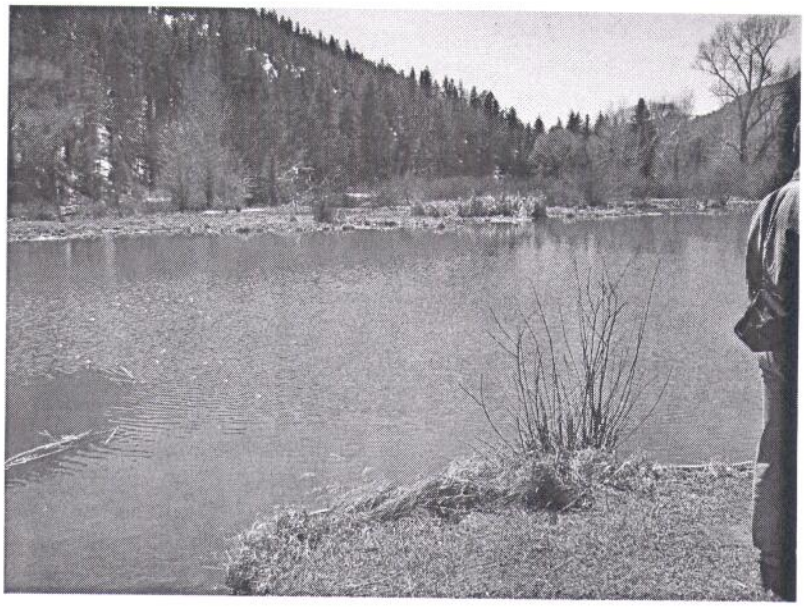
In addition to work at the ponds and wetlands, terrestrial restoration activities could include improving forest habitat on the alluvial fans by thinning overly dense conifers. Thinning activities would encourage growth of cottonwood trees and growth of larger conifers. These activities might benefit Abert's squirrels and elk that are currently concentrated near the highway because of previous habitat improvement activities that have taken place there.

Next steps: None noted.

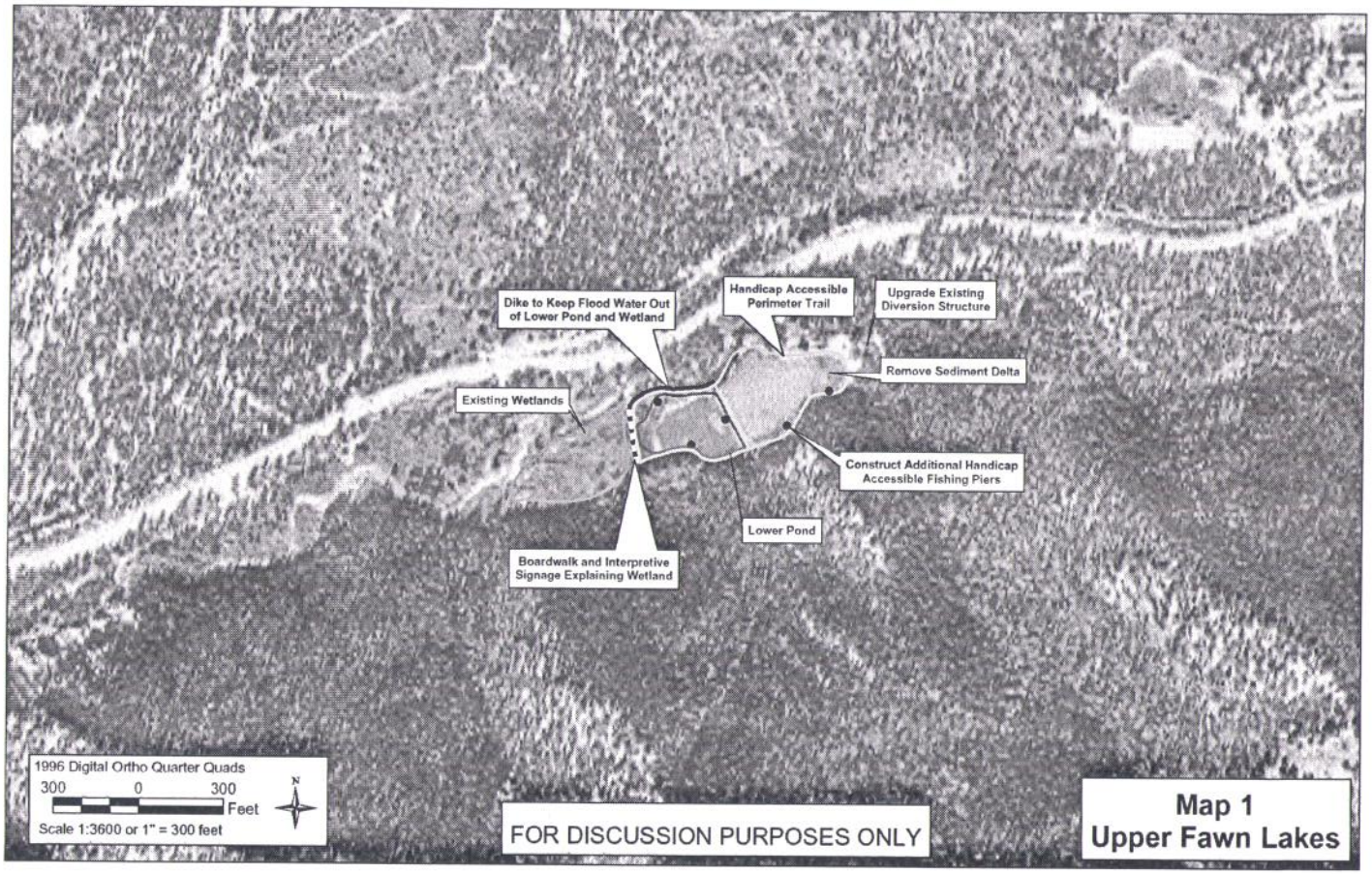
Monitoring and maintenance: Periodic observation of any diversion structure for obstructions. Annual monitoring of lake depth.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected increase in standing density of stocked fish in the pond. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat. Scaling for terrestrial enhancement could be based on expected increases in a key species like Abert's squirrel or on a percentage similarity to a reference area.

Existing headgate at Fawn Lakes



Looking toward Fawn Lakes wetland area



Overview of Fawn Lakes proposed restoration site

No. 5: Potato Patch Spring area

Land ownership: Molycorp

Possible improvement activities could include:

- Creation of new pond, supplied by diversion from Red River routed through settling basin and into the new pond
- Creation of constructed wetlands at west end of pond
- Creation of day-use recreational facilities (picnic tables, outhouses, etc.)
- Construction of bridge over Red River to increase access to Potato Patch Spring.

Date/time visited; GPS coordinates:
04/13/05; approx. 3:00 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access would be allowed.

Site description: The area around Potato Patch Springs is owned by Molycorp. The site contains excavated areas that could be transformed into recreational fishing ponds with a put-and-take fishery. The site is located between the main road and the Red River, in a relatively flat area of the canyon.

Site natural features: The area is well shaded and has mature trees growing in and around the excavated basins. The excavated areas are approximately 25 feet deep and were used as ponds 20 – 25 years ago. The excavated areas are not connected to groundwater because the groundwater table is depressed in this area.

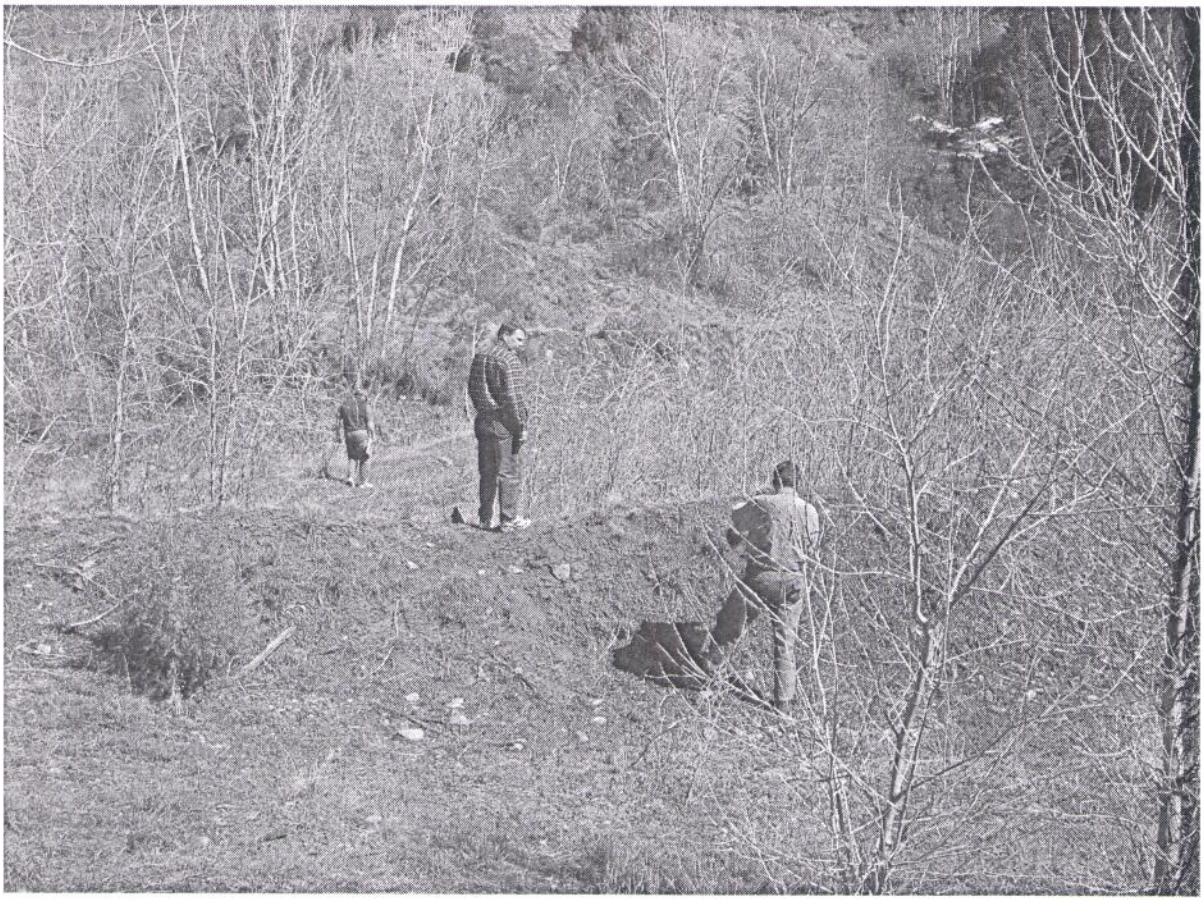
Site restoration possibilities: Molycorp presented a draft map and restoration plan that would involve a 400 foot long diversion from the Red River, a settling basin to avoid excessive sediment loadings into the lake, creating a 1-acre fishing pond with an unimproved shoreline trail, and constructing a wetland at the outlet of the pond. An access bridge would be built as well.

The pond would need a bentonite clay liner to hold water without excessive leaking. During the times of year with poor water quality in the Red River, it might be possible to use groundwater to feed the pond. Another possibility to avoid episodic inputs of sediment is an automatic structure that cuts off the diversion during heavy rainstorms. A capped wellhead exists at the site and is a possible source of groundwater; there also is nearby access to power lines. Based on comments by Chadwick, the Red River water quality in this area is chronically toxic to fish but not acutely toxic; fish should be able to survive between stocking events.

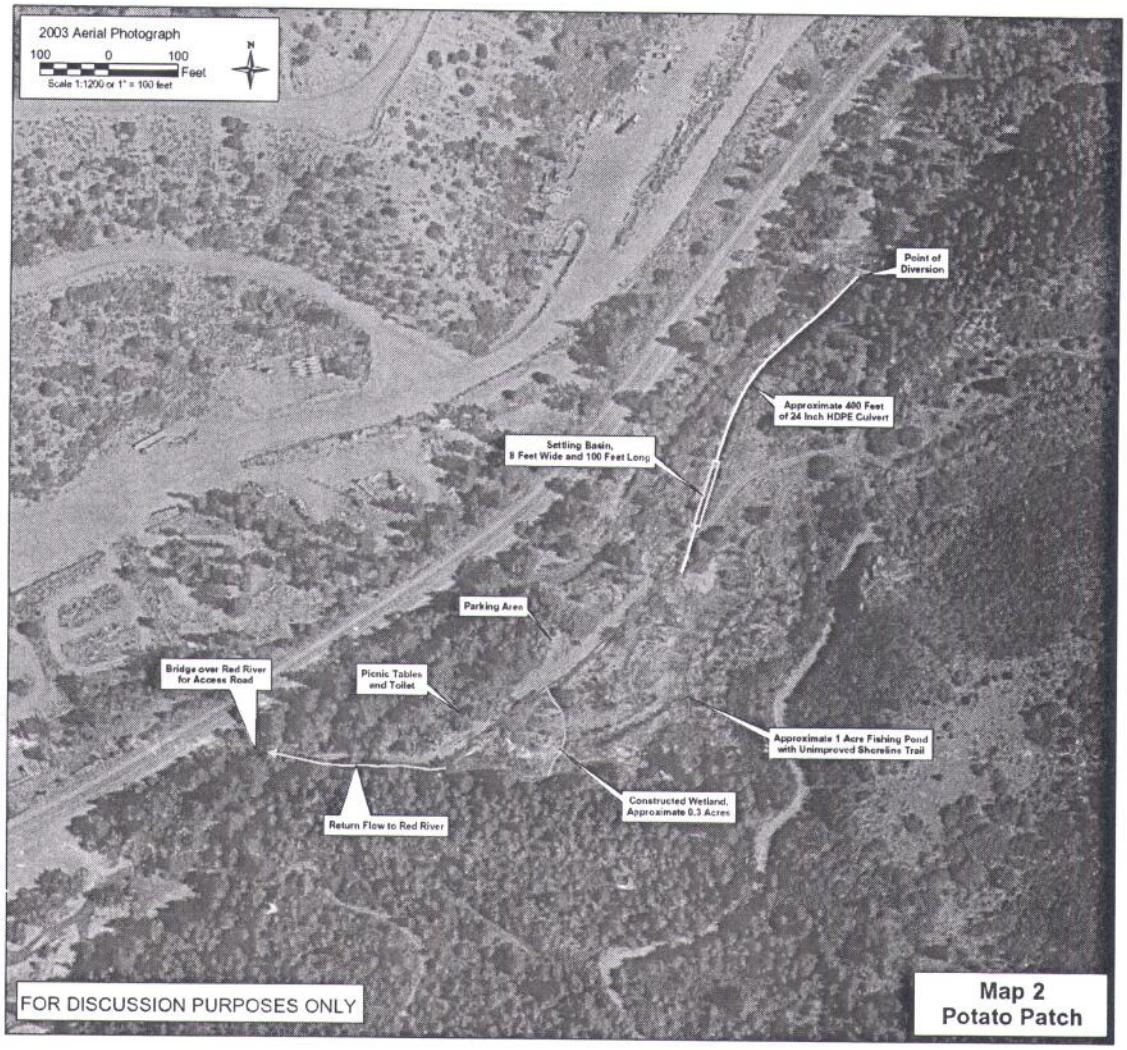
Next steps: None noted.

Monitoring and maintenance: Annual monitoring of head gate and channel. Periodic angler surveys. Periodic monitoring of aquatic macroinvertebrate community. Monitoring and maintenance of facilities and bridge.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on standing density of stocked fish in the pond. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat.



Excavated areas and berms at the Potato Patch Spring site



Overview of Potato Patch Spring potential restoration site

No. 6: Columbine Park complex

Land ownership: Molycorp

Possible improvement activities could include:

- Development of two small ponds via excavation of gravel
- Construction of spawning channels and fish barriers
- Raising of Rio Grande cutthroat trout.

Date/time visited; GPS coordinates:
04/13/05; approx. 3:45 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, if riparian plantings and improvements are included. Public access would be allowed if used for brown trout; public access would be restricted if used to raise cutthroat trout.

Site description: The area around Columbine Park is owned by Molycorp. The site could be developed for two recreational fishing ponds with a put-and-take fishery, or as a natural setting for raising Rio Grande cutthroat trout which could be used for cutthroat reintroduction projects around New Mexico.

Site natural features: The site has access to Columbine Creek water, which could be used to supplement groundwater from a clean source (although the amount available would be limited). Existing shallow alluvial groundwater is poor quality. Upstream on Columbine Creek is an extant Rio Grande cutthroat trout population.

Site restoration possibilities: Molycorp presented a draft map and restoration plan that would involve creating a 1.5 acre upper pond and 2.5 acre lower pond with a spawning channel in between the two ponds and another spawning channel between the lower pond and the outlet. The spawning channels would be approximately 1000 feet long. The ponds would need to be lined to avoid intrusion of contaminated groundwater. Clean groundwater could be piped into the bottom of the pond in spots to mimic natural groundwater upwelling areas. The river would need to be bermed to make sure that river water did not intrude during flood events. The diversion on Columbine Creek could be designed as a fish barrier to protects the upstream Rio Grande cutthroat trout population. Need to make sure that fish would have a good macroinvertebrate food source.

The site could be enhanced with riparian plantings and other upland improvements; these improvements were not included in the original Molycorp plans. If the area is used as a cutthroat trout nursery there would be no public access. The private ownership would facilitate good control over restricted access. Public access would be granted if the area were stocked with brown trout.

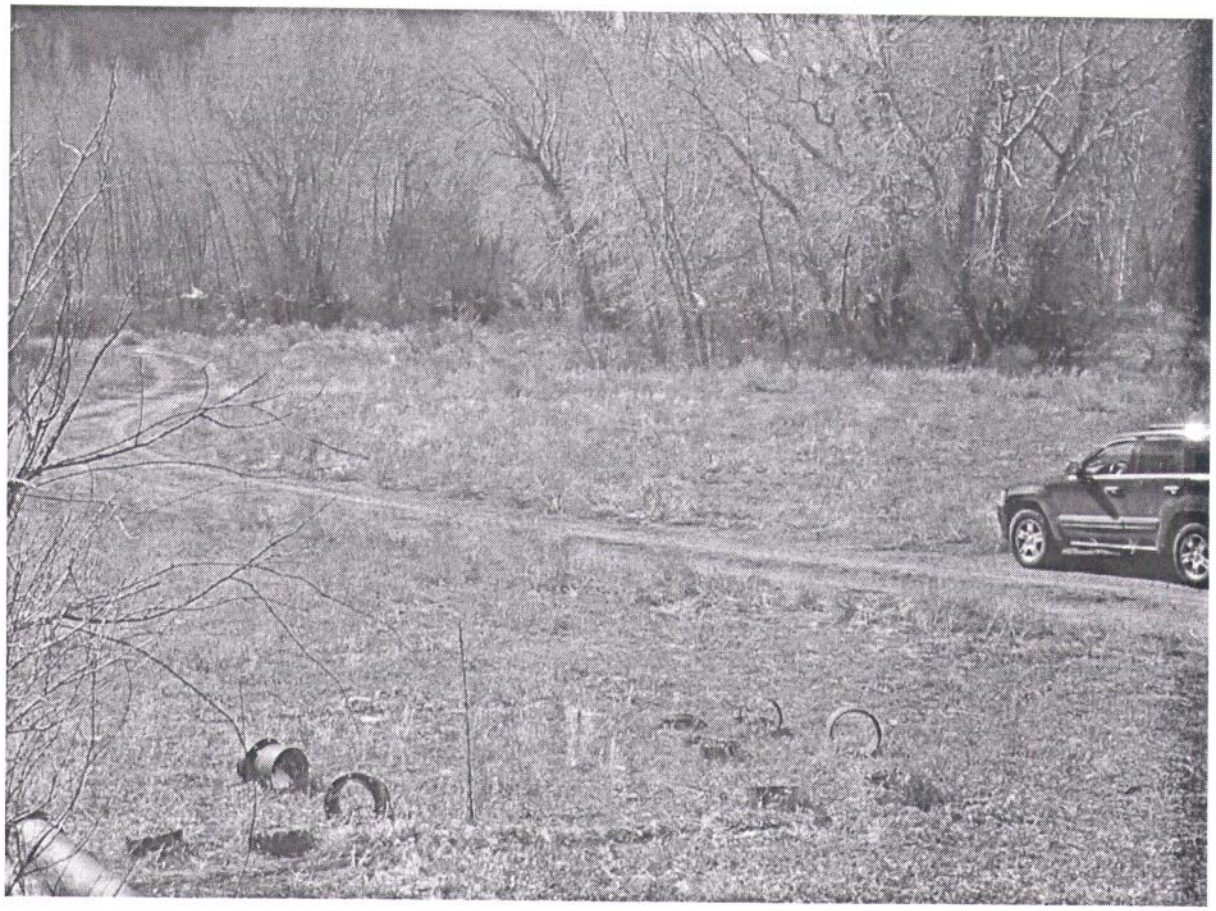
Could be a location to hold partially introgressed fish that are removed during other treatment projects. These fish could be swamped with RGCT genetics. Cooperative agreement could be signed between Molycorp, USFS, and NMDGF for running facility. NMDGF participation is key to the success of this project.

Date/time visited; GPS coordinates:
04/13/05; approx. 3:45 pm

Next steps: Molycorp needs to conduct test drilling to determine whether there is sufficient flow of good quality groundwater to sustain the project. There may be a water rights issue to resolve regarding the need for a 2 -4 cfs diversion on Columbine Creek. The New Mexico Department of Game and Fish would need to be involved with plans to raise cutthroat.

Monitoring and maintenance: Annual monitoring of spawning channels and fish barriers to determine if functioning effectively; annual monitoring of fish and/or waterfowl populations.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on standing density of fish. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat; different scalers might be used for brown trout versus Rio Grande cutthroat trout.



Columbine Park lower pond area

Overview of Columbine Park proposed restoration site

No. 7: State Fish Hatchery (near Questa) and surrounding area

Land ownership: Public

Possible improvement activities could include:

- Downstream modification of existing concrete structure to provide water to collection box in conjunction with a fish ladder to facilitate migration for spawning trout.

Date/time visited; GPS coordinates:
04/14/05; approx. 9:00 am

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access is possible for upstream sections of the river that would benefit from this project.

Site description: The state fish hatchery at Questa includes a diversion structure that prevents upstream migration of fish, especially brown trout. The Red River near the hatchery has excellent habitat and good quality water.

Site natural features: The riparian habitat near the migration barrier is in excellent condition with a high density of willows. The river is well shaded and has good in-stream and riparian habitat. The fish barrier prevents spawning fish from moving upstream. The downstream population of trout has more large fish compared to the upstream population above the barrier.

Site restoration possibilities: The diversion structure could be improved by including a fish ladder, with an estimated cost by Chadwick of approximately $50,000. Work with NMDG&F to determine if they want to maintain infiltration gallery. Eliminating the fish barrier would allow larger fish from lower down to move upstream.

Next steps: None noted.

Monitoring and maintenance: Annual examination to make sure fish passage/ladder is not impaired

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected changes in trout biomass, based on expecting that the size structure of the fish population upstream of the diversion would become similar to the size structure of the fish population downstream of the diversion.

The hatchery diversion structure, an effective migration barrier

Collection box for the youth fishing pond

No. 8: Village of Questa and surrounding area

Land ownership: Varies

Possible improvement activities could include:

- Improve riparian and in-stream habitat in the Red River through revegetation of stream banks and improve instream habitat
- Improve Hunts Pond via measures including sediment removal, bank stabilization, wetland restoration, replanting native vegetation, and recreational improvements (trash cans, etc.).

Date/time visited; GPS coordinates:
04/14/05; approx. 10:00 am

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access is possible.

Site description: The Red River near the Questa Waste Water Treatment Plant (WWTP) lacks pool habitat with limits fish production. The river contains primarily run/riffle habitat.

Site natural features: Below the highway bridge, the Red River lacks good pool habitat. This stretch of the river is further away from houses, where people have deliberately bulldozed the river to limit flood danger. This area is considered to be habitat limited and not water quality limited.

Site restoration possibilities: Improve fish habitat in approximately 1/3 of a mile in the Red River below the highway bridge with habitat structures that increase pool habitat from the current 1 – 2% of the stream reach to 10 – 15% of the stream reach. Fish habitat data is available from Chadwick.

Next steps: None noted.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected increase in standing density of fish in these reaches of the river.

Additional project at Questa – Hunts Pond improvements

Date/time visited; GPS coordinates:
04/14/05; approx. 10:30 am

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Public access is possible.

Site description: The City of Questa has been developing a recreational site at Hunts Pond. The pond has been excavated within the last 18 months but does not yet contain stocked fish.

Site natural features: Hunts Pond is a small excavated pond near the Red River. Water quality is good. It is fed by groundwater. Aquatic vegetation has been growing in the pond, which will likely increase in the future and may limit fishing opportunities and fish production. Water quality has been tested by Molycorp and is good.

Site restoration possibilities: The design being employed by the town of Questa appears not to be optimal for maintaining successful fish production. The pond needs to be deeper and have an outflow to the Red River so that water circulates continuously. The pond might need constant chemical treatment to kill aquatic vegetation because water clarity is very high. Shoreline habitat and recreational improvements also could be made.

Next steps: Talk with town of Questa to determine if they are interested in having technical, financial, or logistical help with improving the design or implementation of this project.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on standing density of fish. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat.

The Red River looking north from the WWTP towards the village of Questa

No. 9: Projects at Eagle Rock Lake

Land ownership: Public

Possible improvement activities could include:

- Dredging for increased water depth and improved overwintering habitat
- Bank stabilization
- Culvert replacement
- Cottonwood revegetation
- Parking lot barrier improvement
- Construction of second pond and wetland
- Establishment of permanent water right.

Date/time visited; GPS coordinates:
04/13/05; approx. 4:55 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially relevant for wetland injuries. Public access is possible.

Site description: Eagle Rock Lake is a popular recreational site adjacent to the Red River, owned by the USFS. The site currently consists of a single pond that is fed through a diversion from the Red River. The site receives heavy recreational use during the summer, and is stocked with catchable rainbow trout.

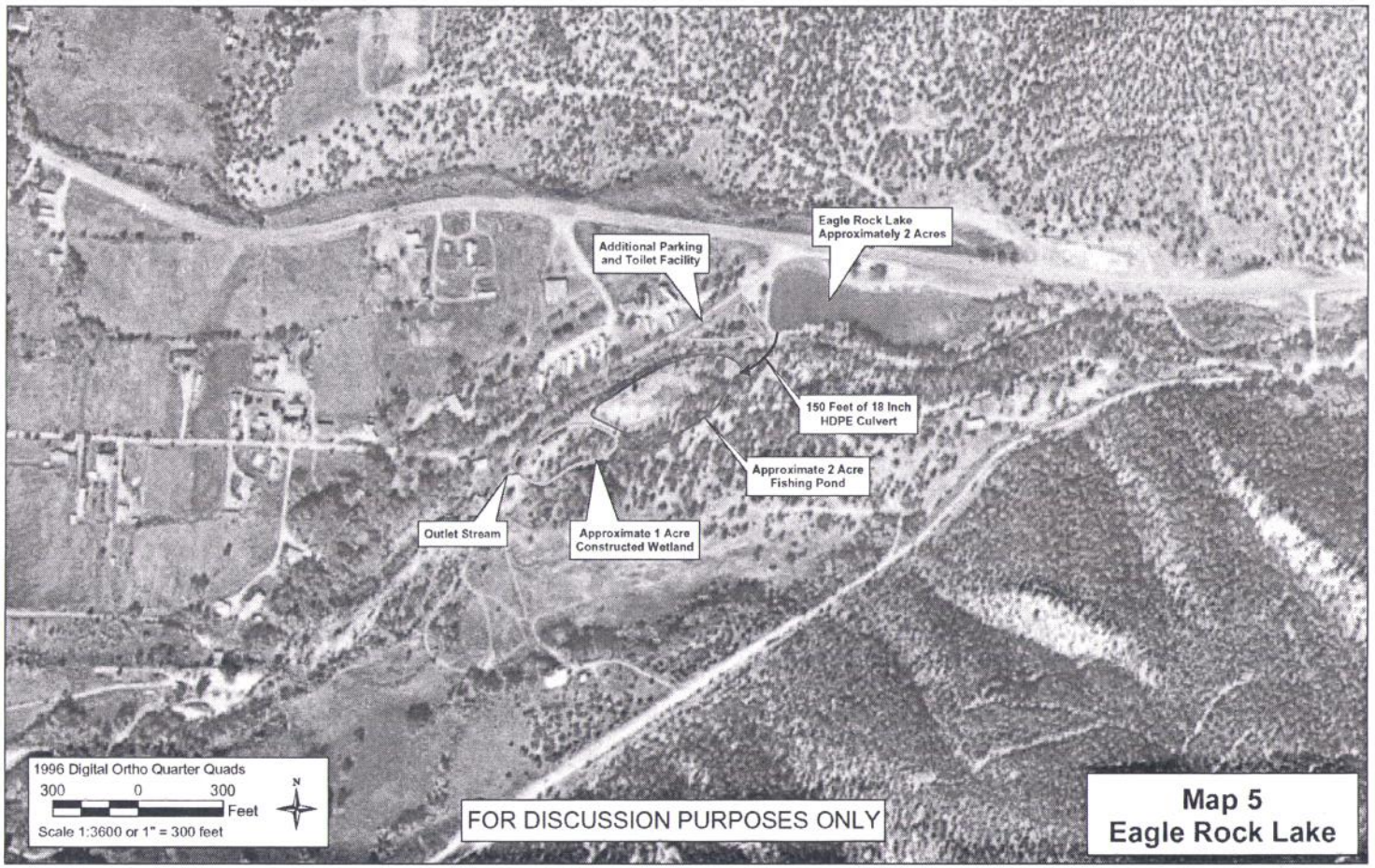
Site natural features: Eagle Rock Lake contains approximately 2 acres of open water habitat. The lake is in a wider part of the valley surrounded by scenic conifer forest.

Site restoration possibilities: Molycorp presented restoration possibilities that were summarized on a GIS site map they produced. Proposed project ideas include constructing a second 2 acre fishing pond below the existing pond and a 1 acre wetland at the outlet of the second pond, with return flow to the Red River. Additional parking and a toilet facility would also be constructed. The second pond would be located on Molycorp land that previously was a trout pond and is already partially excavated (pond may require a liner). Water quality returned to the river would be improved because of filtering of water through the new pond and wetland. Over time, the wetland might need periodic maintenance to remove and properly dispose of poor quality sediments. Eagle Rock Lake could be dredged to increase stocking densities. Proper disposal of dredged materials could be done on Molycorp's tailings impoundments. In addition, the USFS needs to secure a permanent water right on Eagle Rock Lake.

Next steps: None noted.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on standing density of fish. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat. Terrestrial benefits could be scaled based on area of new wetland habitat created.

Excavated area that would be used to develop the second pond at Eagle Rock Lake



Overview of proposed Eagle Rock Lake restoration project.

No. 10: Goathill Campground area

Land ownership: USFS

Possible improvement activities:

- Development of a small pond via excavation with upstream settling basin, supplied with diversion from Red River
- Creation of constructed wetlands using Goathill Pond outflow, wetland revegetation.

Date/time visited; GPS coordinates:
04/13/05; approx. 4:15 pm

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially relevant for wetland injuries. Public access is possible.

Site description: This potential restoration site is on Molycorp property near the campground. Nearby Goathill campground is owned by the USFS. There is no pond or open water on the site at the moment.

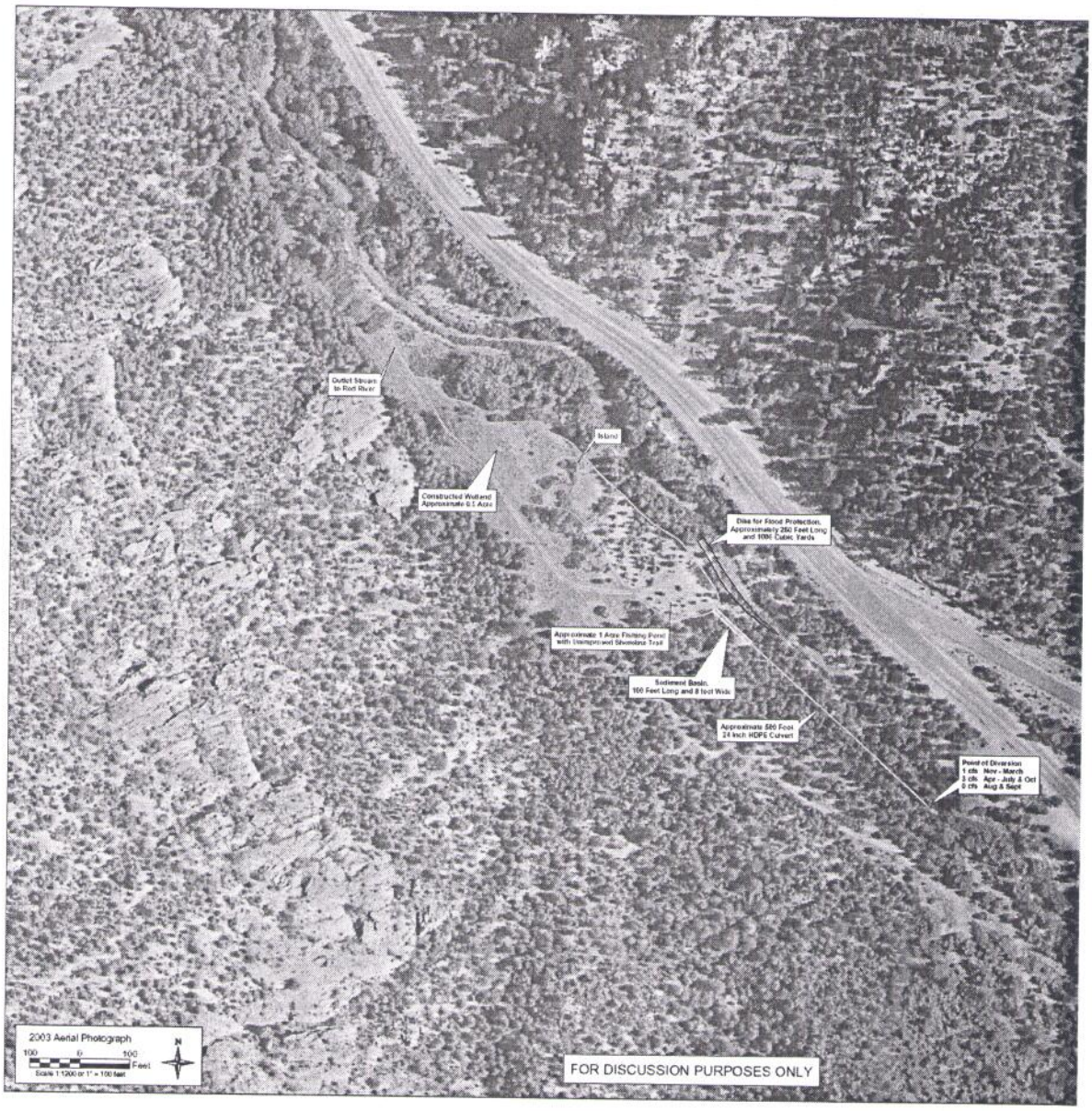
Site natural features: The site is sparsely vegetated and has some areas that have already been excavated. It is surrounded by conifer forest. Groundwater quality in the area is poor.

Site restoration possibilities: Molycorp presented restoration possibilities that were summarized on a GIS site map they produced. Proposed project ideas include constructing a 1 acre fishing pond where the area is partially excavated and a 0.5 acre wetland at the outlet of the pond, with return flow to the Red River. The pond would be used as a put-and-take fishery. The pond would include an island area that might be beneficial habitat for waterfowl nesting or other wildlife use. Water would be diverted from the Red River and routed through a settling basin before entering the pond. A dike would be constructed to protect the area from Red River flood waters. The site could enjoy heavy recreational use because of the adjacent campground.

Funding for management and maintenance of recreational use would be necessary.

Next steps: Concern was noted that sediment build-up in the wetland over a long period of time could potentially present a wildlife risk, if metal concentrations were high in the sediments. Also, an easement may be associated with the power line, which could prevent certain actions from taking place.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on standing density of fish. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat. Terrestrial benefits could be scaled based on area of new wetland habitat created.



Overview of Goathill Campground area proposed restoration site

2.2 Projects Not Visited But Discussed by Group on 4/14/05

Red River embeddedness study

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish and aquatic biota.

Site description: Sections of the Red River have poor aquatic in-stream habitat because poor water quality (low pH, high aluminum) has cemented the substrate, resulting in embedded conditions.

Restoration possibility: Use a small bulldozer or other machinery to dislodge area near the Questa ranger station (1/4 – ½ mile) where cementation has taken place at good flow to see what the effects are. Possible that invertebrates will recolonize area and habitat will improve, or that area will become embedded again because of ongoing poor quality water. Chadwick could identify an appropriate location for study where ongoing monitoring has taken place. Results of pilot study after several years would be useful for community groups to apply for further funding, if pilot study was successful. This idea was proposed by the local ranger, Ron Thibideau. This project could be very well received by the local population who are interested in restoring the main channel of the Red River.

Next steps: Could investigate whether this has been done successfully in other locations.

Scaling/restoration credit ideas: This project is difficult to scale because it is a pilot study only. Results of the study would not result in additional NRDA actions, but would be useful for community groups or other parties.

Groundwater development for drinking water

Resources addressed: Groundwater.

Site description: Communities of Lama or San Cristobal do not have adequate drinking water supplies and well construction is expensive. San Cristobal may be too far away to be an appropriate site.

Restoration possibility: Assist the communities of Lama or San Cristobal with digging additional drinking water supply wells.

Next steps: Should check if the towns are in need of additional groundwater production or if they are just trying to make up for lost yield (if former, should check water rights status).

Scaling/restoration credit ideas: Scale based on amount of clean groundwater provided.

Village of Questa water distribution

Resources addressed: Groundwater.

Site description: Water distribution in the village of Questa is inefficient and results in losses of potable water throughout the system.

Restoration possibility: Questa is working on improving their water distribution system to increase efficiency. The project is thought to be under way but it is unknown if funding is sufficient to finish the project.

Next steps: Bob Haddad will follow up with Molycorp to find out the status of this project.

Scaling/restoration credit ideas: Scale based on amount of water saved.

Village of Questa waste water treatment plant upgrade

Resources addressed: Groundwater.

Site description: The village of Questa needs to improve their wastewater treatment plant, under order from NMED. Specifically, it is not capable of treating/reducing nitrogen compounds and has impacted groundwater beneath the facility. The project is thought to be underway but it is unknown if funding is sufficient to finish the project. Currently, the filtration system at the WWTP is very primitive. The settling/aeration ponds have been newly lined.

Restoration possibility: Contribute funding to enable this project to move forward.

Next steps: Gannet Fleming, Inc. has been hired to prepare a Preliminary Engineering Report (PER) for the Village of Questa. The PER is expected to be out by mid-year. The PER will have some general information on the existing WWTP as well as design alternatives for a new WWTP including approximate costs.

Scaling/restoration credit ideas: Scale based on amount of groundwater protected by improved WWTP and percentage contribution of funding.

Rio Costilla aquatic enhancement

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially riparian habitat. Public access would be allowed.

Site description: The Rio Costilla, downstream of the reservoir, passes through USFS land that contains excellent in-stream and riparian habitat in some areas, with some opportunities for improvement. Downstream of the USFS parcel, the river flows through a heavily grazed portion of land owned by the Rio Costilla Grazing Association. The flow here is dam controlled and during winter months when there is no irrigation taking place, the flow is sufficiently low that it likely limits aquatic life. The site is approximately a 45 minute drive from Questa.

Restoration possibility: Restoration work could include: in-stream habitat improvements, such as log and boulder placements to create additional trout habitat; working with the Rio Costilla Grazing Association to remove cattle from the area downstream of Forest Service property (approx. 2 stream miles); determine if a water right could be purchased to guarantee a minimum instream flow during winter months. Past actions indicate that cattle removal from forest service property was effective in creating very good habitat in approximately 10 years. Increasing water flow would benefit downstream users by increasing water in creek – diversions are downstream of area where flow would be maintained. Flows could benefit approximately 15 miles of stream.

Next steps: Ask Karen Fisher whether water rights purchase and use for instream flow would be feasible, find out about politics of the grazing association (e.g., organizational structure, who should contact them).

Scaling/restoration credit ideas: Scale based on area with improved riparian and in-stream habitat, perhaps based on percentage increase in cover seen with existing USFS restoration. Vermejo Park, upstream of the boundary of National Forest headwaters on the Rio Costilla could serve as a reference area.

McCrystal Creek headgate

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Current headgate on McCrystal Creek can not be shut off when agricultural diversion isn't needed, resulting in losses of water that could maintain in-stream flow and better support fish populations.

Restoration possibility: Replace old-fashioned headgate on McCrystal Creek with a headgate that can be shut off when agricultural diversion isn't needed. The water right belongs to the Forest Service. This action would increase in-stream flow. Probably 35 – 45% of water is lost.

Scaling/restoration credit ideas: Scale based on percentage increase in available water.

Forest Service road near ranger station

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: The Forest service road near the Questa ranger station is entrenched and contributes significant sediment to the Red River. In this area, water quality from metals loading is improved.

Restoration possibility: The road could be reconstructed to remove this source of sediment from the river.

Scaling/restoration credit ideas: Scale based on expected improvement in fish population, if sediment source were removed.

Comanche Creek cutthroat protection

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Rio Grande cutthroat trout in Comanche Creek lack an effective barrier to keep the population genetically pure. Location is confluence of Comanche and Rio Costilla.

Restoration possibility: A fish barrier could be put in to allow the cutthroat trout population to expand without concern of hybridization with other trout. USFS already working on designs, but funding not available. 401, 404, and USACOE permits are in place; NMED permit is in progress. Need to take out existing culverts and put in smooth-bottomed culverts which will serve as a fish barrier during low water and high water because of increased velocity.

Scaling/restoration credit ideas: Scale based on expected increase in habitat available for Rio Grande cutthroat trout.

Stream Crossing improvements – Comanche Creek and North Ponil Creek

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Comanche Creek is a pure Rio Grande cutthroat trout stream. Motorized vehicles cross the creek at low water areas and generate sediment and degrade water quality.

Restoration possibility: Replace low water crossing with open bottom culvert. Ben Kuykendall identified 4 locations in Comanche Creek and one location in North Ponil Creek where this could take place. Mud is eliminating spawning gravel.

Scaling/restoration credit ideas: Scale based on expected improvement in habitat available for Rio Grande cutthroat trout in areas with high sediment load versus no sediment load.

Obliterate road and return to natural contours – Chuck Wagon Creek and Gold Creek

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Road bed in creek causes sedimentation and reduces habitat quality.

Restoration possibility: Remove old road beds and return the area to its natural contours to reduce sediment input into Chuck Wagon Creek and Gold Creek. Each creek would improve approximately 2 miles of habitat.

Scaling/restoration credit ideas: Scale based on expected improvement in habitat available for fish in areas with high sediment load versus no sediment load.

Mitigation of off-road vehicle impacts to the watershed

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially riparian vegetation.

Site description: Off-road vehicles can create erosion and sedimentation problems and degrade streambanks.

Restoration possibility: Mitigating off-road vehicle impacts could involve a variety of activities including redirecting ORV traffic away from sensitive areas, revegetating eroded areas, and reconstructing streambanks if damaged.

Scaling/restoration credit ideas: Scale based on expected improvement in habitat available for fish in areas with high sediment load versus no sediment load.

General road improvements in the watershed

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish. Secondary resource: terrestrial habitat, especially riparian vegetation.

Site description: Poorly engineered roads near streams degrade riparian and surface water resources. Ben mentioned possibility of roads located upstream of the town of Red River needing some improvements but this has not been verified.

Restoration possibility: Possibilities vary depending on specific problems: relocation away from stream, culvert replacement/modification, ORV education programs, etc.

Next steps: Talk to forest ranger, George Long, and other parties to determine need for projects and identify priorities.

Scaling/restoration credit ideas: Scale based on expected improvement in habitat available for fish in areas with high sediment load versus no sediment load.

Shuree ponds improvement; Valle Vidal area

Resources addressed: Primary resource: surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Public use area with heavy fishing activity. 2-3 ponds with one dedicated to children-only fishing. One of the ponds is not holding water properly (this might be the pond dedicated to children's fishing). Use from both tourists and local population. Very diverse public use. Very scenic and high quality fishing. Very heavy use. (1 hr+ from Questa).

Restoration possibility: Repair eroded spillway so that water levels are maintained and fish can survive.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected increase in standing density of stocked fish in the pond after spillway repair. A "scaler" could be used to convert between density of stocked fish and density of naturally reproducing fish in a natural stream habitat.

Improve winter range for bighorn sheep

Resources addressed: Primary resource: terrestrial habitat, especially relevant for uplands.

Site description: Bighorn sheep that have been transplanted to this area need improved winter range. USFS transplanted the sheep from the Pecos wilderness area. Sheep coming down to highway pose a danger to the population and the success of the relocation project.

Restoration possibility: Prescribed burns east of Molycorp property on FS land to improve forage for winter habitat. This would keep the sheep away from the Molycorp area and away from the highway. Need authorization from NMED for air quality. This and other required authorization should not be difficult or complicated to get.

Scaling/restoration credit ideas: Scaling for habitat enhancement could be based on expected increase in rangeland productivity following prescribed burns. Important for the state and the USFS. Approximately 400 acres for burn (need to check acreage with George).

Rio Grande box recreational facilities development

Resources addressed: Primary resource: aquatic habitat.

Site description: Launch location for river rafters lacks recreational facilities (toilets, etc.), leading to water quality impacts

Restoration possibility: Install recreational improvements such as toilets, to avoid water quality impacts in area that receives heavy human use.

Scaling/restoration credit ideas: Scaling for project could be based on expected decrease in coliform bacteria following toilet installation.

Cebolla Mesa trail improvement

Resources addressed: Primary resource: aquatic habitat.

Site description: The Cebolla Mesa trail needs upgrading and maintenance to avoid sediment impacts to stream.

Restoration possibility: Improve trail on Forest Service property to reduce sediment loads. Install bridge at bottom of gorge to replace existing rotting log bridge which is a safety hazard.

Scaling/restoration credit ideas: Scale based on expected improvement in habitat available for fish in areas with high sediment load versus no sediment load.

Septic system concerns in Lama or San Cristobal

Resources addressed: Primary resource: groundwater.

Site description: Septic systems might be affecting groundwater negatively in these areas

Restoration possibility: Improvements to septic systems to avoid potential groundwater impacts.

Next steps: Determine if there is a need for this project, or if any current groundwater data exist

Scaling/restoration credit ideas: Improvement to groundwater based on percentage reduction in contaminants such as coliform bacteria or nitrates.

Public education about beavers and restoration

Resources addressed: Primary resource: groundwater.

Site description: There is a belief within the watershed that beaver are costing the down stream users their water, and incidences of destruction of beaver dams and even of the creatures themselves have occurred.

Restoration possibility: Creation of brochures, signs, etc., educating public on role of beavers in ecosystems and other environmental/restoration issues (purpose/benefits of restoration).

Scaling/restoration credit ideas: Improvement to groundwater based on expected increase in water table height when beavers are restored to an area.

Funding for promotion of outdoor activity related tourism

Resources addressed: Primary resource: surface water.

Site description: Mining impacts to the Red River watershed may have depressed tourism in the local area.

Restoration possibility: Monies would be set aside to promote local outdoor tourism activities in cooperation/ partnership with local chambers of commerce in affected towns.

Scaling/restoration credit ideas: Funding could be set as equivalent to the cost of stocking the Red River with trout in the area where surface water impacts occur.

Restore Rio Grande cutthroat trout in Comanche Creek

Resources addressed: Surface water habitat, especially relevant for compensating for instream injuries to fish.

Site description: Comanche Creek is a pure Rio Grande cutthroat trout stream. This project connects with two other projects in Comanche Creek: Comanche Creek cutthroat protection and stream crossing improvements.

Restoration possibility: After the habitat is isolated from nonnative fish, Rio Grande cutthroat trout could be restored across the entire 20 mile habitat reach.

Scaling/restoration credit ideas: Funding could be set as equivalent to the cost of stocking the Red River with trout in the area where surface water impacts occur.

Red River WWTP sludge-drying basin lining

Resources addressed: Groundwater.

Site description: Red River WWTP may need to line its sludge-drying basins. Further investigation of this project is needed to determine status of facility.

Restoration possibility: Financial contribution to allow sludge-drying basins to be lined appropriately to avoid groundwater impacts.

Scaling/restoration credit ideas: Credit based on amount of groundwater thought to be impacted by current unlined sludge-drying basins. If data is unavailable, scaling could be based on the volume of water treated by the WWTP.

Red River underground storage tank remediation

Resources addressed: Groundwater.

Site description: There may be problems with hydrocarbon contamination of the groundwater due to leaking USTs in the Town of Red River.

Restoration possibility: More investigation of this project is needed. Project might involve an investigation study, tank replacement/removal, groundwater extraction/clean-up, etc.

Scaling/restoration credit ideas: Credit based on amount of groundwater thought to be impacted by current underground storage tanks.

Development of water conservation ordinances

Resources addressed: Groundwater

Site description: Inefficient use of water resources limits potential beneficial uses of water.

Restoration possibility: Developing water conservation ordinances would promote more efficient use of scarce water resources.

Scaling/restoration credit ideas: Credit based on amount of groundwater thought to be saved by conservation.

Construction of small retention dams for groundwater storage

Resources addressed: Groundwater.

Site description: Decrease in beaver activity has lowered groundwater levels throughout the regions where beavers had dominated.

Restoration possibility: Construction of small dams that are human engineered "beaver analogues," approx. 1-1/2 feet high.

Scaling/restoration credit ideas: Storage of groundwater through creation of a small pond, increasing infiltration of surface water into the soil.

3. Proposed Project Selection Criteria

The goal of the selected restoration projects will be to restore, rehabilitate, replace, enhance, or acquire the equivalent of the natural resources and natural resource services that may have been injured as a result of hazardous substance releases from the Molycorp site. In order to assess the potential of each project to meet these goals, project evaluation and selection criteria have been developed.[1]

3.1 Screening Criteria

Screening criteria are used as the first step in project evaluation. Projects must pass screening criteria before they can be considered further in the evaluation process. The following screening criteria will be used by the Trustees to determine whether a proposed project meets minimum standards of acceptability. To be acceptable, a project must:

- Address the type of resources potentially injured by releases from the Molycorp facility, or the services lost as a result of injuries
- Comply with applicable and relevant federal, state, and local, laws and regulations
- Not detrimentally affect public health and safety
- Be technically and administratively feasible
- Not conflict with any ongoing or planned response or remediation work
- Provide a net environmental benefit.

3.2 Evaluation Criteria

If projects meet the screening criteria, then evaluation criteria are applied to further evaluate and rank the potential restoration projects. These criteria reflect the Trustees' priorities for restoration and are divided into three categories: relevance to the NRDA; degree of benefit; and feasibility and cost criteria. The specific criteria falling under these categories are described below.

1. These criteria were outlined in the draft confidential memorandum Proposed Project Selection Criteria, sent to the Molycorp Trustee Group on 1/24/2005.

3.2.1 Relevance to the NRDA

The Trustees prefer projects that are highly relevant to the natural resource injuries and service losses that are the focus of this NRDA. Projects will be evaluated based on their:

- Location in or nearby the Red River watershed
- Strong nexus to injured resources or lost services
- Provision of benefits to multiple natural resource categories, or to multiple resources within a category
- Fit within a comprehensive project "suite" that addresses all of the natural resource injuries and service losses.

3.2.2 Degree of benefit

The Trustees prefer projects that provide significant, long-term, quantifiable, and desirable benefits. Projects will be evaluated based on their:

- Acceptability to the public
- Consistency with existing consensus-based regional and watershed planning efforts
- Scalability: the project must have quantifiable benefits so that it can be "scaled" to offset a certain amount of resource injury or service loss
- Provision of benefits rapidly after project implementation
- Maintenance of long-term project benefits
- Restoration of ecosystem processes or enhances watershed function.

3.2.3 Feasibility and cost criteria

The Trustees prefer projects that use NRDA funding wisely. Projects will be evaluated based on their:

- Cost-effectiveness compared to similar project benefits
- Costs for operation, maintenance, and monitoring
- Need for NRDA funding for success of the project.

The Trustees prefer projects with high likelihood of success. Projects will be evaluated based on:

- The potential for success, from engineering and/or biological points of view, based on past results from similar projects
- The ability to be monitored and measured for success evaluation
- Whether adaptive management can be used to address and remedy any problems.

Administrative process (completion of appropriate state and federal permits, NEPA documents, and endangered species act consultations) is expected to be straightforward and without a high level of cost, complexity, or uncertainty.

4. Next Steps: Project Ranking and Scaling

In the next phase of restoration planning, the Trustees will begin to narrow down the list of projects. Application of the screening criteria will remove any projects which are not acceptable under these minimum criteria. Any actions or information gathering identified under the "Next Steps" heading for each project in Section 2 of this memorandum should continue to be pursued for the acceptable projects. Once the necessary information has been gathered, the Trustees will apply the evaluation criteria to proposed projects in a fair, unbiased, and impartial manner. Projects will be evaluated by assigning "low, medium, high" for each criteria. Low will be assigned a value of 0, medium will be assigned a value of 5, and high will be assigned a value of 10. Total project scores will be summed to give an overall numerical score. For the criteria involving cost (benefit/cost ratio and cost-effectiveness), projects will be compared using estimated values for benefits and costs. The application of these steps will result in a ranking of the potential projects, most likely by category. By this time, the Trustees will have a good idea of which projects will proceed to a full scaling analysis. Any remaining information necessary for project scaling will need to be collected before the process can continue. Current meetings to address scaling are currently scheduled for June 14 (initial restoration scaling, in Boulder) and July 13 (in Albuquerque).