DRAFT ENVIRONMENTAL ASSESSMENT

Dutchman Wetland Land Transfer
Anaconda-Deer Lodge County, Montana

(Dutchman Wetland, looking west towards the Anaconda smelter)

MONTANA FISH, WILDLIFE & PARKS
3201 Spurgin Road
Missoula, Montana 59804

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INTRODUCTION

This Environmental Assessment (EA) evaluates the proposed property transfer of the Dutchman wetland under the requirements of the Montana Environmental Policy Act (MEPA). Montana Fish, Wildlife & Parks (FWP) proposes to obtain by donation approximately 3,750 acres, locally known as the Dutchman wetland, from Atlantic Richfield Company (AR). The property is located one mile west of the town of Warm Springs, Montana. This property transfer would help fulfill the State of Montana's wetland restoration requirement as described in the April 1999 Streamside Tailings Consent Decree. The proposal would also protect public access and exceptional wildlife habitat values associated with the natural wetlands present at the site. The property is located within the Anaconda Smelter superfund site. FWP anticipates the acquisition would be completed concurrent with the upcoming federal Anaconda Consent Decree estimated to occur in Spring 2007.

Three associated easements are proposed in conjunction with the Dutchman wetland transfer. The first is an access easement that will provide for public road access to the northerly portion of the property. The second and third easements will be 200-feet wide conservation easements, each approximately one mile in length along Lost Creek and Warm Springs Creek. These easements are intended to enhance the streamside corridors and protect riparian vegetation along the creeks after restoration and remediation. The easements will prohibit actions that may have detrimental impacts on the restored stream corridors.

CHAPTER 1 – PURPOSE OF AND NEED FOR ACTION

This chapter describes the purpose and need for the Proposed Action (Dutchman wetland land transfer) and the alternatives considered in this analysis.

1.1 Background Information

In 1999, the U.S. District Court approved a partial consent decree between the State of Montana and AR; this decree settled a substantial portion of the State's claims against AR for natural resource damages within the Upper Clark Fork River Basin. The consent decree established a $118 million Upper Clark Fork River Basin Restoration Fund for restoration projects in the basin. A related federal consent decree, the Streamside Tailings Consent Decree (the Consent Decree), filed contemporaneously, earmarked up to $3.2 million of the Upper Clark Fork River Basin Restoration Fund for wetlands/riparian areas restoration costs incurred by the State of Montana. Paragraph 22 of the Consent Decree states:

> Within 10 years of the effective date of the Consent Decree, the State shall create up to 400 acres of any combination of the following in the Clark Fork River Basin: (a) newly constructed wetlands or restoration of destroyed wetlands; (b) enhancement of existing wetlands; and (c) enhancement of riparian areas on or along the Clark Fork River or its

> tributaries. In fulfilling the requirements of this paragraph, the State shall not be required to incur more than $3,200,000 in wetlands/riparian areas restoration costs.

The Streamside Tailings Consent Decree calls for FWP to develop a State Wetlands/Riparian Areas Plan, in consultation with the United States Fish & Wildlife Service (USFWS). FWP, with the assistance of the Department of Justice's Natural Resource Damage Program (NRDP) and USFWS, spent several years working with AR and the former owners of the Dutchman wetland—Ueland Ranches Inc. (the Uelands)—in order to accomplish a plan that would allow the State and AR to meet their Consent Decree obligations, would be mutually beneficial, would benefit the public, and would lead to restoration and perpetual protection of wetlands and waterways in the Upper Clark Fork River Basin.

1.2 Summary of Outline

In May 2005, FWP, AR and the Uelands signed the Warm Springs Creek / Dutchman Creek / Lost Creek and Willow Creek Outline. This document identified terms, goals and possible obligations for each party across the Warm Springs Creek, Willow Creek and Dutchman area.

Under the Outline, FWP would commit to use the remaining Wetlands/Riparian Areas Restoration Costs for the following component of the Proposed Action:

- *Accept ownership, provide future management, and designate the Dutchman area as a Wildlife Management Area in perpetuity.*

AR would commit to:

- *Donate the 3,750 acre Dutchman area to FWP;*
- *Grant a perpetual conservation easement on Warms Spring Creek within Section 32 (T5N, R10W); and*
- *Grant a perpetual easement to ensure reasonable public access from the county road to the north boundary of the Dutchman area.*

The Uelands would commit to:

- *Grant a perpetual conservation easement on Sections 20 and 29 (T5N, R10W) on Lost Creek; and*
- *Install a public access roadway north of the Dutchman area to FWP specifications.*

Under the Outline, FWP would commit to further use the above referenced moneys plus allowed UCFRB Restoration Fund moneys for the following components related to the Proposed Action but <u>not</u> evaluated as part of this EA:

- *Complete remedial design/remedial action and restoration for a portion of the lower Willow Creek riparian corridor; and*
- *Complete remedial design/remedial action and restoration for the lower Warm Springs Creek riparian corridor, beginning near the Galen Road and ending at the Clark Fork River.*

AR would:

- *Transfer water rights previously owned by the Uelands (as described in section 3.2.1 of this draft EA);*
- *Provide access to AR owned or controlled properties related to the restoration activities;*
- *Transfer a designated area on Willow Creek to the Department of Environmental Quality; and*
- *Dispose of excavated creek materials, or provide reimbursement for these costs.*

Additional elements of the Outline, which discuss limitations on environmental liability, and coordination with other State and federal agencies, are evaluated in later sections of this EA. The goal of FWP and AR is to include additional Outline components in the upcoming federal consent decree.

1.3 Purpose of the Proposed Action

The purpose of the Proposed Action is to:

1. Satisfy the requirements of Paragraph 22 of the Consent Decree;
2. Protect in perpetuity exceptional wildlife habitat values associated with natural wetlands in the area;
3. Meet FWP goals to protect, enhance and regulate fish and wildlife resources;
4. Increase public access to land in the Upper Clark Fork River Basin.
5. Increase instream flow rights in Willow, Lost, and Dutchman Creeks (as described in Chapter 3.2.1 of this draft EA).

1.4 Need for the Proposed Action

Satisfy the Streamside Consent Decree requirements: Paragraph 22 of the consent decree requires the State to expend up to $3.2 million to create up to 400 acres, in any combination, of the following in the Clark Fork River Basin: (a) newly constructed wetlands or restoration of destroyed wetlands; (b) enhancement of existing wetlands; and (c) enhancement of riparian areas on or along the Clark Fork River or its tributaries. The consent decree requires assurance that the areas be protected in perpetuity. The Consent Decree has similar requirements for AR, as well as another natural resource damage trustee, the Confederated Salish and Kootenai Tribes of the

Flathead Reservation (the Tribes). The Tribes are satisfying their Consent Decree obligations by restoring portions of the Jocko River Basin.

The donation of the property by AR and FWP's designation and management of the property as a Wildlife Management Area, in conjunction with FWP's creek restoration projects, would fulfill the consent decree requirements for both FWP and AR.[1]

Preserve, protect and enhance the largest remaining historic wetland in the Basin: The proposed acquisition would preserve, protect and enhance the last remaining natural wetlands near Opportunity. This historic wetland existed prior to western expansion and is noted on an 1869 General Land Office map (*Fig. 1*). It is the largest single wetland in the Upper Clark Fork Basin.

A USFWS wetlands assessment of the property rated the Dutchman wetland as 2.3 on a scale of 3.0. This rating of wetland value considers the functional effectiveness of the wetland. The property's moderate rank could be closer to 3.0 with proper restoration and management. The Dutchman wetland provides a diverse mixture of wetland, riparian and upland habitats including aspen groves, spring fed creeks, shrub fields, wet meadows, riparian willow corridors and wetland habitats. The quality of these habitats and ecological function of the wetland would be improved by restoration. Restoration is more efficient, cost-effective and successful than creating new wetlands, which may not mimic native wetlands.

Enhance wetland, fish and wildlife values: The proposed acquisition provides a natural corridor for fish and wildlife connecting the Clark Fork River with the Flint Creek Mountain Range. The wetland borders Warm Springs Wildlife Management Area to the east and would result in a total of over 8,000 acres of protected lands in this part of the Upper Clark Fork River Basin. FWP acquisition of the parcel would protect and enhance essential habitat for species of special concern in the Warm Springs Creek and Lost Creek corridors, including a resident population of bull trout in Warm Springs Creek. Management of the area for wildlife, fisheries and water production by FWP will benefit Montana's natural resources. EPA has found that well vegetated conditions within the Dutchman area will adequately protect wildlife exposures to contaminants of concern.

Public access: The proposed action will enhance public access in the Upper Clark Fork River Basin by establishing permanent public access on the property using an easement to the wetland from a county road to the north. Walk-in access for hunting, fishing and wildlife viewing would be ensured if the acquisition were completed. The citizens of Montana will benefit from this action.

[1] The consent decree requires USFWS agreement that the State has satisfied its Paragraph 22 obligations. USFWS agreement is a condition of transfer (see section 1.10). USFWS participated in the negotiations between FWP, AR and the Uelands, and has supported this transfer.

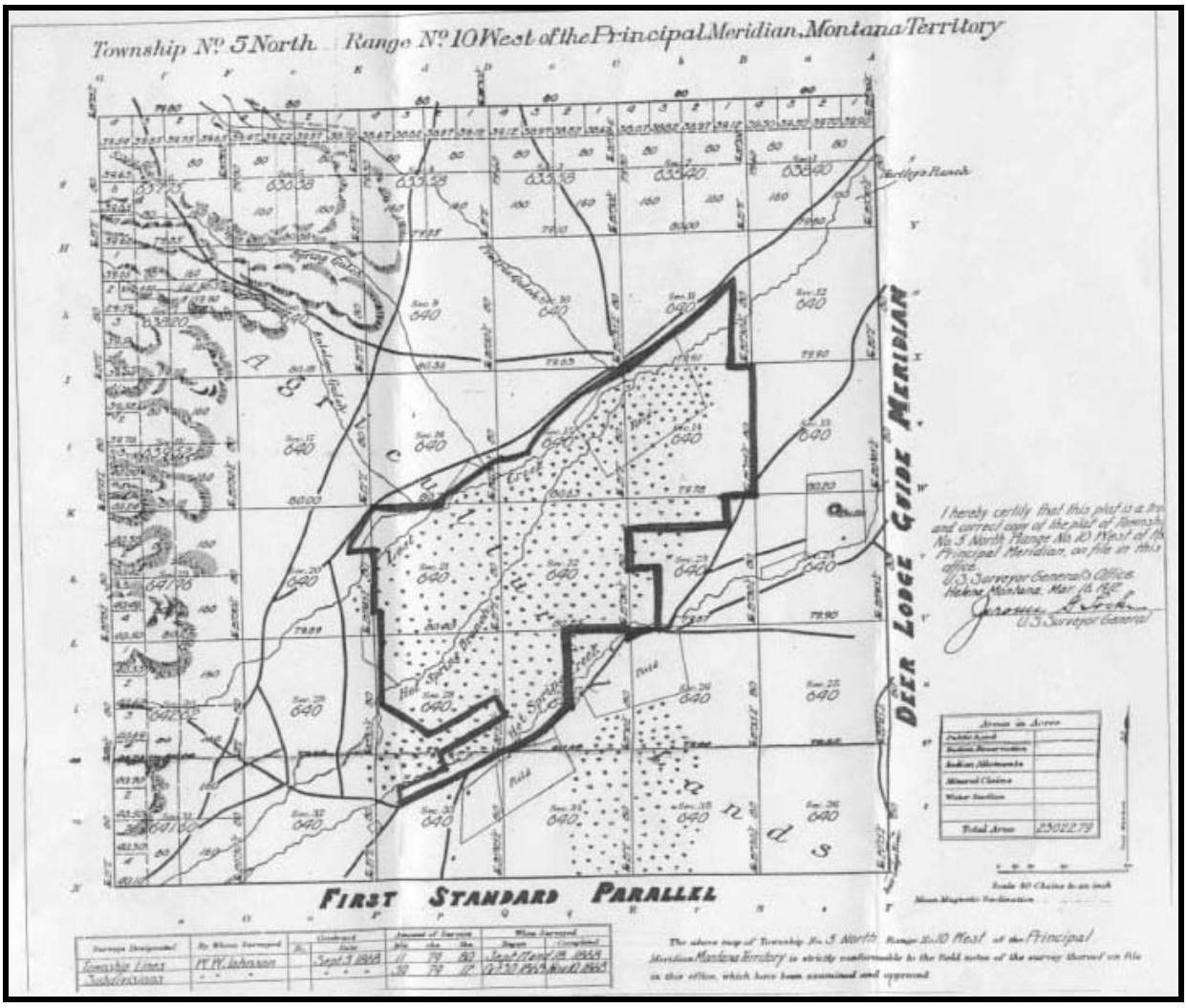

Fig. 1. Delineation of Dutchman wetland on the 1869 General Land Office map.

1.5 Area Description

Location: The Dutchman wetland is located about 1 mile west of Warm Springs in Deer Lodge County, Montana. The property is legally described as Tract A of recorded Certificate of Survey 361B and includes portions of Sections 10, 11, 14, 15, 16, 20, 21, 22, 23, 26, 27, 28 and 33, Township 5 North, Range 10 West, lying north of Montana State Highway 48 and about one mile east of Highway 273. The Warm Springs Wildlife Management Area, which is adjacent to the Dutchman property and encompasses about 4,700 acres, is situated along the east boundary of the proposed transfer (*Fig. 2, Fig. 3*). The existing WMA land is primarily owned by the State of Montana (through the Department of Institutions) and AR, but managed by FWP through temporary agreements.

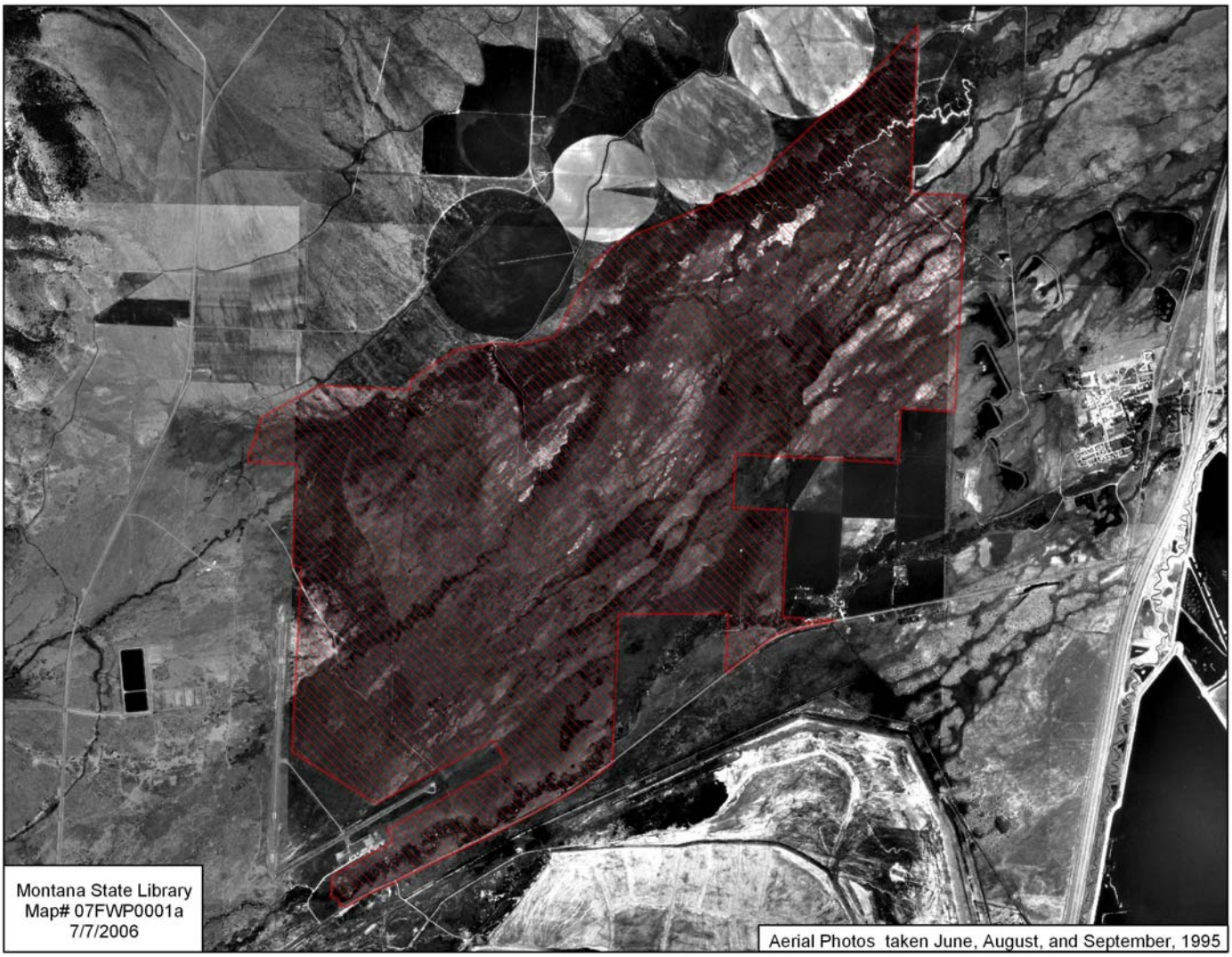

Figure 2. Aerial photo of the proposed Dutchman wetland transfer (shaded in red).

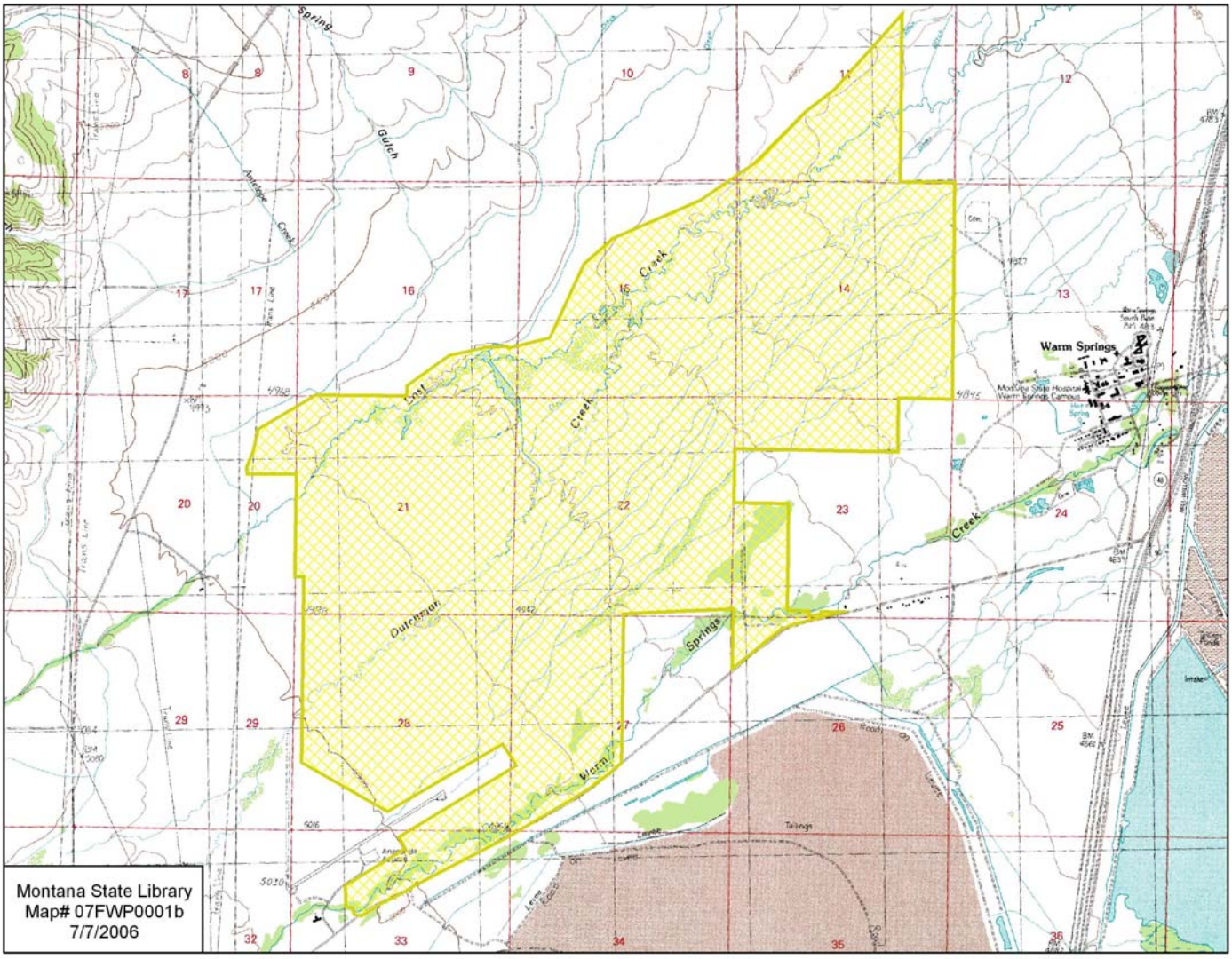

Figure 3. Topographic map of the proposed Dutchman wetland transfer (shaded in yellow).

The Lost Creek 200'-wide protective easement is located in Sections 20 and 29, (Township 5 North, Range 10 West) running on either side of Lost Creek from Highway 273 northeast to the west boundary of the Dutchman wetland. The Warm Springs Creek 200'-wide protective easement is located in Section 32, north of Montana Highway 48. Each of these easements would cover about 20 acres. The road easement for public access will be located in Section 16 running south from the county road adjacent to DNRC land and terminating at the north property line of the Dutchman wetland area.

Resources: The property is composed of upland, wetland and riparian habitats located along Dutchman Creek, Lost Creek and Warm Springs Creek. Much of the area is covered with shallow surface water in the spring of the year, and provides extremely valuable habitat for waterfowl and shorebirds. The wetland has several spring fed creeks, which flow freely year-round and provide water and habitat for large mammals, birds, fish and plants. The area constitutes the largest block of wetland habitat in the Upper Clark Fork River Basin.

Due to its exceptional habitat quality and unique location, the positive impacts to fish and wildlife populations from restoration of the Dutchman wetland would be significant. A wide variety of wildlife utilizes the property. Black bears, moose, mountain lion, white-tailed deer, mule deer and many smaller mammals use the site. These lands provide fall, spring and winter range for the Flint Creek Mountain Range elk and mule deer populations.

At least nineteen species of waterfowl and many shorebird species inhabit the site. The property includes important nesting and summer habitat for an expanding population of greater sandhill cranes. The native grassland supports a full complement of ground nesting bird and small mammal species as well as rare and threatened plants such as mealy primrose. One federally protected fish species, the bull trout, inhabits the project area. Bald eagles, also a federally protected species, nest nearby and utilize the property for feeding and resting habitat.

Impacts: Aerial and fluvial deposition of acidic and metal smelter emissions and mine wastes from past smelting operations resulted in over 3,000 acres of land within the Dutchman wetland area that contain surficial soils exceeding 1,000 milligrams per kilogram (mg/kg) of arsenic. (This is the open space/recreational/agricultural land use cleanup level for arsenic, which was established by EPA in the Anaconda Regional Water Waste and Soils Record of Decision, EPA 1998, and is discussed in sections 1.6 and 1.8).

Although the soils in this area have high concentrations of the contaminants of concern the Dutchman wetland is well vegetated due to sub-irrigation from a shallow groundwater table. Mining and processing wastes containing hazardous substances have impacted the area's water, soil, riparian and upland vegetation. The primary contaminants of concern are arsenic, copper and zinc.

The Dutchman wetland has a long history of domestic animal grazing. The property was an integral part of the Anaconda Company's ranch operation, known as the Mt. Haggin Ranch. The Anaconda Company raised cattle and sheep to show that mining and smelting could co-exist with livestock production. Ultimately, the Anaconda Company left the livestock business and sold the operation to individuals who retained the ranch's name and operations. Long-term grazing has had a negative effect on the Dutchman property. Losses of woody vegetation, over-grazing of grasslands, draining of wetlands, stream re-channeling and stream bank/wetland trampling have all contributed to habitat degradation.

Current Uses: AR has allowed short term grazing on the Dutchman wetland. The area is used for walk-in upland bird, waterfowl and big-game hunting as part of the FWP Block Management program. Public motorized access is limited to designated Block Management Area travel routes and parking areas.

1.6 Relevant Projects and Plans

The following plans are relevant to this EA:

Warm Springs Creek/Dutchman Creek/Lost Creek and Willow Creek Outline for Atlantic Richfield/ARCO Environmental Remediation/FWP/Ueland Ranches/UEPA Agreement (May 2005)—(*summarized in Section 1.2)*

Dutchman Wetland Area Draft Management Plan (July 19, 2006)—The draft management plan provides the plan for operations and maintenance of the Dutchman wetland as a Wildlife Management Area. The draft plan is focused on controlling noxious weeds, soil erosion, improvement of vegetation communities and public access (*Appendix A – Draft Management Plan*).

Dutchman Wetland Socio-economic Report—This socioeconomic evaluation addresses the fee title transfer of property presently owned by the Atlantic Richfield Company (AR). The report addresses the physical and institutional setting as well as the social and economic impacts associated with the proposed fee title transfer (*Appendix B – Draft Socio-economic Report*).

Draft Final Design Report, Dutchman Creek High Arsenic Area (November 2004)—This report presents the EPA's draft design background and design criteria for the remediation of the Dutchman Creek High Arsenic Area. (This contaminated area is on the National Priorities List and lies within the Anaconda Regional Water, Waste and Soils Operable Unit of the Anaconda Smelter). Since arsenic soil concentrations will remain above the cleanup level of 1,000 mg/kg, the Dutchman wetland must be managed as open space with access restricted to non-motorized use. The draft Final Design Report includes the following specific remediation requirements for the project area:

1. *The Dutchman Creek High Arsenic Area (HAA) is restricted to non-developable land owned by Atlantic Richfield or local/state/federal government. Private land cannot be considered as part of the Dutchman Creek HAA. State ownership and management by Montana Fish, Wildlife & Parks is acceptable.*
2. *If data collected under long-term surface water monitoring indicate that surface water contamination during storm events is an issue, engineered storm water controls will be designed as necessary, constructed and maintained for the Dutchman Creek HAA to minimize surface water contamination resulting from storm water runoff.*
3. *Institutional controls (ICs) must be in place to restrict land use. ICs applicable for the Dutchman Creek HAA are restrictive covenants to provide land and ground water use restrictions.*

4. *Ground water monitoring will be required to ensure that arsenic contaminant plumes are restricted to the HAA area. The extent of ground water monitoring will be determined from ground water investigations conducted during the summer of 2002, fall of 2004, and subsequent investigations needed to define the extent of the shallow arsenic plume and to determine long-term monitoring well locations.*

1.7 Public Involvement

The draft Dutchman EA will be released for public comment on July 24, 2006. The comment period will last until August 23, 2006. The EA will be posted on the FWP website and notices will be posted in the *Missoulian*, *Anaconda Leader*, *Helena Independent Record*, *Silver State Post* and *Montana Standard* newspapers. A 30-day public comment period will follow. A public meeting regarding the proposal will be held at the Washoe Fish Hatchery in Anaconda, Montana on August 10, 2006. The decision notice will be issued after the close of the public comment period in August of 2006. An opportunity for additional public comment will be provided at the FWP Commission and State Land Board meetings when the proposal is scheduled for review.

1.8 Agencies with Jurisdiction and Coordination Requirements

FWP has full jurisdiction over the Proposed Action with transfer of the land interests to FWP subject to the approval of the FWP Commission and the Board of State Land Commissioners. FWP is consulting with the DEQ, USFWS and the EPA to complete a plan that would allow the State and AR to meet their Consent Decree obligations.

The Dutchman wetland is part of the Anaconda Smelter federal Superfund site, which is regulated by the EPA. Soils within the wetland exceed allowable arsenic levels for residential, commercial and recreational uses. The EPA considered the following requirements when determining remedial action on the Dutchman wetland portion of the Anaconda Smelter site:

Endangered Species Act (ESA)—There is one ESA-listed species found within the project area—the "threatened" bull trout (*Section 3.7*).

Executive Order 11990—EPA is required to minimize the destruction, loss or degradation of wetlands and to preserve and enhance the natural and beneficial values of wetlands when carrying out its responsibilities. This "no net loss" requirement is an important factor because it is not possible to lower arsenic values to acceptable levels within the Dutchman wetland without destroying the wetlands.

Section 404 of the Clean Water Act—The act requires that no discharge of dredged or fill material be permitted if a practicable alternative exists that is less damaging to the aquatic environment.

In order to provide protection of human health and the environment under superfund, EPA's remedy for the Dutchman area is to limit human use of the area rather than the wholesale destruction of the wetlands. EPA has determined that use of the area as a Wildlife Management Area would be protective of human health and the environment, even though the soils in the area exceed the recreational standard. This determination is based on a Wildlife Management Area's restrictions on motorized vehicles, and on the high level of vegetation in the Dutchman area. Both of these factors would limit exposure to arsenic in the soils (CDM, 2004).

The Dutchman wetland comes under the jurisdiction of USFWS due to the presence (and potential presence) of ESA endangered and threatened species. USFWS also has a role due to its need for concurrence with the requirements of Paragraph 22 of the Consent Decree.

1.9 Applicable Permits, Licenses or Entitlements

Montana law (MCA 7-22-2154) requires that prior to receipt of real property by a public entity, the property be inspected by the county weed management district and that a weed management agreement be developed. FWP is currently working with the county weed management district to finalize a plan. Other than weed management, the Proposed Action does not include activities that require local, State or federal permits or licenses.

1.10 Agency Decisions to be Made

The FWP Region 2 Supervisor must decide if an EA is the appropriate level of analysis. If the selected alternative would significantly affect the quality of the human environment, then FWP must re-evaluate the Proposed Action, explore other alternatives or expand the analysis to an EIS. If an EA is sufficient, then the Proposed Action or the No Action alternative will be selected and an appropriate decision notice will be issued. With selection of the preferred alternative the acquisition may proceed to the FWP Commission for approval and if approved by the Commission, the proposal will be brought before the Montana Board of State Land Commissioners for final approval.

1.11 Legal Conditions

Transfer would only occur under the conditions set forth, and in accordance with, the May 2005 *Warm Springs Creek / Dutchman Creek / Lost Creek and Willow Creek Outline,* including the following conditions especially pertinent to the Proposed Action:

1. Compliance with MEPA, including all applicable public notice and participation requirements;
2. Approval of the Fish, Wildlife & Parks Commission;
3. Approval of the State Land Board;
4. Attainment by FWP of all necessary funding, including $0.5 million from

USFWS for Dutchman WMA management, approximately $2.8 million in wetlands/riparian areas restoration costs for the Willow Creek restoration/remedial action and approximately $7 million from the Upper Clark Fork Basin Restoration Fund for the Warm Springs Creek restoration/remedial action;

5. Availability from AR to FWP of the water and water supply through AR's water rights from Warm Springs Creek, Lost Creek, and Dutchman Creek, subject to certain listed limitations, resulting in instream flow on Warm Springs Creek to the confluence of the Clark Fork River;
6. Agreement from the United States that FWP's acquisition of the Dutchman wetland is pursuant to Section 104(j) of the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) or an equivalent mechanism, and approval of the institutional controls proposed by FWP;
7. Approval of the United States and the State of the Wetlands Riparian Areas Plan or conceptual designs for the remedial actions to be performed by FWP;
8. Transfer of the Dutchman property by AR to FWP with agreed upon appropriate covenants;
9. Assignment by AR to FWP of an acceptable perpetual easement to ensure reasonable public access from the north to the Dutchman wetland, and installation of the public access roadway by Ueland Ranches to FWP specifications;
10. Acceptable perpetual conservation easements for protecting FWP restoration actions performed on Lost Creek and Warm Springs Creek;
11. Covenants not to sue and releases from AR, EPA and the Uelands**;**
12. Written notice from USFWS that the requirements of Paragraph 22 of the Consent Decree and the State Wetlands/ Riparian Areas Plan have been met; and
13. Approval of the Governor.

1.12 Environmental Liability Concerns

The Dutchman Wetland Area is part of the Anaconda Smelter Superfund site. Under the federal Comprehensive Environmental Response Compensation and Liability Act (CERCLA), the State could gain environmental liability by being the property owner of the WMA. This liability could include the cost of cleanup.

However, Congress anticipated that at times, the best use of certain property would be to have it in governmental hands. Congress therefore included CERCLA Section 104(j). Section 104(j) provides that a State agency will not be liable under CERCLA as a result of acquiring property, if the property is acquired through Section 104(j). FWP will require as a condition of acquisition that the property is acquired through Section 104(j).

The State's liability will be further limited by the incorporation of the acquisition into a federal CERCLA consent decree. FWP will require as a condition of acquisition that the acquisition be incorporated into a federal CERCLA consent decree. This will allow the State to receive

appropriate covenants for CERCLA and other environmental laws in the consent decree as well as contribution protection, thereby further limiting possible State environmental liability.

CHAPTER 2 – ALTERNATIVES, INCLUDING THE PROPOSED ACTION

This section describes the alternatives considered in this EA. These alternatives include detailed analysis of the Proposed Action and the No Action Alternatives. Other alternatives are described that were considered, but dismissed as not feasible for further analysis. (*Table 2,* found at the end of this section, compares the main features of the two alternatives analyzed in this EA).

2.1 Description of Alternatives

2.1.1 Alternative A - No Action

Under the No Action Alternative, FWP would not acquire 3,750 acres of AR lands (and associated easements) located in Sections 11, 14, 15, 16, 20, 21, 22, 23, 27, 28 and 33 in Township 5 North, Range 10 West, of Deer Lodge County.

Montana Fish, Wildlife & Parks would not restore and would not manage the lands under the Dutchman Wetland Draft Management Plan as a Wildlife Management Area. The lands would remain under AR ownership.

If the area is not transferred to FWP for use as a Wildlife Management Area, AR would be required by EPA to prevent motorized recreational access to the property. There is no option for subdividing or selling of the property for commercial or residential development.

Grazing: AR has allowed short term grazing on the Dutchman wetland. Under the No Action alternative, grazing would be prohibited for 5 years until EPA's five-year monitoring process has occurred. Grazing may be re-implemented at that time. Grazing restrictions/prohibitions would be re-evaluated every five years thereafter. Agricultural tillage would be prohibited.

Public Access: In recent years public access has been allowed on most portions of the property through FWP's Block Management Program or by permission of the landowner. Under the No Action alternative, public access would continue to be at the landowner's discretion since the property would be privately owned. Any access allowed would be limited to non-motorized recreational use.

Water Rights: Water rights associated with the parcel would be retained by AR. The No Action alternative would not change or obligate the use of the water rights. AR may use the water for other purposes than providing instream flow to Lost Creek, Dutchman Creek and Warm Springs Creek.

The No Action alternative fails to satisfy the requirements of the Consent Decree. If FWP does not acquire the Dutchman wetland, FWP must seek an extension of time pursuant to the Consent Decree in order to meet its consent decree obligations. FWP will have to construct wetlands, purchase smaller parcels of wetlands or enhance riparian areas within the basin to meet its obligations.

2.1.2 Alternative B – Proposed Action

Under the requirements of the Outline (*Section 1.2*), FWP would commit to use the remaining wetlands/riparian areas restoration funds to:

- Accept ownership, provide future management, and designate the Dutchman wetland as a Wildlife Management Area in perpetuity.
- Accept enforcement and monitoring responsibilities for two small conservation easements along Lost Creek and Warm Springs Creek.

FWP would assume that part of the remedial action requiring institutional controls. These institutional controls would include: refraining from soil disturbance such as tilling, implementing livestock grazing restrictions (including those necessary to assure protection of the enhanced wetlands in perpetuity) and limiting the public to non-motorized use. FWP would also maintain the public access road to the north property boundary after road construction.

Under the Proposed Action, FWP would acquire the Dutchman wetland (and associated easements) which are composed of 3,750 acres of AR lands located in Sections 10, 11, 14, 15, 16, 20, 21, 22, 23, 26, 27, 28 and 33, Township 5 North, Range 10 West of Deer Lodge County. Any mineral interests owned by AR would be transferred to FWP. Upon completion of the plan the acreage of State-owned, publicly accessible lands in Deer Lodge County would increase and FWP would meet the its requirement to restore or enhance 400 acres of wetland/riparian lands within the Clark Fork River basin.

The newly acquired lands would be managed as a Wildlife Management Area by FWP in cooperation with the USFWS and the EPA and under the Management Plan. The wetland would be managed to enhance, restore and create wetland/riparian habitat. In addition, the two small conservation easements along Warm Springs Creek and Lost Creek would be monitored and enforced.

In order to reduce opportunities for release of contamination, motorized vehicular access by the public would be prohibited. A designated parking area near the Dutchman wetland would be identified in the management plan. Vehicular access would be limited to infrequent visits by maintenance workers.

FWP would manage the Dutchman wetland for: (1) highly productive, diverse vegetative communities that provide high quality forage and cover for native wildlife species, with an emphasis on wetland/waterfowl species; (2) recreational opportunities for the public, such as hunting, fishing, watching wildlife, and hiking; (3) wildlife viewing and interpretation; (4) self-sustaining fish populations; and (5) noxious weed control. The existing features and conditions on the Dutchman wetland would be documented to provide a basis for future monitoring efforts. All actions on the Dutchman wetland would be analyzed under the requirements set forth in MEPA. A copy of the Dutchman Wetland Draft Management Plan is included in *Appendix A*.

The proposed action would proceed contingent on:

1. land donation to FWP by AR;
2. attainment of all necessary funding, including Wildlife Management Area management funds, from other sources;
3. $500,000 in matching funds from USFWS for management of the Wildlife Management Area;
4. a commitment to public use of the property; and
5. attainment of the FWP legal conditions provided in the Outline, and summarized in sections 1.11 and 1.12.

Grazing: As part of the proposed action, grazing restrictions or prohibitions would be implemented so that the vegetation in the Dutchman Wetland Wildlife Management Area is preserved and maintained in excellent condition for wildlife habitat in perpetuity. Grazing would be prohibited for the first 5 years and grazing restrictions/prohibitions will be re-evaluated every five years thereafter.

Public Access: In recent years public access has been allowed on most portions of the property through the FWP Block Management Program or through permission of the property owners. The Proposed Action would establish perpetual public access to the property. Public contact and sign-in boxes would specify access points and motorized use would be prohibited.

Water Rights: Water rights associated with the parcel would be retained by AR. AR would grant FWP the right to use the water to supplement instream flow in Warm Springs Creek (as described in Section 3.2.1 of this EA). AR would commit not to remove water from Lost Creek or Dutchman Creek until it passes through the wetland.

Table 2-1 ***Comparison of Alternatives A and B***

Resource Parameters	Alternative A – No Action.	Alternative B – Proposed Action.
Meet Consent Decree requirements	No	Yes
Acreage available for perpetual Public Access	No Change	Increase by 3,750 acres
Grazing	May be reinstated	May be reinstated as long as resource remains protected
Water Rights	Retained by AR, unknown future use	Retained by AR but committed to instream flow
Land Use	Restricted by covenants that dictate: AR or government ownership, no residential or commercial development, no agricultural (tilling), human non-motorized access consistent with private use	Creation of a Wildlife Management Area to adjoin to the Warm Springs Wildlife Management Area
Management Funding	No USFWS matched funds	$0.5 million in restoration funds given to FWP from the Consent Decree Wetlands/Riparian Areas Restoration Costs; matched with $0.5 million in USFWS funds

2.1.3 Alternatives Considered But Dismissed

A variety of smaller private parcels were considered for purchase or placement of conservation easements and FWP contacted other landowners in the Upper Clark Fork River Basin about selling their wetland/riparian lands or including these lands in a conservation easement. Many landowners believed that the Consent Decree stipulations, conservation easement and public access requirements are too stringent and landowners were reluctant to sell their property if major management changes were to be required. Many of the proposed purchases or easements are surrounded by private land and the parcels are small. Since numerous landowners would need to be involved and a patchwork of protected lands would result, FWP found that it was most effective and feasible to pursue the purchase of a single parcel adjoining an existing Wildlife Management Area.

Protecting wetlands in perpetuity and providing public access requires that land interests be held in fee or by partial interests (such as a conservation easement), or through permanent deed restrictions or covenants. Conservation easements were eliminated from consideration because easements with public access clauses are expensive and difficult to negotiate. Deed restrictions and covenants can be difficult to enforce and can be subject to change over time. FWP considered the benefits of wetland restoration versus creation. Restoration of existing wetlands is preferred because it is more efficient, cost-effective and successful than creating new wetlands.

CHAPTER 3 – ENVIRONMENTAL CONSEQUENCES

This Chapter describes the environmental resources associated with the proposed Dutchman wetland acquisition and summarizes the potential environmental consequences associated with each alternative.

3.1 Soils

3.1.1 Existing Environment. The Dutchman property lies within the boundaries of the Anaconda Superfund Site and its soils (mostly fine-grained, mineral soils; USFWS 2005) are contaminated with heavy metals. An EPA sampling effort conducted in 2000 and analysis of surface and subsurface soils showed that the property contains many areas with elevated levels of arsenic and metals. The EPA has designated the entire area as a High Arsenic Area. An inspection by the Montana Department of Environmental Quality in 2004 did not identify any visual or "rogue" waste materials and no tailings or blue salts were observed.

Approximately 60% of the project area is typically inundated from March through July (D. Dziak, Warm Springs Wildlife Area Manager, 2006). Metals present in surface soils on the property are kept sequestered in the soils by flooding and are not subject to movement by wind.

3.1.2 Impacts to Soils from Alternative A – No Action Alternative

Under the No Action alternative, AR would maintain ownership of the property, vehicular access would be prohibited and grazing may be used in the future. The No Action alternative does not include a management plan for soil erosion. The current condition of soils on the property would be maintained and erosion would continue at current levels.

3.1.3 Impacts from Alternative B – Proposed Action

The FWP would manage the Dutchman wetland under a management plan that would control soil erosion and maintain or improve vegetation communities. Enhancement of vegetation communities would reduce soil erosion.

3.1.4 Cumulative Effects on Soil

The Proposed Action, in conjunction with remediation and restoration on reaches of the lower Willow Creek, lower Warm Springs Creek and other remedial projects in the Upper Clark Fork River Basin would have a positive, cumulative effect on soil resources in the watershed.

3.2 Water Resources

3.2.1 Existing Environment

Groundwater: The primary groundwater source for the Dutchman Wetland comes from the alluvial aquifer that lies below the Deer Lodge Valley. The depth of this aquifer ranges from a few feet at the valley fringes to over several hundred feet at the valley's center. Portions of this aquifer, near Opportunity and Warm Springs are contaminated with arsenic in concentrations above drinking water standards. In the Dutchman wetland groundwater does not become contaminated until it flows a significant distance through the contaminated soils to the eastern end of the wetland (CDM 2004). Groundwater exists at or near to the ground surface on the majority of the property (USFWS 2005).

Streams: There are three named perennial streams within the project area- Lost Creek, Dutchman Creek and Warm Springs Creek. The property also has several spring fed creeks and unnamed streams. A dike on Lost Creek creates a small impoundment in Sections 16 and 21 (T 5 N, R 10 W). Dutchman Creek and Warm Springs Creek are classified as fish-bearing streams (MFISH 2006). The perennial streams within the project area are not classified as navigable.

Classification: The Montana Water Quality Standard classification for the three perennial streams is B-1, indicating that its waters are to be "maintained suitable for drinking, culinary and food processing purposes after conventional treatment; bathing, swimming and recreation; growth and propagation of salmonoid fishes and associated aquatic life, waterfowl and furbearers; and agricultural and industrial water supply" (ARM 17.30.607).

Impairments: Lost Creek is listed as impaired by dewatering, metals, nutrient input and habitat degradation, according to the Montana Department of Environmental Quality 2002 - 303d List. Within the Dutchman wetland, Lost Creek's stream reaches have high percentages of eroding banks, areas of severe lateral erosion, little woody vegetation and several channelized reaches. The channel problems are result from overgrazing, vegetation removal and channelization. Some stream reaches are entirely absent of willows or other woody riparian species.

Stream restoration activities on Lost Creek within the Dutchman wetland are ongoing and funded by the Future Fisheries Program and Montana House Bill 647 (Bull Trout and Cutthroat Trout Enhancement Program; MFISH 2006), NRD and EPA. Warm Springs Creek is listed on the 2002 - 303d list of impaired waters and has reaches with significant channel instability. Channel morphology has been shaped by human influences (e.g. channel straightening and land use) and underlying natural factors (e.g. valley gradient/substrate). There are no restoration or remediation projects currently active on Warm Springs Creek.

Dutchman Creek was historically diverted into what is called Dutchman Dike, which includes a series of head gates in Section 16 (T 5 N, R 10 W) that create small impoundments. Lost Creek

is also partially impounded at this location. Due to this impoundment the Dutchman Creek channel has shrunk and vegetative growth has further narrowed the channel.

Lost Creek, Dutchman Creek and Warm Springs Creek all contain elevated concentrations of arsenic, which exceed drinking water standards. The source of the arsenic is suspected to be a shallow arsenic contaminant plume present in the alluvial aquifer (groundwater; CDM 2004).

Wetlands: Approximately 2,270 acres, or 65% of the project area is delineated as palustrine wetland (USFWS 2005). Wetlands are important water storage areas and provide habitat for riparian and aquatic plants, waterfowl and other animals. The Dutchman wetland has high vegetation richness, high hydrologic support, moderate sediment stabilization and erosion control, and high water purification. The wetland is functioning well.

Water rights and Instream Flows: Instream flows are provided for Warm Springs Creek, Dutchman Creek and Lost Creek. The effect of these flows depend on the water rights they are based on, the availability of water in the stretch to be protected and the history of low flows without instream flow protection.

FWP will have the use of the water rights out of Warm Springs Creek that have been used for irrigation on the property of the Uelands and conveyed by the Gardiner Ditch. FWP will have the use of the rights for up to 40 cfs from the Gardiner Ditch down to Warm Springs at the confluence with the upper Clark Fork River. In dry years, this stretch is frequently dewatered by diversions into the Gardiner Ditch.

This instream flow of 40 cfs is enforced by a "lease back" agreement between ARCO and the Uelands. ARCO will acquire the Warm Springs Creek water rights of the Uelands. The Uelands will be allowed to irrigation from Warm Spring Creek through the Gardiner Ditch only during higher flows. The Uelands cannot divert water into the Gardiner Ditch unless there is 40 cfs at the USGS gauge on Warm Springs Creek just above the Gardiner Ditch (USGS Gauging Station 12323760 or upper gauge) and there is 40 cfs at the USGS gauge near Warm Springs at the end the protected stretch (USGS Gauging Station 12323770). As a practical mater the upper gauge determines the water that is available and the lower gauge will control when water must be left instream by the Uelands.

The water diverted into Gardiner Ditch is presently shared by the Uelands and Jess Eighorn. They own a group of right of 23.2 cfs with the 2nd priority on Warm Springs Creek and another group of rights of 23.2 cfs with a 4th priority. They have taken this amount, 46.4 cfs, plus an estimated 5 cfs more whenever this amount of water was available at the Gardiner Ditch headgate. The Uelands and Eighorn by agreement share this water with 25% going to Eighorn and 75% going to the Uelands. When the Uelands are not diverting their share, Eighorn is entitled to the amount that the Uelands would have contributed to carriage water, which is the water lost to seepage along the ditch. This is estimated at 7.5 cfs. One way to calculate the water that will be available for the 40 cfs of instream flows is to use percentage of flows

available under the Uelands' share of the Gardiner Ditch water. When the full amount of their diversion, 51.2 cfs, is available, Eighorn is entitled to 7.5 cfs carriage water plus 11.6 cfs (25% of 46.4 cfs) for a total of 19.1 cfs. This gives Eighorn 37% (based on the ration of 19.1 cfs to the total generally diverted of 51.2 cfs) and gives the Uelands 63%.

Using Uelands' share as 63% to contribute to the 40 cfs instream requirement, calculations can be made of the amount available for instream flows in the stretch to be protected at various flows just above the ditch. These calculations are summarized below:

Flow at Upper Gauge	Amount for Instream Flow
20 cfs	12.6 cfs
30 cfs	18.9 cfs
40 cfs	25.2 cfs
50 cfs	31.5 cfs
59.1 cfs (and above)	40 cfs

Another way to calculate the amount available for instream flows is to always allocate the full amount of carriage water, 7.5 cfs, to Eighorn. Then 75% of the remainder is available for the instream flows. The estimates are tabulated below:

Flow at Upper Gauge	Amount for Instream Flow
20 cfs	9.4 cfs
30 cfs	16.9 cfs
40 cfs	24.4 cfs
50 cfs	31.9 cfs
59.1 cfs (and above)	40 cfs

The two ways of during the calculations come to very similar results.

The effect or value of this available water for instream flows can be judged by historic flow records. A study commissioned by ARCO helps here. The results of the study are in a report entitled "Final In-Stream Flow Augmentation Pilot Demonstration Project 1998-2002 Summary Report" (ARCO. 2002). The study looked at both "natural flows" and the effects of supplementing with stored water. The natural or direct flow is the amount available for the instream flows. The study recorded the flows at the upper and lower gauges during the irrigation seasons of 1998 through 2002, a series of dry years. The study demonstrates that generally what passes the Gardiner Ditch headgate gets down to Warm Springs and that the diversions into the Gardiner Ditch have dried up Warm Springs Creek in major portions of the irrigation season in dry years. For these 5 years, there was 20 cfs or more of natural flow at the upper gauge 99.8% of the time but there was 20 cfs only 20.9% of the time at the lower gauge. There was 40 cfs at the upper gauge 77% of the time but there was 40 cfs at the lower gauge only 9.5% of the time. Therefore, the acquisition will result in a significant enhancement of the flows of Warm Spring Creek between Gardiner Ditch and its confluence with the upper Clark Fork River.

There are some other factors that need to be noted. ARCO has the 1st priority right on Warm Springs Creek and 4.8 cfs of this right if left instream is exempted from the 40 cfs condition. This means that the Uelands cannot divert until both gauges record flows above 44.8 cfs. In a similar manner any flows from storage in the Silver Lake System are excluded. Also, ARCO has reserved 5 cfs of the Uelands rights for remediation, restoration or other federal, state or local requirement obligation of ARCO. Because it is for 5 cfs of consumed water, its negative impact on flows in the stretch to be protected may be more than 5 cfs. Its impact will depend on whether it is used, the amount used and where it is diverted. ARCO has also reserved additional water out of the Uelands' rights but only if the flows at both the upper and lower gauge are above 40 cfs. ARCO can also use ground water but only if a permit from DNRC is not required. Based on a recent Montana Supreme Court decision, a permit would be required if the ground water affects stream flows so FWP instream flows will be protected through the DNRC permitting process.

The enforcement of the Warm Springs Creek instream rights will be critical to ensure that the flows are actually there and the enforcement may be trying at first.

FWP is also granted the use of ARCO rights in Lost Creek and Dutchman Creek for instream flow protection through the property to the point at which Lost Creek is diverted or could be diverted into the West Side Ditch Canal.

3.2.2 Impacts to Water from Alternative A – No Action Alternative

Under the No Action alternative, AR would maintain ownership of the property and the existing condition would be retained. A management plan to enhance water quality would not be adopted. Water rights would remain under AR ownership; however, AR would not be obligated to provide more instream flow to Warm Springs Creek, Lost Creek or Dutchman Creek.

3.2.3 Impacts to Water from Alternative B – Proposed Action

The Proposed Action would incorporate the Draft Dutchman Wetland Management Plan, which includes strategies to enhance or restore wetland/riparian habitats within the Dutchman wetland. There are no bank restoration projects planned within the Dutchman wetland as part of the Proposed Action, however bank restoration projects would occur outside of the Proposed Action under the Dutchman Outline. Potential impacts on water rights and instream flows were described above in Section 3.2.1 of this draft EA.

In addition to groundwater monitoring, the Dutchman wetland would be placed within a controlled groundwater area, or would have groundwater use restrictions.

3.2.4 Cumulative Effects to Water

The Proposed Action, in conjunction with remediation and restoration activities on parts of the lower Willow Creek, lower Warm Springs Creek and areas would have a positive, cumulative effect on water resources in the basin.

3.3 Air Quality

3.3.1 Existing Environment

The Dutchman wetland is not located in a Class I air shed or Non-attainment area (DEQ 2005). There are no current land management or other activities that produce particulates in the project area. Vegetation cover helps to prevent airborne dispersal of contaminated surface soils.

3.3.2 Impacts to Air Quality from Alternative A – No Action Alternative

There would be no impacts to air quality anticipated as a result of the No Action alternative.

3.3.3 Impacts from Alternative B – Proposed Action

The FWP would manage the Dutchman wetland under a management plan that would control soil erosion and maintain or improve vegetation communities. The current condition of soils on the property would be, at a minimum, maintained at its current condition. Improvement of vegetation communities would further prevent wind dispersal of contaminated surface soils.

3.3.4 Cumulative Effects

No cumulative effects to air quality would be anticipated because of the Proposed Action.

3.4 Vegetation

3.4.1 Existing Environment

Upland, riparian and wetland plant communities dominate the Dutchman wetland. These communities include upland grasslands dominated by basin wild rye and other grasses, riparian areas dominated by quaking aspen, riparian/wetland areas dominated by aspen, Booth's willow, Geyer's willow, and sandbar willow, and wetland areas dominated by Canada reed-grass, redtop, Nebraska sedge and beaked sedge (USFWS 2005). In 2000, under the direction of NRD, USFWS, FWP and the Montana Natural Heritage Program (MNHP) inventoried plant and vegetation communities throughout the Dutchman property. The completed inventory concluded that diverse, healthy vegetation communities exist on the property. The inventory identified three sensitive plant species and an additional two are listed in the MNHP database as identified in past inventories.

Grazing: Historically, the project area was grazed the Ueland family and the Anaconda Cooper Company. AR has allowed short term grazing.

Weeds: The Montana Noxious Weed Survey and Mapping System Mapping Project identified two noxious species on the project area: leafy spurge and spotted knapweed (NRIS 2006). These weeds are present on the Dutchman wetland, but have not yet infested the property (D. Dziak, Warm Springs Wildlife Area Manager, 2006).

3.4.2 Impacts to Vegetation from Alternative A – No Action Alternative

AR would not be required to maintain the current management of the Dutchman wetland and vegetation may be altered or removed. Loss of vegetation could compromise air, water or soil quality. AR would be required to develop a weed management control plan to comply with the County Noxious Weed Management Act, Title 7, Chapter 22 of the Montana Codes Annotated (MCA, 2003).

3.4.3 Impacts to Vegetation from Alternative B – Proposed Action

FWP would manage the Dutchman wetland under a management plan that would maintain or improve vegetation communities, striving for maximum cover and diversity. Weed management would be conducted in concert with work at the Warm Springs Wildlife Management Area. Management will encourage the establishment of a diverse and abundant plant community, which will in turn foster a healthy wetland and use by a variety of wildlife.

3.4.4 Cumulative Effects to Vegetation

Restoration activities related to the Proposed Action and improved vegetation management on this property would positively contribute to other activities in the drainage. Weed management performed, as part of the Proposed Action, in conjunction with weed management on the adjacent Warm Springs Wildlife Management Area, would have positive cumulative effects.

3.5 Wildlife

3.5.1 Existing Environment

The Dutchman wetland adjoins the Warm Springs Wildlife Management Area and is rich with an abundance and diversity of wildlife. Species that occur as residents or transient residents include waterfowl, shore birds, neotropical migrants, raptors, mule deer, white-tailed deer, elk, moose, coyote, fox, beaver, muskrat, badger and various small mammals (D. Dziak, Warm Springs Wildlife Area Manager, 2006). The wetland provides critical year-round habitat for waterfowl. These lands are used in the fall, winter and spring by elk and mule deer. The property provides riparian and wetland habitats, which provide landscape connectivity for wildlife moving between the Clark Fork River and the foothills of the Flint Creek Mountain Range.

3.5.2 Impacts to Wildlife from Alternative A – No Action Alternative

Under the no action alternative, AR could initiate intensive grazing in the project area, which could adversely impact the quality and quantity of range available for wildlife. Management of the area for the benefit of wildlife would not be assured under AR's ownership and important habitat could be lost.

3.5.3 Impacts to Wildlife from Alternative B – Proposed Action

Under the proposed action, the Dutchman wetland would be managed as a Wildlife Management Area and would benefit from the expertise and labor of FWP staff. FWP would manage the Dutchman wetland for highly productive, diverse vegetative communities that provide high quality forage and cover for native wildlife species. Wildlife habitat would be enhanced under Alternative B.

3.5.4 Cumulative Effects to Wildlife

Protection and enhancement of wildlife habitats performed as part of the Proposed Action, in conjunction with wildlife management on the adjacent Warm Springs Creek Wildlife Management Area, would have positive cumulative effects.

3.6 Fisheries

3.6.1 Existing Environment

Brown trout, brook trout and rainbow trout are the most common trout species in Lost Creek and Warm Springs Creek. Warm Springs Creek contains a self-sustaining population of bull trout (the only remaining bull trout core area above the town of Drummond), which is federally listed as threatened under the Endangered Species Act, and west slope cutthroat trout, which is a State species of special concern (*Section 3.7*). Both creeks are spawning tributaries for Clark Fork River brown trout and also support long nose sucker, large scale sucker, mountain whitefish and redside shiner (MFISH 2006).

Warm Springs Creek and Lost Creek have impaired water quality resulting from metals, nutrient loading, sedimentation, flow alterations, channelization and loss of woody riparian vegetation. Trout Unlimited and other fisheries stakeholders ranked the drainages as the highest priority streams for restoration projects in the Deer Lodge Valley. A restoration project is in progress on Lost Creek (MFISH 2006).

3.6.2 Impacts to Fisheries from Alternative A – No Action Alternative

Under the No Action alternative, fish habitat in the area would remain in its current condition. Water rights would remain under AR ownership and AR would not be obligated to provide more water to Warm Springs Creek, Lost Creek or Dutchman Creek.

3.6.3 Impacts to Fisheries from Alternative B – Proposed Action

The FWP would manage the Dutchman wetland with the goal of protecting and encouraging a self-sustaining fishery. The Management Plan includes strategies for protecting riparian areas, which provide cover and food for fish species. The property transfer would include 10-40 cfs of instream flow to the frequently dewatered Warm Springs Creek, as more particularly described in Section 3.2.1 of this EA. Additional water flow in Warm Springs will be beneficial for fish spawning, rearing and survival. FWP would manage the Dutchman wetland with the goal of protecting and encouraging a self-sustaining fishery. In addition, further creek restoration for Warm Springs Creek, Lost Creek and Willow Creek (outside the scope of the Proposed Action) would further aid in improvement of the fisheries.

3.6.4 Cumulative Effects to Fisheries

Protection and enhancement of fish habitats performed as part of the Proposed Action, in conjunction with fish management on the adjacent Warm Springs Wildlife Management Area, would have positive cumulative effects.

3.7 Threatened, Endangered and Sensitive Species

3.7.1 Existing Environment

Threatened, Endangered and Sensitive Plants: There are five State sensitive plants that have been identified as- present, having potential for occurrence, or having potential habitat in or near the project area. These plants are the wedge-leaved saltbush (S1), tapered rush (S1), alpine meadow rue (S2), annual Indian paintbrush (S2) and mealy primrose (S2). The alpine meadow rue and mealy primrose have been designated as sensitive by the U.S. Forest Service and Bureau of Land Management (MNHP 2006).

Wedge-leaved saltbush and tapered rush have a State ranking of S1, indicating that these species are critically imperiled in Montana because of extreme rarity. The tapered rush, alpine meadow rue, annual Indian paintbrush and mealy primrose have a State ranking of S2, indicating that these plants are at risk because of very limited and potentially declining population numbers and/or habitat, which make them vulnerable to global extinction or extirpation in the state.

Threatened, Endangered and Sensitive Animals: The olive-sided flycatcher has been identified as present, having potential for occurrence, or having potential habitat in or near the project area.

The olive-sided flycatcher is a neotropical migrant bird that typically inhabits and feeds in mid-story and upper canopy environments (USGS 2006). The olive-sided flycatcher has a State ranking of S3B, indicating that the species is potentially at risk because of limited range, populations and/or habitat, even though it may be abundant in some areas. There are no federally listed threatened or endangered animals resident in the project area (MNHP 2006).

Bald eagles are a federally protected threatened species. Although there are no known bald eagle nests within the project area, there is one active bald eagle nest approximately 2 miles southeast (D. Dziak, Warm Springs Wildlife Area Manager, 2006). Bald eagles travel widely around their nests to locate food, which includes fish, waterfowl, small mammals and carrion. They typically breed near wetlands and open water (American Bald Eagle Information Site 2006).

Threatened, Endangered and Sensitive Fish: There is one federally-listed fish identified as present, having potential for occurrence, or having potential habitat in or near the project area the bull trout (S2) which is threatened. Warm Springs Creek is the only remaining bull trout core area in the Upper Clark Fork Basin above the town of Drummond. The west slope cutthroat trout (S2) is state-listed as a sensitive species.

3.7.2 Impacts to Threatened, Endangered and Sensitive Species from Alternative A – No Action Alternative

Threatened, Endangered and Sensitive Plants: Under the no action alternative, noxious weeds could compete with and threaten to eradicate threatened, endangered and sensitive plants within the Dutchman wetland.

Threatened, Endangered and Sensitive Animals: Strategies for protecting and enhancing fish and wildlife habitat, would not be addressed under the No Action alternative; therefore, the No Action alternative may negatively affect the use of the wetland by olive sided flycatchers and bald eagles.

Threatened, Endangered and Sensitive Fish: Under the No Action alternative, west slope cutthroat and bull trout habitat would remain in its current condition. Water rights would remain under AR ownership; and AR would not be obligated to provide more instream flow to Warm Springs Creek, Lost Creek or Dutchman Creek.

3.7.3 Impacts to Threatened, Endangered and Sensitive Species from Alternative B – Proposed Action

Threatened, Endangered and Sensitive Plants: Montana Fish, Wildlife & Parks would manage the Dutchman wetland under a management plan that would maintain or improve vegetation communities, including threatened, endangered and sensitive plants. Weed management occurring on the Warm Springs WMA and the wetland would benefit threatened, endangered and sensitive plants.

Threatened, Endangered and Sensitive Animals: The Proposed Action may positively affect the olive-sided flycatcher and the bald eagle because the wetland would be managed specifically to benefit fish and wildlife habitat.

Threatened, Endangered and Sensitive Fish: Montana Fish, Wildlife & Parks would manage the Dutchman wetland with the goal of protecting and encouraging a self-sustaining fishery. The Management Plan includes strategies for protecting riparian areas, which provide cover and food for fish species. Under Alternative B fish would benefit from additional water in warm Springs Creek.

3.7.4 Cumulative Effects to Threatened, Endangered and Sensitive Animals

Protection and enhancement of the project area would increase protection of threatened, endangered and sensitive species and contribute to conservation efforts in the basin including those on the adjacent Warm Springs Wildlife Management Area.

3.8 Cultural Resources

3.8.1 Existing Environment

There is one cultural resources site that may be located within the project area: it is a stone tool chipping site (a lithic scatter, Site 24DL0423) and it is located in Section 33 (T 5 N, R 10 W). It is unknown whether this site lies within the boundaries of the Dutchman wetland. The State Historic Preservation Office (SHPO) does not recommend a cultural resources inventory related to the Proposed Action (SHPO 2006).

3.8.2 Impacts to Cultural Resources from Alternative A – No Action Alternative

There are no impacts anticipated to Cultural Resources as a result of the No Action Alternative.

3.8.3 Impacts to Cultural Resources from Alternative B – Proposed Action

There are no impacts anticipated to Cultural Resources as a result of the Proposed Action.

3.8.4 Cumulative Effects to Cultural Resources

There are no cumulative effects anticipated to Cultural Resources as a result of the Proposed Action.

3.9 Public Access and Recreation

3.9.1 Existing Environment

The property is currently used for fishing, wildlife viewing, hiking, trapping and big game, waterfowl and upland bird hunting (D. Dziak, Warm Springs Wildlife Area Manager, 2006).

The Dutchman wetland is part of a 10,800-acre area where hunting access is managed by FWP's Block Management Program. The area includes the wetland as well as uplands and additional wetland/river bottom habitats located north of the project area. Hunters are issued permission slips to hunt for elk, white-tailed deer, upland birds, sand hill cranes and waterfowl. According to a 2005 survey of hunters in the area, 241 hunters spent a total of 10,846 days hunting on or near Dutchman. Hunters on the Dutchman parcel hunted waterfowl and white-tailed deer (R. Uchytil, Block Management Coordinator, 2006).

3.9.2 Impacts to Public Access from Alternative A – No Action Alternative

Under the No Action alternative, public access would be limited to AR's participation in the Block Management Program and landowner permission. Recreational opportunities on the Dutchman wetland would be similarly limited.

3.9.3 Impacts to Public Access from Alternative B – Proposed Action

The Proposed Action includes establishing permanent public access on the property. Walk-in access for hunting, fishing, and wildlife viewing would be ensured if the acquisition were completed.

3.9.4 Cumulative Effects to Public Access

The Proposed Action, in conjunction with the Warm Springs Wildlife Management Area, would result in public access to a contiguous block of over 8,000 acres of land in Deer Lodge County. The expansion of the Warm Springs Wildlife Management Area to include the Dutchman wetland would provide additional opportunities for wildlife viewing, hunting and hiking.

3.10 Land Use and Zoning

3.10.1 Existing Environment

The current landowner of the Dutchman wetland is AR and the area is zoned as Open Space/Agricultural. The property is used for recreation administered by FWP.

The Deer Lodge County airport is located adjacent to the southwest corner of the project area and the northeast half of the airstrip is surrounded on three sides by the wetland. A portion of the

Dutchman wetland surrounding the airport property is encumbered with clear zone easements held by Deer Lodge County. These easements prohibit any structure that could pose a hazard to aircraft using the airport.

Waterfowl use the wetland heavily and moose, deer, cattle and coyotes have wandered on to the airstrip, but there have not been any recorded collisions on the airport runway.

There is a "Land Lease and Easement for Sewage Effluent Storage and Rapid Infiltration Ponds and Mixing Zone" held by the City of Anaconda on Sections 21 and 28 of the Dutchman wetland. This document provides an area for mixing treated, percolated water with groundwater on portions of the property. In addition, there are several other easements across the Dutchman wetland for various utilities and pipelines including service to Warm Springs State Hospital.

3.10.2 Impacts to Land Use from Alternative A – No Action Alternative

The No Action alternative would not change zoning or affect the airport. There would be no change in the potential for in-flight collisions between birds and planes. Additional grazing could increase the threat of collisions with cattle.

3.10.3 Impacts to Land Use from Alternative B – Proposed Action

The Proposed Action would not change the land use of the Dutchman wetland, except that hunting and access would be managed under the Draft Dutchman Wetland Management Plan. The zoning would remain Open Space/Agricultural.

The Anaconda Airport Board has expressed concern about airport expansion and wildlife conflicts resulting from the Proposed Action. The Anaconda airport property is owned by Anaconda-Deer Lodge County and is principally surrounded by the Dutchman wetland. The present airport property is depicted as a wetland on the 1869 General Land Office map (*Fig.1*).

The Federal Aviation Administration (FAA) advisory on *Hazardous Wildlife Attractants on or near Airports* (July 27, 2004), notes that most public-use airports have large tracts of open, undeveloped land that provide added margins of safety and noise mitigation. These areas can present hazards to aviation if they encourage wildlife to enter an airport's approach, departure airspace or air operations area.

If the action alternative is selected, FWP is committed to working with the Anaconda Airport Board regarding wildlife hazard management.

Although the Federal Aviation Authority states that a county wildlife mitigation plan is not required until triggered by significant numbers of wildlife collisions on the airport (there are not any recorded collisions now), FWP would work proactively with the Deer Lodge County Airport

to mitigate encounters with wildlife. There would be no limitations to State or Federal funding for the airport as a result of the status of the project area as a wildlife management area.

3.10.4 Cumulative Effects to Land Use

There are no cumulative effects anticipated to land use as a result of the Proposed Action.

3.11 Economics

3.11.1 Existing Environment

A small amount of revenue may be indirectly generated locally from recreation-based activities on the property.

The Dutchman wetland currently generates taxes to Deer Lodge County payable by AR. In 2005, these taxes totaled $4,463.09.

3.11.2 Impacts to Economics from Alternative A – No Action Alternative

There may be a slight decrease in revenue generated from recreation-based activities in the area if recreation were eliminated from 3,750 acres. There would be no change in the tax base for Deer Lodge County as a result of the No Action alternative.

3.11.3 Impacts to Economics from Alternative B – Proposed Action

Since the Dutchman wetland is already consistently used for recreation-based activities, there is no anticipated change in revenue as a result of the Proposed Action.

Montana Fish, Wildlife & Parks is required to make payments to counties on lands it owns in a sum equal to the amount of taxes which would be payable on county assessment of the property were it taxable to a private entity (MCA 87-1-603). Therefore, the tax income for Deer Lodge County would not change as a result of the Proposed Action.

See the Socio-Economic Report (*Appendix B - Socio-Economic Report*) for additional details on the socio-economic impacts of this project.

3.11.4 Cumulative Effects to Economics

There are no cumulative effects to Economics anticipated as part of the Proposed Action.

3.12 Human Health and Safety

3.12.1 Existing Environment

Past smelting and mining operations have contaminated air, land and water in the area. Lost Creek, Dutchman Creek and Warm Springs Creek all contain elevated concentrations of arsenic. The source of the arsenic is suspected to be a shallow arsenic contaminant plume present in the alluvial aquifer (CDM 2004).

Aerial and fluvial deposition of acidic and metal smelter emissions and mine wastes from past smelting operations have resulted in over 3,000 acres of land within the Dutchman wetland that is considered to be a High Arsenic Area. This area contains concentrations of arsenic in surficial soils that exceed the open space / recreational /agricultural land use cleanup level for arsenic.

Although the soils in this area have high concentrations of the contaminants of concern the Dutchman wetland is well vegetated. The surface and sub-surface water and vegetation of the Dutchman wetland effectively contain some heavy metals in soils on site.

3.12.2 Impacts to Human Health from Alternative A – No Action Alternative

Under the No Action alternative, AR would be required to limit human access to the property. Under this EPA requirement public access must be non-motorized and there is no option to subdivide or sell the property for commercial or residential development.

Under the No Action alternative, AR would not be obligated to maintain current management and land use of the Dutchman wetland. Wetland and vegetation removal as a result of grazing could leave metals contaminated soils vulnerable to wind dispersal. The potential for de-vegetation of the project area and the subsequent wind dispersal of contamination surface soils represents a potential threat to human health or safety as a result of the No Action alternative, which would require regulation by EPA.

3.12.3 Impacts to Human Health from Alternative B – Proposed Action

EPA has determined that use of the area as a Wildlife Management Area, would best protect human health and the environment. Under the Proposed Action, institutional controls restricting land and groundwater use would be put in place and would benefit human health or safety as a result of the Proposed Action.

3.12.4 Cumulative Effects

There would be no cumulative effects on human health or safety as a result of the Proposed Action.

4.0 FINDINGS

Private Property Regulatory Restrictions--Actions described in this environmental analysis do not regulate the use of private property; the actions do not involve the denial of an application for a permit or other permission, and the actions do not restrict the use of private property. The actions to acquire lands for a WMA do not place regulatory restrictions on private property and therefore do not require an evaluation of regulatory restrictions on private property.

Evaluation of Mitigation, Stipulation, and Other Controls--There are no mitigation, stipulations, or other controls associated with the actions. These actions do not involve permitting or granting of a license on which stipulations would be placed.

MEPA adherence--This EA fulfills the requirements of the MEPA. Based on an evaluation of the primary, secondary and cumulative impacts to the physical and human environment this draft environmental review revealed no significant impacts from the actions. In determining the significance of the impacts Montana Fish, Wildlife & Parks assessed the severity, duration, geographic extent and frequency of the impact, the probability that the impact will occur or reasonable assurance that the impact will not occur, the importance to the state and to society of the environmental resource or value affected, any precedent that would be set as a result of an impact of the proposed action that would commit FWP to future actions; and potential conflicts with local, federal or state laws.

This evaluation of impacts to the physical and human environment revealed no significant negative impacts from the Proposed Action; so, an Environmental Impact Statement (EIS) is not necessary and this draft EA provides the appropriate level of analysis.

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Appendix A.

DUTCHMAN WETLAND

DRAFT MANAGEMENT PLAN

July 19, 2006

INTRODUCTION

To meet the requirements of the 1999 Streamside Tailings Consent Decree and meet the Montana Fish, Wildlife & Parks (FWP) mission to protect and enhance fish and wildlife resources, the acquisition of the 3750-acre Dutchman wetland property is proposed. The property is located west of Warm Springs, Montana.
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This area has been selected due to its inherent wetland/riparian values and because it represents the best and largest block of wetland/riparian habitat in the Upper Clark Fork River Basin.

This management plan will address strategies for controlling noxious weeds, soil erosion, improvement of vegetation communities and public access. Additionally the Plan will be used to document land management strategies to ensure consistency with the terms of the 1999 Consent Decree, as detailed in the *Draft Environmental Assessment* for the *Dutchman Wetland Land Transfer* (July 19, 2006). The principal strategy to address the latter would be a protocol for annual meetings with the appropriate agencies.

AREA DESCRIPTION

The Dutchman Wetland property proposed for acquisition is 3750-acres located west of Warm Springs, Montana. It includes portions of Sections 10, 11, 14, 15, 16, 20, 21, 22, 23, 26, 27, 28 and 33 T5N, R10W. The property lies directly west of the Warm Springs Wildlife Management Area hospital unit. The landscape is open grassland, wetland and riparian habitats located along Warm Springs, Dutchman and Lost Creeks. The property was used as the baseline wetland habitat in the Montana vs ARCO lawsuit and is considered the best large contiguous wetland/riparian habitat in the Upper Clark Fork River Basin.

BASELINE INVENTORY

The existing features and conditions of the Dutchman wetland and associated conservation easements will be described, photographed and documented in a continued baseline inventory. The purpose of the continued baseline inventory would be to establish an objective and reliable basis from which to assess changes on the land over time.

ANNUAL MONITORING

Consent Decree

FWP in conjunction with United States Fish and Wildlife Service (USFWS) and Natural Resource Damage Program (NRDP) will build a written record of annual acquisition monitoring (work plans) the first year after conveyance. This written record will track the progress of the goals and objectives of the management plan in accordance with the Consent Decree. This process may include an independent consultant to help monitor the progress of the acquisition.

Management Actions

Management actions will be evaluated through the MEPA process.

Vegetation

Vegetation transects may be established with the guidance of FWP's plant ecologist. These transects will be directed to determine species composition, plant succession and forage production. Transects will be monitored on a regular basis to determine long-term trends. The Department will establish habitat evaluation procedures in cooperation with the USFWS. Permanent photo points will be established and photo-documentation conducted annually.

Wildlife Populations

Big game and waterfowl numbers will be monitored annually. Seasonal use will be monitored during migration and nesting.

Public Use

Public contact and sign-in boxes will be used to manage levels and distribution of public use. This information will be used to evaluate and revise travel and seasonal restrictions.

Grazing

Grazing will be prohibited for a minimum of 5 years following acquisition. After 5 years, that decision will be reviewed.

GOAL

Manage for highly productive, diverse vegetation communities that will provide high quality forage and cover for native wildlife species, with an emphasis on waterfowl/wetland species; and manage for hunting and other recreational opportunities for the public.

Objective 1: Prevent soil erosion and conserve and improve the vegetation communities, striving for maximum vegetation diversity dependent on soil type.

Problem 1: Noxious weeds have become established on the property.

Strategy: Determine the extent and degree of the noxious weed problem and implement an Integrated Weed Management approach in accordance with the *FWP Region 2 Weed Management Plan*. Map weed distributions and changes over time, as well as locations of control actions. Collaborate with Deer Lodge County to integrate management of noxious weeds on this site with the broader weed management objectives and efforts across and beyond property boundaries. Keep in regular communication with the County and adjacent landowners, and adapt to emerging weed issues in a cooperative fashion as such issues are identified.

Problem 2: Boundary fences are incomplete.

Strategy: Complete acquisition boundary fences as needed to control livestock and facilitate the management of public access.

Problem 3: Public Access.

Strategy: Improve points of public access from adjacent public lands. Prohibit off-road vehicle use. Develop a travel management plan that allows vehicle access on certain established roads. Implement seasonal closures consistent with waterfowl nesting requirements. Provide adequate parking facilities and signing to protect soils and vegetation.

Problem 4: There is no formal fire suppression agreement covering the proposed property acquisition.

Strategy: Add the property to FWP's current agreement for fire suppression with the Department of Natural Resources and Conservation.

Objective 2: Manage to enhance, restore or create wetland/riparian habitat and protect in perpetuity as required in the Consent Decree. Maintain existing game and non-game species.

Problem 1: Impact of livestock grazing on wetland/riparian habitats.

Strategy: Up until the recent acquisition of the Dutchman wetland property by AR, livestock grazing had been mostly season-long and intense. AR has allowed short term grazing. Livestock will be excluded from the property for 5 years following conveyance. If, after 5 years and review of annual monitoring data, FWP determines, and the appropriate agencies concur, that grazing could be again incorporated in the management program, a rest-rotation system could be established. The implementation of this system would require interior fencing and the location fencing would be addressed at that time.

Problem 2: Enhance, restore, or create 400 acres of wetland/riparian habitat.

Strategy: Develop a wetland plan in cooperation with USFWS, and with assistance from DucksUnlimited and Trout Unlimited to enhance, restore or create wetland/riparian habitat.

Appendix B.

DUTCHMAN WETLAND

FEE TITLE TRANSFER

SOCIO-ECONOMIC ASSESSMENT

MONTANA FISH, WILDLIFE & PARKS

Prepared by
Rob Brooks
June 2006

I. INTRODUCTION

House Bill 526, passed by the 1987 Legislature (MCA 87-1-241 and MCA 87-1-242), authorizes Montana Fish, Wildlife & Parks (FWP) to acquire an interest in land for the purpose of protecting and improving wildlife habitat. These acquisitions can be through fee title, conservation easements, or leasing. In 1989, the Montana legislature passed House Bill 720 requiring that a socioeconomic assessment be completed when wildlife habitat is acquired using Habitat Montana monies. These assessments evaluate the significant social and economic impacts of the purchase on local governments, employment, schools, and impacts on local businesses.

This socioeconomic evaluation addresses the fee title transfer of property presently owned by the Atlantic Richfield Company (AR). The report addresses the physical and institutional setting as well as the social and economic impacts associated with the proposed fee title transfer.

II. PHYSICAL AND INSTITUTIONAL SETTING

A. Property Description

The Dutchman wetland is located about one mile from Warm Springs, Montana in Deer Lodge County. The property that FWP would acquire encompasses approximately 3750 acres in the Dutchman, Lost Creek,and Warm Springs drainages adjacent to the Warm Springs Wildlife Management Area. A detailed description of this property is included in the environmental assessment (EA).

B. Habitat and Wildlife Populations

This property contains upland, riparian and wetland habitats and is home to a large variety of wildlife including 19 species of waterfowl and shore birds, black bears, deer, moose and mountain lions. The property is also an important wildlife corridor between the Clark Fork River and the foothills of the Flint Mountain Range.

C. Current Use:

AR has allowed short term livestock grazing on the land. AR is enrolled in the Block Management Program, which allows for public access for walk-in hunting opportunities.

D. Management Alternatives:

1) Accept ownership and future management of the Dutchman wetland by conveyance of the property from AR to FWP
2) No action (do not accept ownership and management of Dutchman wetland)

Alternative A, the no action option, does not guarantee the protection or restoration of this habitat. Due to institutional constraints, Atlantic Richfield would not allow public access to the property in the future. Grazing, while a possibility in the future is currently restricted by Atlantic Richfield. Development of the property is not an option for this property.

Under Alternative B, the fee title transfer will provide long-term protection and enhancement to this critical riparian and wetland area and provide for continued public access to these lands.

FWP Fee Title Transfer by Atlantic Richfield

The intent of the Dutchman wetland transfer is to protect and enhance the wildlife habitat currently found on the property and provide for continued public access.

No Action Alternative

Under this alternative the restoration and protection of these habitats will be not be assured and perpetual public access to these lands would be closed.

III. SOCIAL AND ECONOMIC IMPACT

This section quantifies the social and economic consequences of the two management alternatives following two basic accounting stances: financial and local area impacts.

Financial impacts address the cost of the fee title land transfer to FWP and discuss the impacts on tax revenues to local government.

Expenditure data associated with the use of the property provides information for analyzing the impacts these expenditures may have on local businesses (i.e. income and employment).

A. Financial Impacts

The financial impacts to FWP are related to the conveyance and maintenance/management costs associated with managing this land. Wetland/Riparian Areas Restoration Costs will be used for completing this proposal. Atlantic Richfield proposes to transfer the property to FWP at no cost with the understanding that this property will be managed as a Wildlife Management Area.

The financial impacts to local governments are the potential changes in tax revenues resulting from the fee title transfer. The Dutchman wetland transfer to FWP will not change the tax revenues that Deer Lodge County currently collects on this piece of property. FWP is required by Montana Code 87-1-603 to pay "to the county a sum equal to the amount of taxes which would be payable on county assessment of the property were it taxable to a private citizen." The taxes assessed on this property to AR currently total $4463 (2005). Montana Fish, Wildlife & Parks will continue to pay the taxes assessed on this parcel by Deer Lodge County. As past

reference, FWP paid approximately $51,000 in property taxes to Deer Lodge County for 2005 taxes.

B. Economic Impacts:

The fee title conveyance will not impact local businesses in any significant way. Currently there are no agricultural practices occurring on the property and wildlife associated activities will not change substantially assuming ownership by FWP.

FINDINGS AND CONCLUSIONS

As noted at the beginning of this document, the Dutchman wetland is located in Deer Lodge County near Warm Springs, Montana.

The fee title conveyance by AR to Montana Fish, Wildlife and Parks will provide the Dutchman wetland long-term protection for wildlife habitat and ensure public recreation opportunities into the future.

The fee title transfer to FWP by AR will not reduce tax revenues collected on this property from their current levels to Deer Lodge County under Montana Code 87-1-603. This conveyance will also not have any significant financial impacts on local businesses.