

Montana Department of Natural Resources and Conservation Water Resources Division Water Rights Bureau
ENVIRONMENTAL ASSESSMENT For Routine Actions with Limited Environmental Impact

Part I. Proposed Action Description

1. Applicant/Contact name and address: **John H. & Sandra B. Roe
2250 Delaware Ave
Saint Paul MN 55118-4707**
2. Type of action: **Application to Change a Water Right No. 30042097-76F
(Statement of Claim No. 111220-76F)**
3. Water source name: **Blackfoot River, North Fork**
4. Location affected by action: **SWNWSE, Sec 15, Twp 15N, Rge 11W, Beaverhead Co.**
5. Narrative summary of the proposed project, purpose, action to be taken, and objectives:
The applicant proposes to change a portion of the historic place of use on one water right. A 3/4 pivot would be installed on the historic place of use. Thirty acres to be irrigated by the new pivot would not be covered by the historic irrigation. The applicant submitted this change to remove historic irrigated acres from other areas to be used on the new acres. The total irrigated acres on the water right will be permanently reduced to a total of 204 acres.

The new place of use would be as follows: 84 acres in the W2SE & SESW of Sec 21, and 120 acres in the NW of Sec 28, all in Twp 15N, Rge 11W, Powell County.

The maximum flow rate and volume needed for this change would be 210 gpm up to 41 acre-feet per year on 30 acres. The consumed volume would be 33 acre-feet per year.

The DNRC shall issue an Authorization to Change if the criteria in 85-2-402, MCA are met

Agencies consulted during preparation of the Environmental Assessment:
(include agencies with overlapping jurisdiction)

**Montana Department of Natural Resources (DNRC) – Eric Chase, Hydrologist
Montana Department of Natural Resources (DNRC) – Jim Beck, HRO Engineer
Montana Natural Heritage Program (MTNHP)
Montana Department of Environmental Quality (TMDL listing 2006 303(d)(list)
Montana Department of Fish, Wildlife & Parks (DFWP)(MFISH)
USDA – NRCS – Web Soil Survey**

Part II. Environmental Review

1. Environmental Impact Checklist:

PHYSICAL ENVIRONMENT

WATER QUANTITY, QUALITY AND DISTRIBUTION

Water quantity - Assess whether the source of supply is identified as a chronically or periodically dewatered stream by DFWP. Assess whether the proposed use will worsen the already dewatered condition.

Determination: **No significant adverse impact.**

MFISH shows a chronic dewatering problem from mile 6.2 to river mile 12.0. Chronic dewatering is a significant problem in virtually all years. The proposed project would not create an additional burden on the source of supply because no additional water will be diverted.

Water quality - Assess whether the stream is listed as water quality impaired or threatened by DEQ, and whether the proposed project will affect water quality.

Determination: **No significant adverse impact.**

The North Fork of the Blackfoot River is not listed on the TMDL water quality impaired list. The proposed project would not have an adverse affect to the water quality of the stream.

Groundwater - Assess if the proposed project impacts ground water quality or supply. If this is a groundwater appropriation, assess if it could impact adjacent surface water flows.

Determination: **No significant adverse impact to groundwater quality or supply.**

DIVERSION WORKS - Assess whether the means of diversion, construction and operation of the appropriation works of the proposed project will impact any of the following: channel impacts, flow modifications, barriers, riparian areas, dams, well construction.

Determination: **No significant adverse impact.**

The historic means of diversion and the amount of water diverted will not change. The headgate consists of a 6-foot wooden slide gate that opens into a ditch. The Geary-Wendell ditch is equipped with a DFWP fish screen located approximately 30-feet from the headgate. The existing ditch conveys the water to a secondary diversion located in the NENWSE of Sec 21, Twp 15N, Rge 11W. The secondary diversion consists of a 25 hp Cornell pump and motor combination. The water is conveyed to the pivot by means of a buried 10-inch PVC pipeline.

The proposed project will not impact any of the following: channel impacts, flow modifications, barriers, riparian areas, dams, or well construction.

UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES

Endangered and threatened species - Assess whether the proposed project will impact any threatened or endangered fish, wildlife, plants or aquatic species or any "species of special concern," or create a barrier to the migration or movement of fish or wildlife. For groundwater, assess whether the proposed project, including impacts on adjacent surface flows, would impact any threatened or endangered species or "species of special concern."

Determination: **No significant adverse impact.**

According to the MTNHP there are several species of special concern in the area. The following are species of special concern: Canis lupus or Gray Wolf; Lynx Canadensis or Canada Lynx; Gulo gulo or Wolverine; Martes pennanti or Fisher: Numenius americanus or Long-billed Curlew; Gavia immer or Common Loon; three occurrences of Haliaeetus leucocephalus or Bald Eagle; three occurrences of Grindelia howellii or Howell's Gumweed; three occurrences of Oncorhynchus clarkia lewisi or Westslope Cutthroat Trout; two occurrences of Salvelinus confluentus or Bull Trout.

Because none of the species are located in the immediate project area, no significant adverse impacts are anticipated.

Wetlands - Consult and assess whether the apparent wetland is a functional wetland (according to COE definitions), and whether the wetland resource would be impacted.

Determination: **This proposed project does not involve wetlands.**

Ponds - For ponds, consult and assess whether existing wildlife, waterfowl, or fisheries resources would be impacted.

Determination: **This proposed project does not involve ponds.**

GEOLOGY/SOIL QUALITY, STABILITY AND MOISTURE - Assess whether there will be degradation of soil quality, alteration of soil stability, or moisture content. Assess whether the soils are heavy in salts that could cause saline seep.

Determination: **No significant adverse impact.**

Perma gravelly loam is the major soil type in the project area. This project will not cause a degradation of soil quality; alter the soil stability or moisture content. The typical profile of the soil is from 0 to 10 inches gravelly loam, from 10 to 32 inches very gravelly loam and from 32 to 60 inches extremely gravelly sandy loam. The frequency of flooding and ponding is none. The land capability classification is irrigated. Saline seep should not be a concern.

VEGETATION COVER, QUANTITY AND QUALITY/NOXIOUS WEEDS - Assess impacts to existing vegetative cover. Assess whether the proposed project would result in the establishment or spread of noxious weeds.

Determination: **No significant adverse impact.**

The project should not have an impact to vegetative cover. The new pivot is being placed over an area of historic irrigation. Some new ground will be involved, but will be planted to crop. This should not allow any noxious weeds to take control. The landowner is responsible for controlling any noxious weeds on the property.

AIR QUALITY - Assess whether there will be a deterioration of air quality or adverse effects on vegetation due to increased air pollutants.

Determination: **No significant adverse impact.**
This project should not cause a deterioration of air quality or cause adverse effects to vegetation due to increased air pollutants.

HISTORICAL AND ARCHEOLOGICAL SITES - Assess whether there will be degradation of unique archeological or historical sites in the vicinity of the proposed project.

Determination: **No significant adverse impact.**
The proposed project involves land that has been previously disturbed.

DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AND ENERGY - Assess any other impacts on environmental resources of land, water and energy not already addressed.

Determination: **No significant adverse impact.**

HUMAN ENVIRONMENT

LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS - Assess whether the proposed project is inconsistent with any locally adopted environmental plans and goals.

Determination: **No significant adverse impact.**

ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES - Assess whether the proposed project will impact access to or the quality of recreational and wilderness activities.

Determination: **No significant adverse impact.**
This project will not impact access to or the quality of recreation and wilderness activities.

HUMAN HEALTH - Assess whether the proposed project impacts on human health.

Determination: **There will be no significant adverse impact to human health from the proposed project.**

PRIVATE PROPERTY - Assess whether there are any government regulatory impacts on private property rights.
Yes ___ No X.

OTHER HUMAN ENVIRONMENTAL ISSUES - For routine actions of limited environmental impact, the following may be addressed in a checklist fashion.

Impacts on:

- (a) Cultural uniqueness and diversity? **No significant adverse impact.**
- (b) Local and state tax base and tax revenues? **No significant adverse impact.**

- (c) Existing land uses? **No significant adverse impact. The existing land use is not changing.**
 - (d) Quantity and distribution of employment? **No significant adverse impact.**
 - (e) Distribution and density of population and housing? **No significant adverse impact.**
 - (f) Demands for government services? **No significant adverse impact.**
 - (g) Industrial and commercial activity? **No significant adverse impact.**
 - (h) Utilities? **No significant adverse impact.**
 - (i) Transportation? **No significant adverse impact.**
 - (j) Safety? **No significant adverse impact.**
 - (k) Other appropriate social and economic circumstances? **No significant impact.**
2. Secondary and cumulative impacts on the physical environment and human population:
- Secondary Impacts: **There have been no secondary impacts on the physical environment and human population identified at this time.**
- Cumulative Impacts: **There have been no cumulative impacts on the physical environment and human population identified at this time.**
3. Describe any mitigation/stipulation measures: **No mitigation or stipulation measures have been identified or discussed at this time. The application will go through the DNRC public notice procedure, and water users concerned with the potential impacts will be given the opportunity to object to the application. The decision by the DNRC to grant or deny the application would not be made until these review processes are completed.**
4. Description and analysis of reasonable alternatives to the proposed action, including the no action alternative, if an alternative is reasonably available and prudent to consider: **There do not appear to be any reasonable alternatives to the proposed action. The no action alternative would have the applicant continue to flood irrigate the property as it has been in the past.**

PART III. Conclusion

- 1. Preferred Alternative: **Issue the authorization as applied for by the applicant, or in some modified form considered reasonable.**
- 2. Comments and Responses: **There have not been comments or responses at this time.**

3. Finding:
Yes ___ No X Based on the significance criteria evaluated in this EA, is an EIS required?

If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action: **An environmental assessment is the appropriate level of analysis for the proposed action because no significant environmental impacts were identified.**

Name of person(s) responsible for preparation of EA:

Name: Kathy Arndt
Title: Water Resources Specialist
Date: August 12, 2008