

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 name and address: **Conners Family Revocable Trust
132 Thunder Ridge Trl
Lewistown, MT 59457-8603**
2. Type of action: **Application for Beneficial Water Use Permit No. 41S 30121942**
3. Water source name: **Unnamed Tributary of Big Spring Creek**
4. Location affected by project: **N2NWNW Sec 25 Twp 15N Rge 18E, Fergus County**
5. Narrative summary of the proposed project, purpose, action to be taken, and benefits:

Applicant proposes to add two purposes to an existing reservoir. Applicant proposes to appropriate up to 11.8 acre-feet (AF) of water from an on-stream reservoir for Fishery and Irrigation purposes. The dam is located in the NWNWNW Sec 25 Twp 15N Rge 18E, Fergus County. The reservoir has a capacity of 8.2 AF and will divert water year-round. The reservoir and its proposed uses are located in the N2NWNW Sec 25. Applicant proposes to use 9.8 AF of water for Fishery and 2.0 AF of water to sprinkle irrigate two acres consisting of mostly hay but also some fruit trees. The period of use for Fishery will be January 1 through December 31 and the period of use for Irrigation will be April 25 through October 5.

DNRC shall issue a water use permit if an applicant proves the criteria in 85-2-311 MCA are met.

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

**Dept. of Environmental Quality Website – Clean Water Act Information Center
MT. National Heritage Program Website - Species of Concern
USDI Fish & Wildlife Service Website - Endangered and Threatened Species
USDI Fish & Wildlife Service – Wetlands Online Mapper
USDA Natural Resources Conservation Service – 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 Impact.**

The source of water associated with this permit is an Unnamed Tributary of Big Spring Creek in Fergus County. Per the Department of Environmental Quality (DEQ) Clean Water Act Information Center interactive map, the source is not identified as dewatered. The Applicant has already constructed the reservoir; it is not anticipated that the addition of proposed uses will worsen the condition of the stream. The Applicant's plan to prevent potential negative downstream impacts includes monitoring stream flows and measuring water entering and exiting reservoir. It is expected that measurement conditions will be applied to this water right if the permit is granted by the Department. Such conditions will help to ensure the Applicant does not exceed his permitted volume or adversely affect senior water users below his reservoir.

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 Impact.**

The DEQ website does not identify or mention the unnamed tributary the reservoir is located on. The website does identify the stretch of Big Spring Creek below the unnamed tributary as not fully supporting primary contact recreation and aquatic life due to polychlorinated biphenyls (PCBs) from aquaculture and contaminated sediment. The website does not list any beneficial uses of the stream as threatened. There is a low likelihood that water quality will be adversely affected as a result of adding Fishery and Irrigation uses to the reservoir.

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 Impact.**

The proposed permit should not have a significant impact on ground water quality or supply. The dam captures surface water from an Unnamed Tributary of Big Spring Creek; however, there are natural springs in and above the reservoir which pool and contribute water to the pond also. The reservoir has been in existence for over a year, so no significant changes are anticipated from adding the two proposed additional uses to it.

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 Impact.**

It is not anticipated that the proposed permit will have a significant impact on stream channels, riparian areas, or stream flows. USGS topographic maps indicate the source is an intermittent stream therefore when water is not flowing, it may remain in isolated pools or surface water may be absent altogether. There are two reservoirs on the source: the Applicant's and another about a quarter of a mile above his. Although the Applicant's dam impounds all of the water originating in the source, he has stated that he will measure water entering and exiting the reservoir to ensure its outflow rate does not fall below the inflow rate.

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 Impact.**

The Montana National Heritage Program lists four Species of Concern within Township 15 North, Range 18 East. The common names for the two mammal species listed are the Townsend's Big-eared Bat and the Hoary Bat. The common name for the bird species is the Great Blue Heron and the common name for the fish species is the Northern Redbelly Dace. The website lists two plant Species of Concern: the Silver Bladderpod and the Wood Lily. Both are flowering plants.

The United States Department of Interior Fish and Wildlife Service lists the Canada Lynx as threatened in Fergus Co. It lists the Pallid Sturgeon as endangered. The Whitebark Pine is listed as a candidate species. Although these species are identified in Fergus Co because one would reasonably expect them to occur there, not all of the identified species are necessarily found in the area of the proposed change.

The proposed project is not located in general sage grouse habitat. It is not expected that any of the species mentioned above will be negatively affected, the reservoir is already in existence and the Northern Redbelly Dace is not known to habituate the unnamed tributary.

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: **No Significant Impact.**

The USDI Fish & Wildlife Service – Wetlands Online Mapper shows a Freshwater Emergent Wetland just above (east of) the Applicant’s reservoir; it should not be affected by the proposed permit since the reservoir is already constructed to its maximum impoundment with no direct impacts to the wetlands.

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

Determination: **No Significant Impact.**

This project proposes to add two new purposes to an existing, on-stream reservoir located on an intermittent stream, an Unnamed Tributary of Big Spring Creek. Little impact is expected to wildlife, waterfowl, or fisheries. The reservoir may actually provide enhanced habitat for wildlife and waterfowl in the area. The Applicant plans to stock the reservoir with fish if his permit is approved.

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 Impact.**

No significant impacts to the soil profile are anticipated. The predominant soil type is Timberg-Castner complex, 15 to 45 percent slopes. The Sodium Adsorption Ratio is nonsaline to very slightly saline and the available water storage is low for the soil components in the area of interest. The Applicant proposes to add fishery and two acres of sprinkler irrigation to the existing reservoir. The two-acre field is proposed to be located north and northwest of the existing reservoir; a wheeled sprinkler cart will be used to irrigate the small field. If permitted, the two-acre field will experience increased soil moisture due to it being irrigated. Once a crop is established, little erosion should occur. Therefore, soil quality, alteration of soil stability, or moisture content should not be negatively impacted by this project.

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 Impact.**

The reservoir proposing to have Fishery and Irrigation purposes added to it already exists. The soil has already been disturbed from when the reservoir was constructed. Some vegetation surrounding the reservoir has regrown. If the project is permitted, a crop will

be grown and fish will be stocked. The property owner is responsible for controlling noxious weeds on their 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 Impact.**

A gas-powered pump will be used to pump water over the dam in the event that a call for water is made or stream flows in Big Spring Creek drop below 110 CFS (Department of Fish, Wildlife & Parks' Murphy Right) and water is still flowing into the reservoir. No impacts to air quality or adverse effects to vegetation are expected as a result of this proposal.

HISTORICAL AND ARCHEOLOGICAL SITES - *Assess whether there will be degradation of unique archeological or historical sites in the vicinity of the proposed project if it is on State or Federal Lands. If it is not on State or Federal Lands simply state NA-project not located on State or Federal Lands.*

Determination: **N/A - Project not located on State or Federal Lands**

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 Impact.**

No additional impacts are anticipated.

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 Impact.**

No locally adopted environmental plans or goals have been identified.

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 Impact.**

The proposal should not negatively impact recreational activities in the area.

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

Determination: **No Significant Impact.**

No impacts to human health have been identified.

PRIVATE PROPERTY - Assess whether there are any government regulatory impacts on private property rights.

Yes___ No_ **X**_ If yes, analyze any alternatives considered that could reduce, minimize, or eliminate the regulation of private property rights.

Determination: **No Significant Impact.**

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? **None**
- (b) Local and state tax base and tax revenues? **None**
- (c) Existing land uses? **The existing reservoir has previously been filed on for stock watering purposes by the Applicant. If the proposed uses for fishery and irrigation are granted, the Applicant will withdraw their existing stock water right to the reservoir.**
- (d) Quantity and distribution of employment? **None**
- (e) Distribution and density of population and housing? **None**
- (f) Demands for government services? **None**
- (g) Industrial and commercial activity? **None**
- (h) Utilities? **The irrigation purpose will utilize a secondary diversion (gas-powered pump in the reservoir) to irrigate two acres of hay and fruit trees using a wheeled sprinkler cart.**
- (i) Transportation? **None**
- (j) Safety? **None**
- (k) Other appropriate social and economic circumstances? **None**

2. *Secondary and cumulative impacts on the physical environment and human population:*

Secondary Impacts – No secondary impacts are anticipated.

Cumulative Impacts – No cumulative impacts have been identified.

3. *Describe any mitigation/stipulation measures:*

No mitigation or stipulation measures have been identified by the Applicant. The Department may impose conditions to ensure required criteria are met.

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:*

No action alternative: Deny the application. This alternative would result in none of the benefits being realized by the Applicant.

PART III. Conclusion

1. ***Preferred Alternative***

The preferred alternative is the proposed alternative.

2. ***Comments and Responses***

None Received.

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:

None of the identified impacts for any of the alternatives are significant as defined in ARM 36.2.524.

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

Name: Melissa Norris

Title: Water Resources Specialist – Lewistown Regional Office

Date: 11/13/2019