

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

Applicant/Contact name and address:

Ms. Debra L. Hayes
1093 Three Runs Plantation Drive
Aiken, SC, 29803

Type of action: Application to Change No. 42J 30164475

Water source name: Groundwater

Location affected by the project: Table 1

Narrative summary of the proposed project, purpose, action to be taken, and benefits:

The applicant requires additional stock tanks due to a lack of surface water previously available. The project will not increase its volume, flow rate, or herd size; the Applicant will not exceed 15.0 GPM, up to 1.5 AF per year, the amount historically allotted to Powder River Declaration 772-00 since 1943. The applicant will keep the historic well and tank, and add seven stock tanks, for a total of 8 stock tanks on Powder River Declaration 772-00. One of the seven stock tanks is located on State Land and is permitted by State Lands Lease No. 827, March 1, 2021, to February 28, 2031. These stock tanks will provide water for stock and wildlife. The water will be conveyed by a pipeline system laid beneath the land surface. There will be no impediment to surface water flow, effect on recreation, or an ongoing disturbance to land. Table 1.

Table 1: Place of Use for Powder River Declaration 772-00

POU#	Map Place Name	Quarter Sections	Section	Township	Range	Change Type	Land Owner
1	Historical & Proposed	SWSENW	2	8S	50E	Permanent	Applicant
2	PST1	NWSWSW	2	8S	50E	Permanent	Applicant
3	PST2	NENENW	10	8S	50E	Permanent	Applicant
4	PST3	NESENE	9	8S	50E	Permanent	Applicant
5	PST4	SESENW	10	8S	50E	Permanent	Applicant
6	PST5	SESWNE	2	8S	50E	Permanent	Applicant
7	PST7	Lot 1 (NWNENE)	1	8S	50E	Permanent	Applicant
8*	PST6*	NESESW	36	7S	50E	Temporary*	State of Montana

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

Montana Department of Natural Resources and Conservation
Montana Department of Fish, Wildlife and Parks (FWP)
Montana Department of Environmental Quality (DEQ)
Montana Sage Grouse Habitat Conservation Program (SGHCP)
Montana Natural Heritage Program (NHP)
U.S. Fish and Wildlife Service (USFWS)
U.S. Department of Agriculture, National Resource Conservation Service (USDA, NRCS)

Part II. Environmental Review

1. Environmental Impact Checklist:

PHYSICAL ENVIRONMENT

WATER QUANTITY, QUALITY AND DISTRIBUTION

Water quantity:

This project utilizes the historic well on the water right. The project will not increase its volume, flow rate, or herd size; the Applicant will not exceed 15.0 GPM, up to 1.5 AF per year, the amount historically allotted to Powder River Declaration 772-00. Nor is there an increase in conveyance loss due to the use of pipelines. There will be no effects made to water quantity.

Determination: No Significant Impact

Water quality:

This project utilizes the historic well on the water right. There will be no effects on water quantity.

Determination: No Significant Impact

Groundwater

The Applicant will not exceed 15.0 GPM, up to 1.5 AF per year, the amount historically allotted to Powder River Declaration 772-00, since 1943.

Determination: No Significant Impact

Diversion works:

The project will convey water from the historic well via pipelines to a total of 8 stock tanks. The pipeline runs underground. Each stock tank, except for the last, have floats to prevent overflow. Any excess water will alleviate the loss of surface water in the area, and likely recharge the groundwater system, if not first consumed by stock and wildlife.

Determination: No Significant Impact

UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES

Endangered and threatened species

The Montana Natural Heritage Program (MT NHP) identifies the following as Species of Concern (SOC) within the general area of the project:

Amphibian: Great Plains Toad and Northern Leopard Frog.

Bird: Pinyon Jay, Common Poorwill, Sharp-tailed Grouse, Yellow-billed Cuckoo, Red-headed Woodpecker, Plumbeous Vireo, Eastern Bluebird, Lewis's Woodpecker, Grasshopper Sparrow, Golden Eagle, Cassin's Kingbird, Ovenbird, Black-and-white Warbler, Brewer's Sparrow, Eastern Screech-Owl, Great Blue Heron, American Goshawk, Clark's Nutcracker, Greater Sage-Grouse, Loggerhead Shrike, Long-billed Curlew, Sage Thrasher, Bobolink, Cassin's Finch, Black-billed Cuckoo, Burrowing Owl, Ferruginous Hawk, and Sprague's Pipit.

Insect: Danaus Plexippus and Bombus suckleyi.

Mammal: Northern Hoary Bat, North American Porcupine, Meadow Jumping Mouse, Pallid Bat, Long-legged Myotis, Townsend's Big-eared Bat, Spotted Bat, Merriam's Shrew, Eastern Red Bat, Long-eared Myotis, Prairie Shrew, Black-tailed Prairie Dog, Little Brown Myotis, Silver-haired Bat, Fringed Myotis, and Northern Myotis.

Reptile: Western Milksnake, Plains Hog-nosed Snake, and Greater Short-horned Lizard.

Vegetation: Dichanthelium oligosanthes var. scribnerianum, Astragalus ceramicus var. filifolius, Cirsium pulcherrimum, Triodanis leptocarpa, Physaria brassicoides, Physaria ludoviciana, Pediomelum hypogaeum var. hypogaeum, Dalea enneandra, Carex gravida, Astragalus barrii, Carex crawei, and Cyperus schweinitzii.

While there is an abundance of species present, this project is not expected to have an adverse effect on the wildlife community. The increase in stock tanks in the area may benefit the wildlife community.

Determination: No Significant Impact

Wetlands

No wetlands were claimed or proposed in this project or identified in the general area of the project were reported on the Montana Natural Heritage Program (MT NHP) report.

Determination: No Significant Impact

Ponds

No ponds were claimed or proposed in this project or identified in the general area of the project via the Montana Natural Heritage Program (MT NHP) report.

Determination: No Significant Impact

GEOLOGY/SOIL QUALITY, STABILITY, AND MOISTURE

USDA Web Soil Survey gives the following soils throughout the project area:

Arvada-Bone complex, 0 to 4 percent slopes; Cabba association, 15 to 50 percent slopes; Elso silt loam, 8 to 15 percent slopes; Elso silt loam, 15 to 45 percent slopes; Fergus-Relan association, 2 to 8 percent slopes; Fort Collins silt loam, 2 to 4 percent slopes; Fort Collins silt loam, 4 to 8 percent slopes; Haverson silt loam; Haverson silty clay loam; Haverson soils, channeled; Hesper silty clay loam, 2 to 4 percent slopes; Hesper silty clay loam, 4 to 8 percent slopes; Hesper silty clay loam, 8 to 15 percent slopes; Hopley and Relan loams, 4 to 8 percent slopes; Hydro silty clay loam, 4 to 8 percent slopes; Kyle clay, 8 to 15 percent slopes; McRae silt loam, 0 to 2 percent slopes; McRae silt loam, 2 to 4 percent slopes; McRae silt loam, 4 to 8 percent slopes; Midway-Elso association, 8 to 35 percent slopes; Midway and Elso rocky soils, 35 to 75 percent slopes; Relan gravelly loam, gravelly variant, 4 to 8 percent slopes; Remmit-Ocean lake fine sandy loam, 8 to 25 percent slopes; Ringling slaty loam, 20 to 50 percent slopes; Ringling-Cabba association, 15 to 50 percent slopes; Ringling-Relan association, 6 to 25 percent slopes; and Terrace escarpments.

While soil types are abundant, the source is groundwater from an established well, and the conveyance system is underground. There should be no continued effect on soil after the pipelines have been placed, covered with soil, and vegetation has had time to regrow.

Determination: No Significant Impact

VEGETATION COVER, QUANTITY, AND QUALITY/NOXIOUS WEEDS

The Montana Natural Heritage Program (MT NHP) identified the following primary land cover in the general project area:

Great Plains Mixed grass Prairie, Great Plains Ponderosa Pine Woodland and Savanna, Big Sagebrush Steppe, and Great Plains Riparian.

MT NHP identified the following as Invasive and Pest Species:

Nymphaea odorata, *Nymphoides peltate*, *Isatis tinctoria*, *Hieracium piloselloides*, *Hieracium praealtum*, *Ventenata dubia*, *Cirsium arvense*, *Euphorbia virgata*, *Centaurea stoebe*, *Centaurea diffusa*, *Potentilla recta*, *Cynoglossum officinale*, *Convolvulus arvensis*, and *Bromus tectorum*.

It will be the responsibility of the landowner to prevent the establishment and spread of noxious weeds.

Determination: No Significant Impact

AIR QUALITY

No impact on air quality is expected due to this project proposing a change in point of diversion.

Determination: No Impact

HISTORICAL AND ARCHEOLOGICAL SITES

Not applicable; the project is not located on State or Federal Lands. The Montana State Historic Preservation Office was not consulted regarding this project. As the project is located on private property, any cultural resource inventory conducted would be at the property owner's discretion.

Determination: Not Applicable

DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AND ENERGY

No additional impact on other environmental resources is expected due to this project.

Determination: No Impact

HUMAN ENVIRONMENT

LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS

There are no known locally adopted environmental plans or goals.

Determination: Not Applicable

ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES

This project will have no significant impact on recreational and wilderness activities.

Determination: No Significant Impact

HUMAN HEALTH

This project will have no significant impact on human health.

Determination: No Significant Impact

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 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? No Significant Impact
- (b) Local and state tax base and tax revenues? No Significant Impact
- (c) Existing land uses? No Significant Impact
- (d) Quantity and distribution of employment? No Significant Impact
- (e) Distribution and density of population and housing? No Significant Impact

(f) Demands for government services? No Significant Impact

(g) Industrial and commercial activity? No Significant Impact

(h) Utilities? No Significant Impact

(i) Transportation? No Significant Impact

(j) Safety? No Significant Impact

(k) Other appropriate social and economic circumstances? No Significant Impact

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

(a) Secondary Impacts: No secondary impacts are identified

(b) Cumulative Impacts: No cumulative impacts are identified

3. Describe any mitigation/stipulation measures: None at this time

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:

The alternative to the proposed project is the no-action alternative. The no-action alternative prevents the property owner from improving the operation of their irrigation system. The no-action alternative does not prevent or mitigate any significant environmental impacts.

PART III. Conclusion

1. Preferred Alternative: Issue the change authorization if the applicant proves the criteria in 85-2-402 MCA are met.

2. Comments and Responses: None at this time.

3. Finding:

Yes___ No X Based on the significance criteria evaluated in this EA, is an EIS required?

No significant environmental impacts were identified; therefore, an EIS is not required.

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

Name: Cassey Strebeck

Title: Water Resource Specialist

Date: May 12, 2025