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:

   Cougar Investments, LLC
   Attn: Erin Kirschenmann
   9428 Anglers Way
   Billings, MT, 59101

2. Type of action: Application for Beneficial Water Use Permit No. 43Q 30164891

3. Water source name: Groundwater

4. Location affected by the project: Generally located in the SESW and SWSW of Sec. 30, T1S, R25E

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

   The Applicant proposes to divert and use groundwater from 14 wells (PODs), at a total flow rate of 135 GPM, up to 48.01 AF for commercial and lawn and garden irrigation (65 GPM for commercial use + 70 GPM for lawn and garden; shown in Table 1) as follows:

   Commercial Use:
   The Applicant proposes to divert water from January 1 to December 31, from 13 wells to supply up to 12.22 AF/YR, at 5 GPM at each well (POD), amounting to a total of 65 GPM, for the period of use from January 1 to December 31 for commercial use within the subdivision.

   Lawn and Garden:
   The Applicant proposes to divert water from April 1 to October 31, from 14 wells, up to 35.79 AF/YR at 5 GPM at each well, amounting to a total of 70 GPM for irrigation purposes within the subdivision. Water will be used for the period of April 1 to October 31 to irrigate 14.321 total acres, across 14 places of use.

   Note: This project has a completion date of 20 years.

Table 1: Details of Project

Purpose	Flow Rate (GPM	Volume (AF)	Period of Use	Period of Diversion	Acres
Commercial	65	12.22	01/01 – 12/31	01/01 – 12/31	N/A
Lawn & Garden	70	35.79	04/01 – 10/31	04/01 – 10/31	14.32
Total	135	48.01			14.32

The 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)

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 is not expected to affect water quantity. The project is for groundwater diverted from 14 wells. DNRC Groundwater Hydrologist, Jack Landers, identified the Yellowstone River Terrace Level 3 (Qat 3) as the source aquifer, and determined the following as reported in the Groundwater Permit Technical Analyses Report - Part A for Application No. 43Q 30164891:

PHYSICAL AVAILABILITY: The predicted 0.01-foot drawdown contour, or zone of influence (ZOI), occurs at a maximum distance of 12,200 ft from the Applicant's wells. Groundwater flux through the ZOI is equal to 2,066 AF/year.

DRAWDOWN IN EXISTING WELLS: The predicted 1-ft drawdown contour occurs at a maximum distance of 100 ft from the Applicant's wells after pumping the wells for five years following the schedule identified. Zero groundwater rights in the source aquifer are predicted to experience drawdown equal to or greater than one foot.

NET DEPLETION TO SURFACE WATER: Danford Drain (3.3 miles east of wells) is identified as being hydraulically connected to the source aquifer. Danford Drain is expected to have an annual Net Depletion of 26.3 AF.

REMAINING AVAILABLE WATER IN WATER COLUMN (FT): 29.7

Determination: No Significant Impact

Water quality – The project is for the use of groundwater for commercial and lawn & garden purposes. There is no expected impact on source water quality, nor surface water of the depleted source, Danford Drain. However, this is a 20-year project that does not know the final commercial use of the proposed places of use. Runoff from construction, along with the extended time frame, means this project has a potential impact on surrounding areas.

Determination: Potential Impact

Groundwater – There are no expected impacts on groundwater. Please refer to the Water Quantity section for more details.

Determination: No Significant Impact

Diversion works - The project will convey water from 14 wells via pipelines to a total of 14 places of use for commercial and lawn & garden purposes.

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: Northern Leopard Frog.

Bird: Bald Eagle, Great Blue Heron, Pinyon Jay, Golden Eagle, Yellow-billed Cuckoo, Hooded Merganser, American White Pelican, Broad-tailed Hummingbird, Plumbeous Vireo, Eastern Screech-Owl, Black-billed Cuckoo, Dickcissel, Barrow's Goldeneye, Peregrine Falcon, Sharp-tailed Grouse, Black-necked Stilt, Bobolink, Cassin's Kingbird, Eastern Bluebird, Grasshopper Sparrow, Long-billed Curlew, Marbled Godwit, Ovenbird, Veery, American Bittern, Black-crowned Night Heron, Chimney Swift, White-faced Ibis, and Sprague's Pipit.

Insect: Bombus suckleyi, Danaus Plexippus, and Bombus occidentalis.

Mammal: Western Spotted Skunk, North American Porcupine, Black-tailed Prairie Dog, Little Brown Myotis, Long-eared Myotis, Long-legged Myotis, Merriam's Shrew, Prairie Shrew, Silver-haired Bat, Eastern Red Bat, Northern Hoary Bat, Pallid Bat, ant Spotted Bat.

Reptile: Western Milksnake, Plains Hog-nosed Snake, and Snapping Turtle.

Vegetation: Carex crawei.

While there is an abundance of species present, this project is not expected to have a long-term effect on the wildlife community. The 20-year project completion and the need for construction, and removal of habitat creates a potential impact on wildlife in the area.

Determination: Potential Impact

Wetlands **-** No wetlands were claimed or proposed in this project. The Montana Natural Heritage Program (MT NHP) identifies some riparian and wetland cover on land east of the Proposed Place of Use in the SESESW of Sec. 30, T1S, R25E, but not on the proposed place of use.

The property east of the proposed place of use consists of Palustrine-Emergent (P, EM), “wetlands with erect, rooted herbaceous vegetation present during most of the growing season”, and Lotic Riparian (Rp, 1, FO), riparian class that has woody vegetation that is greater than 6 meters (20 feet) tall.

Runoff from this project may potentially harm the wetland/riparian zone on the adjacent property, geocode: 03-0926-30-3-01-01-0000.

The FWS National Wetlands Inventory, surface waters and wetlands, map does not show that the proposed place of use or the parcel to the east having any recognized wetlands.

Determination: Potential Impact

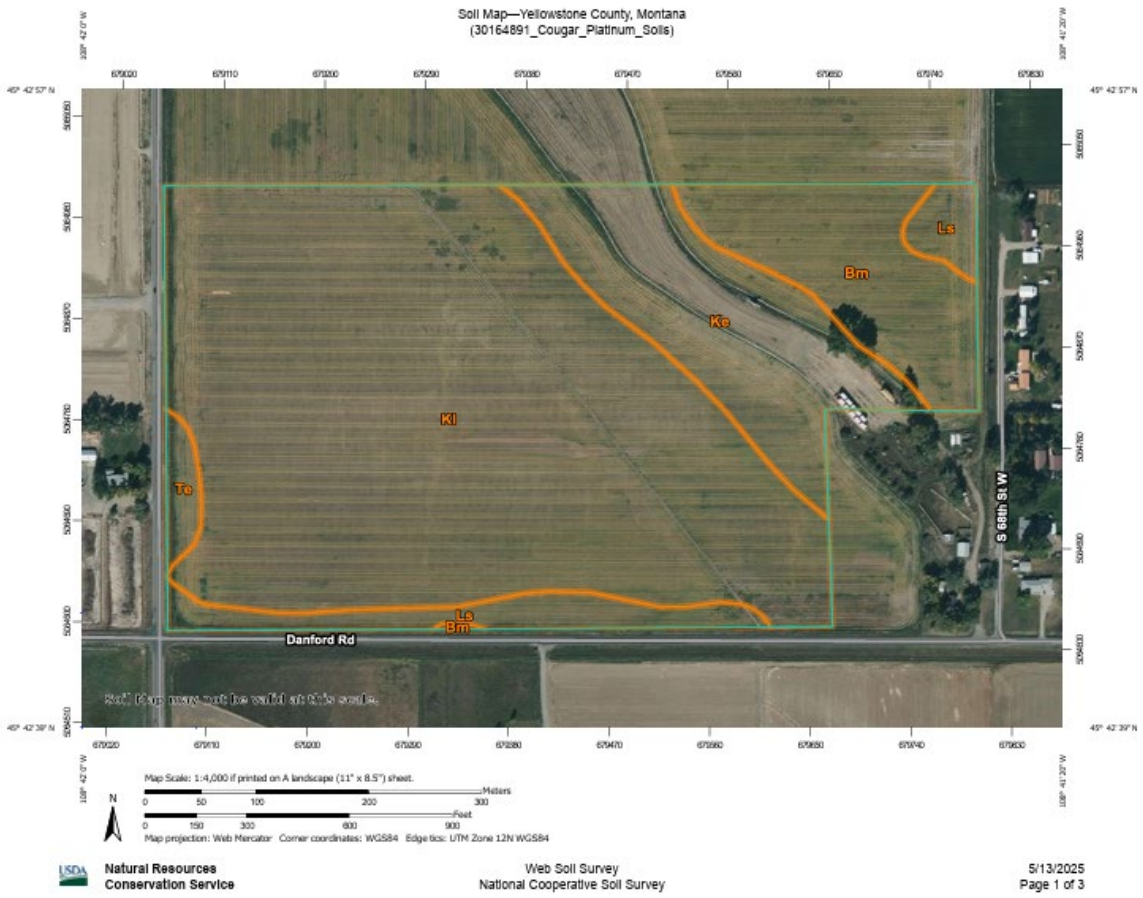
Ponds **-** No ponds were claimed or proposed in this project or identified in the general area of the project via the Montana Natural Heritage Program (MT NHP) report.

Determination: No Significant Impact

GEOLOGY/SOIL QUALITY, STABILITY AND MOISTURE - The project area consists primarily of Kyle silty clay, 0 to 1 percent slopes (Kl; 66.8%); Keiser silt clay loam, 1 to 4 percent slopes (Ke; 15.0%); Bew silty clay loam, 0 to 1 percent slopes (Bm; 10.8 %); and Lohmiller soils, seeped, 0 to 2 percent slopes (Ls; 6.1%), and Toluca clay loam, 0 to 1 percent slopes (Te; 1.3%).

While soil types are abundant, the source is groundwater from a well. There should be no continued effect on the soil after the construction is completed and the pipelines have been placed, covered with soil, and vegetation has had time to regrow. However, this project has a completion date of 20 years, and land cover will change from agriculture to industrial, increasing runoff.

Determination: Potential Impact



VEGETATION COVER, QUANTITY AND QUALITY/NOXIOUS WEEDS – The Montana Natural Heritage Program (MT NHP) identifies cultivated crops as the primary land cover type, followed by Great Plains Floodplain, and Great Plains Mixed grass Prairie.

MT NHP identified the following as Invasive and Pest Species:

Centaurea solstitialis, Isatis tinctoria, Lythrum salicaria, Polygonum cuspidatum, Echium vulgare, Ventenata dubia, Rhamnus cathartica, Lepidium latifolium, Ranunculus acris, Centaurea diffusa, Centaurea stoebe, Convolvulus arvensis, Linaria dalmatica, Cirsium arvense, Cynoglossum officinale, Lepidium draba, Acroptilon repens, Berteroa incana, Euphorbia virgata, Potentilla recta, Tamarix ramosissima, Tanacetum vulgare, Hypericum perforatum, Leucanthemum vulgare, Elaeagnus angustifolia, 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 – This project has a 20-year expectation to completion, with commercial usage. Their final commercial usage is unknown. The extended time frame, along with

the potential commercial usage and construction, may have a potential impact on air quality.

Determination: Potential 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: No Impact

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. However, impacts from construction could create a potential impact.

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:

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:*

Secondary Impacts: No secondary impacts are identified

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

2 Comments and Responses: The Applicant's consultant, Performance Engineering, has completed an Environmental Assessment and Community Impact Statement for the Platinum Commercial Park Subdivision (the proposed place of use), dated November 2024, received by DNRC on May 14, 2025.

The assessment states the following:

i. Groundwater depletion and runoff (water quality) will be mitigated using vegetation buffers, ditches, and stormwater retention ponds (B2, D1).
ii. Critical plant communities were not known to be present (D1b, D2b).
iii. There are no ponds for fish or waterfowl to reside, and no known species of concern that inhabit the area (E1).
iv. There are no delineated wetlands within the AOI (D7).
v. Minimal impact on air quality due to Billings, MT, not being within an area of nonattainment (D3).

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 <u>why</u> the EA is the appropriate level of analysis for this proposed action:

No significant environmental impacts were identified; therefore, an EIS is not required. *Furthermore, the Applicant's consultant, Performance Engineering, has conducted a pre-construction environmental assessment.*

Name of person responsible for the preparation of this EA:

Name: Cassey Strebeck
Title: Water Resource Specialist
Date: May 14, 2025