

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:

Applicant:

R&D LLC
P.O. Box 168
Sheridan, MT 59749-0168

Consultant:

Pioneer Technical Services Inc.
P.O. Box 3445
Butte, MT 59702-3445

2. Type of action: Application for a Beneficial Water Use Permit No. 41C 30103257. The Applicant proposes to increase the flow rate at which they pump water from an existing gravel pit to a maximum of 200 gallons per minute (GPM).
3. Water source name: Groundwater. This project is located on private property approximately 4,800 ft south of Mill Creek and 9,500 ft northeast of the Ruby River. Numerous ditches and ditch laterals are located in the area.
4. Location affected by project: SW $\frac{1}{4}$ of Section 35, T04 S, R05 W, Madison County, approximately one mile south of Sheridan, Montana.



Figure 1: Map of location affected by project. Updated aerial imagery dated 9/4/2014 from Google Earth.

5. Narrative summary of the proposed project, purpose, action to be taken, and benefits: The Applicant requests a Beneficial Water Use Permit for additional flow rate for the purpose of commercial gravel washing and dust abatement. All volume used in this project is accounted for under Ground Water Certificate 41C 30065402, which was issued to the Applicant for a maximum use of 8.34 AF and 35 GPM on April 8, 2015. The current permit application requests a maximum flow rate of 200 GPM. The place of use and point of diversion are located in the NWNWSW of Section 35, T04 S, R05 W, Madison County, near Sheridan, Montana. The source of water is groundwater from an existing gravel pit.

The Department shall issue a permit if the Applicant proves the criteria in §85-2-311, MCA, are met.

6. Agencies consulted during preparation of the Environmental Assessment:
- Montana Department of Fish, Wildlife & Parks (FWP) – Montana Fisheries Information System (MFISH)
 - <http://fwp.mt.gov/fishing/mFish/>
 - Montana Department of Environmental Quality (DEQ) – Clean Water Act Information Center (CWAIC)
 - <http://deq.mt.gov/wqinfo/CWAIC/default.mcp>
 - Montana National Heritage Program (MTNHP) – Species of Concern:
 - <http://mtnhp.org/SpeciesOfConcern>
 - U.S. Fish & Wildlife Service (USFWS) – National Wetlands Inventory Wetlands Mapper
 - <http://www.fws.gov/wetlands/Data/Mapper.html>
 - Natural Resource Conservation Service (NRCS) – Web Soil Survey (WSS)
 - <http://websoilsurvey.sc.egov.usda.gov/App/HomePage.htm>

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 identified. The source of water is groundwater. As determined by a search of MFISH conducted on January 15, 2016, the nearest stretch of the Ruby River is not listed as periodically or chronically dewatered. An upstream stretch of the Ruby, from Alder to Clear Creek, is listed as chronically dewatered, but this project site is downstream and will not impact that condition. The nearest stretch of Mill Creek (from mile 6.5 to 12.6) is listed as chronically dewatered, but an increase in flow rate will not have a significant impact on that condition because the total volume of groundwater diverted is not changing and the increased flow rate will not alter the pattern of use.

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 identified. According to a search of the DEQ CWAIC website conducted on January 15, 2016, this stretch of the Ruby River and this stretch of Mill Creek are listed as not supporting primary contact recreation or aquatic life due to low flow alterations, sedimentation/siltation, temperature concerns, total phosphorous, and alteration in streamside or littoral vegetative covers. The sources of these problems are from irrigated crop production, grazing in riparian or shoreline zones, and other water diversions. This permit will

not have a significant impact on water quality because no additional volume is proposed for use, only a higher flow rate. The increased flow rate will not alter the pattern of use.

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 identified. This permit will not significantly impact groundwater quality or supply and neither will it significantly impact surface water flows. The permit is only for additional flow rate – not volume. The additional flow rate will not alter the pattern of use.

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 identified. The Applicant proposes to pump water from an existing gravel pit for use in a gravel wash plant. The pumping of water from an existing pit will not cause significant channel impacts, significantly modify flow conditions, or create significant flow barriers. Dams and wells are not involved in this project.

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 identified. The Montana Heritage Program’s website was queried on January 15, 2016, for plant and animal species located within the project area. Results are summarized below.

- Animal Species of Concern: Townsend’s Big-eared Bat, Wolverine, Hoary Bat, Little Brown Myotis, Great Blue Heron, Burrowing Owl, Ferruginous Hawk, Veery Thrush, Cassin’s Finch, Plains Spadefoot Toad, and Westslope Cutthroat Trout. Eleven species total.
- Animal Potential Species of Concern: None.
- Animal Special Status Species: Bald Eagle. One total species.

The MTNHP website did not identify any plant Species of Concern, plant Potential Species of Concern, or plant Special Status Species.

The proposed project is to pump water from an existing gravel pit located on private property at an increased flow rate, so it will not have any significant impact on wildlife in the area.

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: Not applicable. According to a January 15, 2016, search of the USFWS Wetlands Mapper, there are no wetland areas in the project area.

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

Determination: No significant impact. The proposed project involves pumping water from an existing gravel pit and storing water in a settling pond. Both of these ponds were artificially created and are located on private property. Pumping water at an increased flow rate will not significantly impact wildlife, waterfowl, or fisheries resources. The volume used and the pattern of use are not being changed.

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 identified. Pumping water at an increased flow rate will not degrade soil quality, stability, or moisture content. Part of the proposed project is to use water for dust abatement for an existing gravel mining operation. A January 15, 2016, search of the NRCS WSS site did not identify any saline seeps in the area.

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 identified. The project involves pumping from an existing gravel pit, which should not significantly impact vegetation. Aerial photographs indicate that most of the project area is gravel or dirt without vegetation. This project should not increase the risk of spread of noxious weeds.

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 identified. Part of the proposed project is to use water for dust abatement for an existing gravel mining operation. This may help improve local air quality at the site.

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: Not applicable. The project is not located on State or Federal Lands. Furthermore, the Applicant made no mention of significant historical or archeological sites on the property.

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 impact identified. No other demands on environmental resources of land, water, and energy have been identified.

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 identified. The Applicant's goal is to pump water at an increased flow rate for use in washing gravel and conducting dust abatement. Their commercial purpose is a recognized beneficial use of water. This proposal is consistent with their business goals and does not conflict with locally adopted environmental plans or goals.

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 impact identified. This permit will not affect access to recreational activities or the quality of recreational and wilderness activities. This project is contained entirely on private property, and the Applicant proposes to pump water from a private gravel pit.

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

Determination: No significant impact identified. This permit should not significantly impact human health. Conducting dust abatement may be beneficial to the respiratory health of workers and other humans in the immediate vicinity of the project.

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 identified. The project does not impact government regulations on private property rights.

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 impacts identified.

(b) Local and state tax base and tax revenues? No significant impacts identified.

- (c) Existing land uses? No significant impacts identified.
- (d) Quantity and distribution of employment? No significant impacts identified.
- (e) Distribution and density of population and housing? No impacts identified.
- (f) Demands for government services? No significant impacts identified.
- (g) Industrial and commercial activity? No significant impacts identified.
- (h) Utilities? No impacts identified.
- (i) Transportation? No impacts identified.
- (j) Safety? No impacts identified.
- (k) Other appropriate social and economic circumstances? No impacts identified.

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

Secondary Impacts: No secondary impacts have been identified.

Cumulative Impacts: No cumulative impacts have been identified.

3. Describe any mitigation/stipulation measures: None.

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 reasonable alternatives have been identified. The Applicant has indicated that their currently authorized flow rate, 35 GPM, is insufficient to conduct their gravel mining and dust abatement operations. Instead of applying for a permit, they could potentially purchase water from the nearest municipality. That option would likely be significantly more expensive and less convenient and may have its own environmental impacts, such as increased truck traffic and higher greenhouse gas emissions, brought on by transporting water to the place of use. The no-action alternative would be to not divert water, which would likely not allow the Applicant to pursue their business activities.

PART III. Conclusion

1. Preferred Alternative: The proposed alternative is to grant the permit application, if the Applicant can prove that the criteria in §85-2-311, 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?

If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action: The EA is the appropriate level of analysis because the proposed project is to grant a permit for an increased flow rate to pump water from an existing gravel pit. The Applicant is not proposing to increase the volume of water diverted or alter their pattern of use. None of the identified impacts for any of the alternatives is significant as defined in ARM 36.2.524. No significant adverse effects are anticipated.

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

Name: Brent Zundel

Title: Water Resource Specialist

Date: February 3, 2016