

ENVIRONMENTAL ASSESSMENT
For Routine Actions with Limited Environmental Impact

Part I. Proposed Action Description

1. APPLICANT/CONTACT NAME AND ADDRESS:

QUIRK CATTLE CO
1551 BURMA RD
EUREKA, MT 59917-9487

2. TYPE OF ACTION:

Application to Change an Existing Irrigation Water Right 76D 30162783

3. WATER SOURCE NAME:

Indian Creek

4. LOCATION AFFECTED BY PROJECT:

NESWNE of Section 29, Township 37 N, Range 26 W, Lincoln County (Figure 1).

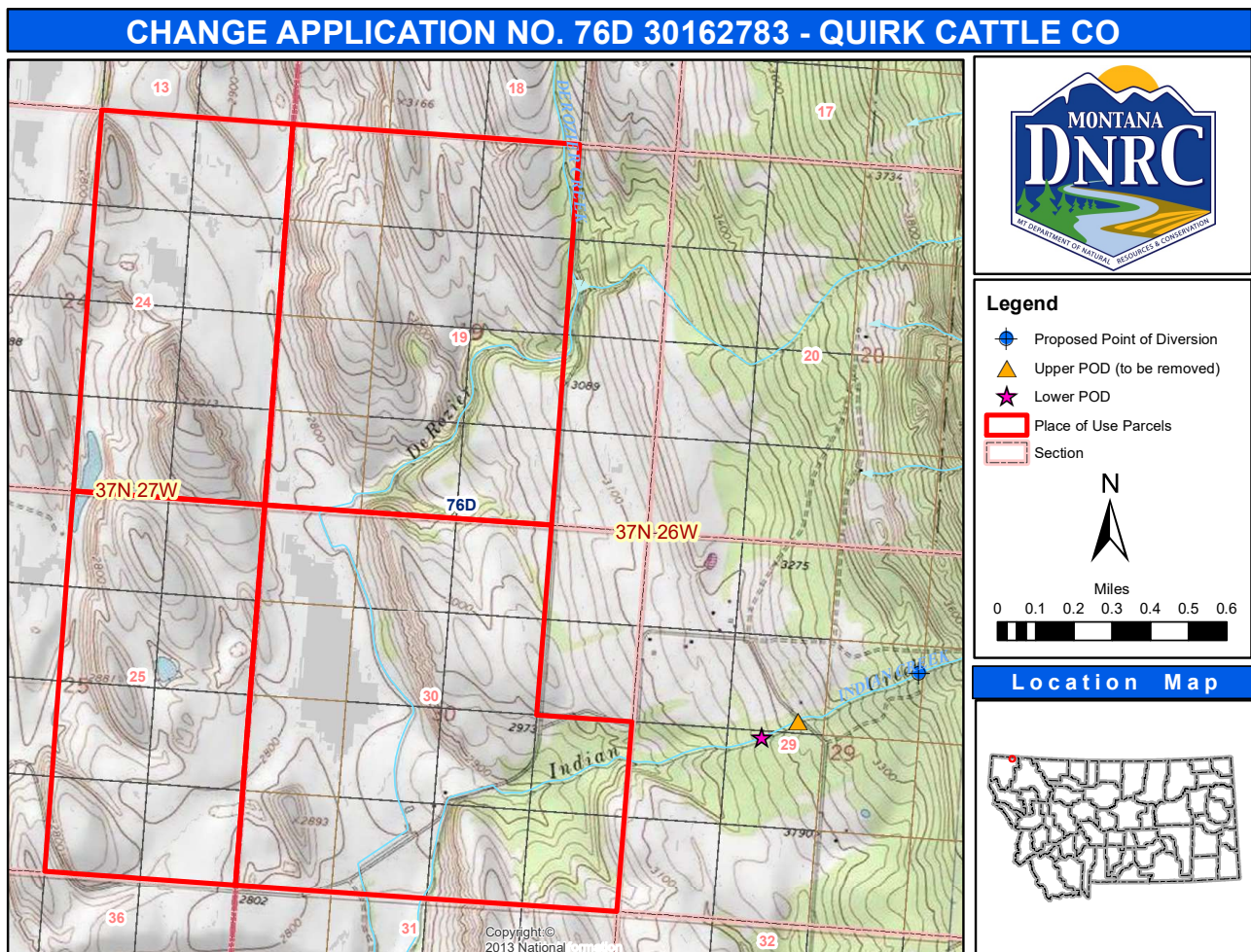


Figure 1: Map of place of use parcels, existing points of diversion, and the proposed point of diversion.

5. NARRATIVE SUMMARY OF THE PROPOSED PROJECT, PURPOSE, ACTION TO BE TAKEN, AND BENEFITS:

Statement of Claim No. 76D 118111-00 has two existing PODs on Indian Creek: the upstream/upper POD (displayed on the General Abstract as POD ID 1) located in the SESENW of Section 29, Township 37 N, Range 26 W, Lincoln County, and the downstream/lower POD (displayed on the General Abstract as POD ID 2) located in the NWNESW of Section 29, Township 37 N, Range 26 W, Lincoln County (Figure 1). The Applicant proposes to abandon the existing upper POD and move it approximately 1,850 feet upstream to a new shared diversion structure.

The lower POD was added to Statement of Claim 76D 118111-00 by Change Authorization No. 76D 30029246 in 2010. No changes to the place or purpose of use were proposed as a part of that change nor are they proposed as a part of this change. There is no storage component of this water right. The existing lower POD will remain in place.

The proposed shared POD will serve as the primary POD for Statements of Claim 76D 118111-00 (this application), 76D 118113-00, 76D 140170-00, and 76D 140172-00. Separate change applications have been submitted concurrently for 76D 118111-00 and 76D 140170-00, and the proposed change application for 76D 140172-00 has had a pre-application meeting with the department.

The project is in the Kootenai River Basin (76D) in an area that is not subject to water right basin closures or controlled groundwater area restrictions.

The DNRC shall grant the requested water right change if the applicant proves the criteria in 85-2-402 MCA are met.

6. AGENCIES CONSULTED DURING PREPARATION OF THE ENVIRONMENTAL ASSESSMENT:

- U.S. Fish and Wildlife Service (USFWS): National Wetlands Inventory Wetlands Mapper
- Montana Natural Heritage Program: Endangered, Threatened Species, and Species of Special Concern
- Montana Department of Fish Wildlife & Parks (DFWP): Dewatered Stream Information
- Montana Department of Environmental Quality (MDEQ): Clean Water Act Information Center
- U.S. Natural Resource Conservation Service (NRCS): Web Soil Survey

Part II. Environmental Review

1. ENVIRONMENTAL IMPACT CHECKLIST:

PHYSICAL ENVIRONMENT

1.1 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.

Indian Creek is listed as chronically dewatered from Burma Road to the mouth by MTDFWP. This reach is downstream of the proposed POD. This change will not result in an increase in total diverted or consumed flow rate and volume over historical use and thus will not cause additional dewatering.

Determination: No significant impact.

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.

Indian Creek is a tributary of the Tobacco River. The Tobacco River is a tributary of the Kootenai River (Lake Koocanusa).

Tobacco River: MDEQ Clean Water Act Information Center's 2020 Water Quality Information report lists the Tobacco River as:

- i. Water Quality Category 4A: All total maximum daily load (TMDL) plans needed to rectify all identified threats or impairments have been completed and approved;
- ii. Use Class B-1: Waters classified as suitable for drinking, culinary, and food processing purposes after conventional treatment; bathing, swimming and recreation; growth and propagation of salmonid fishes and associated aquatic life, waterfowl and furbearers; and agricultural and industrial water supply;
- iii. “Fully supporting” for: agriculture, drinking water, and primary contact recreation; and,
- iv. “Not fully supporting” for: aquatic life with probable causes for this designation being physical substrate habitat alterations and sedimentation/siltation from grazing in riparian/shoreline zones and streambank modifications/destabilization.

Lake Koocanusa: MDEQ Clean Water Act Information Center’s 2020 Water Quality Information report lists Lake Koocanusa as:

- i. Water Quality Category 5: Waters where one or more applicable beneficial uses have been assessed as being impaired or threatened, and a TMDL is required to address the factors causing the impairment or threat;
- ii. Use Class B-1: Waters classified as suitable for drinking, culinary, and food processing purposes after conventional treatment; bathing, swimming and recreation; growth and propagation of salmonid fishes and associated aquatic life, waterfowl and furbearers; and agricultural and industrial water supply;
- iii. “Fully supporting” for: agriculture, drinking water, and primary contact recreation; and,
- iv. “Not fully supporting” and “Threatened” for: aquatic life with probable causes for these designations being Selenium (sources outside state jurisdiction or borders) and flow regime modification (dam or impoundment).

The addition of a new POD for the diversion of water for the continuation of historically practiced irrigation is not anticipated to significantly affect water quality in these sources.

Determination: No significant impact.

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: N/A, project does not involve groundwater.

1.2 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.*

The Applicant proposes to move one of their two existing PODs by abandoning the upper POD associated with Boyle Ditch No.1 and adding a new shared POD in the NESWNE of Section 29, Township 37N, Range 26W to Statement of Claim No. 76D 118111-00. The existing lower POD will be retained for continued use when needed for operational flexibility. The new POD will be a screened intake structure with a gate valve at the head of a 14-inch PVC pipeline that will be shared between Statements of Claim 76D 118111-00 (7.5 CFS), 76D 118113-00 (5.0 CFS), 76D 140170-00 (2.0 CFS), and 76D 140172-00 (1.25 CFS). In total, the diversion and pipeline will divert and convey up to the 15.75 CFS associated with the four aforementioned water rights set to share the proposed diversion (7.5 CFS + 5.0 CFS + 2.0 CFS + 1.25 CFS = 15.75 CFS).

During times when the flow of Indian Creek is sufficient to divert water, up to 7.5 CFS associated with Statement of Claim 76D 118111-00 will be diverted into the proposed pipeline at the screened intake. The intake gate valve will regulate the rate at which water flows into the pipeline. Water will then gravity-flow through the 14-inch PVC pipeline (which approximately parallels Indian Creek) approximately 2,530 feet down to a valved turn-out. At this turn-out, water will be directed into the existing 12-inch pipeline associated with the existing lower POD of Statement of Claim 76D 118111-00. This tie-in of the proposed 14-inch pipeline to the existing 12-inch pipeline occurs at the location of the existing lower POD. An in-line flow meter with totalizer will be placed near the connection of the proposed 14-inch pipeline and existing 12-inch pipeline to regulate the diversion of water

into the 12-inch pipeline. Since the existing lower POD and 12-inch pipeline is shared between Statements of Claim 76D 118111-00 and 76D 118113-00, the meter at this turn-out will measure the water diverted from the proposed point of diversion for both Statements of Claim.

From this point in the system, water will be conveyed to and distributed within the place of use in the same manner as approved by perfected Change Authorization No. 76D 30029246 and as historically proven. Water will flow west through the 12-inch pipeline to a splitter. At the splitter, up to 7.5 CFS of water for Statement of Claim 76D 118111-00 will be directed north to that water right's historical place of use, while up to 5.0 CFS can be directed to the south to serve Statement of Claim No. 76D 118113-00.

The existing lower POD will still remain operational and can be used in place of the proposed POD if needed to supply water for Statements of Claim 76D 118111-00 and 76D 118113-00. The proposed POD will not be operated in combination with the existing POD being retained.

The Applicant provided pipe flow capacities calculated using the Manning Formula for uniform pipe flow for the 14-inch and 12-inch pipelines. The maximum capacity of the new shared screened intake and pipeline is calculated to be 24.0 CFS, meaning it is adequate to divert and convey the proposed 7.5 CFS associated with Statement of Claim No. 76D 118111-00, as well as the full 15.75 CFS required for all of the water rights that will use the proposed diversion. The maximum capacity of the existing 12-inch pipeline is calculated to be 9.0 CFS, meaning that the water for Statements of Claim 76D 118111-00 and 76D 118113-00 (7.5 CFS and 5.0 CFS, respectively) cannot be conveyed simultaneously at their maximum flows, but can be conveyed individually or in various combinations less than their maximum flows.

The Department finds the system capable of diverting, conveying, and distributing the proposed flow rate of 7.5 CFS and annual volume of 2,530.0 AF.

This project will not result in any channel or riparian impacts, nor will it create barriers or dams on the Indian Creek.

Determination: No significant impact.

1.3 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, 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."*

The Montana Natural Heritage Program website was reviewed to determine if there are any threatened or endangered fish, wildlife, plants, aquatic species, or any "species of special concern" in the project area that could be impacted by the proposed project. Fourteen animal and zero plant species of concern (Table 1) were identified in the general vicinity of the project area. Of these species, the Grizzly Bear (*Ursus arctos*) is listed as threatened by the USFWS. This general area has been in agricultural production for decades, and it is not anticipated that any species of concern will be further impacted by the proposed project. This project will not create any barriers to the migration or movement of fish or wildlife.

Table 1. Species of Concern		
Species Group	Common Name	Scientific Name
Mammals	Canada Lynx	<i>Lynx canadensis</i>
Mammals	Fisher	<i>Pekania pennanti</i>
Mammals	Grizzly Bear	<i>Ursus arctos</i>
Mammals	Hoary Bat	<i>Lasiurus cinereus</i>
Mammals	Little Brown Myotis	<i>Myotis lucifugus</i>
Mammals	Wolverine	<i>Gulo gulo</i>
Mammals	Yuma Myotis	<i>Myotis yumanensis</i>
Birds	Bobolink	<i>Dolichonyx oryzivorus</i>
Birds	Brown Creeper	<i>Certhia americana</i>
Birds	Cassin's Finch	<i>Haemorhous cassinii</i>
Birds	Evening Grosbeak	<i>Coccothraustes vespertinus</i>
Birds	Long-billed Curlew	<i>Numenius americanus</i>
Birds	Pileated Woodpecker	<i>Dryocopus pileatus</i>
Fish	Westslope Cutthroat Trout	<i>Oncorhynchus clarkii lewisi</i>

Determination: No significant impact.

Wetlands and Ponds - Consult and assess whether the apparent wetland is a functional wetland (according to COE definitions), and whether the wetland resource would be impacted. For ponds, consult and assess whether existing wildlife, waterfowl, or fisheries resources would be impacted.

There is an area of forested/shrub wetland on the opposite side of Indian Creek from the location of the proposed POD and pipeline. It is not anticipated that construction of the proposed POD and pipeline near this forested/shrub wetland will disturb or adversely impact the wetland. The Applicant is responsible for ensuring they obtain any permits from the relevant agencies for work near a wetland. This project does not involve a pond.

Determination: No significant impact.

1.4 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.

The proposed addition of a new POD will not negatively impact the soil quality, stability, or moisture content. The soil type in the project area is Rattlebone very gravelly loam, 8 to 35 percent slopes formed from loamy till derived from metasedimentary rock parent material. This soil has a moderately high capacity to transmit water and is nonsaline to very slightly saline (not susceptible to saline seep).

Determination: No significant impact.

1.5 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.

No new place of use is proposed; this change adds a new point of diversion on Indian Creek to divert and convey water to land that has been in agricultural production for decades. It is not anticipated that the construction of the new diversion and pipeline will significantly impact any existing native vegetation. It is not anticipated that the authorization of the requested water right change will contribute to the establishment or spread of noxious weeds in the project area. Noxious weed prevention and control will be the responsibility of the landowners, who must follow local noxious weed regulations.

Determination: No significant impact.

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

There will be no impact to air quality associated with the authorization of the proposed water right change.

Determination: No significant impact.

- 1.7 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.

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

All impacts to land, water, and energy have been identified and no further impacts are anticipated.

Determination: No significant impact.

HUMAN ENVIRONMENT

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

The project is consistent with planned land uses.

Determination: No significant impact.

- 1.10 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.*

The proposed project will not inhibit, alter, or impair access to present recreational opportunities in the area. The project is not expected to create any significant pollution, noise, or traffic congestion in the area that may alter the quality of recreational opportunities. The proposed place of use and diversion do not exist on land designated as wilderness.

Determination: No significant impact.

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

This proposed use will not adversely impact human health.

Determination: No significant impact.

- 1.12 PRIVATE PROPERTY** - *Assess whether there are any government regulatory impacts on private property rights. If yes, analyze any alternatives considered that could reduce, minimize, or eliminate the regulation of private property rights.*

There are no government regulatory impacts on private property rights resulting from this project.

Determination: No impact.

- 1.13 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 identified.
- (b) Local and state tax base and tax revenues? None identified.
- (c) Existing land uses? None identified.
- (d) Quantity and distribution of employment? None identified.
- (e) Distribution and density of population and housing? None identified.
- (f) Demands for government services? None identified.
- (g) Industrial and commercial activity? None identified.
- (h) Utilities? None identified.
- (i) Transportation? None identified.
- (j) Safety? None identified.
- (k) Other appropriate social and economic circumstances? None identified.

2. SECONDARY AND CUMULATIVE IMPACTS ON THE PHYSICAL ENVIRONMENT AND HUMAN POPULATION:

Secondary Impacts: None identified.

Cumulative Impacts: None 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:

The only alternative to the proposed action would be the no action alternative. The no action alternative would be to not grant the requested water right change of adding a new point of diversion.

Part III. Conclusion

1. PREFERRED ALTERNATIVE:

Authorize the requested water right change if the Applicant proves the criteria in 85-2-402 MCA are met.

2. COMMENTS AND RESPONSES:

None.

3. FINDING:

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

If an EIS is not required, explain why the EA is the appropriate level of analysis for this proposed action:

No significant impacts related to the proposed project have been identified.

4. NAME OF PERSON(S) RESPONSIBLE FOR PREPARATION OF EA:

Name: Travis Wilson

Title: Water Resource Specialist

Date: April 23, 2025