

Environmental Checklist Instructions

Purpose of This Document:

All applicants must consider the potential environmental impacts of their projects. Consideration of these impacts on the location, design, or construction actions may help avoid expensive mitigation or construction costs. A project will not be eligible for funding if it results in significant adverse impact after mitigation.

DNRC requires compliance with the Montana Environmental Policy Act (MEPA) per state law and associated DNRC Administrative Rules (ARM 36.2.523). MEPA requires state agencies to prepare a detailed statement on any project, program, or activity directly undertaken by the agency; a project or activity supported through a contract, grant, subsidy, loan or other form of funding assistance from the agency; and a project or activity involving the issuance of a lease, permit, license, certificate, or other entitlement for use or permission by the agency (MCA Title 75, Chapter 1). All project applications will be subject to MEPA review followed by a public scoping process. DNRC will post the drafted MEPA decision for public comment at a minimum of two weeks (dependent on level of environmental impact). The MEPA document will then require a final decision by DNRC once funds are awarded.

Please complete the Environmental Checklist below as the information provided will be subject to a MEPA assessment by DNRC. If an Environmental Assessment has already been completed for the proposed project, please attach it to the application in place of this evaluation.

Instructions:

Complete the Environmental Checklist on the following pages after the instructions below. DNRC retains the ultimate decision-making authority on all MEPA decisions. If DNRC determines this section to be incomplete, additional information will be required before consideration for funding.

Example		
Impact Code	Impact Type	Explanation of Impact to Resource
1. Soil Suitability, Topographic and/or Geologic Constraints (example: soil lump, steep slopes, subsidence, seismic activity)		
<input type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<i>Current Conditions:</i> <i>Preferred Alternative Environmental Narrative:</i>

1. Impact Code: In the first column, identify the impact that the preferred alternative will have on each resource (e.g. 1. Soil Suitability, Topographic and/or Geologic Constraints) in the project area. Select from the following impact codes:

- **No Impact:** No impact to the resource is anticipated or this is not applicable to this project.
- **Beneficial:** Potentially beneficial impact to the resource.
- **Adverse:** Potentially adverse impact to the resource.

Please note that a resource may have more than one impact. Identify all possible impacts to the resource in the space provided. For example, the preferred alternative may have a short-term direct negative impact and a long-term direct and indirect positive impact on the resource. Check all boxes that apply and use the space provided in the final column "Explanation of Impact to Resource" to explain.

Example		
Impact Code	Impact Type	Explanation of Impact to Resource
1. Soil Suitability, Topographic and/or Geologic Constraints (example: soil lump, steep slopes, subsidence, seismic activity)		
<input type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<i>Current Conditions:</i> <i>Preferred Alternative Environmental Narrative:</i>

2. Impact Type: In the second column, identify the type(s) of impact to the resource from the preferred alternative. (Impacts may be direct, indirect or cumulative).

- **Direct impacts:** Occur at the same time and place as the proposed project.
- **Indirect or secondary impacts:** Occur at a different location or later time than the proposed project.
- **Cumulative impacts:** Collective impacts on the environment when considered in conjunction with other past, present, and future actions related to the proposed project. Cumulative impact analysis includes a review of all state and nonstate activities that have occurred, are occurring, or may occur that have impacted or may impact the same resource as the proposed project.

Just as above, please note that a resource may have more than one impact. Identify all possible impacts to the resource in the space provided. For example, the preferred alternative may have a short-term direct negative impact and a long-term direct and indirect positive impact on the resource. Check all boxes that apply and use the space provided in the final column "Explanation of Impact to Resource" to explain.

Example		
Impact Code	Impact Type	Explanation of Impact to Resource
1. Soil Suitability, Topographic and/or Geologic Constraints (example: soil lump, steep slopes, subsidence, seismic activity)		
<input type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<i>Current Conditions:</i> <i>Preferred Alternative Environmental Narrative:</i>

3. Explanation of Impact to Resource: In the final column, use the space provided on the Environmental Checklist to summarize the following information:

a. Current Conditions

- Describe the current environmental resources of the affected area including the impact of no action. Your description of the current natural resources will provide a baseline to compare all alternatives and their associated environmental impacts.

b. Preferred Alternative Environmental Narrative:

- Describe the impact of the preferred alternative or **indicate why there is no impact** from the project.
- Identify any reasonable cumulative impacts that may result from implementing the preferred alternative. Cumulative impacts are the collective impacts on the

environment when considered in conjunction with other past, present, and future actions related to the proposed project.

- If a potentially adverse impact is identified for the preferred alternative, the applicant must provide the following:
 - An analysis of the severity, duration, extent, and frequency of the impact. Please specify and describe the following:
 - Severity: negligible, minor, or major.
 - Duration: short-term or long-term.
 - Extent: local, regional, or statewide.
 - Frequency: non-recurring or recurring.
 - An explanation of short- and/or long-term measures to mitigate the impact with a discussion on the effects of those mitigative measures on the proposed project.
- Identify any required permits.

4. Additional Information: Underneath the table the following information must be provided:

- a. Cultural Survey Acknowledgement
- b. Sources of Information: Identify all sources consulted for the completion of the Environmental Checklist. Sources may include studies, plans, documents, or the persons, organizations, or agencies contacted for assistance.

Certain sections of this Environmental Checklist may require specialized knowledge. Please contact the necessary agencies if further specialized knowledge is needed and attach comments provided by those agencies to your application. Below are contacts for certain sections that may require additional review by other agencies:

- *Physical Environment, Section #5 – Surface Water Quality* – Montana Department of Environmental Quality, (406) 444 - 3080.
- *Physical Environment, Section #6 – Floodplains and Floodplain Management* – The Department of Natural Resources Water Resources Division, (406) 444 - 0860 or visit: <http://dnrc.mt.gov/divisions/water/operations/floodplain-management>.
- *Physical Environment, Section #7 – Wetlands* – U.S. Department of the Army Corps of Engineers, (406) 441 - 1375 or montana.reg@usace.army.mil.
- *Physical Environment, Section #9 – Vegetation and Wildlife Species and Habitats* – Montana Fish, Wildlife and Parks, Wildlife Office (406) 444 - 2612 or find your Regional Office at <https://fwp.mt.gov/aboutfwp/contact-us>.
- *Physical Environment, Section #10 – Unique, Endangered, Fragile or Limited Environmental Resources* – U.S. Fish and Wildlife Service for consultation on potential impacts to endangered or limited plants, fish, or other wildlife, (406) 449 - 5225.
- *Human Environment, Section #4 – Historic Properties, Cultural or Archaeological Resources* – Montana State Historic Preservation Office (SHPO), (406) 444 – 7718 or pebrown@mt.gov.

For assistance in preparing the Environmental Checklist, contact DNRC grant manager listed on grant application.

Environmental Checklist

Applicant Name: Allison Russell, Helena-Lewis and Clark National Forest and Chris Evans, Lewis and Clark Conservation District

Project Title: Beaver Creek Restoration Phase II

Environmental Checklist Prepared by:

On: 6/16/2021

Allison Russell

Name of Person 1

USFS

Organization

406-495-3923

Phone Number

Allison.russell@usda.gov

Email

Chris Evans

Name of Person 2

Lewis and Clark Conservation District

Organization

406-449-5000 ext 3884

Phone Number

chris@lewisandclarkcd.org

Email

[Click or tap here to enter text.](#)

List additional people above. Include organization, phone number and email for all.

Physical Environment		
Impact Code	Impact Type	Explanation of Impact to Resource

1. Soil Suitability, Topographic and/or Geologic Constraints (example: soil lump, steep slopes, subsidence, seismic activity)

<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input checked="" type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> <i>Land type descriptions are taken from soil survey on the Helena NF and MT NRCS (http://websoilsurvey.nrcs.usda.gov/) 2001. The landtype primarily affected by the project activities is landtype 100, which consists of boroll soils occurring in floodplains and low terraces. Streambank protection and sediment stabilization are important management concerns on this landtype. Stream alterations within the project area from past agricultural practices have led to simplification of the channel and loss of floodplain connectivity. Grazing and anthropogenic impacts are evident with non-native grasses-smooth brome-a large component of the plant community. This area has not been grazed in over 60 years, however past agricultural practices are still evident on the landscape. No other projects are proposed within this action area.</i></p> <p><u>Preferred Alternative Environmental Narrative:</u> <i>Proposed actions such as the reconstruction of 0.7 miles of channel and approximately six acres of floodplain and wetland consturction would improve stream and riparian condition by adding sinuosity and channel diversity and expanding the riparian corridor. These actions would have direct and indirect soil benefits with the immediate expansion of wetland areas and floodplain expansion. Adverse short-term soil disturbance arising from this project is expected to recover within a relatively short period 5-10 years with an overall result being long-term soil improvements or an expansion and extent of riparian/wetland soils. This will be at the expense of a relatively small are of upland soil disturbance, which, will experience conversion to riparian/wetland soils over time with the influence of newly established hydrology and vegetation. Other direct adverse impacts include compaction, displacement and rutting of soils on access roads with mobilization of heavy equipment. Soil effects would be localized to the project area with construction from September-November. To mitigate these impacts design features and and erosion control measures will be in place, reference full soils report (Torres, USFS 2019). Specifically, any areas that have been impacted by project implementation will be decompacted/seeded and/or revegetated. All temporary access routes will be obliterated after use. Protecting or stockpiling topsoil, should be reused to improve soil recovery and revegetation. Mulching disturbed areas with native slash, duff material is important to inoculate soil microbiota and reestablish soil cover. Areas of bare soil that will be exposed over the winter should be put into "storage" with the installation of erosion control measures such as broadcast seed/mulch application or erosion control fabric.</i></p>
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2. Hazardous Facilities (example: power lines, hazardous waste sites, acceptable distance from explosive and flammable hazards including chemical/petrochemical storage tanks, underground fuel storage tanks, and related facilities such as natural gas storage facilities and propane storage tanks)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Not applicable to the project-no hazardous facilities within the action area. Click or tap here to enter text. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
3. Surrounding Air Quality (example: dust, odors, emissions)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Not applicable-minimal dust exposure given the location of the project from populated area and the extent of the action area. Dispersed campsites would be closed within the project area. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
4. Groundwater Resources and Aquifers (example: quantity, quality, distribution, depth to groundwater, sole source aquifers)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Historic agricultural practices such as hay production, grazing, rip-rap stabilization to preserve the hay fields have resulted in a depressing the alluvial aquifer, affecting groundwater recharge and hyporheic flow characteristic to Beaver Creek. No actions would maintain a perched stream channel with limited surface-groundwater connection. <u>Preferred Alternative Environmental Narrative:</u> Through development of a functioning floodplain and restoring natural channel geometry, hydrologic functions would be restored to a natural state or an unrestricted stream channel and floodplain corridor restoring groundwater storage capacity and improving groundwater exchange and hyporheic flow to the main channel.
5. Surface Water/Water Quality, Quantity and Distribution (example: streams, lakes, storm runoff, irrigation systems, canals)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input checked="" type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Project activities are proposed in the Lower Beaver Creek sub-watershed (HUC 12 #100301011703) within the Holter TMDL planning area. Historic grazing and irrigation practices have led to soil disturbance and impaired hydrologic function along Beaver Creek. Beaver Creek is 303d-listed indicating impairments including sedimentation-siltation and alteration to stream-side vegetative cover. Probable source for both impairments include grazing in riparian zones and irrigated crop production. No TMDL has been developed for this planning area as of 2021. No action would likely maintain these sediment impairments and 303d-listings. <u>Preferred Alternative Environmental Narrative:</u> The proposed project activities involve ground disturbance that could temporarily lead to additional erosion and/or sediment delivery to Beaver Creek immediately following project work. These effects are short-term, during construction to approximately 1 year following work. To avoid measurable effects to water quality, project activities would be implemented during low flow conditions and sediment control structures would be installed to mitigate sediment delivery to Beaver Creek. To reduce erosion potential, areas of disturbance would be scarified and revegetated with a certified weed-free seed mix. The proposed project would include the removal vegetation,

		<p>which may result in short-term negative effects to soil and water quality such as stream temperature and sedimentation. The project area would be revegetated with riparian vegetation, native seed directly following project work. Through the development of a functioning floodplain and natural channel, restoration work would result in lasting benefits to sediment transport regime and water quality. Restoration work would also allow development of riparian area soils and regrowth of riparian vegetation. Project activities would lead to improved hydrologic functions by providing a more natural, unrestricted stream channel and floodplain corridor. With implementation of the resource protection measures, activities are not anticipated to result in long-term negative impacts to surface flow/water quality. Measures include: conservation measures attached to 318/124 permitting, Best management practices for water quality management (USDA FS, FS-990a, 2012), performing channel work during low flow conditions, avoid workin during heavy precipitation events, erosion control methods (straw wattles, silt fences, etc.), employ temporary diversion and/or stream crossing structures, stage equipment on existing disturbed areas, wash all equipment prior to mobilizing to the site. Cumulative effects are not antipacted given no future actions are proposed within the action area that would overlap with project activities or effects.</p>
<p>6. Floodplains and Floodplain Management (Identify any floodplains within one mile of the boundary of the project.)</p>		
<p><input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input checked="" type="checkbox"/> Adverse</p>	<p><input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input type="checkbox"/> Cumulative</p>	<p><u>Current Conditions:</u> Historic agricultural practices such as hay production, grazing, rip-rap stabilization to preserve the hay fields have resulted in a depressing the alluvial aquifer, affecting groundwater recharge and hyporheic flow characteristic to Beaver Creek. No actions would maintain an incised and perched stream channel with limited surface-groundwater connection and floodplain connectivity.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Through development of a functioning floodplain and restoring natural channel geometry, hydrologic functions would be restored to a natural state or an unrestricted stream channel and floodplain corridor restoring groundwater storage capacity and improving groundwater exchange and hyporheic flow to the main channel. Proposed reconstruction of 0.7 miles of channel and approximately 6 acres of floodplain and wetland construction would improve stream and riparian condition and reestablish a connected floodplain. These actions would have direct and indirect soil and benefits and immediate expansion of wetland areas and floodplain expansion. Adverse short-term effects include soil disturbance from excavation and soil compaction form equipment use and access. Soil effects would be localized and design measure and soil and erosion control measures highlighted in the soil and surface water section would mitigate these impacts. With design criteria in place soil impacts and vegetative community are expected to recover in a 5-10 year period resulting in long-term soil improvements. This recovery would also promote healthy and diverse riparian community. No cumulative effects are expected given there will no other concurrent or future actions within the project area.</p>

7. Wetlands (Identify any wetlands within one mile of the boundary of the project and state potential impacts.)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Historic agricultural practices such as hay production, grazing, rip-rap stabilization to preserve the hay fields have resulted in a depressing the alluvial aquifer, affecting groundwater recharge and hyporheic flow characteristic to Beaver Creek. Currently there are no connected or disconnecte ephemeral wetlands located within the project area. No actions would maintain an incised and perched stream channel with limited surface-groundwater connection and floodplain connectivity. Under the No Action Alternative there would be no wetland construction.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Through development of a functioning floodplain and restoring natural channel geometry, hydrologic functions would be restored to a natural state or an unrestricted stream channel and floodplain corridor restoring groundwater storage capacity and improving groundwater exchange and hyporheic flow to the main channel. Proposed reconstruction of 0.7 miles of channel and approximately 6 acres of floodplain and wetland construction would improve stream and riparian condition and reestablish a connected floodplain. The new channel design and constructed wetlands are designed to maintain themselves overtime, promoting surface-groundwater dynamics and providing habitat for amphibian and bird species. These actions would have direct and indirect soil and surface water benefits and immediate expansion of wetland areas and floodplain expansion. Adverse short-term effects include soil disturbance from excavation and soil compaction form equipment use and access. Soil effects would be localized and design measure and soil and erosion control measures highlighted in the soil and surface water section would mitigate these impacts. With design criteria in place soil impacts and vegetative community are expected to recover in a 5-10 year period resulting in long-term soil improvements. This recovery would also promote healthy and diverse riparian community. No cumulative effects are expected given there will no other concurrent or future actions within the project area. A Nationwide Permit 27 -Aquatic Habitat Restoration, Enhancement, and Establishment Activities was obtained (Corps No. NOW-2020-00149-MTH) for floodplain and stream reconstruction.</p>
8. Agricultural Lands, Production, and Farmland Protection (example: grazing, forestry, cropland, prime or unique agricultural lands) Identify any prime or important farm ground or forest lands within one mile of the boundary of the project.		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> The project area is in a vacant allotment entirely on USFS lands.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

9. Vegetation and Wildlife Species and Habitats, Including Fish (example: terrestrial, avian and aquatic life and habitats)

<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input checked="" type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p>Current Conditions: Beaver Creek is an important spawning tributary to the large migratory rainbow and brown trout that move up from Holter Reservoir. It has historically supported healthy runs of afluval rainbow and brown trout, both focal species of the Beaver Creek project. Past habitat management and degraded habitat, angling pressure, predation and whirling disease have continued to impact this popular recreational fishery. Native fish present within the project area include mottled sculpin, mountain whitefish and white sucker. Vegetation within the project area is greatly disturbed and altered from historic condition with widespread weed infestation and riparian vegetation is limited. Dominant grasses include smooth brome. Low quality suitable habitat is present for a number of species and no USFS Region 1 or Montana Sensitive Species or species of concern were observed within the project area. Elk, deer, and bald eagles can be observed. Shrubs provide habitat to nesting and foraging migratory song birds including, MacGillivray's warbler, yellow warbler, American redstart, march wren, willow flycatcher, and calliope hummingbird. Cottonwood trees provide habitat for the Bullock's oriole. Columbian spotted frogs have been observed as well as active beaver above and below the project area. No other USFS regional wildlife sensitive species were observed within the project area.</p> <p>Preferred Alternative Environmental Narrative: Proposed restoration activities to improve aquatic habitat specifically spawning and rearing habitat for both rainbow and brown trout would boost natural production and improve this very popular recreational fishery. There would be short-term sediment delivery and impacts, ~1-5 days, to the downstream fisheries specially when rewatering the newly constructed stream segments. Many of these impacts would be mitigated by with the removal of fish to areas above the project before implementation. All efforts shall be made to limite and avoid fatalities to aquatic life using electrofishing protocol. All work performed in or immediately adjacent to the channel will require 2 stream diversions before and during the actual work phase of the project to minimize sediment impacts during channel construction. The temporary diversion shall be activated or deactivated incrementally in two stages to allow resident aquatic life to exit the dewatered area. All applicable permitting will be in place and adherence to all conservation measures. Other short-term impacts, 5-10 years may include temperature increases in reaches before vegetation fully establishes. There would be immediate direct benefits with pool and riffle construction providing adequate rearing and spawning habitat and thermal refugia during the hot summer months. Streambank treatments would stabilize banks limiting further bank erosion and reducing sediment inputs. Restoration activities in addition to continued stocking efforts on Holter Reservoir would improve natural recruitment for rainbow trout with this system. Habitat quality would be improved for the sensitive species that are found near but outside the project area following restoration activities. With active weed maintenance post-project 1-5 years, weed spread is expected to decrease. Native and local vegetation will be used to the extent possible during revegetation efforts. Mitigation criteria for plants includes avoiding sensitive plant populations that may be located within the project area and prior to project implementation any populations will be identified. The project will use the most genetically appropriate and locally available native species mix and includes preserving vegetation onsite and local native seed sources. Noxious weed treatment will be consistent with guidance from Helena National Forest Weed Treatment EIS (HNF, 2006). Creating a more</p>
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		<p>complex riparian and associated upland habitat would benefit a variety of amphibians and migratory song birds. Beaver have actively colonized stream reaches above the project area and restoring riparian and wetland habitat will likely facilitate future beaver activity. Although many areas have been identified as preservation areas for shrubs and established trees there will be short-term impacts 5-10 years, associated with riparian veg removal to accommodate floodplain regrading and channel construction but, affecting many migratory song birds. The UM Bird Ecology Lab is monitoring pre and post-project impacts to these bird communities. Floodplain construction to improve connectivity with the main channel and wetland construction will improve habitat in the long-term. To mitigate short-term/long-term impacts to other wildlife species of concern during project implementation project design criteria includes: wildlife biologist will be consulted if goshawks are detected, if a bald eagle's nest is located within the project area a wildlife biologist will be consulted to limit areas of operation, boreal toads or other amphibians will be relocated to safe locations while the stream is temporarily diverted, project personnel adhere to grizzly food storage orders, seeding and planting will not include palatable forage species for grizzly bears and project activities will occur outside of the spring period for grizzly bears approximately April 1st – June 30th.</p>
<p>10. Unique, Endangered, Fragile, or Limited Environmental Resources, Including Endangered Species (example: plants, fish or wildlife)</p>		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> There are no TES fish or plant species within the project area. The project is outside of Lynx critical habitat and there would be no modification to wolverine habitat. Project activity is restricted outside the grizzly bear spring period (April 1- June 30th) so there is No Effect to grizzly bears or their designated critical habitat. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
<p>11. Unique Natural Features (example: geologic features)</p>		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> There are no unique geologic features that would be impacted within the action area. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

12. Access to, and Quality of, Recreational and Wilderness Activities, Public Lands and Waterways, and Public Open Space		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input checked="" type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Access to the project area is via FS road # 138; the project is located entirely on FS lands. There are 2 dispersed campsites that are located within the project area. The project is not within or adjacent to a wilderness area, wilderness study area, or a national recreation area. This project is outside the Devils Tower Inventoried Roadless Area.</p> <p><u>Preferred Alternative Environmental Narrative:</u> During construction of the project, NFSR #138 will remain open and passable by motorized vehicles to areas above and below the project. Only short delays are permissible for the public use of NFSR 138 during project implementation i.e. mobilization to/from the site. With the expansion of the floodplain and location of the new stream channel, reconfiguration of the campsites is necessary but access and actual foot print of campable space will remain the same and open to the public. These campsites will be closed during construction for safety of the public thus, there will be short-term displacement during the project ~10 weeks September-November. Design elements within the camping areas will benefit/improve water quality and ensure streambank stability and stabilize the campsite areas in the stream corridor. There will likely be some cumulative effects with this project and accessibility and quality of use to the general public given the parking lot expansion at the fishing access could possibly be implemented during a similar time frame. Many of the folks that enjoy fishing and hunting during the fall utilize both the fishing access area and dispersed campsites within the project area. Both construction projects could affect recreationists during that 10 week period. These effects would be short-term with long-term benefits to both the camping area and fishing access on the Missouri. Construction period would avoid the most popular time that recreationist are fishing on the Missouri, which, is during the spring for rainbow trout .</p>
Human Environment		
Impact Code	Impact Type	Resource
1. Visual Quality – Coherence, Diversity, Compatibility of Use and Scale, Aesthetics		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> The Beaver Creek Restoration Decision Memo (2019) documented this project is consistent with Forest Plan management direction, standards, and guidelines. This project meets requirements found in the National Forest Management Act and National Environmental Policy Act.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
2. Nuisances (example: glare, fumes)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> The Beaver Creek Restoration Decision Memo (2019) documented this project is consistent with Forest Plan management direction, standards, and guidelines. This project meets requirements found in the National Forest Management Act and National Environmental Policy Act.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

3. Noise – Suitable Separation Between Housing and Other Noise Sensitive Activities and Major Noise Sources (example: aircraft, highways and railroads.)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Proposed activities are on Forest Service Lands. The wildlife report determined incidental grizzly bear that may be present within the project area are likely adapted to the use patterns and noise levels associated with the area. For example, Beaver Creek is a very popular recreation area with constant vehicle traffic on NFSR #138. Resource protection measures were added to mitigate effects to an incidental grizzly bear in the area. Specifically, activities would occur outside the spring period (April 1st- June 30th).</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
4. Historic Properties, Cultural, and Archaeological Resources**<i>(Please see end of Environmental Checklist for details if Cultural Survey has not been performed per SHPO Section 106)</i>		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Portions of the project area have been previously surveyed for archeological resources. One historic ranch is located within the project area, but this historic property will not be adversely affected given its location. No properties on or eligible for NRHP appear likely to exist within project impact area. SHPO reference # R2018911500047.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Any undocumented archeological resources found during project implementation will be reported to a FS archeologist and, if necessary, project design will be modified to avoid any impacts to those resources.</p>
5. Changes in Demographic (Population) Characteristics (example: quantity, distribution, density)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek is a popular recreation area with trail access to Hauser dam and angler access to the Missouri River. Restoration activities propose the improvement of 2 popular campsites. This would improve accesblity while protecting fisheries and water resources Approximatey 18,000 angler days a year are observed on the Missouri River-Hauser tailwaters. Channel reconstruction would increase wild trout recruitment and improve angling opportunities on the Missouri River, noted as a Montana blue ribbon fishery. Improvements may draw additional anglers to the area but would not effectively change the demographics of the York/Nelson community.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
6. General Housing Conditions – Quality, Quantity, Affordability		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Restoration activities are proposed on National Forest lands, Helena-Lewis and Clark National Forest.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

7. Businesses or Residents (example: loss of, displacement, or relocation)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek and the Missouri River are a very popular recreational fishery with an estimated 18,000 angler days on the Hauser tailwaters. Holter Lake and the Missouri River combined observe approximately 96,000 angler days annually, and with this fishery ranked 6th in the state for fishing pressure and support many local economies. Approximately \$52 million dollars in revenue is generated considering, Holter, Hauser and Canyon Ferry fisheries.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would increase wild fish recruitment and improve angling opportunities for resident, non-resident anglers as well as outfitters permitted on the Missouri River. Approximately \$7.4 million dollars from anglers on the Hauser tailwaters supports the local economy. It is assumed that habitat improvements with continued stocking efforts on Holter would continue support the economy at this level or even increase local revenue.</p>
8. Public Health and Safety		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> The project is on FS lands and would maintain public access.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
9. Local Employment – Quantity or Distribution of Employment, Economic Impact		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek and the Missouri River are a very popular recreational fishery with an estimated 18,000 angler days on the Hauser tailwaters. Holter Lake and the Missouri River combined observe approximately 96,000 angler days annually, and with this fishery ranked 6th in the state for fishing pressure and support many local economies. Approximately \$52 million dollars in revenue is generated considering, Holter, Hauser and Canyon Ferry fisheries.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would increase wild fish recruitment and improve angling opportunities for resident, non-resident anglers as well as outfitters permitted on the Missouri River. Approximately \$7.4 million dollars from anglers on the Hauser tailwaters supports the local economy. It is assumed that habitat improvements with continued stocking efforts on Holter would continue support the economy at this level or even increase local revenue. Restoration work would employ local Montana contractors. Approximately 12-15 individuals could be employed over a 6 month timeline including pre-construction/contracting work.</p>

10. Income Patterns – Economic Impact		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek and the Missouri River are a very popular recreational fishery with an estimated 18,000 angler days on the Hauser tailwaters. Holter Lake and the Missouri River combined observe approximately 96,000 angler days annually, and with this fishery ranked 6th in the state for fishing pressure and support many local economies. Approximately \$52 million dollars in revenue is generated considering, Holter, Hauser and Canyon Ferry fisheries.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would increase wild fish recruitment and improve angling opportunities for resident, non-resident anglers as well as outfitters permitted on the Missouri River. Approximately \$7.4 million dollars from anglers on the Hauser tailwaters supports the local economy. It is assumed that habitat improvements with continued stocking efforts on Holter would continue support the economy at this level or even increase local revenue. Restoration work would employ local Montana contractors. Approximately 12-15 individuals could be employed over a 6 month timeline including pre-construction/contracting work.</p>
11. Local and State Tax Base and Revenues		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek and the Missouri River are a very popular recreational fishery with an estimated 18,000 angler days on the Hauser tailwaters. Holter Lake and the Missouri River combined observe approximately 96,000 angler days annually, and with this fishery ranked 6th in the state for fishing pressure and support many local economies. Approximately \$52 million dollars in revenue is generated considering, Holter, Hauser and Canyon Ferry fisheries. Click or tap here to enter text.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would increase wild fish recruitment and improve angling opportunities for resident, non-resident anglers as well as outfitters permitted on the Missouri River. Approximately \$7.4 million dollars from anglers on the Hauser tailwaters supports the local economy. The Montana Fisheries Improvement Program supported Beaver Creek Phase I through \$75,000 in contributions. The Future Fisheries Program is supported in part, by state sportman's receipt/revenue. Phase II has also secured Future Fisheries funding (\$50,000) for conservation of the Beaver Creek fishery. Improvements will perpetuate and improve angler opportunity/use in the area and continue to support the local economy and state revenue.</p>

12. Community and Government Services and Facilities (example: educational facilities; health and medical services and facilities; police; emergency medical services; and parks, playgrounds and open space)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek is a popular recreation area with trail access to Hauser dam and angler access to the Missouri River. Approximately 18,000 angler days a year are observed on the Missouri River-Hauser tailwaters. Click or tap here to enter text.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities propose the improvement of 2 popular campsites. This would improve accesiblity while protecting fisheries and water resources. Channel reconstruction would increase wild trout recruitment and improve angling opportunities on the Missouri River, noted as a Montana blue ribbon fishery. Project activities would continue to maintain and improve public access.</p>
13. Commercial and Industrial Facilities – Production and Activity, Growth or Decline		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Lower Beaver Creek and the Missouri River are a very popular recreational fishery with an estimated 18,000 angler days on the Hauser tailwaters. Holter Lake and the Missouri River combined observe approximately 96,000 angler days annually, and with this fishery ranked 6th in the state for fishing pressure and support many local economies including commercial fishing operations- there are many outfitters permitted to fish this section of the Missouri and upper Holter Reservoir. Approximately \$52 million dollars in revenue is generated considering, Holter, Hauser and Canyon Ferry fisheires.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would improve angling opportunities. Potentially benefitting permitted outfitters directly in the Holter Lake and Missouri River systems. Increased natural production of wild trout in addition to FWP stocking efforts would continue to improve the recreational fishery for many years.</p>
14. Social Structures and Mores (example: standards of social conduct/social conventions)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Not applicable to the project. The project would maintain access for public use.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

15. Land Use Compatibility (example: growth, land use change, development activity, adjacent land uses and potential conflicts)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Beaver Creek is entirely on NFS lands. Beaver Creek and the Missouri River are a very popular recreational fishery and an important tributary to the large migratory rainbow and brown trout that migrate up from Holter Reservoir. As such, Beaver Creek is specifically identified for habitat improvements under NorthWestern Energy's FERC license agreement through the Missouri-Madison River 2188 Project.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Restoration activities would improve riparian and aquatic habitat and is consistent with Forest Plan management direction, standards, and guidelines (Helena National Forest Plan 1986). No adverse effects to Helena-Lewis and Clark Management Indicator Species or Regional Sensitive Species were identified. This project meets requirements found in the National Forest Management Act, the Endangered Species Act, the Clean Water Act, and the National Environmental Policy Act.</p>
16. Energy Resources – Consumption and Conservation		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Beaver Creek habitat improvements are specifically identified under NorthWestern Energy's Missouri-Madison 2188 Hydroelectric license. Project 2188 meets FERC license requirements for protection, mitigation and enhancement required to offset impacts to the river resources from continued operation of one or more of NWE nine hydro developments including Hauser and Holter dams. The Beaver Creek Project (Phase I and 2) will offset impacts to river resources associated with the Missouri-Madison River Project area.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Propose restoration activities to improve both riparian and aquatic habitat meet the purpose and intent of License Article 416, which supports spawning and rearing habitat enhancement projects on Holter Reservoir and its tributaries to the reservoir and tailwaters. Habitat enhancement would contribute to natural trout and native fish reproduction of the Holter/Missouri River fishery.</p>
17. Solid Waste Management		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Not applicable to the project.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
18. Wastewater Treatment – Sewage System		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> Not applicable to the project.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>
19. Storm Water – Surface Drainage		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<p><u>Current Conditions:</u> This project meets requirements found in but not limited to the National Forest Management Act, the Clean Water Act, and the National Environmental Policy Act. Approved project 124/318 authorizations, 401/NPW 27 permits are attached.</p> <p><u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.</p>

20. Community Water Supply		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> This project meets requirements found in but not limited to the National Forest Management Act, the Clean Water Act, and the National Environmental Policy Act. Approved project 124/318 authorizations, 401/NPW 27 permits are attached. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
21. Fire Protection – Hazards		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Not applicable to this project. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
22. Cultural Facilities, Cultural Uniqueness and Diversity		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> There are no known American Indian religious or cultural sites within the project area. If unknown sites were encountered during implementation these sites will be subject to appropriate Tribal Historic Preservation Officer review and comment as per the 36 CFR 800 compliance process. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
23. Transportation Networks and Traffic Flow Conflicts (example: rail; auto including local traffic; airport runway clear zones – avoidance of incompatible land use in airport runway clear zones)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Not applicable to this project. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.
24. Consistency with Local Ordinances, Resolutions, or Plans (example: conformance with local comprehensive plans, zoning, or capital improvement plans.)		
<input type="checkbox"/> No Impact <input checked="" type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input checked="" type="checkbox"/> Direct <input checked="" type="checkbox"/> Indirect <input checked="" type="checkbox"/> Cumulative	<u>Current Conditions:</u> Restoration activities are proposed on NFS lands. NEPA analysis was complete in accordance with 36 CFR 222.6(e)(18). This project is consistent with Forest Plan management, direction, standards, and guidelines, please refer to the attached Decision Memo (2019). <u>Preferred Alternative Environmental Narrative:</u> Restoration activities would improve recreational fishing opportunities and restore water and riparian resources on NFS lands. All applicable permits are in place.
25. Private Property Rights (example: a regulatory action or project activity that reduces, minimizes, or eliminates the use of private property.)		
<input checked="" type="checkbox"/> No Impact <input type="checkbox"/> Beneficial <input type="checkbox"/> Adverse	<input type="checkbox"/> Direct <input type="checkbox"/> Indirect <input type="checkbox"/> Cumulative	<u>Current Conditions:</u> Proposed activities are on NF lands , Helena-Lewis and Clark NF, Helena Ranger District. <u>Preferred Alternative Environmental Narrative:</u> Click or tap here to enter text.

Additional Information

****If no cultural survey has been performed, or is not expected to be needed, applicant must agree to the following statement:**

I hereby agree that, to my knowledge, there are no cultural or paleontological materials in the proposed project site. If previously unknown cultural or paleontological materials are identified during project related activities, the DNRC grant manager will be notified, and all work will cease until a professional assessment of such resources can be made.

List all sources of information used to complete the Environmental Checklist. Sources may include studies, plans, documents, or the individuals, organizations, or agencies contacted for assistance. For individuals, groups, or agencies, please include a contact person and phone number. List any scoping documents or meetings and/or public meetings during project development.

Montana Department of Environmental Quality (DEQ). 2019. Clean Water Act Information Center website, list of water quality impaired streams. <http://deq.mt.gov/wqinfo/CWAIC/default.mcp>.

Montana Department of Natural Resources and Conservation (DNRC). 2019. Stream Permitting Requirements/Joint Application [Stream Permitting — Montana DNRC \(mt.gov\)](http://dnrc.mt.gov/stream-permitting).

Napper, C. (2008). Soil and Water Road-Condition Index – Desk Reference. U.S. Department of Agriculture, Forest Service, National Technology and Development Program. General Technical Report 0877 1807-SDTDC. San Dimas, California.

NorthWestern Energy Missouri-Madison Project. 2021. Missouri-Madison 2188 Project Information Center, website [Missouri-Madison Project 2188 \(northwesternenergy.com\)](http://northwesternenergy.com).

USDA Forest Service and Natural Resources Conservation Service [USDA FS and NRCS]. 2001. Soil Survey of Helena National Forest Area, Montana.

US Forest Service (USFS). 1999. Forest Service Manual, Missoula, Montana. 1999. FSM 2500 Watershed and Air Management, Chapter 2520-Watershed Protection and Management, R-1 Supplement No. 2500-2004-1.

US Forest Service (USFS). 1986. Helena National Forest, Forest Plan.

US Forest Service (USFS). 2012. National Best Management Practices for Water Quality Management on National Forest System Lands. Volume 1: National Core BMP Technical Guidance. FS-990a.

USDA Forest Service. 1986. Helena Forest Plan. Helena National Forest, Helena, MT.

USDA Forest Service. 2014. Programmatic Biological Assessment for Activities that are Not Likely to Adversely Affect Canada Lynx, Grizzly Bear, and Designated Canada Lynx Critical Habitat. October, 2014. Forest Service Northern Region, Missoula, MT.

USDI Fish and Wildlife Service. 2018. Threatened, Endangered and Candidate Species for the Helena-Lewis and Clark National Forest. Letter dated October 23, 2018. U.S. Dept. of Interior, USFWS Montana Field Office, Helena, MT.

USDA Forest Service (USFS). 2019. Decision Memo for the Beaver Creek Restoration Project. Helena Ranger District, Helena-Lewis and Clark National Forest.

Contributing Specialist Reports (USFS personnel):

Ted Snyder, Wildlife Biologist-406-495-3913

Allison Torres, Soil Scientist-406-495-3729

Katherine Condon, Hydrologist-406-495-3724

Allison Russell, Fisheries Biologist-406-495-3923

Roy Barkley, Recreation-406-495-3914

Justina Dumont, Botany-406-495-3756

Megan Dawson, Weeds/Range-406-495-3933

Arian Randall, Heritage-406-495-3752

Below is a list of electronic resources available for data gathering to aid in the development of the Environmental Checklist:

Abandoned Mines (DEQ): <https://deq.mt.gov/Land/abandonedmines/bluebook>

Agricultural Statistics (USDA):

http://www.usda.gov/wps/portal/usda/usdahome?navid=DATA_STATISTICS

Air Quality

- Nonattainment Areas: <http://deq.mt.gov/Air/airquality/planning/airnonattainmentstatus>
- Citizens' Guide: <http://deq.mt.gov/Air/airmonitoring/citguide>

Army Corps of Engineers: <http://www.usace.army.mil/Home.aspx>

Bureau of Business and Economic Research, UM: <http://www.bber.umt.edu/>

Cadastral (for property ownership info): <http://svc.mt.gov/msl/mtcadastral>

Census Information, MT Dept. of Commerce: <http://ceic.mt.gov>

Conservation Districts, MT: <http://macdnet.org/>

Cultural Records

- Montana Historical Society: <http://mhs.mt.gov/shpo/culturalrecords.asp>

DEQ data search tools: <http://svc.mt.gov/deq/dst/#/home>

- Including Clean Water Act Info Center, Hazardous Waste Handlers, Petroleum Release Fund Claims, Unpermitted Releases, Underground Storage Tanks, Source Water Protection

EPA Enforcement and Compliance History Online <http://echo.epa.gov/>

Farmland Classification: <http://websoilsurvey.nrcs.usda.gov/app/WebSoilSurvey.aspx>

Fish (Also See Wildlife)

- Montana Fisheries Information System: <http://fwp.mt.gov/fishing/mFish/>
- Aquatic Invasive Species: <http://fwp.mt.gov/fishAndWildlife/species/ais/speciesId/default.html>

Floodplain Maps, FEMA: <https://msc.fema.gov/portal>

Geographic Information, Natural Resources Information System: <http://nris.mt.gov/gis>

Geologic Information - <http://www.mbmgt.mtech.edu/information/geologicmap.asp>

Maps of Montana for species observations, land cover, wetland and riparian areas, land management: <http://mtnhp.org/Tracker/NHTMap.aspx>; <http://mtnhp.org/mapviewer/?t=6>

Montana Department of Transportation Environmental Manual: <http://www.mdt.mt.gov/publications/docs/manuals/env/preface.pdf>

Montana Board of Oil and Gas Conservation Information System: <http://bogc.dnrc.mt.gov/webApps/DataMiner/>

Plants

- Plant database, USDA Natural Resources Conservation Service: <http://plants.usda.gov/java>
- Plant Species, MT Field Guide: <http://fieldguide.mt.gov/default.aspx>
- Plant Species of Concern: <http://mtnhp.org/SpeciesOfConcern/Default.aspx?AorP=p>
- Threatened and endangered plants, USDA: <http://plants.usda.gov/threat.html>

Soils

- USDA Natural Resource Conservation Service database: <https://websoilsurvey.nrcs.usda.gov/app/>
- Montana soil and water conservation districts: <http://swcdmi.org/>

State Historic Preservation Office: <http://mhs.mt.gov/Shpo>

Tourism, UM – Institute of Tourism & Recreation Research: <http://www.itrr.umt.edu>

Tribal Resources:

- Blackfeet Tribal Environmental Permits: <http://www.blackfeetenvironmental.com>
- CSKT Natural Resources Department: <http://nrd.csktribes.org/>
- Montana Office of Indian Affairs: <http://tribalnations.mt.gov/>
- Tribal Historic Preservation Officer List <http://nathpo.org/wp/thpos/find-a-thpo/> Vehicle Traffic Count (MDT): <http://www.mdt.mt.gov/publications/datastats/traffic.shtml>

Water

- Stream Record Extension Facilitator, USGS: http://pubs.usgs.gov/of/2008/1362/cd_links/WebPart.htm

- Streamstats basin characteristics, USGS: <http://water.usgs.gov/osw/streamstats/>
- Water Resources Division, DNRC: <http://dnrc.mt.gov/divisions/water>
- Water Rights Bureau, DNRC: <http://dnrc.mt.gov/divisions/water/water-rights>
- Water Right Query System, DNRC: <http://nris.mt.gov/dnrc/waterrights/default.aspx> Wetlands database, USFWS: <http://www.fws.gov/wetlands/Data/mapper.html>

Wild and Scenic Rivers: <http://www.rivers.gov/montana.php>

Wildlife

- Animal Species, MT Field Guide: <http://fieldguide.mt.gov/default.aspx>
- Animal Species of Concern: <http://mtnhp.org/SpeciesOfConcern/Default.aspx?AorP=a>
- Aquatic Invasive Species: <http://fwp.mt.gov/fishAndWildlife/species/ais/speciesId/default.html>
- Critical Habitat Mapper, USFWS: <http://ecos.fws.gov/crithab/>
- Crucial Areas Planning System/Habitat Assessment Tool: <http://fwp.mt.gov/fishAndWildlife/conservationInAction/crucialAreas.html>
- FWP Contact Map: <http://fwp.mt.gov/gis/maps/contactUs/> (includes biologist responsibility areas)
- Maps and GIS Data, FWP: <http://fwp.mt.gov/doingBusiness/reference/maps/>
- Sage grouse management, FWP: <http://fwp.mt.gov/fishAndWildlife/management/sageGrouse/>
- Sage grouse habitat conservation program, DNRC: <http://sagegrouse.mt.gov/>
- Sage grouse habitat map: <https://sagegrouse.mt.gov/ProgramMap>