

CHECKLIST ENVIRONMENTAL ASSESSMENT

Project Name:	Kevin Kepler Domestic Water Pipeline Land Use License
Proposed Implementation Date:	November 2020
Proponent:	Kevin Kepler
Location:	13N 19E 36 SWSWSW
County:	Fergus
Trust:	Common Schools

I. TYPE AND PURPOSE OF ACTION

The purpose of this EA is to assess the environmental impacts of allowing the proponent to install a shallow (<5ft deep) water collection point and a 190ft 1 inch water pipeline to fill a cistern on adjacent private land owned in part by the proponent.

II. PROJECT DEVELOPMENT

1. PUBLIC INVOLVEMENT, AGENCIES, GROUPS OR INDIVIDUALS CONTACTED:

Provide a brief chronology of the scoping and ongoing involvement for this project.

The Department of Natural Resources and Conservation (DNRC)
Northeastern Land Office (NELO) & Lewistown Unit Office
Proponent: Kevin Kepler
Surface Lessees: Edgar Lewis
Other: DNRC Water Resources Division, Water Rights Bureau, Lewistown Regional Office

2. OTHER GOVERNMENTAL AGENCIES WITH JURISDICTION, LIST OF PERMITS NEEDED:

The DNRC, and NELO have jurisdiction over this proposed project.

The proponent is responsible for acquiring all necessary permits for the proposed project and settling all surface damages with the surface lessees.

3. ALTERNATIVES CONSIDERED:

Alternative A (No Action) – Under this alternative, the Department does not grant permission to install a water collection point and water pipeline.

Alternative B (the Proposed Action) – Under this alternative, the Department does grant permission to install a water collection point and water pipeline.

III. IMPACTS ON THE PHYSICAL ENVIRONMENT

- *RESOURCES* potentially impacted are listed on the form, followed by common issues that would be considered.
- Explain *POTENTIAL IMPACTS AND MITIGATIONS* following each resource heading.
- Enter "NONE" if no impacts are identified or the resource is not present.

4. GEOLOGY AND SOIL QUALITY, STABILITY AND MOISTURE:

Consider the presence of fragile, compactable or unstable soils. Identify unusual geologic features. Specify any special reclamation considerations. Identify any cumulative impacts to soils.

The soils in the proposed construction area are rated as moderate for off road erosion. The area where the pipeline and collection point would be place are currently thickly vegetated with brush and trees but would need to be cleared for construction. The chance of erosion if construction took place during wet periods is high, especially with the high hazard of soil rutting. Because of this the proponent will only be allowed to conduct construction activities during dry or frozen periods. If this stipulation is followed, then there should be little to no negative effects on the soil.

Table – Soil Rutting Hazard – Summary by Rating Value				
Summary by Rating Value				
Summary by Rating Value	Rating	Acres in AOI	Percent of AOI	
Severe		18.5	100.0%	
Totals for Area of Interest		18.5	100.0%	

Table – Erosion Hazard (Off-Road, Off-Trail) – Summary by Rating Value				
Summary by Rating Value				
Summary by Rating Value	Rating	Acres in AOI	Percent of AOI	
Moderate		18.5	100.0%	
Totals for Area of Interest		18.5	100.0%	

No significant cumulative impacts to geology or soil quality, stability, and moisture are anticipated.

5. WATER QUALITY, QUANTITY AND DISTRIBUTION:

Identify important surface or groundwater resources. Consider the potential for violation of ambient water quality standards, drinking water maximum contaminant levels, or degradation of water quality. Identify cumulative effects to water resources.

This project would change the local distribution of potable water. The location of the collection point currently has no surface water and very rarely has water in the small drainage next to it. However, the proponent dug down two feet and found water. The proponent would install a passive water collection system that would only function to fill a cistern when it dropped below a certain level. The place of use (cistern and house) is not a primary residence, is infrequently used and there is already a primary water source to fill the cistern and therefore should not cause a major or permanent reduction of the local groundwater.

No significant impacts to local or regional water resources are anticipated.

6. AIR QUALITY:

What pollutants or particulate would be produced? Identify air quality regulations or zones (e.g. Class I air shed) the project would influence. Identify cumulative effects to air quality.

Because all the construction work will likely be done by hand there should be no impacts to air quality. However if equipment is used the only affect would be a local discharge of exhaust from small equipment.

No significant impacts to air quality are anticipated.

7. VEGETATION COVER, QUANTITY AND QUALITY:

What changes would the action cause to vegetative communities? Consider rare plants or cover types that would be affected. Identify cumulative effects to vegetation.

The project area is densely forested with Douglas fir with an understory of brush. A narrow strip would need to be cleared with chainsaws to effectively install the water pipeline and no vegetation would need cleared for the collections site.

There are four plant species of concern in the area. Three of the species have a very low probability of being found on the site based on the predictive model (max 13%). The fourth plant species has a 25% moderate chance of being present and a 63% low chance. All four plants also have a low probability of being in the associated habitat. Two plants have a 1% chance of being common in the associated habitat with one plant also having a 26% occasional chance. Two species are unassigned for associated habitat.

Because of the low probabilities produced by the predictive model and the associated habitat index there is a low chance of rare or endangered plants being disturbed and should not stop the project.

Species Name	Agency Status	Delineation Criteria
V. <i>Asplenium trichomanes-ramosum</i> (Limestone Haircap Sporewort) SOC	USFWS: C BLM: SENSITIVE MNP's Threat Rank: 1	(Last Update: Oct 30, 2019) Point and/or polygonal observations are buffered by a minimum distance of 400 meters in order to account for stands instead of individual trees and to a maximum distance of 2,000 meters in order to encompass locational uncertainty associated with some common data sources for this species.
V. <i>Pinus sabiniana</i> (Whitebark Pine) SOC	USFWS: C BLM: SENSITIVE MNP's Threat Rank: 1	(Last Update: Apr 16, 2019) Individual occurrences are generally based upon a discovery mapped area provided by an observer and are not separated by any pre-defined distance. Individual clusters of plants mapped at the spatial scales (separated by less than approximately 25-50 meters) may be grouped together; not one occurrence if they are not separated by distinct areas of habitat or terrain features. Point observations are buffered to encompass any locational uncertainty associated with the observation.
V. <i>Cirsium longistylus</i> (Long-styled Thistle) SOC	USFWS: C BLM: SENSITIVE MNP's Threat Rank: 1	(Last Update: May 30, 2016) Individual occurrences are generally based upon a discovery mapped area provided by an observer and are not separated by any pre-defined distance. Individual clusters of plants mapped at the spatial scales (separated by less than approximately 25-50 meters) may be grouped together; not one occurrence if they are not separated by distinct areas of habitat or terrain features. Point observations are buffered to encompass any locational uncertainty associated with the observation.
V. <i>Castilleja nivea</i> (Snow Indian Paintbrush) SOC	USFWS: C BLM: SENSITIVE MNP's Threat Rank: 1	(Last Update: May 30, 2016) Individual occurrences are generally based upon a discovery mapped area provided by an observer and are not separated by any pre-defined distance. Individual clusters of plants mapped at the spatial scales (separated by less than approximately 25-50 meters) may be grouped together; not one occurrence if they are not separated by distinct areas of habitat or terrain features. Point observations are buffered to encompass any locational uncertainty associated with the observation.

No significant impacts to vegetation are anticipated.

8. TERRESTRIAL, AVIAN AND AQUATIC LIFE AND HABITATS:

Consider substantial habitat values and use of the area by wildlife, birds or fish. Identify cumulative effects to fish and wildlife.

There will be some impact to the habitat of the wildlife in the area. A small strip will need to be cleared to gain access to the ground for pipe installation. However, because this project's small scope in an area that is largely undisturbed there should not be a lasting impact on the habitat. Also, because the area is a densely forested and wet area it should revegetate itself very quickly.

No significant impacts to terrestrial, avian, or aquatic habitats are anticipated.

9. UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES:

Consider any federally listed threatened or endangered species or habitat identified in the project area. Determine effects to wetlands. Consider Sensitive Species or Species of special concern. Identify cumulative effects to these species and their habitat.

Along with the plant species of concern possible to be found in the area as discussed in section 7 there are six potential animal species of concern potentially present on the site. The first species of concern on the report is the Westslope Cutthroat Trout. Because this project would not occur near any surface water and the nearest stream is 0.75 miles to the west the trout is not likely to be affected. The likelihood of sediment reaching the stream nearby is slim considering the size of the project and the thick vegetation in between the project area and the creek.

Of the other animal species of concern there are two bats and two birds that have both a high percentage of being present based on the predictive model and a high likelihood of the project area being associated habitat. However even if these species are present the expected impact would be minimal because this project will mostly be clearing dead and downed timber and should not affect critical nesting habitat. The last bird (Pacific Wren) rates low on the predictive model and associated habitat and is not likely to be affected

Species	Species of Concern	Agency Status	Delineation Criteria	Last Updated
F - Westslope Cutthroat Trout (<i>Oncorhynchus clarki lewisi</i>) SOC	Species of Concern Native Species Global Rank: QST4 State Rank: S2	Agency Status USFWS USFS - Sensitive - Known on Forests (BD, BRT, CO, HLC, MDT, TOLC) BLM - SENSITIVE FWP SWAP: SOCN2	Delineation Criteria (Last Updated: Sep 15, 2020) Stream reaches and standing water bodies where the species presence has been confirmed through direct capture or where they are believed to be present based on the professional judgment of a fisheries biologist due to confirmed presence in adjacent areas. In order to reflect the importance of adjacent terrestrial habitats to survival, stream reaches are buffered 100 meters, standing water bodies greater than 1 acre are buffered 50 meters, and standing water bodies less than 1 acre are buffered 20 meters into the terrestrial habitat based on PACF SHYFT/SH Riparian Conservation Area standards.	
M - Little Brown Myotis (<i>Myotis lucifugus</i>) SOC	Species of Concern Native Species Global Rank: Q3 State Rank: S2	Agency Status USFWS USFS BLM FWP SWAP: SOCN3	Delineation Criteria (Last Updated: Jan 03, 2020) Confirmed area of occupancy based on the documented presence (direct captures, definitively identified acoustic recordings, or definitively identified roosting individuals) of adults or juveniles. Point observation location is buffered by a distance of 1,000 meters in order to encompass the greater than 1,000 meters foraging distance reported for the species in New Brunswick, Canada and otherwise buffered by the locational uncertainty associated with the observation up to a maximum distance of 10,000 meters. When cave locations are involved, point observations are mapped in the center of a one-square mile hexagon to ground the exact location of the same structure as per the Federal Cave Resource Protection Act and associated regulations (U.S. Code Title 16 Chapter 63, Code of Federal Regulations Title 43 Subtitle A Part 17). The outer edges of the hexagon are then buffered by a distance of 10,000 meters and otherwise by the locational uncertainty associated with the observation up to a maximum distance of 10,000 meters. All of the one-square mile hexagons intersecting the buffered area are preserved as the Species Occurrence record.	
M - Hoary Bat (<i>Lasiurus cinereus</i>) SOC	Species of Concern Native Species Global Rank: Q3Q4 State Rank: S3	Agency Status USFWS USFS BLM - SENSITIVE FWP SWAP: SOCN3	Delineation Criteria (Last Updated: May 14, 2019) Confirmed area of occupancy based on the documented presence (direct captures, definitively identified acoustic recordings, or definitively identified roosting individuals) of adults or juveniles during the active season. Point observation location is buffered by a minimum distance of 3,000 meters in order to be conservative about encompassing the maximum reported foraging distance for the congeneric <i>Lasiurus borealis</i> and otherwise buffered by the locational uncertainty associated with the observation up to a maximum distance of 10,000 meters.	
B - Clark's Nutcracker (<i>Neotoma columbiana</i>) SOC	Species of Concern Native Species Global Rank: Q5 State Rank: S3	Agency Status USFWS USFS BLM - SENSITIVE FWP SWAP: SOCN3 PIF: 3	Delineation Criteria (Last Updated: Sep 25, 2019) Observations with direct evidence of breeding activity or indirect evidence of breeding activity between early March and mid-July within forested habitats containing Whitebark Pine (<i>Pinus albiculus</i>), Limber Pine (<i>Pinus flexilis</i>), or Ponderosa Pine (<i>Pinus ponderosa</i>). Observations with direct evidence of breeding activity or indirect evidence of breeding activity buffered by a minimum distance of 1,000 meters in order to encompass the spring/summer breeding territory size reported for the species or the locational uncertainty of the observation to a maximum distance of 10,000 meters.	
B - Evening Grosbeak (<i>Coccothraustes vespertina</i>) SOC	Species of Concern Native Species Global Rank: Q5 State Rank: S3	Agency Status USFWS USFS BLM FWP SWAP: SOCN3 PIF: 3	Delineation Criteria (Last Updated: Jan 03, 2020) Confirmed nesting area based on the presence of a nest, chick, or territorial adult during the breeding season. Point observation location is buffered by a minimum distance of 1,000 meters in order to encompass the maximum foraging distance from nests reported for the species and otherwise buffered by the locational uncertainty associated with the observation up to a maximum distance of 10,000 meters.	
B - Pacific Wren (<i>Troglodytes pacificus</i>) SOC	Species of Concern Native Species Global Rank: Q5 State Rank: S3	Agency Status USFWS USFS BLM FWP SWAP: SOCN3 PIF: 2	Delineation Criteria (Last Updated: Jan 03, 2020) Observations with evidence of breeding activity buffered by a minimum distance of 300 meters in order to be conservative about encompassing home ranges and otherwise buffered by the locational uncertainty associated with the observation up to a maximum distance of 10,000 meters.	

Overall this project should not create significant impacts on any Species of Concern due to its very small size and duration.

No significant impacts to unique, endangered, fragile or limited environmental resources are anticipated, though temporary displacement of local wildlife may occur during the project.

10. HISTORICAL AND ARCHAEOLOGICAL SITES:
Identify and determine effects to historical, archaeological or paleontological resources.

A Class I (literature review) level review was conducted by the DNRC staff archaeologist for the area of potential effect (APE). This entailed inspection of project maps, DNRC's sites/site leads database, land use records, General Land Office Survey Plats, and control cards. The Class I search revealed that *Antiquities* have not been identified in the APE. No additional archaeological investigative work will be conducted in response to this proposed development. However, if previously unknown cultural or paleontological materials are identified during project related activities, all work will cease until a professional assessment of such resources can be made.

No significant effects on historical, archaeological, or paleontological resources anticipated.

11. AESTHETICS:
Determine if the project is located on a prominent topographic feature, or may be visible from populated or scenic areas. What level of noise, light or visual change would be produced? Identify cumulative effects to aesthetics.

The only aesthetic affect would be a small path cleared for the water pipeline and since the area to be affected is only visible from the proponents property there will be no larger affects on the aesthetics of the area.

No significant impacts on the aesthetics of the area are anticipated.

12. DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AIR OR ENERGY:

Determine the amount of limited resources the project would require. Identify other activities nearby that the project would affect. Identify cumulative effects to environmental resources.

There will be some demand on the local groundwater but it is not expected to be significant because this will be a rarely used backup system.

No limited environmental resources will be significantly impacted because of this project. This project will also not add any significant cumulative demands on environmental resources.

13. OTHER ENVIRONMENTAL DOCUMENTS PERTINENT TO THE AREA:

List other studies, plans or projects on this tract. Determine cumulative impacts likely to occur as a result of current private, state or federal actions in the analysis area, and from future proposed state actions in the analysis area that are under MEPA review (scoped) or permitting review by any state agency.

There are no other projects or plans being considered on the tracts listed in this EA Checklist.

IV. IMPACTS ON THE HUMAN POPULATION

- *RESOURCES potentially impacted are listed on the form, followed by common issues that would be considered.*
- *Explain POTENTIAL IMPACTS AND MITIGATIONS following each resource heading.*
- *Enter "NONE" if no impacts are identified or the resource is not present.*

14. HUMAN HEALTH AND SAFETY:

Identify any health and safety risks posed by the project.

There is some risk involved with the installation of the project when using chainsaws and possibly mechanized digging equipment. These risks will be the responsibility of the proponent to mitigate.

There is also risk to human health with the consumption of untreated ground water. Since the water will only supply the proponents property they are the only ones at risk and will be accepting that risk by constructing the project.

15. INDUSTRIAL, COMMERCIAL AND AGRICULTURE ACTIVITIES AND PRODUCTION:

Identify how the project would add to or alter these activities.

This project will not add to or deter from other industrial, agricultural, or commercial activities in the area.

16. QUANTITY AND DISTRIBUTION OF EMPLOYMENT:

Estimate the number of jobs the project would create, move or eliminate. Identify cumulative effects to the employment market.

The project will not create or eliminate any jobs, so no significant effects to the employment market are anticipated.

17. LOCAL AND STATE TAX BASE AND TAX REVENUES:

Estimate tax revenue the project would create or eliminate. Identify cumulative effects to taxes and revenue.

There are no direct or cumulative effects to taxes or revenue for the proposed project.

18. DEMAND FOR GOVERNMENT SERVICES:

Estimate increases in traffic and changes to traffic patterns. What changes would be needed to fire protection, police, schools, etc.? Identify cumulative effects of this and other projects on government services

There will not be any significant increases in traffic, school attendance, or need for fire and police protection if this project is approved.

19. LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS:

List State, County, City, USFS, BLM, Tribal, and other zoning or management plans, and identify how they would affect this project.

There are no zoning or other agency management plans affecting this project.

20. ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES:

Identify any wilderness or recreational areas nearby or access routes through this tract. Determine the effects of the project on recreational potential within the tract. Identify cumulative effects to recreational and wilderness activities.

There will be no significant direct or cumulative effects on access to or quality of recreation and wilderness activities because of this project.

21. DENSITY AND DISTRIBUTION OF POPULATION AND HOUSING:

Estimate population changes and additional housing the project would require. Identify cumulative effects to population and housing

The proposed project does not include any changes to housing or developments.

22. SOCIAL STRUCTURES AND MORES:

Identify potential disruption of native or traditional lifestyles or communities.

There are no native, unique or traditional lifestyles or communities in the vicinity that would be significantly impacted by the proposal.

23. CULTURAL UNIQUENESS AND DIVERSITY:

How would the action affect any unique quality of the area?

The proposed project will have no significant impact on any culturally unique quality of the area.

24. OTHER APPROPRIATE SOCIAL AND ECONOMIC CIRCUMSTANCES:

Estimate the return to the trust. Include appropriate economic analysis. Identify potential future uses for the analysis area other than existing management. Identify cumulative economic and social effects likely to occur as a result of the proposed action.

This project will provide \$200.00 every 10 years to the school trust.

The proposed project will not have any significant cumulative economic or social effect.

V. FINDING

25. ALTERNATIVE SELECTED:

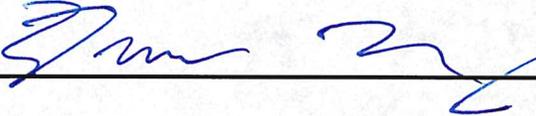
Alternative B (the Proposed Action) – Under this alternative, the Department does grant permission to install a water collection point and water pipeline.

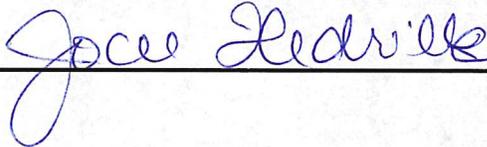
26. SIGNIFICANCE OF POTENTIAL IMPACTS:

I have evaluated the potential environment effects and have determined no significant impact to the environment because of this project.

27. NEED FOR FURTHER ENVIRONMENTAL ANALYSIS:

EIS More Detailed EA No Further Analysis

EA Checklist Prepared By:	Name: Dustin Lenz Title: Land Use Specialist
Signature: 	Date: 13 October 2020

EA Checklist Approved By:	Name: Jocee Hedrick Title: Unit Manager, Northeastern Land Office
Signature: 	Date: 10/13/2020

