CHECKLIST ENVIRONMENTAL ASSESSMENT

Project Name:	Southeast of Chinook Gravel Testing
Proposed Implementation Date:	2022
Proponent:	LHC, Inc
Location:	T33N-R19E-Sec 36 (Common Schools Trust)
County:	Blaine

I. TYPE AND PURPOSE OF ACTION

LHC, Inc, henceforth referred to as the proponent, has applied for a gravel test permit on Trust Land mentioned above. This project would utilize a backhoe to dig holes to a depth of approximately 8 to 12 feet in depth. The holes would be backfilled and reseeded once they have been evaluated.

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 proponent has submitted a permit to test for aggregate to the DNRC to explore for gravel resources. A field review to evaluate the proposal has been scheduled for the DNRC archaeologist and Minerals Management staff. The Lewistown Unit Manager and Havre Unit Land Use Specialist have been notified. Surface Lessee Mary Butcher has been notified.
Ag & Grazing Lease #2373 – Mary Butcher
Residential Lease #9123 – Mary & Bruce Butcher

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

MT Sage Grouse Habitat Conservation Program

3. ALTERNATIVES CONSIDERED:

No Action Alternative – No Action

Action Alternative – Allow the proponent to conduct the test hole survey on State Trust Land.

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.

Site geology consists of alluvial-terrace deposit, consisting of gravel in a matrix of gravelly loam and sand. The geomorphology of the site has been shaped by glacial and alluvial processes – either by glacial drainage flows or historic positions of the Milk River, or a combination of both. The site is characterized by terraces above the Milk River.

Care would be taken to preserve the soil when digging the test holes by separating the soil from the underlying material. The soils are susceptible to weed infestation once replaced and will be monitored thereafter.

No Action Alternative – The current geology and soils in the project area would remain undisturbed, as they currently exist.

Action Alternative – The proponent would be granted a permit to test for gravel. Any disturbances for gravel testing in the area would be reclaimed immediately before moving on to the next test site.

---

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.

The Milk River flows through section 36 in the SE¼ of the SE¼ and Lodge Creek flows into the Milk River from north to south, through the eastern half of section 36. The proponent's project area does not contain either of these water features.
According to Montana's Ground Water Information Center there are three water wells located within one mile of the project area. These private wells have a static water level ranging from 5 to 12 feet below ground surface. Test hole sites are proposed to be located approximately 100 to 120 feet in elevation above the Milk River and Lodge Creek and from 500 to over 3,000 feet northwest of the river itself. There are no modern surface water features present onsite. Test holes would extend approximately 8 to 12 feet below ground surface and would be unlikely to encounter any groundwater.

No Action Alternative – No impact

Action Alternative – Groundwater is not expected to be encountered during testing. There would be no anticipated impacts to the quality or quantity of the surface water or groundwater by implementing the action alternative.

---

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.

No Action Alternative – No impact

Action Alternative – Some dust particulates from traveling to the test sites and digging the test pits may affect air quality temporarily during gravel testing operations. There are no anticipated long term affects to air quality.

---

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 proposed testing area within section 36 is covered by Great Plains Mixed Grass Prairie system.
An inventory of the Montana Natural Heritage Program's Species of Concern database was conducted for the project area. The search yielded no vegetation species of concern.

No Action Alternative – No impact

Action Alternative – Vegetation communities would be affected by this project. The use of excavation equipment would temporarily damage some areas of the plant community. This would occur from the vegetation being compacted and excavated by equipment. Damage to the plant community should be lessened at this time of year since most species will be entering dormancy. Per the stipulations of the permit, the proponent would be responsible for the management and mitigation of invasive weeds in the testing area.

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.

This area provides habitat for a variety of big game, large and small mammals, raptors, greater sage grouse, and a variety of other birds.

No Action Alternative – No impact

Action Alternative – The proponent would be granted a permit to test for gravel and impacts to habitats are expected be negligible. The size of the project area and length of the action alternative are not substantiative enough to permanently disrupt wildlife in the area. Similar habitat and forage can be found throughout the surrounding area and could sustain the wildlife species temporarily. Grazing by domestic animals would continue. The Montana Sage Grouse Habitat conservation program will be consulted by the operator prior to beginning work.

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.

Section 36 of Township 33N occurs within Greater Sage Grouse General Habitat areas. The proponent must consult the Montana Sage Grouse Conservation Program and requirements are to be followed.
A search was conducted using the Natural Heritage Map Viewer on the Montana Natural Heritage Program. The search yielded 5 species of concern; Little Brown Myotis, *'Myotis lucifugus,'* Swift Fox, *'Vulpes velox,'* and there have been observations of the Northern Pearl Dace, *'Margariscus nachtriebi,'* within Lodge Creek and other observations of the Great Blue Heron, *'Ardea herodias,'* and Bobolink, *'Dolichonyx oryzivorus'* near the project area.

No Action Alternative – No impact

Action Alternative – The proponent would be granted a permit to test for gravel. This activity may create a temporary disruption to the species of concern if listed. Rangelands are abundant in the project vicinity and animals could utilize surrounding areas during the temporary disturbance with the ability to return to the site upon completion of activities.

10. HISTORICAL AND ARCHAEOLOGICAL SITES:

Identify and determine effects to historical, archaeological or paleontological resources.

No Action Alternative – No impact

Action Alternative – Consultations with the DNRC Archaeologist and Montana Historical Society office have been initiated. Any resources can be avoided with backhoe trench excavation for gravel exploration and assessment work, the proposed project will result in *No Effect* to *Antiquities* as defined under the Montana State Antiquities Act. A formal report of findings pertaining to inventory work is forthcoming.

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 proponent's area of interest is over three miles to the southeast of Chinook and would be shielded from major and towns by the surrounding hills.

No Action Alternative – No impact

Action Alternative – The proponent would be granted a permit to test for gravel. Minimal disturbance may occur during testing operations. However, there are no long-term effects to aesthetics 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.

No Action Alternative – No impact

Action Alternative – Negligible impacts expected

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.

None known

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.

No Action Alternative – No impact

Action Alternative – Typical safety risks for laborers working with mechanized equipment would be present, but the potential risk would be minimal with proper safety efforts.

15. INDUSTRIAL, COMMERCIAL AND AGRICULTURE ACTIVITIES AND PRODUCTION:
Identify how the project would add to or alter these activities.

No Action Alternative – No impact

Action Alternative – Negligible impacts expected

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.

No Action Alternative – No impact

Action Alternative – This project would have no effects on creating, moving, or eliminating jobs.

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.

No Action Alternative – No impact

Action Alternative – Negligible impacts expected

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

No Action Alternative – No impact

Action Alternative – Negligible impacts expected

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 known zoning or management plans overlying the project area.

No Action Alternative – No Impact

Action Alternative – Negligible impacts expected

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.

No Action Alternative – No Impact

Action Alternative – There would be no impact to recreational activities anticipated on this section.

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.

No Action Alternative – No impact

Action Alternative – No impacts expected

22. SOCIAL STRUCTURES AND MORES:
Identify potential disruption of native or traditional lifestyles or communities.

No Action Alternative – No impact

Action Alternative – No impacts expected

23. CULTURAL UNIQUENESS AND DIVERSITY:

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

No Action Alternative – No impact

Action Alternative – No impacts expected

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.

No Action Alternative – No impact

Action Alternative – This project will provide the trust with the potential for future development of aggregate resources and royalty income.

EA Checklist Prepared By:	**Name:**	Thomas Palin	**Date:**	October 5, 2022
	Title:	Mineral Resource Specialist		

V. FINDING

25. ALTERNATIVE SELECTED:

By constructing this Environmental Assessment, the Department has identified impacts to the environment based on two potential alternatives. The Department has selected the action alternative and will issue LHC, Inc a gravel testing permit. The Department believes this alternative can be implemented in a manner that is consistent with the long term sustainable natural resource management of the area and generate revenue for the common school trust.

26. SIGNIFICANCE OF POTENTIAL IMPACTS:

The granting of the requested aggregate test permit pits on this tract of state-owned trust lands should not result in, nor cause significant negative environmental impacts. The proposed action satisfies the trusts fiduciary mandate and ensures the long-term productivity of the land. An environmental assessment is the appropriate level of analysis for the proposed action.
I conclude that all identified potential impacts will be mitigated by utilizing permit requirements, including the stipulations listed below.

1. Permit holder shall be in compliance with all applicable state and federal laws, rules and regulations, including but not limited to those concerning safety, environmental protection, reclamation, drone flight requirements for photography and topographic mapping over the site, and sage grouse requirements.

2. Topsoil/sod will be stockpiled separately from subsoil for reclamation. Licensee shall fill holes with subsoil before covering with topsoil and sod. All holes must be filled and reclaimed immediately prior to moving on to the next hole.

3. This license is located within designated sage grouse general and core habitat. Proposed activities are subject to, and shall comply with, all provisions, stipulations, and mitigation requirements of the Montana Sage Grouse Habitat Conservation Strategy, as implemented by Governor's Executive Orders 10-2014, 12-2015, and amendments thereto.

4. DNRC will contact and coordinate with DNRC's surface lessee.

5. Geologic, geochemical/geophysical information (including but not limited to detailed sample site locations, areas disturbed by gravel pit testing and sample results for each corresponding sample site) if collected for the tract will be provided to Minerals Management Bureau, TLMD MT-DNRC annually with a report on exploration activities. The lessee shall also concurrently provide GPS, GIS, or other data, detailed maps and/or aerial photos associated with the associated permit to MMB. Licensee should advise the department if they consider this information confidential.

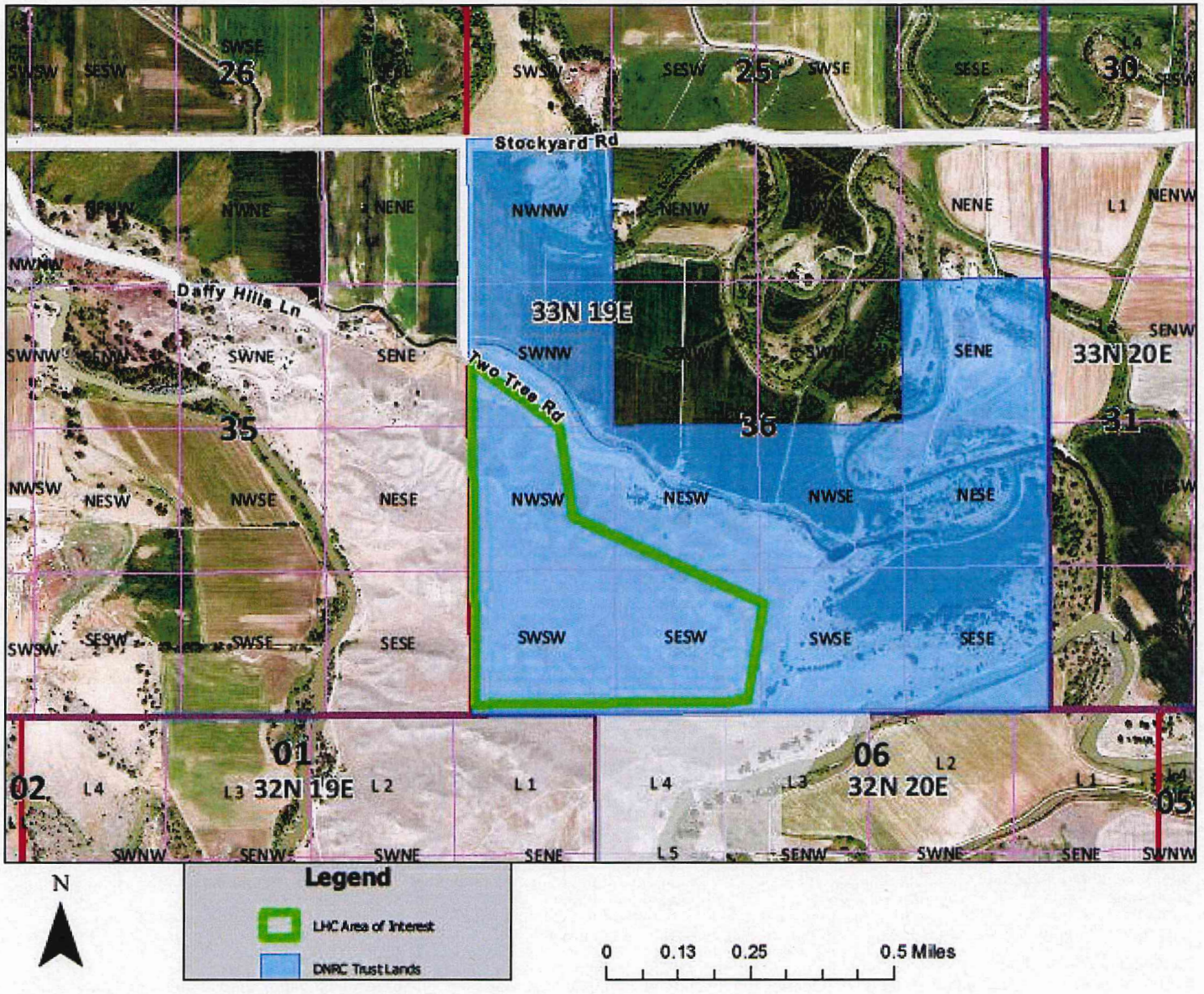
6. Permit holder agrees to avoid and not disturb historic buildings, foundations or other cultural features on this tract.

---

27. NEED FOR FURTHER ENVIRONMENTAL ANALYSIS:

[ ] EIS [ ] More Detailed EA [X] No Further Analysis

EA Checklist Approved By:	**Name:**	Zack Winfield
	Title:	Petroleum Engineer, Minerals Management Bureau
Signature: Zack Winfield		**Date:** 10/5/22


Stockyard Rd
Daffy Hills Ln
Two Tree Rd
33N 19E
33N 20E
32N 19E
32N 20E
26
25
30
35
36
31
01
06
02
05
NWNW
NENW
NENE
SWNW
SENW
SWNE
SENE
NWSW
NESW
NWSE
NESE
SWSW
SESW
SWSE
SESE
L1
L2
L3
L4
L5
N
Legend
LHC Area of Interest
DNRC Trust Lands
0
0.13
0.25
0.5 Miles