

DEPARTMENT OF ENVIRONMENTAL QUALITY
Environmental Assessment

Water Protection Bureau

Name of Project: Sun Mountain Lumber Mill

Type of Project: Proposed discharge of non-domestic wastewater to ground water under the Montana Ground Water Pollution Control System (MGWPCS) permitting program.

Location of Project: Section 04, Township 07 North, Range 09 West
The lumber mill is located at 181 Greenhouse Road which is immediately to the south of the City of Deer Lodge.

City/Town: Deer Lodge

County: Powell

Description of Project: This Environmental Assessment (EA) is for the renewal of an existing MGWPCS permit for the Sun Mountain Lumber Mill (facility). Wastewater is generated from two on-site boilers and their associated water softeners. The primary wastewater stream undergoes treatment by a Kinetico arsenic sorption system along with pH neutralization. The proposed MGWPCS permit reauthorizes Sun Mountain Lumber, Inc. (permittee) to discharge wastewater from subsurface discharge structures (Outfall 001 & Outfall 002) into Class I ground water.

The subsurface drainfields are located at:

- Outfall 001: Section 04, Township 07 North, Range 09 West
Latitude: 46.38774° North; Longitude: 112.74224° West
Powell County
- Outfall 002: Section 04, Township 07 North, Range 09 West
Latitude: 46.38704° North; Longitude: 112.74269° West
Powell County

All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's. The scope of this EA is for the operation, and maintenance of the wastewater treatment and disposal systems.

Agency Action and Applicable Regulations: The proposed action is to reissue an individual MGWPCS permit that contains effluent limitations, effluent monitoring requirements, and special conditions. The permit is issued under the authority of the Montana Water Quality Act (MCA 75-5-101 *et seq.*), the Montana Ground Water Pollution Control System (ARM 17.30.1001-1045), and the Montana Numeric Water Quality Standards in the Department of Environmental Quality (DEQ) Circular DEQ-7.

Summary of Issues: The purpose of this action is to regulate the discharges of pollutants to state waters from the regulated facility. Reissuance of this permit will require the permittee to

continue to implement, monitor, and manage practices to prevent pollution of statewaters. No significant impacts have been identified. All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's.

Affected Environment & Impacts of the Proposed Project:

Y = Impacts may occur (explain under Potential Impacts).

N = Not Present or No Impact will likely occur.

IMPACTS ON THE PHYSICAL ENVIRONMENT	
RESOURCE	[Y/N] POTENTIAL IMPACTS AND MITIGATION MEASURES
<p>1. GEOLOGY AND SOIL QUALITY, STABILITY AND MOISTURE: Are soils present which are fragile, erosive, susceptible to compaction, or unstable? Are there unusual or unstable geologic features? Are there special reclamation considerations?</p>	<p>[N] No significant impacts have been identified. The discharge will increase the amount of moisture in the vadose zone. No limiting layers were identified in the soil profile. All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's.</p>
<p>2. WATER QUALITY, QUANTITY AND DISTRIBUTION: Are important surface or groundwater resources present? Is there potential for violation of ambient water quality standards, drinking water maximum contaminant levels, or degradation of water quality?</p>	<p>[N] No significant impacts have been identified. All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's. As discussed in the supplemental Fact Sheet document, an arsenic sorption (2013) and pH neutralization system (2011) were installed by the permittee during the previous permit cycle.</p> <p>DEQ has determined that the activity is not considered to be a new or increased source resulting in a change of existing water quality occurring on or after April 29, 1993 (ARM 17.30.702). The ground water in the vicinity of the existing discharge structure is Class I ground water with a specific conductance less than 1,000 µS/cm. DEQ has developed effluent limitations based on water quality standards to maintain the beneficial uses of this state ground water. The permit includes monitoring, reporting, and corrective action requirements to establish, confirm, and maintain compliance with permit limitations.</p> <p>Ground water monitoring near the hydraulically downgradient boundary of the mixing zone is maintained within the permit renewal. Please refer to the Fact Sheet document for further details.</p>

IMPACTS ON THE PHYSICAL ENVIRONMENT	
	<p>On-site activities may impact water quality by contributing discharges of sediment to surface waters. The permittee may be required to maintain (MTR000296) existing permit coverage under a Montana Pollutant Discharge Elimination System (MPDES) General Permit for Storm Water Discharges Associated with Construction Activity. The permittee may be required to develop and implement a Storm Water Pollution Prevention Plan (SWPPP) which includes best management practices to protect surface waters. Additional information can be found at the following website:</p> <p>http://www.deq.mt.gov/wqinfo/mpdes/stormwaterconstruction.mcp</p>
<p>3. AIR QUALITY: Will pollutants or particulate be produced? Is the project influenced by air quality regulations or zones (Class I airshed)?</p>	<p>[N] No significant impacts have been identified. The permittee is encouraged to contact or maintain communication with the Montana DEQ Air Resources Management Bureau:</p> <p>http://www.deq.mt.gov/pcd/arm/default.mcp</p>
<p>4. VEGETATION COVER, QUANTITY AND QUALITY: Will vegetative communities be significantly impacted? Are any rare plants or cover types present?</p>	<p>[N] No significant impacts have been identified. All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's.</p> <p>Based on a search of the Natural Heritage Database, there are no vegetative species listed as either S1, S2, LE, or LT (http://fieldguide.mt.gov/statusCodes.aspx#msrc:rank) in the general vicinity of the facility.</p>
<p>5. TERRESTRIAL, AVIAN AND AQUATIC LIFE AND HABITATS: Is there substantial use of the area by important wildlife, birds or fish?</p>	<p>[Y] All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's.</p> <p>Based on a search of the Natural Heritage Database, there are two species listed as either S1, S2, LE, or LT (http://fieldguide.mt.gov/statusCodes.aspx#msrc:rank).</p> <p>In the local vicinity of the facility, the following species has been listed: <i>Oncorhynchus clarkii lewisi</i>.</p> <p>Also, in the overall regional area, the following species has been listed: <i>Melanerpes lewis</i>.</p>

IMPACTS ON THE PHYSICAL ENVIRONMENT	
6. UNIQUE, ENDANGERED, FRAGILE OR LIMITED ENVIRONMENTAL RESOURCES: Are any federally listed threatened or endangered species or identified habitat present? Any wetlands? Species of special concern?	[N] See #4 and #5 above. Site and habitat inventories for the applicable species were recommended in consultation with the Montana Natural Heritage Program.
7. SAGE GROUSE EXECUTIVE ORDER: Is the project proposed in core, general or connectivity sage grouse habitat, as designated by the Sage Grouse Habitat Conservation Program (Program) at: https://sagegrouse.mt.gov/	[N] The Department has verified that the facility is not listed as being within sage grouse habitat.
8. HISTORICAL AND ARCHAEOLOGICAL SITES: Are any historical, archaeological or paleontological resources present?	[N] All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's. A general recommendation by the Montana State Historic Preservation Office (MSHPO) states that in the event that cultural materials are inadvertently discovered, the permittee should contact the MSHPO office for investigation.
9. AESTHETICS: Is the project on a prominent topographic feature? Will it be visible from populated or scenic areas? Will there be excessive noise or light?	[N] All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's. All discharge drainfields are sub surface.
10. DEMANDS ON ENVIRONMENTAL RESOURCES OF LAND, WATER, AIR, OR ENERGY: Will the project use resources that are limited in the area? Are there other activities nearby that will affect the project? Will new or upgraded power line or other energy source be needed?	[N] All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's. The facility's current source water is supplied by the City of Deer Lodge.
11. IMPACTS ON OTHER ENVIRONMENTAL RESOURCES: Are there other activities nearby that will affect the project?	[N] No significant impacts have been identified.

IMPACTS ON THE HUMAN ENVIRONMENT	
12. HUMAN HEALTH AND SAFETY: Will this project add to health and safety risks in the area?	[N] No significant impacts have been identified.
13. INDUSTRIAL, COMMERCIAL AND AGRICULTURAL ACTIVITIES AND PRODUCTION: Will the project add to or alter these activities?	[N] All proposed activities take place within the historical property boundary of a lumber mill first established in the 1960's.

IMPACTS ON THE HUMAN ENVIRONMENT	
14. QUANTITY AND DISTRIBUTION OF EMPLOYMENT: Will the project create, move or eliminate jobs? If so, estimated number.	[N] The lumber mill operations were first established on-site in the 1960's.
15. LOCAL AND STATE TAX BASE AND TAX REVENUES: Will the project create or eliminate tax revenue?	[N] The lumber mill operations were first established in the 1960's.
16. DEMAND FOR GOVERNMENT SERVICES: Will substantial traffic be added to existing roads? Will other services (fire protection, police, schools, etc.) be needed?	[N] All operations take place within the historical property boundary of a lumber mill first established in the 1960's.
17. LOCALLY ADOPTED ENVIRONMENTAL PLANS AND GOALS: Are there State, County, City, USFS, BLM, Tribal, etc. zoning or management plans in effect?	[N] All operations take place within the historical property boundary of a lumber mill first established in the 1960's.
18. ACCESS TO AND QUALITY OF RECREATIONAL AND WILDERNESS ACTIVITIES: Are wilderness or recreational areas nearby or accessed through this tract? Is there recreational potential within the tract?	[N] No significant impacts have been identified.
19. DENSITY AND DISTRIBUTION OF POPULATION AND HOUSING: Will the project add to the population and require additional housing?	[N] No significant impacts have been identified.
20. SOCIAL STRUCTURES AND MORES: Is some disruption of native or traditional lifestyles or communities possible?	[N] No significant impacts have been identified.
21. CULTURAL UNIQUENESS AND DIVERSITY: Will the action cause a shift in some unique quality of the area?	[N] All operations take place within the historical property boundary of a lumber mill first established in the 1960's.
22. OTHER APPROPRIATE SOCIAL AND ECONOMIC CIRCUMSTANCES:	[N] No significant impacts have been identified.
23(a). PRIVATE PROPERTY IMPACTS: Are we regulating the use of private property under a regulatory statute adopted pursuant to the police power of the state? (Property management, grants of financial assistance, and the exercise of the power of eminent domain are not within this category.) If not, no further analysis is required.	[N] No significant impacts have been identified.

IMPACTS ON THE HUMAN ENVIRONMENT	
23(b). PRIVATE PROPERTY IMPACTS: Is the agency proposing to deny the application or condition the approval in a way that restricts the use of the regulated person's private property? If not, no further analysis is required.	[N] No significant impacts have been identified.
23(c). PRIVATE PROPERTY IMPACTS: If the answer to 22(b) is affirmative, does the agency have legal discretion to impose or not impose the proposed restriction or discretion as to how the restriction will be imposed? If not, no further analysis is required. If so, the agency must determine if there are alternatives that would reduce, minimize or eliminate the restriction on the use of private property, and analyze such alternatives. The agency must disclose the potential costs of identified restrictions.	[N] No significant impacts were identified in 23(b).

24. **Description of and Impacts of other Alternatives Considered:**
- A. No Action: Under the “No Action” alternative, the Department would not issue an individual ground water discharge permit under the Montana Ground Water Pollution Control System administrative rules. The proposed action will have environmental benefits compared to leaving the facility unpermitted.
 - B. Approval with Modification: The Department has not identified any necessary modifications to grant approval.
25. **Summary of Magnitude and Significance of Potential Impacts:**
- Impacts were assessed with the assumption that the facility will comply with the terms and conditions of the permit. Violations of the permit could lead to significant adverse impacts to state waters. Violations of the permit are not an effect of the agency action since the permit itself forbids such activities. However, the Department has taken steps to ensure that violations do not occur. The Department provides assistance to applicants in understanding and implementing the requirements of the permit. The Department also conducts periodic inspections of permitted facilities, and identifies potential problems with design or management practices. If violations of the permit do occur, the Department will take appropriate action under the Montana Water Quality Act (75-5-617, MCA). Enforcement sanctions for violations of the permit include injunctions, civil and administrative penalties, and cleanup orders.

26. **Cumulative Effects:**

Cumulative effects were analyzed as part of this EA and permitting determination. No cumulative impacts have been identified. The Department notes the following:

- There are no other permitted discharges to this shallow aquifer in the nearby area.
- Downgradient properties are reported to be on the City of Deer Lodge's utility system.
- No impacts were identified based on ambient (receiving) and downgradient ground water conditions at the time of this analysis.
- Ambient (receiving) ground water quality conditions were factored into the assimilative capacity determination which is reflected in the proposed effluent limitations.
- Ambient (receiving) and downgradient ground water quality monitoring will be maintained within the permit renewal.

DEQ has determined that the activity is not considered to be a new or increased source resulting in a change of existing water quality occurring on or after April 29, 1993 (ARM 17.30.702). The ground water in the vicinity of the existing discharge structure is Class I ground water with a specific conductance less than 1,000 $\mu\text{S}/\text{cm}$. DEQ has developed effluent limitations based on water quality standards to maintain the beneficial uses of this state ground water. The permit prohibits pollution of state waters. The permit includes monitoring, reporting, and corrective action requirements to establish, confirm, and maintain compliance with permit limitations. Please refer to the Fact Sheet document for additional information.

27. **Preferred Action Alternative and Rationale:** The preferred action is to reissue this individual MGWPCS discharge permit. This action is preferred since the permit provides a regulatory mechanism for protecting statewaters by applying effluent limitations and monitoring requirements to the discharged effluent.

Recommendation for Further Environmental Analysis:

EIS More Detailed EA No Further Analysis

Rationale for Recommendation: An EIS is not required under the Montana Environmental Policy Act because the project lacks significant adverse effects to the human and physical environment.

28. **Public Involvement:** Legal notice information for water quality discharge permits are listed at the following website: <http://deq.mt.gov/Public/notices/wqnotices>. Public comments on this proposal are invited any time prior to close of business on August 30, 2016. Comments may be directed to:

DEQWPBPublicComments@mt.gov

or at:

Water Protection Bureau
PO Box 200901
Helena, MT 59620

All comments received or postmarked prior to the close of the public comment period will be considered in the formulation of the final permit. DEQ will respond to all substantive comments pertinent to this permitting action and may issue a final decision within thirty days of the close of the public comment period.

All persons, including the applicant, who believe any condition of the draft permit is inappropriate, or that DEQ's tentative decision to deny an application, terminate a permit, or prepare a draft permit is inappropriate, shall raise all reasonably ascertainable issues and submit all reasonably available arguments supporting their position by the close of the public comment period (including any public hearing). All public comments received for this draft permit will be included in the administrative record and will be available for public viewing during normal business hours.

Copies of the public notice were mailed to the applicant, state and federal agencies and interested persons who have expressed interest in being notified of permit actions. A copy of the distribution list is available in the administrative record for this draft permit. Electronic copies of the public notice, draft permit, fact sheet, and draft environmental assessment are available at the following website:
<http://deq.mt.gov/Public/notices/wqnotices>.

Any person interested in being placed on the mailing list for information regarding this permit may contact the DEQ Water Protection Bureau at (406) 444-3080 or email DEQWPBPublicComments@mt.gov. All inquiries will need to reference the permit number (MTX000125), and include the following information: name, address, and phone number.

During the public comment period provided by the notice, DEQ will accept requests for a public hearing. A request for a public hearing must be in writing and must state the nature of the issue proposed to be raised in the hearing.

29. **Persons and/or Agencies Consulted in the Preparation of this Analysis:**

Montana DEQ Remediation Division
Montana Natural Heritage Program
Montana Bureau of Mines and Geology web site
Natural Resource Information System, Montana State Library
Historical Preservation Society
United States Department of Agriculture, Natural Resources Conservation Service Soil Survey

EA Checklist Prepared By:

Chris Boe

July 07, 2016

Approved By:

Jon Kenning, Chief
Water Protection Bureau

Signature

Date