# MONTANA DEPARTMENT OF ENVIRONMENTAL QUALITY Environmental Assessment

#### **Water Protection Bureau**

Name of Project: Manhattan Water Reclamation Facility

Location of Project: 250 Bettingill Rd Manhattan, MT

City/Town: Manhattan County: Gallatin

**Type of Project**: Montana Pollutant Discharge Elimination System Renewal for a Publicly Owned

**Treatment Works** 

# **Description of Project:**

The Montana Department of Environmental Quality (DEQ) has proposed to renew the Montana Pollutant Discharge System (MPDES) permit for the Town of Manhattan (Manhattan) Water Reclamation Facility (WRF). The WRF is a 2008-built biological nutrient removal (BNR) plant using a hybrid activated sludge-fixed film system. This publicly owned treatment works discharges to Dita Ditch. The average daily design flow is 0.37 million gallons per day (mgd) and the 2017 total population served was 2,350 (including the Amsterdam-Churchill contribution.

#### **Agency Action and Applicable Regulations:**

The proposed action is to renew the MPDES permit for another five-year cycle.

ARM Title 17, Chapter 30, Subchapter 2 – Water Quality Permit Application and Annual Fees.

ARM Title 17, Chapter 30, Subchapter 5 – Mixing Zones in Surface and Ground Water.

ARM Title 17, Chapter 30, Subchapter 6 – Surface Water Quality Standards.

ARM Title 17, Chapter 30, Subchapter 7 – Nondegradation of Water Quality.

ARM Title 17, Chapter 30, Subchapter 12 – MPDES Effluent Limitations and Standards, Standards of Performance, and Treatment Requirements

ARM Title 17, Chapter 30, Subchapter 13 – MPDES Permits

Montana Water Quality Act, MCA 75-5-101 et. seg.

#### **Summary of Issues:**

The average daily design flow for the Manhattan WRF has remained at 0.37 mgd. New effluent limitations are established for nutrients (total nitrogen and phosphorus). Manhattan is in the midst of a Preliminary Engineering Review (PER) to invest in additional facility upgrades – these planned upgrades were not included as part of this permit renewal.

# **Affected Environment & Impacts of the Proposed Project**:

Y = Impacts may occur.

N = Not present or No Impact will likely occur.

IMPACTS ON T	HE PHYSICAL ENVIRONMENT
RESOURCE	[Y/N] POTENTIAL IMPACTS AND
	MITIGATION MEASURES
1. GEOLOGY AND SOIL QUALITY,	[N] No impact will likely occur due to no change to geology and
STABILITY AND MOISTURE: Are soils present	soils.
which are fragile, erosive, susceptible to	50115.
compaction, or unstable? Are there unusual or	
unstable geologic features? Are there special	
reclamation considerations?	
2. WATER QUALITY, QUANTITY AND	[N] No impact will likely occur. Effluent limitations will protect
DISTRIBUTION: Are important surface or	designated and existing uses of the receiving water.
groundwater resources present? Is there potential	
for violation of ambient water quality standards,	
drinking water maximum contaminant levels, or	
degradation of water quality?	DIDL
3. AIR QUALITY: Will pollutants or particulates be produced? Is the project influenced by air	[N] Not present.
quality regulations or zones (Class I airshed)?	
4. VEGETATION COVER, QUANTITY AND	[N] No impact will likely occur. No changes to land cover or land
QUALITY: Will vegetative communities be	use are planned for the Manhattan WRF as part of this permit
significantly impacted? Are any rare plants or	renewal.
cover types present?	Tellewal.
5. TERRESTRIAL, AVIAN AND AQUATIC	[N] No impact will likely occur. Effluent limitations will protect
LIFE AND HABITATS: Is there substantial use of	aquatic/wildlife uses.
the area by important wildlife, birds or fish?	aquant, manto asser
6. UNIQUE, ENDANGERED, FRAGILE OR	[N] No impact will likely occur. No changes to land cover or land use
LIMITED ENVIRONMENTAL RESOURCES:	are planned for the Manhattan WRF as part of this permit renewal.
Are any federally listed threatened or endangered	Effluent limitations will protect aquatic/wildlife uses.
species or identified habitat present? Any	• •
wetlands? Species of special concern?	
7. SAGE GROUSE EXECUTIVE ORDER: Is the	[N] DEQ has verified the facility is not within sage grouse habitat,
project proposed in core, general or connectivity	and therefore does not need Program review.
sage grouse habitat, as designated by the Sage Grouse Habitat Conservation Program (Program)	
at: http://dnrc.mt.gov/divisions/cardd/sage-grouse?	
If yes, did the applicant attach documentation from	
the Program showing compliance with Executive	
Order 12-2015 and the Program's	
recommendations? If so, attach the documentation	
to the EA and address the Program's	
recommendations in the permit. If project is in core,	
general or connectivity habitat and the applicant did	
not document consultation with the Program, refer	
the applicant to the Sage Grouse Habitat	
Conservation Program.	INTEREST OF THE PART OF THE PA
8. HISTORICAL AND ARCHAEOLOGICAL	[N] No impact will likely occur. No known historical or
SITES: Are any historical, archaeological or	archaeological sites present.
paleontological resources present?  9. AESTHETICS: Is the project on a prominent	[N] No immed will likely account
topographic feature? Will it be visible from	[N] No impact will likely occur.
1 6 1	
populated or scenic areas? Will there be excessive	

IMPACTS ON THE PHYSICAL ENVIRONMENT	
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 powerline or other energy source be needed)	[N] No impact will likely occur. No increased energy needs are currently planned as part of this permit renewal.
11. IMPACTS ON OTHER ENVIRONMENTAL RESOURCES: Are there other activities nearby that will affect the project?	[N] Not present.

IMPACTS ON THE HUMAN ENVIRONMENT		
RESOURCE	[Y/N] POTENTIAL IMPACTS AND	
	MITIGATION MEASURES	
12. HUMAN HEALTH AND SAFETY: Will	[N] No impact will likely occur.	
this project add to health and safety risks in the		
area?		
13. INDUSTRIAL, COMMERCIAL AND	[N] No impact will likely occur.	
AGRICULTURAL ACTIVITIES AND		
PRODUCTION: Will the project add to or alter		
these activities?  14. QUANTITY AND DISTRIBUTION OF	[N] No impact will likely occur.	
EMPLOYMENT: Will the project create, move	[N] No impact will likely occur.	
or eliminate jobs? If so, estimated number.		
15. LOCAL AND STATE TAX BASE AND	[N] Future upgrades to the facility may cause increase in taxes. No	
TAX REVENUES: Will the project create or	upgrades are scheduled as part of this permit renewal.	
eliminate tax revenue?		
16. DEMAND FOR GOVERNMENT	[N] Short-term construction traffic increase may occur during facility	
SERVICES: Will substantial traffic be added to	upgrades or sewer system expansion. No facility upgrades are	
existing roads? Will other services (fire	included as part of this permit renewal.	
protection, police, schools, etc.) be needed?		
17. LOCALLY ADOPTED	[N] No impact will likely occur. No zoning changes are likely to be	
ENVIRONMENTAL PLANS AND GOALS: Are there State, County, City, USFS, BLM,	required.	
Tribal, etc. zoning or management plans in		
effect?		
18. ACCESS TO AND QUALITY OF	[N] Not present at the WRF. Recreation is not likely to occur on Dita	
RECREATIONAL AND WILDERNESS	Ditch. Permit conditions are protective of recreation that may occur	
ACTIVITIES: Are wilderness or recreational	downstream.	
areas nearby or accessed through this tract? Is		
there recreational potential within the tract?		
19. DENSITY AND DISTRIBUTION OF	[N] No impact will likely occur.	
POPULATION AND HOUSING: Will the		
project add to the population and require additional housing?		
20. SOCIAL STRUCTURES AND MORES: Is	[N] No impact will likely occur.	
some disruption of native or traditional lifestyles	[14] No impact will likely occur.	
or communities possible?		
21. CULTURAL UNIQUENESS AND	[N] No impact will likely occur.	
DIVERSITY: Will the action cause a shift in		
some unique quality of the area?		
22. OTHER APPROPRIATE SOCIAL AND	[N] Not present.	
ECONOMIC CIRCUMSTANCES:		

IMPACTS ON THE HUMAN ENVIRONMENT	
RESOURCE	[Y/N] POTENTIAL IMPACTS AND MITIGATION MEASURES
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.  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.  23(c). PRIVATE PROPERTY IMPACTS: If the answer to 23(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] Not present.  [N] Not present.  [N] Not present.

# 24. Description of and Impacts of other Alternatives Considered:

MPDES renewal permit issuance is not predicted to have any additional impacts. Permit denial would cause extreme hardship on the municipality and render it unable to continue sewer service to resident and businesses.

25. Summary of Magnitude and Significance of Potential Impacts:

None.

26. Cumulative Effects:

None.

27. Preferred Action Alternative and Rationale:

The preferred action is to reissue the MPDES permit. This action is preferred because the MPDES permitting program provides the regulatory mechanism for protecting water quality by enforcing the terms of the facility's permit.

# **Recommendation for Further Environmental Analysis:**

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

Permit No.:MT0021857 2021 EA Page 5 of 5

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

28.	Public Involvement:	
	A 30-day public comment period will be held.	
29.	Persons and agencies consulted in the preparation of this analysis:	
	Randy Lynch, Plant Manager, and Robert Seamons, Engineer, Town of Manhattan (2017) Mayor Glen Clements, Lead Operator, Town of Manhattan (2020/2021)	
EA Pr	epared By:	
Christi	ne Weaver March 2021	
Approved By:		

Date

Jon Kenning, Chief

Water Protection Bureau