

MONTANA DEPARTMENT OF ENVIRONMENTAL QUALITY

AUTHORIZATION TO DISCHARGE UNDER THE MONTANA GROUND WATER POLLUTION CONTROL SYSTEM

In compliance with Montana Water Quality Act, Title 75, Chapter 5, Montana Code Annotated (MCA) and the Administrative Rules of Montana (ARM) 17.30 Subchapter 5, Subchapter 7, and Subchapter 10 *et seq.*,

Four Corners Water & Sewer District

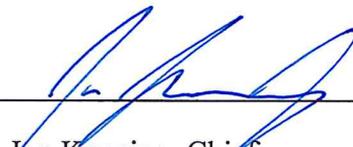
is authorized to discharge from Four Corners Water & Sewer District's Wastewater Treatment System (a.k.a., Elk Grove Wastewater Treatment Plant). NW ¼ SE ¼ Section 23, Township 02S, Range 04E, Lot 4, Platt J-316, Elk Grove Subdivision Phase 1. Gallatin County; to receiving waters, **Class I ground water,**

in accordance with discharge point(s), effluent limitations, monitoring requirements and other conditions set forth herein. Authorization for discharge is limited to those outfalls specifically listed in the permit. The numeric effluent limits, water quality standards, and special conditions specified herein support the protection of the affected receiving water.

This permit shall become effective: **March 1, 2018.**

This permit and the authorization to discharge shall expire at midnight, **February 28, 2023.**

FOR THE MONTANA DEPARTMENT OF ENVIRONMENTAL QUALITY



Jon Kenning, Chief
Water Protection Bureau

Issue Date: January 5, 2018

TABLE OF CONTENTS

I.	EFFLUENT LIMITS, MONITORING REQUIREMENTS & OTHER CONDITIONS	3
A.	DESCRIPTION OF DISCHARGE POINTS AND MIXING ZONES.....	3
B.	EFFLUENT LIMITATIONS	4
C.	EFFLUENT MONITORING AND REPORTING REQUIREMENTS	5
D.	GROUND WATER COMPLIANCE LIMIT – FOR MONITORING WELLS.....	9
E.	SPECIAL CONDITIONS – GROUND WATER MONITORING AND REPORTING REQUIREMENTS	10
F.	SPECIAL CONDITIONS – OTHER.....	11
G.	COMPLIANCE SCHEDULE.....	13
II.	MONITORING, RECORDING AND REPORTING REQUIREMENTS.....	14
A.	REPRESENTATIVE SAMPLING	14
B.	MONITORING PROCEDURES	14
C.	PENALTIES FOR TAMPERING	14
D.	REPORTING	14
E.	COMPLIANCE SCHEDULES.....	14
F.	ADDITIONAL MONITORING BY THE PERMITTEE	15
G.	RECORDS CONTENTS.....	15
H.	RETENTION OF RECORDS	15
I.	TWENTY-FOUR HOUR NOTICE OF NONCOMPLIANCE REPORTING	15
J.	OTHER NONCOMPLIANCE REPORTING	16
K.	INSPECTION AND ENTRY	16
III.	COMPLIANCE RESPONSIBILITIES.....	17
A.	DUTY TO COMPLY.....	17
B.	PENALTIES FOR VIOLATIONS OF PERMIT CONDITIONS.....	17
C.	NEED TO HALT OR REDUCE ACTIVITY NOT A DEFENSE.....	17
D.	DUTY TO MITIGATE	17
E.	PROPER OPERATION AND MAINTENANCE	17
F.	REMOVED SUBSTANCES.....	18
G.	BYPASS OF TREATMENT FACILITIES	18
IV.	GENERAL REQUIREMENTS	19
A.	PLANNED CHANGES	19
B.	ANTICIPATED NONCOMPLIANCE	19
C.	PERMIT ACTIONS.....	19
D.	DUTY TO REAPPLY.....	19
E.	DUTY TO PROVIDE INFORMATION.....	19
F.	OTHER INFORMATION	20
G.	SIGNATORY REQUIREMENTS.....	20
H.	PENALTIES FOR FALSIFICATION OF REPORTS.....	21
I.	AVAILABILITY OF REPORTS	21
J.	OIL AND HAZARDOUS SUBSTANCE LIABILITY	21
K.	PROPERTY OR WATER RIGHTS	21
L.	SEVERABILITY.....	21
M.	TRANSFERS	22
N.	FEES	22
O.	REOPENER PROVISIONS.....	22
V.	DEFINITIONS	23

I. EFFLUENT LIMITS, MONITORING REQUIREMENTS & OTHER CONDITIONS

A. Description of Discharge Points and Mixing Zones

The authorization to discharge provided under this permit is limited to the outfalls specially designated below as the discharge locations. Discharges at any location not authorized under a MGWPCS permit is a violation of the Montana Water Quality Act and may subject the person(s) responsible for such discharge to penalties under the Act. Knowingly discharging from an unauthorized location or failing to report an unauthorized discharge within a reasonable time from first learning of an unauthorized discharge could subject such person to criminal penalties as provided under Section 75-5-632 of the Montana Water Quality Act.

Outfall Description

- 001** **Structures:** Subsurface dosed infiltration/percolation cells. Installed.
Location: Latitude: 45.63933° Longitude: -111.18276°; 673 Elk Grove Lane, Bozeman, MT 59718. S ½ NW ¼ NW ¼ Section 25, Township 02 South, Range 04 West, Lot 4, Platt J-316, Elk Grove Subdivision Phase 1, Lot 02; Gallatin County.
Mixing Zone: A modified standard (405 foot) mixing zone bearing N16°W is authorized.
- 002** **Structures:** Subsurface pressure dosed drainfields (not yet constructed).
Location: Latitude: 45.66290° Longitude: -111.18883°; Milwaukee Road, Bozeman, MT 59718. NE ¼ SE ¼ Section 14, Township 02 South, Range 04 East, Lot C-1A, PLAT D-41-V, Rainbow Subdivision; Gallatin County.
Mixing Zone: A modified standard (200 foot) mixing zone bearing N20°W is authorized.
- 002B** **Structures:** Subsurface pressure dosed drainfields (not yet constructed). Outfall 002B consists of 2 replacement areas, on the east and west side of Outfall 003.
Location 002B West: Latitude: 45.66642° Longitude: -111.194054°; 2551 Magenta Road, Bozeman 59718. N ½ SW ¼ NE ¼ Section 14, Township 02 South, Range 04 East, Lots 199 & 200, PLAT D-42, Rainbow Subdivision; Gallatin County.
Mixing Zone: A modified standard (500 foot) mixing zone bearing N3°W-N13°E is authorized.
Location 002B East: Latitude: 45.66463° Longitude: -111.19028°; 1981 Milwaukee Road, Bozeman 59718. E ½ SW ¼ NE ¼ Section 14, Township 02 South, Range 04 East, Lot 195 & 196, Plat D-42, Rainbow Subdivision; Gallatin County.
Mixing Zone: A modified standard (500 foot) mixing zone bearing N3°W-N13°E is authorized.

003 **Structures:** Subsurface Rapid Infiltration and Infiltration Percolation Basins.
Installed.
Location: Latitude: 45.66546° Longitude: -111.19148°; 1981 Milwaukee Road,
Bozeman, MT 59718. Section 14, Township 02 South, Range 04 East, Lots 193, 194,
199, 200, PLAT D-42, Rainbow Subdivision; Gallatin County.
Mixing Zone: A modified standard (500 foot) mixing zone bearing N3°W-N13°E is
authorized.

004 **Structures:** Sprinklers for spray application of effluent to the ground surface at
agronomic rates (not yet constructed). Note, although listed here for the sake of
clarity, this outfall is not regulated under this MGWPCS Permit.
Location: Latitude: 45.64199° Longitude: -111.19518°. W ½ NW ¼ NE ¼ Section
26, Township 02 South, Range 04 East, Ph. 4, Tract 1, Plat J-394 Elk Grove
Subdivision.

Treatment Works: The wastewater treatment plant (WWTP) provides Level 2 treatment
via an activated sludge process in the form of an oxidation ditch with
secondary clarification and aerobic sludge digestion. Phosphorous
removal is achieved by chemical precipitation.
The WWTP is located at Latitude: 45.64438° Longitude: -111.19043°.
Address is at 195 Elk Grove Lane, Bozeman, MT 59718. Township 02
South, Range 04 East, Lot 4, Platt J-316, Ph. 1 Elk Grove Subdivision,
Gallatin County.

B. **Effluent Limitations**

Upon the effective date of the permit and lasting until the term of the permit; the quality of
effluent discharged shall, as a minimum, meet the limitations set forth in Table 1.

Table 1

Proposed Final Effluent Limits – Outfalls 001, 002, 002B, & 003				
Outfall	Parameter	Units	Effluent Limitations	
			30-Day Average Load	Annual Maximum
001	Nitrogen, Total (as N)	lbs/day	37.9	-
	Phosphorus, Total (as P)	lbs/year	-	778
002₍₁₎	Nitrogen, Total (as N)	lbs/day	3.0	-
	Phosphorus, Total (as P)	lbs/year	-	325
002B (West Replacement Area)₍₁₎	Nitrogen, Total (as N)	lbs/day	7.7	-
	Phosphorus, Total (as P)	lbs/year	-	3869
002B (East Replacement Area)₍₁₎	Nitrogen, Total (as N)	lbs/day	18.3	-
	Phosphorus, Total (as P)	lbs/year	-	6680
003	Nitrogen, Total (as N)	lbs/day	44.4	-
	Phosphorus, Total (as P)	lbs/year	-	5228

Footnotes:

(1) Outfall 002, as listed above, is referenced in the prior 2010 Permit as Outfall 002A.
 Outfall 002B was and is a combination of the replacement areas located West and East of 003.
 At this time, Outfalls 002 and 002B are not intended to be used concurrently.

C. Effluent Monitoring and Reporting Requirements

- Samples representative of effluent quality must be collected from each unique effluent stream. The following listing is supplied for use to connect each sample location to individual waste streams and outfalls.

Table 2

Sampling and Flow Measurement Locations		
Outfall	Sample & Flow Identification	Description
Outfall 001	FM-001 flow measurements	No flow meter has been installed on the line that flows to Outfall 001. As such, flow is not measured directly. However, it is calculated using WWTP influent flow with the subtraction of Outfalls 002 and 003 effluent flow.
	EFF-001 effluent sample point	The effluent sampling port is located after the Finished Water Dose tank and on the line sending effluent to the percolation/infiltration cells.
Outfall 002 & 002B ⁽¹⁾	FM-002 flow measurements	A flow meter will be installed on the line to Outfall 002 after the RI and IP Storage and Dose tank and prior to Outfall 002 or 002B (drainfields).
	EFF-002 effluent sample point	The effluent sampling port is located after the Elk Grove WWTP UV Disinfection and after the RI and IP Storage and Dose tank and before the flow meter on the line to Outfall 002 (drainfields). Effluent to Outfalls 002 (drainfields) and 003 (RI & IP units) exits the RI and IP Storage and Dose tank in separate lines with separate flow meters.
Outfall 003	FM-003 flow measurements	The effluent sampling port is located after the Elk Grove WWTP UV Disinfection and after the RI and IP Storage and Dose tank and before the flow meter on the line to Outfall 003 (RI & IP units).
	EFF-003 effluent sample point	The effluent sampling port is located after the Elk Grove WWTP UV Disinfection and after the RI and IP Storage and Dose tank and before the flow meter on the line to Outfall 003 (RI & IP units). Effluent to Outfalls 002 (drainfields) and 003 (RI & IP units) exits the RI and IP Storage and Dose tank in separate lines with separate flow meters.
Outfall 004	FM-004 flow measurements	Located after the Elk Grove WWTP UV Disinfection and after the branch from the effluent line to Outfalls 002 (drainfields) and Outfall 003 (RI & IP units).
	EFF-004 effluent sample point	The effluent sampling port is located after the Elk Grove WWTP UV Disinfection and after the branch from the effluent line to Outfalls 002 (drainfields) and Outfall 003 (RI & IP units).

Footnotes:

Outfall 002, as listed above, is referenced in the prior 2010 Permit as Outfall 002A.
 Outfall 002B was and is a combination of the replacement areas located West and East of 003.
 At this time, Outfalls 002 and 002B are not intended to be used concurrently.

- Effluent samples must be representative of the nature of the monitored discharge. Each effluent stream that is unique (different in nature or of treatment) must be separately sampled. If an effluent stream (that is uniform in nature and treatment) is distributed to more than one outfall, a single sampling location (and ID #) can be used to characterize the waste stream.

- Effluent sampling requirements are listed in Table 3 for all of the active outfalls. The required sampling frequency is listed in Table 3 for each respective analytic parameter. The required sample type is listed in Table 3 for each respective parameter. The permittee shall report the required monitoring data to the Department at the frequency respectively listed in Table 3 for each parameter.
- Parameter analytical methods must be in accordance with the Code of Federal Regulations, Title 40, Part 136, unless specified or otherwise approved by the Department.
- Submittal of electronic discharge monitoring reports (DMRs) are required regardless of the operational status of the facility. If no discharge occurs during an individual monitoring period, it shall be stated within the DMR (for Outfalls 001, 002, 002B, 003, or 004) that no discharge or overflow occurred.
- Effluent flow rate measurements must be collected from each effluent line leading to the Outfalls 001, 002, 002B, 003, or 004. Refer to Figure 3 for the effluent sample names and flow meter measurement identification numbers.
- Effluent flow rate measurements shall be representative of the volume of the monitored discharge to include when there is no flow to a given outfall.
- Effluent flow monitoring and reporting requirements are listed in Table 3.

Table 3

Effluent Monitoring and Reporting Requirements – All Active Outfalls, Separately						
Parameter /Method	Monitor Location	Units	Sample Type	Minimum Sample Frequency	Reporting Requirements	Report Frequ.
Flow Rate, Effluent	FM-001 through FM-004	Gallons /day	Contin-uous	Contin-uous	Daily Maximum 30 Day Average Quarterly Average	Monthly
<i>Escherichia coli</i> Bacteria	EFF-001 through EFF-004	CFU/100mL	Grab	Monthly	Daily Maximum Quarterly Average	Monthly
Total Suspended Solids (TSS)		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Biological Oxygen Demand		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Chloride		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Nitrogen, Nitrite + Nitrate (as N)		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Nitrogen, Total Ammonia (as N)		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Nitrogen, Total Kjeldahl (TKN)(as N)		mg/L	Composite	Monthly	Daily Maximum Quarterly Average	Monthly
Nitrogen, Total (as N)		mg/L	Calculate	Monthly	Daily Maximum Quarterly Average	Monthly
		lbs/day	Calculate	Monthly	Daily Maximum Quarterly Average	Monthly
Phosphorus, Total (as P)		mg/L	Grab	Monthly	Quarterly Average	Monthly
	lbs/day	Calculate	Monthly	Quarterly Average	Monthly	
	lbs/year	Calculate	1/Year	Annual Maximum	Annually	

D. Ground Water Compliance Limit – For Monitoring Wells

Ground water monitoring will be required as a condition of this permit. Ground water limits are described in Table 4 below. Monitoring requirements are summarized in Table 5.

Table 4

Ground Water Limits – For Monitoring Wells		
Parameter	Units	Ground Water Standard in Monitoring Wells 30-Day Average
Nitrogen, Total (as N)	lbs/day	7.5
<i>Escherichia coli</i> Bacteria	CFU /100 mL	<1

Footnotes:
 These limits establish the maximum allowable changes in ground water quality. They are also limiting discharges to ground water, ARM 17.30.1005(1); Circular DEQ-7 (2012), Footnote 16; and ARM 17.30.715(1)(d). Effluent discharge limits are detailed in Table 3.
 See definition in Part V of permit.

At minimum, monitoring will be conducted at wells representing ground water in up-gradient and down-gradient locations relative to each active outfall. If a ground water limit for a parameter listed in Table 4 is exceeded, the permittee shall resample the well(s) within 72 hours of receiving both the initial result and the confirming results. Based on the results, DEQ may direct the permittee to implement one or more of the following contingency measures:

- In coordination with DEQ, review water quality trends, discharge data, and other site activities to identify the probable cause and extent of the water quality changes.
- Increase the efficiency of wastewater treatment to lower concentrations of the parameters that exceeded the ground water limits.
- Increase the amount or effluent and/or ground water monitoring.
- Installation of additional monitoring wells.
- Prohibit additional connections to the waste water system until the cause of the exceedences has been determined, remediation measures taken, and measures implemented to prevent a reoccurrence.
- Supply drinking water to residences, businesses, and any other affected ground water users.
- Implement other measures as determined by DEQ which may include invoking provisions set forth in Part IV.O. of this permit.

The above limits and contingency measures are carried over from the 2010 DEQ MGWPCS Permit without change.

E. Special Conditions – Ground Water Monitoring and Reporting Requirements

1. Up-gradient and down-gradient monitoring wells are required to be installed or designated to monitor ambient and downgradient shallow ground water for all active outfalls.
2. All of the above monitoring wells must be individually sampled at the frequency and with the type of measurement respectively listed in Table 5. Samples shall include, but not be limited to, the respective parameters listed in Table 5 for each listed monitoring well. The reporting requirements and reporting frequencies for each individual monitoring well are listed in Table 5.
3. Parameter analytical methods must be in accordance with the Code of Federal Regulations, Title 40, Part 136, unless specified or otherwise approved by the Department.
4. The permittee shall document the methodology and equipment used to sample monitoring wells during all sampling events. Self monitoring records shall be maintained in accordance with Part II.H. of this permit.
5. Submittal of electronic discharge monitoring reports (DMRs) are required, regardless of the operational status of the facility or of each individual monitoring well. For monitoring wells designated for an inactive outfall, the permittee is not required to sample those wells and is allowed to mark or state “No Discharge” for the monitoring wells’ DMR. Sampling of monitoring wells around a particular outfall is required to begin in the quarter preceding when the outfall goes into service.
6. If any of the monitoring wells are abandoned, destroyed, decommissioned or non-viable; or are no longer able to be sampled due to fluctuations in the ground water table; the permittee shall install (or rehab) a new well to replace the abandoned, destroyed, decommissioned, or non-viable well(s).

Table 5

Ground Water Monitoring and Reporting Requirements (For Monitoring Wells)						
Parameter /Method	Monitor Location⁽¹⁾	Units	Sample Type⁽²⁾	Minimum Sampling Frequency	Reporting Requirements⁽³⁾	Reporting Frequency
<i>Escherichia coli</i> Bacteria	MW-2, MW-2A, MW-2B, MW-4, MW-4A, & MW-4C	CFU /100ml	Grab	1/Quarter	Daily Maximum Quarterly Average	Quarterly
Chloride (as Cl)		mg/L	Grab	1/Quarter	Daily Maximum Quarterly Average	Quarterly
Nitrogen, Total (as N)(6)		mg/L	Grab	1/Quarter	Daily Maximum Quarterly Average	Quarterly
Nitrate, (as N)		mg/L	Grab	1/Quarter	Daily Maximum Quarterly Average	Quarterly
Specific Conductivity @ 25°C		µS/cm	Grab	1/Quarter	Daily Maximum Quarterly Average	Quarterly
Static Water Level (SWL)		ft-bmp	Instantaneous	1/Quarter	Daily Maximum Quarterly Average	Quarterly

Footnotes:

The monitoring wells present and being sampled at the site are listed above. If additional monitoring wells are installed, they shall be monitored according to the above requirements.

Prior to bringing any of the 'permitted' Outfalls online, the permittee is required to begin shallow groundwater sampling from monitoring wells up-gradient from the mixing zone and at the end of mixing zone. Use of the Outfall is prohibited if these monitoring wells have not yet been installed and sampled. That sampling will occur in the quarter preceding the quarter in which discharge to the Outfall begins.

If any given Outfall has not been installed or is not operational (e.g., Outfalls 002, 002B, and 004), sampling of the above mentioned monitoring wells is unnecessary. If no sampling takes place at a particular well for the above reasons (the outfall is not in service), the permittee shall mark the monitoring well DMR form with "no discharge". Monitoring for the above mentioned monitoring wells shall commence in the quarter prior to the quarter in which the Outfall begins service.

(1) Refer to Figures 3, 4, and 5 of the 2017 DEQ Fact Sheet for the location of existing monitoring wells and the Outfalls that they are monitoring.

F. Special Conditions – Other

In accordance with ARM 17.30.1031 this section contains the basis for special permit conditions that are necessary to assure compliance with the ground water quality standards and the Montana Water Quality Act. The following special conditions will be included in the permit.

1. Monitoring Wells. Monitoring wells are installed in areas to characterize aquifers and ground water in the vicinity of each permitted outfall and mixing zone, as well as in the vicinity of the spray irrigation disposal site. The wells are generally located in both Up- and Down-gradient locations. Locations of the existing monitoring wells

are depicted on Figures 3, 4, and 6 of the 2017 DEQ Fact Sheet. These wells are designed to provide water quality data to ensure permit compliance and to provide protection of downgradient drinking water sources.

- a. Monitoring wells shall be installed or designated to monitor the mixing zones for any active outfalls that go into service.
- b. The design and installation of any new wells should conform to past installations.
- c. Sampling
 1. The sampling schedule and analytic parameters should conform to those listed in Table 5.

2. Effluent Monitoring. Ongoing monitoring of effluent quality will ensure permit compliance.

- a. Effluent monitoring locations should be sufficient to characterize each effluent stream from the WWTP.
 1. Where appropriate, utilize the naming (sample locations identification) provided in this document (Table 2).
 2. Maps and descriptions of monitoring locations should be provided to DEQ as they are identified by the permittee and the related outfalls come on-line.
- b. Flow Monitoring Locations should be identified (and flow meters installed) for each effluent line to an active outfall. Flow meters may not need to be installed on the effluent lines to an outfall when that outfall is not in service.
 1. Utilize the naming (Flow Monitoring identification) provided in this document (Table 2).

3. Progress Reporting: Submit a letter report to DEQ at the end of each calendar year summarizing the progress made on the work planned or completed on the monitoring wells and any changes or upgrades to the WWTP. This reporting is intended to address the monitoring wells and effluent monitoring discussed above.

G. Compliance Schedule

Table 5:

Compliance Schedule			
Action	Freq.	Scheduled Completion Date of Action⁽¹⁾	Scheduled Report Due Date.
Install or designate appropriate monitoring wells up-gradient and down gradient from any of the outfalls that don't currently have monitoring wells (e.g., Outfalls 002 or 002B).	Single events	Well installation shall occur during the quarter preceding the initial ground water sampling event. That sampling will occur the quarter prior to the quarter that the monitored outfall goes into service.	Letter report to DEQ is due before the end of the quarter following the completion date. Includes mapped locations and well logs.
Begin quarterly sampling of monitoring wells located up-gradient and down-gradient from any outfall that will be put into service.	Quarterly sampling	Sampling of the wells to commence the quarter preceding the quarter that any outfall is put into service. Ongoing quarterly sampling continues while the outfall is receiving effluent.	Submit analytic data to NetDMR prior to the beginning of the quarter following the sampling event.
Effluent sampling will be conducted for each unique waste stream if it differs in source, nature, or degree of treatment.	Quarterly sampling	Ongoing for all unique active waste streams going to outfalls.	Submit analytic data to NetDMR prior to the beginning of the quarter following the sampling event. Includes an initial letter report to DEQ with mapped locations of sampling sites. Sampling Location IDs are provided in Table 2 of this permit and in the NetDMR.
Install effluent flow monitoring devices on the lines for each of the permitted active outfalls. Revise and submit the Wastewater Line Diagram reflecting flow meter locations to reflect the new flow monitoring sites. The plan can be updated or revised as needed. Flow measurement locations and identifiers are provided within Table 2 and the NetDMR program.	Single events followed by Quarterly Measurements of flow on lines to active outfalls	Installation (and testing) of flow meters should occur before regular discharge to a particular outfall occurs.	Submit flow data to NetDMR prior to the beginning of the quarter following the metering period. Includes letter report with mapped locations of metering devices. Flow Monitoring IDs are provided in the NetDMR.
Submit letter report to DEQ summarizing progress made on work planned or completed on Outfall construction and monitoring well installation.	Yearly	At the end of each year	Before the end of the 1st quarter of the following year.

II. MONITORING, RECORDING AND REPORTING REQUIREMENTS

A. Representative Sampling

Samples taken in compliance with the monitoring requirements established under Part I of the permit shall be collected from the effluent stream prior to discharge into the receiving waters. Samples and measurements shall be representative of the volume and nature of the monitored discharge.

B. Monitoring Procedures

Monitoring must be conducted according to test procedures approved under Part 136, Title 40 of the Code of Federal Regulations, unless other test procedures have been specified in this permit. All flow-measuring and flow-recording devices used in obtaining the data submitted in self-monitoring reports must indicate values within 10 percent of the actual flow being measured.

C. Penalties for Tampering

The Montana Water Quality Act provides that any person who falsifies, tampers with, or knowingly renders inaccurate, any monitoring device or method required to be maintained under this permit shall, upon conviction, be punished by a fine of not more than \$25,000, or by imprisonment for not more than six months, or by both.

D. Reporting

Monitoring results must be reported within a Discharge Monitoring Report (DMR). Monitoring results must be submitted electronically (NetDMR web-based application) no later than the 28th day of the month following the end of the monitoring period. If no discharge occurs during the entire reporting period, "No Discharge" must be reported within the respective DMR. Monitoring reports must be electronically signed and certified in accordance with Part IV.G. "Signatory Requirements" of this permit.

All other reports (e.g. special conditions, compliance actions) must be submitted no later than the 28th day of the month following the completion due date, unless otherwise specified. All reports required herein, must be signed and certified in accordance with Part IV.G. "Signatory Requirements" of this permit and submitted to DEQ at the following address:

Montana Department of Environmental Quality
Water Protection Bureau
PO Box 200901
Helena, Montana 59620-0901

E. Compliance Schedules

Reports of compliance or noncompliance with, or any progress reports on interim and final requirements contained in any Compliance Schedule of this permit shall be

submitted to the Department in either electronic or paper format and be postmarked no later than 14 days following each schedule date unless otherwise specified in this permit.

F. Additional Monitoring by the Permittee

If the permittee monitors any additional parameters or any parameter more frequently than required by this permit using approved analytical methods as specified in this permit, the results of this monitoring shall be included in the analysis and reporting of the data submitted in the Discharge Monitoring Report. Such increased frequency shall also be indicated.

G. Records Contents

Records of monitoring information shall include:

1. The date, exact place, and time of sampling or measurements;
2. The initials or name(s) of the individual(s) who performed the sampling or measurements;
3. The date(s) analyses were performed;
4. The time analyses were initiated;
5. The initials or name(s) of individual(s) who performed the analyses;
6. References and written procedures, when available, for the analytical techniques or methods used; and
7. The results of such analyses, including the bench sheets, instrument readouts, computer disks or tapes, etc., used to determine these results.

H. Retention of Records

The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least three years from the date of the sample, measurement, report, or application. This period may be extended by the request of the Department at any time. Data collected on site, copies of Discharge Monitoring Reports, and a copy of this MGWPCS permit must be maintained on site during the duration of activity at the permitted location.

I. Twenty-four Hour Notice of Noncompliance Reporting

1. The permittee shall report any serious incidents of noncompliance affecting the environment as soon as possible, but no later than twenty-four (24) hours from the time the permittee first became aware of the circumstances. The report shall be made to the Water Protection Bureau at (406) 444-3080 or the Office of Disaster

and Emergency Services at (406) 324-4777. The following examples are considered serious incidents:

- a. Any noncompliance which may seriously endanger health or the environment;
or
 - b. Any unanticipated bypass which exceeds any effluent limitation in the permit (See Part III.G. of this permit, "Bypass of Treatment Facilities").
2. A written submission shall also be provided within five days of the time that the permittee becomes aware of the circumstances. The written submission shall contain:
 - a. A description of the noncompliance and its cause;
 - b. The period of noncompliance, including exact dates and times;
 - c. The estimated time noncompliance is expected to continue if it has not been corrected; and
 - d. Steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.
 3. The Department may waive the written report on a case-by-case basis if the oral report has been received within 24 hours by the Water Protection Bureau, by phone, at (406) 444-3080.
 4. Reports shall be submitted to the addresses in Part II.D. of this permit, "Reporting of Monitoring Results."

J. Other Noncompliance Reporting

Instances of noncompliance not required to be reported within 24 hours shall be reported at the time that monitoring reports for Part II.D. of this permit are submitted. The reports shall contain the information listed in Part II.I.2. of this permit.

K. Inspection and Entry

The permittee shall allow the head of the Department, the Director, or an authorized representative thereof, upon the presentation of credentials and other documents as may be required by law, to:

1. Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records must be kept under the conditions of this permit;
2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;

3. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this permit; and
4. Sample or monitor at reasonable times, for the purpose of assuring permit compliance, any substances or parameters at any location.

III. COMPLIANCE RESPONSIBILITIES

A. Duty to Comply

The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the Montana Water Quality Act and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. The permittee shall give the Department advance notice of any planned changes at the permitted facility or of an activity which may result in permit noncompliance.

B. Penalties for Violations of Permit Conditions

The Montana Water Quality Act provides that any person who violates a permit condition of the Act is subject to civil or criminal penalties not to exceed \$25,000 per day or one year in prison, or both, for the first conviction, and \$50,000 per day of violation or by imprisonment for not more than two years, or both, for subsequent convictions. MCA 75-5-611(9)(a) also provides for administrative penalties not to exceed \$10,000 for each day of violation and up to a maximum not to exceed \$100,000 for any related series of violations. Except as provided in Part III.G. of this permit, "Bypass of Treatment Facilities," nothing in this permit shall be construed to relieve the permittee of the civil or criminal penalties for noncompliance.

C. Need to Halt or Reduce Activity not a Defense

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

D. Duty to Mitigate

The permittee shall take all reasonable steps to minimize or prevent any discharge in violation of this permit which has a reasonable likelihood of adversely affecting human health or the environment.

E. Proper Operation and Maintenance

The permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality

assurance procedures. This provision requires the operation of back-up or auxiliary facilities or similar systems which are installed by a permittee only when the operation is necessary to achieve compliance with the conditions of the permit. However, the permittee shall operate, as a minimum, one complete set of each main line unit treatment process whether or not this process is needed to achieve permit effluent compliance.

F. Removed Substances

Collected screenings, grit, solids, sludge, or other pollutants removed in the course of treatment shall be disposed of in such a manner so as to prevent any pollutant from entering any waters of the state or creating a health hazard.

G. Bypass of Treatment Facilities

1. Bypass not exceeding limitations. The permittee may allow any bypass to occur which does not cause effluent limitations to be exceeded, but only if it also is for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions of Parts III.G.2. and III.G.3. of this permit.
2. Notice:
 - a. Anticipated bypass. If the permittee knows in advance of the need for a bypass, it shall submit prior notice, if possible, at least 10 days before the date of the bypass.
 - b. Unanticipated bypass. The permittee shall submit notice of an unanticipated bypass as required under Part II.I. of this permit, "Twenty-four Hour Reporting."
3. Prohibition of bypass:
 - a. Bypass is prohibited and the Department may take enforcement action against a permittee for a bypass, unless:
 - 1) The bypass was unavoidable to prevent loss of life, personal injury, or severe property damage;
 - 2) There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance; and
 - 3) The permittee submitted notices as required under Part III.G.2. of this permit.

- b. The Department may approve an anticipated bypass, after considering its adverse effects, if the Department determines that it will meet the three conditions listed above in Part III.G.3.a. of this permit.

IV. GENERAL REQUIREMENTS

A. Planned Changes

The permittee shall give notice to the Department as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required only when:

1. The alteration or addition could significantly change the nature or increase the quantity of pollutant discharged. This notification applies to pollutants which are not subject to effluent limitations in the permit; or
2. There are any planned substantial changes to the existing sewage sludge management practices of storage and disposal. The permittee shall give the Department notice of any planned changes at least 180 days prior to their implementation.

B. Anticipated Noncompliance

The permittee shall give advance notice to the Department of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements.

C. Permit Actions

This permit may be revoked, modified and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance, does not stay any permit condition.

D. Duty to Reapply

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee must apply for and obtain a new permit. The application must be submitted at least 180 days before the expiration date of this permit.

E. Duty to Provide Information

The permittee shall furnish to the Department, within a reasonable time, any information which the Department may request to determine whether cause exists for revoking, modifying and reissuing, or terminating this permit, or to determine compliance with this permit. The permittee shall also furnish to the Department, upon request, copies of records required to be kept by this permit.

F. Other Information

When the permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or any report to the Department, it shall promptly submit such facts or information with a narrative explanation of the circumstances of the omission or incorrect submittal and why they weren't supplied earlier.

G. Signatory Requirements

All applications, reports or information submitted to the Department shall be signed and certified.

1. All permit applications shall be signed as follows:
 - a. For a corporation: by a responsible corporate officer:
 - b. For a partnership or sole proprietorship: by a general partner or the proprietor, respectively; or
 - c. For a municipality, State, Federal, or other public agency: by either a principal executive officer or ranking elected official.
2. All reports required by the permit and other information requested by the Department shall be signed by a person described above or by a duly authorized representative of that person. A person is considered a duly authorized representative only if:
 - a. The authorization is made in writing by a person described above and submitted to the Department; and
 - b. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility, such as the position of plant manager, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters (a duly authorized representative may thus be either a named individual or an individual occupying a named position).
3. Changes to authorization. If an authorization under Part IV.G.2. of this permit is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of Part IV.G.2. of this permit must be submitted to the Department prior to or together with any reports, information, or applications to be signed by an authorized representative.
4. Certification. Any person signing a document under this section shall make the following certification:

“I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.”

H. Penalties for Falsification of Reports

The Montana Water Quality Act provides that any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance or noncompliance shall, upon conviction be punished by a fine of not more than \$25,000 per violation, or by imprisonment for not more than six months per violation, or by both.

I. Availability of Reports

All reports prepared in accordance with the terms of this permit shall be available for public inspection at the offices of the Department and the EPA. Permit applications, permits and effluent data shall not be considered confidential and shall also be available for public inspection.

J. Oil and Hazardous Substance Liability

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities, liabilities, or penalties to which the permittee is or may be subject under Section 311 of the Clean Water Act.

K. Property or Water Rights

The issuance of this permit does not convey any property or water rights of any sort, or any exclusive privileges, nor does it authorize any injury to private property, any invasion of personal rights, or any infringement of federal, state or local laws or regulations.

L. Severability

The provisions of this permit are severable, and if any provision of this permit, or the application of any provision of this permit to any circumstance, is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby.

M. Transfers

This permit may be automatically transferred to a new permittee if:

1. The current permittee notifies the Department at least 30 days in advance of the proposed transfer date;
2. The notice includes a written agreement between the existing and new permittees containing a specific date for transfer of permit responsibility, coverage, and liability between them;
3. The Department does not notify the existing permittee and the proposed new permittee of the intent to revoke or modify and reissue the permit. If this notice is not received, the transfer is effective on the date specified in the agreement mentioned in Part IV.M.2. of this permit; and
4. Required annual and application fees have been paid.

N. Fees

The permittee is required to submit payment of an annual fee as set forth in ARM 17.30.201. If the permittee fails to pay the annual fee within 90 days after the due date for the payment, the Department may:

1. Impose additional fee assessment(s) computed at the rates established under ARM 17.30.201; and
2. Suspend the processing of the application for a permit or authorization or, if the nonpayment involves an annual permit fee, suspend the permit, certificate or authorization for which the fee is required. The Department may lift suspension at any time up to one year after the suspension occurs if the holder has paid all outstanding fees, including all penalties, assessments and interest imposed under this sub-section. Suspensions are limited to one year, after which the permit will be terminated.

O. Reopener Provisions

This permit may be reopened and modified (following proper administrative procedures) to include the appropriate effluent limitations (and compliance schedule, if necessary), or other appropriate requirements if one or more of the following events occurs:

1. Water Quality Limits: The water quality standards of the receiving water(s) to which the permittee discharges are modified in such a manner as to require different effluent limits than contained in this permit; or
2. Water Quality Limits are Exceeded: If it is found that water quality standards or trigger values, excluding mixing zones designated by ARM 17.30.501-518, for

parameters included in the permit or others, the department may modify the effluent limits or water management plan.

V. DEFINITIONS

1. **“30-day (and Monthly) Average”** other than for *E. coli* bacteria, means the arithmetic average of all individual daily discharge measurements during a consecutive 30-day period or calendar month, whichever is applicable (see Daily Discharge). Geometric means shall be calculated for the *E. coli* bacteria parameter.
2. **“90-day (and Quarterly) Average”** other than for *E. coli* bacteria, means the arithmetic average of all individual daily discharge measurements during a consecutive 90-day period or calendar quarter, whichever is applicable (see Daily Discharge). Geometric means shall be calculated for the *E. coli* bacteria parameter.
3. **“180-day (and Six-Month or Semi-Annual) Average”** other than for *E. coli* bacteria, means the arithmetic average of all individual daily discharge measurements collected during a consecutive 180-day period or calendar half-year, whichever is applicable (see Daily Discharge). Geometric means shall be calculated for the *E. coli* bacteria parameter.
4. **"Act"** means the Montana Water Quality Act, Title 75, chapter 5, MCA.
5. **“Annual Average Load”** means the arithmetic mean of all 30-day (or calendar month) or 90-day (or calendar quarter) average loads reported during the calendar year for a monitored parameter.
6. **“Annual Maximum Load”** means the arithmetic mean of all calculated individual daily average loads (lbs/day) recorded during the calendar year, multiplied by 365 (days/year) for a monitored parameter.
7. **“Annual Maximum Limit”** means the maximum allowable discharge of a parameter during a calendar year (or defined 365 day period).
8. **"Best management practices" ("BMPs")** means schedules of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the pollution of state waters. BMPs also include treatment requirements, operating procedures, and practices to control plant site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage.
9. **“BOD₅”** means the five-day measure of the biochemical oxygen demand parameter.
10. **“Bypass”** means the intentional diversion of waste streams from any portion of a treatment facility.

11. **“Composite Sample”** means a sample that consists of two or more discrete aliquots. Composite samples shall be flow proportioned. The composite sample shall, as a minimum, contain at least four (4) samples collected over the compositing period. Unless otherwise specified, the time between the collection of the first sample and the last sample shall not be less than six (6) hours nor more than 24 hours. Acceptable methods for preparation of composite samples are as follows:
 - a. Constant time interval between samples, sample volume proportional to flow rate at time of sampling;
 - b. Constant time interval between samples, sample volume proportional to total flow (volume) since last sample. For the first sample, the flow rate at the time the sample was collected may be used;
 - c. Constant sample volume, time interval between samples proportional to flow (i.e. sample taken every “X” gallons of flow); and,
 - d. Continuous collection of sample, with sample collection rate proportional to flow rate.
12. **“CFR”** means Code of Federal Regulations.
13. **“CFU”** means Colony Forming Units.
14. **“Continuous”** means a measurement occurring without interruption throughout the operating hours of the facility, except for infrequent shutdowns for maintenance process changes, or other similar activities.
15. **“Daily Discharge”** means the discharge of a parameter (or pollutant) measured during a calendar day (or any 24-hour period that reasonably represents the calendar day for purposes of sampling). For parameters with limitations expressed in units of mass, the daily discharge is calculated as the total mass of the parameter discharged over the day. For parameters with limitations expressed in other units of measurement, the daily discharge is calculated as the arithmetic average of all measurements (or samples) collected over the day.
16. **“Daily Maximum”** means the highest individual measured daily value occurring in a defined reporting period (see Daily Discharge).
17. **“Daily Maximum Limit”** means the maximum allowable discharge of a parameter for any calendar day (see Daily Discharge).
18. **“DEQ”** means the Montana Department of Environmental Quality.

19. **“Department”** means the Montana Department of Environmental Quality.
20. **“Discharge”** means the injection, deposit, dumping, spilling, leaking, placing, or failing to remove any pollutant so that it or any constituent thereof may enter into state waters, including ground water.
21. **“Grab Sample”** means a sample which is taken from a waste stream on a one-time basis without consideration of flow rate of the effluent or without consideration for time.
22. **“Instantaneous”** means a single reading, observation, or measurement.
23. **“Load Limits”** are mass-based discharge limits expressed in units such as lbs/day.
24. **“Mixing Zone”** means a limited area of a surface water body or ground water bearing zone where initial dilution of a discharge takes place and where certain water quality standards may be exceeded.
25. **“Nondegradation”** means the prevention of a significant change in water quality that lowers the quality of high quality water for one or more parameters. Also, the prohibition of any increase in discharge that exceeds the design capacity or limitations established under or determined from a permit or approval issued by the Department prior to April 29, 1993.
26. **“RRV”** means Required Reporting Values (DEQ Circular 7).
27. **“Severe Property Damage”** means substantial physical damage to property, damage to the treatment facilities which causes them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production.
28. **“TSS”** means the total suspended solids parameter.
29. **“Total Inorganic Nitrogen (TIN)”** means the arithmetic sum of Nitrate + Nitrite and Ammonia.
30. **“Total Nitrogen (TN)”** means the arithmetic sum of Nitrate + Nitrite and Total Kjeldahl Nitrogen.