PERMIT NO. M0G140000

STATE OF MICHIGAN DEPARTMENT OF ENVIRONMENT, GREAT LAKES, AND ENERGY

BALLAST WATER CONTROL GENERAL PERMIT PORT OPERATIONS AND BALLAST WATER DISCHARGES

In compliance with the provisions of Part 31, Water Resources Protection, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (NREPA); and Michigan Executive Orders 1991-31, 1995-4, 1995-18, and 2019-06, oceangoing vessels that discharge ballast water and oceangoing vessels that do not discharge ballast water are authorized as specified in individual certificates of coverage (COC) in accordance with discharge limitations, monitoring requirements, and other conditions set forth in this general permit (permit).

The applicability of this permit shall be limited to the following: a) oceangoing vessels that engage in port operations in Michigan and do not discharge ballast water into waters of the state; b) oceangoing vessels that discharge ballast water treated by one (1) or more of the ballast water treatment methods authorized under this permit; or c) oceangoing vessels that have not otherwise been determined by the Michigan Department of Environment, Great Lakes, and Energy (Department) to need an individual permit.

The following ballast water treatment methods are authorized under this permit:

- 1. Hypochlorite Treatment.
- 2. Chlorine Dioxide Treatment.
- 3. Ultraviolet Light Radiation Treatment Preceded by Suspended Solids Removal.
- 4. Deoxygenation Treatment.
- 5. Other United States Coast Guard (USCG) Approved Treatment Technologies.

The Department has determined that these ballast water treatment methods have the highest success rates among available treatment methods for destroying aquatic invasive species and protecting the diversity and abundance of native species and maintaining ecological stability of the waters of the state, or activities dependent on such waters. A ballast water discharge is authorized by this permit only if the discharge is compliant with all applicable treatment requirements and other conditions specified in the individual COC and set forth in this permit. This permit does not authorize the discharge of aquatic invasive species at levels which are injurious to the designated uses of the waters of the state, or which constitute a threat to the public health, safety, or welfare. Discharges which may cause or contribute to a violation of a water quality standard are not authorized by this permit.

In order to constitute a valid authorization to discharge, this permit must be complemented by a COC issued by the Department.

Unless specified otherwise, all contact with the Department necessitated by this permit shall be initiated as specified in the COC.

This permit takes effect on January 1, 2022. The provisions of this permit are severable. After notice and opportunity for a hearing, this permit may be modified, suspended or revoked in whole or in part during its term in accordance with applicable laws and rules.

This permit shall expire at midnight, **January 1, 2027**.

Issued: December 30, 2021.

Original signed by Christine Alexander
Christine Alexander, Manager
Permits Section
Water Resources Division

PERMIT FEE REQUIREMENTS

In accordance with Section 324.3120 of the NREPA, the permittee shall make payment of an annual permit fee to the Department for each October 1 the permit is in effect regardless of occurrence of discharge. The permittee shall submit the fee in response to the Department's annual notice. Payment may be made electronically via the Department's MiWaters system. The MiWaters website is located at https://mienviro.michigan.gov/ncore/external/home. Payment shall be submitted or postmarked by January 15 for notices mailed by December 1. Payment shall be submitted or postmarked no later than 45 days after receiving the notice for notices mailed after December 1.

APPLICATION FOR INDIVIDUAL PERMIT

Owners/Operators of oceangoing vessels proposing ballast water treatment methods not authorized under this permit shall apply for an individual permit. Applicants for individual permits shall demonstrate to the Department that the proposed ballast water treatment method is environmentally sound and its treatment effectiveness is equal to or better at preventing the discharge of aquatic invasive species as the treatment methods authorized under this permit. In accordance with R 323.2119 of the Michigan Administrative Code, all draft individual permits shall be public noticed for 30 days.

CONTESTED CASE INFORMATION

Any person who is aggrieved by this permit may file a sworn petition with the Michigan Administrative Hearing System within the Michigan Department of Licensing and Regulatory Affairs, c/o the Michigan Department of Environment, Great Lakes, and Energy, setting forth the conditions of the permit which are being challenged and specifying the grounds for the challenge. The Department of Licensing and Regulatory Affairs may reject any petition filed more than 60 days after issuance as being untimely.

PART I

Section A. Limitations and Monitoring Requirements

1. Conditions and Limitations for Using Hypochlorite Treatment

During the period beginning on the effective date of this permit and the effective date of an individual COC, and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan and discharge hypochlorite-treated ballast water to waters of the state. Such discharge shall be limited and monitored by the permittee and subject to the conditions specified below.

a. Discharge Limitations and Reporting

Parameter	Maximum Quantity and Limit	Maximum Individual Sample	Units	Monitoring Frequency	Sample Type
Flow	Report		MG	Daily	Report Total Discharge Flow
TRC Discharge Concentration Total Residual Chlorine (TRC) – Continuous (TRC discharge exceeding 160 minutes)	38		Micrograms per liter (ug/l)	See g. below	Grab
Discharge Duration Total Residual Chlorine (TRC) – Continuous (TRC discharge exceeding 160 minutes)	Report		minutes	Daily	Report Total Discharge Duration
TRC Discharge Concentration Total Residual Chlorine (TRC) – Intermittent (TRC discharge less than or equal to 160 minutes)	200	300	ug/l	See g. below	Grab
Discharge Duration Total Residual Chlorine (TRC) – Intermittent (TRC discharge less than or equal to 160 minutes)	160		minutes	Daily	Report Total Discharge Duration

b. Hypochlorite Dosage and Monitoring Requirements

Ballast water shall be dosed with hypochlorite to a level of 10 milligrams per liter (mg/L) total available chlorine after meeting the chlorine demand of the ballast water. The ballast water, dosed to a level of 10 mg/L total available chlorine, shall be injected in a manner to achieve adequate mixing, and held in the ballast tanks a minimum of 19 hours prior to discharge. An acceptable method for ensuring adequate mixing is application of hypochlorite to all flow entering the ballast tanks. The Department may approve other hypochlorite dosages and contact times if the applicant demonstrates the chlorine demand of the ballast water sediment will not be a significant factor.

To ensure the ballast water contained in each ballast tank is dosed to 10 mg/L total available chlorine, the permittee shall monitor ballast water total available chlorine concentrations in each ballast tank to be discharged. The 19-hour exposure time shall not begin until all ballast water to be discharged reaches the required total available chlorine level of 10 mg/L in each ballast tank. Total available chlorine concentrations shall be monitored and analyzed in accordance with Part II.B.2. of this permit.

The required dose level of 10 mg/L total available chlorine is based on a ballast water sediment concentration of 1000 mg/L or less. If the intake ballast water sediment concentration exceeds 1000 mg/L, the permittee shall ensure the intake ballast water sediment concentration is at or below 1000 mg/L before dosing the ballast water to a level of 10 mg/L total available chlorine. This can be accomplished with mechanical filtration of the ballast water intake.

PARTI

Section A. Limitations and Monitoring Requirements

c. Treatment Performance Monitoring

Treatment performance monitoring shall be conducted to ensure proper operation and maintenance of the treatment system. At a minimum, treatment performance monitoring locations shall be established prior to the first treatment stage and immediately after final treatment.

d. Discharge Monitoring

Samples, measurements, and observations taken in compliance with the discharge monitoring requirements set forth herein shall be taken of the treated discharge prior to mixing with waters of the state.

e. Narrative Standard

The receiving water shall contain no turbidity, color, oil films, floating solids, foams, settleable solids, suspended solids, or deposits as a result of this discharge in unnatural quantities which are or may become injurious to any designated use.

f. Intake Filtration Residuals and Separated Solids

In the event intake ballast water is pretreated using mechanical separation methods, the permittee is authorized to discharge ballast water intake filter backwash into waters of the state provided the discharge is in accordance with e. above.

g. Total Residual Chlorine Requirements

Total Residual Chlorine (TRC) shall be analyzed in accordance with Part II.B.2. of this permit. TRC monitoring is required during each chlorine discharge event. Limitations for the intermittent discharge of chlorine apply only when the discharge of chlorine is less than or equal to 160 minutes per discharge event; otherwise, the limitations for continuous discharge of chlorine apply.

During the intermittent discharge of chlorine, the daily maximum concentration value reported for TRC shall be the average of a minimum of three (3) equally spaced grab samples taken during the chlorine discharge event. Additionally, no individual TRC sample result may exceed 300 ug/l.

During the continuous discharge of chlorine, a minimum of one (1) TRC grab sample shall be taken during the chlorine discharge event.

The permittee may use a dechlorinating reagent as a water treatment additive, including but not limited to sodium thiosulfate, sodium bisulfite, and sodium sulfite, to achieve applicable TRC limitations. The quantity of the reagent(s) used shall be limited to 0.6 times the stoichiometric amount of TRC for sodium thiosulfate, 1.5 times the stoichiometric amount of TRC for sodium bisulfite, and 1.8 times the stoichiometric amount of TRC for sodium sulfite. TRC samples taken to determine the amount of each reagent to add shall be taken prior to dechlorination.

h. Treatment and Operations Record Keeping

The permittee shall maintain a Ballast Treatment Record (BTR) on all treatment operations for ballast water discharges into Michigan waters. The BTR shall be submitted to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) using the Port Operations Notification Report form within 24 hours of port departure and shall include the following information:

- 1) source(s) of ballast water treated (port name or other location);
- volume and concentration of hypochlorite used for treatment to achieve 10 mg/L available chlorine in the ballast water;
- 3) hypochlorite contact time (hours) in the ballast water;
- volume of ballast water treated and amount discharged;

- 5) amount and type of dechlorination reagent used (report zero if no dechlorination reagent is needed);
- 6) date and location of ballast water discharge event; and
- 7) results of discharge monitoring required in a. above.

PART I

Section A. Limitations and Monitoring Requirements

2. Conditions and Limitations for Using Chlorine Dioxide Treatment

During the period beginning on the effective date of this permit and the effective date of an individual COC, and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan and discharge chlorine dioxide-treated ballast water to waters of the state. Such discharge shall be limited and monitored by the permittee and subject to the conditions as specified below.

a. Discharge Limitations and Reporting

Parameter	Maximum Quantity and Limit	Units	Monitoring Frequency	Sample Type
Flow	Report	MG	Daily	Report Total Discharge Flow
Chlorite	13	ug/l	Daily	3-Portion Composite
Discharge Duration	Report	minutes	Daily	Report Total Discharge Duration

b. Chlorine Dioxide Dosage and Monitoring Requirements

Ballast water shall be dosed with chlorine dioxide to a level of 5 mg/L chlorine dioxide. Chlorine dioxide concentrations shall be monitored and analyzed in accordance with Part II.B.2. of this permit. Chlorine dioxide treated ballast water shall be injected in a manner to achieve adequate mixing and held in the ballast tanks a minimum of 24 hours prior to discharge. An acceptable method for ensuring adequate mixing is application of chlorine dioxide to all flow entering the ballast tanks.

c. Treatment Performance Monitoring

Treatment performance monitoring shall be conducted to ensure proper operation and maintenance of the treatment system. At a minimum, treatment performance monitoring locations shall be established prior to the first treatment stage and immediately after final treatment.

d. Discharge Monitoring

Samples, measurements, and observations taken in compliance with the discharge monitoring requirements set forth herein shall be taken of the treated discharge prior to mixing with waters of the state. See also the definition of "daily concentration" in Part II.A. of this permit.

e. Narrative Standard

The receiving water shall contain no turbidity, color, oil films, floating solids, foams, settleable solids, suspended solids, or deposits as a result of this discharge in unnatural quantities which are or may become injurious to any designated use.

f. Intake Filtration Residuals and Separated Solids

In the event intake ballast water is pretreated using mechanical separation methods, the permittee is authorized to discharge ballast water intake filter backwash to waters of the state provided the discharge is in accordance with e. above.

- g. Removal of Byproduct Chlorite
 - The permittee shall use chlorite removal techniques as necessary to effectively remove byproduct chlorite. Byproduct removal techniques shall be submitted to the Department for review and approval in accordance with Part I.A.11. of this permit. Upon approval the permittee shall report reagent usage in accordance with i. below.
- h. Analytical Method for Chlorite

Chlorite shall be analyzed in accordance with EPA Method 300.0. or any chlorite method referenced in *Standard Methods for the Examination of Water and Wastewater, 23rd Edition*. All methods shall be capable of achieving a quantification level of 10 ug/l. Justification for higher quantification levels shall be submitted to the Department for review and approval.

- Treatment and Operations Record Keeping
 - The permittee shall maintain a BTR on all treatment operations for ballast water discharges into Michigan waters. The BTR shall be submitted to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) using the Port Operations Notification Report form within 24 hours of port departure and shall include the following information:
 - source(s) of ballast water treated (port name or other location);
 - 2) solution strength of chlorine dioxide generated and/or injected;
 - 3) pumping rate through chlorine dioxide generator and/or injection system;
 - 4) volume of ballast water treated and amount discharged;
 - 5) chlorine dioxide contact time (hours) in the ballast water;
 - amount and type of reagent used to remove the byproduct chlorite (report zero if neutralization reagent is not needed);
 - 7) date and location of ballast water discharge event; and
 - 8) results of discharge monitoring required in a. above.

PARTI

Section A. Limitations and Monitoring Requirements

3. Conditions for Using Ultraviolet (UV) Radiation Preceded by Suspended Solids Removal

During the period beginning on the effective date of this permit and the effective date of an individual COC, and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan and discharge UV-light-radiation-treated ballast water to waters of the state. Such discharge shall be limited and monitored by the permittee and subject to the conditions as specified below.

a. Discharge Limitations and Reporting

Parameter	Maximum Quantity	Units	Monitoring Frequency	Sample Type
Flow	Report	MG	Daily	Report Total Discharge Flow
Discharge Duration	Report	minutes	Daily	Report Total Discharge Duration

b. Pretreatment Requirement

Prior to UV radiation treatment, the ballast water shall undergo one (1) or more pretreatment stage(s) such as filtration, cyclonic separation or other methods that remove suspended solids and sediment larger than 50 microns.

c. UV Radiation Dose Level

The ballast water UV treatment unit(s) shall deliver a UV dose of > 200,000 microwatts-sec/cm². Prior to discharging to Michigan waters, the ballast water shall receive the required UV dose during both ballasting and deballasting operations.

d. UV Light Intensity Sensors

To compensate for variations in UV light transmittance in the ballast water, a UV dose monitoring system shall be installed to continually monitor the UV radiation dose to maintain the required treatment dose. If the UV dose drops below the level required as specified in c. above, the UV monitoring system shall automatically stop the ballasting or deballasting operation. Ballast water shall not be discharged without receiving the UV dose level required in c. above.

e. Treatment Performance Monitoring

Treatment performance monitoring shall be conducted to ensure proper operation and maintenance of the treatment system. At a minimum, treatment performance monitoring locations shall be established prior to the first treatment stage and immediately after final treatment.

f. Discharge Monitoring

Samples, measurements, and observations taken in compliance with the discharge monitoring requirements set forth herein shall be taken of the treated discharge prior to mixing with waters of the state. See also the definition of "daily concentration" in Part II.A. of this permit.

g. Narrative Standard

The receiving water shall contain no turbidity, color, oil films, floating solids, foams, settleable solids, suspended solids, or deposits as a result of this discharge in unnatural quantities which are or may become injurious to any designated use.

- Intake Filtration Residuals and Separated Solids
 The permittee is authorized to discharge ballast water intake filter backwash to waters of the state provided the discharge is in accordance with g. above.
- i. Treatment and Operations Record Keeping
 The permittee shall maintain a BTR on all treatment operations for ballast water discharges into Michigan waters. The BTR shall be submitted to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) using the Port Operations Notification Report form within 24 hours of port departure and shall include the following information:
 - 1) source(s) of ballast water treated (port name or other location);
 - maximum pumping capacity through UV light treatment units;
 - 3) minimum UV light dose achieved during treatment including all units (e.g. microwatts-sec/cm²);
 - 4) volume of ballast water treated and amount discharged;
 - 5) date and location of ballast water discharge event; and
 - 6) results of discharge monitoring required in a. above.

PART I

Section A. Limitations and Monitoring Requirements

4. Conditions and Limitations for Using Deoxygenation Treatment

During the period beginning on the effective date of this permit and the effective date of an individual COC, and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan and discharge deoxygenated ballast water to waters of the state. Such discharge shall be limited and monitored by the permittee and subject to the conditions as specified below.

a. Discharge Limitations and Reporting

Parameter	Maximum Quantity	Concentration 1 Hour After Treatment	Concentration After 48 Hour Holding Time	Minimum Concentration for Submerged Discharge	Units	Monitoring Frequency	Sample Type
Flow	Report				MG	Daily	Report Total Discharge Flow
Dissolved Oxygen		Report	Report	4.0	mg/L	Daily	Grab
Discharge Duration	Report				minutes	Daily	Report Total Discharge Duration

b. Ballast Water Deoxygenation

The permittee shall inject the intake ballast water with sufficient gaseous nitrogen to reduce the dissolved oxygen in the ballast water to be discharged to 1 mg/L or below in applicable ballast tanks. In deoxygenating the ballast water, the nitrogen gas shall be injected and mixed with the ballast water downstream of the ballast pump(s). To supplement deoxygenation treatment, the intake ballast water shall flow through an injector system that causes hydro-cavitation in which turbulence and pressure physically destroy some aquatic organisms. The treated (deoxygenated) ballast water shall be monitored for dissolved oxygen and held in the ballast tanks for a minimum of 48 hours prior to discharge to waters of the state.

c. Treatment Performance Monitoring

Treatment performance monitoring shall be conducted to ensure proper operation and maintenance of the treatment system. At a minimum, treatment performance monitoring locations shall be established prior to the first treatment stage and immediately after final treatment.

d. Discharge Monitoring

Samples, measurements, and observations taken in compliance with the discharge monitoring requirements set forth herein shall be taken of the treated discharge prior to mixing with waters of the state. See also the definition of "daily concentration" in Part II.A. of this permit.

e. Narrative Standard

The receiving water shall contain no turbidity, color, oil films, floating solids, foams, settleable solids, suspended solids, or deposits as a result of this discharge in unnatural quantities which are or may become injurious to any designated use.

- f. Intake Filtration Residuals and Separated Solids In the event intake ballast water is pretreated using mechanical separation methods, the permittee is authorized to discharge ballast water intake filter backwash to waters of the state provided the discharge is in accordance with e. above.
- g. Discharge Limitation Exemption The 4.0 mg/L dissolved oxygen ballast water discharge limitation and monitoring requirement shall not apply if the deoxygenated ballast water is discharged above the receiving water surface.
- Dissolved Oxygen Monitoring
 Dissolved oxygen shall be analyzed in accordance with Part II.B.2. of this permit. The monitored ballast water shall be representative of the quality of the discharge.
- Treatment and Operations Record Keeping
 The permittee shall maintain a BTR on all treatment operations for ballast water discharges into
 Michigan waters. The BTR shall be submitted to the Department via MiWaters
 (https://mienviro.michigan.gov/ncore/external/home) using the Port Operations Notification Report form within 24 hours of port departure and shall include the following information:
 - 1) source(s) of ballast water treated (port name or other location);
 - 2) volume of ballast water treated and amount discharged;
 - 3) pumping rate through deoxygenation treatment system;
 - 4) amount of nitrogen gas generated to reduce the dissolved oxygen to 1.0 mg/L or less;
 - 5) holding time of deoxygenated ballast water (hours);
 - 6) date and location of ballast water discharge event; and
 - 7) results of discharge monitoring required in a. above.

PART I

Section A. Limitations and Monitoring Requirements

5. Other USCG-Approved Treatment Technologies

Vessels that treat ballast water with USCG-approved ballast water treatment systems that are not specified in this permit will also be accepted and considered approvable treatment. If USCG type-approved systems are those specified in this permit, the permit conditions apply. During the period beginning on the effective date of this permit and the effective date of an individual COC and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan and discharge treated ballast water to waters of the state. Such discharge shall be limited and monitored by the permittee and subject to the conditions as specified by the USCG. Additional effluent limitations and/or monitoring requirements may be included in the COC.

Any deviations from the USCG-approved process will require approval from the Department. The Department may require the permittee to obtain an individual permit.

Such discharge shall be limited and monitored by the permittee and subject to the conditions as specified below.

a. Monitoring Requirements

If using an additive as a ballast water biocide, the permittee shall inject the ballast water with the additive in such a manner to achieve adequate mixing throughout the ballast tank prior to discharge. The ballast water shall be dosed at appropriate levels as approved by the USCG. Additive concentrations shall be monitored and analyzed in accordance with Part II.B.2. of this permit. The treated ballast water shall be held in the ballast tanks an appropriate amount of time to ensure treatment efficacy prior to discharge.

b. Treatment Performance Monitoring

If necessary to ensure proper operation and maintenance of the treatment system, treatment performance monitoring shall be conducted, and treatment performance monitoring locations shall be established prior to the first treatment stage and immediately after final treatment.

c. Discharge Monitoring

Samples, measurements, and observations taken in compliance with any required discharge monitoring shall be taken of the treated discharge prior to mixing with waters of the state.

d. Narrative Standard

The receiving water shall contain no turbidity, color, oil films, floating solids, foams, settleable solids, suspended solids, or deposits as a result of this discharge in unnatural quantities which are or may become injurious to any designated use.

e. Intake Filtration Residuals and Separated Solids

In the event intake ballast water is pretreated using mechanical separation methods, the permittee is authorized to discharge ballast water intake filter backwash to waters of the state provided the discharge is in accordance with d. above.

6. Conditions for Port Operations with No Ballast Water Discharge

During the period beginning on the effective date of this permit and the effective date of an individual COC, and lasting until the expiration of this permit or termination of the individual COC, the permittee is authorized to engage in port operations in Michigan without discharging ballast water into the surface waters of the state. Any discharge of untreated ballast water into waters of the state is a specific violation of this permit.

7. Port Operations Notification Reporting Requirements

At least 24 hours prior to engaging in port operations within Michigan, the permittee shall submit notification to the Department via MiWaters using the Port Operations Notification Report Form. The MiWaters website is located at https://mienviro.michigan.gov/ncore/external/home. Notification shall include the following information:

- a. vessel name and International Maritime Organization (IMO) number;
- b. COC number;
- c. port destination, arrival date, and estimated time period in port;
- d. last port and name of country;
- e. next port and name of country;
- f. vessel contact name (see Part I.A.13. of this permit);
- g. reason for port operation;
- h. date and type of last ballast water management practice used (ballast water exchange, saltwater flushing, etc.);
- i. total volume and/or weight of ballast water on board; and
- j. (if no ballast water will be discharged into waters of the state) certification that ballast water will not be discharged into waters of the state.

8. Additional Requirements for Discharges of Ballast Water

All discharges of ballast water shall also comply with the USCG regulations found in 33 CFR Part 151. Additionally, owner/operators of all vessels subject to coverage under this permit which are equipped with Ballast Tanks must comply with any additional Best Management Practices (BMP) as required by federal regulations found in 33 CFR 151.2050.

All owner/operators of vessels equipped with ballast water tanks must maintain a ballast water management plan that has been developed specifically for the vessel that will allow those responsible for the plan's implementation to understand and follow the vessel's ballast water management strategy. Owner/operators shall make that plan available upon request to any Department representative. Vessel owner/operators shall ensure that the master and crew members who actively take part in the management of the discharge or who may affect the discharge understand and follow the management strategy contained in the plan. United States Environmental Protection Agency notes that these plans are being imposed as "conditions to assure compliance" with effluent limitations under CWA 402(a)(2) and 40 CFR 122.43(a).

In addition to complying with the requirements of this permit, all vessels that are equipped to carry ballast water and enter the Great Lakes must comply with 33 CFR Part 151, Subpart C titled: "Ballast Water Management for Control of Nonindigenous Species in the Great Lakes and Hudson River." Vessels that operate outside the Exclusive Economic Zone (EEZ) and more than 200 nautical miles (nm) from any shore and then enter the Great Lakes via the Saint Lawrence Seaway System must also comply with 33 CFR Part 401.30, which requires oceangoing vessels to conduct saltwater flushing of ballast water tanks 200 nm from any shore before entering either the U.S. or Canadian waters of the Seaway System. The master of the vessel is not required to request or receive permission from the Department to forego ballast water exchange if they comply with the USCG regulations found in 33 CFR Part 151.

Saltwater exchange shall be conducted in compliance with the following requirements:

- The exchange must occur in waters beyond the U.S. EEZ;
- The exchange must occur in an area more than 200 nm from any shore;
- The exchange must be commenced as early in the vessel voyage as possible, as long as the vessel is more than 200 nm from any shore.

If the master of the vessel determines that it is unsafe or impractical to conduct saltwater exchange, the determination shall be justified in writing to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home).

9. Recording Results

For each measurement or sample taken pursuant to the requirements of this permit, the permittee shall record the following information: 1) the exact place, date, and time of measurement or sampling; 2) the person(s) who performed the measurement or sample collection; 3) the dates the analyses were performed; 4) the person(s) who performed the analyses; 5) the analytical techniques or methods used; 6) the date of and person responsible for equipment calibration; and 7) the results of all required analyses.

10. Continuous Monitoring

If continuous monitoring equipment is used and becomes temporarily inoperable, the permittee shall manually obtain a minimum of three (3) equally spaced grab samples/readings within each 24-hour period for the affected parameter(s). On such days, in the comment field on the Port Operation Notification Report, the permittee shall indicate "continuous monitoring system inoperable," the date on which the system is expected to become operable again, and the number of samples/readings obtained during each 24-hour period.

11. Request for Approval to Use Ballast Water Treatment Additives

The permittee is authorized to use only the ballast water treatment additive associated with the ballast water treatment method specified in the individual COC and set forth in this permit. This permit does not authorize the use of any other water treatment additive without prior written approval from the Department. Such approval is authorized under separate correspondence. Water treatment additives include any materials that are added to water used on the vessel, or to wastewater generated by the vessel, to condition or treat the water. Permittees proposing to use water treatment additives, including a proposed increased concentration of a previously approved water treatment additive, shall submit a request for approval via the Department's MiWaters system. The MiWaters website is located at https://mienviro.michigan.gov/ncore/external/home. Instructions for submitting such a request may be obtained at https://www.michigan.gov/eglenpdes (near the bottom of that page, click on one (1) or both of the links located under the Water Treatment Additives banner). Additional monitoring and reporting may be required as a condition of approval to use the water treatment additive.

A request for approval to use water treatment additives shall include all of the following usage and discharge information for each water treatment additive proposed to be used:

- a. The Safety Data Sheet (SDS);
- b. Ingredient information, including the name of each ingredient, CAS number for each ingredient, and fractional content by weight for each ingredient;
- c. The proposed water treatment additive discharge concentration with supporting calculations;
- d. The discharge frequency (i.e., number of hours per day and number of days per year);
- e. The outfall(s) and monitoring point(s) from which the water treatment additive is to be discharged;
- f. The type of removal treatment, if any, that the water treatment additive receives prior to discharge;
- g. The water treatment additive's function (i.e., microbiocide, flocculant, etc.);
- h. The SDS shall include a 48-hour LC50 or EC50 for a North American freshwater planktonic crustacean (either *Ceriodaphnia sp.*, *Daphnia sp.*, or *Simocephalus sp.*). The results shall be based on the whole water treatment additive, shall not be results based on a similar product, and shall not be estimated; and
- i. The SDS shall include the results of a toxicity test for one (1) other North American freshwater aquatic species (other than a planktonic crustacean) that meets a minimum requirement of R 323.1057(2) of the Part 4 Rules, Water Quality Standards, promulgated pursuant to Part 31 of the NREPA. The results shall be based on the whole water treatment additive, shall not be results based on a similar product, and shall not be estimated. Examples of tests that would meet this requirement include a 96-hour LC50 for rainbow trout, bluegill, or fathead minnow.

12. Quantification Levels and Analytical Methods for Selected Parameters

Maximum acceptable quantification levels (QLs) are specified for selected parameters in the table below. These QLs apply to all monitoring conducted in compliance with this permit if and when the parameters specified herein are monitored. This includes monitoring conducted to meet the requirements of the application for permit reissuance. These QLs shall be considered the maximum acceptable unless a higher QL is appropriate because of sample matrix interference. Justification for higher QLs shall be submitted to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) within 30 days of such determination.

Where necessary to help ensure that the QLs specified herein can be achieved, analytical methods may also be specified in the table below. The sampling procedures, preservation and handling, and analytical protocol for all monitoring conducted in compliance with this permit, including monitoring conducted to meet the requirements of the application for permit reissuance, shall be in accordance with the methods specified herein, or in accordance with Part II.B.2. of this permit if no method is specified herein, unless an alternate method is approved by the Department. The Department will consider only alternate methods that meet the requirements of Part II.B.2. and whose QLs are at least as sensitive (i.e., low) as those specified herein. **Not all QLs are expressed in the same units in the table below**. The table is continued on the following page:

Parameter	QL	Units	Analytical Method
1,2-Diphenylhydrazine (as Azobenzene)	3.0	ug/l	
2,4,6-Trichlorophenol	5.0	ug/l	
2,4-Dinitrophenol	19	ug/l	
3,3'-Dichlorobenzidine	1.5	ug/l	
4-Chloro-3-Methylphenol	7.0	ug/l	
4,4'-DDD	0.01	ug/l	
4,4'-DDE	0.01	ug/l	
4,4'-DDT	0.01	ug/l	
Acrylonitrile	1.0	ug/l	
Aldrin	0.01	ug/l	
Alpha-Endosulfan	0.01	ug/l	
Alpha-Hexachlorocyclohexane	0.01	ug/l	
Antimony, Total	1	ug/l	
Arsenic, Total	1	ug/l	
Barium, Total	5	ug/l	
Benzidine	0.1	ug/l	
Beryllium, Total	1	ug/l	
Beta-Endosulfan	0.01	ug/l	
Beta-Hexachlorocyclohexane	0.01	ug/l	
Bis (2-Chloroethyl) Ether	1.0	ug/l	
Bis (2-Ethylhexyl) Phthalate	5.0	ug/l	
Boron, Total	20	ug/l	
Cadmium, Total	0.2	ug/l	
Chlordane	0.01	ug/l	
Chloride	1.0	mg/L	
Chromium, Hexavalent	5	ug/l	
Chromium, Total	10	ug/l	
Copper, Total	1	ug/l	
Cyanide, Available	2	ug/l	EPA Method OIA 1677
Cyanide, Total	5	ug/l	

PART I

Section A. Limitations and Monitoring Requirements

Parameter	QL	Units	Analytical Method
Delta-Hexachlorocyclohexane	0.01	ug/l	
Dieldrin	0.01	ug/l	
Di-N-Butyl Phthalate	9.0	ug/l	
Endosulfan Sulfate	0.01	ug/l	
Endrin	0.01	ug/l	
Endrin Aldehyde	0.01	ug/l	
Fluoranthene	1.0	ug/l	
Heptachlor	0.01	ug/l	
Heptachlor Epoxide	0.01	ug/l	
Hexachlorobenzene	0.01	ug/l	
Hexachlorobutadiene	0.01	ug/l	
Hexachlorocyclopentadiene	0.01	ug/l	
Hexachloroethane	5.0	ug/l	
Lead, Total	1	ug/l	
Lindane	0.01	ug/l	
Lithium, Total	10	ug/l	
Mercury, Total	0.5	nanograms	EPA Method 1631E
		per liter	
		(ng/L)	
Nickel, Total	5	ug/l	
PCB-1016	0.1	ug/l	
PCB-1221	0.1	ug/l	
PCB-1232	0.1	ug/l	
PCB-1242	0.1	ug/l	
PCB-1248	0.1	ug/l	
PCB-1254	0.1	ug/l	
PCB-1260	0.1	ug/l	
Pentachlorophenol	1.8	ug/l	
Perfluorooctane sulfonate (PFOS)	2.0	ng/L	ASTM D7979 or an isotope dilution method
			(sometimes referred to as Method 537 modified)
Perfluorooctanoic acid (PFOA)	2.0	ng/L	ASTM D7979 or an isotope dilution method
			(sometimes referred to as Method 537 modified)
Phenanthrene	1.0	ug/l	
Phosphorus (as P), Total	10	ug/l	
Selenium, Total	1.0	ug/l	
Silver, Total	0.5	ug/l	
Strontium, Total	1000	ug/l	
Sulfate	2.0	mg/L	
Sulfides, Dissolved	20	ug/l	
Thallium, Total	1	ug/l	
Toxaphene	0.1	ug/l	
Vinyl Chloride	1.0	ug/l	
Zinc, Total	10	ug/l	

13. Vessel Contact

The "Vessel Contact" was specified in the application. The permittee may name a new vessel contact at any time, and shall notify the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) within 10 days after replacement. The notification shall include the name, address and telephone number of the new vessel contact.

- a. The Vessel Contact shall be the Master of the vessel or a duly authorized representative of this person.
- b. A person is a duly authorized representative only if: the authorization is made in writing to the Department by a person described in paragraph a. of this section; and the authorization specifies either an individual or a position having responsibility for the overall operation of the vessel, or an individual or position having overall responsibility for environmental matters for the vessel (a duly authorized representative may thus be either a named individual or any individual occupying a named position).

Nothing in this section obviates the permittee from properly submitting reports and forms as required by law.

14. Requirement to Obtain Individual Permit

The Department may require any person who is authorized to discharge by a COC and this permit to apply for and obtain an individual ballast water discharge permit if any of the following circumstances apply:

- the discharge is a significant contributor to pollution as determined by the Department on a case-bycase basis;
- b. the discharger is not complying or has not complied with the conditions of this permit;
- c. a change has occurred in the availability of demonstrated technology or practices for the control or abatement of aquatic invasive species applicable to the ballast water discharge;
- d. effluent standards and limitations are promulgated for discharges subject to this permit; and/or
- e. the Department determines that the criteria under which the COC was issued no longer apply.

Any person may request the Department to take action pursuant to the provisions of R 323.2191 of the Michigan Administrative Code.

15. Expiration and Reissuance

On or before <u>July 1, 2026</u>, a permittee seeking continued authorization to discharge under this permit beyond the permit's expiration date shall submit to the Department an application for reissuance via the Department's MiWaters system. The MiWaters website is located at https://mienviro.michigan.gov/ncore/external/home. Without a timely application for reissuance, the permittee's authorization to discharge will expire on <u>January 1, 2027</u>. With a timely application for reissuance, the permittee shall continue to be subject to the terms and conditions of the expired permit until the Department takes action on the application, unless this permit is terminated or revoked.

If this permit is terminated or revoked, the Department will notify the permittee in writing and all authorizations to discharge under the permit shall expire on the date of termination or revocation. If this permit is modified, the Department will notify the permittee in writing of any required action. Upon the effective date of the modified permit, the permittee shall be subject to the terms and conditions of the modified permit, unless the Department notifies the permittee otherwise.

If the discharge authorized under this permit is terminated, the permittee shall submit to the Department a Ballast Water Permit Notice of Termination Request via MiWaters at https://mienviro.michigan.gov/ncore/external/home.

Section A. Definitions

Part II may include terms and /or conditions not applicable to discharges covered under this permit.

Aquatic invasive species means any nonindigenous species that threatens the diversity or abundance of native species or the ecological stability of infested waters, or commercial, agricultural, aquacultural, or recreational activities dependent on such waters.

Ballast tank means any tank or hold on a vessel used for carrying ballast water, whether or not the tank or hold was designed for that purpose.

Ballast water means water and associated solids taken on board a vessel to control or maintain trim, draft, stability, or stresses on the vessel, without regard to the manner in which it is carried.

Ballast water sediment means any organic or inorganic substance present in ballast water.

Best management practices (BMPs) means structural devices or nonstructural practices that are designed to prevent pollutants from entering into storm water, to direct the flow of storm water, or to treat polluted storm water.

BTR means Ballast Treatment Record.

Certificate of Coverage (COC) is a document, issued by the Department, which authorizes a discharge under a general permit.

Daily concentration

FOR PARAMETERS OTHER THAN DISSOLVED OXYGEN – Daily concentration is the sum of the concentrations of the individual samples of a parameter taken during a discharge event divided by the number of samples taken during that discharge event. The daily concentration will be used to determine compliance with any maximum and minimum daily concentration limitations. For guidance and examples showing how to perform calculations using results below quantification levels, see the document entitled "Reporting Results Below Quantification," available at https://www.michigan.gov/-/media/Project/Websites/egle/Documents/Programs/WRD/MiEnviro/results-below-quantification.pdf.

FOR DISSOLVED OXYGEN – The daily concentration used to determine compliance with minimum daily dissolved oxygen limitations is the lowest dissolved oxygen readings obtained within a discharge event.

Daily monitoring frequency refers to a 24-hour day. When required by this permit, an analytical result, reading, value or observation shall be reported for that period if a discharge occurs during that period.

Department means the Michigan Department of Environment, Great Lakes, and Energy.

Detection level means the lowest concentration or amount of the target analyte that can be determined to be different from zero by a single measurement at a stated level of probability.

Discharge means the addition of any waste, waste effluent, wastewater, pollutant, or any combination thereof to any surface water of the state.

EPA means the United States Environmental Protection Agency.

Grab sample is a single sample taken at neither a set time nor flow.

Section A. Definitions

Gulf of St. Lawrence means the area existing within the following boundaries: the maritime estuary at the mouth of the St. Lawrence River, to the west; a straight-line from Table Head, Labrador (latitude 52.0813, longitude -55.7106) and Cape Bauld, Newfoundland (latitude 51.6400, longitude -55.4264), to the north; and a straight-line from Cape Ray, Newfoundland (latitude 47.6202, longitude -59.3034) and White Point, Nova Scotia (latitude 46.8840, longitude -60.3512) to the south.

IMO means International Maritime Organization.

Individual permit means a site-specific permit.

MG means million gallons.

mg/L means milligrams per liter.

Oceangoing vessel means a vessel that operates on the Great Lakes or the St. Lawrence waterway after operating in waters outside the Great Lakes or the St. Lawrence waterway.

Polluting material means any material, in solid or liquid form, identified as a polluting material under the Part 5 Rules, Spillage of Oil and Polluting Materials, promulgated under Part 31 of the NREPA (R 324.2001 through R 324.2009 of the Michigan Administrative Code).

Port operations means the act of engaging in one (1) or more of the following activities while in port: fueling, loading and off-loading cargo, and loading and unloading passengers.

Qualified Personnel means an individual who meets qualifications acceptable to the Department and who is authorized by a Certified Operator to collect the ballast water sample.

Quantification level means the measurement of the concentration of a contaminant obtained by using a specified laboratory procedure calculated at a specified concentration above the detection level. It is considered the lowest concentration at which a particular contaminant can be quantitatively measured using a specified laboratory procedure for monitoring of the contaminant.

St. Lawrence waterway means the St. Lawrence River, the St. Lawrence Seaway, and the Gulf of St. Lawrence as defined herein.

Stoichiometric means the quantity of a reagent calculated to be necessary and sufficient for a given chemical reaction.

TRC means Total Residual Chlorine.

Water Quality Standards means the Part 4 Water Quality Standards promulgated pursuant to Part 31 of the NREPA, being R 323.1041 through R 323.1117 of the Michigan Administrative Code.

ug/I means micrograms per liter.

UV means Ultraviolet light radiation.

Waters of the state means groundwaters, lakes, rivers, and streams and all other watercourses and waters, including the Great Lakes, within the jurisdiction of the State of Michigan.

3-portion composite sample is a sample consisting of three (3) equal-volume grab samples collected at equal intervals over an 8-hour period.

Section B. Monitoring Procedures

1. Representative Samples

Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge.

2. Test Procedures

Test procedures for the analysis of pollutants shall conform to regulations promulgated pursuant to Section 304(h) of the Clean Water Act (40 CFR Part 136 – Guidelines Establishing Test Procedures for the Analysis of Pollutants), unless specified otherwise in this permit. **Test procedures used shall be sufficiently sensitive to determine compliance with applicable effluent limitations**. For lists of approved test methods, go to https://www.epa.gov/cwa-methods. Requests to use test procedures not promulgated under 40 CFR Part 136 for pollutant monitoring required by this permit shall be made in accordance with the Alternate Test Procedures regulations specified in 40 CFR 136.4. These requests shall be submitted to the Manager of the Permits Section, Water Resources Division, Michigan Department of Environment, Great Lakes, and Energy, P.O. Box 30458, Lansing, Michigan, 48909-7958. The permittee may use such procedures upon approval.

The permittee shall periodically calibrate and perform maintenance procedures on all analytical instrumentation at intervals to ensure accuracy of measurements. The calibration and maintenance shall be performed as part of the permittee's laboratory Quality Assurance/Quality Control program.

3. Instrumentation

The permittee shall periodically calibrate and perform maintenance procedures on all monitoring instrumentation at intervals to ensure accuracy of measurements.

4. Records Retention

All records and information resulting from the monitoring activities required by this permit, including all records of analyses performed, calibration and maintenance of instrumentation, and recordings from continuous monitoring instrumentation, shall be retained for a minimum of three (3) years, or longer if requested by the Department.

1. Submittal Requirements for Self-Monitoring Data

Part 31 of the NREPA (specifically Section 324.3110[7]); and R 323.2155(2) of Part 21, Wastewater Discharge Permits, promulgated under Part 31 of the NREPA, allow the Department to specify the forms to be utilized for reporting the required self-monitoring data. Unless instructed on the effluent limitations page to conduct "Retained Self-Monitoring," the permittee shall submit self-monitoring data via the Department's MiWaters system.

The permittee shall utilize the information provided on the MiWaters website, located at https://mienviro.michigan.gov/ncore/external/home, to access and submit the electronic forms. Both monthly summary and daily data shall be submitted to the Department no later than the 20th day of the month following each month of the authorized discharge period(s). The permittee may be allowed to submit the electronic forms after this date if the Department has granted an extension to the submittal date.

2. Retained Self-Monitoring Requirements

If instructed on the effluent limits page (or otherwise authorized by the Department in accordance with the provisions of this permit) to conduct retained self-monitoring, the permittee shall maintain a year-to-date log of retained self-monitoring results and, upon request, provide such log for inspection to the staff of the Department. Retained self-monitoring results are public information and shall be promptly provided to the public upon request.

The permittee shall certify, in writing, to the Department, on or before <u>January 10 (April 1 for animal feeding operation facilities) of each year</u>, that: 1) all retained self-monitoring requirements have been complied with and a year-to-date log has been maintained; and 2) the application on which this permit is based still accurately describes the discharge. With this annual certification, the permittee shall submit a summary of the previous year's monitoring data. The summary shall include maximum values for samples to be reported as daily maximums and/or monthly maximums and minimum values for any daily minimum samples.

Retained self-monitoring may be denied to a permittee by notification in writing from the Department. In such cases, the permittee shall submit self-monitoring data in accordance with Part II.C.2., above. Such a denial may be rescinded by the Department upon written notification to the permittee. Reissuance or modification of this permit or reissuance or modification of an individual permittee's authorization to discharge shall not affect previous approval or denial for retained self-monitoring unless the Department provides notification in writing to the permittee.

3. Additional Monitoring by Permittee

If the permittee monitors any pollutant at the location(s) designated herein more frequently than required by this permit, using approved analytical methods as specified above, the results of such monitoring shall be included in the calculation and reporting of the values required in the Ballast Treatment Record and or the Port Operations Notification Report. Such increased frequency shall also be indicated.

4. Compliance Dates Notification

<u>Within 14 days</u> of every compliance date specified in this permit, the permittee shall submit a written notification to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) indicating whether or not the particular requirement was accomplished. If the requirement was not accomplished, the notification shall include an explanation of the failure to accomplish the requirement, actions taken or planned by the permittee to correct the situation, and an estimate of when the requirement will be accomplished. If a written report is required to be submitted by a specified date and the permittee accomplishes this, a separate written notification is not required.

5. Noncompliance Notification

Compliance with all applicable requirements set forth in the Clean Water Act, Part 31 of the NREPA, and related regulations and rules is required. All instances of noncompliance shall be reported as follows:

- a. 24-Hour Reporting
 - Any noncompliance which may endanger health or the environment (including maximum and/or minimum daily concentration discharge limitation exceedances) shall be reported, verbally, within 24 hours from the time the permittee becomes aware of the noncompliance by calling the Department at the number indicated on the second page of this permit (or, if this is a general permit, on the COC). A written submission shall also be provided via MiWaters (https://mienviro.michigan.gov/ncore/external/home) within five (5) days.
- b. Other Reporting

The permittee shall report, in writing via MiWaters (https://mienviro.michigan.gov/ncore/external/home), all other instances of noncompliance not described in a. above at the time monitoring reports are submitted; or, in the case of retained self-monitoring, within five (5) days from the time the permittee becomes aware of the noncompliance.

Reporting shall include: 1) a description of the discharge and cause of noncompliance; and 2) the period of noncompliance, including exact dates and times, or, if not yet corrected, the anticipated time the noncompliance is expected to continue, and the steps taken to reduce, eliminate and prevent recurrence of the noncomplying discharge.

6. Spill Notification

The permittee shall immediately report any release of any polluting material which occurs to the surface waters or groundwaters of the state, unless the permittee has determined that the release is not in excess of the threshold reporting quantities specified in the Part 5 Rules (R 324.2001 through R 324.2009 of the Michigan Administrative Code), by calling the Department at the number indicated on the second page of this permit (or, if this is a general permit, on the COC); or, if the notice is provided after regular working hours, by calling the Department's 24-hour Pollution Emergency Alerting System telephone number, 1-800-292-4706.

Within 10 days of the release, the permittee shall submit to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) a full written explanation as to the cause of the release, the discovery of the release, response measures (clean-up and/or recovery) taken, and preventive measures taken or a schedule for completion of measures to be taken to prevent reoccurrence of similar releases.

PART II

7. Changes in Ballast Treatment Operations

As soon as possible but at least 10 days before implementing an anticipated ballast treatment modification, the permittee shall notify the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) of the intended modification. Following receipt of such notification, the Department may modify the permittee's COC in accordance with applicable laws and rules, or require the permittee to apply for and obtain an individual ballast water permit.

8. Upset Noncompliance Notification

Section C. Reporting Requirements

If a process "upset" (defined as an exceptional incident in which there is unintentional and temporary noncompliance with technology-based permit effluent limitations because of factors beyond the reasonable control of the permittee) has occurred, the permittee who wishes to establish the affirmative defense of upset shall notify the Department by telephone within 24 hours of becoming aware of such conditions; and within five (5) days, provide in writing, the following information:

- a. that an upset occurred and that the permittee can identify the specific cause(s) of the upset;
- b. that the permitted wastewater treatment facility was, at the time, being properly operated and maintained (note that an upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation); and
- c. that the permittee has specified and taken action on all responsible steps to minimize or correct any adverse impact in the environment resulting from noncompliance with this permit.

No determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is final administrative action subject to judicial review.

In any enforcement proceedings, the permittee, seeking to establish the occurrence of an upset, has the burden of proof.

9. Bypass Prohibition and Notification

- a. Bypass Prohibition
 - Bypass is prohibited, and the Department may take an enforcement action, unless:
 - 1) 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 backup equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass; and
 - 3) the permittee submitted notices as required under 9.b. or 9.c. below.
- b. Notice of Anticipated Bypass

If the permittee knows in advance of the need for a bypass, the permittee shall submit written notification to the Department before the anticipated date of the bypass. This notification shall be submitted at least 10 days before the date of the bypass; however, the Department will accept fewer than 10 days advance notice if adequate explanation for this is provided. The notification shall provide information about the anticipated bypass as required by the Department. The Department may approve an anticipated bypass, after considering its adverse effects, if it will meet the three (3) conditions specified in a. above.

c. Notice of Unanticipated Bypass

As soon as possible but no later than 24 hours from the time the permittee becomes aware of the unanticipated bypass, the permittee shall notify the Department by calling the number indicated on the second page of this permit (or, if this is a general permit, on the COC); or, if notification is provided after regular working hours, call the Department's 24-hour Pollution Emergency Alerting System telephone number, 1-800-292-4706.

d. Written Report of Bypass

A written submission shall be provided within five (5) working days of commencing any bypass to the Department, and at additional times as directed by the Department. The written submission shall contain a description of the bypass and its cause; the period of bypass, including exact dates and times, and if the bypass has not been corrected, the anticipated time it is expected to continue; steps taken or planned to reduce, eliminate, and prevent reoccurrence of the bypass; and other information as required by the Department.

e. 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 ensure efficient operation. These bypasses are not subject to the provisions of 9.a., 9.b., 9.c., and 9.d., above. This provision does not relieve the permittee of any notification responsibilities under Part II.C.11. of this permit.

f. Definitions

- 1) Bypass means the intentional diversion of waste streams from any portion of a treatment facility.
- 2) 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.

10. Bioaccumulative Chemicals of Concern (BCC)

Consistent with the requirements of R 323.1098 and R 323.1215 of the Michigan Administrative Code, the permittee is prohibited from undertaking any action that would result in a lowering of water quality from an increased loading of a BCC unless an increased use request and antidegradation demonstration have been submitted and approved by the Department.

11. Notification of Changes in Discharge

The permittee shall notify the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home), as soon as possible but within no more than 10 days of knowing, or having reason to believe, that any activity or change has occurred or will occur which would result in the discharge of: 1) detectable levels of chemicals on the current Michigan Critical Materials Register, priority pollutants or hazardous substances set forth in 40 CFR 122.21, Appendix D, or the Pollutants of Initial Focus in the Great Lakes Water Quality Initiative specified in 40 CFR 132.6, Table 6, which were not acknowledged in the application or listed in the application at less than detectable levels; 2) detectable levels of any other chemical not listed in the application or listed at less than detection, for which the application specifically requested information; or 3) any chemical at levels greater than five (5) times the average level reported in the complete application (see the first page of the COC, for the date(s) the complete application was submitted). Any other monitoring results obtained as a requirement of this permit shall be reported in accordance with the compliance schedules.

12. Changes in Facility Operations

Any anticipated action or activity, including but not limited to facility expansion, production increases, or process modification, which will result in new or increased loadings of pollutants to the receiving waters must be reported to the Department by a) submission of an increased use request (application) and all information required under R 323.1098 (Antidegradation) of the Water Quality Standards or b) by written notice if the following conditions are met: 1) the action or activity will not result in a change in the types of wastewater discharged or result in a greater quantity of wastewater than currently authorized by this permit; 2) the action or activity will not result in violations of the effluent limitations specified in this permit; 3) the action or activity is not prohibited by the requirements of Part II.C.10.; and 4) the action or activity will not require notification pursuant to Part II.C.11. Following such written notice, the permit or, if applicable, the facility's COC, may be modified according to applicable laws and rules to specify and limit any pollutant not previously limited.

13. Transfer of Ownership or Control

In the event of any change in ownership or control of a permitted vessel from which the authorized discharge emanates, may transfer its COC to a new owner/operator for which the following requirements apply: Not less than 30 days prior to the actual transfer of ownership or control, the permittee shall submit to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home) a written agreement between the current permittee and the new permittee containing: 1) the legal name and address of the new owner; 2) a specific date for the effective transfer of permit responsibility, coverage and liability; and 3) a certification of the continuity of or any changes in operations, wastewater discharge, or wastewater treatment.

If the new permittee is proposing changes in operations, wastewater discharge, or wastewater treatment, the Department may propose modification of this permit in accordance with applicable laws and rules.

14. Termination of Coverage

If a permittee determines its permitted vessel no longer needs coverage under this permit, the permittee may request the Department to terminate the COC by submitting a Ballast Water Permit Notice of Termination Request via MiWaters at https://mienviro.michigan.gov/ncore/external/home.

15. Signatory Requirements

All applications, reports, or information submitted to the Department in accordance with the conditions of this permit and that require a signature shall be signed and certified as described in the NREPA.

The NREPA (Section 3115[2]) provides that a person who at the time of the violation knew or should have known that he or she discharged a substance contrary to this part, or contrary to a permit, COC, or order issued or rule promulgated under this part, or who intentionally makes a false statement, representation, or certification in an application for or form pertaining to a permit or COC or in a notice or report required by the terms and conditions of an issued permit or COC, or who intentionally renders inaccurate a monitoring device or record required to be maintained by the Department, is quilty of a felony and shall be fined not less than \$2,500 or more than \$25,000 for each violation. The court may impose an additional fine of not more than \$25,000 for each day during which the unlawful discharge occurred. If the conviction is for a violation committed after a first conviction of the person under this subsection, the court shall impose a fine of not less than \$25,000 per day and not more than \$50,000 per day of violation. Upon conviction, in addition to a fine, the court in its discretion may sentence the defendant to imprisonment for not more than two (2) years or impose probation upon a person for a violation of this part. With the exception of the issuance of criminal complaints, issuance of warrants, and the holding of an arraignment, the circuit court for the county in which the violation occurred has exclusive jurisdiction. However, the person shall not be subject to the penalties of this subsection if the discharge of the effluent is in conformance with and obedient to a rule, order, permit, or COC of the Department. In addition to a fine, the attorney general may file a civil suit in a court of competent jurisdiction to recover the full value of the injuries done to the natural resources of the state and the costs of surveillance and enforcement by the state resulting from the violation.

16. Electronic Reporting

Upon notice by the Department that electronic reporting tools are available for specific reports or notifications, the permittee shall submit electronically via MiWaters (https://mienviro.michigan.gov/ncore/external/home) all such reports or notifications as required by this permit, on forms provided by the Department.

PART II

Section D. Management Responsibilities

1. Duty to Comply

All discharges authorized herein shall be consistent with the terms and conditions of this permit. The discharge of any pollutant identified in this permit, more frequently than, or at a level in excess of, that authorized, shall constitute a violation of the permit.

It is the duty of the permittee to comply with all the terms and conditions of this permit. Any noncompliance with the effluent limitations, special conditions, or terms of this permit constitutes a violation of the NREPA and/or the Clean Water Act and constitutes grounds for enforcement action; for permit or COC termination, revocation and reissuance, or modification; or denial of an application for permit or COC renewal.

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.

2. Operator Certification

The permittee shall have the ballast water treatment system under direct supervision of an operator certified at the appropriate level for the treatment system certification by the Department, as required by Sections 3110 and 4104 of the NREPA.

3. Facilities Operation

The permittee shall, at all times, properly operate and maintain all treatment or control facilities or systems installed or used by the permittee to achieve compliance with the terms and conditions of this permit. Proper operation and maintenance includes adequate laboratory controls and appropriate quality assurance procedures.

4. Power Failures

In order to maintain compliance with the effluent limitations of this permit and prevent unauthorized discharges, the permittee shall either:

- a. provide an alternative power source sufficient to operate facilities utilized by the permittee to maintain compliance with the effluent limitations and conditions of this permit; or
- b. upon the reduction, loss, or failure of one (1) or more of the primary sources of power to facilities utilized by the permittee to maintain compliance with the effluent limitations and conditions of this permit, the permittee shall halt, reduce or otherwise control production and/or all discharge in order to maintain compliance with the effluent limitations and conditions of this permit.

5. Adverse Impact

The permittee shall take all reasonable steps to minimize or prevent any adverse impact to the surface waters or groundwaters of the state resulting from noncompliance with any effluent limitation specified in this permit including, but not limited to, such accelerated or additional monitoring as necessary to determine the nature and impact of the discharge in noncompliance.

6. Containment Facilities

The permittee shall provide facilities for containment of any accidental losses of polluting materials in accordance with the requirements of the Part 5 Rules (R 324.2001 through R 324.2009 of the Michigan Administrative Code).

7. Waste Treatment Residues

Residuals (i.e. solids, sludges, biosolids, filter backwash, scrubber water, ash, grit, or other pollutants or wastes) removed from or resulting from treatment or control of wastewaters, including those that are generated during treatment or left over after treatment or control has ceased, shall be disposed of in an environmentally compatible manner and according to applicable laws and rules. These laws may include, but are not limited to

Section D. Management Responsibilities

Part 31 Water Resources Protection; Part 55 Air Pollution Control; Part 111 Hazardous Waste Management; Part 115 Solid Waste Management; Part 121 Liquid Industrial Wastes; Part 301 Inland Lakes and Streams; and Part 303 Wetlands Protection of the NREPA. Such disposal shall not result in any unlawful pollution of the air, surface waters or groundwaters of the state.

8. Right of Entry

The permittee shall allow the Department, any agent appointed by the Department, or the Regional Administrator, upon the presentation of credentials and, for animal feeding operation facilities, following appropriate biosecurity protocols:

- a. to enter upon the permittee's vessel where a ballast water treatment system is located or any place in which records are required to be kept under the terms and conditions of this permit; and
- b. at reasonable times to have access to and copy any records required to be kept under the terms and conditions of this permit; to inspect process facilities, treatment systems, monitoring methods and equipment regulated or required under this permit; and to sample any discharge of pollutants.

9. Availability of Reports

Except for data determined to be confidential under Section 308 of the Clean Water Act and Rule 2128 (R 323.2128 of the Michigan Administrative Code), all reports prepared in accordance with the terms of this permit and required to be submitted to the Department shall be available for public inspection via MiWaters (https://mienviro.michigan.gov/ncore/external/home). As required by the Clean Water Act, effluent data shall not be considered confidential. Knowingly making any false statement on any such report may result in the imposition of criminal penalties as provided for in Sections 3112, 3115, 4106 and 4110 of the NREPA.

10. Duty to Provide Information

The permittee shall furnish to the Department via MiWaters (https://mienviro.michigan.gov/ncore/external/home), within a reasonable time, any information which the Department may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit or the facility's COC, 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.

Where 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 in any report to the Department, it shall promptly submit such facts or information.

Section E. Activities Not Authorized by This Permit

1. Civil and Criminal Liability

Nothing in this permit shall be construed to relieve the permittee from civil or criminal penalties for noncompliance, whether or not such noncompliance is due to factors beyond the permittee's control, such as accidents, equipment breakdowns, or labor disputes.

2. 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 may be subject under Section 311 of the Clean Water Act except as are exempted by federal regulations.

3. State Laws

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 established pursuant to any applicable state law or regulation under authority preserved by Section 510 of the Clean Water Act.

4. Property Rights

The issuance of this permit does not convey any property rights in either real or personal property, or any exclusive privileges, nor does it authorize violation of any federal, state or local laws or regulations, nor does it obviate the necessity of obtaining such permits, including any other Department of Environment, Great Lakes, and Energy permits, or approvals from other units of government as may be required by law.