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and

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and

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Sea Lamprey Control Centre  
1219 Queen Street East  
Sault Ste. Marie, Ontario P6A 2E5  
Canada

## **ADMINISTRATIVE OPERATING PROCEDURE**

### **PROCEDURE TITLE:**

Storage, Transportation, Decontamination, and Spill Containment of Lampricides and Lampricide Application Equipment

### **APPLICABILITY:**

Procedures apply to all activities related to the storage, transportation, and use of lampricides

### **PURPOSE:**

The purpose of this procedure is to provide instruction for the safe handling and storage of lampricides

### **PROCEDURE:**

#### **I. Storage**

##### **A. General**

1. Lampricide stockpiles are secured in locked, heated buildings. Lampricides are stored in locked, covered vehicles in the field.
2. Local fire departments are advised of the presence of TFM and of special firefighting procedures recommended for this chemical (see MSDS; Appendix F). The placarding of buildings follows state guidelines.
3. Inventory Logs are maintained to monitor the inventory of lampricides.

B. Specific

1. TFM

- a. Liquid formulations: TFM 33% liquid formulations are packaged in plastic containers which hold about five gallons of pesticide. Containers are stacked on pallets. Pallets of TFM are routinely moved with a forklift. The top row of containers is stabilized while being moved.
- b. Bar Formulation: TFM Bars are stored on pallets in a ventilated room in a general use warehouse. TFM bars are wrapped in a water-resistant container.

2. Bayluscide

All formulations of Bayluscide are stored in cool, dry, and secure locations

- a. Granular formulation: Bayluscide 3.2% Granular Sea Lamprey Larvicide is shipped and stored in cylindrical, heavy duty plastic buckets which contain 50 lbs of pesticide. Containers are stored on wood pallets which may be stacked two-high on a plastic sheet.
- b. Liquid formulation: Bayluscide 20% EC is packaged in 1 or 5L plastic containers. The containers are shipped and stored in cardboard boxes. EC is transported to the field for use in cardboard boxes and plastic totes with lids.

II. Transportation

Lampricides are transported from the storage facility to the treatment site in a variety of vehicles ranging from pick-ups to 2 ½ ton enclosed trucks. TFM liquid is classified as hazardous materials and transport of lampricide is regulated under Canadian and U.S. Departments of Transportation regulations ([www.TC.GC.CA/TDG/menu.htm](http://www.TC.GC.CA/TDG/menu.htm) and <https://www.fmcsa.dot.gov/regulations/hazardous-materials/how-comply-federal-hazardous-materials-regulations>). Applicable details are summarized for personnel in Appendix R). Passengers and foodstuffs are not allowed in compartments used to transport lampricides. All vehicles are supplied with a list of emergency telephone numbers and a contingency plan (Appendix D) that outlines emergency procedures used in case of an accidental spill. Each vehicle is supplied with a shovel, a spill kit containing chemically absorbent materials, and a two-way radio to allow rapid communication if problems arise. Push brooms are recommended for all TFM transport trucks and trailers.

Weight capacities for trucks are not exceeded. Proper precautions are taken to evenly distribute and secure loads. Containers are secured to prevent shifting or tipping. TFM bars and Bayluscide containers are protected from the weather.

If travel to an application site by watercraft is required, the containers are secured in the watercraft. After applications, empty containers are returned to the storage facility for disposal.

III. Decontamination

Empty lampricide containers are triple-rinsed or equivalent at treatment sites, rendered useless by crushing or puncturing, and disposed of in an approved municipal landfill or offered for recycling. Containers that are not rinsed immediately are labeled “not rinsed,” capped, and stored until decontamination at another appropriate site. All lampricide dispensing equipment is thoroughly rinsed at the application site before it is returned to the transport vehicle or storage.

IV. Spill Reporting

Accidental spills of one or more containers of any lampricide formulation will be reported to the appropriate state or provincial agencies as listed in Appendix D.

In Michigan, an accidental spill of one or more containers must be reported to the Pollution Emergency Alerting System (PEAS) and Michigan Environment, Great Lakes, and Energy (EGLE). The State Police are called if no PEAS or equivalent system phone number is listed for the state in which the spill occurs. Spills of the following magnitude must be reported: TFM, one container (approx. 5 gals); Bayluscide 3.2% Sea Lamprey Larvicide, one container (50 lbs); ; and Bayluscide 20% EC, 1 bottle (5L).

Spills in Ontario must be reported to the Ministry of Environmental Spills Action Centre (See emergency telephone numbers; Appendix D).

V. Spill Response

A. Spills on land: In the event of a major lampricide spill during storage, transport, or at an application site, it is of the greatest importance that the spill is stopped at its source, the spilled material is contained, and the proper authorities are notified. Shovels and other hand tools are used for immediate containment or channelization of the spilled lampricide into a containment area. Spills of dry Bayluscide on land are readily controlled by sweeping and shoveling.

The following actions are taken, as necessary, to contain and clean up a major spill on the ground:

1. Put on all necessary PPE, secure the scene, and stop the spill at the source.
2. Contact your supervisor, call emergency services (911) and CHEMTREC if necessary.
  - a. Supervisor- Call the following agencies:  
National Response Center: (800) 424-8802  
EGLE PEAS Hotline: 800-292-4706  
CHEMTREC: (800) 424-9300, CCN#: 23488

If a reportable quantity of hazardous substance was involved (see above), the caller should give the quantity and details of the hazardous substance discharged.

3. Dike liquid formulations of TFM and Bayluscide in pools using absorbent mats and socks.
4. Absorb liquid formulations of TFM and Bayluscide with clay, soil, or noncombustible absorbent materials. Shovel or sweep dried TFM or

Bayluscide and contaminated absorbent materials into piles. All contaminated materials must be removed from the site and packaged for hazardous waste disposal, which requires specific hazardous material packaging. Licensed haulers transport waste containers to a hazardous waste treatment, storage, or disposal facility.

5. If TFM/Bayluscide residue remains, scrub the area with water and/or soap solution. Large or widely spread residues on contaminated pavement may require assistance from tanker trucks to decontaminate the area.
    - a. In Michigan, if spills are too large to handle, EGLE will provide a list of environmental clean-up specialists in the area.
    - b.
- B. Spills into water: If lampricide is spilled near or into a waterway, containment is initiated to prevent or minimize movement into the waterway. If a major lampricide spill occurs into a stream not scheduled for immediate lampricide treatment, the following emergency actions are initiated:
1. Immediate notification and consultation with State/County Public Health Office (see emergency telephone numbers; Appendix D).
  2. Issuance of an emergency advisory on water use restrictions at and downstream of the spill location through local radio and door-to-door contacts. The emergency advisory prohibits water use for drinking, cooking, other household uses, swimming and fishing until further notification.
  3. Lampricide monitoring is initiated to follow the chemical block and to determine its concentration.

Accidental spills of TFM into a stream during treatment operations may occur during a period when chemical monitoring is already underway. In such an instance, monitoring is extended to ensure that the area of impact of the plume does not exceed previous projections. Automatic water samplers are set at the intake(s) of any municipal water supply system that might be impacted as the result of the spill.

An accidental spill of Bayluscide into waters not designated for immediate treatment triggers the initiation of emergency actions (see preceding on TFM).

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This procedure has been reviewed and approved by the undersigned representatives of the U.S. Fish and Wildlife Service and Fisheries and Oceans Canada.

REVIEWED/APPROVED \_\_\_\_\_ DATE \_\_\_\_\_  
Field Supervisor (U.S.)

REVIEWED/APPROVED \_\_\_\_\_ DATE \_\_\_\_\_  
Program Manager (Canada)

Revision No.	Date	Person(s) Responsible	Description
8.92	2/22/2025	Chris Eilers, Shawn Nowicki, Shawn Robertson	Updated spill response and reporting