Appendix A - Policies

Contaminated Rags Policy

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Propane Bottle Policy

City of Iqaluit Health and Safety Program

City of Iqaluit Accident Investigation Program

CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Contaminated Rags Policy	**Page:** 1 of 1

PURPOSE:

To define acceptable procedures for acceptance and disposal of oily rags.

POLICY:

1. Contaminated rags generally means cloth materials that have been used in industrial applications for cleaning or spill cleanup purposes.
2. This policy does not apply to small quantities of rags that are normally deposited in waste receptacles at a household or business, but applies to large quantities that are generated as a result of a spill clean-up or that have been stored at an industry or business separately from the normal waste stream.
3. The waste generator must provide a full and complete description of the contaminant and include a waste analysis.
4. If the contaminated rags contain a prohibited waste (i.e. hazardous waste), then they must not be accepted at the landfill.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Automobile Batteries Policy	**Page:** 1 of 1

PURPOSE:

To establish the storage and management of automobile batteries for recycling.

POLICY:

1. Automobile and lead batteries will be accepted at the landfill from residents for recycling purposes.
2. Batteries will be placed at the hazardous wastes temporary storage area.
3. Batteries will not be accepted at the landfill from commercial businesses.
4. All efforts will be made to encourage landfill customers to separate batteries from other waste.
5. Batteries accepted for recycling will be stored:
   a. On wooden pallets placed over a lime pad;
   b. In a sheltered area; and
   c. Covered with a tarp or plastic or placed in a weather-proof structure.
6. Recycling of automobile batteries will be coordinated by the Superintendent in accordance with contractual agreements.

RESPONSIBILITIES:

.1 The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Key and Gate Lock Policy	**Page:** 1 of 1

PURPOSE:

To maintain control of access to the site after hours in order to minimize liabilities to the landfill.

POLICY:

1. Customers requesting access to the landfill outside of the established operating hours shall arrange for the time of access with the Landfill Foreman.
2. The Landfill Foreman shall be present at all times, when after hours access is provided, they will remain on-site until the customer has left the site.
3. Customers requesting after hours access shall pay an hourly rate of $ _____ to the Landfill Foreman for the period of time the employee is required at the site, with a minimum charge of 1 hour per entry, and shall pay the landfill tipping fee as set out in the Tipping Fees Policy.
4. The customer shall notify the Landfill Foreman at least **4 hours** in advance of requiring access to the site outside the established operating hours.

RESPONSIBILITIES:

1. The Landfill Foreman will be responsible for scheduling any after hour access times with the customer and shall maintain a record of the customer and time incurred.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Visitor Record Policy	**Page:** 1 of 1

PURPOSE:

To maintain a record of site visitors for site safety.

POLICY:

1. In this Policy "visitors" means those persons that are non-customers and may include:
   a. City employees and councillors;
   b. Consultants;
   c. Environmental Protection Service Inspector;
   d. NWB Officer;
   e. Scheduled tour groups; or
   f. Other non-customers.
2. All visitors will report to the Landfill Foreman at the landfill office and will sign a visitor registry that includes the person's name, time of entry, and purpose of the visit.
3. All visitors will report to the Landfill Foreman upon leaving the site and will initial and enter the time of departure on the visitor registry.
4. Prior to departure from the site, the Landfill Foreman will check the visitor registry to make sure all visitors have signed out.

RESPONSIBILITIES:

1. The Landfill Foreman will maintain the visitor registry.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Tipping Fees Policy	**Page:** 1 of 2

PURPOSE:

To establish tipping fees charged to commercial customers for use of the landfill.

POLICY:

City of Iqaluit shall establish the tipping fee.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible to review tipping fees and recommend alternate tipping fees to the CAO.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Prohibited Waste Policy	**Page:** 1 of 1

PURPOSE:
To define waste that is prohibited from disposal at the landfill.

POLICY:

Prohibited waste is all substances and materials listed below:

- Any waste defined as “oilfield waste”;
- Biomedical waste that is not rendered inert;
- Radioactive waste;
- Combustible waste;
- Explosives; and
- Bulk liquids.

1. The Foreman reserves the right to determine if a waste is acceptable at the landfill for storage or disposal. The prohibited waste may include soils or materials containing non-hazardous materials, such as those containing high concentrations of chlorides or other such constituents.

RESPONSIBILITIES:

1. The Landfill Foreman shall be responsible to inspect loads for prohibited debris and to take necessary actions to prevent such waste from entering the landfill site.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Wash Up Policy	**Page:** 1 of 1

PURPOSE:

To establish appropriate hygiene for operations staff at the landfill.

POLICY:

Hands **MUST BE** thoroughly washed before handling or consuming **ANY FOOD OR BEVERAGE**. Food and beverage is to be consumed only in the Building, another area designated by the Landfill Foreman, or **OFF-SITE**.

Hands **MUST BE** thoroughly washed before **SMOKING**.

Hands must be thoroughly washed **BEFORE LEAVING** the landfill site for any reason, except in the case of an emergency when the site must be quickly evacuated.

Exterior clothing worn while working around any hazardous wastes, **MUST BE** removed prior to leaving the site.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Vehicle Accident Response Policy	**Page:** 1 of 1

PURPOSE:

To establish appropriate response in the event of a vehicle accident at the landfill site.

POLICIES:

All vehicle accidents should be reported and an investigation into the cause of the accident should be carried out. In the event of a vehicle accident, the following actions should be taken:

1. Alert the Landfill Foreman of the accident.
2. If the damage to the vehicle(s) is minor, the Landfill Foreman may instruct the individual(s) involved in the accident to report to the RCMP station.
3. If the damage is major, the Landfill Foreman is to call the RCMP.
4. Secure the site for safety and for follow-up investigation.
5. Traffic is to be directed around the scene of the accident.
6. If the vehicle accident results in any injuries, the injured person(s) should be provided with any assistance required as set out in the Medical Emergencies Response Policy.
7. Assist the RCMP with any investigation that is undertaken.
8. Complete the Incident Accident Form.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Treated Wood Policy	**Page:** 1 of 1

PURPOSE:

To outline acceptance and handling of treated lumber.

POLICY:

1. Treated lumber generally includes
   - Used railway ties;
   - Used power and telephone poles; or
   - Used fence posts.
2. Acceptance of treated lumber is to be done in accordance with the contaminated solid acceptance procedures outlined in the operations procedures manual.
3. Only non-processed (or whole units that have not been cut, shredded, or chipped) will be accepted for disposal.
4. Commercial volumes of treated lumber will not be accepted for disposal, whereby a commercial volume is more than five rail ties or five fence posts, and no more than one power pole or telephone pole.
5. Treated wood is not to be deliberately burned.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Spill Contingency Policy	**Page:** 1 of 1

PURPOSE:

To establish appropriate procedures to follow in the event of a spill that occurs on the landfill site including the active operations area, storage areas, compost facility, or in buildings or parking areas. This Spill Contingency Policy shall be reviewed annually and revised as necessary to reflect changes in regulations, operations, and technology. Any proposed revisions shall be submitted to the NWB for approval.

POLICY:

1. Immediately close off and isolate (with a barricade if appropriate) the area of the spill to the public and site employees who are not directly involved in the clean-up of the spill.
2. Identify, if possible, the material involved in the spill. If the material cannot be clearly identified, take note of the nature of the material (i.e. liquid or solid, colour, odour, original container, approximate amount, presence of vapours or fumes, or any other distinguishing features).
3. Direct traffic away from the spill area.
4. The Landfill Foreman shall coordinate the clean-up of the spill.
5. Control the source of the spill first then work on containing the spill using earth berms or other appropriate means.
6. For large spills, berm drainage ditches in the vicinity of the spill to prevent release of the material off-site.
7. Recover the spilled material and contaminated soils and deposit into an appropriate container for proper disposal. **DO NOT HANDLE CHEMICALS**.
8. Conduct personal decontamination if a chemical is spilled upon a person:
   - Remove and dispose of contaminated outer coveralls or personal clothing;
   - Utilize emergency eye wash and shower station if required;
   - Re-dress in cloth coveralls or a change of clothes that is kept on hand; and
   - If contaminated clothing cannot be washed safely, discard it.
9. If uncomfortable or hazardous fumes, bioinfectious, or radioactive materials are involved, follow evacuation procedures immediately and call Department of Public Works at (867)979-5653. Explain to the emergency operator the situation, identify the material (if possible) and provide as much information about the substance as possible such as liquid, solid, colour, quantity, or odours, and the location of the material on the site.
10. If outside fuel or oil storage tanks leak, contact a vacuum truck operator to vacuum up the free liquid product and use a spill kit to clean up any residue. Oil or fuel soaked soil should be excavated and properly handled through the biodegradation facility or other proper disposal.
11. Contact the Environmental Protection Division of the Department Environment, NU at (867) 975-7700.

RESPONSIBILITIES:

1. The Director of Public Works shall be responsible for the review and update of this policy.
2. The Landfill Foreman shall be responsible for carrying out spill containment in the active landfill operating area.
3. The Superintendent shall be responsible for advising Environmental Protection Division, as necessary.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Ozone Depleting Substances Management Policy	**Page:** 1 of 1

PURPOSE:

To prevent the uncontrolled release of Ozone Depleting Substances from appliances and equipment stored at the landfill.

POLICY:

1. In this policy, the term "units" applies to all household and commercial appliances and equipment that may contain Ozone Depleting Substances (i.e. CFC's) and may include refrigerators, freezers, and air conditioning equipment, and may also include automobile air conditioners.
2. All units will be inspected prior to acceptance for storage or disposal at the landfill, and only those units that are tagged by a qualified technician indicating that the CFC's have been purged, may be accepted for storage and recycling.
3. Units that are NOT tagged by a qualified technician indicating that the ozone depleting substances are not purged, the site supervisor may:
   a) Refer the customer to a qualified technician for purging of the ozone depleting substance and tagging of the unit; or
   b) May accept the unit for storage and assess a tipping fee in accordance with the rate set out by the Superintendent for all untagged units accepted for storage at the landfill.
4. All untagged units accepted for storage at the landfill will be stored in an area separate from tagged units and will not be crushed, recycled, or disposed until they are inspected and purged by a qualified technician in accordance with the Ozone Depleting Substances Regulations and appropriately tagged.
5. Units that have been improperly deposited at the working face or at other locations at the landfill will be separated and inspected for appropriate tags and moved and stored in the appropriate area. In all cases where an untagged unit is identified, attempts will be made to identify the customer and if identified, the appropriate fee will be assessed.

RESPONSIBILITIES:

1. The Landfill Foreman will be responsible for inspecting all units delivered to the site.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Litter Control Policy	**Page:** 1 of 1

PURPOSE:
To define litter control methods and responsibilities.

POLICY:

In summary, the following litter control methods are to be followed:

- All delivered loads should be secured;
- Compact waste as soon as practical after being deposited;
- Position wind catchment fences according to the location and configuration of the working face and wind direction;
- Retrieve litter as soon as practical following high wind events;
- Collect litter twice a year, once in the spring and once in the fall, as required in the Water Licence;
- Immediately clean up and, if safe to do so, dispose of in the landfill waste dumped illegally at the entrance gates or along access roads; and
- Regularly check ditches along adjacent roads and site access roads and pick up and dispose of spilled or blown litter as required.

RESPONSIBILITIES:

1. The Landfill Foreman is responsible for controlling and litter retrieval of litter escaping from the working face and cleanup of litter on the north side along roads.
2. The Landfill Foreman is responsible for litter control and cleanup of litter in the recycling compounds.
3. The Foreman is responsible for inspecting the landfill to monitor litter control and cleanup.
4. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Last Man Out Policy	**Page:** 1 of 1

PURPOSE:

To maintain site control and the safety of site employees, customers, and visitors.

POLICY:

1. At the end of the day closure of the landfill, a "last man out" procedure shall be followed. The Landfill Foreman shall:
   a. Remain at the site until all other employees, customers, and site visitors have left;
   b. Close and lock the entrance gates;
   c. Complete a complete drive through of the recycling compounds, working face, composting area, inert disposal area, and equipment area;
   d. Check all buildings to make sure no one remains inside and to make sure all doors and windows are closed and locked; and
   e. Check the working face and inert disposal area to make sure the area is secure and that no fires or other issues are present.

2. The Landfill Foreman shall check the visitor registry to make sure all visitors have signed out.

3. Every effort will be made to make sure that no unauthorized vehicles or individuals remain at the site after it is closed for the day.

RESPONSIBILITIES:

1. The Landfill Foreman will be responsible to carry out this policy.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Key Policy	**Page:** 1 of 1

PURPOSE:

To maintain control of key distribution for the City of Iqaluit Municipal Landfill

POLICY:

1. Keys for access to the landfill will be distributed to:
   - The Landfill Foreman, and
   - The Superintendent.

RESPONSIBILITIES:

1. The Superintendent will be responsible for controlling distribution and use of keys.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Hours of Operations Policy	**Page:** 1 of 1

PURPOSE:
To control public access to the landfill is limited to a specified period of time.

POLICY:

1. The landfill gates will only be open for public access during the hours of operations as set out in this policy.
2. The hours of operations are:

Tuesday to Saturday 08:00 – 12:00 P.M. and 1:00 P.M. - 5:00 P.M.

The Landfill is closed on the following holidays:

- New Year's Day;
- Good Friday;
- Easter Monday
- Toonik Tyme Day
- Nunavut Day;
- Victoria Day;
- Canada Day;
- Civic Holiday (First Monday in August);
- Labour Day;
- Thanksgiving;
- Remembrance Day;
- Christmas Day; and
- Boxing Day.

RESPONSIBILITIES:

1. The Landfill Foreman will be responsible for opening and closing landfill gate to the prescribed hours of operations.
2. The Director of Public Works will be responsible for the reviewing and updating this policy.
3. The hours of operations will only be set by the Superintendent.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Environmental Policy	**Page:** 1 of 1

PURPOSE:
To apply "best management" practices with regards to environmental protection.

POLICY:

1. The Director of Public Works will manage the landfill using due diligence towards development and operations of the landfill in accordance with regulatory requirements and best management principles.
2. Utilities and Environment employees and Contractors will endeavour to work according to the operating principles as set out in this policy.
3. "Due diligence" is defined as "the taking of all reasonable steps as part of the due care and attention to prevent the occurrence of an accident or mishap, as well as having a contingency plan to control an incident and limit any consequential damage". This includes: policy development, checking and corrective action, and management review.
4. Best management practices include:
   a. Good housekeeping;
   b. Preventative maintenance;
   c. Inspections and record keeping;
   d. Security;
   e. Employee hiring and training;
   f. Reporting of incidents;
   g. Operations procedures;
   h. Emergency response planning;
   i. Identification and assessment of risks; and
   j. Review and corrective action.

RESPONSIBILITIES:

1. The Superintendent will be responsible to conduct, or arrange for, routine inspections of the landfill, operating procedures, and records in regards to this policy
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Empty Container Policy	**Page:** 1 of 1

PURPOSE:
To provide direction to the Landfill Foreman for acceptance and management of empty containers.

POLICY:

1. Empty containers include:
   a. 45 gal drums;
   b. Grease and oil containers; and
   c. Other industrial containers.
2. Empty containers will only be accepted if:
   a. The top of the container has been removed; and
   b. The container has not been sealed.
3. Containers will not be accepted that:
   a. Are closed and sealed; and
   b. The container holds any liquids.
4. The waste generator or hauler must provide a description of the previous contents of the container and identify if the container has been properly rinsed in accordance with the Guidelines. The Landfill Foreman may refuse acceptance of any container if the previous contents are not known or if the container has not been properly cleaned.
5. Empty containers that are recyclable will be stored in appropriate storage areas.
6. Empty containers that are not recyclable may be disposed in the landfill.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Fire Policy	**Page:** 1 of 1

PURPOSE:

To set out emergency procedures for responding to a fire.

POLICY:

1. Upon discovery of fire at the landfill, the Landfill Foreman shall call:
   - The Fire Department at (867) 979-4422 immediately to report the fire, its location, and the materials that are burning.
   - The Landfill Foreman shall call the Superintendent immediately.
   - Contact adjacent property owners, particularly if it appears the fire will go off-site.
2. Remove all operating and non-operating persons to a safe location. All non-operating persons shall be escorted to the gates, and the entrance gates are to be closed.
3. Maintain access to the site for Emergency Vehicles throughout the duration of the emergency.
4. Clear the Fire area of all persons, vehicles, and equipment with due consideration to safety.
5. For small fires (i.e. little or no flame present and capable of being extinguished by a portable fire extinguisher), if safe to do so, isolate the burning material from other waste, then extinguish or otherwise contain the fire to one area.
6. If the fire is isolated from other wastes, the fire may be extinguished by either covering it with sand or other soils, or by dousing it with water and covering it with soils.
7. If safe to do so, move flammable materials and wastes away from the fire **OR** cover these materials with sand or other soils to minimize the potential for the fire to spread to these materials.
8. **Do not bury any fire into the working face under any circumstances.**
9. Upon arrival of emergency response vehicles (Fire Truck, Ambulance) the senior staff members, e.g. Landfill Foreman, on-site shall identify themselves to the Emergency Commander and offer full assistance as requested. Once the Fire Department arrives, the Fire Commander in is full control and landfill staff takes instructions from the Fire Commander.
10. The landfill operating staff are to remain at the site unless otherwise evacuated or released by the Fire Commander.
11. Following a fire, an incident report is to be completed and an investigation into the cause of the fire is to be conducted by the Solid Waste Manager.
12. Once the fire is extinguished and it is safe to do so, the waste and debris is to be cleaned up and the site operations returned to normal conditions.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Safe Work Policy	**Page:** 1 of 1

PURPOSE:

To protect employees from flying debris, dust, heat, noise, traffic, and other potential hazards.

POLICY:

1. Employees are to be aware of safe work practices and must know how and when to use personal protective equipment.
2. Employees working at the landfill shall wear appropriate personal protective equipment for specific duties undertaken and in accordance with specific circumstances such as windy conditions, high dust conditions, or other situations that may arise.
3. Personal Protective Equipment to be worn by employees in accordance with the above includes:
    a. Steel toed safety boots (for all field duties);
    b. Safety vest (in the field when out of vehicles or landfill equipment);
    g. Hard hat (where appropriate to specific duties);
    h. Eye protection (in high wind or dusty conditions);
    i. Ear protection (when operating or working around equipment);
    j. Long pants and shirts (for all field duties); and
    k. Hat (in hot weather).
4. In the event of dirt or dust in eyes, the eye wash station at the scale house is to be used with assistance from the Landfill Foreman, if required. **If there is any doubt about debris in the eyes (i.e. metals, glass, or other materials) immediately see a Doctor.**
5. All near misses and accidents must be reported and documented on the Accident and Incident Report Form.

RESPONSIBILITIES:

1. All employees must take responsibility for their own safety and the safety of other employees, customers, and visiting pubic.
2. The Landfill Foreman shall provide input into the Policy and is responsible for enforcing the Policy.
3. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Random Load Checking Program Policy	**Page:** 1 of 2

PURPOSE:

1. To randomly inspect loads of waste being disposed at the landfill;
2. To detect hazardous or other prohibited waste material and avoid their disposal in the landfill; and
3. To identify potentially recyclable material which could be diverted from the landfill in the future.

POLICY:

1. Randomly select a load for inspection and ask the driver to stop in a designated area.
2. Record the following information on a Waste Inspection Form prior to allowing the driver to dump the load (see Waste Inspection Form):
    - Name of hauler;
    - Name of waste generator;
    - Type of waste;
    - License plate number;
    - Truck number;
    - Name of the driver; and
    - Signature of the driver.
3. Ask the driver to dump the load in the designated area. The driver is not required to stay on-site while the load is being inspected.
4. Spread out the waste, using a rake or front-end loader if required.
5. Record any potentially recyclable materials.
6. Inspect the load for hazardous or prohibited waste materials. If such materials are found, then do the following:
    - Isolate the waste and contact the Landfill Foreman if the waste material poses an immediate risk to human health or the environment;
    - Record the information on the Waste Inspection Form;
    - Take photographs of the material;
    - Attempt to confirm information on the generator of the waste;
    - Contact the hauler or generator of the waste material and require them to remove the material from the Landfill Facility;
    - If the waste materials are considered hazardous, contact the Environmental Protection Division Department of Environment at (867) 975-7700.
7. Complete and sign the Waste Inspection Form.
8. Send a letter to the generators of the recyclable materials advising that the material could be recycled in the future.

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Random Load Checking Program Policy	**Page:** 2 of 2

RESPONSIBILITIES:

Record Keeping

1. A Waste Inspection Form will be completed for each load inspected and will be kept on file at the landfill and administrative offices.
2. If hazardous waste materials are identified, the Waste Inspection Form and a summary of the action taken will be forwarded to NWB, and the Environmental Protection Division Department of Environment.
3. Photographs of hazardous waste materials will be filed with the appropriate Waste Inspection Form.

Safety Considerations

1. The Waste Inspector will wear the following safety clothing during inspections:
   - Coveralls;
   - Safety boots;
   - Gloves;
   - Safety vest;
   - Face mask as required; and
   - Eye protection.

Inspection Frequency

1. One in every 300 loads, a minimum of two loads per month will be inspected.
2. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

CITY OF CITY OF IQALUIT

	Policy No.
Facility: City of Iqaluit Municipal Landfill	**Effective Date:**
Policy: Propane Bottle Policy	**Page:** 1 of 1

PURPOSE:

To provide guidance for the acceptance and handling of propane bottles.

POLICY:

1. Propane bottles will not be accepted at the landfill unless the container has been purged or emptied of its contents and the operating valve is in an open position, or if it has been removed from the bottle.
2. If the operating valve is closed, the propane bottle will not be accepted.
3. Empty propane bottles will be stored in the designated propane bottle storage area.
4. Propane bottles will not be offered, given, or sold to any person for use, unless that person is qualified to refurbish and certify the propane bottle.
5. All valves will be removed from propane bottles for recycling.
6. Empty propane bottles with removed valves will be recycled through scrap metal dealers if possible, but will otherwise be disposed in the landfill.

RESPONSIBILITIES:

1. The Director of Public Works will be responsible for reviewing and updating this policy.

Approved By:	Date Approved:
Approved By:	Date Approved:

Iqaluit	Health and Safety Program		HSP
	Title		
	Approved By:	CAO	
	Date Approved:	3 Nov 2011	
	Date JWHSC Approved:	15 Nov 2011	Annual Review
	Revision Date:		

1. Purpose

1.1. The purpose of this program is to prevent injury/harm to all workers and citizens of the City of Iqaluit by implementing proactive inspections, hazard identification, accident investigations and a Joint Work Site Health & Safety Committee. It will also aid in reducing the accidental damage to equipment and materials used in the daily operation of our City. The goal of this program is to meet or exceed governmental legislation, recognized industry standards and work practices while working to serve the citizens of Iqaluit.

2. Scope

2.1. This program pertains to all workers of the City of Iqaluit, including visitors, contractors and sub-contractors.

3. Procedures

3.1. This program will be developed by management in conjunction with the Joint Work Site Health and Safety Committee, to meet the City of Iqaluit's Health and Safety Policy. There will be 13 main programs established to meet the Nunavut Safety Act and Regulations. These programs are:

3.1.1. Health and Safety Program - HSP
3.1.2. Health and Safety Orientation - HSO
3.1.3. Health and Safety Education & Training - HSET
3.1.4. Joint Work Site Health and Safety Committee - JWHSC
3.1.5. Workplace Inspections - WI
3.1.6. Accident Investigations - AI
3.1.7. Emergency Response Plan - ERP
3.1.8. Personal Protective Equipment - PPE
3.1.9. Prevention Maintenance Program – PMP
3.1.10. Safe Work Practices – SWP
3.1.11. High Risk Tasks - HRT
3.1.12. Health and Safety Program Audit – HSPA
3.1.13. Return to Work Program - RTW

3.2. To support these programs Safe Work Practices SWP will be developed by management again with consultation by the Joint Work Site Health and Safety Committee to define task specific responsibilities by department.

4. Roles & Responsibilities

4.1. CAO

4.1.1. Establish the City of Iqaluit Health and Safety Policy
4.1.2. Support all Programs established by departments

4.2. Directors

4.2.1. Ensure compliance with approved Prevention Programs
4.2.2. Monitor compliance through regular inspections of the workplace
4.2.3. Conduct requirements of Section 4.3 should there be no direct Manager/Supervisor in the Department
4.2.4. Discipline infractions of non-compliance

4.3. Managers/Supervisors

4.3.1. Know all Prevention Programs
4.3.2. Comply with all Prevention Program requirements
4.3.3. Train employees on the Prevention Programs
4.3.4. Develop SWP's to support the Program
4.3.5. Inspect the workplace monthly
4.3.6. Conduct a Job Hazard Analyses to control hazards
4.3.7. Discipline infractions of non-compliance
4.3.8. Recommend changes to the Programs

4.4. Workers

4.4.1. Participate in the Prevention Programs
4.4.2. Identify hazards to managers/supervisors
4.4.3. Work in accordance with legislative and city requirements
4.4.4. Recommend changes to the Programs

4.5. JWHSC

4.5.1. Review the Prevention Programs annually
4.5.2. Monitor effectiveness of Programs through inspections
4.5.3. Identify areas of improvement
4.5.4. Recommend changes to the Programs

4.6. Health & Safety Officer

4.6.1. Audit the Prevention Programs
4.6.2. Provide assistance developing SWP's
4.6.3. Provide assistance developing Job Hazard Analysis
4.6.4. Monitor legislative and industry standards to improve Programs

5. Communication

5.1. Directors shall communicate with Managers/Supervisor changes required to the Program.
5.2. Managers/Supervisors shall communicate changes of the Program to workers.
5.3. Workers shall communicate with Managers/Supervisors any required changes to the Program.

6. Training

6.1. All workers shall receive a City of Iqaluit Employee Orientation within the first 2 weeks of employment with the City of Iqaluit outlining Program areas.
6.2. All workers shall receive Departmental Orientation on work place specific Programs upon hire.
6.3. All workers shall receive training whenever new procedures/equipment has been introduced into the department.
6.4. All contractors and sub-contractors shall receive training on City of Iqaluit Programs as required.

7. Evaluation

7.1. Annually
- 7.1.1. Directors
- 7.1.2. Managers/Supervisors
- 7.1.3. JWHSC

7.2. Quarterly
- 7.2.1. Health and Safety Officer

8. Forms

8.1. As required throughout the City of Iqaluit Program.

9. Reference Material

9.1. Nunavut Safety Regulation Section 7

Iqaluit	Accident Investigation Program		AIP
	Title		
	Approved By:	CAO	
	Date Approved:	23 January 2012	
	Date JWHSC Approved:		Review
	Revision Date:		3 Years

1. Purpose

1.1. To meet legislative requirements of the Territory of Nunavut to report deaths, incidents and injuries within specified periods to the Chief Safety Officer of the WSCC.

1.2. To ensure that all incidents, injuries, near misses are reported, investigated and corrective action is taken to prevent the situation from occurring again.

2. Scope

2.1. The following incidents/injuries shall be investigated immediately by Directors/Managers/Supervisors upon notification by a worker.

2.1.1. Death

2.1.2. Incident of a Serious Nature

2.1.2.1. A major structural failure or collapse of a building, bridge, tower, crane, structure, scaffold, temporary construction support system or excavation;

2.1.2.2. An uncontrolled spill or escape of a toxic or hazardous substance;

2.1.2.3. An accidental contact with an energized electrical conductor;

2.1.2.4. A premature or accidental detonation of explosives;

2.1.2.5. A concussion, major blood loss, serious fracture, unconsciousness or amputation; and

2.1.2.6. An incident involving heavy equipment.

2.1.3. Incident Involving Non-Serious Injury

2.1.3.1. A work related injury where Medical Treatment or First Aid is required.

2.1.4. Incident with No Injury

2.1.4.1. An undesired event that under different circumstances could have resulted in an accident with injury, property damage, or loss of productivity.

3. Procedures

3.1. The following course of events is not implied to be sequential however are very important to ensure the integrity of the accident scene investigation.

3.2. **Death** – The goal of our Health and Safety Program is to avoid this circumstance at all cost. An accident causing death is a traumatic event for the worker witnessing it. First Aid and or Medical Treatment are always the first priority for the injured worker. Legal obligations after the injury may apply and therefore it is important to notify the supervisor of the accident.

3.3. Notify your supervisor. The supervisor shall then ensure all responsibilities listed in Parts 3.3.1 through 3.3.7 are completed.

3.3.1. Immediately inform the WSCC Chief Safety Officer.
3.3.2. An accident involving a motor vehicle shall be reported to the RCMP.
3.3.3. Secure the scene of the incident.
3.3.3.1. Avoid compromising the integrity of scene. This may be accomplished with barrier tape, posting workers around the scene to prevent entrance or other means necessary.
3.3.3.2. Identify potential witnesses and separate them if possible.
3.3.3.3. Contact Emergency Services (ambulance/paramedics).

3.3.4. Contact the following City of Iqaluit employees:
3.3.4.1. Chief Administration Officer(all media communication shall be disseminated through the CAO) ;
3.3.4.2. Director of Human Resources (for notification of family);
3.3.4.3. City Health and Safety Officer (shall communicate with WSCC/RCMP/Municipal Enforcement);
3.3.4.4. Joint Worksite Health and Safety Committee member; and
3.3.4.5. Department Director.

3.3.5. Conduct an Accident Investigation with assistance from the City Health and Safety Officer and Joint Worksite Health and Safety Committee.

3.3.6. Complete and submit within 3 days-WSCC Claim: Employer's Report of Fatal Injury Form.

3.3.7. Complete Accident Investigation Form AIPF-01

3.4. Incident Involving Serious Injury or Incident of a Serious Nature

3.4.1. Notify your supervisor.

3.4.2. The supervisor shall then ensure all responsibilities listed in Parts 3.4.3through 3.4.11 are completed.

3.4.3. Provide medical treatment to injured worker.

3.4.4. Provide or arrange transportation to a medical facility for an injured worker.

3.4.5. Within 24 hours submit written or oral report to the WSCC Chief Safety Officer.

3.4.6. Secure the scene of the incident.
- 3.4.6.1. Avoid compromising the integrity of scene. This may be accomplished with barrier tape, posting workers around the scene to prevent entrance or other means necessary.
- 3.4.6.2. Identify potential witnesses and separate them if possible.
- 3.4.6.3. Contact Emergency Services if required.

3.4.7. Contact the following City of Iqaluit employees:
- 3.4.7.1. Chief Administration Officer;
- 3.4.7.2. Director of Human Resources;
- 3.4.7.3. City Health and Safety Officer;
- 3.4.7.4. Joint Worksite Health and Safety Committee; and
- 3.4.7.5. Department Director.

3.4.8. Conduct an Accident Investigation with assistance from the City Health and Safety Officer.

3.4.9. Complete and submit within 3 days WSCC Claim: Employer's Report of Injury Form.

3.4.10. Provide the Worker with a WSCC Claim: Workers Report of Injury Form.

3.4.11. Complete Accident Investigation Form AIPF-01.

3.5. Incident Involving Non-Serious Injury

3.5.1. Notify your supervisor.

3.5.2. The supervisor shall then ensure all responsibilities listed in Parts 3.5.3through 3.5.12 are completed.

3.5.3. Worker shall inform Supervisor immediately of the Injury or Incident.

3.5.4. Provide medical treatment to injured worker.

3.5.5. Provide or arrange transportation to a medical facility for an injured worker.

3.5.6. Secure the scene of the incident.
- 3.5.6.1. Avoid compromising the integrity of scene. This may be accomplished with barrier tape, posting workers around the scene to prevent entrance or other means necessary.
- 3.5.6.2. Identify potential witnesses and separate them if possible.
- 3.5.6.3. Contact Emergency Services if required.

3.5.7. Contact the following City of Iqaluit employees:
- 3.5.7.1. City Health and Safety Officer;
- 3.5.7.2. Joint Worksite Health and Safety Committee; and
- 3.5.7.3. Department Director.

3.5.8. Conduct an Accident Investigation with assistance from the City Health and Safety Officer.

3.5.9. Complete and submit within 3 days WSCC Claim: Employer's Report of Injury Form.

3.5.10. Provide the Worker with a WSCC Claim: Workers Report of Injury Form.

3.5.11. Complete First Aid Record book with a First Aid Representative Signature.

3.5.12. Complete Accident Investigation Form AIPF-01 when Medical Treatment is required for the injury.

3.6. Incident with No Injury

3.6.1. Notify your supervisor.

3.6.2. The supervisor shall then ensure all responsibilities listed in Parts 3.6.3 through 3.6.6 are completed.

3.6.3. Worker shall inform Supervisor immediately of the Incident.

3.6.4. Contact the following City of Iqaluit employees:
- 3.6.4.1. City Health and Safety Officer;
- 3.6.4.2. Joint Worksite Health and Safety Committee; and
- 3.6.4.3. Department Director.

3.6.5. Conduct an Accident Investigation with assistance from the City Health and Safety Officer.

3.6.6. Complete Accident Investigation Form AIPF-01 when Incidents are assigned an Incident Rating of 1, 2 or 3.

4. Roles & Responsibilities

4.1. CAO

4.1.1. Establish the City of Iqaluit Accident Investigation Program.
4.1.2. Review annually the Accident Investigation Program.

4.2. Directors

4.2.1. Ensure investigations are conducted according to the Program.
4.2.2. Ensure corrective measures are implemented to prevent the incident/injury occurring again.
4.2.3. Ensure the WSCC Incident Reporting Responsibilities is posted in the workplace for all workers.
4.2.4. Ensure Managers/Supervisors are trained in Accident Investigation.
4.2.5. Conduct requirements of Section 4.3 should there be no direct Manager/Supervisor in the Department.
4.2.6. Encourage worker participation in the Accident Investigation Program.

4.3. Managers/Supervisors

4.3.1. Investigate all incidents/injuries reported by the worker.
4.3.2. Provide corrective measures to prevent the incident/injury occurring again.
4.3.3. Instruct all workers the importance of reporting incidents/injuries.
4.3.4. Complete all required Forms.
4.3.5. Encourage worker participation in the Accident Investigation Program.

4.4. Workers

4.4.1. Know the City of Iqaluit Accident Investigation Program.
4.4.2. Report all incidents and injuries to the Manager/Supervisor immediately.
4.4.3. Participate in investigations.

4.5. JWHSC

4.5.1. Know the Accident Investigation Program.
4.5.2. Receive training on Accident Investigation (Co-chairs).
4.5.3. Participate in Accident Investigations.
4.5.4. Review all Accident Reports.

4.6. Contractors/Visitors

4.6.1. Know the City of Iqaluit Accident Investigation Program.
4.6.2. Report all incidents and injuries to the Department Manager/Supervisor.
4.6.3. Participate in investigations.

4.7. Health and Safety Officer

4.7.1. Develop the Accident Investigation Program.
4.7.2. Provide training on Accident Investigation.
4.7.3. Assist with Accident Investigations.
4.7.4. Review all Accident Reports.
4.7.5. Report to CAO and JWHSC incidents/injuries monthly.

4.8. Training Development Officer

4.8.1. Coordinate training requirements for Directors.

5. Communication

5.1. The Accident Investigation Program shall be posted and available to all workers in the workplace.
5.2. All incidents/injuries shall be reported to the Health and Safety Officer.
5.3. Workers shall be informed of the Accident Investigation Program through the Orientation Program.
5.4. Workers shall report immediately any injury/incident to the Manager/Supervisor.

6. Training

6.1. Accident Investigation Program Training through the Orientation Program.
6.1.1. Directors
6.1.2. Managers/Supervisors
6.1.3. Workers
6.1.4. Contractors

6.2. Accident Investigation.
6.2.1. Directors

6.2.2. Managers/Supervisors
6.2.3. JWHSC Co-chairs

6.3. Refresher Training
6.3.1. Every 3 years
6.3.2. Change in the Accident Investigation Program.

7. Evaluation

7.1. Annually

7.1.1. Health and Safety Officer
7.1.2. Joint Worksite Health and Safety Committee

8. Forms

8.1. Accident Investigation Program Form AIPF-01
8.2. First Aid Log Book
8.3. WSCC Claim Employer's Report of Fatal Injury form
8.4. WSCC Claim Employer's Report of Injury form
8.5. WSCC Claim Worker's Report of Injury form

9. Reference Material

9.1. Nunavut Safety Regulation Sections 35 & 65.

Iqaluit	**Accident Investigation Program Form AIPF-01**	AIPF-01
	Title	
	Approved By:	
	Date Approved:	
	Date JWHSC Approved:	Review
	Revision Date:	3 Years

INFORMATION	***Department***				***File #***				***Report Date***			
	Location				***Date of Incident***				***Time***			
	Injury				**Damage**				**Near Miss**			
	Name				Property				Incident			
	Description of Injury				Damage Type				Cost			
	Occupation				Cost				Reported By			
	Job Experience				Estimated				Persons Involved			
					Actual				Supervisor			
	Incident Type (check)								**Contact (check)**			
	☐	Struck Against	☐	Caught On	☐	Fall on Same Level	☐	Electricity	☐	Caustics		
	☐	Struck By	☐	Caught Between	☐	Fall to Lower Level	☐	Heat	☐	Noise		
	☐	Caught In	☐	Slip	☐	Overexertion	☐	Cold	☐	Hazardous Substance		
	☐		☐		☐		☐	Radiation	☐			

RISK	**Incident Rating**			
	Severity		**Probability**	
	1	***Catastrophic*** – could cause death/major equipment loss	A	***Probable***-likely to occur soon (daily)
	2	***Critical*** – could cause severe injuries/equipment damage/environmental damage (time lost from work)	B	***Reasonable Probable***-likely to occur eventually (monthly)
	3	***Marginal***- minor injury/moderate damage/small environment impact (no time lost other than day of injury)	C	***Remote***-occur at some point (quarterly)
	4	***Negligible***- first aid treatment	D	***Extremely Remote***- unlikely to occur again (annual)
	This incident is rated as a (example-3D)			
	Any Incident Rating with a Severity Rating of 1, 2 or 3 must be investigated with the Health & Safety Officer.			

Iqaluit ᐃᖃᓗᐃᑦ	**Accident Investigation Program Form AIPF-01**		AIPF-01
	Title		
	Approved By:		
	Date Approved:		
	Date JWHSC Approved:		Review
	Revision Date:		3 Years

Description of Incident/Statement of Observer (use back of form if required)		
Name	**Signature**	**Date**

Description of Incident/Statement of Observer (use back of form if required)		
Name	**Signature**	**Date**

Iqaluit	**Accident Investigation Program Form AIPF-01**		AIPF-01
	Title		
	Approved By:		
	Date Approved:		
	Date JWHSC Approved:		Review
	Revision Date:		3 Years

INCIDENT CAUSES	***Substandard Act (check all that apply)***					
		Operating Equipment without Authority		Using Defective Equipment		Improper Lifting
		Failure to Warn		Improper Use of Equipment		Improper Position for Task
		Failure to Secure		Failure to use PPE		Servicing Equipment in Operation
		Operating at Improper Speed		Improper Loading		Horseplay
		Inoperable/Not using Safety Devices		Improper Placement		Under Influence Alcohol/Drugs
	Substandard Condition (check all that apply)					
		Operating Equipment without Authority		Inadequate Warning		Noise
		Improper Protective Equipment		Fire & Explosion Hazard		Radiation
		Defective Tools/Equip/Materials		Housekeeping		Temperature
		Congestion		Hazardous Environment		Lighting
						Ventilation
	Basic Causes (check all that apply)					
	Personal Factors					***Job Factors***
		Experience		Stress		Supervision/ Leadership
		Knowledge		Motivation		Engineering
		Training		Skill		Purchasing
						Maintenance
						Tools/Equipment
						Work Standards
						Wear and Tear
						Abuse and Misuse

Iqaluit	**Accident Investigation Program Form AIPF-01**		AIPF-01
	Title		
	Approved By:		
	Date Approved:		
	Date JWHSC Approved:		Review
	Revision Date:		3 Years

ANALYSIS OF CAUSES	***Expand on Incident Causes Identified on Page 3***

Iqaluit	**Accident Investigation Program Form AIPF-01**		AIPF-01
	Title		
	Approved By:		
	Date Approved:		
	Date JWHSC Approved:		Review
	Revision Date:		3 Years

	What must be done to prevent occurring again?	*Deadline*	*Whom*	*Completed*
CORRECTIVE ACTIONS				
	Investigators Signature	**Date**		

	Health & Safety Officer		
REVIEW			
	Signature	**Date**	

Appendix B - Forms

Northwest Territories | Nunavut | Canada

NT-NU SPILL REPORT

OIL, GASOLINE, CHEMICALS AND OTHER HAZARDOUS MATERIALS

NT-NU 24-HOUR SPILL REPORT LINE
TEL: (867) 920-8130
FAX: (867) 873-6924
EMAIL: spills@gov.nt.ca

REPORT LINE USE ONLY

A	REPORT DATE: MONTH – DAY – YEAR	REPORT TIME	☐ ORIGINAL SPILL REPORT, OR	REPORT NUMBER
B	OCCURRENCE DATE: MONTH – DAY – YEAR	OCCURRENCE TIME	☐ UPDATE # _____ TO THE ORIGINAL SPILL REPORT	____ - ____
C	LAND USE PERMIT NUMBER (IF APPLICABLE)	WATER LICENCE NUMBER (IF APPLICABLE)		
D	GEOGRAPHIC PLACE NAME OR DISTANCE AND DIRECTION FROM NAMED LOCATION	REGION ☐ NWT ☐ NUNAVUT ☐ ADJACENT JURISDICTION OR OCEAN		
E	LATITUDE DEGREES MINUTES SECONDS	LONGITUDE DEGREES MINUTES SECONDS		
F	RESPONSIBLE PARTY OR VESSEL NAME	RESPONSIBLE PARTY ADDRESS OR OFFICE LOCATION		
G	ANY CONTRACTOR INVOLVED	CONTRACTOR ADDRESS OR OFFICE LOCATION		
H	PRODUCT SPILLED	QUANTITY IN LITRES, KILOGRAMS OR CUBIC METRES	U.N. NUMBER	
	SECOND PRODUCT SPILLED (IF APPLICABLE)	QUANTITY IN LITRES, KILOGRAMS OR CUBIC METRES	U.N. NUMBER	
I	SPILL SOURCE	SPILL CAUSE	AREA OF CONTAMINATION IN SQUARE METRES	
J	FACTORS AFFECTING SPILL OR RECOVERY	DESCRIBE ANY ASSISTANCE REQUIRED	HAZARDS TO PERSONS, PROPERTY OR ENVIRONMENT	
K	ADDITIONAL INFORMATION, COMMENTS, ACTIONS PROPOSED OR TAKEN TO CONTAIN, RECOVER OR DISPOSE OF SPILLED PRODUCT AND CONTAMINATED MATERIALS			

L	REPORTED TO SPILL LINE BY	POSITION	EMPLOYER	LOCATION CALLING FROM	TELEPHONE
M	ANY ALTERNATE CONTACT	POSITION	EMPLOYER	ALTERNATE CONTACT LOCATION	ALTERNATE TELEPHONE

REPORT LINE USE ONLY

N	RECEIVED AT SPILL LINE BY	POSITION STATION OPERATOR	EMPLOYER	LOCATION CALLED YELLOWKNIFE, NT	REPORT LINE NUMBER (867) 920-8130

LEAD AGENCY ☐ EC ☐ CCG ☐ GNWT ☐ GN ☐ ILA ☐ INAC ☐ NEB ☐ TC | SIGNIFICANCE ☐ MINOR ☐ MAJOR ☐ UNKNOWN | FILE STATUS ☐ OPEN ☐ CLOSED

AGENCY	CONTACT NAME	CONTACT TIME	REMARKS
LEAD AGENCY			
FIRST SUPPORT AGENCY			
SECOND SUPPORT AGENCY			
THIRD SUPPORT AGENCY			

Step 1: Fire Hazard Assessment Checklist		
Facility: _____		Date: _____, ____
Priority for Corrective Action	# 1 high risk #2 moderate risk #3 low risk #4 no risk #5 not applicable	

Item	Identified Hazard	Status (Priority)	Safety Hazard and Location
Fire Safety			
1	Employee training		
2	Employee knowledge		
3	On-site communications		
4	Off-site communications		
5	Water supply		
6	Site security		
7	Fire safety plan		
8	Fire drills		
Storage of Materials			
1	Compressed Gases		
2	Aerosols		
3	Dangerous goods		
5	6 m clearance of stored materials. From uncontrolled grass or weeds		
6	Fire Dept. access		
7	Fencing/Security		
8	Access to water		
9	Lumber storage		
10	Wood chips, hogged materials.		
11	Used Tire Storage		
12	Compressed gases		
13	Fire Dept. Access		
14	Fire breaks		

Step 2: Fire Safety Hazard Assessment Corrective Action				
Facility:			Date	
Assessment Team			Persons	Position
Item	Priority	Recommended Action	Follow-up: Action taken Date/Time	Follow-up: By whom?
Superintendent Signature:			Date:	

Step #3	**Health and Safety Hazard Assessment Checklist**		
Facility		Date/Time:	
Priority Status	#1 very hazardous, previous accident of high potential #2 hazardous with moderate risk #3 low risk #4 O.K. #5 not applicable (N/A)		
Item #	**Identified Hazards**	**Status/Priority**	**Safety Hazard and Location**
1	Housekeeping		
2	Material Storage		
3	Waste disposal		
4	Lighting		
5	Ventilation		
6	Extreme Temperature		
7	Radiation exposure		
8	Gas (toxic or non-life supporting)		
9	Flammables (Fire/Explosion)		
10	Dangerous Pressure		
11	Chemicals		
12	Hazardous Materials (WHMIS)		
13	High Risk Positioning		
14	Electrical Hazards		
15	Overhead Hazards		
16	Underground Hazards		
17	Confined Space Entry		
18	Excavations		
19	Restricted Access/Egress		

Step #3	**Health and Safety Hazard Assessment Checklist**		
Facility		Date/Time:	
Priority Status	#1 very hazardous, previous accident of high potential #2 hazardous with moderate risk #3 low risk #4 O.K. #5 not applicable (N/A)		
Item #	**Identified Hazards**	**Status/Priority**	**Safety Hazard and Location**
20	Ladders		
21	Work at Heights		
23	Work over water		
24	Major lifts (hoisting)		
25	Vehicles		
26	Mobile equipment		
27	High traffic		
28	Power tools		
29	Permits		
30	Communications		
31	First Aid		
32	Personal Protection Equipment		
33	Other items		
Superintendent Signature:			Date:

CITY OF CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
ACCIDENT/NEAR MISS REPORT

Incident Date: _____ Time: _____

Location:
_____
_____

Name and Position of Person Making Report _____

Name of individual(s) involved:
_____
_____

Drivers License No.(s) if required _____

Individual or Company _____ Phone No. _____

Did the Incident Result in Personal Injury? Yes _____ No _____

Injury report attached Yes _____ No _____
(i.e. Worker's Safety and Compensation Commission form or other applicable form)

Did the incident cause damage to Landfill or other property? Yes _____ No _____

Who investigated the Incident?

Supervisor _____ RCMP _____ Special Committee _____ HS&S _____

Contact Person(s) _____

Details of Equipment/Property Damage if Applicable

Damage was to: Vehicle Equipment Property

Description:

Unit No. Year Make Model

_____

_____

_____

Estimated Value of Vehicle/Equipment/Property _____

Estimated Damage to Vehicle/Equipment/Property _____

Description of Incident (use attachment if necessary)

Incident Cause (use attachment if necessary)

Sketch of Incident Where Applicable (use attachment if necessary)

Recommendation to Prevent Re-occurrence (use attachment if necessary)

Comments (use attachment if necessary)

Name: _____ Signature: _____

Report Date _____

Distribution List:

CITY OF CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
RANDOM LOAD VISUAL INSPECTION REPORT

Date: Time _____ a.m. /p.m.
Hauler _____
Vehicle Description _____
General Description of the Waste ____

Inspection Conducted by _____
Vehicle Operator _____
Source of the Waste _____
_____

Composition	Estimated Percent of Total Volume	Actions or Follow-up Taken
Food Waste		
Cardboard		
Paper Products		
Plastics		
Textiles/Rubber/Leather		
Metals		
Ceramics/Bricks		
Dirt and rocks		
Ashes		
Yard wastes		
Wood wastes		
Glass		
Tires		
Drywall		
Oils or greases		
Glycol		
Paints/Solvents		
Pesticides		
Cleaning Products		
Ozone Depleting Substances		
Electrical Equipment		
Radio-Active Materials		
Other (NOTE TYPE)		

CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
VISITOR LOG

Date	Name	Representing	Time In	Time Out	Signature	Reason for Visit

CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
MONTHLY SITE OPERATIONS INSPECTION

Date: _____ Inspector: _____

A: Acceptable, U: Unacceptable

No	Item	A	U	COMMENTS
1.0	**PERMITS AND APPROVALS**			
1.1	Municipal Development Permit			
1.2	Land Titles, Lease Agreements			
1.3	SAHTU Land and Water Board Approvals			
1.4	Other			
2.0	**RECORDS**			
2.1	Survey and Site Plans			
2.2	Waste Volumes			
2.3	Special Waste Records			
2.4	Daily Operating Logs			
2.5	Monitoring Reports			
3.0	**PERSONNEL TRAINING AND CERTIFICATION**			
3.1	Landfill Foreman			
3.2	First Aid			
3.3	Work Place Safety (OH&S)			
3.4	WHMIS			
3.5	Other			
4.0	**DESIGN AND OPERATIONS AND MAINTENANCE PLAN**			
4.1	Site Development Plan current			
4.2	Operations Procedures & Policies Current			
4.3	Construction/As-built records			
5.0	**PERSONNEL, OPERATING EQUIPMENT AND FACILITIES**			
5.1	Landfill Foreman			
5.2	Support Personnel			
5.3	Staff Facilities			
5.4	Equipment Facilities			
5.5	Communication equipment			
5.6	Fuel Storage			

No	Item	A	U	COMMENTS
6.0	**ENTRANCE AND ROADWAYS**			
6.1	Site Appearance			
6.2	Entrance Road			
6.3	On-site Access Roads			
6.4	Road Surfacing			
7.0	**SITE DEVELOPMENT**			
7.1	Construction			
7.2	Cover Soils			
7.3	Borrow Areas			
7.4	Topsoil/Subsoil Salvaged/Stockpiled			
8.0	**ACTIVE WORKING FACE**			
8.1	Vehicle Staging/Safety			
8.2	Working Face			
8.3	Waste Compaction Density			
8.4	Cover Frequency			
8.5	Surface Water Controls			
8.6	Litter Controls			
8.7	Other			
9.0	**INACTIVE SLOPES**			
9.1	Intermediate Cover (300 mm)			
9.2	Vegetation Cover			
9.3	Drainage and Grading			
9.4	Erosion Controls			
10.0	**COMPLETED AREAS**			
10.1	1000 mm Compacted Shale Layer			
10.2	150 mm Topsoil Layer			
11.0	**SURFACE WATER MANAGEMENT**			
11.1	Working face controls			

No	Item	A	U	COMMENTS
12.0	**ENVIRONMENTAL MONITORING AND CONTROLS**			
12.1	Groundwater Monitoring Annual Report on file Wells protected and secure			
12.2	Litter Management			
12.3	Animal Management			
12.4	Dust Management			
13.0	**CONTROLLED BURNING AREA**			
13.1	Materials accepted			
13.2	Site maintenance			
13.3	Burning controls			
13.4	Notification to Department of Environment and Natural Resources Northwest Territories, Neighbours, Fire Dept.			
14.0	**RECYCLING FACILITIES**			
14.1	Tires			
14.2	Metals			
14.3	Appliances			
14.4	Batteries			
14.5	Plastics			
15.0	**SAFETY**			
15.1	Employee Safety Practices/Issues			
15.2	Customer Safety Practices/Issues			
15.3	Equipment Backup Alarms			
15.4	Documentation			
16.0	**EMERGENCY RESPONSE**			
16.1	Medical Emergency Response			
16.2	Fire Response			
16.3	Environmental Response			

CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
DAILY OPERATIONS LOG

DATE: Day _____ Month _____ Year _____

WEATHER: Precipitation _____ mm Temp. _____ °C Wind : _____ km from _____

DAILY WASTE RECORD:

Received (in-bound) _____ m3
Recycled (out-bound) _____ m3
Compost Materials _____ m3
Clean Wood Materials _____ m3

STAFF:

Landfill Foreman Start: _____ Leave: _____

EQUIPMENT:

Compactor Hours: _____ Activity: _____
Hours: _____ Activity: _____

	Activities	Comments
SITE MAINTENANCE: (i.e. litter, fences, roads, other)		
CONTROLLED BURN:	Time start:	Time end:
SITE INSPECTIONS:	Observations	Action Taken or Required
Litter		
Surface Water		
Intermediate Cover		
Final Cover		
Compaction		

MONITORING:

Groundwater By _____ Record _____

SITE MAINTENANCE: _____

OTHER: _____
(Use back of form to note other activities.)

CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
WASTE SCREENING FORM

GENERAL INFORMATION

Date and Time:
Transporter Name:
License Plate No.:
Source of Waste:
Transporters Waste Description:

WASTE INSPECTION OBSERVATION (Completed by Landfill Personnel)

Observation	Yes or No	If yes, explain
Hazardous Waste Labels or Placards		
PCB Transformers, Labels or Placards		
Unrinsed Pesticide Containers		
Bulk or Containerized Liquids		
Free Liquids Present (i.e. oil)		
Sludges, Pastes or Slurries		
Powders, Dust, Smoke or Vapours		
Petroleum Odours		
Lead-Acid Batteries		
Unusual Odours		
Cylinders		
Paint		
Freon Items (fridge, freezer)		
Metal		
Wood (for the burn pile)		
E-Waste		
Other Suspicious Items		
Waste Accepted		

If waste was rejected, explain why: _____

What happened to rejected waste: _____

Signature of Landfill Personnel **Date**

CITY OF IQALUIT
CITY OF IQALUIT MUNICIPAL LANDFILL
HAZARDOUS MATERIAL LOAD CHECK FORM

Location _____

Date _____

Time _____

Vehicle Description & I.D. _____

Vehicle Operator _____

Waste Source _____

The following noteworthy items were found during this inspection:

Material Description	Container (i.e. Drum)	Quantity (i.e. kg/litre)	Remove to (Location)	Removed by (Name)

Comments and follow-up:

_____

_____

_____

Landfill Foreman's contacted: Time _____ Date _____

Name of person conducting inspection _____

Appendix C - Guideline for the General Management of Hazardous Waste in Nunavut

Environmental Guideline for the

General Management of Hazardous Waste

Department of Environment
Government of Nunavut

GUIDELINE: GENERAL MANAGEMENT OF HAZARDOUS WASTE

Original: April 1999
Revised: January 2002
April 2010
October 2010

This Guideline has been prepared by the Department of Environment's Environmental Protection Division and approved by the Minister of Environment under the authority of Section 2.2 of the *Environmental Protection Act.*

This Guideline is not an official statement of the law and is provided for guidance only. Its intent is to increase the awareness and understanding of the risks and hazards associated with hazardous waste and to assist in its proper management. This Guideline does not replace the need for the owner or person in charge, management or control of a hazardous waste to comply with all applicable legislation and to consult with Nunavut's Department of Environment, other regulatory authorities and qualified persons with expertise in the management of hazardous waste.

Copies of this Guideline are available upon request from:

Department of Environment
Government of Nunavut
P.O. Box 1000, Station 1360, Iqaluit, NU, X0A 0H0
Electronic version of the Guideline is available at http://env.gov.nu.ca/programareas/environmentprotection

Cover Photos: E. Paquin

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Introduction

'Waste' is a term used to describe materials that are no longer wanted or are unusable for their original intended purpose. Many different types of waste are generated each day in Nunavut by industry and small business, hospitals and health centers, schools and individuals during the normal course of carrying out daily activities. Some types of waste pose greater risks than others because of their chemical, physical and biological properties. These wastes are generally referred to as being a 'hazardous waste'. Examples of hazardous waste include discarded paint, used solvents, motor and lubricating oil, cleaning compounds, certain building construction and demolition waste and products with an expired shelf life. They will generally exhibit one or more of the following characteristics - ignitable (i.e. flammable), reactive, corrosive or toxic. Hazardous waste often requires that specific management measures be taken to ensure the health and safety of the environment, workers and the general public.

The purpose of the Environmental Guideline for the General Management of Hazardous Waste (the Guideline) is to ensure the safe, effective and efficient management of hazardous waste in Nunavut. It provides information to generators, carriers and receivers of hazardous waste on its hazards, how best to reduce or eliminate the effects it can have on the environment, worker and public safety and guidance on its storage, registration and transportation.

The *Environmental Protection Act* enables the Government of Nunavut to implement measures that preserve, protect and enhance the quality of the environment. Section 2.2 of the *Act* provides the Minister with authority to develop, coordinate, and administer the Guideline.

The Guideline is not an official statement of the law. For further information and guidance, the owner or person in charge, management or control of a hazardous waste is encouraged to review all applicable legislation and consult the Department of Environment, other regulatory agencies or qualified persons with expertise in hazardous waste management.

1.1 Definitions

Carrier	A person who accepts hazardous waste for transportation or transports hazardous waste, whether or not for hire or reward. A carrier is also referred to as a transporter of hazardous waste.
Commercial	Actions undertaken for hire or reward.
Commissioner's Land	Lands that have been transferred by Order-in-Council to the Government of Nunavut. This includes roadways and land subject to block land transfers. Most Commissioner's Land is located within municipalities.
Consignee	A person to whom hazardous waste is being or is intended to be transported. A consignee is also referred to as a receiver of hazardous waste.

Consignor	A person who has possession of hazardous waste immediately before it is transported. A consignor may also be a generator of hazardous waste.
Contaminant	Any noise, heat, vibration or substance and includes such other substance as the Minister may prescribe that, where discharged into the environment, (a) endangers the health, safety or welfare of persons, (b) interferes or is likely to interfere with normal enjoyment of life or property, (c) endangers the health of animal life, or (d) causes or is likely to cause damage to plant life or to property.
Dangerous Good	Any product, substance or organism included by its nature or by the *Transportation of Dangerous Goods Regulations* in any of the classes listed in the Schedule provided in the *Transportation of Dangerous Goods Act* (Canada).
Empty Container	A container that previously held a hazardous waste and has been emptied to the greatest extent practical or triple rinsed with an appropriate cleaning agent. This does not include containers that previously contained mercury or Class 2.3, 5.1 or 6.1 materials.
Environment	Means the components of the Earth and includes (a) air, land and water, (b) all layers of the atmosphere, (c) all organic and inorganic matter and living organisms, and (d) the interacting natural systems that include components referred to in paragraphs (a) to (c) above.
Generator	The owner or person in charge, management or control of a hazardous waste at the time it is generated or a facility that generates a hazardous waste. A generator may also be a consignor of hazardous waste.
Hazardous Waste	A contaminant that is a dangerous good and is no longer wanted or is unusable for its original intended purpose and is intended for storage, recycling, treatment or disposal. A hazardous waste does not include a contaminant that is (a) household in origin; (b) exempted as a small quantity; (c) returned directly to a manufacturer or supplier of the product, substance or organism for reprocessing, repackaging or resale for any reason; (d) an empty container; or (e) intended for disposal in a landfill or a sewage treatment facility and meets the applicable standards set out in the Environmental Guideline for Industrial Waste Discharges.

Hazardous Waste Management Facility	A commercial facility used for the collection, storage, transfer, treatment, recycling or disposal of a hazardous waste. For clarity, a hazardous waste management facility does not include a municipal landfill or sewage lagoon.
Incompatible Hazardous Waste	A hazardous waste that, when in contact with another substance or hazardous waste under normal circumstances, reacts to produce heat, gas, fire, explosion or a corrosive or toxic substance.
Landfilling	The intentional depositing or placement of waste in or on land for the purposes of disposal.
Long-term Storage	The storage of hazardous waste for a period of 180 days or more.
Manifest	The manifest as set out in Schedule IX to the *Export and Import of Hazardous Waste and Hazardous Recyclables Regulations* under the *Canadian Environmental Protection Act* (Canada).
Minister	The Minister of Environment of the Government of Nunavut.
Qualified Person	A person who has an appropriate level of knowledge and experience in all relevant aspects of hazardous waste management.
Receiver	A person to whom hazardous waste is being or is intended to be transported. A receiver is also referred to as a consignee of hazardous waste.
Responsible Party	The owner or person in charge, management or control of the hazardous waste.
Small Quantity	Hazardous waste that is generated in an amount that is less than five kilograms per month if a solid or less than five litres per month if a liquid, and where the total quantity accumulated at any one time does not exceed five kilograms or five litres. This does not include hazardous waste that is mercury or Class 2.3, 5.1 or 6.1 materials. These wastes must be generated in an amount that is less than one kilogram per month if a solid or less than one litre per month if a liquid, and where the total quantity accumulated at any one time does not exceed one kilogram or one litre.
Transport Authority	The statute and regulations controlling the management of hazardous waste under that mode of transport. These include (a) Road and Rail - *Transportation of Dangerous Goods Act* (Canada) and *Regulations; Interprovincial Movement of Hazardous Waste Regulations* (CEPA) and *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations* (CEPA). (b) Air – *International Air Transport Association (IATA) Dangerous Goods Regulations* and *International Civil Aviation Organization* (ICAO) *Technical Instructions;* and

(c) Marine – *International Maritime Dangerous Goods Code* (IMDG).

Transfer	The temporary storage of hazardous waste for a period of 179 days or less for the purpose of changing from one vehicle or means of transportation to another.
Transporter	A person who accepts hazardous waste for transportation or transports hazardous waste, whether or not for hire or reward. A transporter is also referred to as a carrier of hazardous waste.
Waste Audit	An inventory or study of the amount and type of waste that is produced at a location.

1.2 Roles and Responsibilities

1.2.1 Environmental Protection Division

The Environmental Protection Division of the Department of Environment is the key environmental agency responsible for ensuring the proper management of hazardous waste and other contaminants on Commissioner's Land. Authority is derived from the *Environmental Protection Act*, which prohibits the discharge of contaminants to the environment and enables the Minister to undertake actions to ensure appropriate management measures are in place. Although programs and services are applied primarily to activities taking place on Commissioner's and municipal lands and to Government of Nunavut undertakings, the *Environmental Protection Act* may be applied to the whole of the territory where other controlling legislation, standards and guidelines do not exist. A complete listing of relevant legislation and guidelines can be obtained by contacting the Department of Environment or by visiting the web site at http://env.gov.nu.ca/programareas/environmentprotection.

The Department of Environment will provide advice and guidance on the proper management of hazardous waste. However, it remains the responsibility of the owner or person in charge, management or control of the hazardous waste to ensure compliance with all applicable statutes, regulations, standards, guidelines and local by-laws.

1.2.2 Generators of Hazardous Waste

The generator is the owner or person in charge, management or control of the hazardous waste at the time it is produced or of the facility that produces the hazardous waste. The generator is responsible for any and all hazardous waste produced and must ensure the hazardous waste is properly and safely managed from the time it is generated to its final disposal. This is referred to as managing the waste from cradle-to-grave.

Contractors may manage hazardous waste on behalf of the generator. However, the generator remains responsible for determining whether the waste is hazardous and ensuring the method of management complies with all applicable statutes, regulations, standards, guidelines and local by-laws. If the contractor does not comply with the requirements of the *Environmental Protection Act* and is charged with a violation while managing the waste, the generator may also be held liable.

The basic responsibilities of a hazardous waste generator in Nunavut are:

- Registering with the Department of Environment as a generator of hazardous waste.
- Registering the facility with the Department of Environment as a hazardous waste management facility where the facility is used for commercial purposes and is intended for the storage of hazardous waste for a period of 180 days or more, where stored quantities exceed the criteria set out in Appendix 8 or where hazardous waste is recycled, treated or disposed of in quantities in any single month that exceed a 'small quantity'.
- Classifying and labeling hazardous waste in accordance with the Transport Authority.
- Managing the hazardous waste in accordance with the Guideline, *Environmental Protection Act, Fire Prevention Act*, *Safety Act, Public Health Act* and all other applicable statutes, regulations, standards, guidelines and local by-laws.
- Reusing, recycling, treating or disposing of the hazardous waste in a proper and safe manner.
- Where the hazardous waste is transported off-site, completing Part A of the waste manifest form and retaining a copy for two years, using a registered hazardous waste carrier to transport the waste and sending the waste to a registered receiver or hazardous waste management facility.
- Ensuring staff are trained and qualified to safely handle the hazardous waste.
- Filing a spill contingency plan with the Minister where stored quantities of hazardous waste exceed the criteria set out in Schedule A of the *Spill Contingency Planning and Reporting Regulations*.
- Reporting any spill immediately to the NWT/Nunavut Spill Report Line at (867) 920-8130.

Further information and application forms for registering as a generator or a hazardous waste management facility are available from the Department of Environment. Refer to sections 3.2.1 and 3.2.2 and Appendices 4 and 7 for further information.

1.2.3 Carriers of Hazardous Waste

Hazardous waste must be transported in accordance with the appropriate Transport Authority: Road and Rail - *Transportation of Dangerous Goods Act* (Canada) and *Regulations, Interprovincial Movement of Hazardous Waste Regulations* (CEPA) and *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations* (CEPA)*;* Air – *International Air Transport Association (IATA) Dangerous Goods Regulations* and *International Civil Aviation Organization* (ICAO) *Technical Instructions;* and Marine – *International Maritime Dangerous Goods Code* (IMDG).

Carriers operating in Nunavut must be registered with the Department of Environment before transporting hazardous waste. Other basic responsibilities of hazardous waste carriers are:

- Placarding and labeling all transport vehicles and containers in accordance with the appropriate Transport Authority.
- Completing Part B of the waste manifest form and retaining a copy for two years.
- Accepting hazardous waste only from registered generators and safely transporting hazardous waste only to a registered receiver or hazardous waste management facility.
- Ensuring staff are trained and qualified to safely transport hazardous waste.
- Reporting any spill immediately to the NWT/Nunavut Spill Report Line at (867) 920-8130.

Further information and application forms for registering as a hazardous waste carrier are available from the Department of Environment. Refer to section 3.2.1 and Appendix 5 for further information.

1.2.4 Receivers of Hazardous Waste

Any person receiving or accepting hazardous waste in Nunavut for the purpose of storage, transfer, reuse, recycling, treatment or disposal must be registered with the Department of Environment as a hazardous waste receiver. The facility must also be registered as a hazardous waste management facility where it is used for commercial purposes and is used to store hazardous waste for a period of 180 days or more, store quantities that exceed the criteria set out in Appendix 8 or hazardous waste is recycled, treated or disposed of in quantities in any single month that exceed a 'small quantity'. Other basic responsibilities of hazardous waste receivers in Nunavut are:

- Handling and storing the hazardous waste in accordance with the Guideline, *Environmental Protection Act, Fire Prevention Act*, *Safety Act, Public Health Act* and all other applicable statutes, regulations, standards, guidelines and local by-laws.
- Reusing, recycling, treating or disposing of the hazardous waste in a proper and safe manner.
- Completing Part C of the waste manifest form and retaining a copy for two years.
- Accepting hazardous waste only from registered generators and carriers.
- Ensuring staff are trained and qualified to safely handle hazardous waste.
- Filing a spill contingency plan with the Minister where stored quantities of hazardous waste exceed the criteria set out in Schedule A of the *Spill Contingency Planning and Reporting Regulations*.
- Reporting any spill immediately to the NWT/Nunavut Spill Report Line at (867) 920-8130.

Further information and application forms for registering as a receiver or hazardous waste management facility are available from the Department of Environment. Refer to sections 3.2.1 and 3.2.2 and Appendices 6 and 7 for further information.

1.2.5 Other Regulatory Agencies

Other regulatory agencies may have to be consulted regarding the management of hazardous waste as there may be other environmental or public and worker health and safety issues to consider. Some of the other agencies include:

Department of Economic Development and Transportation

The Motor Vehicles Division is responsible for ensuring the safe transport of hazardous waste and other dangerous goods by road through administration of the *Transportation of Dangerous Goods Act*. The Department is also responsible under the *Motor Vehicles Act* for driver licensing and various other vehicle and load safety matters.

Workers' Safety and Compensation Commission

The Workers' Safety and Compensation Commission is responsible for promoting and regulating worker and workplace health and safety in Nunavut. The Commission derives its authority from the *Workers' Compensation Act* and *Safety Act* which require an employer to maintain a safe workplace and ensure the safety and well being of workers. The Workplace Hazardous Materials Information System, or WHMIS, requires information be provided to workers on the safe use of any hazardous material used in the workplace. All hazardous waste generators, carriers and receivers should consult the Prevention Services Division for further information and guidance.

Department of Community and Government Services

The Department of Community and Government Services is responsible under the *Commissioners' Lands Act* for the issuance of land leases, reserves, licenses and permits on Commissioner's Lands. The Department, in cooperation with communities, is also responsible for the planning and funding of municipal solid waste and sewage disposal facilities in most Nunavut communities. Emergency planning responsibilities under the *Emergency Measures Act* include developing territorial emergency response plans, coordinating emergency operations at the territorial and regional levels and supporting community emergency response operations.

The Office of the Fire Marshal is responsible for ensuring the safe storage, handling and use of flammable and combustible liquids and materials. The Office of the Fire Marshal derives its authority from the *Fire Prevention Act*, National Fire Code and National Building Code.

Department of Health and Social Services

Activities related to the generation, storage, transportation, treatment and disposal of hazardous waste may have an impact on public health. The Office of the Chief Medical Officer of Health and Regional Environmental Health Officers should be consulted regarding legislated requirements under the *Public Health Act.*

Environment Canada

Environment Canada is responsible under the *Canadian Environmental Protection Act* for ensuring the safe management of designated hazardous waste at federal facilities and on federal lands. The management, disposal and export of polychlorinated biphenyl (PCB) waste is controlled under the *PCB Regulations*, the *Federal Mobile PCB Treatment and Destruction Regulations* and the *PCB Waste Export Regulations*. The interprovincial and international transport of waste is controlled under the *Interprovincial Movement of Hazardous Waste Regulations* and the *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations*. Environment Canada is also responsible for administering the pollution prevention provisions of the federal *Fisheries Act*.

Indian and Northern Affairs Canada

Indian and Northern Affairs Canada is responsible under the *Territorial Lands Act* and *Nunavut Waters and Nunavut Surface Rights Tribunal Act* for the management of federal lands and waters in Nunavut, including the impact hazardous waste may have on the quality of these lands and waters.

Natural Resources Canada

The *Explosives Act* provides Natural Resources Canada with authority to manage explosives in Canada, including waste explosives. The Canadian Nuclear Safety Commission, which reports to Parliament through the Minister of Natural Resources, administers the safe handling and disposal of radioactive materials and licenses institutions and companies to possess and use radioactive materials under the *Nuclear Safety and Control Act* and *Nuclear Liability Act.*

Local Municipal Governments

The role of municipal governments is important in the proper local management of hazardous waste. Under the Nunavut Land Claim Agreement, municipalities are entitled to control their own municipal disposal sites. Hazardous waste may be deposited into municipal landfill sites and sewage treatment facilities only with the consent of the local government. Local environmental and safety standards are determined, in part, by how the property is designated under municipal government development plans (i.e. land use zoning). The local fire department may also be called upon if a fire or other public safety issue is identified.

Co-management Boards and Agencies

Co-management boards and agencies established under the Nunavut Land Claim Agreement have broad authority for land use planning, impact assessment and the administration of land and water. Activities involving hazardous waste may be controlled through the setting of terms and conditions in plans, licenses and permits issued by the Nunavut Water Board and other co-management boards and agencies.

Appendix 3 provides further assistance in determining the primary regulatory agency contact for managing hazardous waste in Nunavut.

Appendix 11 provides mailing addresses, phone and fax numbers for each of the regulatory agencies.

Management of Hazardous Waste

2.1 What is Hazardous Waste?

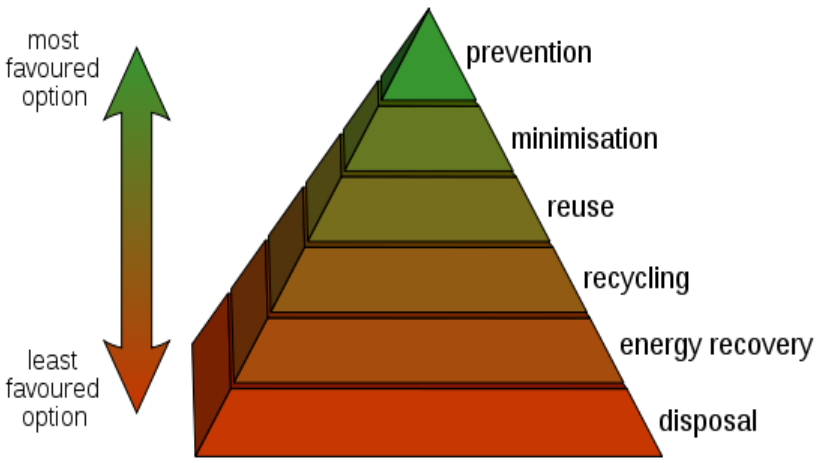
Hazardous waste is unwanted material or products that can cause illness or death to people, plants and animals. It may be a liquid, solid, sludge or gas and contain chemicals, heavy metals, radioactives, infectious organisms or other toxic substances. It may be a single product or a combination of many hazardous and non-hazardous materials (i.e. mixed waste). Its harmful effects may exist for a relatively short period of time (i.e. oil-based paint before hardening) or continue for hundreds of years. It can persist in soil, water and sediment (i.e. radioactive materials) or bioaccumulate in plants and animals (i.e. mercury, PCBs).

Hazardous waste is generated by everybody. Households commonly generate unwanted gasoline, brake and windshield wiper fluid, cleaning supplies, paints and paint thinners, lead acid batteries, used computer equipment and construction materials (i.e. asbestos), pesticides and others. Hospitals and nursing stations generate unwanted needles and waste human tissue, body fluids and biotic cultures. Business and industry generate many different types of hazardous waste including used motor and lubricating oil, cleaning solvent, drilling fluid and cuttings and mine tailings.

2.2 Waste Management

Proper waste management simply makes good sense. Minimizing or eliminating the generation of hazardous and other waste helps to reduce the hazards and costs associated with its handling, storage, transport, recycling, treatment and disposal. It also reduces the impacts waste could have on the environment, human and worker health and safety and reduces the global emission of greenhouse gases by minimizing the use of raw materials. Another term commonly used to describe activities that reduce the amount of material entering a waste stream or being released to the environment is ‘pollution prevention’.

Once a waste is created, the generator is responsible for its safe management from cradle-to-grave. Waste generators can prevent pollution and reduce costs by implementing various waste reduction, reuse and recycling programs through changes to operational procedures, maintenance practices and raw material use. Treating and disposing of waste either locally or outside of Nunavut should be considered only if reuse and recycling options are not available or practical.



2.2.1 Reduce and Minimize – the first option

Using raw materials efficiently and reducing the amount of waste generated is the first and most important step in effective waste management. Both environmentally and economically, consuming less is the most fundamental and effective step to reducing waste.

A waste audit should be undertaken to inventory and study the waste produced at a location or business. The audit should identify the type and amount of waste being generated, the costs of current management methods including handling, storage, treatment, transport and disposal, and examine opportunities and set targets for reducing or reusing waste. These opportunities include awareness and education, the substitution or reduction of purchased raw materials, production redesign, process changes and improved maintenance activities. Other opportunities include purchasing products that are durable or are manufactured from environmentally-friendly materials (i.e. biodegradable or post-consumer materials), avoiding products that are designed for single or short life usage and buying only the quantity that is needed. Effective communications is critical to the success of any waste reduction program.

2.2.2 Reuse and Recycle

Even with effective waste reduction measures in place there will be waste generated. Reusing the waste product for a different but related purpose (reuse) or producing a new product from the original material (recycle) is an effective way to reduce the volume of waste. The waste audit should identify whether opportunities are available for reusing or recycling waste within the generating facility. Alternatively, other local or distant users may be found to reuse or recycle the waste that would otherwise require treatment or disposal.

The Department of Environment encourages the reuse and recycling of hazardous and other waste in the following ways:

- Local reuse and recycle programs are available in various communities for some types of hazardous waste including used oil and waste fuel. Generators should contact the Department of Environment or local municipal government for the names of registered waste receivers or other opportunities to reuse or recycle wastes locally.
- Waste exchanges and associations offer opportunities for waste generators to transfer unwanted, overstocked, obsolete, damaged, contaminated and post-dated material to another person or company that can use it. In some cases, the receiving company will purchase the waste from the generator. Appendix 10 provides a listing of several waste exchanges and associations in Canada.

2.2.3 Treatment and Disposal in Nunavut

Treatment and disposal of a hazardous waste is the last step in effective waste management and should be undertaken only after all other practical reuse and recycle options have been examined.

Treatment covers a broad spectrum of activities. It includes any method, technique or process that will change the physical, chemical or biological character or composition of a hazardous waste so as to reduce its volume, neutralize or make the waste less hazardous and make it safer to transport or store

prior to its disposal. In some cases, more than one process may be required to treat the waste. Facilities in Nunavut at which hazardous waste is stored, treated, recycled or disposed of for commercial purposes must be registered as a hazardous waste management facility. The owner or operator of a facility should refer to section 3.2.2 and Appendix 7 for further information.

It is a contravention of the *Environmental Protection Act* for hazardous waste to be abandoned or disposed of on land or into water in Nunavut. Although a detailed discussion on specific hazardous waste disposal methods is beyond the scope of the Guideline, the following are general points for consideration:

- Hazardous waste must not be mixed or diluted with another substance, or divided into smaller quantities, simply to avoid meeting the definition of a hazardous waste.
- The generator is responsible for determining how hazardous waste can be safely disposed of and to comply with all applicable statutes, regulations, standards, guidelines and local by-laws. The Department of Environment will provide advice and guidance on the management of hazardous waste. Other sources of information and assistance include:
    - Manufacturer or distributor of the new product;
    - Manufacturer's Material Safety Data Sheets (MSDS); and
    - Waste exchanges and associations, other regulatory authorities, waste management consultants and other qualified persons with expertise in the management of hazardous waste.
- Hazardous waste that meets standards set out in the Environmental Guideline for Industrial Waste Discharges may be directed to municipal landfills and sewage treatment systems for disposal. The local municipal government must be consulted and consent to the use of their facility prior to the waste being disposed. Waste that does not meet the standards set out in the Environmental Guideline for Industrial Waste Discharges must be treated prior to disposal or transported to a facility that is registered to accept the waste.
- The open burning of hazardous waste is not an acceptable practice as toxic substances may be released into the atmosphere.
- Incompatible hazardous waste should not be mixed, combined or stored together in the same container as new hazards may be created. Combining or mixing one waste with another waste may also prevent its reuse or recycling and increase disposal costs.
- Containers that previously held a hazardous waste must be emptied to the greatest extent practical or triple rinsed with an appropriate cleaning agent prior to disposal. The rinsings must then also be managed according to their waste characteristics. Cleaned containers should be rendered unusable by puncturing or crushing prior to disposal to prevent their reuse. This is especially important for containers that could be reused for water or food storage.

The Department of Environment will consider alternate hazardous waste management and disposal measures that provide an equivalent level of environmental protection to those identified in this Guideline.

2.2.4 Treatment and Disposal Outside Nunavut

Hazardous waste can be sent to a receiver or hazardous waste management facility located outside of Nunavut only where the receiver or facility has been registered in the receiving province or territory to

accept that waste. The generator must comply with all applicable statutes, regulations, standards, guidelines and local by-laws of the receiving jurisdiction.

Within Canada, Environment Canada monitors and controls the interprovincial movement of hazardous waste under the *Interprovincial Movement of Hazardous Waste Regulations*. Waste manifests must accompany each shipment of waste in accordance with the Transport Authorities' requirements. Generators and carriers should refer to section 3.3 of the Guideline for additional information on transport and waste manifest requirements.

The international movement of hazardous waste is controlled under the Basel Convention on the Control of Transboundary Movements of Hazardous Wastes and their Disposal. Known simply as the Basel Convention, it is an international treaty to control and reduce the transfer of hazardous waste from developed to less developed countries. Environment Canada monitors and controls the international movement of hazardous waste under the *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations*.

A listing of Canadian waste management facilities may be obtained by contacting the waste exchanges and other organizations listed in Appendix 10.

General Requirements

Hazardous waste is classified using the system developed under the *Transportation of Dangerous Goods Act (Canada)*. Wastes are categorized into one of nine classes according to their chemical, physical or biological properties. Each waste, or group of similar wastes, is then identified using a specific 'UN' number assigned under the *Transportation of Dangerous Goods Regulations*. Refer to Appendix 2 for additional information on dangerous goods classifications.

3.1 Storage

Storage refers to containment of a hazardous waste for transport, or while awaiting treatment and disposal. Except under extraordinary circumstances (i.e. radioactive materials), storage should always be considered as a temporary measure and is not acceptable for the long-term management of hazardous waste.

Recognition of the incompatibility of different wastes during storage is important in order to avoid the possibility of violent, explosive reactions and toxic fumes. Various systems have been developed to ensure compatible storage including the 'Hazardous Waste Compatibility Chart' adopted by the United States' Environmental Protection Agency[1].

3.1.1 Containers

Hazardous waste storage containers are designed to hold, store and transport small quantities of waste. Many different types of containers are available (i.e. barrels, bottles, bags and boxes) and are made from a variety of materials (i.e. aluminum, plastic, steel, and stainless steel). Selecting the proper container requires an understanding of the properties of the waste to be stored. If transport is to be undertaken, the generator should consult the Transport Authority to confirm the container meets all legislated requirements.

The following are additional general points for consideration:

- Hazardous waste should be stored in their original containers where possible or in containers specially manufactured for the purpose of storing hazardous waste. The containers must be sound, sealable and not damaged or leaking.
- Containers should be clearly labeled to identify their contents according to requirements of the Workplace Hazardous Materials Information System (WHMIS) and the relevant Transport Authority, if transport is planned.
- Small quantities of compatible hazardous waste should be bulked into 16 gauge or equivalent metal or plastic 205 litre (45 gallon) drums for the purpose of secondary containment.
- Containers should be closed and sealed at all times, except while waste is being added or removed.

[1] EPA-600/2-80-076 April 1980. A Method for Determining the Compatibility of Chemical Mixtures.

3.1.2 Facilities

A hazardous waste storage facility is a specially designed building or area that helps to ensure the safe and secure storage of hazardous waste. Detailed storage facility building designs are beyond the scope of the Guideline. The Department of Environment or other qualified person should be consulted prior to designing and constructing a storage facility.

The following are general points to consider when establishing a storage facility:

- The facility should meet all local and territorial siting and construction requirements and be readily accessible for fire fighting and other emergency responses. The local Fire Chief should be advised of the storage facility and its contents for emergency planning and response purposes.
- The facility should be secure. Access should be limited where practical to employees who have been trained in safety and emergency procedures. These procedures should be documented and a copy made available to those employees who have access to the facility.
- Inspections of the facility and stored wastes should be performed and recorded at least once every week.
- Containers should be placed so that each can readily and easily be inspected for signs of leakage, corrosion or deterioration. Leaking, corroded or deteriorated containers should immediately be removed and their contents transferred to a sound container.
- Records should be maintained indicating the type and quantity of waste being stored along with the date, type and quantity of hazardous waste brought into or removed from the facility.
- Drainage into and from the storage facility site should be controlled to prevent spills or leaks from leaving the site and to prevent run-off from entering the site.
- All waste should be stored on a firm working surface that is impervious to leaks.
- Incompatible waste must be stored in a manner that contact in the event of a spill or accidental release is not possible.
- Emergency response plans should be developed in cooperation with local emergency response personnel and emergency response equipment should be locally available in the event of a spill, fire or other emergency situation.

Where the facility is used for commercial purposes and is used to store hazardous waste for periods of 180 days or more or the quantity of waste stored on-site exceeds the criteria set out in Appendix 8, the facility must be registered with the Department of Environment as a hazardous waste management facility.

3.2 Registration

3.2.1 Hazardous Waste Generators, Carriers and Receivers

Generators, carriers and receivers of hazardous waste must be registered before undertaking activities involving these wastes. Completion of the approved form and submission of accurate information enables the Department of Environment to quickly complete the registration process. Registration enables the government to track the generation, transport and disposal of hazardous waste in Nunavut. It also provides assurance that the company has the necessary emergency response and spill

contingency plans in place should an accident or other incident occur involving a hazardous waste. Upon registration, the applicant will be assigned a unique identification number. This number is required in order to complete the waste manifest form.

Appendices 4, 5 and 6 provide samples of registration forms required for generators, carriers and receivers to apply for registration in Nunavut. Original forms and users' guides are available from Nunavut's Department of Environment or by downloading through the department's web site. Incomplete applications will result in delays in completing the registration process.

Generators and receivers of hazardous waste located in Nunavut must be registered with the Department of Environment. Carriers may be registered either in Nunavut or in the province or territory in which the company is based.

3.2.2 Hazardous Waste Management Facilities

A hazardous waste management facility is a facility or specially-designated area that is used for the collection, storage, transfer, treatment, recycling or disposal of hazardous waste for commercial purposes. Where the facility is used solely for the collection, storage or transfer of hazardous waste, the facility must be registered where waste is stored for a period of 180 days or more or the quantities exceed those set out in Appendix 8 of the Guideline. Where the facility is to be used for the treatment, recycling or disposal of hazardous waste, the facility must be registered where the quantity treated, recycled or disposed of in any single month exceeds a 'small quantity'.

The collection, storage, transfer, treatment, recycling or disposal of hazardous waste on behalf of a third-party does not remove the obligation of the owner or operator of a hazardous waste management facility to register the facility.

Appendix 7 includes a sample of the registration form required for the owner or operator of a hazardous waste management facility to apply for registration of the facility. The owner or operator may obtain an original form and users' guide by contacting Nunavut's Department of Environment or by downloading through the department's web site. Incomplete applications will result in delays in completing the registration process.

Registration of a hazardous waste management facility does not remove the obligation to comply with all other applicable municipal, territorial and federal statutes, regulations, standards, guidelines and by-laws. Guidance on planning for and achieving territorial environmental requirements for new industrial projects may be found in the *Environmental Guideline for Industrial Projects on Commissioner's Lands.*

3.3 Transportation

Carriers must ensure hazardous waste is packaged, documented, labeled and placarded in compliance with the method of transport used - road, rail, air or marine. A completed waste manifest must accompany each shipment of hazardous waste. Completion of the manifest together with proper marking and placarding of containers and vehicles enables police, ambulance, fire and other first responders to react effectively and safely in the event of a spill or other accident involving hazardous waste while in transit.

The transport of hazardous waste by road in Canada is controlled under the territorial and federal *Transportation of Dangerous Goods Acts* and the federal *Interprovincial Movement of Hazardous Waste Regulations* and *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations.* These Acts and Regulations require that personnel are trained, containers and transport vehicles are labeled and placarded and a completed waste manifest accompanies each shipment. The generator, carrier and receiver must each complete their portion of the manifest form and provide copies to the Department of Environment at various stages in the transport process. Refer to Appendix 9 for a copy of the manifest. Original manifest forms are available from Nunavut's Department of Environment and completion instructions are included on the reverse side of each manifest. Further assistance in completing a waste manifest may be obtained by referring to the *User's Guide for the Hazardous Waste Manifest* produced by Environment Canada or by contacting the Motor Vehicles Division of the Department of Economic Development and Transportation.

The International Air Transport Association (IATA) requires that all shipments of hazardous wastes tendered to air carriers be accompanied by the IATA Shipper's Declaration of Dangerous Goods. The consignor is responsible for completion of the form in accordance with IATA requirements and to ensure all packaging, placarding and labeling is consistent with the product being transported.

The International Marine Dangerous Goods Code requires use of the International Marine Organization's Multimodal Dangerous Goods Form when transporting dangerous goods or hazardous waste by ship or barge.

Further information on transporting hazardous waste by air or marine can be obtained by contacting Transport Canada. Information and instructions on manifesting, placarding and labeling hazardous waste commonly generated in Nunavut can be obtained by referring to waste-specific guidelines produced by the Department of Environment. A complete listing of guidelines is available at http://env.gov.nu.ca/programareas/environmentprotection.

Conclusion

This is a general introduction to the risks associated with hazardous waste and is intended to inform the reader about the proper handling, storage and transportation of hazardous waste in Nunavut. Detailed guidance on the management of specific waste types can be obtained by referring to other guidelines developed by the Department of Environment.

For additional information on the management of hazardous waste, or to obtain a complete listing of available guidelines, contact the Department of Environment at:

Environmental Protection Division
Department of Environment
Government of Nunavut
Inuksugait Plaza, Box 1000, Station 1360
Iqaluit, Nunavut, X0A 0H0

Phone: (867) 975-7729
Fax: (867) 975-7739
Email: EnvironmentalProtection@gov.nu.ca
Website: http://env.gov.nu.ca/programareas/environmentprotection

References

Government of Alberta, Department of Environment. Alberta Users Guide for Waste Managers, (Catalogue # ENV-266-O/P).

Government of Alberta, Department of Environment. Hazardous Waste Storage Guidelines, (1988).

Government of the Northwest Territories, Department of Environment and Natural Resources. User's Guide for Hazardous Waste Movement Documents in the NWT, (2009).

Government of the Northwest Territories, Department of Municipal and Community Affairs. Guidelines for the Planning, Design, Operations and Maintenance of Modified Solid Waste Sites in the Northwest Territories, (2003).

Government of Nunavut, Department of Environment. Environmental Guideline for General Management of Hazardous Waste, (2002).

Government of Nunavut, Department of Environment. Environmental Guideline for Industrial Projects on Commissioner's Lands, (2002).

Government of Nunavut, Department of Environment. Environmental Guideline for Industrial Waste Discharges, (2002).

APPENDICES

APPENDIX 1 - *ENVIRONMENTAL PROTECTION ACT*

The following are excerpts from the *Environmental Protection Act*

1. "Contaminant" means any noise, heat, vibration or substance and includes such other substance as the Minister may prescribe that, where discharged into the environment,
   (a) endangers the health, safety or welfare of persons,
   (b) interferes or is likely to interfere with normal enjoyment of life or property,
   (c) endangers the health of animal life, or
   (d) causes or is likely to cause damage to plant life or to property;

   "Discharge" includes, but not so as to limit the meaning, any pumping, pouring, throwing, dumping, emitting, burning, spraying, spreading, leaking, spilling, or escaping;

   "Environment" means the components of the Earth and includes
   (a) air, land and water,
   (b) all layers of the atmosphere,
   (c) all organic and inorganic matter and living organisms, and
   (d) the interacting natural systems that include components referred to in paragraphs (a) to (c).

   "Inspector" means a person appointed under subsection 3(2) and includes the Chief Environmental Protection Officer.

2.2 The Minister may
   (a) establish, operate and maintain stations to monitor the quality of the environment in the Territories;
   (b) conduct research studies, conferences and training programs relating to contaminants and to the preservation, protection or enhancement of the environment;
   (c) develop, co-ordinate and administer policies, standards, guidelines and codes of practice relating to the preservation, protection or enhancement of the environment;
   (d) collect, publish and distribute information relating to contaminants and to the preservation, protection or enhancement of the environment:

3. (1) The Minister shall appoint a Chief Environmental Protection Officer who shall administer and enforce this Act and the regulations.

   (2) The Chief Environmental Protection Officer may appoint inspectors and shall specify in the appointment the powers that may be exercised and the duties that may be performed by the inspector under this Act and regulations.

5. (1) Subject to subsection (3), no person shall discharge or permit the discharge of a contaminant into the environment.

   (3) Subsection (1) does not apply where the person who discharged the contaminant or permitted the discharge of the contaminant establishes that
   (a) the discharge is authorized by this Act or the regulations or by an order issued under this Act or the regulations;
   (b) the contaminant has been used solely for domestic purposes and was discharged from within a dwelling house;
   (c) the contaminant was discharged from the exhaust system of a vehicle;
   (d) the discharge of the contaminant resulted from the burning of leaves, foliage, wood, crops or stubble for domestic or agricultural purposes;

(e) the discharge of the contaminant resulted from burning for land clearing or land grading;
(f) the discharge of the contaminant resulted from a fire set by a public official for habitat management of silviculture purposes;
(g) the contaminant was discharged for the purposes of combating a forest fire;
(h) the contaminant is a soil particle or grit discharged in the course of agriculture or horticulture; or
(i) the contaminant is a pesticide classified and labelled as "domestic" under the *Pest Control Products Regulations* (Canada).

(4) The exceptions set out in subsection (3) do not apply where a person discharges a contaminant that the inspector has reasonable grounds to believe is not usually associated with a discharge from the excepted activity.

5.1. Where a discharge of a contaminant into the environment in contravention of this Act or the regulations or the provisions of a permit or license issued under this Act or the regulations occurs or a reasonable likelihood of such a discharge exists, every person causing or contributing to the discharge or increasing the likelihood of such a discharge, and the owner or the person in charge, management or control of the contaminant before its discharge or likely discharge, shall immediately:
(a) subject to any regulations, report the discharge or likely discharge to the person or office designated by the regulations;
(b) take all reasonable measures consistent with public safety to stop the discharge, repair any damage caused by the discharge and prevent or eliminate any danger to life, health, property or the environment that results or may be reasonably expected to result from the discharge or likely discharge; and
(c) make a reasonable effort to notify every member of the public who may be adversely affected by the discharge or likely discharge.

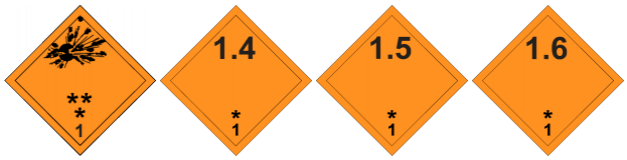
6. **(**1) Where an inspector believes on reasonable grounds that a discharge of a contaminant in contravention of this Act or the regulations or a provision of a permit or license issued under this Act or the regulations has occurred or is occurring, the inspector may issue an order requiring any person causing or contributing to the discharge or the owner or the person in charge, management or control of the contaminant to stop the discharge by the date named in the order.

7. (1) Notwithstanding section 6, where a person discharges or permits the discharge of a contaminant into the environment, an inspector may order that person to repair or remedy any injury or damage to the environment that results from the discharge.

(2) Where a person fails or neglects to repair or remedy any injury or damage to the environment in accordance with an order made under subsection (1) or where immediate remedial measures are required to protect the environment, the Chief Environmental Protection Officer may cause to be carried out the measures that he or she considers necessary to repair or remedy an injury or damage to the environment that results from any discharge.

APPENDIX 2 - DANGEROUS GOODS CLASSIFICATIONS

Class 1 – Explosives[1]



Class 2 – Compressed Gases
Division 2.1 – Flammable Gases
Division 2.2 – Non-flammable and Non-toxic Gases
Division 2.3 – Poison Gases

Class 3 - Flammable Liquids

Class 4 – Flammable Solids
Division 4.1 – Flammable Solids
Division 4.2 – Spontaneously Combustible
Division 4.3 – Water Reactive

Class 5 - Oxidizing Substances and Organic Peroxides
Division 5.1 – Oxidizing Substances
Division 5.2 – Organic Peroxides

Class 6 - Toxic and Infectious Substances
Division 6.1 – Toxic Substances
Division 6.2 – Infectious Substances

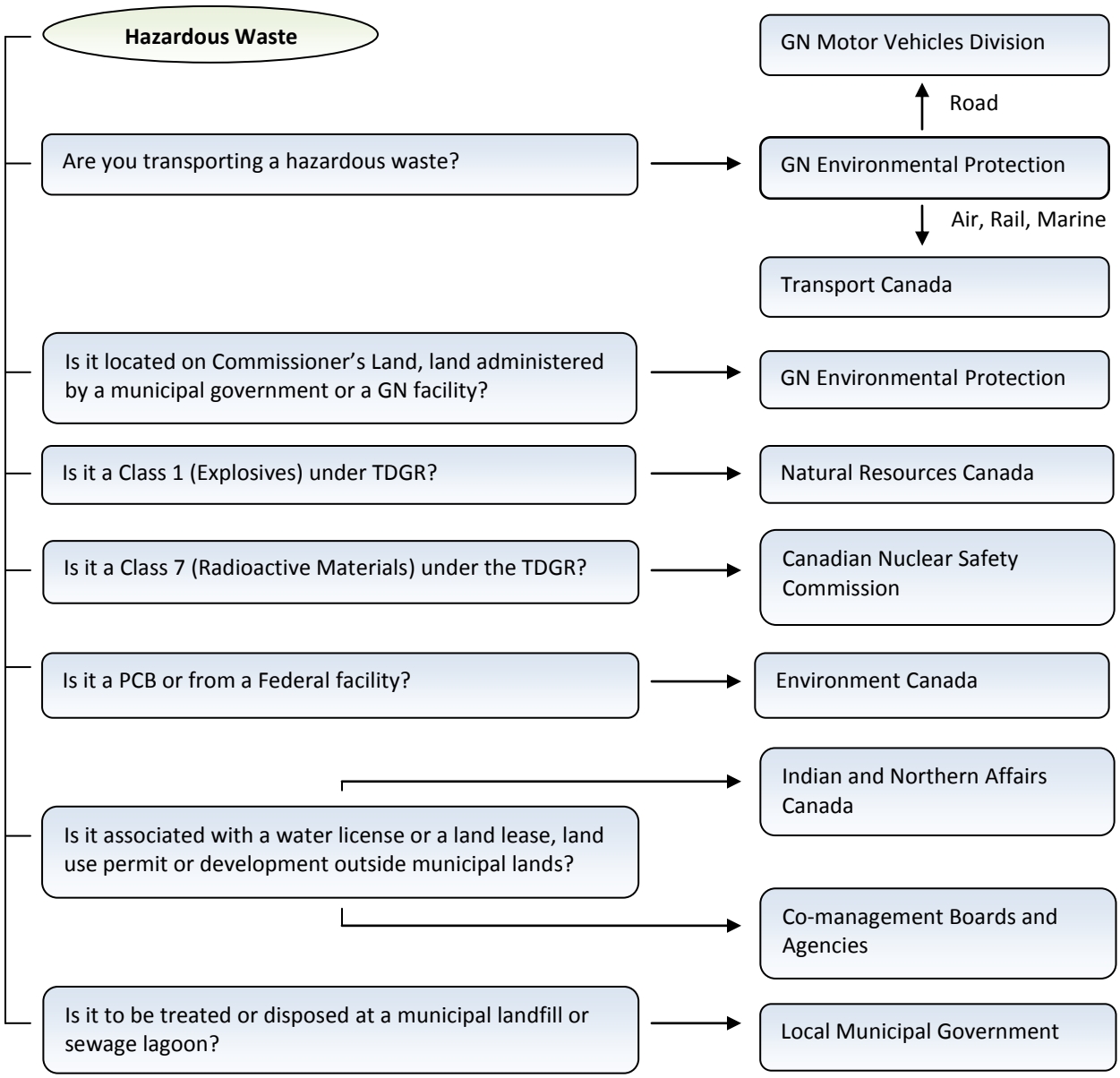
Class 7 - Radioactive Materials[2]

Class 8 - Corrosives

Class 9 - Miscellaneous

1. Class 1 substances (Explosives) are regulated by Natural Resources Canada under the *Explosives Act*.
2. Class 7 substances (Radioactive Materials) are regulated by the Canadian Nuclear Safety Commission under the *Nuclear Safety and Control Act* and *Nuclear Liability Act*.

APPENDIX 3 - DETERMINING REGULATORY AGENCY CONTACTS



APPENDIX 4 – REGISTRATION FORM – HAZARDOUS WASTE GENERATOR

A copy of the generator registration form and users' guide is available by contacting the Department of Environment or by downloading at http://env.gov.nu.ca/programareas/environmentprotection.

Instructions

1. The following information must be provided in order to register as a hazardous waste generator in Nunavut and to obtain a generator number. Incomplete applications will be returned to the applicant.
2. Completed registration forms are to be forwarded to the Manager of Pollution Control, Department of Environment, Government of Nunavut, Box 1000, Station 1360, Iqaluit, Nunavut, X0A 0H0. Electronic registration forms are preferred and may be forwarded to EnvironmentalProtection@gov.nu.ca.
3. Use additional pages to provide information as required.
4. Applicants should refer to the accompanying users' guide for further assistance on completing the generator registration form.

Section 1 - Identification

Generator (Legal Name) _____

Mailing Address _____ Postal Code _____

Principle Contact Person _____ Title _____

Phone _____ Email _____

Alternate Contact Person _____ Title _____

Phone _____ Email _____

Section 2 - Description of Waste Generated (provide a separate table if required)

Site Location(s) where Waste is Generated _____

Shipping Name (Description)	TDG Number	TDG Class	Quantity Generated each Month (L or Kg)	Frequency of Generation

Section 3 - Waste Management Information

General Type of Business _____

Source of Waste _____

Hazardous Waste Carrier(s) Used _____

Hazardous Waste Receiver(s) Used _____

Do you have an approved Emergency Response and Spill Contingency Plan? Yes ____ (attach copy) No _____

Section 4 - Certification

I certify that the information provided on this form is correct, accurate and complete.

Signature of Contact Person _____ Date (dd/mm/yy) _____

Print Name of Contact Person _____ Title _____

Phone _____ Email _____

For Department Use Only
Generator Number NUG# _____ Approved by _____ Date _____

SAMPLE

APPENDIX 5 – REGISTRATION FORM – HAZARDOUS WASTE CARRIER

A copy of the carrier registration form and users' guide is available by contacting the Department of Environment or by downloading at http://env.gov.nu.ca/programareas/environmentprotection.

Instructions

1. The following information must be provided in order to register as a hazardous waste carrier in Nunavut and to obtain a carrier number. Incomplete applications will be returned to the applicant.
2. Completed registration forms are to be forwarded to the Manager of Pollution Control, Department of Environment, Government of Nunavut, Box 1000, Station 1360, Iqaluit, Nunavut, X0A 0H0. Electronic registration forms are preferred and may be forwarded to EnvironmentalProtection@gov.nu.ca.
3. Use additional pages to provide information as required.
4. Applicants should refer to the accompanying users' guide for further assistance on completing the carrier registration form.

Section 1 - Identification

Carrier (Legal Name) _____

Corporate Address _____

Site (Dispatch) Address _____

Principle Contact Person _____ Title _____

Phone _____ Email _____

Alternate Contact Person _____ Title _____

Phone _____ Email _____

Section 2 - Description of Waste Transported (provide a separate table if required)

Shipping Name (Description)	TDG Number	TDG Class	Quantity Transported each Month (L or Kg)	Frequency of Transport

Section 3 - Waste Management Information

Mode of Transport (check all that apply) Road _____ Rail _____ Marine _____ Air _____

Hazardous Waste Generator(s) Used _____

Hazardous Waste Receiver(s) Used _____

Do you have an approved Emergency Response and Spill Contingency Plan? Yes _____ (attach copy) No _____

Section 4 - Certification

I certify that the information provided on this form is correct, accurate and complete.

Signature of Contact Person _____ Date (dd/mm/yy) _____

Print Name of Contact Person _____ Title _____

Phone _____ Email _____

For Department Use Only
Carrier Number NUC# _____ Approved by _____ Date _____

SAMPLE

APPENDIX 6 – REGISTRATION FORM – HAZARDOUS WASTE RECEIVER

A copy of the receiver registration form and users' guide is available by contacting the Department of Environment or by downloading at http://env.gov.nu.ca/programareas/environmentprotection.

SAMPLE

Instructions

1. The following information must be provided in order to register as a hazardous waste receiver in Nunavut and to obtain a receiver number. Incomplete applications will be returned to the applicant.
2. A receiver who operates a commercial business for the purpose of collecting, storing, transferring, treating, recycling or disposing of hazardous waste may be required to register the facility as a hazardous waste management facility. Refer to section 3.2.2 of the *Environmental Guideline for the General Management of Hazardous Waste* for further information.
3. Completed registration forms are to be forwarded to the Manager of Pollution Control, Department of Environment, Government of Nunavut, Box 1000, Station 1360, Iqaluit, Nunavut, X0A 0H0. Electronic registration forms are preferred and may be forwarded to EnvironmentalProtection@gov.nu.ca.
4. Use additional pages to provide information as required.
5. Applicants should refer to the accompanying users' guide for further assistance on completing the receiver registration form.

Section 1 - Identification

Receiver (Legal Name) _____

Mailing Address _____ Postal Code _____

Principle Contact Person _____ Title _____

Phone _____ Email _____

Alternate Contact Person _____ Title _____

Phone _____ Email _____

Section 2 - Description of Waste Received (provide a separate table if required)

Site Location(s) where Waste is Received _____

Shipping Name (Description)	TDG Number	TDG Class	Quantity Received each Month (L or Kg)	Frequency of Acceptance

Attach a brief description of the proposed facility.

Section 3 - Waste Management Information

General Type of Business _____

General Type of Activity _____

Hazardous Waste Generator(s) Used _____

Hazardous Waste Carriers(s) Used _____

Hazardous Waste Management Facilities Used _____

Do you have an approved Emergency Response and Spill Contingency Plan? Yes _____ (attach copy) No _____

Section 4 - Certification

I certify that the information provided on this form is correct, accurate and complete.

Signature of Contact Person _____ Date (dd/mm/yy) _____

Print Name of Contact Person _____ Title _____

Phone _____ Email _____

For Department Use Only
Receiver Number NUR# _____ Approved by _____ Date _____

APPENDIX 7
REGISTRATION FORM – HAZARDOUS WASTE MANAGEMENT FACILITY

A copy of the management facility registration form and users' guide is available by contacting the Department of Environment or by downloading at http://env.gov.nu.ca/programareas/environmentprotection.

SAMPLE

Instructions

1. The following information must be provided in order to register as a hazardous waste management facility in Nunavut and obtain a management facility number. Incomplete applications will be returned to the applicant.
2. Completed registration forms are to be forwarded to the Manager of Pollution Control, Department of Environment, Government of Nunavut, Box 1000, Station 1360, Iqaluit, Nunavut, X0A 0H0. Electronic registration forms are preferred and may be forwarded to EnvironmentalProtection@gov.nu.ca.
3. Use additional pages to provide information as required.
4. Applicants should refer to the accompanying users' guide for further assistance on completing the management facility registration form.

Section 1 - Identification

Applicant (Legal Name) _____

Corporate Address _____

Facility Address _____

Principle Contact Person _____ Title _____

Phone _____ Email _____

Alternate Contact Person _____ Title _____

Phone _____ Email _____

Section 2 - Description of Waste to be Managed (provide a separate table if required)

Site Location(s) where Waste is Managed _____

Shipping Name (Description)	TDG Number	TDG Class	Quantity Managed each Month (L or Kg)	Frequency of Acceptance

Attach a complete description of the proposed facility, safety measures, equipment and management processes to be used. Include engineered drawing where applicable.

Section 3 - Waste Management Information

General Type of Business (check all that apply) Receiver of Waste _____ Manage Self-generated Waste _____

Type of Activity (check all that apply) Collect and Store _____ Transfer _____

Treat _____ Recycle _____ Dispose _____

Hazardous Waste Generator(s) Used _____

Hazardous Waste Carriers(s) Used _____

Do you have an approved Emergency Response and Spill Contingency Plan? Yes _____ (attach copy) No _____

Section 4 - Certification

I certify that the information provided on this form is correct, accurate and complete.

Signature of Contact Person _____ Date (dd/mm/yy) _____

Print Name of Contact Person _____ Title _____

Phone _____ Email _____

For Department Use Only
Management Facility Number NUF# _____ Approved by _____ Date _____

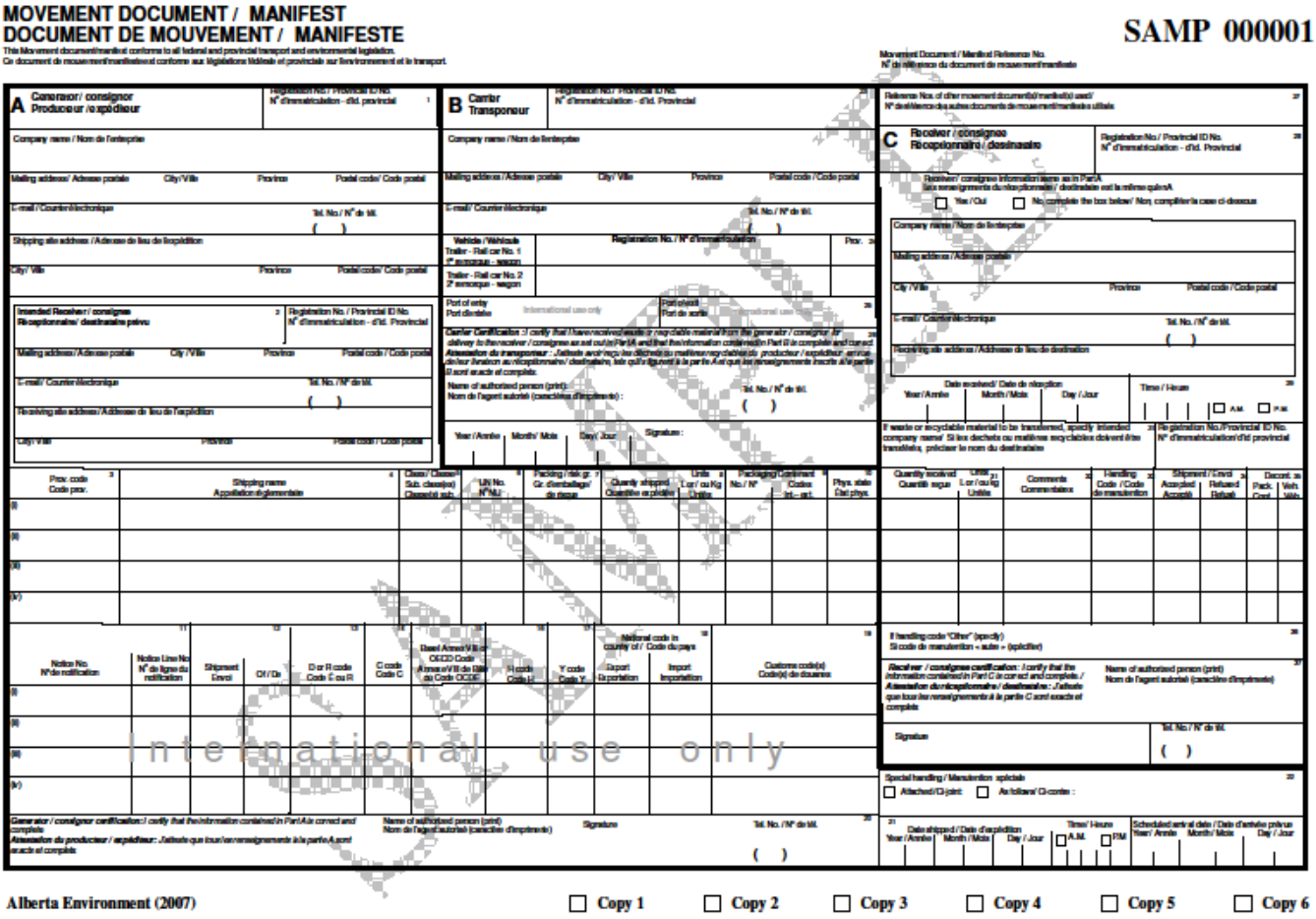
APPENDIX 8 - CRITERIA FOR REGISTERING A HAZARDOUS WASTE MANAGEMENT FACILITY

A facility must be registered with the Department of Environment as a hazardous waste management facility where it is used for commercial purposes to store hazardous waste for a period of 180 days or more or the quantity of hazardous waste[1] stored on-site at any one time exceeds the criteria established in the following table. Where the facility is to be used for the treatment, recycling or disposal of hazardous waste, the facility must be registered as a hazardous waste management facility where the quantity treated, recycled or disposed of each month exceeds a 'small quantity'[2].

	Description	**Quantity[3] (Kg or L)**
Class 1	Explosives	50
Class 2	Division 2.1 – Flammable Gases	500[4]
	Division 2.2 – Non-flammable and Non-toxic Gases	5000[4]
	Division 2.3 – Poison Gases	200[4]
Class 3	Flammable Liquids	4000
Class 4	Division 4.1 – Flammable Solids	5000
	Division 4.2 – Spontaneously Combustible	1000
	Division 4.3 – Water Reactive	500
Class 5	Division 5.1 – Oxidizing Substances	1000
	Division 5.2 – Organic Peroxides	50
Class 6	Division 6.1 – Toxic Substances	1000
	Division 6.2 – Infectious Substances	500[4]
Class 7	Radioactive Materials	Any amount
Class 8	Corrosives	1000
Class 9	Miscellaneous	1000
	PCB Materials	50
	Environmentally Hazardous Substance Solid – UN3077	5000
All Classes	Total Aggregate Quantity	5000

1. Applies to hazardous waste only and not to dangerous goods.
2. Small quantity means hazardous waste that is generated in an amount that is less than five kilograms per month if a solid or less than five litres per month if a liquid, and where the total quantity accumulated at any one time does not exceed five kilograms or five litres. This does not include hazardous waste that is mercury or Class 2.3, 5.1 or 6.1 materials. These wastes must be generated in an amount that is less than one kilogram per month if a solid or less than one litre per month if a liquid, and where the total quantity accumulated at any one time does not exceed one kilogram or one litre.
3. Quantity applies to solids when expressed in kilograms (kg) and liquids when expressed in litres (L).
4. Total liquid capacity of the container.

APPENDIX 9 – HAZARDOUS WASTE MANIFEST



MOVEMENT DOCUMENT / MANIFEST
DOCUMENT DE MOUVEMENT / MANIFESTE

SAMP 000001

This Movement document/manifest conforms to all federal and provincial transport and environmental legislation.
Ce document de mouvement/manifeste est conforme aux législations fédérale et provinciale sur l'environnement et le transport.

Movement Document / Manifest Reference No.
N° de référence du document de mouvement/manifeste

A Generator / consignor
Producteur / expéditeur

Registration No./ Provincial ID No.
N° d'immatriculation - d'id. provincial

Company name / Nom de l'entreprise

Mailing address/ Adresse postale | City/ Ville | Province | Postal code/ Code postal

E-mail / Courriel électronique | Tel. No. / N° de tél.

Shipping site address / Adresse de lieu de l'expédition

City/ Ville | Province | Postal code/ Code postal

Intended Receiver / consignee
Récipiendaire/ destinataire prévu

Registration No. / Provincial ID No.
N° d'immatriculation - d'id. Provincial

Mailing address/ Adresse postale | City/ Ville | Province | Postal code / Code postal

E-mail/ Courriel électronique | Tel. No. / N° de tél.

Receiving site address / Address de lieu de l'expédition

City/ Ville | Province | Postal code / Code postal

B Carrier
Transporteur

Registration No./ Provincial ID No.
N° d'immatriculation - d'id. Provincial

Company name / Nom de l'entreprise

Mailing address / Adresse postale | City/ Ville | Province | Postal code / Code postal

E-mail/ Courriel électronique | Tel. No. / N° de tél.

Vehicle / Véhicule
Trailer - Rail car No. 1
1er remorque - wagon
Trailer - Rail car No. 2
2e remorque - wagon

Registration No. / N° d'immatriculation | Prov.

Port of entry
Port d'entrée
International use only
Port of exit
Port de sortie
International use only

Carrier Certification: I certify that I have received waste or recyclable material from the generator / consignor for delivery to the receiver / consignee as set out in Part A and that the information contained in Part B is complete and correct.
Attestation du transporteur : J'atteste avoir reçu les déchets ou matières recyclables du producteur / expéditeur en vue de leur livraison au récipiendaire / destinataire, tels qu'ils figurent à la partie A et que les renseignements inscrits à la partie B sont exacts et complets.

Name of authorized person (print)
Nom de l'agent autorisé (caractères d'imprimerie) :

Tel. No. / N° de tél.

Year / Année | Month / Mois | Day / Jour | Signature :

C Receiver / consignee
Récipiendaire / destinataire

Reference Nos. of other movement document(s)/ manifest(s) used/
N° de référence des autres documents de mouvement/ manifestes utilisés

Registration No./ Provincial ID No.
N° d'immatriculation - d'id. Provincial

Receiver/ consignee information same as in Part A.
Les renseignements du récipiendaire / destinataire sont la même que ceux de la partie A.

Yes / Oui | No, complete the box below / Non, compléter la case ci-dessous

Company name / Nom de l'entreprise

Mailing address / Adresse postale

City / Ville | Province | Postal code / Code postal

E-mail/ Courriel électronique | Tel. No. / N° de tél.

Receiving site address / Address de lieu de destination

Date received/ Date de réception
Year / Année | Month / Mois | Day / Jour

Time / Heure
A.M. | P.M.

If waste or recyclable material to be transferred, specify intended company name/ Si les déchets ou matières recyclables doivent être transférés, préciser le nom du destinataire

Registration No./Provincial ID No.
N° d'immatriculation/d'id provincial

Prov. code Code prov.	Shipping name Appellation réglementaire	Class/ Classe Sub. class(es) Classe(s) sub.	UN No. N° NU	Packing / Risk gr. Gr. d'emballage/ de risque	Quantity shipped Quantité expédiée	Units L or / ou Kg Unités	Packaging/ Contained No. / N°	Packaging/ Contained Codes Int. – ext.	Phys. state Etat phys.
(i)									
(ii)									
(iii)									
(iv)									

Quantity received Quantité reçue	Units L or / ou Kg Unités	Comments Commentaires	Handling Code / Code de manutention	Shipment / Load Accepted Accepté	Shipment / Load Refused Refusé	Decont. as Pack. Cont.	Decont. as Veh. Véh.

Notice No. N° de notification	Notice Line No. N° de ligne de notification	Shipment Load	Of / De	D or R code Code D ou R	C code Code C	Basel Annex VIII or OECD Code Annexe VIII de Bâle ou Code OCDE	H code Code H	Y code Code Y	National code in country of / Code du pays Export Exportation	National code in country of / Code du pays Import Importation	Customs code(s) Code(s) de douane
(i)											
(ii)											
(iii)											
(iv)											

If handling code "Other" (specify)
Si code de manutention « autre » (spécifier)

Receiver / consignee certification: I certify that the information contained in Part C is correct and complete. / Attestation du récipiendaire / destinataire : J'atteste que tous les renseignements à la partie C sont exacts et complets

Name of authorized person (print)
Nom de l'agent autorisé (caractères d'imprimerie)

Signature | Tel. No. / N° de tél.

Special handling / Manutention spéciale
Attached / Ci-joint | As follows / Ci-contre :

Generator / consignor certification: I certify that the information contained in Part A is correct and complete.
Attestation du producteur / expéditeur : J'atteste que tous les renseignements à la partie A sont exacts et complets

Name of authorized person (print)
Nom de l'agent autorisé (caractères d'imprimerie)

Signature | Tel. No. / N° de tél.

Date shipped / Date d'expédition
Year / Année | Month / Mois | Day / Jour

Time / Heure
A.M. | P.M.

Scheduled arrival date / Date d'arrivée prévue
Year/ Année | Month / Mois | Day / Jour

International use only

Alberta Environment (2007)

Copy 1 | Copy 2 | Copy 3 | Copy 4 | Copy 5 | Copy 6

APPENDIX 10 - WASTE EXCHANGES AND ASSOCIATIONS

The concept of exchanging waste began in Canada in the 1980s. It involves the transfer of unwanted, overstocked, obsolete, damaged, contaminated or post-dated material and waste to another company or person who would reuse it. Various waste exchanges and associations have been established in Canada to facilitate these transfers. Several, but not all, waste exchanges and associations are listed below.

Northern Territories Water and Waste Association
201, 4817- 49 Street
Yellowknife, Northwest Territories X1A 3S7
(867) 873-4325
http://www.ntwwa.com

Recycling Council of British Columbia
Unit #10, 119 West Pender Street
Vancouver, British Columbia V6B 1S5
(604) 683-6009
http://www.rcbc.bc.ca

Alberta Waste Materials Exchange
Building #350, 6815 Eighth Street NE
Calgary, Alberta T2E 7H7
(403) 297-7505

Calgary Materials Exchange
809 Fourth Avenue NE
Calgary, Alberta T2P 0K5
(403) 230-1443
http://www.cmex.ca

Saskatchewan Waste Materials Exchange
515 Henderson Drive.
Regina, Saskatchewan S4N 5X1
(306) 787-9800

Manitoba Waste Exchange
1329 Niakwa Road
Winnipeg, Manitoba R2J 3T4
(204) 257-3891

Ontario Waste Exchange
OCETA 63 Polson Street, 2nd floor
Toronto, Ontario M5A 1A4
(416) 778-4199
http://www.owe.org

Canadian Waste Materials Exchange
2395 Spearman Drive
Mississauga, Ontario L5K 1B3
(416) 822-4111

Canadian Chemical Exchange
900 Blondin
Ste-Adele, Quebec J0R 1L0
(450) 229-6511
http://www.stobec.com

Quebec Waste Materials Exchange
14 Place du Commerce, Bureau 350
Le-des-Squeurs, Quebec H3E 1T5
(514) 762-9012

APPENDIX 11 – GOVERNMENT CONTACTS

Government of Nunavut

Environmental Protection Division
Department of Environment
Inuksugait Plaza
P.O. Box 1000, Station 1360
Iqaluit, Nunavut X0A 0H0
Telephone: (867) 975-7729 Fax: (867) 975-7739

Workers' Safety and Compensation Commission
P.O. Box 669
Baron Building/1091
Iqaluit, Nunavut X0A 0H0
Telephone: 1-877-404-4407 (toll free) Fax: 1-866-979-8501

Office of Chief Medical Health Officer of Health
Department of Health and Social Services
P.O. Box 1000, Station 1000
Iqaluit, Nunavut X0A 0H0
Telephone: (867) 975-5774 Fax: (867) 975-5755

Motor Vehicles Division
Department of Economic Development and Transportation
P.O. Box 10
Gjoa Haven, Nunavut X0B 1J0
Telephone: (867) 360-4615 Fax: (867) 360-4619

Department of Community and Government Services (all Divisions)
P.O. Box 1000, Station 700
4th Floor, W.G. Brown Building
Iqaluit, Nunavut X0A 0H0
Telephone: (867) 975-5400 Fax: (867) 975-5305

Government of Canada

Indian and Northern Affairs – Nunavut Region
P.O. Box 2200
Iqaluit, Nunavut X0A 0H0
Telephone: (867) 975-4500 Fax: (867) 975-4560

Department of Transport – Road, Rail, Marine, Air
P.O. Box 8550
344 Edmonton Street
Winnipeg, Manitoba R3C 1P6
Telephone: 1-888-463-0521 (toll free)
Fax: (204) 983-8992 Road, Rail and Marine only
Fax: (204) 983-1734 Air only

Environment Canada (NWT and Nunavut)
5019 52nd Street
Yellowknife, Northwest Territories X1A 1T5
Telephone: (867) 669-4730 Fax: (867) 873-8185

Appendix D - End-of-Life Vehicle Hazardous Materials Recovery Program Manual Operation

End-of-Life Vehicle Hazardous Materials Recovery Program Manual

Manual for the Preparation and Disposal of End-of-Life Vehicles in Nunavut

Final Report

January 2011

Government of Nunavut

Project # 10-3574-2000

Dennis Heinrichs, P.Eng. - Project Manager

Prepared by:
Dillon Consulting Limited

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Department of Environment

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1 INTRODUCTION

In 2004 the Government of Nunavut identified the disposition of End of Life Vehicles (ELVs) as a priority issue. The Departments of Environment (GN-DoE), Economic Development and Transportation and Community and Government Services were directed to initiate a pilot program to repatriateEnd-of-Life Vehicles (ELVs)to the south. A project was initiated at Iqaluit which resulted in the processing of approximately 3,600 tonnes of scrap metal.

Throughout the project, the GN-DoE had concerns with respect to the environmental impacts of the operation; specifically with respect to the hazardous materials present in the ELVs. Not having any previous experience with vehicle crushing operations put the Department at a disadvantage in terms of being able to direct the operators to conduct their activities in accordance with nationally and industry-accepted standards for vehicle crushing and bailing operations. It was decided that there is a need for an environmental manual to capture such operations in Nunavut.

The purpose of this manual is to provide Municipal Solid Waste (MSW) facility and other operators with a guide for the proper removal, storage and handling of potential hazardous materials from ELVs. This removal will allow these ELVs to be safely stored prior to ultimate removal of ELVs from Nunavut communities.

ELV recycling programs exist across Canada; however, due to their remote locations communities in Nunavut have limited access to these programs. By training local community staff to properly handle and prepare ELVs for shipping and recycling, more of these items can be removed from communities. Removal of these items has both environmental and aesthetic benefits, contributes to overall organization of the community and increases the available landfill capacity.

Information provided in this manual has been compiled from numerous sources including:

- The National Code of Practice for Automotive Recyclers Participating in the National Vehicle Scrappage Program.
- Department of Sustainable Development, Government of Nunavut.
- Summerhill Impact “Switch Out” Program.
- British Columbia Ministry of Environment’s “Guidebook for the Vehicle Dismantling and Recycling Industry Environmental Planning Regulation”.
- Interviews with automotive recyclers.

2 BACKGROUND

As part of the Government of Nunavut's objective of INUUQATIGIITTIARNIQ: HEALTHY COMMUNITIES, the Department of Environment was directed to initiate a pilot program that looked into the task of dismantling ELVs and removing them from Nunavut communities (Department of Environment, Government of Nunavut, 2006). This program has begun in Iqaluit where a pilot project to crush and remove ELVs from the city has been in progress since 2008. ELVs were collected, crushed on-site and then prepared for shipment to southern recycling and disposal facilities. Shipment of crushed and prepared vehicles to southern facilities is planned for the summer of 2010.

Other communities have also benefited from similar pilot projects. During the summer of 2004 and 2005, a pilot project to removed scrap metal and vehicles from Rankin Inlet was implemented. The pilot project was able to remove 106 tons of scrap metal from the community. The completion of the pilot project led the community to begin formation of the Rankin Inlet Salvage Company, established to create income to sustain the scrap metal recycling program once the pilot project was complete (North Central Development, 2006).

There are a number of hazardous materials found in vehicles that should be removed from ELVs prior to crushing or further processing. Some of these materials include gasoline, engine oil, fluids (transmission, brake, power steering, etc.), batteries, mercury switches and refrigerants. If these items are not removed prior to crushing the ELVs, these materials may be disbursed into the surrounding environment. According to the Ontario Automotive Recyclers Association (OARA) (reference found in VT Solid Waste Districts and Alliances, 2002), the amount of fluids to be removed is estimated at around 5 US gallons per vehicle. The following table shows the break down of fluids per type as estimated by the OARA:

Table 1: Estimated Amount of Fluids per Vehicle (OARA)

Fluid Type	US Gallons per Vehicle	Litres
Fuel	2.70	10.2
Engine Oil	0.96	3.6
Coolant	0.73	2.8
Transmission Oil	0.34	1.3
Steering Gear Oil	0.20	0.8

The main purpose of this manual is to provide Municipal Solid Waste (MSW) facility and other operators with a guide for the proper removal, storage and handling of potential hazardous materials from ELVs. This removal will allow these ELVs to be safely stored prior to ultimate removal of ELVs from Nunavut communities. A section has also been incorporated to cover dismantling of waste appliances as some of the dismantling requirements for waste appliances are similar to those of ELVs.

3 SCRAP VEHICLE AND METAL RECOVERY OPERATION

3.1 Required Equipment

The following is a recommended list of equipment that would be required to operate an ELV dismantling facility in Nunavut:

- Secured building with garage bay style door, concrete floor, adequate roof and no drains leading to a sewer, sewage tank or stormwater collection system (National Code of Practice, 2008 and British Columbia Ministry of Environment, 2008). Alternate for smaller locations is to undertake work outdoors in dry warm weather only upon an impermeable working surface. The constructed vehicle fluid recovery area should consist of, for example, a protective sand layer/poly liner/sand layer covered with a plywood working surface.
- Forklift or other heavy machinery to move ELVs from receiving area to dismantling area and then from dismantling area to vehicle hulk storage area.
- Gasoline evacuation pump with filter.
- Small wheel hoists to lift car high enough to drain fluids.
- Small hand pumps for removal of engine oil, transmission fluid, gear oil, coolants and brake fluid.
- Containers for storage of oils, antifreeze, windshield washer fluid, etc.
- Portable refrigerant removal device with separate storage tanks for each type of refrigerant.
- Drip pans to catch fluids.
- Spill kit to clean up spills.

3.2 Training Requirements

The main training requirements for employees working at an ELV recycling facility are:

- Proper collection, handling, storage and disposal of hazardous materials.
- Spill prevention and control procedures.
- Certification to remove and store refrigerants from vehicles.

All personnel who work at the facility must have proper training in handling and storing hazardous materials and must follow the procedures set out for the facility. Each facility will be operated according to methods specific to that facility and will be based on available equipment, personnel, shipping schedules and number of ELVs to be processed. The employer should ensure that each employee is trained in the hazardous waste handling and spill response procedures set out specifically for their operation. Please refer to Section 4 for specific handling procedures with regards to hazardous materials.

Removal of refrigerants (i.e. Freon), must be completed by a certified technician. According to the Department of Sustainable Development, Government of Nunavut (2002), a certified service technician is:

"A technician who is otherwise qualified to service ODS containing equipment and has successfully completed an environmental awareness course for ozone depleting substances certified by Environment Canada."

Further training of employees is required if the facility requests to take part in the National Vehicle Scrappage Program. In order to register with the program, employees of the facility must attend a training session provided by the program. This training session may be completed in person or online (National Code of Practice, 2008).

3.3 Administrative Requirements and Record Keeping

Administrative record keeping is essential in the operation of the ELV facility. Based on the National Code of Practice (2008) and British Columbia Ministry of Environment (2008), records must be kept on-site and include the following items:

- Transportation and manifest records from licensed hazardous waste transporters of all hazardous wastes transported. Records should be identified by a manifest number and invoice number and should be kept in a central filing location (kept on-site i.e Community Public Works office, a minimum of two years).
- Copy of the most up-to-date transporters' licence that allows them to transport all hazardous wastes with respect to ELVs.
- Records of staff members qualified to remove refrigerants (must be kept on-site a minimum of two years).
- Records created by qualified refrigerant removal technicians that tested and removed refrigerants from ELVs (kept on-site a minimum of two years).

The following plans and procedures (based on the National Code of Practice (2008) and British Columbia Ministry of Environment (2008)) should also be kept on-site and accessible to all employees:

- Detailed spill response plan and procedures.
- Standard operating procedures that have been developed specifically for the facility.
- Safety and environmental policies and procedures.
- Environmental Management Plans and audit reports.

3.4 Recycling and Processing Areas

According to the National Code of Practice (2008), recycling of ELVs will require space for six (6) different processing activities. These activities include:

- Accepting and storing ELVs.
- Removal of hazardous fluids and wet parts (if required).
- Storing ELV carcasses once wet parts and fluids have been removed.
- Storing hazardous fluids removed from ELVs.
- Storing wet parts removed from ELVs.
- Crushing ELV carcasses (if the site is equipped to complete this activity).

The following sections describe the site requirements for each activity.

3.4.1 Accepting and Storing ELVs and Waste Appliances

The ELV and appliance processing facility must have a space dedicated to storing and inspecting vehicles when they arrive on site. Based on the National Code of Practice (2008), there is no requirement for this area to be paved. However all spills must be cleaned up and any contaminated soils and cleaning materials must be disposed of as hazardous waste, unless materials are tested and shown not to be hazardous. Vehicles should be checked for leaks as they arrive to prevent soil and water contamination in the vehicle storage area. Runoff from the storage area caused by precipitation (rain, snow, etc.) must not be contaminated (National Code of Practice, 2008). Methods to collect and treat runoff may be required. This may include obtaining a water licence for the facility from the Nunavut Water Board.

3.4.2 Dismantling Vehicles and Appliances and Removing Hazardous Materials

Vehicles must be drained of all hazardous fluids prior to crushing the vehicle hulk. Wet parts are parts of the vehicle that contain hazardous fluids such as batteries, fuel tanks, transmissions, radiators and power steering units. Also parts that are leaking fluid, need to be treated as wet parts and their fluids removed.

Figure 1: Vehicle Ready for Dismantling

All hazardous fluids must be removed from ELVs and disposed appliances before safe storage or crushing. If these materials are not removed, hazardous materials may be released into the crushing zone thus contaminating the surrounding area or leaked into the environment during shipping. To ensure safe removal of all hazardous items, the vehicle's battery should be removed first, followed by refrigerants (if present) and thirdly fuel. The order of removal thereafter is not significant. Hazardous items that must be removed include:

- Battery
- Refrigerants
- Gasoline or Diesel
- Antifreeze
- Brake Fluid
- Engine Oil
- Transmission Fluid
- Power Steering Fluid

- Differential Fluid (if present)
- Windshield Washer Fluid
- Ballasts and Capacitors
- Mercury Switches (found in ABS brakes, convenience lighting)
- Lead (battery connectors, wheel weights)

Please refer to Section 4 for proper handling and storage techniques for the listed hazardous materials.

The space used for dismantling vehicles and appliances should have a non-permeable base, such as concrete or poly liner, to provide an easy cleaning surface and to prevent spilled fluids from contaminating the environment. The space should be covered to protect it from the weather and to prevent spilled materials from being washed into the environment. The concrete pad should be high enough to prevent flooding during rainstorm events. An alternate for smaller/temporary locations is to undertake work outdoors in dry warm weather only upon an impermeable working surface. The constructed temporary vehicle fluid recovery area should consist of, for example, a protective sand layer/poly liner/sand layer covered with a plywood working surface. Absorbent materials should be on hand at all times to clean up any spills. All spills must be cleaned up and any contaminated soils and cleaning materials must be disposed of as hazardous waste, unless materials are tested and shown not to be hazardous.

Figure 2: Absorbent Material place over Spilled Vehicle Fluids

3.4.3 Storage of Vehicle and Appliance Carcasses

Once all hazardous materials have been removed, there must be an area designated for the storage of vehicle and appliance hulks. Hulks may be salvaged for useable or recyclable parts. Once the hulks have no more "salvage" value, they may be crushed and shipped south for recycling.

Figure 3: Vehicle Hulks Ready to be Crushed

The vehicle and appliance hulk storage area must be kept clean and any spills or leaks must be cleaned up immediately. Contaminated soil and materials must be discarded as hazardous wastes, unless tested and determined to be non-hazardous. Care must be taken not to contaminate any water or runoff from the area (National Code of Practice, 2008).

3.4.4 Storage of Hazardous Fluids

Hazardous fluids must be stored in proper containers and separated appropriately. These containers should be kept in the vehicle dismantling area, stored on the concrete pad. This will provide easy access to the containers when draining fluids from vehicles. Storing in this area will also provide protection from the weather and a non-permeable surface to store the containers on. Fuels must be stored in a separate well-ventilated area of a building or outdoors protected from the weather (British Columbia Ministry of Environment, 2008). Contact the Fire Marshall for specific instructions on the storage of fuels. Please refer to Section 4 for proper handling and storage techniques for each hazardous material.

Figure 4: Example of Plastic Totes Used for Collection of Vehicle Fluids - Not Used for Gasoline

3.4.5 Crushing Area for ELV and Appliance Hulks

Crushing of vehicles and appliances is intended to reduce the volume for shipping. Crushing may consist of flattening an auto or logging. Logging an auto consists of compressing an auto into a rectangular cube. A crusher may be brought to site and operated by a third-party when quantity of hulks warrant. If so, the crushing area must be large enough to accommodate the crusher and also have a space designated for the storage of crushed vehicles. According to the National Code of Practice (2008) and the British Columbia Ministry of Environment (2008), the following items should be completed in conjunction with crushing operations:

- All hazardous materials must be removed from the vehicles prior to crushing.
- Any spills must be cleaned up immediately and all contaminated soil and cleaning materials must be disposed of as hazardous waste (unless tested and shown otherwise).
- Any water resulting from the crushing operations should be treated through oil absorbent filters.
- Once the crusher has been removed from site, the site should be cleaned and debris removed to landfill.

Figure 5: Vehicle Crusher in Operation

Figure 6: Example of "Logged" Metal

3.5 Site Security

Site security is very important. ELV processing operations may become targets for vandalism and theft and may lead to injury or environmental contamination. Therefore, it is extremely important to keep all equipment locked and inaccessible to the public. Hazardous materials and vehicle dismantling equipment should be stored in a secured location. Any machinery such as the crushing equipment should be locked and tagged out at the end of each day to prevent injury as well as stored in a secured location.

4 COLLECTION, STOCKPILING AND DISPOSAL OF HAZARDOUS ITEMS

All hazardous fluids must be removed from ELVs before safe storage or crushing. If these materials are not removed, hazardous materials may be released during storage or crushing or leaked into the environment during shipping. To ensure safe removal of all hazardous items, the battery should be removed first, followed by refrigerants (if present) and thirdly fuel. The order of removal thereafter is not significant. Hazardous items that must be removed include:

- Battery
- Refrigerants
- Gasoline or Diesel
- Antifreeze
- Brake Fluid
- Engine Oil
- Transmission Fluid
- Power Steering Fluid
- Differential Fluid (if present)
- Windshield Washer Fluid
- Mercury Switches (found in ABS brakes, convenience lighting)

4.1 Waste Batteries

4.1.1 Collection

A vehicle's battery should be removed in order to de-energize the ELV. This will allow the safe removal of all other materials. Waste batteries from ELVs contain corrosive fluids and heavy metals that may contaminate the environment if not stored and disposed properly (Department of Sustainable Development, Government of Nunavut, 2002). Therefore, all waste batteries from ELVs must be removed during the dismantling process.

Figure 7: Removing Battery from Vehicle

4.1.2 Stockpiling

Waste batteries should be stored in a leak-proof drum (metal or plastic) with a secured lid to protect batteries from rain and snow. Batteries may be stacked, but a layer of cardboard or plywood must be placed between the layers of batteries. If batteries are stacked without cardboard or plywood between the layers, there is the potential for the batteries to short and cause an electrical fire. The batteries must be secured to the pallets by nylon straps and must not be stacked more than two batteries high. A polyethylene containment liner must be used and must be large enough to place under the batteries and then wrap around them to create a sealed containment unit (Department of Sustainable Development, Government of Nunavut, 2002).

Figure 8: Batteries Not Correctly Stored

4.1.3 Disposal

Waste batteries may be sent to recycling facilities in southern Canada. The ELV operator will have to contact a recycling/disposal facility and make arrangements for that facility to receive the waste batteries. Please contact the appropriate transport authority (marine, rail, road) for appropriate shipping and transportation instructions of waste batteries (Department of Sustainable Development, Government of Nunavut, 2002). Ensure that manifests and transportation records are kept on-site.

4.2 Refrigerants

4.2.1 Collection

Refrigerants should be removed after the battery has been removed and prior to removal of any other fluids or items from ELVs. This is to prevent an accidental release of refrigerants into the atmosphere.

Removal of refrigerants must be performed only by a certified technician. Technicians must use an approved portable refrigerant recovery unit to remove refrigerants from ELVs. They must also record the amount of refrigerant removed per vehicle. Once refrigerants have been removed, the technician must clearly label each vehicle as such (British Columbia Ministry of Environment, 2008).

4.2.2 Stockpiling

Refrigerants must be stored in approved, refillable storage containers. They must not be vented to the atmosphere. Storage containers must be properly labelled and should be replaced or hydrostatically tested every five (5) years (British Columbia Ministry of Environment, 2008).

Figure 9: Refrigerant Evacuation Unit

Records of all refrigerants removed from ELVs must be maintained on-site. Records should contain the amount of refrigerant removed from each vehicle, the date it was removed, name of the certified technician who performed the recovery, registration number of the certified technician, whether the technician performed the service as an employee or agent of the business and the name of the business responsible for removal of refrigerant (British Columbia Ministry of Environment, 2008).

4.2.3 Disposal

Waste refrigerant from vehicles can be disposed of through the Refrigerant Management Canada™ program on a fee basis. This program was set up to safely collect and destroy refrigerant compounds without releasing them into the atmosphere. For more information on the program or for contact information on coordinating disposal of waste refrigerants please contact an RMC Collection Service Provider. Contact information for providers can be found on the Refrigerant Management Canada™ website: http://www.refrigerantmanagement.ca/index.php.

4.3 Waste Fuel

4.3.1 Collection

Waste fuel pertains to fuels such as gasoline and diesel. These fuels should be collected and stored separately in dedicated containers or transferred to other vehicles on-site. Fuels that are still usable (i.e. gasoline that has not gone stale) may be used in on-site vehicles. Stale gasoline cannot be used in vehicles as it may cause damage and must be handled and disposed of as a hazardous waste (British Columbia Ministry of Environment, 2008). Stale gasoline can often be identified by a bad smell caused by degradation of the fuel.

Gasoline can be dangerous as it is flammable and may catch on fire or explode if it comes into contact with a spark or ignition source. Gas should be removed in a well ventilated area and stored outside of the dismantling area. Remove gas using a suction system specifically designed for the removal of gasoline. Do not use a plastic hand pump as this may cause a build up of static electrical charge and may lead to fire or explosion. Do not puncture holes in a tank to drain gasoline or diesel; this may result in leaks or spills (National Code of Practice, 2008 and British Columbia Ministry of Environment, 2008).

Figure 10: Example of Gasoline Collection System

4.3.2 Stockpiling

Usable fuel may be stored in storage containers approved for the specified type of fuel and reused in on-site vehicles. These containers must be kept outside of the dismantling area to prohibit fume build-up and decrease the risk of fire. Stale gasoline and waste fuel must also be stored in approved containers outside of the dismantling area and must be labelled as waste/unusable fuels. Secondary containment should be provided. If stored outdoors, these containers should be protected from rain and snow.

4.3.3 Disposal

Usable fuel should be reused where possible to decrease the amount of waste fuels to be transported offsite. This will decrease shipping and disposal costs. Waste fuels and stale gasoline must be collected and transported off site. The most effective method to transporting out of the community will be by annual barge. These fuels will need to be transported off site by a licensed Transportation of Dangerous Goods shipper. Arrangements will have to be made with the barge company to complete the appropriate manifests and have the approved packaging for transportation offsite. Records of manifests must be kept on-site for a minimum of two years.

4.4 Waste Oils and Fluids

4.4.1 Collection

Waste oils found in ELVs include: engine oil; transmission, power steering, and brake fluids; and differential oil. According to the National Code of Practice (2008), brake, transmission and power steering fluids may be mixed with waste oil. However, based on information from Yukon Environment (2005) and Missouri Department of Natural Resources (1997), brake fluid may sometimes be included, however, due to chlorinated compounds that may be found in some brake fluids, it is recommended that brake fluid not be mixed with waste oils. Please refer to Section 4.5 for further information.

It is recommended that brake fluid be collected with a dedicated pump and stored separately from other oils. Other oils i.e. engine, transmission, power steering and differential can be collected using a common pump and stored in a mixed oil container. Brake fluid should be tested when the container is full to determine chlorinated content and end disposal.

Waste oils can be collected by draining from the vehicle components or by using a hand pump. When draining, use a drip pan to collect the fluids. Once all the fluid has been drained from the component, replace the drain plug, empty the fluid into the designated and marked storage container. For differentials, replace all removed bolts to prevent leakage.

Figure 11: Using Drip Pans to Catch Draining Fluids

When using a hand pump to remove fluids, ensure that each fluid (aside from oils such as engine, transmission, power steering and differential) has a dedicated hand pump. Do not use the same hand pumps for brake fluid, antifreeze, windshield washer fluid, etc. Once all fluid has been drained, empty the container of each pump directly into the designated storage container.

Figure 12: Using Hand Pump

4.4.2 Stockpiling

Waste oil may be stored in steel drums or plastic containers. Both types of containers must have proper fitting lids. These containers may be kept in the dismantling area within a secondary containment unit. According to the British Columbia Ministry of Environment (2008), steel drums are recommended over plastic containers as plastic tends to degrade over time and could potentially cause a leak or spill.

Figure 13: Example of Plastic Container Used for Storage of Waste Oils

Figure 14: Example of Steel Drum Used for Storage of Waste Fluids

4.4.3 Disposal

Waste oil can be disposed of in different ways, however the most appropriate disposal methods for Nunavut include transportation to a recycling facility or used as fuel in a waste oil furnace. Transporting to a recycling facility will involve shipping waste oil out of the community on the annual barge. Hazardous waste/recyclable manifests will need to be completed.

Use of waste oil as a fuel in an approved furnace will eliminate the need to ship waste oil to a southern recycling facility. Waste must only be transported to an approved user/recycler of waste oil.

4.5 Brake Fluid

4.5.1 Collection

Brake fluid may be collected using a hand pump as described for the collection of waste oils. The fluid should then be disposed of into a container designated specifically for brake fluid.

Depending on the end disposal methods of the collected waste oil, brake fluid should not be mixed with waste oil as it may contain chlorinated compounds. Chlorinated compounds when burned in a waste oil burner may cause smoke, fumes or problems with the waste oil burner (Yukon Environment, 2005 and Missouri Department of Natural Resources, 1997). According to the Missouri Department of Natural Resources (1997), brake fluids may contain chlorinated compounds if:

1. An older brake fluid manufactured using chlorinated compounds was used; or,
2. It had become contaminated from brake cleaners that contain chlorinated compounds.

To be sure, the ELV facility operator may want to use a test kit to determine whether or not the used brake fluid contains chlorinated compounds. The facility operator will have to contact the waste oil recycler/disposal company to determine if they will accept waste oil mixed with brake fluid that may contain chlorinated compounds (Missouri Department of Natural Resources, 1997).

4.5.2 Stockpiling

Brake fluid may be stockpiled in approved clearly labelled containers until it can be shipped out by barge. Waste brake fluid should be kept separate from other waste oils unless the ELV facility operator has contacted the recycling/disposal company and has confirmed with them that adding brake fluid to the waste oil is acceptable.

4.5.3 Disposal

Waste brake fluid must be shipped out of the community by annual barge by a licensed Transportation of Dangerous Goods shipper. Brake fluid must be sent to a proper disposal/recycling facility and arrangements with the facility to accept brake fluid must be made prior to shipping.

4.6 Antifreeze

4.6.1 Collection

Antifreeze may be collected by using a hand pump to remove it from the ELV. It must be stored in a clearly marked steel drum or plastic container and must not be mixed with other waste fluids such as oils, windshield washer fluid, brake fluid, etc. Water contaminated by antifreeze must not be put through an oil/water separator as a method of treatment. Oil/water separators do not remove antifreeze from water and if discharged through an oil/water separator the antifreeze may be released into the environment (British Columbia Ministry of Environment, 2008).

4.6.2 Stockpiling

Waste antifreeze must be stored in an appropriate container with a secure lid. Store containers within a secondary containment area that does not have a drain, thereby preventing the release of antifreeze into the environment. Antifreeze that is reusable can be used within other operating vehicles (British Columbia Ministry of Environment, 2008). Unusable antifreeze must be kept separate and stored until it can be shipped out of the community.

4.6.3 Disposal

Antifreeze must not be disposed into the environment as it is toxic and may contaminate the soil and water. It must be stockpiled until it can be shipped to a proper disposal facility. Transportation and manifest records of shipments of waste antifreeze must be kept on-site for a minimum of two years (British Columbia Ministry of Environment, 2008).

4.7 Windshield Washer Fluid

4.7.1 Collection

Windshield washer fluid is a toxic substance that must be drained from all ELVs prior to crushing. Remove washer fluid from ELVs by using a dedicated hand pump and draining the fluid into a dedicated container. Do not mix with other fluids such as engine oil, antifreeze, brake fluid, transmission fluid, etc. Sell or give away reusable washer fluid for use in other operational vehicles.

4.7.2 Stockpiling

Washer fluid must be stored in an appropriate container with a secure lid. Store containers within a secondary containment, area that does not have a drain in order to prevent the release of washer fluid into the environment. Most washer fluid is reusable and can be used within other operating vehicles (British Columbia Ministry of Environment, 2008). Unusable washer fluid must kept separate and stored until it can be shipped out of the community.

4.7.3 Disposal

Waste washer fluid must not be disposed into the environment as it may be toxic. It must be stockpiled until it can be shipped to a proper disposal facility. Transportation and manifest records of shipments of waste fluid must be kept on-site for a minimum of two years.

4.8 Mercury Switches

4.8.1 Collection

The Mercury Switch Out Program is a program that was developed to help automotive recyclers and dismantlers remove and dispose of mercury switches safely from ELVs, when an ELV dismantling facility registers with the program. Clean Air Foundation staff will send to the facility training and educational materials, a collection container for the mercury switches and a pre-paid waybill to send the container back once it is full.

All mercury switches must be removed from ELVs prior to crushing the vehicle hulks. Mercury switches can be found in trunks, hoods, convenience lighting and anti-lock braking systems. Not all vehicles have the same number of mercury switches and not all switches are found in the same locations in each vehicle. The Mercury Switch Out Program website has a number of resources to help ELV facility operators locate mercury switches in various vehicle models and step by step instructions on how to remove these switches. For each convenience light location, the following general steps must be taken:

- Locate the lighting assembly under the vehicle trunk and/or hood.
- Remove any fasteners to separate the entire lighting assembly from the vehicle.
- Break open the lighting assembly to expose the mercury switch capsule (a sealed metal pellet). Small flathead screwdrivers and wire cutters are often the only tools that are required.
- Remove the mercury switch capsule (using a small screwdriver) and place it in the *Switch Out* collection container. Replace the lid on the container. The remaining plastic/metal from the lighting assembly can be disposed of with regular waste.

On vehicles with ABS breaking systems, the following general steps must be taken:

- Locate the ABS G-Force sensor module on the vehicle. Module locations include: the drive tunnel, below the rear seat on the floor pan, on the right front wheel apron, and on the left frame rail right below the driver.
- Remove the ABS G-Force sensor module and place the entire sensor module in the *Switch Out* collection container. Replace the lid on the container. **NOTE:** The ABS G-Force sensor module contains either two or three mercury switch capsules embedded in the casing. Do not attempt to remove the mercury switch capsules from the sensor module.

Please refer to the Mercury Switch Out Program website at http://www.switchout.ca/ for further information.

Figure 15: Example of Removing Light Assembly Containing a Mercury Switch

Figure 16: Mercury Pellet removed from Vehicle Convenience Light

4.8.2 Stockpiling

Once the mercury switches have been removed from each unit, they should be stored in the plastic container provided by the Mercury Switch Out Program. Most of the mercury found in these switches is contained within a metal capsule and therefore the likelihood of a spill is relatively low. However, should a metal capsule break, refer to the Switch Out Clean-Up Instructions located on the Mercury Switch Out Program's website for proper techniques to clean up the spill.

4.8.3 Disposal

Once the container has been filled, use the pre-paid waybill provided by the Mercury Switch Out Program to ship the switches back to the mercury management facility for safe disposal.

4.9 Lead

4.9.1 Collection

Most lead in ELVs comes from wheel weights and battery cable ends. These items must be removed from vehicles prior to crushing and stored in separate, covered strong containers. Lead can be recycled into other usable items (National Code of Practice, 2008 and British Columbia Ministry of Environment, 2008).

4.9.2 Stockpiling

Store lead wheel weights and battery cable ends in separate, covered strong metal or wooden containers.

4.9.3 Disposal

Lead can be recycled into other usable items. The ELV operator will have to contact a metals recycler and make arrangements for them to accept the recovered lead.

4.10 Summary

The following table summarizes information presented in Sections 4.1 to 4.9 of this manual.

Table 2: Summary of Hazardous Materials Management Procedures for ELVs

Type of Material	Collection	Stockpile	Disposal	Comments
Battery	Disconnect terminals and remove from automobile.	Store in leak-proof container. Stack no more than 2 layers.	Recycling in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables.
Refrigerants	To be removed by a certified technician using a mobile refrigerant removal unit.	Store in approved storage containers for refrigerants.	Recycling in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables.
Gasoline or Diesel	Suction system specifically designed for removal of gasoline; Suction system specifically designed for removal of diesel.	Store in approved storage container, outside or in a well ventilated area.	Reuse "good" fuel in operable vehicles. Dispose of stale fuel to a facility in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables/wastes.
Engine Oil Transmission Oil Power Steering Oil Differential Oil	Use hand pump or drain from vehicle components.	Store mixed together in steel drums or plastic containers.	Recycling in southern Canada or for use in a certified waste oil furnace.	Must be labelled, packaged and manifested as hazardous recyclables/wastes.
Brake Fluid	Use dedicated hand pump to remove from vehicle.	Store separately in steel drum or plastic container.	Disposal in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables/wastes.
Antifreeze	Use dedicated hand pump to remove from vehicle.	Store separately in steel drum or plastic container.	Reuse "good" antifreeze in operational vehicles. Dispose of waste antifreeze to a facility in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables/wastes.
Windshield Washer Fluid	Use dedicated hand pump to remove from vehicle.	Store separately in steel drum or plastic container.	Reuse "good" washer fluid in operational vehicles. Dispose of waste washer fluid to a facility in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables/wastes.
Mercury Switches	Use small flathead screwdrivers and wire cutters to remove assemblies from vehicles. Remove metal mercury pellet from assembly.	Store in designated mercury switch collection container provided by the Mercury Switch Out Program.	Use waybill provided by the Mercury Switch Out Program to ship to mercury management facility.	Must be labelled, packaged and manifested as hazardous wastes.
Lead Wheel Weights	Remove battery cable ends and wheel weights from vehicles.	Store in separate covered, strong metal or wooden containers.	Recycling in southern Canada.	Must be labelled, packaged and manifested as hazardous recyclables.

5 APPLIANCES

Appliances contain hazardous materials that must be removed prior to stockpiling and crushing at a solid waste site. As removal and disposal techniques of refrigerants and mercury switches from appliances is similar to those used for ELVs, it may be beneficial to have these items removed from appliances during the processing of ELVs. This is especially true if a certified refrigerant removal technician must be brought into the community to remove the refrigerants from ELVs. The following sections describe the various types of hazardous materials, where to find them and how to remove them from appliances.

5.1 Refrigerants

5.1.1 Collection

Refrigerants are found in refrigerators, freezers, window air conditioners and dehumidifiers. Refrigerants must be removed in a similar manner to the process described for ELVs. Removal of refrigerants must be performed only by a certified technician. Technicians must use an approved portable refrigerant recovery unit and follow approved procedures for removal of refrigerants from appliances. Venting of refrigerant into the atmosphere is unacceptable (Environment Canada, 2010).

Appliance dismantlers should also be aware that oil found in the appliance compressors may be contaminated with refrigerants. A certified refrigerant removal technician should be able to safely remove and dispose of refrigerants in the oil and the contaminated compressor oil (Environment Canada, 2010).

5.1.2 Stockpiling

Recovered refrigerant must be stored in an approved storage container for the transport of refrigerant materials. Different refrigerants should not be mixed and refrigerant containers that held one type of refrigerant should not be used to hold another type (Environment Canada, 2010). The refrigerant recovery technician must be knowledgeable of which containers are approved for the collection and transport of recovered refrigerant. Technicians must also keep a record of what type and how much refrigerant was removed. Storage containers must be labelled appropriately for transport.

5.1.3 Disposal

Waste refrigerant from appliances can be disposed of through the Refrigerant Management Canada™ program on a fee basis. This program was set up to safely collect and destroy refrigerant compounds without releasing them into the atmosphere. For more information on the program or for contact information on coordinating disposal of waste refrigerants please contact an RMC Collection Service Provider. Contact information for providers can be found on the Refrigerant Management Canada™ website: http://www.refrigerantmanagement.ca/index.php.

5.2 Mercury Switches

5.2.1 Collection

Mercury switches may be found in a variety of appliances, generally those that have automatic shut-off features and/or convenience lighting. These appliances may include freezers, washing machines, gas ranges, gas hot water heaters, gas furnaces, sump pumps, etc. However, these mercury switches do not look the same as those found in vehicles and therefore caution must be taken when identifying and retrieving switches from appliances. The Vermont Department of Environmental Conservation in conjunction with the Vermont Mercury Education & Reduction Campaign and Chittenden Solid Waste District have developed a manual titled *Household Appliance Mercury Switch Removal Manual*. A copy of this manual has been included as an appendix to this guideline or alternatively can be found on the following website: http://www.mercvt.org/PDF/appman.pdf.

Figure 17: Assorted Mercury Freezer Switches for Disposal

(Source: Vermont Department of Environmental Conservation, Vermont Mercury Education & Reduction Campaign, Chittenden Solid Waste District, 2002)

Figure 18: Chest Freezer Light with an Inline Mercury Switch (Glass Ampule)

(Source: Vermont Department of Environmental Conservation et al., 2002)

Figure 19: Washing Machine Mercury Switch

(Source: Vermont Department of Environmental Conservation et al., 2002)

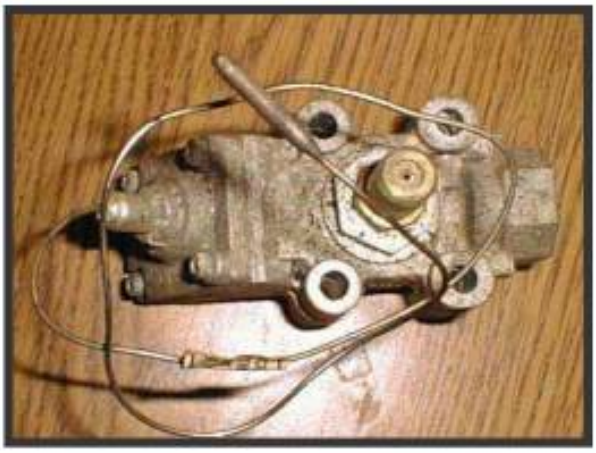

Figure 20: Gas Safety Valve Control, Gas Safety Valve Capillary Tube and Safety Valve Sensor Bulb from Gas Range

(Source: Vermont Department of Environmental Conservation et al., 2002)

Figure 21: Sump Pump Float Containing Mercury

(Source: Vermont Department of Environmental Conservation et al., 2002)

5.2.2 Stockpiling

Once mercury containing units have been removed, they should be stored in a heavy plastic container with a proper fitting lid. Containers must be in good condition and must not leak. It is advisable not to use an aluminum or tin container as mercury may react with these metals and may leak through the container. Container contents must be marked on the outside of the container and containers must be stored in a dry location where they will not be disturbed (California Environmental Protection Agency, 2005).

5.2.3 Disposal

Summerhill, the company which operates the Mercury Switch-Out Program for ELVs, in conjunction with the Canadian Appliance Manufacturers Association, is currently working on developing a similar program for the collection of mercury switches from appliances. Information regarding this program can be found by contacting the Summerhill Impact group or on the following website:

http://www.summerhillgroup.ca/eng/impact/programs/appliance-switches.php.

5.3 Ballasts

5.3.1 Collection

Ballasts are components generally found in fluorescent lighting fixtures and high intensity discharge (HID) lamps. In fluorescent lighting fixtures, the ballasts are usually found between two fluorescent tubes and protected by a heat shield. HID ballasts are generally found encased within a box attached to the outside of the light fixture or located within the light housing. Examples of HID lamps include streetlights and parking garage lights (Environment Canada, 1991).

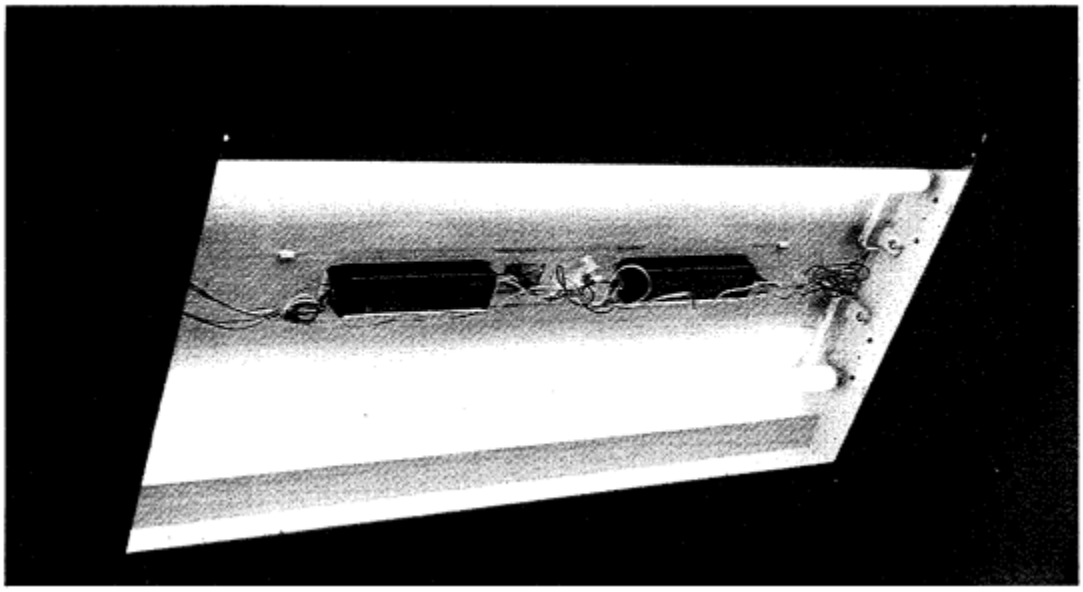

Figure 22: Fluorescent Lamp Unit with Exposed Lamp Ballasts

(Source: Environment Canada, 1991)

It should be noted that fluorescent lights found in appliances such as stoves may contain ballasts that may have PCB material within them. Unless ballasts are identified as “PCB free”, these items should be removed and properly disposed of as hazardous waste.

Fluorescent ballasts contain a core/coil unit, a thermal protector and a capacitor. The capacitor may contain PCBs. It is the PCBs that are of concern as they may pose a risk to human and environmental health. These ballasts may also be filled with an asphalt/silica type compound. If the ballast contains this compound, the capacitor within the ballast will not be readily accessible. Therefore, it is important that the entire ballast unit is removed and disposed of through a proper hazardous waste disposal company. HID ballasts usually require higher levels of capacitance than fluorescent ballasts. Therefore, they often contain more capacitors and hence may contain more PCBs than fluorescent light ballasts (Environment Canada, 1991).

In the late 1970's to early 1980's, many companies began phasing out the use of PCBs in capacitors. However, there are still ballasts with capacitors in use today that may contain PCBs and therefore caution must be taken when removing and disposing of ballasts. In order to determine if a ballast contains PCBs, the manufacturer of the ballast should be contacted. The manufacturer should be able to determine whether the ballast contains PCBs based on the date codes and/or catalogue codes on the ballast casing (Environment Canada, 1991). Many manufacturers also began labelling non-PCB containing electrical equipment to aid in proper handling. Equipment labelled as "PCB-free" of "Non PCB" does not require removal. The recycler should mark each appliance as inspected and cleared as appropriate.

Caution must be taken when removing ballasts. The fixture must be de-energized prior to removal of the ballast and must not be re-energized during the removal. Capacitors may also hold a charge for several days after their last use and therefore there is a risk of electric shock to persons removing capacitors. As there is a possibility of PCBs leaking from the ballast, goggles and acid resistant gloves must be worn when removing and handling the ballast (Connecticut Department of Environmental Protection, 2005).

It should be noted that fluorescent lamp tubes contain mercury phosphor powder, lead and cadmium and must not be disposed of in the general waste stream. They must be disposed of through an approved hazardous waste recycler and/or disposal company. If the tubes are not broken, they may be packaged in their original packaging and sent to an approved facility with no further special transportation requirements. However, if the tubes are broken, special safety, handling, packaging and transportation requirements must be met. Safety procedures are of utmost importance to prevent worker exposure to mercury. In the case of disposing of a broken fluorescent tube, contact a Safety Officer at the Prevention Services Division, Workers Compensation Board in Iqaluit at (867) 979-8500 or 1-877-404-4407 (Environmental Protection Service, 2003).

5.3.2 Stockpiling

The PCB Regulations (published in the Canada Gazette, 2008) under the Canadian Environmental Protection Act, 1999 states in paragraph 24:

"PCBs or products containing PCBs shall be stored at a site that is

(a) a building, room, shipping container or other enclosed structure; or

(b) an area that is enclosed by a woven mesh wire fence or any other fence or wall with similar security characteristics, and the fence or wall shall be at least 1.83 m high."

The PCB Regulations go on to state in paragraph 25:

"The owner or operator of a PCB storage site shall

(a) store all PCBs or products containing PCBs that are in liquid form in

(i) sealed containers, other than drums, that are made of steel or other metals that provide sufficient durability and strength to prevent those PCBs or products from being affected by the weather or released, or

(ii) drums that are

(A) of a capacity not greater than 205 L,

(B) a closed-head double-bung drum made of steel having a gauge of 16 or heavier, and

(C) painted or treated to prevent rusting;

(b) store all PCBs or products containing PCBs that are in solid form in

(i) containers, other than drums, that are made of steel or other materials that provide sufficient durability and strength to prevent those PCBs or products from being affected by the weather or released, or

(ii) drums that are

(A) of a capacity not greater than 205 L,

(B) made of steel having a gauge of 18 or heavier,

(C) equipped with a securely attached, removable steel lid and a gasket made of material that is resistant to the PCBs or the products containing PCBs that are stored in the drums, and

(D) painted or treated to prevent rusting;

(c) store equipment containing PCB liquids in

(ii) containers, other than drums, that are made of steel or other materials that provide sufficient durability and strength to prevent the equipment from being affected by the weather and to prevent any PCB liquid that leaks from the equipment from being released, or

(iii) drums described in subparagraph (b)(ii);"

Paragraph 25 goes on to list the storage space requirements for the above described containers. A copy of the PCB Regulations has been included as an appendix to this manual. Please refer to this document for further proper storage, handling and documentation information and requirements.

5.3.3 Disposal

As previously stated, ballasts containing hazardous materials must be sent to an approved hazardous waste disposal facility. PCB Disposal (a division of Sanexen Environmental Services Inc.) is a company located in Ontario that will accept and dispose of PCB containing ballasts. They have also published a document to help identify ballasts that may contain PCBs. Further information regarding this company can be found on the website at: http://www.pcbdisposalinc.com/.

5.4 Capacitors

5.4.1 Collection

Capacitors found in household appliances are predominantly labelled as either 'oil-filled' or 'dry'. Oil-filled capacitors are often referred to as running capacitors. Running capacitors are generally used in applications where they are required to be in use during the entire operating time. As they are constantly in use, heat builds up within the capacitor. The oil contained within the capacitor helps to dissipate this heat. Oil-filled capacitors manufactured prior to the late 1970's and early 1980's may contain PCB compounds within the oil. In order to determine if the capacitor contains PCB material, contact the manufacturer and provide the date and/or catalogue code located on the capacitor casing. Some capacitors may be stamped with "NO PCBs" on the casing. In this case, the capacitor does not contain PCBs. Appliances that most likely contain oil-filled capacitors include air conditioners, copy machines, microwave ovens, mercury vapour lamps, dehumidifiers and submersible well pumps. Capacitors in microwaves can be found behind the front control panel and wired to the transformer (Connecticut Department of Environmental Protection, 2005).

Be aware that oil-filled space or portable heaters may not contain a PCB capacitor, however, PCBs may be found within the actual oil. Although most oil-filled space heaters do not contain PCBs, those that do may have very high concentrations of PCBs. It is recommended that any of these types of heaters be tested for the presence of PCBs prior to crushing or disposal (Connecticut Department of Environmental Protection, 2005).

Dry capacitors are generally known as starting capacitors as they are used to start a motor during the initial start up. Once the motor is running, they are no longer needed and so are not used during the entire motor operation. Because these capacitors are only used for short periods of time, they do not produce much heat and therefore do not require oil for heat dissipation. Starting capacitors are usually identified by a non-sealed black casing or outer shell. Starting capacitors are generally found in clothes dryers, fans, refrigerators, stoves, televisions, washing machines and various electronic equipment. These capacitors are not known to contain PCB materials and so are not required to be handled as hazardous waste material.

5.4.2 Stockpiling

Capacitors containing PCBs should be stockpiled as outlined in Section 5.3.2 of this manual.

It is important to keep ballasts and capacitors containing PCBs away from fire hazards. Fire may cause these items to explode and release PCBs into the environment.

5.4.3 Disposal

Capacitors containing PCBs should be disposed of as outlined in Section 5.3.3 of this manual.

6 HEALTH AND SAFETY

6.1 Worker and Public Safety

As ELV dismantling operations deal with a number of hazardous substances, employee and public safety are very important. Employers must ensure that their employees are trained in safe work practices for the facility. This may include but not be limited to special handling and storage requirements of hazardous materials, WHMIS, first aid, emergency procedures, etc. Employers must also provide employees with the necessary personal protective equipment (PPE) to complete their jobs in a safe manner. PPE and safety items that should be maintained on-site include:

- Approved safety boots (steel toe)
- Eye goggles
- Gloves
- Eye wash station
- First aid kit
- Fire extinguisher as approved by the Fire Marshall
- Work coveralls.

Workers should also remove items from vehicles in the following order to prevent injury and environmental damage:

- Remove the battery first to de-energize the vehicle.
- Remove refrigerants to prevent accidental release into the environment.
- Remove gasoline in a well ventilated area to prevent the build up of fumes and decrease the risk of fire or explosion.
- Remove other hazardous materials.

Public safety must also be taken into consideration when operating an ELV dismantling facility. All hazardous items must be kept in a secure location and away from public access. At the completion of each day, the site should be secured to prevent access.

6.2 Environmental Health and Safety

With the collection and storage of hazardous materials on-site, there is the potential for environmental contamination to occur. The following best practices should be used in order to mitigate potential spills and contamination (National Code of Practice, 2008 and British Columbia Ministry of Environment, 2008):

- Store all hazardous materials in approved containers with securely fitting lids.
- All containers holding hazardous materials should be placed within a secondary containment area.
- Remove gasoline outside of the dismantling area in a well ventilated area.
- Remove refrigerants after the battery has been removed, but before removal of any other fluids or parts to prevent accidental discharge into the environment.
- Drip pans must be used at all times to catch fluids dripping from vehicles and to prevent spills.
- The dismantling area should have an adequate roof and concrete floor pad for easy clean up of spills and to prevent soil contamination. An alternate for smaller/temporary locations is to undertake work outdoors in dry warm weather only upon an impermeable working surface. The constructed temporary vehicle fluid recovery area should consist of, for example, a protective sand layer/poly liner/sand layer covered with a plywood working surface.
- Ensure water runoff does not flow through areas containing hazardous wastes.
- Spill kits should be available on-site.
- Ensure there is lime or bicarbonate of soda on hand to neutralize spilled battery acid.
- Dispose of all used spill cleanup material as hazardous wastes.

In order to follow the above best practices, the following equipment should be kept on hand (Minnesota Pollution Control Agency, 2002):

- Fire extinguishers should be available in all facility buildings. Please contact the Fire Marshal for specific type of fire extinguisher and code requirements.
- Safety equipment such as rubber or latex gloves and safety goggles.
- Absorbent materials such as rags, towels, sawdust, etc.
- Containers to hold spilled waste and used absorbent materials.
- Shovels and/or scoops.
- Industrial spill clean-up products tailored for the clean up of oils and solvents may want to be used. This will be dependent on the operation of the facility and will have to be determined whether purchase of these items is warranted.

7 COST RECOVERY

Due to the location of many communities in Nunavut, transportation of vehicle hulks and associated hazardous materials to proper recycling and disposal facilities can be quite expensive. However, there are a few items that can be salvaged from ELVs, in advance of crushing, that may be sold to recyclers to help cover some of the related disposal costs. Recovery costs of these items will be dependent on the market value of the materials at the time of sale. These items may include:

- Catalytic converters (contains several precious metals)
- Aluminum wheels
- Fuel
- Windshield washer fluid
- Antifreeze
- Waste oil

Unfortunately, sales of these items will likely not cover the entire cost of the program. Funding will have to be supplemented to complete the entire cycle of dismantling and disposal.

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Sebastian M.H. Lau, Manager – Environment Quality & Safety, General Scrap in Winnipeg, Manitoba. Personal communication and site visit to Buck's Auto on June 17, 2010.

APPENDIX A

Household Appliance Mercury Switch Removal Manual

HOUSEHOLD APPLIANCE MERCURY SWITCH REMOVAL MANUAL

SPRING 2002

PRODUCED BY:

VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION

MERCURY EDUCATION & REDUCTION CAMPAIGN • MERC • VERMONT •

CHITTENDEN SOLID WASTE DISTRICT

CSWD

Comprehensive Waste Management

Special Thanks to the following people and organizations for help in the development of this manual;

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Any questions, comments, corrections or requests for additional copies should be directed to the:

Vermont Agency of Natural Resources
Environmental Assistance Division
103 South Main Street, Laundry Building
Waterbury, VT 05671-0411

Attention: Thomas A. Benoit
Telephone: 802-241-3472
tombe@dec.anr.state.vt.us

This document is available on the Internet at:

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1.0 INTRODUCTION

Mercury (Hg) is one of the most widespread, persistent and toxic contaminants in our environment. Its incorporation into many products and its emission from combustion processes has resulted in well documented instances of population poisonings, high level occupational exposures, and worldwide, chronic, low-level environmental exposures. About two-thirds of the mercury in the atmosphere comes from human sources such as coal burning power plants and incinerators, and one-third from natural sources such as volcanoes and forest fires. The amount of mercury flowing into our lakes is between two and four times what flowed into them 100 years ago[8].

In the environment, mercury is found in various forms and complexes. Atmospheric mercury mixes with rain and snow and falls into lakes, rivers and watersheds. Once mercury enters a waterway, natural processes convert a small proportion of it to methyl mercury. Methyl mercury, one organic form of mercury, can accumulate up the food chain in lakes, ponds and reservoirs which results in high concentrations in predatory fish.

When certain mercury-tainted fish are consumed by humans, the levels of mercury can impair development of the nervous system in the fetus and in young children, affecting sensory, motor and cognitive functions, and resulting in such problems as difficulty in learning to read and inability to concentrate. Vermont's relatively pristine waters have not been spared from this regional and global problem. In addition to fish consumption advisories that recommend limiting consumption of certain fish in certain bodies of water, recent studies have shown that 12 percent of Vermont's lakes have sufficient mercury in their food chains to put common loons at considerable risk of toxic effects.

In order to prevent the continued release and build-up of mercury (in all forms) in the environment, many states including Vermont are currently working towards eliminating major sources of mercury releases. The Governors of the New England States and the Premiers of the Eastern Canadian Provinces have endorsed a regional goal of "the virtual elimination of the discharge of mercury into the environment" from man-made sources. Vermont has addressed mercury elimination through its Mercury Education and Reduction Campaign (MERC), which has included thermometer exchanges, school clean-outs, retailer and contractor mailings, dairy manometer exchanges, pharmacy pledges and various other outreach efforts to remove mercury from the solid waste stream.

One of Vermont's other efforts is the removal of mercury from discarded household appliances or "white goods". Many of these white goods, which are currently being collected for their scrap metal value, contain mercury switches and thermocouples. Mercury was used in household appliances due to it being a highly reliable means for electrical switching in varied temperature and moisture conditions[4].

When "white goods" are processed for scrap metal, mercury may be released to the environment. In fact, when white goods are processed (shredded) for scrap metal, there are three distinct by-products. These are classified into ferrous, non-ferrous metallic and nonmetallic components[1]. It is the "fluff" or non-metallic components that many of the hazardous constituents in household appliances adhere to, including mercury[2]. These hazardous components are then available to be released either through smokestack emissions at smelters, incinerators or through landfill leachate from intact products or ash from their incineration[1]. The diagram on the following page details how mercury cycles through the environment.

How Does Mercury Get Into Fish?

Once in a lake or river, mercury is converted to methylmercury by bacteria and other processes. Fish absorb methylmercury from their food and from water as it passes over their gills. Mercury is tightly bound to proteins in all fish tissue, including muscle. **There is no method of cooking or cleaning fish that will reduce the amount of mercury in a meal.**

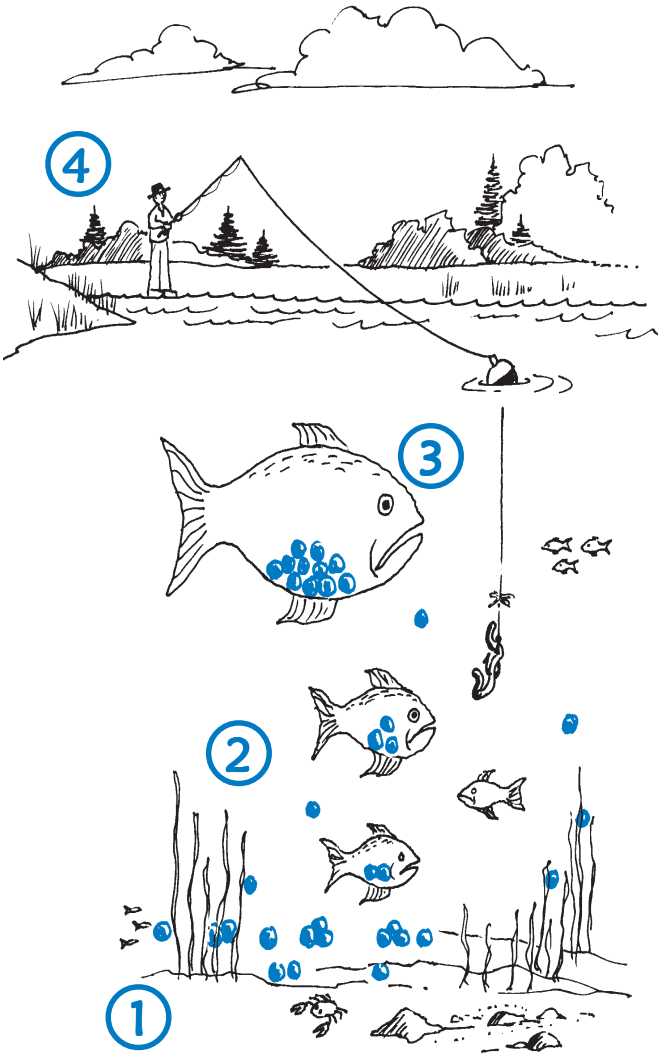
Methylmercury accumulates as you move up the food chain:

1. Methylmercury in the water and sediment is taken up by tiny animals and plants known as plankton.

2. Small fishes eat large quantities of plankton over time.

3. Large predatory fish consume many smaller fish, accumulating methylmercury in their tissues. The older and larger the fish, the greater the potential for high mercury levels in their bodies.

4. Fish are caught and eaten by humans and animals, causing methylmercury to accumulate in their tissues.



● = represents methylmercury

The State of Vermont Fish Contaminant Monitoring Program has been monitoring the levels of mercury in fish tissue since 1987. Measureable concentrations have been observed in 95% of the samples collected from lakes and rivers across the state. The highest amounts of mercury are generally found in older fish of species which consume other fishes. The species which contain the greatest amounts of mercury are walleye from Lake Champlain, smallmouth bass, and chain pickerel. The lowest mercury levels are found in pumpkinseed sunfish, brown bullhead, and brook trout from streams. The Vermont Department of Health has issued a fish consumption advisory which recommends that fewer meals be consumed of species with greater than average mercury levels. The advisory is also more protective of women of child-bearing age and children under age 7. For more information on consumption advisories call the Department of Health toll-free at 1-800-439-8550.

The purpose of this manual is to address the removal of mercury switches and thermocouples prior to appliances being processed for their scrap metal. By educating individuals on how to remove mercury prior to metal reclamation, we all can help manage mercury wastes properly and keep mercury out of the environment.

2.0 REGULATORY BACKGROUND

Mercury is an environmental concern because it is a heavy metal that can accumulate in living tissues and cause adverse health effects. When a mercury containing device is disposed of in a landfill or incinerator, the mercury in it can escape to contaminate air, soil, surface water and ground water. For a number of years, the Vermont Department of Health has issued health advisories warning people to limit consumption of freshwater fish caught in Vermont due to elevated levels of mercury in some fish species. When mercury is spilled in the home or workplace, the silvery liquid metal can evaporate and be breathed in by everyone in the building. Mercury affects the human brain, spinal cord, kidneys and liver. It affects the ability to feel, see, taste and move. Long term exposure can result in symptoms that get progressively worse and lead to personality changes, stupor and coma.

Mercury is intentionally added to many familiar products. Some of these include:

- flourescent and high intensity discharge (HID) lights
- certain types of thermometers and thermostats
- heat sensors for gas pilot lights
- tilt switches in automobiles and appliances
- silent wall switches and electric relays
- vacuum gauges, barometers and manometers

For the last 20 years, mercury-containing waste from business, industry and institutions has been considered a hazardous waste because it often fails standard EPA toxicity test limits. More recently, a less restrictive waste handling option has been added to both state and federal hazardous waste regulations for certain mercury-containing wastes. These wastes are called “Universal Wastes” because they are equally likely to come from either regulated or unregulated sources. Only thermostats and hazardous waste (mercury-containing) lamps are currently listed as Universal Wastes. Wastes that are listed as “Universal Wastes” have reduced requirements for reporting, handling and storage (See Vermont Hazardous Waste Management Regulations, Subchapter 9, *Universal Waste Management Standards* for more information.). By having less restrictions on mercury-added product management, proper management can be easily facilitated.

The Vermont Agency of Natural resources is in the process of revising its “Universal Waste” rule to include all categories of mercury-added products. In the interim, to facilitate removal of as many of these products as possible from the solid waste stream and promote proper management of the collected mercury, these waste materials may be handled under existing provisions of the Vermont Hazardous Waste Management Regulations (See Subchapter 9, *Universal Waste Management Standards*) in the same manner as “Universal Waste Thermostats”.

In 1998, the Vermont legislature passed a bill to decrease the amount of mercury in the State’s solid waste. Under one provision of the bill, labeled mercury-added products are required to be separated

from the trash and are banned from landfill disposal. After March 1, 2000, all mercury-added products are required to be labeled under Vermont Law. Municipalities and Solid Waste Districts are required to provide collection programs for these materials. The Vermont law applies equally to households, farms, businesses and industries. The following mercury-added products are banned from landfill disposal and/or are required to be labeled in Vermont:

- thermostats or thermometers
- switches individually or part of other products
- medical or scientific instruments
- electric relays or other electric devices
- lamps
- batteries, other than button cells

HOW TO USE THIS MANUAL

This manual covers:

- the purpose of mercury in particular appliances
- its location and use
- how to safely and properly remove it
- how to safely store mercury-added products
- the proper methods of disposal or recycling
- mercury spill clean-up
- lists of hazardous waste transporters, mercury recyclers and spill clean-up firms

Since we are constantly discovering additional products with mercury-added components, this manual remains a work in progress. Please let us know of any additional products that you feel should be added to this manual.

3.0 HOUSEHOLD APPLIANCE MERCURY REMOVAL

Safety Note: Proper personal protective equipment should be used at all times (i.e, safety glasses, gloves, tyvek suit and in the event of a spill a respirator and mercury cartridges). In addition, spill equipment and storage material should be on-hand prior to any mercury-added device removal.

All appliances should be unplugged from an electrical outlet prior to any mercury switch removal. Appliances that have had these devices removed should be disabled to prevent future use (i.e, cut the electrical cord, or disable the gas feed line). All appliances that have had their mercury switches removed should be handled as scrap metal for recycling (not to be reused as a home appliance). All other hazardous components must be properly removed and disposed of (including but not limited to chlorofluorocarbons (CFCs) and polychlorinated biphenyls (PCBs) prior to scrap metal recycling.

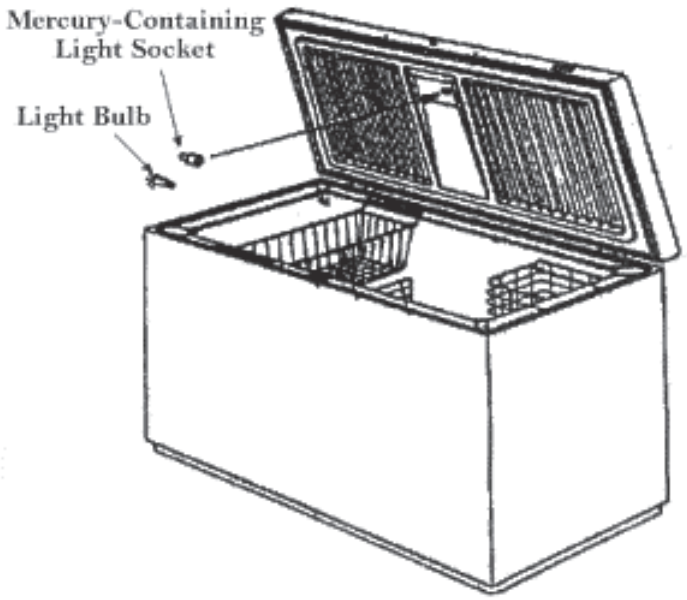
In case a switch breaks during the removal process, please follow the mercury spill clean-up instructions on page 20.

Note: Once these mercury-added products are removed, proper handling, storage and disposal are described on page 19 and in Appendix E.

3.1 Chest Freezers

Some chest freezers are made with a mercury switch inside the freezer cover light socket (see Figure below). The mercury engages two contact points when the lid is opened thus completing the electrical circuit and turning on the light. All freezer manufacturers have stopped using mercury as a switching mechanism and begun using a mechanical switch by January 1, 2000. If there is no visible push button switch mechanism, the freezer is likely to have a lid mercury tilt switch[3].

Chest Freezer with Mercury-Containing Light Socket.



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The following procedure should be used for removal of the mercury tilt switch.

CHEST FREEZER MERCURY SWITCH REMOVAL

ESTIMATED REMOVAL TIME: 1-5 MINUTES

STEP 1.
Open the freezer lid and look for a manual switch, similar to the one shown above. If it has a manual switch, the appliance can be handled as scrap metal (after removal of CFCs).

STEP 2.
Locate the light socket on the underside of the lid (on some freezers you may have to remove a plastic light cover).

If there is no manual switch, proceed to **STEP 2.**

STEP 3.
Remove the light bulb and properly discard.

STEP 4.
Remove the plastic housing (either by unscrewing it or breaking it off).

STEP 5.
Gently pull the light socket out of its mounting bracket (due to some lights having an in line mercury switch see Reference Photo 2 below).

STEP 6.
Cut or remove the attached wires.

STEP 7.
Remove and properly dispose of the entire light socket.

REFERENCE PHOTO 1.
Assorted mercury freezer switches for disposal.

REFERENCE PHOTO 2.
Chest freezer light with an inline mercury switch (glass ampule).

3.2 Washing Machines

Mercury switches were used in a small number of washing machines manufactured prior to 1972 because of their ability to reliably function in a high-moisture environment. Most washing machines with mercury switches will have passed through the recycling stream by 2010. Mercury switches were used for two different applications in washing machines, both of these uses were for consumer protection.

One application of the mercury switch was used to detect a lid opening and engage a brake to quickly stop the washer drum from moving. This feature is particularly important when the washer is in a spin cycle because it reduces the risk of a consumer being injured by reaching into a spinning basket. This switch is located between the washer tub and the cover for the tub area of the washer and is activated when the lid of the washer is lifted.

Another use for mercury switches in washing machines was in the dynamic stabilizing system to prevent a severe out-of-balance condition (only on certain models). This switch worked by breaking the circuit when the washing machine was severely out of balance. This switch is located on the back of certain washing machine models and is activated when the washing machine is severely out of balance.

These switches can be identified and removed using the following procedures.

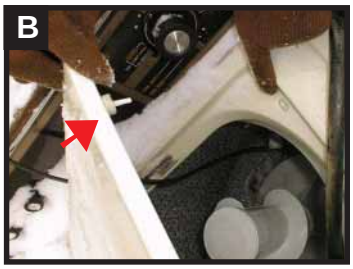
WASHING MACHINE MERCURY SWITCH REMOVAL

ESTIMATED REMOVAL TIME: 5-10 MINUTES

STEP 1.
Open the lid on the washer and look for a non-mercury mechanical switch. These switches come in various sizes, shapes and locations. You should also be able to hear an audible “click” when a mechanical switch engages and disengages (with the opening and closing of the lid). If there is no mechanical switch continue to STEP 2. Photos A and B are examples of non-mercury mechanical switches.

Non-mercury mechanical switch examples:

A) back tab switch



B) front tab switch.

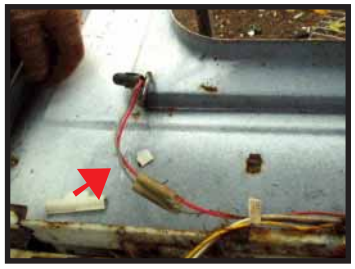
Once you have determined that there is no mechanical switch, the following procedure can be used to remove the mercury switch.

STEP 2.
Pry off the top of the washing machine as shown in figure a. or remove any fasteners from the lid as shown in figure b.

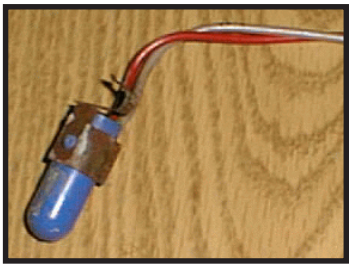
STEP 3.
On the underside of the lid, attached to the lid mounting rod, is an encapsulated mercury switch.

STEP 4.
Remove the switch from the bracket.

STEP 5.
Cut or remove any attached wires.



STEP 6.
Properly dispose of the entire washing machine mercury switch.



Another use for mercury switches in washing machines was in the dynamic stabilizing system to prevent a severe out-of-balance condition (only on certain models). Only through removal can you distinguish between a manual switch and a mercury switch. The mercury will be visible.

SEVERE OUT-OF-BALANCE SWITCH REMOVAL

ESTIMATED REMOVAL TIME: 5-10 MINUTES

STEP 1.
Locate the dynamic stabilizing switch on the back of the washing machine.

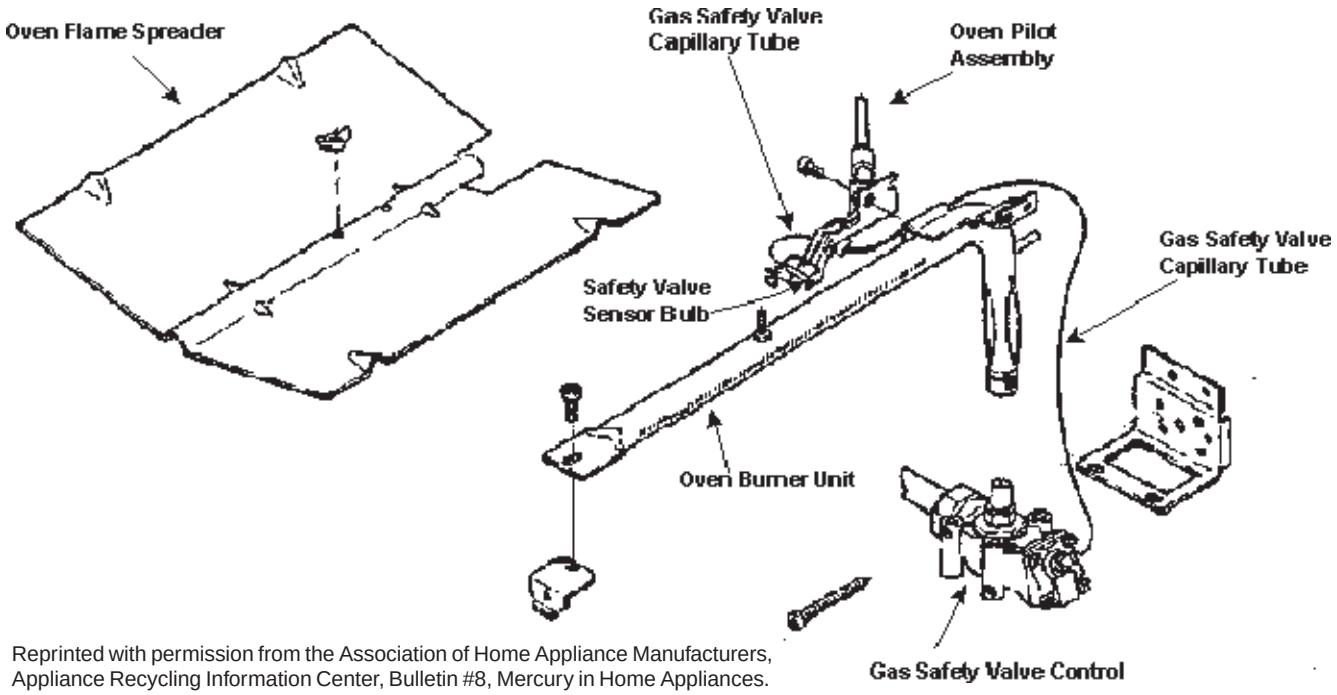
STEP 2.
Remove the fastening bolts.

STEP 3.
Disconnect the attached wires and properly dispose of the switch.

3.3 Gas Ranges

Gas ranges are ignited using either an electronic ignition system or a pilot-light. Pilot-light ranges require a mechanical safety device to detect whether the pilot-light is on and shut off the supply of gas to the burner when the pilot-light is not burning. Otherwise, the potential exists for a dangerous quantity of gas to build up in the oven. The diagram on the following page depicts the mercury containing control device on the gas burner assembly.

Gas safety valve (flame sensor) assembly.



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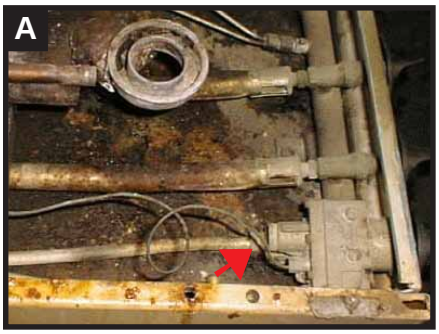
The gas burner is located beneath the oven cavity in the broiler pan. *(Note: All appliances manufactured after March 1, 2000 should be labeled if they incorporate a mercury-containing device.)* Gas ranges contain many temperature sensing probes and switches. The following procedure shows you how to distinguish the non-mercury probes and switches from the mercury switches (many times within the same appliance). Many of your stainless steel safety valve capillary tubes and sensor bulbs are mercury-containing devices while copper safety valve capillary tubes and sensor bulbs are non-mercury containing devices. ***As a general rule, magnetic metals are mercury-containing probes while non-magnetic metals are non-mercury containing probes.*** This may be difficult to distinguish with baked on food. What may appear copper maybe stainless steel coated with baked on food. Removal of any baked on food maybe necessary prior to determining metal type.

Temperature capillary tubes and bulbs found within ovens or below upper burners are usually copper probes. A copper probe is good indication of a non-mercury containing device. These capillary tubes and bulbs are instead filled with an oil or sodium-potassium mixture. Photos A thru D on the following page show some examples of non-mercury probes.

NON-MERCURY TEMPERATURE PROBES

These photos are examples of non-mercury temperature probes in a gas range and oven. Photos A and B show the top view of a gas range after the burner surface has been removed. **Note that these capillary tubes and bulbs start at the temperature control knob.**

Photos C and D show the oven control temperature capillary tubes and bulbs (top of the oven cavity) which continue from the oven control knob into the oven cavity**.**



If you have determined that the gas oven capillary tubes and bulbs are mercury containing, the following procedure can be used to identify and remove the mercury gas safety valve control assembly.

GAS RANGE MERCURY GAS SAFETY VALVE CONTROL ASSEMBLY REMOVAL PROCEDURE

ESTIMATED REMOVAL TIME: 15-20 MINUTES

STEP 1.
Remove the broiler pan drawer.

STEP 2.
Once the drawer is removed you can view the burner assembly inside.

STEP 3.
When viewing the burner assembly, the small capillary tube (pointed out) is indicative of a mercury sensor switch.

STEP 3A.
Burner assemblies without a capillary tube but instead with an electronic pilot flame sensor (identifiable by the two wires) are **non-mercury**.

STEP 3B.
For gas ranges with a bracket covering the pilot, simply bend the bracket out of the way to view the wires indicating an electronic pilot sensor (non-mercury sensor).

Ranges without a capillary tube can be sent to scrap metal after making sure there is no fluorescent backlighting (see STEP 16) or PCBs.

For ranges with a capillary tube, **proceed to STEP 4**.

STEP 4.
If you have a capillary tube (like the one in the photo), you will now have to remove the burner assembly, valve and all attached gas fittings.

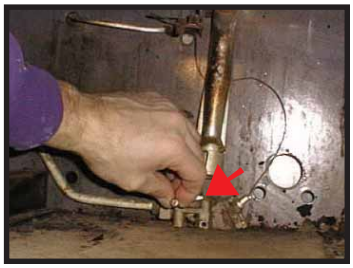
STEP 5.
Start by removing the key (sometimes a screw or a pressure fit) holding the burner assembly in.

STEP 6.
With the burner assembly loose, **proceed to STEP 7**.

STEP 7.
Disconnect the gas feed line by loosening the fitting or cutting the gas line.

STEP 8.
Disconnect the pilot gas feed line by loosening or cutting (there may sometimes be two feed lines).

STEP 9.
Remove the two screws holding the gas safety valve control in place.



STEP 10.
The entire burner assembly and valve are now ready to be removed. Note there is no screw or pin holding the oven burner unit, this is an example of a pressure fitting oven burner unit.

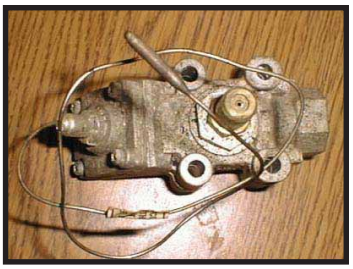
STEP 11.
Gas range with the oven burner unit and gas safety valve control removed.

STEP 12.
The removed oven burner unit and gas safety valve control.

STEP 13.
Remove the screw holding the gas safety valve control and gas safety valve capillary tube and bulb to the oven pilot assembly.

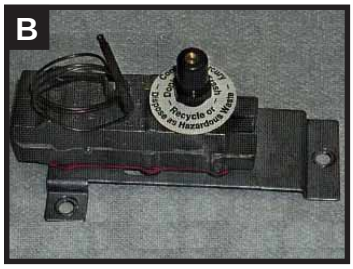
STEP 14.
Carefully pull the gas safety valve capillary tube and safety valve sensor bulb back through the bracket.

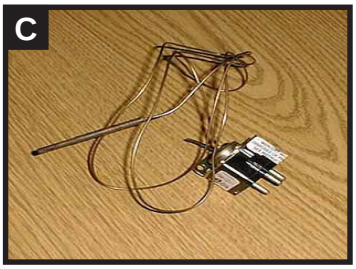
STEP 15.
The entire gas safety valve control, gas safety valve capillary tube and safety valve sensor bulb are now ready for proper disposal. **Proceed to STEP 16**.



EXAMPLES OF SOME MERCURY GAS SAFETY VALVE CONTROLS, CAPILLARIES AND BULBS

Photos A & B show complete mercury gas safety valve control, capillary and bulb. Photo C shows a gas auto pilot probe.

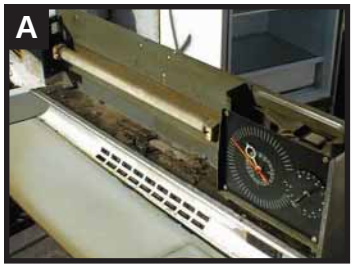




GAS RANGE FLUORESCENT BACKLIGHTING REMOVAL

ESTIMATED REMOVAL TIME: 1-2 MINUTES

STEP 16.
Prior to disposal, all stoves should be inspected to make sure that there is no fluorescent backlighting or PCBs. Some backlighting contains fluorescents and PCBs that come in various shapes and sizes (in addition to the one shown in the photos) and should be carefully removed and disposed of properly.



3.4 Gas Hot Water Heaters

Although all the current literature states that mercury was not used in residential hot-water heaters, the following procedure has been included to help prevent any mercury-added thermocouples from entering the waste stream and eventually the environment. Use the following procedure to properly identify and remove any mercury-containing thermocouples (usually commercial hot-water heaters of 100 gallons or more).

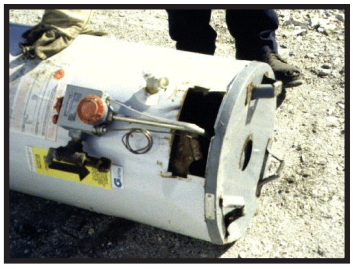
GAS HOT WATER HEATER MERCURY THERMOCOUPLE REMOVAL

ESTIMATED REMOVAL TIME: 5-10 MINUTES

STEP 1.
Locate the temperature control unit.

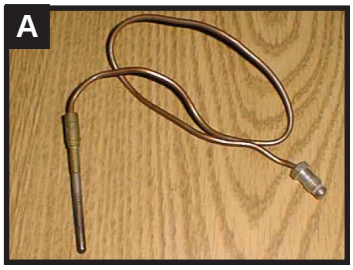
STEP 2.
Determine if there is an electronic flame sensor (determined by the presence of wires) or if there is a mercury thermocouple.

STEP 3.
Use a magnet to determine if it is indeed a mercury probe (non-magnetic probes are non-mercury).



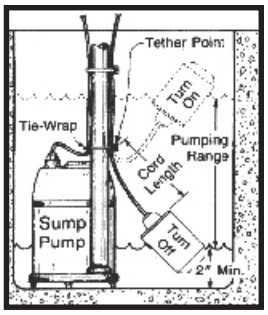
STEP 4.
If the probe is mercury, simply remove the bottom of the heater and loosen the nut attaching the probe. Then properly dispose of the mercury thermocouple.

PHOTO A.
A non-mercury temperature probe. Notice that this probe is copper, which is a good indication of a non-mercury containing device.



3.5 Sump and Bilge Pumps

Another use for mercury was as a switch in sump and bilge pumps. This switch, which functioned very reliably in the high moisture environment, turned on and off based on the corresponding water level (see sump pump diagram at right). As the water level rises, so does the float ball and wire (a wire attached to the float is a good indication of a mercury sump pump) which would then tilt the mercury switch, completing the electrical circuit that turns on the pump. As the water level receded the electrical circuit would then be broken and the pump would turn off.



Basic sump pump operation (mercury switch). Reprinted with permission from Purdue University.

SUMP PUMP MERCURY REMOVAL

ESTIMATED REMOVAL TIME: 1-2 MINUTES

A mercury-free sump pump. Notice the metal guide and no attached wires.

The sump pump on the left is an example of a mechanical sump pump. This pump works on the same principle that as the float ball rises up with the water it would turn on the pump (mechanical switch) and when the water recedes it would sink down with the water and shut the pump off. As can be seen in the photo on the left, a metal guide is used instead of a wire. This is a good indication of a non-mercury sump pump.

Sump pump float containing mercury.

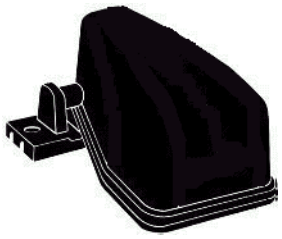
Once you have determined whether or not it is a mercury sump pump, the wire attaching the float can simply be cut and the whole float properly disposed of (see photo at right).

BILGE PUMP MERCURY REMOVAL

ESTIMATED REMOVAL TIME: 1-2 MINUTES

Bilge pump containing mercury.

Bilge pumps work on the same principle as a sump pump. By rotating on a stationary point (see drawing on right) with the fluctuations in water level either up or down, the bilge pump would turn on or off. Several of the newer models use this method with a rolling steel ball instead of mercury to complete the electrical circuit. This can be determined by simply shaking the bilge pump. A steel ball bearing will be easily discerned from liquid mercury.


Automatic switch bilge pump.

Once you have determined it is a mercury bilge pump, you can simply remove the entire pump and properly dispose of.

4.0 MERCURY HANDLING, STORAGE AND DISPOSAL

Once mercury devices are removed, they should be properly handled, stored and disposed of. The handling, storage and disposal protocols covered below are a best management strategy for individuals or businesses (non-profit and for profit) that generate less than 11,000 pounds of universal waste at anytime (all universal wastes combined). Individuals or businesses who will be generating more than 11,000 pounds should refer to Subchapter 9, the Universal Waste Management Standards in the State of Vermont Hazardous Waste Management Regulations.

Included for your convenience are two fact sheets, **Appendix E - *Waste Mercury Containing Switches and Devices*** and **Appendix F - *Flourescent Lamps***, which summarize handling, storage and disposal requirements for these products.

4.1 Handling

A mercury-containing switch or product should always be handled in a way that will prevent breakage. Also when removing mercury or mercury-added components from a product do so only over or in a containment device that will collect and contain any mercury released in the event of a mercury-added product breaking. Be sure to keep spill clean-up kits (See Section 5, Mercury Spill Clean-up) and equipment readily available and always ensure that there is adequate ventilation. ***Any spilled mercury or any contaminated clean-up materials must be handled as a hazardous waste. For large spill clean-ups (more than 1 or 2 tablespoons) a firm specializing in mercury clean-up should be acquired (see Appendix B)***. Anyone handling mercury or mercury-added products should use proper personal protective equipment (latex gloves, tyvek suit, safety glasses and a respirator with mercury cartridges if cleaning up a mercury spill) and be thoroughly familiar with proper mercury handling and emergency procedures (See Appendix E - Waste Mercury Containing Switches and Devices Factsheet).

4.2 Storage

All mercury-containing switches or products must be stored in containers that will prevent any breakage or leakage. These containers must be closed, structurally sound and compatible with the mercury-added products being stored. All containers of mercury-added products must be properly labeled with one of the following; “Universal Waste- Mercury-added Product(s)”, or “Waste Mercury-added product(s)” or “Used Mercury-added products” and stored for no more than one year.

4.3 Disposal

Properly contained and labeled mercury-added products can be disposed of in three possible disposal routes. These are:

- Disposal through a local Solid Waste District, Alliance or Municipality. This is usually done through Household Hazardous Waste Collection events or facilities (see Appendix A for a list of Solid Waste Districts, Alliances and Municipalities).
- Disposal through a hazardous waste transporter (see Appendix C).
- Disposal through a mercury recycler (see Appendix D).

5.0 MERCURY SPILL CLEAN-UP

MERCURY SPILL KIT

At a minimum you should have the following supplies in the event of a mercury spill. Those removing and collecting mercury on a continued basis should consider adding a commercially available spill kit to these items.

- index cards
- respirator with mercury vapor cartridges
- sulfur powder
- flashlight
- rubber squeegee
- zinc or copper flakes
- tape
- Ziploc plastic bags
- paper towels
- plastic dust pan
- wide mouth plastic container with cover
- plastic trash bags
- latex gloves

Note: Most spill/safety equipment suppliers have complete spill kits for purchase. Contact the Agency of Natural Resources for purchasing information.

EMERGENCY MERCURY SPILL CLEAN-UP PROCEDURE

This clean-up procedure is only intended for small mercury spills. If the spill involves more than one or two tablespoons of free mercury or the material has splattered over a sizeable area, is in cracks and crevices or other difficult to clean places, or is on a non-disposable porous item such as wall to wall carpeting or upholstery, ***we recommend you retain an environmental firm with the equipment and expertise to perform the cleanup (see Appendix B) and call the Vermont Spills Hotline at 1-800-641-5005***.

A) Wear latex gloves to prevent skin contact. Keep your hands away from your face-especially your eyes, nose and mouth. ***Before beginning any spill clean-up make sure that the area is adequately ventilated or you have a respirator with mercury vapor cartridges***.
B) Carefully pick up any broken pieces of glass ***(NEVER SWEEP OR VACUUM MERCURY)***. Place them on a paper towel or tissue. Wrap or fold the paper towel, and place into a leak-tight plastic bag or sealable plastic container.
C) Sprinkle sulfur powder on the spill area to control mercury vapors. Then, working from the outside of the spill area toward the center, push small mercury beads together with a card, stiff paper, or squeegee to form larger droplets. Put droplets into a leak-tight plastic bag or plastic container.

D) Use the sticky side of a two-inch (or wider) duct or masking tape to pick up any remaining glass or mercury beads. Pay special attention to cracks and crevices. Place tape and debris in a leak-tight plastic bag or sealable plastic container.

E) Use a flashlight to look all around the spill area. The light will reflect off the shiny mercury beads and make it easier to see them.

F) Sprinkle sulfur powder on the spill area after cleaning up beads of mercury; a color change from yellow to brown indicates that mercury is still present and more cleanup is needed.

G) Sprinkle zinc flakes or copper flakes (available at hardware stores) to amalgamate any small amounts of mercury which remain.

H) When finished, carefully remove latex gloves and place them in a leak-tight plastic bag or sealable plastic container. Do not touch the glove fingertips or parts that may have come in contact with mercury. Place all the closed containers in a double plastic bag and tie the opening. Properly dispose through a hazardous waste transporter, mercury recycler (see Appendix C) or call your Solid Waste District, Alliance or Municipality (see Appendix A).

I) Thoroughly clean your hands and body. ***Never wash contaminated clothing in a washing machine or remove contaminated clothing or apparel from a spill site. This will help prevent further site contamination***. These should also be properly disposed of.

APPENDIX A

VERMONT SOLID WASTE DISTRICTS, ALLIANCES AND MUNICIPALITIES

ADDISON COUNTY SOLID WASTE MANAGEMENT DISTRICT
P.O. Box 573, Route 7 South
Middlebury, VT 05753
(802) 388-2333
Fax: 388-0037
email: acswmd@acswmd.org
Website: www.acswmd.org

Participating Towns:
Addison, Bridport, Cornwall, Ferrisburg, Goshen, Leicester, Lincoln, Middlebury, Monkton, New Haven, Orwell, Panton, Ripton, Shoreham, Starksboro, Vergennes, Waltham, Weybridge, Whiting

BENNINGTON REGIONAL PLANNING COMMISSION
Box 342
Arlington, VT 05250
(802) 375-9964
Fax: 375-1561

Participating Towns:
Arlington*, Dorset*, Manchester*, Pownal**, Rupert, Sandgate*, Shaftsbury**, Stamford, Sunderland
* town works closely with BRPC
** send mailings directly to town contact

Town Contacts:
Pownal: Steffan Strohmaier, Pownal Town Office, P.O. Box 411, Pownal VT 05261 Tel# 823-7757.
Shaftsbury: Dennis McCarthy, Asst. to Sel. Bd., P.O. Box 409, Shaftsbury VT 05262 Tel #442-4043.

CENTRAL VERMONT SOLID WASTE MANAGEMENT DISTRICT
137 Barre Street
Montpelier, VT 05602
(802) 229-9383 or 1-800-730-9475
Fax: 229-1318
email: fieldprograms@cvswmd.com

Participating Towns:
Barre City, Barre Town, Berlin, Bradford, Cabot, Calais, Chelsea, East Montpelier, Hardwick, Marshfield, Middlesex, Montpelier, Northfield, Orange, Plainfield, Roxbury, Tunbridge, Walden, Washington, Williamstown, Woodbury

CHITTENDEN SOLID WASTE DISTRICT
1021 Redmond Road
Williston, VT 05495
(802) 872-8100
Fax: 878-5787
Recycling Hotline: 872-8111
E-mail: info@cswd.net

Participating Towns:
Bolton, Burlington, Charlotte, Colchester, Essex, Essex Junction, Hinesburg, Huntington, Jericho, Milton, Richmond, St. George, Shelburne, South Burlington, Westford, Williston, Winooski

GREATER UPPER VALLEY SOLID WASTE MANAGEMENT DISTRICT
96 Mill St. P.O. Box 58
North Hartland, VT 05052-0058
(802) 296-3688
Fax: 281-7088
E-mail: guvswd@valley.net

Participating Towns:
Bridgewater, Hartland, Norwich, Pomfret, Sharon, Strafford, Thetford, Vershire, West Fairlee, Woodstock

JOINT MUNICIPAL SURVEY COMMITTEE/SOLID WASTE ALTERNATIVE COMMITTEE
87 Halls Pond Road
Salem, NY 12865
(518) 9702
email: pam@starlitridge.com

Participating Towns:
Benson, Chittenden, Fair Haven, Middletown Springs, Pawlet, Rutland Town, Shrewsbury, Sudbury, Tinmouth, West Haven

LAMOILLE REGIONAL SOLID WASTE MANAGEMENT DISTRICT
29 Sunset Drive
Morrisville VT 05661-9788
(802) 888-7317
Fax: 888-6507
email: info@lrswmd.org

Participating Towns:
Belvidere, Cambridge, Craftsbury, Eden, Elmore, Hyde Park, Johnson, Morristown, Stowe, Waterville, Wolcott, Worcester

LONDONDERRY GROUP
Londonderry Recycling Coordinator
P.O. Box 118
South Londonderry, VT 05148
(802) 824-6304

Participating Towns:
Langrove, Londonderry, Peru, Weston, Windham.

MAD RIVER SOLID WASTE ALLIANCE
P.O. Box 210
Waterbury Center, VT 05677
(802) 244-7373
Fax: (802) 244-7570
Email: malterport@aol.com

Participating Towns:
Duxbury, Fayston, Moretown, Waitsfield, Warren, Waterbury.

NORTHEAST KINGDOM WASTE MANAGEMENT DISTRICT
P.O. Box 1075
Lyndonville, VT 05851
(802) 626-3532 or 800-734-4602
Fax: 626-3519
email: progmgr@nekwmd.org

Participating Towns:
Averill, Averys Gore, Barnet, Bloomfield, Brighton, Brunswick, Concord, Danville, East Haven, Ferdinand, Granby, Groton, Guildhall, Holland, Lewis, Lunenburg, Lyndon, Maidstone, Morgan, Newark, Peacham, Ryegate, Sheffield, Stannard, Victory, Waterford, Warren Gore, Warners Grant, Westmore, Wheelock.

NORTHWEST VERMONT SOLID WASTE MANAGEMENT DISTRICT
10-12 Kingman Street
P.O. Box 1547
St. Albans, VT 05478
(802) 524-5986
Fax: 524-5987
email: nwswdps@adelphia.net

Participating Towns:
Alburg, Bakersfield, Berkshire, Enosburg, Fairfield, Fletcher, Isle LaMotte, Montgomery, Richford, St. Albans City, Sheldon, South Hero.

RUTLAND COUNTY SOLID WASTE DISTRICT
2 Green Hill Lane
Rutland, VT 05701-5915
(802) 775-7209
Fax: 773-5796
E-mail: rcswd@rcswd.com
Recycling Hot Line: 773-4083

Participating Towns:
Brandon, Castleton, Clarendon, Danby, Hubbardton, Ira, Mendon, Mt. Tabor, Pittsford, Poultney, Proctor, Rutland City, Sherburne, Wallingford, Wells, West Rutland.

SOUTHERN WINDSOR/WINDHAM COUNTY SOLID WASTE MANAGEMENT DISTRICT
c/o NH/VT Solid Waste Project
130 Pleasant Street suite #3
Claremont, NH 03743
(603) 543-1201
Fax: (603) 542-5727

Participating Towns:
Andover, Baltimore, Cavendish, Chester, Grafton, Ludlow, Plymouth, Reading, Rockingham, Springfield, Weathersfield, Westminster, West Windsor, Windsor.

WHITE RIVER ALLIANCE
c/o Del Cloud
Bethel Town Manager
RR 1 Box 335
Bethel, VT 05032
(802) 234-9340
Fax: (802) 234-6840

Participating Towns:
Barnard, Bethel, Hancock, Pittsfield, Rochester, Royalton, Stockbridge.

WINDHAM SOLID WASTE MANAGEMENT DISTRICT
327 Old Ferry Road
Brattleboro, VT 05301
(802) 257-0272
Fax: 257-5122

Participating Towns:
Brattleboro, Brookline, Dover, Dummerston, Guilford, Halifax, Jamaica, Marlboro, Newfane, Putney, Readsboro, Townshend, Vernon, Whitingham, Wilmington.

OTHER CONTACTS
Towns not listed in any of these Solid Waste Districts or Alliances should contact their town clerk, town offices or the Vermont Agency of Natural Resources for more information on proper disposal of Hazardous Waste.

APPENDIX B

MERCURY CLEAN-UP PROFESSIONALS

The following is a partial list of companies that offer remediation (clean-ups/elimination, etc.) concerning air quality related situations. This list is not a recommendation or endorsement by the Vermont Agency of Natural Resources.

Key: L=liquid mercury
M=microbial (mold, mildew, fungus, and/or bacterial)
O=odors (post fire, etc.)
C=chemical
F=fuel

Clean Harbors Env. Services, Inc.
Offices also near Concord, NH and Boston, MA
(1-800-OILTANK)
32 Basik Road
Glenmount, NY 12077
(518) 434-0149
Key- (M,O,L,C,F)

Environmental Products & Service
2 Flynn Avenue
Burlington, VT 05401
(802) 862-1212 or (1-800-THETANK)
FAX-(802)860-7445
(24 hr, 7/day/upc full cleanup response)
Key- (L,C,F,M)

Seacoast Ocean Services/SOS
36 Custom House Wharf
Portland, Maine 04101
(800) 339-2111 or (207) 774-2111
FAX (207) 774-7240
Email: servoprovt@aow.com
Key- (M,O,L,C,F)

Twin State Environmental Corp.
34 Roosevelt Highway
Colchester, VT 05446
(802) 654-8663
FAX (802) 654-8667
Email: tsec@together.net
Key- (L,C,F)

APPENDIX C

HAZARDOUS WASTE TRANSPORTERS

The following is a partial list of companies that offer hazardous waste transportation. This list is not a recommendation or endorsement by the Vermont Agency of Natural Resources.

APTUS Inc.
21750 Cedar Avenue
P.O. Box 550
Lakeville, MN 55044
Contact: Bruce Burniece (612) 469-3475

Clean Harbors Environmental Services
35 Commerce Street #9
Williston, VT 05495
Contact: Cathy McNamara (802) 651-0558

ENPRO Services Inc.
12 Mulliken Way
Newburyport, MA 01950
Contact: Larry Bouchard (978) 465-1595

Environmental Hazards Management Inc.
P.O. Box 785
Williston, VT 05495
Contact: Ken Morton (802) 862-4537

Environmental Products & Services of VT
2 Flynn Avenue
Burlington, VT 05401
Contact: Donald Melander (802) 862-1212

Heritage Environmental Services
2 Avenue D
Williston, VT 05495
Contact: Kendra Demarest (802) 860-1200

North Country Environmental Services
11 Mill Street
Barre, VT 05461
Contact: David Barchard (802) 479-5299

Safety Kleen Corp.
221 Sutton Street
North Andover, MA 01845
Contact: Brenda Leonardo

Total Waste Management
142 River Road
Newington, NH 03801
Contact: Kevin Schmit (800) 345-4525

Triumvirate Environmental Inc.
P.O. Box 136
Boston, MA 02143-0003
Contact: Jeff Plotts (800) 966-9282

APPENDIX D

MERCURY RECYCLERS

The following is a partial list of mercury recyclers that accept all mercury-added products. This list is not a recommendation or endorsement by the Vermont Agency of Natural Resources.

Adrow Chemical
2 Lines Ave.
Wanaque, NJ 07465
Phone: (201) 839-2372
Contact: Bill Delaney or Frank Bindhammer

Bethlehem Apparatus
890 Front St., P.O. Box Y
Hellertown, PA 18055
Phone: (610) 838-7034
Contact: John Boyle

Mercury Refining Co.
1218 Central Avenue
Albany, NY 12205
Phone: (518) 459-0820
Contact: Aaron Mars

Advance Env. Recycling Corp.
2591 Mitchell Ave.
Allentown, PA 18103
Phone: (800) 554-2372

Environmental Enterprises, Inc.
10163 Cincinnati-Dayton Rd.
Cincinnati, OH 45241
Phone: (800) 722-2818

Mercury Waste Solutions, Inc.
21211 Durand Avenue
Union Grove, WI 53182
Phone: (800) 741-3343
Contact: Zach Unruh

APPENDIX E

Environmental Fact Sheet

Vermont Department of
Environmental Conservation
103 South Main Street
Waterbury, VT 05671
http://www.anr.state.vt.us/dec/dec.htm

VTDEC Publication #EA-1001 November, 2000

Fluorescent Lamps: Handling and Disposal Guidelines

Fluorescent and HID Lamps:

Fluorescent and HID lamps contain mercury, a highly toxic heavy metal. When lamps are broken or thrown in the trash, mercury is released to the environment. Even the small amount of mercury-laden phosphor powder contained in lamps can damage our lakes and streams and poison fish and wildlife. It is due to this toxicity of the mercury contained in lamps, that there are restrictions (limits) on their disposal.

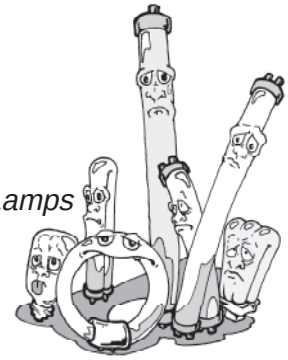
In Vermont, the following types of lamps should not be placed in the trash:

Fluorescent Lamps

- full size fluorescents
- compact fluorescents

High Intensity Discharge (HID) Lamps

- mercury vapor lamps
- metal halide lamps
- sodium lamps



Why Use Fluorescent and HID Lamps?

Using energy-efficient lighting makes good sense because:

- Fluorescent and HID lamps last longer
- Use less electricity than incandescent lamps and therefore:
  - Cost less to run
  - Result in less air pollution emitted from coal-burning power plants.

Vermont Law Requires:

- Proper labeling of mercury-added products.
- Towns and Solid Waste Districts to implement a program to collect mercury-added consumer products and to inform the public about them.
- Proper disposal.

General Recycling Guide for Fluorescent Lamps:

Here are a few precautions to take with Fluorescent and HID lamps after they have burned out:

- Do not break or crush lamps because mercury will be released.
- To avoid breaking the lamps, package them carefully when storing and transporting them. **DO NOT TAPE THEM TOGETHER!**
- Contact your local Town Manager or Solid Waste District (listed on the back of sheet) or the Agency of Natural Resources for information on the recycling program for Fluorescent and HID lamps in your area.
- If lamps are accidentally broken, follow the clean-up procedure below.

Lamp Breakage Clean-up Procedure

1. Keep all people and pets away from breakage area so that mercury powder is not tracked into other areas.
2. Keep the area well ventilated.
3. Assemble the necessary supplies before cleaning up: Latex gloves, tweezers, tape, and a puncture resistant container.
4. Using the latex gloves, carefully pick up any broken glass and place in a puncture resistant container. Tweezers may be needed to safely pick up broken glass. Tape can also be used to pick up any remaining small pieces of glass and powder residue still located on the spill surface. **DO NOT VACUUM**.
5. After clean-up is complete, place the contaminated clean-up equipment along with any other material that came in contact with the mercury powder into the puncture resistant container or a sealable plastic bag.
6. Contact your local Town Manager, Solid Waste District or the Agency of Natural Resources for waste management options.

For additional information contact: **Environmental Assistance Division tele: 802-241-3589 fax: 802-241-3273**
e-mail: ead@dec.anr.state.vt.us
web site: http://www.anr.state.vt.us/dec/ead/eadhome.htm

This document is printed on chlorine free paper that is 100% recycled and contains a minimum of 20% post-consumer content.

Fluorescent Lamp Management
Q&A for Businesses & Municipalities

Should I crush my lamps?

No, crushing mercury-containing lamps may pose health and environmental risks when mercury vapors are released. Lamps should be stored in ways that avoid breakage.

How should I store mercury-containing lamps?

- Place used lamps in packaging functionally equivalent to that used to ship new lamps.
- Seal full packages with tape (**Do not tape lamps together**).
- Label packages with any one of the following phrases:
  - ***"Waste Mercury-Containing Lamp(s)"***
  - ***"Used Mercury-Containing Lamp(s)"***
  - ***"Universal Waste Mercury-Containing Lamp(s)"***
- Store packages of lamps no more than five (5) feet high.
- Store packages for no more than one year.
- Store packages of waste mercury-containing lamps in a storage area identified by a sign that is clearly visible and has a label that includes the words: "Waste Mercury-Containing Lamps".

What if a mercury-containing lamp breaks?

Once a lamp is broken, it is considered a hazardous waste and should not be thrown in the trash. First allow the area to ventilate for 15 minutes. Then transfer any damaged or broken mercury-containing lamps and residue to a closed compatible container labeled "Hazardous Waste" (with a description of the contents). Once properly contained and labeled, the broken lamps and residue should be stored on an impervious surface within a structure that sheds rain and snow.

How should we train workers who handle waste lamps?

All employees who handle or manage mercury-containing products shall be informed of proper handling and emergency procedures.

Do I need any permits for transporting my own waste fluorescent and HID lamps?

No, only commercial haulers of waste lamps need to get a waste transporter's permit or certification.

What are the disposal options for mercury-containing lamps?

1. Recycling through a Municipal or Solid Waste District Household Hazardous Waste collection program,
2. Direct shipment to a lamp recycler or,
3. Shipment through a hazardous waste transporter.

Where can I get additional information?

Additional information can be found by:

- Contacting your local Town Manager (if not in a Solid Waste District),
- Contacting your local Solid Waste District *(see the list at right)*
- Contacting the Agency of Natural Resources:
  - Waste Management Division (802) 241-3888
  - Environmental Assistance Division (802) 241-3589
- Accessing the following website http://www.anr.state.vt.us/dec/waste.htm
- Reviewing Subchapter 9 of the Vermont Hazardous Waste Regulations *(accessible through the above website)*

Vermont Solid Waste Districts

ADDISON COUNTY
SOLID WASTE DISTRICT
(802) 388-2333

BENNINGTON REGIONAL
PLANNING COMMISSION
(802) 375-2576

CENTRAL VERMONT
SOLID WASTE DISTRICT
1-800-730-9475 OR (802) 229-9383

CHITTENDEN
SOLID WASTE DISTRICT
(802) 872-8111

GREATER UPPER VALLEY
SOLID WASTE DISTRICT
(802) 296-3688

LAMOILLE REGIONAL
SOLID WASTE DISTRICT
(802) 888-7317

MAD RIVER
SOLID WASTE ALLIANCE
(802) 244-7373

NORTHEAST KINGDOM
WASTE MANAGEMENT DISTRICT
1-800-734-4602 OR (802) 626-3532

NORTHWEST VERMONT
SOLID WASTE DISTRICT
(802) 524-5986

SOUTHERN WINDSOR/
WINDHAM COUNTY
SOLID WASTE MGMT DISTRICT
(603) 543-1201 OR (802) 885-5827

RUTLAND COUNTY
SOLID WASTE DISTRICT
(802) 775-7209 OR 802-773-4083

RUTLAND NON-DISTRICT
TOWNS JMSC/SWAC
(802) 235-2710

WHITE RIVER
ALLIANCE
(802) 234-9340

WINDHAM SOLID
WASTE DISTRICT
(802) 257-0272

APPENDIX F

Environmental Fact Sheet

Vermont Department of
Environmental Conservation
103 South Main Street
Waterbury, VT 05671
http://www.anr.state.vt.us/dec/dec.htm

VTDEC Publication #EA-1002 July, 2001

Waste Mercury-Added Devices: Handling and Disposal Guidelines

Thermometers, Silent Switches and Temperature Probes

In addition to thermometers, mercury has been used for many years in electrical products. A moving drop of mercury is used to open or close electrical circuits in devices like thermostats, silent wall switches, sump pumps, and the tilt switches in automobiles, chest freezers, washing machines, and space heaters. Mercury is a naturally occurring heavy metal which at room temperature takes the form of a silvery liquid. When a mercury-containing device is broken or thrown in the trash, mercury is released to the environment. Even a small amount of mercury can damage our lakes and streams and poison fish and wildlife. It is because of mercury's toxicity that restrictions (limits) have been placed on how and where mercury-added products are disposed.

Recognizing a Mercury-Added Device Is Not Always Easy

Although it is easy to see the silvery mercury in the bulb of a thermometer or the glass tilt switch of a home thermostat, most mercury containing devices enclose their mercury-added switches inside rubber, plastic or metal coverings. Also, not all electrical switches and temperature probes use mercury to function. Your Town Clerk, Town Manager, Solid Waste District (listed on the back of this sheet) and the Agency of Natural Resources has more information about which products have mercury in them and about the recycling programs for mercury-added devices in your area. (Also, see our Environmental Fact Sheet on Waste Mercury-Containing Lamps)

Vermont Law Requires...

- Proper labeling of mercury-added products.
- Towns and Solid Waste Districts to offer programs to collect mercury-added consumer products and to inform the public about them.
- Proper disposal, **NOT** IN THE TRASH!

General Recycling Guidelines

- Do not break, crush or take apart a mercury-added switch or device because mercury will be released.
- To avoid breaking the devices, package them carefully in individually sealed plastic bags placed inside larger sealable containers before storing or transporting them.
- Contact your Town Clerk, local Solid Waste District (listed on the back of this sheet) or the Agency of Natural Resources for information about recycling programs for mercury-added devices in your area.
- Contact local heating and air conditioning contractors or wholesalers about free thermostat take-back available through the Thermostat Recycling Corporation.
- If a mercury-added device is accidentally broken, use the following clean-up procedure.

Mercury Spill Cleanup Procedure

DO NOT SWEEP OR VACUUM MERCURY!

1. Keep all people and pets away from the breakage area so that mercury is not tracked elsewhere.
2. Keep the area well ventilated by opening windows and shutting off the heat or air conditioning.
3. Collect the necessary supplies before cleaning up: latex gloves, stiff paper or cards, paper towels or tissues, wide masking or duct tape, a leak-tight plastic bag or sealable container, a small plastic scoop or eye dropper.
4. Wearing the gloves, carefully pick up any broken glass or pieces of the device. Place on a paper towel or tissue. Wrap or fold the paper towel and place it in a leak-tight plastic bag or sealable container.
5. Working from the edge of the spill towards the center, use a card or stiff paper to push small beads of mercury into larger droplets. Push the droplets into a plastic scoop or pick them up with an eye dropper. Place the mercury in a leak-tight plastic bag or sealable container.
6. Use the sticky side of masking or duct tape to pick up remaining bits of glass or mercury beads. Put the tape, debris, gloves and cleanup equipment in a leak-tight plastic bag or sealable container.
7. Contact your Town Clerk, Solid Waste District or the Agency of Natural Resources about how to dispose of mercury spill cleanup materials.

This document is printed on chlorine free paper that is 100% recycled and contains a minimum of 20% post-consumer content.

Mercury-Added Device Management
Q & A for Businesses and Municipalities

How should I handle mercury-added devices?
Mercury-added switches and devices are often removable components found inside much larger appliances. Once the switch or component has been removed from the larger product, the component should not be disassembled further. If need be, it should be stored in an individually sealed plastic bag placed inside a larger sealable container to avoid breakage. Direct exposure to mercury metal may pose health and environmental risks when mercury vapors are released.

Is every waste mercury-added product a hazardous waste?
When taken by itself, a mercury-added switch would exhibit the hazardous waste characteristic of toxicity for mercury. However, the hazardous waste regulations which apply to the proper handling and disposal of a mercury-added component do not automatically extend to the larger products containing them. For example, a mercury-added hood or trunk light switch does not turn the whole car into a hazardous waste.

May waste mercury-added products or devices be handled as something other than a hazardous waste?
Yes. Both Vermont and federal hazardous waste regulations already contain provisions to simplify the handling and recycling of waste mercury-added thermostats and lamps. These are called "Universal Wastes". Under current Vermont Waste Management Division policy, the terms of these provisions have been extended to all fabricated mercury-added products, switches, and devices that are not presently listed as so-called "Universal Wastes".

What if a mercury-added device breaks?
At a minimum, the device, the released mercury and cleanup debris should be sealed in a plastic bag and transferred to a closed compatible container labeled "Hazardous Waste" (with a description of the contents) and managed as a hazardous waste.

What should we tell workers who handle waste mercury-added products?
All employees who handle or manage mercury-added products should be informed of the proper handling and emergency procedures for these products and for mercury.

What are the disposal options for mercury-added devices?
1. Recycling through a Municipal or Solid Waste District's Household Hazardous Waste collection program.
2. Thermostats only Recycling by heating, ventilation and air conditioning wholesalers participating in the free thermostat take-back sponsored by the Thermostat Recycling Corporation.
3. Direct shipment as "Universal Waste" to a mercury recycling facility.
4. Shipment through a hazardous waste transporter to a proper destination facility.

Where can I get additional information?
- ☞ Contact your Town Clerk or Town Manager (if not in a Solid Waste District)
- ☞ Contact your Solid Waste District (see list to the right or the Agency web site below)
- ☞ Contact the Vermont Agency of Natural Resources:
  - Waste Management Division (802) 241-3888 (Hazardous/Universal Wastes)
  - Environmental Assistance Division (802) 241-3589 (Mercury-Added Products) or, on the web at: www.anr.state.vt.us/dec/waste.htm or www.mercvt.org
- ☞ Also, see our "Waste Mercury Containing Lamps" and "Universal Waste" Fact Sheets
- ☞ Review the Vermont Hazardous Waste Management Regulations in Subchapter 9: Universal Waste Management Standards. (also available on the Agency of Natural Resources website above)

For more information contact: Environmental Assistance Division
tele: 802-241-3589 fax: 802-241-3273
e-mail: ead@dec.anr.state.vt.us
www.anr.state.vt.us/dec/ead/eadhome.htm

Vermont Solid Waste Districts

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RUTLAND NON-DISTRICT
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(802) 235-2710

WHITE RIVER
ALLIANCE
(802) 234-9340

WINDHAM SOLID
WASTE DISTRICT
(802) 257-0272

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2. *Managing Problem Materials Generated by Discarded Appliances and Vehicles*. Report to Northeast Waste Management Officials' Association. Prepared by DPRA Incorporated. September 1994.

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APPENDIX B

PCB Regulations

Vol. 142, No. 19

Vol. 142, n° 19

Canada Gazette

Gazette du Canada

Part II

Partie II

OTTAWA, WEDNESDAY, SEPTEMBER 17, 2008

OTTAWA, LE MERCREDI 17 SEPTEMBRE 2008

Statutory Instruments 2008

Textes réglementaires 2008

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Pages 1882 to 2241

Pages 1882 à 2241

NOTICE TO READERS

The *Canada Gazette* Part II is published under authority of the *Statutory Instruments Act* on January 9, 2008, and at least every second Wednesday thereafter.

Part II of the *Canada Gazette* contains all "regulations" as defined in the *Statutory Instruments Act* and certain other classes of statutory instruments and documents required to be published therein. However, certain regulations and classes of regulations are exempted from publication by section 15 of the *Statutory Instruments Regulations* made pursuant to section 20 of the *Statutory Instruments Act*.

The *Canada Gazette* Part II is available in most libraries for consultation.

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The *Canada Gazette* is also available free of charge on the Internet at http://canadagazette.gc.ca. It is accessible in Portable Document Format (PDF) and in HyperText Mark-up Language (HTML) as the alternate format. The PDF format of Part I, Part II and Part III is official since April 1, 2003, and is published simultaneously with the printed copy.

Copies of Statutory Instruments that have been registered with the Clerk of the Privy Council are available, in both official languages, for inspection and sale at Room 418, Blackburn Building, 85 Sparks Street, Ottawa, Canada.

AVIS AU LECTEUR

La Partie II de la *Gazette du Canada* est publiée en vertu de la *Loi sur les textes réglementaires* le 9 janvier 2008, et au moins tous les deux mercredis par la suite.

La Partie II de la *Gazette du Canada* est le recueil des « règlements » définis comme tels dans la loi précitée et de certaines autres catégories de textes réglementaires et de documents qu'il est prescrit d'y publier. Cependant, certains règlements et catégories de règlements sont soustraits à la publication par l'article 15 du *Règlement sur les textes réglementaires*, établi en vertu de l'article 20 de la *Loi sur les textes réglementaires*.

On peut consulter la Partie II de la *Gazette du Canada* dans la plupart des bibliothèques.

Pour les résidents du Canada, le prix de l'abonnement annuel à la Partie II de la *Gazette du Canada* est de 67,50 $ et le prix d'un exemplaire, de 3,50 $. Pour les résidents d'autres pays, le prix de l'abonnement est de 67,50 $US et le prix d'un exemplaire, de 3,50 $US. Veuillez adresser les commandes à : Publications du gouvernement du Canada, Travaux publics et Services gouvernementaux Canada, Ottawa, Canada K1A 0S5.

La *Gazette du Canada* est aussi disponible gratuitement sur Internet au http://gazetteducanada.gc.ca. La publication y est accessible en format de document portable (PDF) et en langage hypertexte (HTML) comme média substitut. Le format PDF en direct de la Partie I, de la Partie II et de la Partie III est officiel depuis le 1er avril 2003 et est publié en même temps que la copie imprimée.

Des exemplaires des textes réglementaires enregistrés par le greffier du Conseil privé sont à la disposition du public, dans les deux langues officielles, pour examen et vente à la Pièce 418, Édifice Blackburn, 85, rue Sparks, Ottawa, Canada.

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Registration
SOR/2008-273 September 5, 2008

CANADIAN ENVIRONMENTAL PROTECTION ACT, 1999

PCB Regulations

P.C. 2008-1659 September 5, 2008

Whereas, pursuant to subsection 332(1)[a] of the *Canadian Environmental Protection Act, 1999*[b], the Minister of the Environment published in the *Canada Gazette*, Part I, November 4, 2006, a copy of the proposed *PCB Regulations*, substantially in the annexed form, and persons were given an opportunity to file comments with respect to the proposed Regulations or to file a notice of objection requesting that a board of review be established and stating the reasons for the objection;

Whereas, pursuant to subsection 93(3) of that Act, the National Advisory Committee has been given an opportunity to provide its advice under section 6[c] of that Act;

And whereas, in the opinion of the Governor in Council, pursuant to subsection 93(4) of that Act, the proposed Regulations do not regulate an aspect of a substance that is regulated by or under any other Act of Parliament in a manner that provides, in the opinion of the Governor in Council, sufficient protection to the environment and human health;

Therefore, Her Excellency the Governor General in Council, on the recommendation of the Minister of the Environment and the Minister of Health, pursuant to subsection 93(1) and section 97 of the *Canadian Environmental Protection Act, 1999*[b], hereby makes the annexed *PCB Regulations*.

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(*This table is not part of the Regulations.*)

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[b] S.C. 1999, c. 33
[c] S.C. 2002, c. 7, s. 124

Enregistrement
DORS/2008-273 Le 5 septembre 2008

LOI CANADIENNE SUR LA PROTECTION DE L'ENVIRONNEMENT (1999)

Règlement sur les BPC

C.P. 2008-1659 Le 5 septembre 2008

Attendu que, conformément au paragraphe 332(1)[a] de la *Loi canadienne sur la protection de l'environnement (1999)*[b], le ministre de l'Environnement a fait publier dans la *Gazette du Canada* Partie I, le 4 novembre 2006, le projet de règlement intitulé *Règlement sur les BPC*, conforme en substance au texte ci-après, et que les intéressés ont ainsi eu la possibilité de présenter leurs observations à cet égard ou un avis d'opposition motivé demandant la constitution d'une commission de révision;

Attendu que, conformément au paragraphe 93(3) de cette loi, le comité consultatif national s'est vu accorder la possibilité de formuler ses conseils dans le cadre de l'article 6[c] de celle-ci;

Attendu que la gouverneure en conseil est d'avis que, aux termes du paragraphe 93(4) de cette loi, le projet de règlement ne vise pas un point déjà réglementé sous le régime d'une autre loi fédérale de manière à offrir une protection suffisante pour l'environnement et la santé humaine,

À ces causes, sur recommandation du ministre de l'Environnement et du ministre de la Santé et en vertu du paragraphe 93(1) et de l'article 97 de la *Loi canadienne sur la protection de l'environnement (1999)*[b], Son Excellence la Gouverneure générale en conseil prend le *Règlement sur les BPC*, ci-après.

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PCB REGULATIONS

PART 1

GENERAL

Definitions

1. (1) The following definitions apply in these Regulations.

"Act" « *Loi* »

"Act" means the *Canadian Environmental Protection Act, 1999*.

"authorized facility" « *installation agréée* »

"authorized facility" means a facility, including a transfer site, that is authorized by the authorities of the jurisdiction in which it is located to process PCBs or products containing PCBs or to conduct laboratory analysis or research with PCBs or products containing PCBs.

"National Fire Code" « *Code national de prévention des incendies* »

"National Fire Code" means the National Fire Code of Canada 2005, NRCC No. 47667, issued by the Canadian Commission on Building and Fire Codes, National Research Council of Canada, as amended from time to time.

RÈGLEMENT SUR LES BPC

PARTIE 1

GÉNÉRALITÉS

Définitions

1. (1) Les définitions qui suivent s'appliquent au présent règlement.

« BPC » "*PCB*"

« BPC » Tout biphényle chloré visé à l'article 1 de la liste des substances toxiques de l'annexe 1 de la Loi.

« Code national de prévention des incendies » "*National Fire Code*"

« Code national de prévention des incendies » Le *Code national de prévention des incendies — Canada 2005*, CNRC 47667F, avec ses modifications successives, publié par la Commission canadienne des codes du bâtiment et de prévention des incendies du Conseil national de recherches du Canada.

« installation agréée » "*authorized facility*"

« installation agréée » Installation — notamment un centre de transfert — qui est autorisée par les autorités du territoire où elle est située à transformer

"PCB" « *BPC* »
"PCB" means any chlorobiphenyl described in item 1 of the List of Toxic Substances in Schedule 1 to the Act.

"process" « *transformer* »
"process" includes to mix with a product.

"product" « *produit* »
"product" includes equipment.

Concentration — several matrices
(2) For the purposes of these Regulations, if a solid or a liquid containing PCBs is composed of several matrices, the concentration of PCBs is based on the mass of the matrix in which the PCBs are located.

Concentration and quantity
(3) For the purposes of these Regulations, the concentration and quantity of PCBs shall be determined

(*a*) by a laboratory

(i) accredited by the Standards Council of Canada (SCC), the Canadian Association for Environmental Analytical Laboratories Inc. (CAEAL), or any other accreditation body that is a signatory to the *International Laboratory Accreditation Cooperation (ILAC) Mutual Recognition Arrangement*, and the laboratory shall be accredited in accordance with the International Organization for Standardization standard ISO/IEC 17025:2005 entitled *General Requirements for the Competence of Testing and Calibration Laboratories*, as amended from time to time, and

(ii) for which the scope of accreditation shall include the analytical method used to determine the concentration of PCBs in the matrix in which the PCBs are located; or

(*b*) by a laboratory

(i) accredited in accordance with the *Environmental Quality Act*, R.S.Q., c. Q-2, as amended from time to time, and

(ii) for which the scope of accreditation shall include the analytical method used to determine the concentration of PCBs in the matrix in which the PCBs are located.

Sampling method
(4) For the purposes of these Regulations, other than section 13, the concentration of PCBs in a matrix is determined using a provincially, nationally or internationally recognized sampling method for PCBs in the matrix in which the PCBs are located.

Sampling method — bulk solid products
(5) For the purposes of section 13, the concentration of PCBs is determined using a sampling method for bulk solid products, which is set out in either federal or provincial legislation, as amended from time to time, or approved by the United States Environmental Protection Agency for compliance with the *Resource Conservation and Recovery Act* or with the regulations made under that Act, as amended from time to time.

des BPC ou des produits qui en contiennent, ou à les utiliser pour des analyses de laboratoire ou des recherches.

« Loi » « Loi »
La *Loi canadienne sur la protection de l'environnement (1999)*.

« produit » « produit »
S'entend notamment d'une pièce d'équipement.

« transformer » « transformer »
S'entend notamment du fait de mélanger avec tout produit.

Concentration — plusieurs matrices
(2) Pour l'application du présent règlement, lorsqu'un solide ou un liquide qui contient des BPC est composé de plusieurs matrices, la concentration de BPC est basée sur la masse de la matrice dans laquelle les BPC se trouvent.

Concentration et quantité
(3) Pour l'application du présent règlement, la concentration et la quantité de BPC sont déterminées :

a) soit par tout laboratoire :

(i) qui est accrédité à la norme de l'Organisation internationale de normalisation intitulée *Exigences générales concernant la compétence des laboratoires d'étalonnages et d'essais* (ISO/IEC 17025:2005), avec ses modifications successives, par le Conseil canadien des normes (CCN), l'Association canadienne des laboratoires d'analyse environnementale (ACLAE) ou tout autre organisme d'accréditation signataire de l'*International Laboratory Accreditation Cooperation (ILAC) Mutual Recognition Arrangement*,

(ii) dont la portée d'accréditation couvre la méthode d'analyse utilisée pour déterminer la concentration des BPC dans la matrice dans laquelle les BPC se trouvent;

b) soit par tout laboratoire :

(i) qui est accrédité conformément à la *Loi sur la qualité de l'environnement*, L.R.Q., ch. Q-2, avec ses modifications successives,

(ii) dont la portés d'accréditation couvre la méthode d'analyse utilisée pour déterminer la concentration des BPC dans la matrice dans laquelle se trouvent les BPC.

Méthode d'échantillonnage
(4) Pour l'application du présent règlement, sauf l'article 13, la concentration de BPC se trouvant dans une matrice est déterminée au moyen de toute méthode d'échantillonnage pour les BPC dans cette matrice qui est reconnue à l'échelle provinciale, nationale ou internationale.

Méthode d'échantillonnage — produits solides en vrac
(5) Pour l'application de l'article 13, la concentration de BPC est déterminée au moyen de toute méthode d'échantillonnage pour les produits solides en vrac qui est prévue par une loi ou un règlement fédéral ou provincial, avec ses modifications successives, ou qui est approuvée par la United States Environmental Protection Agency pour l'application de la loi des États-Unis intitulée *Resource Conservation and Recovery Act* ou de ses règlements avec leurs modifications successives.

Application

2. (1) These Regulations apply to PCBs and to any products containing PCBs.

Non-application

(2) These Regulations do not apply to the following:

(*a*) the export and import of PCBs that are hazardous waste or hazardous recyclable material within the meaning of the *Export and Import of Hazardous Waste and Hazardous Recyclable Material Regulations* or the export of PCBs that are waste within the meaning of the *PCB Waste Export Regulations, 1996*;

(*b*) the sale, importation or advertising of liquids containing PCBs for use in microscopy, including immersion oils, but not including refractive index oils, which is prohibited under section 4 of the *Hazardous Products Act*; and

(*c*) the offer for sale, sale and use of land contaminated with PCBs or with products containing PCBs.

Sale of property

3. Nothing in these Regulations shall be construed as preventing the sale of

(*a*) personal property or movables that contain PCBs, or real property or immovables that have PCBs or products containing PCBs, and that form part of the sale of the whole or part of a business, including a manufacturing or a processing business;

(*b*) real property or immovables that have products containing PCBs if the products continue to be used after the sale for the same purpose at the same place and are an integral part of the property or immovable; or

(*c*) real property or immovables on which a PCB storage site is located.

Compliance

4. In addition to the persons who must comply with the requirements set out in these Regulations, a person who owns PCBs or products containing PCBs shall ensure that the requirements of these Regulations with respect to those PCBs or products are met.

Application

2. (1) Le présent règlement s'applique aux BPC et à tout produit qui en contient.

Exclusion

(2) Il ne s'applique toutefois pas aux activités suivantes :

a) l'exportation et l'importation de BPC qui sont des déchets dangereux ou des matières recyclables dangereuses au sens du *Règlement sur l'exportation et l'importation de déchets dangereux et de matières recyclables dangereuses* et l'exportation de déchets contenant des BPC au sens du *Règlement sur l'exportation de déchets contenant des BPC (1996)*;

b) la vente, l'importation ou la publicité des liquides pour usage en microscopie qui contiennent des BPC, y compris les huiles à immersion mais à l'exclusion des huiles à indice de réfraction, interdites par l'article 4 de la *Loi sur les produits dangereux*;

c) la mise en vente, la vente et l'utilisation de terrains contaminés par des BPC ou des produits qui en contiennent.

Vente de biens

3. Le présent règlement n'a pas pour effet d'empêcher la vente des biens suivants :

a) tout bien meuble ou personnel qui contient des BPC ou tout bien immeuble ou réel où se trouvent des BPC ou des produits qui en contiennent, lesquels biens sont compris dans la vente de tout ou partie d'une entreprise, y compris une entreprise de fabrication ou de transformation;

b) tout bien immeuble ou réel dont font partie intégrante les produits qui contiennent des BPC qui s'y trouvent, si les produits continuent d'être utilisés aux mêmes fins et au même endroit après la vente;

c) tout bien immeuble ou réel où se trouve un dépôt de BPC.

Conformité

4. En plus des personnes auxquelles il incombe des obligations en vertu du présent règlement, le propriétaire de BPC ou de produits qui en contiennent veille à ce que les exigences du présent règlement concernant ces BPC ou produits soient remplies.

PART 2

PROHIBITIONS AND PERMITTED ACTIVITIES

PROHIBITIONS

Release into the environment

5. (1) No person shall release PCBs into the environment, other than from the equipment referred to in subsection (2), in a concentration of

(*a*) 2 mg/kg or more for a liquid containing PCBs; or

(*b*) 50 mg/kg or more for a solid containing PCBs.

Release from equipment

(2) No person shall release more than one gram of PCBs into the environment from equipment

PARTIE 2

INTERDICTIONS ET ACTIVITÉS PERMISES

INTERDICTIONS

Rejet dans l'environnement

5. (1) Il est interdit de rejeter dans l'environnement, autrement qu'à partir d'une pièce d'équipement visée au paragraphe (2), des BPC de l'une ou l'autre des concentrations suivantes :

a) dans le cas d'un liquide qui contient des BPC, une concentration égale ou supérieure à 2 mg/kg;

b) dans le cas d'un solide qui contient des BPC, une concentration égale ou supérieure à 50 mg/kg.

Rejet à partir d'une pièce d'équipement

(2) Il est interdit de rejeter plus d'un gramme de BPC dans l'environnement à partir d'une pièce

referred to in section 16 that is in use or from equipment in use for which an extension has been granted under section 17.

d'équipement visée à l'article 16 qui est en usage ou d'une pièce d'équipement dont l'usage fait l'objet d'une prolongation en vertu de l'article 17 et qui est en usage.

Prohibited activities

6. Except as provided in these Regulations, no person shall

(*a*) manufacture, export or import PCBs or a product containing PCBs in a concentration of 2 mg/kg or more;

(*b*) offer for sale or sell PCBs or a product containing PCBs in a concentration of 50 mg/kg or more; or

(*c*) process or use PCBs or a product containing PCBs.

Activités interdites

6. Sauf dans la mesure prévue par le présent règlement, il est interdit :

a) de fabriquer, d'exporter ou d'importer des BPC ou tout produit qui en contient en une concentration égale ou supérieure à 2 mg/kg;

b) de mettre en vente ou de vendre des BPC ou tout produit qui en contient en une concentration égale ou supérieure à 50 mg/kg;

c) de transformer ou d'utiliser des BPC ou tout produit qui en contient.

PERMITTED ACTIVITIES

ACTIVITÉS PERMISES

Laboratory analysis

7. A person may manufacture, export, import, offer for sale, sell, process and use PCBs or products containing PCBs for the purpose of laboratory analysis if the analysis is conducted

(*a*) in an authorized facility that is authorized for that purpose; or

(*b*) in a facility that conforms to internationally recognized guidelines on best laboratory practices, if the authorities of the jurisdiction in which the facility is located do not have a mechanism in place to authorize the facility to conduct the analysis.

Analyses de laboratoire

7. Il est permis de fabriquer, d'exporter, d'importer, de mettre en vente, de vendre, de transformer et d'utiliser des BPC et des produits qui en contiennent pour des analyses de laboratoire, si celles-ci sont effectuées :

a) dans toute installation agréée à cette fin;

b) dans le cas où les autorités du territoire où elle est située ne disposent d'aucun mécanisme l'autorisant à les effectuer, dans toute installation qui est conforme à des lignes directrices, reconnues à l'échelle internationale, sur les pratiques exemplaires en laboratoire.

Research

8. (1) A person may offer for sale or sell PCBs or products containing PCBs to be processed or used for the purpose of research to determine the effects of those PCBs or products on human health or on the environment, if the facility in which they are processed or used is

(*a*) an authorized facility that is authorized for that purpose; or

(*b*) a facility that conforms to internationally recognized guidelines on best laboratory practices, if the authorities of the jurisdiction in which the facility is located do not have a mechanism in place to authorize the facility to conduct the research.

Recherches

8. (1) Il est permis de mettre en vente ou de vendre des BPC ou des produits qui en contiennent pour qu'ils soient utilisés ou transformés à des fins de recherche visant à déterminer les effets des BPC ou des produits sur la santé humaine ou l'environnement, si l'installation où ils sont utilisés ou transformés se conforme à l'une ou l'autre des exigences suivantes :

a) elle est agréée à cette fin;

b) dans le cas où les autorités du territoire où elle est située ne disposent d'aucun mécanisme l'autorisant à effectuer des recherches, elle est conforme à des lignes directrices, reconnues à l'échelle internationale, sur les pratiques exemplaires en laboratoire.

Processing and use

(2) A person may process and use the PCBs or products containing PCBs for the purpose of the research referred to in subsection (1) at a facility that meets the requirement set out in paragraph (1)(*a*) or (*b*).

Transformation et utilisation

(2) Il est permis de transformer et d'utiliser des BPC et des produits qui en contiennent pour effectuer les recherches visées au paragraphe (1) dans une installation qui se conforme à l'une ou l'autre des exigences prévues à ce paragraphe.

Electrical capacitor

9. A person may offer for sale, sell and use an electrical capacitor containing PCBs if the electrical capacitor

(*a*) is an integral part of a consumer product;

(*b*) is fusion sealed; and

(*c*) would be rendered inoperable and irreparable if the PCBs were removed from it.

Condensateurs électriques

9. Il est permis de mettre en vente, de vendre et d'utiliser tout condensateur électrique qui contient des BPC, si les conditions suivantes sont réunies :

a) il fait partie intégrante d'un produit de consommation;

b) ses joints sont thermoscellés;

c) il ne fonctionnerait plus et serait irréparable si les BPC en étaient extraits.

Aircraft, ships, trains and other vehicles

10. A person may export, import, offer for sale, sell and use for transportation purposes aircraft, ships, trains and other vehicles that contain PCBs

10. Il est permis d'exporter, d'importer, de mettre en vente, de vendre et d'utiliser pour le transport, tout aéronef, navire, train ou autre véhicule

Aéronefs, navires, trains et autres véhicules

only in their communication, navigation or electronic control equipment or cables.

dont seuls l'équipement de communication, de navigation ou de commande électronique ou les câbles contiennent des BPC.

Colouring pigment

11. (1) A person may manufacture, export, import, offer for sale, sell, process and use a colouring pigment containing PCBs produced incidentally if the concentration of the PCBs is less than 50 mg/kg.

Pigments pour la coloration

11. (1) Il est permis de fabriquer, d'exporter, d'importer, de mettre en vente, de vendre, de transformer et d'utiliser des pigments pour la coloration qui contiennent des BPC produit par inadvertance en une concentration inférieure à 50 mg/kg.

Annual average concentration

(2) Despite subsection (1), the annual average concentration of PCBs produced incidentally in colouring pigment that a person may manufacture, export, import, offer for sale, sell, process and use shall not exceed 25 mg/kg.

Moyenne annuelle maximale

(2) Toutefois, la concentration moyenne annuelle de BPC produit par inadvertance dans les pigments pour la coloration fabriqués, exportés, importés, mis en vente, vendus, transformés et utilisés par toute personne ne peut dépasser 25 mg/kg.

Destruction

12. A person may process PCBs or products containing PCBs for the purpose of destroying PCBs or recovering PCBs for the purpose of destroying them in an authorized facility that is authorized for that purpose.

Destruction

12. Il est permis, dans une installation agréée à cette fin, de transformer des BPC et des produits qui en contiennent pour les détruire ou pour les récupérer afin de les détruire.

Solid products

13. (1) A person may manufacture solid products containing PCBs in a concentration of less than 50 mg/kg using bulk solid products containing PCBs in a concentration of less than 50 mg/kg, and may use those solid products.

Produits solides

13. (1) Il est permis de fabriquer des produits solides qui contiennent des BPC en une concentration inférieure à 50 mg/kg à partir de produits solides en vrac qui eux-mêmes contiennent des BPC en une concentration inférieure à 50 mg/kg et d'utiliser ces produits solides.

Application

(2) Subsection (1) only applies to the manufacture of the types of products that are manufactured before the day on which these Regulations come into force.

Application

(2) Le paragraphe (1) ne s'applique qu'aux types de produits qui sont fabriqués avant l'entrée en vigueur du présent règlement.

Exception

(3) No person shall offer for sale or sell the products manufactured in accordance with subsection (1) unless the products are used in the course of a commercial or industrial activity.

Exception

(3) Il est interdit de mettre en vente ou de vendre des produits fabriqués conformément au paragraphe (1) pour tout usage en dehors d'une activité commerciale ou industrielle.

Cables, pipelines, electrical capacitors and other equipment

14. (1) A person may use the following products containing PCBs:

(*a*) cables, if they remain in place on the day on which these Regulations come into force;

(*b*) pipelines that transport natural gas, petroleum or petroleum products and any associated equipment that is in contact with the natural gas, petroleum or petroleum products if the pipelines and the equipment remain in place on the day on which these Regulations come into force;

(*c*) fusion sealed capacitors if they are used in relation to communication equipment or electronic control equipment; and

(*d*) the following equipment containing PCBs in a concentration of less than 50 mg/kg if the equipment is used for the purpose for which it was manufactured:

(i) electrical capacitors, other than light ballasts, and electrical transformers and their auxiliary electrical equipment, other than pole-top electrical transformers and their pole-top auxiliary electrical equipment,

(ii) electromagnets that are not used in the handling of food, feed or any additive to food or feed, and

Câbles, pipelines, condensateurs électriques et pièces d'équipements

14. (1) Il est permis d'utiliser les produits ci-après qui contiennent des BPC :

a) tout câble, s'il demeure à l'endroit où il se trouvait à l'entrée en vigueur du présent règlement;

b) tout pipeline qui transporte du gaz naturel, du pétrole ou des produits pétroliers, ainsi que tout équipement connexe qui est en contact avec le gaz naturel, le pétrole ou les produits pétroliers, si le pipeline et l'équipement demeurent à l'endroit où ils se trouvaient à l'entrée en vigueur du présent règlement;

c) tout condensateur électrique dont les joints sont thermoscellés et qui est utilisé à des fins de communication ou de commande électronique;

d) les pièces d'équipement ci-après qui contiennent des BPC en une concentration inférieure à 50 mg/kg et qui sont utilisées aux fins auxquelles elles étaient destinées lors de leur fabrication :

(i) les condensateurs électriques, autres que les ballasts de lampes, et les transformateurs électriques et tout équipement électrique connexe, à l'exception des transformateurs sur poteaux et de tout équipement électrique connexe sur poteaux,

(iii) heat transfer equipment, hydraulic equipment, vapour diffusion pumps and bridge bearings.

(ii) les électroaimants ne servant pas à la manutention des aliments destinés aux humains ou aux animaux, ou de tout additif à ces aliments,

(iii) l'équipement caloporteur, l'équipement hydraulique, les pompes à diffusion de vapeur et les appareils d'appui de pont.

Electrical capacitors

(2) A person may import fusion sealed capacitors containing PCBs for use in relation to communication tactical equipment or electronic control tactical equipment.

(2) Il est permis d'importer tout condensateur électrique qui contient des BPC et dont les joints sont thermoscellés pour qu'il soit utilisé à des fins de communication tactique ou de commande électronique tactique.

Condensateurs électriques

Liquids for servicing — concentration less than 2 mg/kg

15. (1) A person may use liquids containing PCBs in a concentration of less than 2 mg/kg for the purpose of servicing equipment containing PCBs.

15. (1) Il est permis d'utiliser tout liquide qui contient des BPC en une concentration inférieure à 2 mg/kg pour l'entretien de toute pièce d'équipement qui contient des BPC.

Liquides pour entretien — concentration inférieure à 2 mg/kg

Liquids for servicing — concentration of 500 mg/kg or more

(2) A person may use liquids containing PCBs in a concentration of 500 mg/kg or more for the purpose of servicing equipment containing PCBs in a concentration of 500 mg/kg or more until December 31, 2009.

(2) Il est également permis, jusqu'au 31 décembre 2009, d'utiliser tout liquide qui contient des BPC en une concentration égale ou supérieure à 500 mg/kg pour l'entretien de toute pièce d'équipement qui elle-même contient des BPC en une concentration égale ou supérieure à 500 mg/kg.

Liquide pour entretien — concentration de 500 mg/kg ou plus

END-OF-USE DATES AND EXTENSION

UTILISATION — DATES LIMITES ET PROLONGATION

Equipment referred to in subparagraphs 14(1)(*d*)(i) to (iii)

16. (1) A person may use the equipment referred to in subparagraphs 14(1)(*d*)(i) to (iii) until the following dates if the equipment is in use on the day on which these Regulations come into force:

(*a*) in the case of equipment containing PCBs in a concentration of 500 mg/kg or more, December 31, 2009; and

(*b*) in the case of equipment containing PCBs in a concentration of at least 50 mg/kg but less than 500 mg/kg,

(i) December 31, 2009, if the equipment is located at a drinking water treatment plant or food or feed processing plant, in a child care facility, preschool, primary school, secondary school, hospital or senior citizens' care facility or on the property on which the plant or facility is located and within 100 m of it, and

(ii) December 31, 2025, if the equipment is located at any other place.

16. (1) Il est permis d'utiliser les pièces d'équipement visées aux sous-alinéas 14(1)*d*)(i) à (iii) qui sont en usage à l'entrée en vigueur du présent règlement jusqu'aux dates suivantes :

a) si elles contiennent des BPC en une concentration égale ou supérieure à 500 mg/kg, jusqu'au 31 décembre 2009;

b) si elles contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg mais inférieure à 500 mg/kg :

(i) jusqu'au 31 décembre 2009, si elles se trouvent dans une usine de traitement d'eau potable ou de transformation des aliments destinés aux humains ou aux animaux, dans une garderie, dans une école — de niveau préscolaire, primaire ou secondaire —, dans un hôpital ou dans une résidence pour personnes âgées ou sur le terrain d'un tel établissement, à 100 m ou moins de celui-ci,

(ii) jusqu'au 31 décembre 2025, si elles se trouvent à tout autre endroit.

Pièces d'équipement visées aux sous-alinéas 14(1)*d*)(i) à (iii)

Light ballasts and pole-top electrical transformers

(2) A person may use the following equipment containing PCBs in a concentration of 50 mg/kg or more until December 31, 2025, if the equipment is in use on the day on which these Regulations come into force:

(*a*) light ballasts; and

(*b*) pole-top electrical transformers and their pole-top auxiliary electrical equipment.

(2) Il est permis, jusqu'au 31 décembre 2025, d'utiliser les pièces d'équipement ci-après qui sont en usage à l'entrée en vigueur du présent règlement et qui contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg :

a) les ballasts de lampes;

b) les transformateurs sur poteaux ainsi que tout équipement électrique connexe sur poteaux.

Ballasts de lampes et transformateurs sur poteaux

Liquid — concentration of 2 mg/kg or more

(3) A person may use a liquid containing 2 mg/kg or more of PCBs that is in equipment until the day on which the liquid is removed from the equipment.

(3) Il est permis d'utiliser tout liquide qui contient des BPC en une concentration égale ou supérieure à 2 mg/kg dans une pièce d'équipement jusqu'à ce qu'il en soit extrait.

Liquides — concentration de 2 mg/kg ou plus

Extension of end-of-use date

17. (1) Despite subsection 15(2), paragraph 16(1)(*a*) and subparagraph 16(1)(*b*)(i), a person may use the equipment and the liquids used for servicing that equipment, referred to in those provisions, until the date set out in an extension granted by the Minister under subsection (2) for that equipment and those liquids.

Application

(2) The Minister shall, on receiving a written application containing the information set out in subsection (3), grant an extension up to the date applied for but no later than December 31, 2014, if either of the following conditions are met:

(*a*) the equipment is being replaced with equipment that is engineered to order, and

(i) it is not technically feasible to replace the equipment on or before December 31, 2009,

(ii) the applicant is taking all necessary measures to minimize or eliminate any harmful effect of the PCBs in the equipment on the environment and on human health,

(iii) a plan has been prepared, along with timelines, to end the use of the equipment by the date applied for,

(iv) a plan has been prepared for inspecting the equipment on a monthly basis for the period of the extension for damage that could lead to the release of PCBs, and

(v) the equipment bears the label required under section 29; or

(*b*) the equipment is located at a facility that is scheduled for permanent closure on or before December 31, 2014, and

(i) the applicant is taking all necessary measures to minimize or eliminate any harmful effect of the PCBs in the equipment on the environment and on human health,

(ii) a plan has been prepared, along with timelines, to end the use of the equipment by the date applied for,

(iii) a plan has been prepared for inspecting the equipment on a monthly basis, for the period of the extension, for damage that could lead to the release of PCBs, and

(iv) the equipment bears the label required under section 29.

Information

(3) The application shall contain the following:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the applicant and of any person authorized to act on the applicant's behalf;

(*b*) a technical description of the equipment which is the subject of the application, including

(i) the type and function of the equipment,

(ii) the quantity of liquid containing PCBs that is in the equipment and the quantity of liquid needed for servicing that equipment, expressed in litres,

Prolongation de la date de fin d'utilisation

17. (1) Malgré le paragraphe 15(2), l'alinéa 16(1)*a*) et le sous-alinéa 16(1)*b*)(i), il est permis d'utiliser les pièces d'équipement et les liquides utilisés pour leur entretien visés à ces dispositions jusqu'à l'expiration de toute prolongation accordée par le ministre en vertu du paragraphe (2) pour ces pièces d'équipement et ces liquides.

Demande

(2) Sur réception d'une demande écrite comportant les renseignements prévus au paragraphe (3), le ministre accorde une prolongation jusqu'à la date prévue dans la demande mais au plus tard jusqu'au 31 décembre 2014, si l'une ou l'autre des conditions suivantes est remplie :

a) la pièce d'équipement doit être remplacée par une pièce d'équipement conçue et fabriquée sur mesure et :

(i) il est techniquement impossible de le faire le 31 décembre 2009 ou avant cette date,

(ii) le demandeur prend les mesures nécessaires pour éliminer ou atténuer tout effet nocif des BPC contenus dans la pièce sur l'environnement et la santé humaine,

(iii) un plan, incluant un échéancier, a été dressé afin que l'utilisation de la pièce cesse au plus tard à la date prévue dans la demande,

(iv) un plan a été dressé pour l'inspection de la pièce une fois par mois durant la prolongation afin que soit décelé tout dommage pouvant mener au rejet de BPC,

(v) la pièce porte l'étiquette exigée par l'article 29;

b) la pièce d'équipement se trouve dans une installation dont la fermeture permanente est prévue au plus tard pour le 31 décembre 2014 et :

(i) le demandeur prend les mesures nécessaires pour éliminer ou atténuer tout effet nocif des BPC contenus dans la pièce sur l'environnement et la santé humaine,

(ii) un plan, incluant un échéancier, a été dressé afin que l'utilisation de la pièce cesse au plus tard à la date prévue dans la demande,

(iii) un plan a été dressé pour l'inspection de la pièce une fois par mois durant la prolongation afin que soit décelé tout dommage pouvant mener au rejet de BPC;

(iv) la pièce porte l'étiquette exigée par l'article 29.

Renseignements

(3) La demande comporte :

a) les nom, adresses municipale et postale et numéro de téléphone du demandeur et de toute personne autorisée à agir en son nom et, le cas échéant, leurs numéro de télécopieur et adresse électronique;

b) les caractéristiques techniques de la pièce d'équipement qui fait l'objet de la demande, notamment :

(i) son type et sa fonction,

(ii) la quantité de liquide qui contient des BPC qui s'y trouve et la quantité de liquide nécessaire pour son entretien, exprimées en litres,

(iii) the concentration of PCBs in the liquid, expressed in milligrams of PCBs per kilogram of liquid,

(iv) the quantity of PCBs in the liquid that is in the equipment, expressed in kilograms, and

(v) the name-plate description, if any, and the manufacturer's serial number, if any;

(*c*) the unique identification number that is on the label required under section 29;

(*d*) the name, if any, and civic address of the facility where the equipment is located, or, if there is no civic address, the location using the owner's site identification system, and the function and technical description of the facility;

(*e*) information demonstrating that

(i) it is not technically feasible to replace the equipment on or before December 31, 2009, or

(ii) the facility where the equipment is located is scheduled for permanent closure on or before December 31, 2014;

(*f*) information demonstrating that the applicant is taking all necessary measures to minimize or eliminate any harmful effect of the PCBs that are contained in the equipment on the environment and on human health;

(*g*) the plan, along with timelines, for ending the use of the equipment; and

(*h*) the plan for inspecting the equipment.

(iii) la concentration de BPC dans le liquide, exprimée en milligrammes de BPC par kilogramme de liquide,

(iv) la quantité de BPC dans le liquide qui s'y trouve, exprimée en kilogrammes,

(v) s'il y a lieu, l'information figurant sur la plaque d'identification et le numéro de série de son fabricant;

c) le numéro d'identification unique figurant sur l'étiquette en application de l'article 29;

d) le nom, s'il y a lieu, et l'adresse municipale de l'installation où se trouve la pièce d'équipement ou, à défaut, l'endroit où elle se trouve d'après le système d'identification de site du propriétaire, et la fonction et les caractéristiques techniques de l'installation;

e) les renseignements qui établissent :

(i) soit qu'il est techniquement impossible de remplacer la pièce d'équipement le 31 décembre 2009 ou avant cette date,

(ii) soit que la fermeture permanente de l'installation dans laquelle se trouve la pièce d'équipement est prévue au plus tard pour le 31 décembre 2014;

f) les renseignements qui établissent que les mesures nécessaires ont été prises par le demandeur pour éliminer ou atténuer tout effet nocif des BPC contenus dans la pièce d'équipement sur l'environnement et la santé humaine;

g) le plan et l'échéancier qui seront mis en œuvre afin que cesse l'utilisation de la pièce d'équipement;

h) le plan d'inspection de la pièce d'équipement.

Notice of change to information

(4) The applicant shall notify the Minister in writing of any change to the information provided under subsection (3) within 30 days after the day on which the change occurs.

(4) Le demandeur est tenu d'aviser le ministre par écrit de tout changement des renseignements fournis en application du paragraphe (3) dans les trente jours suivant la date du changement.

Avis de changement des renseignements

False or misleading information

(5) The Minister shall refuse to grant an extension if the Minister has reasonable grounds to believe that the applicant has provided false or misleading information in support of its application.

(5) Le ministre refuse d'accorder une prolongation s'il a des motifs raisonnables de croire que le demandeur a fourni des renseignements faux ou trompeurs au soutien de sa demande.

Renseignements faux ou trompeurs

Revocation

(6) The Minister shall revoke the extension if

(*a*) the requirements set out in subsection (2) are no longer met during the period of the extension; or

(*b*) the Minister has reasonable grounds to believe that the applicant has provided false or misleading information to the Minister in support of its application.

(6) Il révoque la prolongation :

a) si, durant la prolongation, les conditions prévues au paragraphe (2), selon le cas, ne sont plus remplies;

b) s'il a des motifs raisonnables de croire que le demandeur lui a fourni des renseignements faux ou trompeurs au soutien de sa demande.

Révocation

Reasons for revocation

(7) The Minister shall not revoke the extension unless the Minister provides the applicant with

(*a*) written reasons for the revocation; and

(*b*) an opportunity to be heard, by written representation, in respect of the revocation.

(7) Il ne peut toutefois révoquer la prolongation que si, à la fois :

a) il a avisé le titulaire par écrit des motifs de la révocation;

b) il lui a donné la possibilité de présenter des observations écrites au sujet de celle-ci.

Motifs de révocation

PART 3

STORAGE

Application — concentration of 50 mg/kg or more

18. (1) Subject to subsection (3), this Part applies to a solid or liquid product containing PCBs in a concentration of 50 mg/kg or more

(*a*) that is in an amount equal to or greater than 100 L if the product is a liquid, or in an amount equal to or greater than 100 kg if the product is a solid; or

(*b*) that is in a lesser amount if the product contains 1 kg or more of PCBs.

Determination of amount

(2) For the purposes of subsection (1), the amount of PCBs or products containing PCBs is the aggregate of all amounts of PCBs and products that are located at a particular site.

Non-application

(3) This Part does not apply in respect of the following products containing PCBs:

(*a*) solid or liquid products that are processed daily or used;

(*b*) pipelines that transport natural gas, petroleum or petroleum products, and any associated equipment that is in contact with the natural gas, petroleum or petroleum products, if they remain in place on the day on which these Regulations come into force; and

(*c*) cables, if they remain in place on the day on which these Regulations come into force.

Requirement to store

19. (1) A person who owns, controls or possesses PCBs or products containing PCBs that are not processed daily or used shall, within 30 days after the day on which those PCBs or products are no longer processed or used or within 30 days after the day on which these Regulations come into force, whichever is later, either

(*a*) send them for destruction to an authorized facility that is authorized for that purpose; or

(*b*) store them at a PCB storage site for the period during which they are not processed daily or used.

Remote from or no access to roadway

(2) Despite subsection (1), if the PCBs or products containing PCBs are remote from a roadway system or if there is no access to a roadway system, the person who owns, controls or possesses the PCBs or products may store them at a PCB storage site as soon as feasible but no later than one year after the day on which they are not processed daily or used or one year after the day on which these Regulations come into force, whichever is later. That person shall use best management practices for them from the time that they cease to be processed daily or used until the time that they are stored at a PCB storage site.

Prohibition against storage

20. (1) Effective one year after the day on which these Regulations come into force, no person shall store PCBs or products containing PCBs at the

PARTIE 3

STOCKAGE

Application — Concentration égale ou supérieure à 50 mg/kg

18. (1) Sous réserve du paragraphe (3), la présente partie s'applique aux produits liquides ou solides qui contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg et :

a) dont la quantité est égale ou supérieure à 100 L, dans le cas d'un produit liquide, ou à 100 kg, dans le cas d'un produit solide;

b) dont la quantité est moindre, si ces produits renferment 1 kg ou plus de BPC.

Détermination des quantités

(2) Pour l'application du paragraphe (1), la quantité de BPC ou de produits qui en contiennent correspond à la somme de toutes les quantités de BPC et de produits qui se trouvent dans un même emplacement.

Exclusion

(3) La présente partie ne s'applique pas aux produits ci-après qui contiennent des BPC :

a) les produits liquides ou solides qui sont transformés quotidiennement ou utilisés;

b) tout pipeline qui transporte du gaz naturel, du pétrole ou des produits pétroliers, ainsi que tout équipement connexe qui est en contact avec le gaz naturel, le pétrole ou les produits pétroliers, si le pipeline et l'équipement demeurent à l'endroit où ils se trouvaient à l'entrée en vigueur du présent règlement;

c) les câbles, s'ils demeurent à l'endroit où ils se trouvaient à l'entrée en vigueur du présent règlement.

Obligation de stocker

19. (1) Le propriétaire de BPC ou de produits qui en contiennent ou la personne qui en a la possession ou le contrôle est tenu, dans les trente jours suivant la date où ceux-ci cessent d'être transformés quotidiennement ou utilisés ou celle de l'entrée en vigueur du présent règlement, selon la plus tardive de ces dates :

a) soit de les expédier pour qu'ils soient détruits dans une installation agréée à cette fin;

b) soit de les stocker dans un dépôt de BPC pendant qu'ils ne sont pas transformés quotidiennement ou utilisés.

Endroit éloigné ou inaccessible

(2) Si les BPC ou les produits qui en contiennent sont éloignés de tout système routier ou se trouvent à un endroit où il n'y a pas d'accès à un tel système, le propriétaire ou la personne peut les stocker dans un dépôt de BPC le plus tôt possible, sans toutefois dépasser un an à compter de la date où ils cessent d'être transformés quotidiennement ou utilisés ou celle de l'entrée en vigueur du présent règlement, selon la plus tardive de ces dates. Ils sont tenus d'appliquer des pratiques exemplaires de gestion pour les BPC et les produits dès qu'ils cessent d'être transformés quotidiennement ou utilisés, et ce, jusqu'à leur stockage dans un dépôt de BPC.

Interdiction de stocker

20. (1) À compter d'un an après la date d'entrée en vigueur du présent règlement, il est interdit de stocker des BPC ou des produits qui en contiennent

following plants or facilities or on the land on which those plants or facilities are located and within 100 m of them:

(*a*) a drinking water treatment plant or a food or feed processing plant; or

(*b*) a child care facility, preschool, primary school, secondary school, hospital, or senior citizens' care facility.

dans l'un des établissements ci-après ou sur le terrain d'un tel établissement, à 100 m ou moins de celui-ci :

a) une usine de traitement d'eau potable ou de transformation des aliments destinés aux humains ou aux animaux;

b) une garderie, une école — de niveau préscolaire, primaire ou secondaire —, un hôpital ou une résidence pour personnes âgées.

Light ballasts

(2) Subsection (1) does not apply to light ballasts.

(2) Le paragraphe (1) ne s'applique pas aux ballasts de lampes.

Ballasts de lampes

Maximum storage periods

21. (1) Despite any other provision in these Regulations and subject to section 22, no person shall store PCBs or products containing PCBs, other than those referred to in section 23, beyond the following time limits:

(*a*) one year, beginning on the day on which their use is no longer permitted under these Regulations or the day on which they are no longer processed daily or used, whichever is sooner, if the PCBs or products are stored at a facility that is not referred to in paragraph (1)(*b*) or (*c*);

(*b*) one year, if the PCBs or products are stored at an authorized facility that is a transfer site; and

(*c*) two years, if the PCBs or products are stored at an authorized facility that is authorized to destroy them.

21. (1) Malgré toute autre disposition du présent règlement mais sous réserve de l'article 22, il est interdit de stocker des BPC et des produits qui en contiennent, autres que ceux visés à l'article 23, au-delà de la période applicable suivante :

a) un an à compter du jour où le présent règlement ne permet plus l'utilisation des BPC et des produits ou de celui, s'il est antérieur, où ils ont cessé d'être transformés quotidiennement ou utilisés, s'ils sont stockés à une installation qui n'est pas visée aux alinéas (1)*b*) ou *c*);

b) un an, s'ils sont stockés dans une installation agréée qui est un centre de transfert;

c) deux ans, s'ils sont stockés dans une installation agréée qui est autorisée à les détruire.

Périodes maximales de stockage

Transfer sites

(2) If the PCBs or products containing PCBs are sent from one transfer site to another, the period referred to in paragraph (1)(*b*) begins when they are received at the first transfer site.

(2) Si les BPC et les produits qui en contiennent sont expédiés d'un centre de transfert à un autre, la période prévue à l'alinéa (1)*b*) commence à courir le jour de leur réception au premier centre de transfert.

Centres de transfert

Destruction

(3) The owner or operator of the facility referred to in paragraph (1)(*a*) or (*b*) shall send the PCBs or products containing PCBs for destruction to an authorized facility that is authorized for that purpose within the time limit set out in those paragraphs.

(3) Le propriétaire ou l'exploitant de l'installation visée aux alinéas (1)*a*) ou *b*) est tenu d'expédier, dans le délai prévu à ces alinéas, les BPC ou les produits qui en contiennent pour qu'ils soient détruits dans une installation agréée à cette fin.

Destruction

Exceptions to maximum storage periods

22. (1) Section 21 does not apply to the storage of

(*a*) liquids referred to in subsection 15(2) or for which an extension has been granted under subsection 17; or

(*b*) solids and liquids containing PCBs in a concentration of 50 mg/kg or more resulting from environmental restoration work and stored on site for the duration of the work, if the requirements set out in subsections (2) and (3) are complied with.

22. (1) L'article 21 ne s'applique pas au stockage :

a) des liquides visés au paragraphe 15(2) ou pour lesquels une prolongation a été accordée en vertu de l'article 17;

b) des solides et des liquides qui contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg et qui sont issus de travaux de restauration de l'environnement et stockés sur place pendant la durée des travaux, si les exigences prévues aux paragraphes (2) et (3) sont respectées.

Périodes maximales de stockage — exceptions

Information to be provided

(2) The owner of the land where the solids and liquids referred to in paragraph (1)(*b*) are located shall submit to the Minister at least 30 days before the storage of the solids or liquids or within 30 days after the day on which these Regulations come into force, whichever is later, the following information:

(*a*) the civic address of the restoration work site or if there is no civic address, the location using the Global Positioning System;

(*b*) the date of commencement of the restoration work;

(*c*) the anticipated date of completion of the restoration work; and

(2) Le propriétaire du terrain où se trouvent les solides ou les liquides visés à l'alinéa (1)*b*) fournit au ministre, au plus tard trente jours avant la date de leur stockage ou après celle de l'entrée en vigueur du présent règlement, selon la plus tardive de ces dates, les renseignements suivants :

a) l'adresse municipale de l'endroit où sont effectués les travaux de restauration ou, à défaut, sa localisation d'après le système mondial de localisation;

b) la date de début des travaux de restauration;

c) la date prévue pour la fin des travaux de restauration;

Renseignements à fournir

(*d*) the anticipated date of the end of storage of the solids or liquids.

d) la date prévue pour la cessation du stockage des solides ou des liquides.

Changes to information

(3) The person referred to in subsection (2) shall notify the Minister in writing of the changes to be made at least 30 days before making any changes to the information provided under that subsection.

(3) Il avise également le ministre par écrit, au moins trente jours à l'avance, de toute modification apportée aux renseignements fournis.

Modification des renseignements

PCBs or products containing PCBs stored at the coming into force

23. The person who owns PCBs or products containing PCBs, other than liquids for which an extension has been granted under section 17, that are stored on the day on which these Regulations come into force shall send them no later than December 31, 2009 for destruction to an authorized facility that is authorized for that purpose.

23. Le propriétaire de BPC ou de produits qui en contiennent, autres que des liquides pour lesquels une prolongation a été accordée en vertu de l'article 17, qui sont stockés à l'entrée en vigueur du présent règlement est tenu de les expédier, au plus tard le 31 décembre 2009, pour qu'ils soient détruits dans une installation agréée à cette fin.

BPC et produits qui en contiennent stockés à l'entrée en vigueur

PCB storage site

24. PCBs or products containing PCBs shall be stored at a site that is

(*a*) a building, room, shipping container or other enclosed structure; or

(*b*) an area that is enclosed by a woven mesh wire fence or any other fence or wall with similar security characteristics, and the fence or wall shall be at least 1.83 m high.

24. Les BPC et les produits qui en contiennent doivent être stockés dans un dépôt qui est :

a) soit un bâtiment, une pièce, un conteneur ou tout autre ouvrage fermé;

b) soit un endroit entouré d'une clôture grillagée ou d'un autre genre de clôture ou d'un mur présentant des caractéristiques similaires sur le plan de la sécurité, la clôture ou le mur ayant au moins 1,83 m de haut.

Dépôt de BPC

Storage requirements

25. The owner or operator of a PCB storage site shall

(*a*) store all PCBs or products containing PCBs that are in liquid form in

(i) sealed containers, other than drums, that are made of steel or other metals that provide sufficient durability and strength to prevent those PCBs or products from being affected by the weather or released, or

(ii) drums that are

(A) of a capacity not greater than 205 L,

(B) a closed-head double-bung drum made of steel having a gauge of 16 or heavier, and

(C) painted or treated to prevent rusting;

(*b*) store all PCBs or products containing PCBs that are in solid form in

(i) containers, other than drums, that are made of steel or other materials that provide sufficient durability and strength to prevent those PCBs or products from being affected by the weather or released, or

(ii) drums that are

(A) of a capacity not greater than 205 L,

(B) made of steel having a gauge of 18 or heavier,

(C) equipped with a securely attached, removable steel lid and a gasket made of material that is resistant to the PCBs or the products containing PCBs that are stored in the drums, and

(D) painted or treated to prevent rusting;

(*c*) store equipment containing PCB liquids in

(i) containers, other than drums, that are made of steel or other materials that provide sufficient durability and strength to prevent the equipment from being affected by the weather and

25. Le propriétaire ou l'exploitant d'un dépôt de BPC :

a) stocke les BPC et les produits en contenant qui sont des liquides dans :

(i) soit des contenants étanches, autres que des fûts, faits d'acier ou d'autres métaux offrant une durabilité et une solidité suffisantes pour que ces BPC et ces produits ne soient pas affectés par les conditions climatiques ni rejetés,

(ii) soit des fûts qui, à la fois :

(A) ont une capacité d'au plus 205 L,

(B) sont faits d'acier d'épaisseur minimale 16, ont un dessus non amovible et sont munis de deux bondes,

(C) sont enduits d'une peinture ou d'un revêtement antirouille;

b) stocke les BPC et les produits en contenant qui sont des solides dans :

(i) soit des contenants, autres que des fûts, faits d'acier ou d'autres matériaux offrant une durabilité et une solidité suffisantes pour que ces BPC et ces produits ne soient pas affectés par les conditions climatiques ni rejetés,

(ii) soit des fûts qui, à la fois :

(A) ont une capacité d'au plus 205 L,

(B) sont faits d'acier d'épaisseur minimale 18,

(C) sont dotés d'un couvercle d'acier amovible solidement fixé et d'un joint fait d'un matériau résistant aux BPC et aux produits en contenant qui y sont stockés,

(D) sont enduits d'une peinture ou d'un revêtement antirouille;

c) stocke les pièces d'équipement qui renferment des liquides contenant des BPC dans :

(i) soit des contenants, autres que des fûts, faits d'acier ou d'autres matériaux offrant une

Exigences relatives au stockage

to prevent any PCB liquid that leaks from the equipment from being released, or

(ii) drums described in subparagraph (*b*)(ii);

(*d*) store all equipment that is not in a container, other than drained equipment, if that equipment contains PCB liquid, and all containers of PCB liquid, on a floor or surface that is made of steel, concrete or any other similar durable material and that is constructed with curbing or sides that are capable of containing

(i) if one piece of equipment or one container is being stored, 125% of the volume of the PCB liquid in the equipment or container, and

(ii) if more than one piece of equipment or more than one container is being stored, the greater of twice the volume of the PCB liquid in the largest piece of equipment or the largest container and 25% of the volume of all the PCB liquid stored on the floor or surface;

(*e*) if the material of the floor or surface or the curbing or sides referred to in paragraph (*d*) are capable of absorbing any PCB liquid or other product containing PCBs, seal the floor, surface, curbing or sides with an impervious, durable, PCB-resistant coating;

(*f*) ensure that all floor drains, sumps or other openings in the floor or surface referred to in paragraph (*d*) are

(i) closed and sealed to prevent the release of liquids, or

(ii) connected to a drainage system suitable for liquid dangerous goods that terminates at a location where any spilled liquids will be contained and recovered and where the spilled liquids will not create a fire hazard or a risk to public health or safety;

(*g*) place on skids or pallets all equipment containing PCBs and containers of PCBs or products containing PCBs that are not permanently secured to the floor or a surface;

(*h*) stack containers of PCBs and products containing PCBs, other than drums, only if the containers are designed for stacking, and stack containers of PCB liquid not more than two containers high;

(*i*) if drums containing PCBs or products containing PCBs are stacked, separate the drums from each other with pallets and, in the case of drums of PCB liquid, stack the drums not more than two drums high;

(*j*) store equipment containing PCBs, and containers of PCBs or products containing PCBs, in a manner that makes them accessible for inspection;

(*k*) store PCBs or products containing PCBs in a manner that prevents them from catching fire or being released;

(*l*) store PCBs or products containing PCBs together, and separate them from other stored materials;

durabilité et une solidité suffisantes pour que les pièces d'équipement ne soient pas affectées par les conditions climatiques et que les liquides, s'ils fuient des pièces, ne soient pas rejetés,

(ii) soit des fûts visés au sous-alinéa *b*)(ii);

d) stocke les pièces d'équipement — autres que celles contenant des BPC qui ont été vidangées — qui ne sont pas dans un contenant et qui renferment des liquides contenant des BPC, ainsi que tout contenant qui renferme de tels liquides, sur un plancher ou une surface fait d'acier, de béton ou d'un autre matériau durable semblable et entouré d'un rebord ou de côtés capables de retenir :

(i) si une seule pièce d'équipement ou un seul contenant est stocké, 125 % du volume des liquides contenant des BPC que renferme cette pièce d'équipement ou le contenant,

(ii) si plus d'une pièce d'équipement ou plus d'un contenant est stocké, le plus élevé des volumes suivants : le double du volume des liquides contenant des BPC que renferme la plus grosse pièce d'équipement ou le plus grand contenant ou 25 % du volume de l'ensemble des liquides contenant des BPC qui sont stockés sur le plancher ou la surface;

e) scelle, au moyen d'un revêtement étanche, durable et résistant aux BPC, le plancher, la surface, le rebord ou les côtés visés à l'alinéa *d*), lorsqu'ils peuvent absorber des liquides ou d'autres produits qui contiennent des BPC;

f) veille à ce que les drains de sol, puisards et autres ouvertures dans le plancher ou la surface visés à l'alinéa *d*) soient, selon le cas :

(i) obturés et scellés pour empêcher le rejet de liquides,

(ii) reliés à un réseau de drainage convenant aux marchandises dangereuses liquides, qui se jette dans un lieu où les liquides déversés seront confinés et récupérés et où ils ne constitueront pas un risque d'incendie ni un risque pour la santé et la sécurité publiques;

g) place sur des patins ou des palettes les pièces d'équipement contenant des BPC et les contenants renfermant des BPC ou des produits en contenant qui ne sont pas fixés de façon permanente à un plancher ou à une surface;

h) empile les contenants de BPC et de produits qui en contiennent, autres que les fûts, seulement s'ils sont conçus à cette fin et, dans le cas des contenants renfermant des liquides qui contiennent des BPC, ne les empile pas à plus de deux contenants de haut;

i) s'ils sont empilés, sépare les fûts de BPC et de produits qui en contiennent les uns des autres avec des palettes et, dans le cas des fûts renfermant des liquides qui contiennent des BPC, ne les empile pas à plus de deux fûts de haut;

(*m*) if reasonably practicable, equip any indoor PCB storage site having a mechanical exhaust system with heat or smoke sensory controls that stop the fan and close the intake and exhaust dampers in the event of a fire;

(*n*) if equipment or containers of PCB liquid are stored outdoors, cover all PCB equipment that is not in a container, other than drained equipment, if that equipment contains PCB liquid, and all containers of PCB liquid, with a weatherproof roof or barrier that protects the equipment and containers and prevents rain or snow from entering the curbing and the sides of the floor and the surface under them; and

(*o*) ensure that all drained PCB equipment and all containers of any PCB solid or PCB equipment are structurally sound and weatherproof if stored outdoors.

j) stocke les pièces d'équipement qui contiennent des BPC et les contenants renfermant des BPC ou des produits qui en contiennent de manière à ce qu'ils soient accessibles à des fins d'inspection;

k) stocke les BPC et les produits qui en contiennent de façon à empêcher leur inflammation ou leur rejet;

l) stocke les BPC et les produits qui en contiennent ensemble, à l'écart des autres matériaux stockés;

m) dans la mesure du possible, munit tout dépôt de BPC intérieur ayant un dispositif mécanique de ventilation de commandes sensibles à la chaleur ou à la fumée qui, en cas d'incendie, arrêtent le ventilateur et ferment les registres d'admission et d'évacuation d'air;

n) s'ils sont stockés dehors, couvre les pièces d'équipement — autres que celles contenant des BPC qui ont été vidangées — qui ne sont pas dans un contenant et qui renferment des liquides contenant des BPC, ainsi que tout contenant qui renferme de tels liquides, d'une toiture ou d'un écran à l'épreuve des intempéries qui les protège et empêche la pluie et la neige de pénétrer à l'intérieur du rebord et des côtés du plancher et de la surface sur lesquels ils sont posés;

o) s'ils sont stockés dehors, veille à ce que les pièces d'équipement contenant des BPC qui ont été vidangées et tout contenant qui renferme des solides ou des pièces d'équipement contenant des BPC aient une structure en bon état et soient à l'épreuve des intempéries.

Access to PCB storage site

26. The owner or operator of a PCB storage site shall keep all points of access to the PCB storage site locked or guarded.

Accès au dépôt de BPC

26. Le propriétaire ou l'exploitant d'un dépôt de BPC tient chaque point d'accès au dépôt verrouillé ou veille à ce qu'il soit gardé.

Inspection and maintenance of a PCB storage site

27. The owner or operator of a PCB storage site shall

(*a*) inspect all floors, curbing, sides, drains, drainage systems, weatherproof roofs and barriers, fences and walls of the PCB storage site, any fire alarm system, fire extinguishers and fire suppression system and all equipment containing PCBs, containers used for the storage of PCBs or products containing PCBs and materials for clean-up at the PCB storage site

(i) each month,

(ii) at intervals of more than one month, if the Minister, on the written request of the owner or operator, determines that it is not reasonably practicable to inspect the site each month, due to its remote location, or

(iii) at intervals of less than one month, if more frequent inspections are necessary for the safe operation of the site; and

(*b*) keep in good condition and, if damaged, immediately repair or replace the floors, curbing, sides, drains, drainage systems, weatherproof roofs or barriers, fences, walls, fire alarm system, fire extinguishers, fire suppression system, equipment containing PCBs and containers and immediately clean up any contaminated area.

Inspection et entretien des dépôts de BPC

27. Le propriétaire ou l'exploitant d'un dépôt de BPC :

a) en inspecte les planchers, les rebords, les côtés, les drains, les réseaux de drainage, les toitures et écrans à l'épreuve des intempéries, les clôtures, les murs, le système d'alarme-incendie, les extincteurs et le réseau d'extinction automatique, ainsi que les pièces d'équipement qui contiennent des BPC, les contenants servant au stockage des BPC ou des produits qui en contiennent et les agents de nettoyage qui s'y trouvent :

(i) tous les mois,

(ii) à des intervalles de plus d'un mois, si le ministre, à la demande écrite du propriétaire ou de l'exploitant, a déterminé qu'il est en pratique impossible d'inspecter le dépôt tous les mois en raison de son isolement,

(iii) à des intervalles de moins d'un mois, si l'exploitation du dépôt en toute sécurité exige des inspections plus fréquentes;

b) les garde en bon état et, en cas de dommage, les répare ou les remplace immédiatement et nettoie sur-le-champ les aires contaminées.

Fire protection and emergency procedures

28. (1) The owner or operator of a PCB storage site shall

(*a*) develop and implement at the PCB storage site a fire protection and emergency procedures plan and shall

(i) update and test the plan once per year,

(ii) keep a written copy of the latest plan at the PCB storage site and another at their principal place of business, and

(iii) make the latest plan readily available to persons who implement the plan and to the local fire department or to the local officer appointed by the provincial Fire Marshall if there is no local fire department or to any other local authority responsible for fire protection;

(*b*) ensure that all employees who are authorized to enter the PCB storage site are familiar with the contents of the latest plan;

(*c*) equip the indoor PCB storage site with a fully operative fire alarm system that is maintained, inspected and tested in accordance with articles 6.3.1.1 and 6.3.1.2 of the National Fire Code and with

(i) portable fire extinguishers that are selected and installed in accordance with article 2.1.5.1 of the National Fire Code and maintained, inspected and tested in accordance with article 6.2.1.1 of that Code, or

(ii) an automatic fire suppression system that meets the requirements of article 3.2.7.9 of the National Fire Code, if required;

(*d*) keep a copy of the records referred to in sections 43 and 44 at the PCB storage site and make a copy readily available to the local fire department and, if there is no local fire department, to the local officer appointed by the provincial Fire Marshall or to any other local authority responsible for fire protection;

(*e*) ensure that all employees who are authorized to enter the PCB storage site are made aware of the hazards of PCBs and are familiar with the use of protective equipment and clothing and the clean-up procedures referred to in the *Guidelines for the Management of Wastes Containing Polychlorinated Biphenyls (PCBs)*, CCME-TS/WM-TRE008, September 1989, as amended from time to time, issued by the Canadian Council of Ministers of the Environment; and

(*f*) store absorbent materials for clean-up near the PCB storage site.

Shipping containers

(2) Despite paragraph (1)(*c*), if the indoor PCB storage site is a shipping container, the owner or operator of the site does not have to equip that site with a fire alarm system.

Protection contre les incendies et mesures d'urgence

28. (1) Le propriétaire ou l'exploitant d'un dépôt de BPC :

a) élabore et met en œuvre un plan d'intervention d'urgence et de lutte contre les incendies et :

(i) le met à jour et le vérifie annuellement,

(ii) en conserve une copie écrite à jour au dépôt et à son établissement principal,

(iii) en met une copie à jour à la disposition de toute personne qui participe à sa mise en œuvre et au service d'incendie local ou, à défaut, au fonctionnaire local nommé par le commissaire provincial aux incendies ou à toute autre autorité locale chargée de la protection contre les incendies,

b) veille à ce que tous les employés autorisés à entrer dans le dépôt connaissent bien le contenu du plan à jour;

c) s'agissant d'un dépôt intérieur, le munit d'un système d'alarme-incendie en état de fonctionnement qui est entretenu, inspecté et mis à l'essai conformément aux exigences des articles 6.3.1.1 et 6.3.1.2 du Code national de prévention des incendies, ainsi que :

(i) soit d'extincteurs portatifs qui sont choisis et installés conformément à l'article 2.1.5.1 de ce code et qui sont entretenus, inspectés et mis à l'essai conformément aux exigences de l'article 6.2.1.1 de ce code,

(ii) soit d'un réseau d'extinction automatique conforme aux exigences de l'article 3.2.7.9 du même code, si celles-ci s'appliquent;

d) conserve au dépôt une copie des documents et registres visés aux articles 43 et 44 respectivement et en met une à la disposition du service d'incendie local ou, à défaut, au fonctionnaire local nommé par le commissaire provincial aux incendies ou à toute autre autorité locale chargée de la protection contre les incendies;

e) veille à ce que tous les employés autorisés à entrer dans le dépôt soient informés des dangers que présentent les BPC et connaissent bien l'utilisation du matériel et des vêtements de protection et les méthodes de nettoyage mentionnées dans le *Guide pour la gestion des déchets contenant des biphényles polychlorés (BPC)* CCME-TS/WM-TRE008, septembre 1989, avec ses modifications successives, publié par le Conseil canadien des ministres de l'environnement;

f) garde les matériaux absorbants servant au nettoyage près du dépôt.

Conteneur

(2) Malgré l'alinéa (1)*c*), le propriétaire ou l'exploitant d'un dépôt de BPC intérieur qui est un conteneur n'est pas tenu de le munir d'un système d'alarme-incendie.

PART 4

LABELLING, REPORTS AND RECORDS

LABELLING

Equipment and liquids used for their servicing

29. (1) The owner of equipment referred to in section 16, other than equipment for which an extension has been applied for under section 17, or of a liquid used in its servicing referred to in subsection 15(2) shall affix a label in a readily visible location on the equipment or on the container of the liquid, no later than 30 days after the day on which it ceases to be used.

Equipment for which extension applied for

(2) The owner of equipment for which an extension has been applied under section 17 shall affix a label in a readily visible location on the equipment.

Exceptions

(3) Subsection (1) does not apply to

(*a*) equipment or containers of liquids that bear a label on the day on which these Regulations come into force that indicates the presence of PCBs; and

(*b*) equipment that is too small, including light ballasts, to bear the label referred to in subsection (4), until the day on which they cease to be used and are placed in a container that bears the label.

Description

(4) The label must

(*a*) state "ATTENTION — contains 50 mg/kg or more of PCBs / contient 50 mg/kg ou plus de BPC" in black lettering on a white background, in a font size of no less than 36 points;

(*b*) measure at least 150 mm by 150 mm or at least 76 mm by 76 mm in the case of capacitors; and

(*c*) in the case of equipment for which an extension is applied for under section 17, state a unique identification number.

Cables and pipelines

30. (1) The owner of a cable, a pipeline or equipment associated with a pipeline, referred to in paragraphs 14(1)(*a*) and (*b*), containing PCBs in a concentration of 50 mg/kg or more that is in a room, a tunnel or a facility shall either

(*a*) affix the label in the form set out in subsection 29(4) in a readily visible location on a part of the cable, pipeline or associated equipment that is accessible; or

(*b*) place a notice in a readily visible location at the entrance of the room, tunnel or facility that states the information set out in paragraph 29(4)(*a*) and measures at least 150 mm by 150 mm.

If dismantled

(2) If a part of the cable, pipeline or associated equipment is dismantled, the owner of the cable, pipeline or associated equipment shall affix on each dismantled part the label in the form set out in

PARTIE 4

ÉTIQUETAGE, RAPPORTS ET DOSSIERS

ÉTIQUETAGE

Pièces d'équipement et liquides pour leur entretien

29. (1) Le propriétaire d'une pièce d'équipement visée à l'article 16, autre qu'une pièce d'équipement qui fait l'objet d'une demande de prolongation en vertu de l'article 17, ou de tout liquide utilisé pour l'entretien visé au paragraphe 15(2) est tenu d'apposer une étiquette, à un endroit bien en vue sur la pièce d'équipement ou le contenant du liquide, au plus tard trente jours après que la pièce ou le contenant cesse d'être utilisé.

Équipement faisant l'objet d'une demande de prolongation

(2) Le propriétaire d'une pièce d'équipement qui fait l'objet d'une demande de prolongation en vertu de l'article 17 est tenu d'y apposer une étiquette à un endroit bien en vue.

Exceptions

(3) Le paragraphe (1) ne s'applique pas :

a) aux pièces d'équipement et aux contenants de liquide qui portent, à l'entrée en vigueur du présent règlement, une étiquette qui indique la présence de BPC;

b) aux pièces d'équipement qui sont trop petites, y compris les ballasts de lampes, pour que l'étiquette visée au paragraphe (4) y soit apposée, jusqu'à ce qu'elles cessent d'être utilisées et qu'elles soient placées dans un contenant sur lequel l'étiquette est apposée.

Description

(4) L'étiquette doit :

a) porter la mention « ATTENTION — contains 50 mg/kg or more of PCBs / contient 50 mg/kg ou plus de BPC », inscrite en caractères d'au moins 36 points, en noir sur fond blanc;

b) être d'une dimension minimale de 150 mm sur 150 mm ou, dans le cas d'un condensateur, 76 mm sur 76 mm;

c) dans le cas d'une pièce d'équipement qui fait l'objet d'une demande de prolongation en vertu de l'article 17, porter un numéro d'identification unique.

Câbles et pipelines

30. (1) Le propriétaire de câbles, de pipelines ou d'équipement connexe visés aux alinéas 14(1)(*a*) et (*b*) qui contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg et se trouvent dans une pièce, un tunnel ou une installation est tenu :

a) soit d'apposer une étiquette conforme au paragraphe 29(4) à un endroit bien en vue sur toute partie accessible du câble, pipeline ou équipement connexe;

b) soit de placer à l'entrée de la pièce, du tunnel ou de l'installation à un endroit bien en vue une affiche d'une dimension minimale de 150 mm sur 150 mm portant la mention prévue à l'alinéa 29(4)*a*).

Désassemblage

(2) En cas de désassemblage d'une partie du câble, du pipeline ou de l'équipement connexe, le propriétaire de ceux-ci est tenu, dans les trente jours suivant le désassemblage, d'apposer une étiquette

subsection 29(4), no later than 30 days after the day on which it is dismantled.

conforme au paragraphe 29(4) sur chaque partie désassemblée du câble, du pipeline ou de l'équipement connexe.

A facility other than transfer site or destruction facility

31. (1) The owner or operator of a PCB storage site, other than the PCB storage site of an authorized facility that is a transfer site or that is authorized to destroy PCBs, shall affix a label in a readily visible location on any product containing PCBs in a concentration of 50 mg/kg or more and that are stored at the PCB storage site, which

(*a*) is in the form referred to in subsection 29(4); and

(*b*) states "Date of Commencement of Storage" and the date on which the storage begins.

Installation autre qu'un centre de transfert ou de destruction

31. (1) Le propriétaire ou l'exploitant d'un dépôt de BPC d'une installation autre qu'une installation agréée qui est un centre de transfert ou qui est autorisée à détruire des BPC est tenu d'apposer une étiquette à un endroit bien en vue sur tout produit en contenant qui y sont stockés et qui contiennent des BPC en une concentration égale ou supérieure à 50 mg/kg; l'étiquette

a) est conforme au paragraphe 29(4);

b) porte la mention « Date de début de stockage » et la date de début de stockage.

Transfer site or destruction facility

(2) The owner or operator of the PCB storage site of an authorized facility that is a transfer site or that is authorized to destroy PCBs shall affix a label in the form set out in subsection 29(4) in a readily visible location on any container that is a fixed tank and that is used at the facility for the storage of PCBs or products containing PCBs in a concentration of 50 mg/kg or more.

Centre de transfert ou de destruction

(2) Le propriétaire ou l'exploitant d'un dépôt de BPC d'une installation agréée qui est un centre de transfert ou qui est autorisée à détruire des BPC est tenu d'apposer une étiquette conforme au paragraphe 29(4) à un endroit bien en vue sur tout contenant qui est un réservoir fixe utilisé pour stocker des BPC à l'installation ou des produits qui en contiennent en une concentration égale ou supérieure à 50 mg/kg.

Notice

(3) The owner or operator of a PCB storage site shall place a notice in a readily visible location at the entrance of the site that states the information set out in paragraph 29(4)(*a*) and that measures at least 150 mm by 150 mm.

Affiche

(3) Le propriétaire ou l'exploitant d'un dépôt de BPC place à l'entrée du dépôt à un endroit bien en vue une affiche d'une dimension minimale de 150 mm sur 150 mm portant la mention prévue à l'alinéa 29(4)*a*).

Exception

(4) Subsections (1) and (2) do not apply if the product or the container bear a label on the day on which these Regulations come into force that indicates the presence of PCBs and that states "Date of Commencement of Storage" and the date on which the storage begins.

Exception

(4) Les paragraphes (1) et (2) ne s'appliquent pas si le produit ou le contenant porte, à l'entrée en vigueur du présent règlement, une étiquette qui indique la présence de BPC, qui porte la mention « Date de début de stockage » et indique la date de début de stockage.

Retention of labels

32. The person who is required to affix a label on a product or container in accordance with sections 29 to 31 shall ensure that it bears that label for the duration that the person possesses the product or container.

Conservation des étiquettes

32. La personne qui a l'obligation d'apposer une étiquette sur un produit ou un contenant en application des articles 29 à 31 veille à ce que le produit ou le contenant la porte en tout temps pendant qu'il est en sa possession.

REPORTS

RAPPORTS

End of use of equipment and liquids — 2009

33. (1) The owner of the equipment referred to in paragraph 16(1)(*a*) and subparagraph 16(1)(*b*)(i), other than the equipment for which an extension is granted by the Minister in accordance with section 17, or the liquids referred to in subsection 15(2) shall prepare a report that is current to December 31 of each calendar year in which the person owns the equipment or the liquids and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the owner and any person authorized to act on the owner's behalf;

(*b*) the civic addresses of the facilities where the equipment and liquids are located or, if there is no civic address, their location using the owner's site identification system;

Date de fin d'utilisation des pièces d'équipement et des liquides — 2009

33. (1) Le propriétaire des pièces d'équipement visées à l'alinéa 16(1)*a*) ou au sous-alinéa 16(1)*b*)(i), autres que celles pour lesquelles une prolongation a été accordée par le ministre en vertu de l'article 17, ou des liquides visés au paragraphe 15(2) est tenu de préparer un rapport, au 31 décembre de chaque année civile durant laquelle il en est propriétaire, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) l'adresse municipale des installations où se trouvent les pièces d'équipement et les liquides ou, à défaut, l'endroit où ils se trouvent d'après le système d'identification de site du propriétaire;

(*c*) the quantity of the liquids containing PCBs in the equipment and of the liquids, expressed in litres,

(i) that are in use on December 31,

(ii) that are stored on December 31 at the person's PCB storage site,

(iii) that are sent, in that calendar year, to an authorized facility that is a transfer site,

(iv) that are sent, in that calendar year, to an authorized facility that is authorized to destroy them, or

(v) that are destroyed in that calendar year; and

(*d*) a certification that the information is accurate and complete and that is dated and signed by the owner or by a person authorized to act on the owner's behalf.

c) la quantité, exprimée en litres, de liquides qui contiennent des BPC dans les pièces d'équipement et de liquides :

(i) en usage le 31 décembre,

(ii) stockés à son dépôt le 31 décembre,

(iii) expédiés, au cours de l'année civile, à une installation agréée qui est un centre de transfert,

(iv) expédiés, au cours de l'année civile, à une installation agréée qui est autorisée à les détruire,

(v) détruits au cours de l'année civile;

d) une attestation, datée et signée par lui ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Equipment and liquids for which extension granted

(2) The owner of the equipment referred to in paragraph 16(1)(*a*) and subparagraph 16(1)(*b*)(i) or the liquids referred to in subsection 15(2) for which an extension is granted by the Minister in accordance with section 17 shall prepare a report that is current to December 31 of each calendar year in which the person owns the equipment or the liquids and that contains the following information for each piece of equipment or container of liquid:

(*a*) the information required under paragraphs (1)(*a*) and (*d*);

(*b*) the unique identification number that is on the label referred to in paragraph 29(4)(*c*);

(*c*) the civic address, function and technical description of the facility where the equipment or container of liquid is located or, if there is no civic address, its location using the owner's site identification system;

(*d*) the progress on the plan's implementation and the timelines for ending the use of the equipment;

(*e*) the measures taken to minimize or eliminate any harmful effect of the PCBs in the equipment on the environment and on human health; and

(*f*) the findings of the inspections of the equipment.

Pièces d'équipement et liquides pour lesquels une prolongation a été accordée

(2) Le propriétaire des pièces d'équipement visées à l'alinéa 16(1)*a*) ou au sous-alinéa 16(1)*b*)(i) ou des liquides visés au paragraphe 15(2) pour lesquels une prolongation a été accordée par le ministre en vertu de l'article 17 est tenu de préparer un rapport, au 31 décembre de chaque année civile durant laquelle il en est propriétaire, comportant les renseignements suivants pour chaque pièce d'équipement et contenant de liquides :

a) les renseignements prévus aux alinéas (1)*a*) et *d*);

b) le numéro d'identification unique figurant sur l'étiquette conformément à l'alinéa 29(4)*c*);

c) l'adresse municipale, la fonction et les caractéristiques techniques de l'installation où se trouvent la pièce d'équipement ou le contenant des liquides ou, à défaut, l'endroit où il se trouvent d'après le système d'identification de site du propriétaire;

d) le progrès accompli dans la mise en œuvre du plan et de l'échéancier dressé en vue de la cessation de l'utilisation de la pièce d'équipement;

e) les mesures prises pour éliminer ou atténuer tout effet nocif des BPC contenus dans la pièce d'équipement sur l'environnement et la santé humaine;

f) les résultats des inspections de la pièce d'équipement.

End of use of equipment — 2025

(3) The owner of the equipment referred to in subparagraph 16(1)(*b*)(ii) and subsection 16(2) shall prepare a report that is current to December 31 of each calendar year in which the person owns the equipment and that contains the following information:

(*a*) the information required under paragraphs (1)(*a*), (*b*) and (*d*); and

(*b*) the quantity, expressed in litres, of liquids containing PCBs in the equipment, and the concentration, expressed in mg/kg, of the PCBs

(i) that are stored on December 31 at the person's PCB storage site,

Date de fin d'utilisation des pièces d'équipement — 2025

(3) Le propriétaire des pièces d'équipement visées au sous-alinéa 16(1)*b*)(ii) ou au paragraphe 16(2) est tenu de préparer un rapport, au 31 décembre de chaque année civile durant laquelle il en est propriétaire, comportant les renseignements suivants :

a) les renseignements prévus aux alinéas (1)*a*), *b*) et *d*);

b) la quantité de liquides qui contiennent des BPC dans les pièces d'équipement, exprimée en litres, et la concentration de ces BPC dans les liquides, exprimée en mg/kg :

(i) stockés à son dépôt de BPC le 31 décembre,

(ii) that are sent, in that calendar year, to an authorized facility that is a transfer site,

(iii) that are sent, in that calendar year, to an authorized facility that is authorized to destroy them, or

(iv) that are destroyed in that calendar year.

(ii) expédiés, au cours de l'année civile, à une installation agréée qui est un centre de transfert,

(iii) expédiés, au cours de l'année civile, à une installation agréée qui est autorisée à les détruire,

(iv) détruits au cours de l'année civile.

Research

34. The person who offers for sale, sells, processes or uses PCBs or products containing PCBs for the purpose of research in accordance with section 8 shall prepare a report that is current to December 31 in each calendar year in which the person offers for sale, sells, processes or uses those PCBs or products and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the person and of any person authorized to act on that person's behalf;

(*b*) an indication of whether the person offers for sale, sells, processes or uses the PCBs or products;

(*c*) the quantity of the PCBs or of the products containing PCBs that are offered for sale, sold, processed or used in that calendar year; and

(*d*) a certification that the information is accurate and complete and that is dated and signed by the person or by a person authorized to act on their behalf.

Recherches

34. La personne qui met en vente, vend, transforme ou utilise des BPC ou des produits qui en contiennent en vue d'effectuer des recherches conformément à l'article 8 est tenue de préparer un rapport, au 31 décembre de chaque année civile durant laquelle elle les a mis en vente, vendus, utilisés ou transformés, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) une mention indiquant si elle les a mis en vente, vendus, transformés ou utilisés;

c) la quantité de BPC ou de produits qui ont été mis en vente, vendus, transformés ou utilisés durant l'année civile;

d) une attestation, datée et signée par elle ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Colouring pigment

35. The person who manufactures, exports or imports colouring pigment in accordance with section 11 shall prepare a report that is current to December 31 in each calendar year in which the person manufactures, imports or exports the colouring pigment and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the person and of any person authorized to act on that person's behalf;

(*b*) an indication of whether the person manufactures, exports or imports colouring pigment;

(*c*) the quantity of colouring pigment, expressed in kilograms, the maximum concentration of PCBs in the colouring pigment, expressed in mg/kg, and the average annual concentration of PCBs in the colouring pigment, expressed in mg/kg, that is manufactured, imported or exported in that calendar year;

(*d*) in the case of importing, the name, telephone number and civic and mailing addresses of the person from whom the colouring pigment is imported and, in the case of exporting, the name, telephone number and civic and mailing addresses of the person to whom the colouring pigment is exported; and

(*e*) a certification that the information is accurate and complete and that is dated and signed by the person or by a person authorized to act on their behalf.

Pigments pour la coloration

35. La personne qui fabrique, exporte ou importe, conformément à l'article 11, des pigments pour la coloration est tenue de préparer un rapport, au 31 décembre de chaque année civile durant laquelle elle les fabrique, exporte ou importe, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) une mention indiquant si elle les a fabriqués, exportés ou importés;

c) la quantité, exprimée en kilogrammes, de pigments qui ont été fabriqués, exportés ou importés durant l'année civile ainsi que la concentration moyenne annuelle et la concentration maximale en BPC de ces pigments, exprimée en mg/kg;

d) les nom, adresses municipale et postal et numéro de téléphone de la personne de qui proviennent les pigments, dans le cas où ils sont importés, ou à qui ils sont expédiés, dans le cas où ils sont exportés;

e) une attestation, datée et signée par elle ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Solid products containing PCBs

36. The person who manufactures solid products containing PCBs in accordance with section 13 shall prepare a report that is current to December 31 in each calendar year in which the person manufactures the products and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the person and of any person authorized to act on that person's behalf;

(*b*) the quantity of solid products manufactured in that calendar year, expressed in kilograms, and the maximum concentration and average concentration of PCBs in the solid products, expressed in mg/kg, for that calendar year;

(*c*) the name, telephone number and civic and mailing addresses of the person to whom the manufacturer sells the products; and

(*d*) a certification that the information is accurate and complete and that is dated and signed by the person or by a person authorized to act on their behalf.

Produits solides qui contiennent des BPC

36. La personne qui fabrique, conformément à l'article 13, des produits solides qui contiennent des BPC est tenue de préparer un rapport, au 31 décembre de chaque année civile durant laquelle elle les fabrique, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) la quantité, exprimée en kilogrammes, de produits qui ont été fabriqués durant l'année civile ainsi que la concentration moyenne et la concentration maximale en BPC de ces produits, exprimée en mg/kg, pour cette année civile;

c) les nom, adresse municipale et postale et numéro de téléphone de la personne à qui elle a vendu les produits;

d) une attestation, datée et signée par elle ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Stored PCBs or products — PCB concentration of 50 mg/kg or more

37. The person who owns and stores PCBs or products containing PCBs in a concentration of 50 mg/kg or more, other than the equipment and liquids referred to in section 33, shall prepare a report that is current to December 31 in each calendar year in which the person stores the PCBs or products at their PCB storage site and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the owner and of any person authorized to act on the owner's behalf;

(*b*) the civic addresses of the PCB storage sites where the PCBs or products are located, or if there is no civic address, their location using the owner's site identification system;

(*c*) the quantity of liquids containing PCBs in the products, expressed in litres, and the quantity of solids containing PCBs in the products, expressed in kilograms, and the concentration of PCBs in the liquids and the solids, expressed in mg/kg

(i) that are stored on December 31 at the person's PCB storage site,

(ii) that are sent, in that calendar year, to an authorized facility that is a transfer site,

(iii) that are sent, in that calendar year, to an authorized facility that is authorized to destroy them, or

(iv) that are destroyed in that calendar year; and

(*d*) a certification that the information is accurate and complete and that is dated and signed by the owner of the PCBs or products containing PCBs or by a person authorized to act on the owner's behalf.

BPC ou produits stockés — concentration de BPC de 50 mg/kg ou plus

37. Le propriétaire de BPC ou de produits qui en contiennent en une concentration égale ou supérieure à 50 mg/kg, autres que les pièces d'équipement ou les liquides visés à l'article 33, qui les stocke à son dépôt de BPC est tenu de préparer un rapport, au 31 décembre de chaque année civile durant laquelle il les stocke ainsi, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) l'adresse municipale des dépôts où sont stockés les BPC et les produits ou, à défaut, l'endroit où ils se trouvent d'après le système d'identification de site du propriétaire;

c) la quantité de liquides qui contiennent des BPC dans les produits, exprimée en litres, la quantité de solides qui contiennent des BPC dans les produits, exprimée en kilogrammes, et la concentration de BPC dans les liquides ou les solides, exprimée en mg/kg :

(i) stockés à son dépôt de BPC le 31 décembre,

(ii) expédiés, au cours de l'année civile, à une installation agréée qui est un centre de transfert,

(iii) expédiés, au cours de l'année civile, à une installation agréée qui est autorisée à les détruire,

(iv) détruits au cours de l'année civile,

d) une attestation, datée et signée par lui ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Stored PCBs or products — transfer site or destruction facility

38. The owner of an authorized facility that is a transfer site or that is authorized to destroy PCBs or products containing PCBs and who stores them at their PCB storage site, other than the owner referred to in section 37, shall prepare a report that is current to December 31 in each calendar year and that contains the following information:

(*a*) the name, civic and mailing addresses, telephone number, fax number, if any, and e-mail address, if any, of the owner and of any person authorized to act on the owner's behalf;

(*b*) the civic addresses of the sites where the PCBs or products containing PCBs are stored, or if there is no civic address, the location of the sites using the owner's site identification system;

(*c*) the quantity of liquids containing PCBs in the products, expressed in litres, or the quantity of solids containing PCBs in the products, expressed in kilograms, and the concentration of the PCBs in the liquids and the solids, expressed in mg/kg

(i) that are stored on December 31 at the owner's PCB storage site,

(ii) that are sent, in that calendar year, to an authorized facility that is a transfer site,

(iii) that are sent, in that calendar year, to an authorized facility that is authorized to destroy them, or

(iv) that are destroyed in that calendar year; and

(*d*) a certification that the information is accurate and complete and that is dated and signed by the owner of the authorized facility or by a person authorized to act on the owner's behalf.

BPC ou produits stockés — Centre de transfert ou de destruction

38. Le propriétaire d'une installation agréée qui est un centre de transfert ou qui est autorisée à détruire des BPC et des produits qui en contiennent, autre que le propriétaire visé à l'article 37, et qui les stocke à son dépôt de BPC est tenu de préparer un rapport, au 31 décembre de chaque année civile durant laquelle il les transforme ou les détruit, comportant les renseignements suivants :

a) ses nom, adresses municipale et postale, numéro de téléphone et, le cas échéant, numéro de télécopieur et adresse électronique, ainsi que ceux de toute personne autorisée à agir en son nom;

b) l'adresse municipale des dépôts où sont stockés les BPC et les produits ou, à défaut, l'endroit où ils se trouvent d'après le système d'identification de site du propriétaire;

c) la quantité de liquides qui contiennent des BPC dans les produits, exprimée en litres, la quantité de solides qui contiennent des BPC dans les produits, exprimée en kilogrammes, et la concentration de BPC dans les liquides ou les solides, exprimée en mg/kg :

(i) stockés à son dépôt de BPC le 31 décembre,

(ii) expédiés, au cours de l'année civile, à une installation agréée qui est un centre de transfert,

(iii) expédiés, au cours de l'année civile, à une installation agréée qui est autorisée à les détruire,

(iv) détruits au cours de l'année civile,

d) une attestation, datée et signée par lui ou par toute personne autorisée à agir en son nom, portant que les renseignements sont complets et exacts.

Date of submission of report

39. (1) The person who is required to prepare a report in accordance with subsection 33(1) or (2) and with any of sections 34 to 38 shall submit it to the Minister on or before March 31 of the year following the calendar year for which the report is made.

Date de présentation des rapports

39. (1) La personne qui est tenue de préparer tout rapport visé aux paragraphes 33(1) ou (2) ou à l'un des articles 34 à 38 le présente au ministre au plus tard le 31 mars de l'année civile qui suit celle pour laquelle il est établi.

Report made under subsection 33(3)

(2) The person who is required to prepare a report in accordance with subsection 33(3) shall submit it to the Minister

(*a*) on or before March 31, 2010 for reports that are current to December 31 of the year that these Regulations come into force up to the year 2009;

(*b*) on or before March 31, 2014 for reports that are current to December 31 of each of the years 2010 to 2013;

(*c*) on or before March 31, 2018 for reports that are current to December 31 of each of the years 2014 to 2017;

(*d*) on or before March 31, 2022 for reports that are current to December 31 of each of the years 2018 to 2021;

(*e*) on or before March 31, 2026 for reports that are current to December 31 of each of the years 2022 to 2025;

Rapport visé au paragraphe 33(3)

(2) Celle qui est tenue de préparer le rapport visé au paragraphe 33(3) le présente au ministre :

a) au plus tard le 31 mars 2010, s'il porte sur toute année civile suivant l'entrée en vigueur du présent règlement jusqu'à l'année 2009;

b) au plus tard le 31 mars 2014, s'il porte sur l'une ou l'autre des années 2010 à 2013;

c) au plus tard le 31 mars 2018, s'il porte l'une ou l'autre des années 2014 à 2017;

d) au plus tard le 31 mars 2022, s'il porte sur l'une ou l'autre des années 2018 à 2021;

e) au plus tard le 31 mars 2026, s'il porte sur l'une ou l'autre des années 2022 à 2025;

f) au plus tard le 31 mars 2027, s'il porte sur l'année 2026;

g) au plus tard le 31 mars 2030, s'il porte sur l'une ou l'autre des années 2027 à 2029.

(*f*) on or before March 31, 2027 for reports that are current to December 31 of the year 2026; and

(*g*) on or before March 31, 2030 for reports that are current to December 31 of each of the years 2027 to 2029.

Release into the environment

40. (1) For the purposes of paragraph 95(1)(*a*) of the Act, where there occurs or is a likelihood of a release into the environment of PCBs in contravention of section 5, the person who is designated to be provided with a written report is the Manager of Inspection Program, Environmental Enforcement Division, Enforcement Branch of the Department of the Environment in the region where the release occurs or is likely to occur.

Rejets dans l'environnement

40. (1) Pour l'application de l'alinéa 95(1)(*a*) de la Loi, en cas de rejet dans l'environnement — effectif ou probable — de BPC en violation de l'article 5, la personne désignée pour recevoir le rapport écrit est le Gestionnaire du programme d'inspection, Direction de l'application de la loi en environnement, Direction générale de l'application de la loi du ministère de l'Environnement, dans la région où a lieu le rejet — effectif ou probable.

Contents

(2) The report shall include the following information:

(*a*) the name, civic and mailing addresses and telephone number of the person who owns or has the charge, management or control of the PCBs that are released into the environment;

(*b*) the date, time and location of the release;

(*c*) a description of the source of the release; and

(*d*) the quantity of liquids containing PCBs released, expressed in litres, the quantity of solids containing PCBs released, expressed in kilograms, and the concentration of PCBs in the liquids and the solids that are released, expressed in mg/kg.

Contenu

(2) Le rapport comporte les renseignements suivants :

a) les nom, adresses municipale et postale et numéro de téléphone de la personne qui a toute autorité sur les BPC qui ont été rejetés dans l'environnement ou qui en est propriétaire;

b) les date, heure et lieu du rejet;

c) une description de la source du rejet;

d) la quantité de liquides qui contiennent des BPC rejetés, exprimée en litres, la quantité de solides qui contiennent des BPC rejetés, exprimée kilogrammes, et la concentration de BPC dans les liquides ou les solides rejetés, exprimée en mg/kg.

Retention

41. Any person who is required to submit a report under these Regulations shall keep a copy of the report at their principal place of business in Canada for at least five years after the day on which the report is submitted.

Conservation

41. Toute personne qui est tenue de présenter un rapport en application du présent règlement en conserve une copie à son établissement principal au Canada pendant au moins cinq ans après la date de sa présentation.

Method of submission

42. Each report referred to in sections 33 to 38 shall be submitted electronically in the format provided by the Department of the Environment, but the report shall be submitted in writing if

(*a*) no such format is provided; or

(*b*) it is, owing to circumstances beyond the control of the person required to submit the report, impracticable to submit the report electronically in the format provided.

Méthode de présentation

42. Les rapports visés aux articles 33 à 38 sont présentés sous forme électronique selon le modèle établi par le ministère de l'Environnement. Ils sont toutefois présentés par écrit dans les cas suivants :

a) aucun modèle n'a été établi par le ministère;

b) il est pratiquement impossible, pour des raisons indépendantes de la volonté de la personne tenue de les présenter, de le faire sous forme électronique selon le modèle établi.

RECORDS

DOCUMENTS ET REGISTRES

Records for permitted activities

43. The following persons shall maintain records that demonstrate that they manufacture, process, use, sell, offer for sale, store, import or export PCBs or products containing PCBs in accordance with the Act and these Regulations:

(*a*) the owner of PCBs or products containing PCBs;

(*b*) the person who is engaged in any of these activities; and

(*c*) the owner or operator of a PCB storage site.

Documents concernant les activités permises

43. Les personnes ci-après conservent les documents établissant que des BPC ou des produits qui en contiennent ont été fabriqués, transformés, utilisés, mis en vente, vendus, stockés, importés ou exportés conformément à la Loi et au présent règlement :

a) le propriétaire des BPC ou des produits;

b) la personne qui exerce l'activité;

c) le propriétaire ou l'exploitant du dépôt de BPC.

Inspection record

44. (1) The owner or operator of a PCB storage site shall maintain a record of all inspections conducted at the PCB storage site under paragraph 27(*a*)

(*a*) listing all items that are inspected;

(*b*) describing any deficiency found;

Registres d'inspections

44. (1) Le propriétaire ou l'exploitant d'un dépôt de BPC tient un registre de toutes les inspections effectuées au dépôt de BPC en application de l'alinéa 27*a*), lequel fait état :

a) de tous les points inspectés;

(*c*) setting out the measures taken to remedy the deficiency; and

(*d*) specifying the dates of the inspections and the names of the inspectors.

Owner of equipment — extension

(2) The owner of equipment for which an extension of the end-of-use date is applied under section 17 shall maintain a record of all inspections conducted on the equipment that contains the information set out in paragraphs (1)(*a*) to (*d*).

Retention of records

45. The person who is required to maintain a record under sections 43 and 44 shall retain it at their principal place of business in Canada or at the place where they conduct the activity for at least five years

(*a*) after the destruction of the PCBs or the products containing PCBs that are the subject of the record, in the case of the owner of PCBs or products containing PCBs or the owner or operator of the PCB storage site where the PCBs or products containing PCBs are stored; or

(*b*) after the completion of an activity referred to in section 43, in the case of the person who is engaged in that activity.

PART 5

REPEALS AND COMING INTO FORCE

REPEALS

Repeal

46. The *Chlorobiphenyls Regulations*[1] are repealed.

Repeal

47. The *Storage of PCB Material Regulations*[2] are repealed.

COMING INTO FORCE

Coming into force

48. These Regulations come into force on the day on which they are registered.

b) de toutes les lacunes relevées;

c) des mesures à prendre pour y remédier;

d) de la date de l'inspection et du nom de l'inspecteur.

Propriétaire d'une pièce d'équipement — prolongation

(2) Le propriétaire d'une pièce d'équipement dont l'utilisation fait l'objet d'une prolongation en vertu de l'article 17 tient un registre de toutes les inspections de la pièce d'équipement qui ont été effectuées, lequel fait état des renseignements prévus aux alinéas (1)*a*) à *d*).

Conservation des dossiers

45. Toute personne qui est tenue de conserver des documents ou de tenir un registre en application des articles 43 et 44 respectivement les conserve à son établissement principal au Canada ou à l'établissement où l'activité est exercée pendant au moins cinq ans après :

a) dans le cas du propriétaire de BPC ou de produits qui en contiennent ou du propriétaire ou de l'exploitant d'un dépôt de BPC où sont stockés des BPC ou des produits qui en contiennent, la date de destruction des BPC ou des produits qui en contiennent visés par le document ou le registre;

b) dans le cas de la personne qui exerce une activité visée à l'article 43, la date de la fin de l'activité.

PARTIE 5

ABROGATIONS ET ENTRÉE EN VIGUEUR

ABROGATION

Abrogation

46. Le *Règlement sur les biphényles chlorés*[1] est abrogé.

Abrogation

47. Le *Règlement sur le stockage des matériels contenant des BPC*[2] est abrogé.

Entrée en vigueur

Entrée en vigueur

48. Le présent règlement entre en vigueur à la date de son enregistrement.

[1] SOR/91-152
[2] SOR/92-507; SOR/2000-102, s. 15

[1] DORS/91-152
[2] DORS/92-507; DORS/2000-102, a. 15