

ENVIRONMENTAL GUIDELINE FOR Waste Paint



GUIDELINE: MANGEMENT OF WASTE PAINT

AS AMENDED BY:

USE OF GUIDELINE

A guideline is not law and is therefore not enforceable. It does however, assist an inspector to determine what action(s) may be required of him or her. Paragraph 22(c) of the *Environmental Protection Act* allows the Minister to "develop, co-ordinate, and administer" guidelines. The Act [subsection 5(1)] makes it an offence to discharge a contaminant into the environment, subject to some exceptions [subsection 5(3)]. When a discharge occurs and it is inconsistent with the guidelines, the discharge is considered an unacceptable risk. The inspector may then consider issuing an order or laying an information.

A guideline allows for some leniency in applying the law. A court would probably be inclined to consider the application of a guideline favorably because the public is aware of the standards they are expected to meet.

This Consolidation is not Law.
It is prepared by Environmental Protection Service,
Department of Sustainable Development
Government of the Nunavut

Guideline for the Management of Waste Paint

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GUIDELINE FOR THE MANAGEMENT OF WASTE PAINT

1 Introduction

This guideline provides general information on proper management of waste paint. Waste paint is a contaminant under the *Environmental Protection Act* (EPA) and must be managed as a hazardous waste.

Paints are used to protect a surface from corrosion, oxidation, or other type of deterioration and to provide decorative effects. Alkyd paints and specialty coatings contain solvents and other chemicals that are corrosive, flammable, reactive and toxic. Recently the use of lead in modern household paint has been restricted by federal legislation. For the management of lead paint removed from steel or other structures, refer to the Guideline for the Management of Waste Lead.

This guideline is specific to the management of waste paint and should be read in conjunction with the Guideline for the General Management of Hazardous Waste in Nunavut (referred to as the General Guideline). Section 2.2 of the Act gives the Minister of Sustainable Development the authority to develop, coordinate and administer these guidelines.

1.1 Definitions

<i>Alkyd paint</i>	Oil based paint.
<i>Generator</i>	The owner or person in charge, management or control of a hazardous waste at the time it was generated, or a facility that generates hazardous waste.
<i>Latex paint</i>	Water based paint.
<i>Paint</i>	A uniformly dispersed mixture having a viscosity ranging from a thin liquid to a semi-solid paste consisting of: (1) drying oil, synthetic resin or binder; (2) a solvent or thinner; (3) and organic or inorganic pigment.
<i>Specialty coatings</i>	A group of modern chemical compounds designed for protecting materials under exacting conditions such as chemical tank linings, concrete coating at sewage treatment plants and other industrial applications. Examples include: acrylic, asphaltic, epoxy, flexible ceramic, phenolic, polyester, polyurethane, vinyl ester.
<i>Transport authority</i>	<p>The regulations controlling the management of hazardous waste under that mode of transport. These include:</p> <p>Road and rail - <i>Transportation of Dangerous Goods Act</i> (TDGA) and <i>Regulations</i> (TDGR)</p>

Air - International Civil Aviation Organization Technical Instructions (ICAO)
Marine - International Maritime Dangerous Goods Code (IMDG).

Waste paint

Alkyd, latex or specialty coatings which are no longer used for its original purpose and is intended for storage, recycling or disposal but does not include dried paint or dried paint chips.

1.2 Characteristics

Alkyd paints contain oil and solvents which are toxic and flammable. Cleaning of painting equipment requires the use of solvents which have the same hazardous properties as alkyd paint. Solvent management procedures are provided in the Guideline for the Management of Waste Solvents.

Latex paints are nonflammable and offer ease of application. They generally do not have a disagreeable odor and can be used on both interior and exterior surfaces. Paint brushes and other tools are easily cleaned up with soap and water. Latex paint wastes are not hazardous wastes and can be disposed into most sewage treatment systems or landfills. Depending on the location, municipal approvals may be required.

Specialty paints and coatings are gaining greater acceptance and becoming common place in the paint industry. These new generation paints are derived from chemical compositions that can withstand extreme environment and temperature conditions. Many specialty coatings are a two-component mix; a base and a hardener. Epoxy coatings are one example. The hazard characteristics (TDGR Classification) of specialty coatings are identified on the Material Safety Data Sheets (MSDS) provided by the manufacturer. These should be reviewed prior to use of the product.

1.3 Potential Effects

The oils and solvents in alkyd paints and specialty coatings are toxic. If released into the environment they have the potential to contaminate drinking water supplies, groundwater and can be toxic to plants and aquatic animals. Water contaminated by paints and the solvents used to clean painting tools can also contaminate drinking water supplies and other areas of the environment.

Vapors released from alkyd paint are toxic to humans if inhaled over a long period of time in high enough concentrations. These vapors have the potential to start a fire if exposed to a spark or flame and support a fire once started because they are flammable.

Specialty coatings, especially two-component systems, may also be toxic, flammable, reactive or corrosive. Handling and safety procedures should be in accordance with the MSDS.

2 Roles and Responsibilities

2.1 Environmental Protection Service

The Environmental Protection Service of the Department of Sustainable Development is the Government of the Nunavut's (GN) agency responsible for initiatives which control the discharge of contaminants and their impact on the environment. EPS is responsible for ensuring that environmentally acceptable management procedures, emission levels and disposal methods are maintained. EPS programs are applied primarily to Commissioner's Land, lands administered by municipal governments or GN undertakings. Legislative authority is provided by the *Environmental Protection Act* and *Pesticide Act*. Contact EPS for a listing of relevant regulations and guidelines.

2.2 Generators

The responsibility for proper waste management rests with the generator and should be considered as part of the cost of doing business.

Every person who generates waste paint is responsible for the proper management of these substances. Waste paint must be safely handled, packaged, stored, transported, treated and/or disposed in accordance with this guideline and all applicable Acts and regulations.

3 Waste Management

Minimizing or avoiding the creation of pollutants and wastes can be more effective in protecting the environment than treating them, or cleaning them up after they have been created.

Canadian Council of Ministers of the Environment

3.1 Pollution Prevention

Pollution prevention methods reduce or eliminate the generation of waste. Pollution control practices treat waste after it has been generated. Pollution prevention strategies for paint include the following:

Reduce

- Purchase the correct amount of paint for the size of the job to minimize leftover excess paint.
- Train staff in proper painting techniques to improve painting efficiencies.
- Use water-based or latex paints instead of more toxic alkyd paints.
- Use powder coats instead of liquid paints where applicable.

Recycle

- Mix compatible paint leftovers as a utility blend.
- Make excess paints available for use by others.
- Bulk compatible paints in appropriate containers and transport to approved paint recyclers.
- Make an agreement with your supplier/distributor of paint to return the unused paint.

3.2 Storage

Waste storage is not a long term solution.

Store waste paint according to the following:

- Use original containers where possible, containers manufactured for the purpose or bulk paint into 16 gauge or lower steel or plastic drums.
- Use containers that are sound, sealable and not damaged or leaking.
- Label containers according to the requirements of the Work Site Hazardous Materials Information System (WHMIS) of the *Safety Act*, or the relevant Transport Authority if transport to a recycling or disposal facility is planned. (see Section 3.3 Transportation)
- Keep the containers sealed or closed at all times.
- Containers must be protected from the weather and physical damage.
- Train personnel in the safe use, storage and shipping procedures for waste paint. Only trained persons should have access to the storage area.

The storage of waste paint is only acceptable as an interim measure to permit time for the collection of sufficient volumes for cost effective transport to a recycling or disposal facility.

Storage of waste paint in quantities greater than 1000 kilograms for a period greater than 180 days requires the site to be registered as a hazardous waste storage facility. Consult the General Guideline or contact EPS for application procedures.

3.3 Transportation

This section applies to all paints and coatings classified as dangerous goods under TDGR, specifically alkyd paints and specialty coatings. Latex paints are not included in this section.

The transportation of waste paint to an approved recycling, treatment, disposal or management facility requires proper classification, packaging, labeling and manifesting as required by the transport authority (air, road, rail, marine). Specific requirements for waste generators and carriers are detailed in the General Guideline.

For road transportation purposes, waste paint can be classified in the following ways, depending on the type of paint.

Shipping Name:

Waste Paint (or Waste Paint Related Materials)

Classification: Class 3

P.I.N.: UN1263

Packaging Group: II or III

Special Provision 108

Shipping Name: **Waste Paint (or Waste Paint Related Materials)**
Classification: Class 8
P.I.N.: UN3066
Packaging Group: II or III
Special Provision 108

Further consultation with the transport authority is recommended.

Generator numbers, waste manifests and registered hazardous waste carrier lists are available from the Environmental Protection Service.

3.4 Disposal

Regardless of the type of paint, using it for the intended purpose is the preferred management method.

Domestic waste paint and specialty coatings may be accepted for exchange at community "Household Hazardous Waste Day" locations operated by the municipality. The paint industry is currently expanding its product stewardship program and is accepting waste paints for recycling into new paint products. Approved paint recyclers are available by contacting the Canadian Paint and Coatings Association listed at the end of this guideline.

The best disposal option for waste alkyd and specialty paint is to bulk it in good quality 205 litre steel or plastic drums, in a condition suitable for shipping. List it with a waste exchange or send it to a registered recycling or disposal facility. Contacts for recycling and disposal companies are available by contacting the waste management associations listed in Appendix II of the General Guideline.

Less than 5 litres of alkyd paint can be allowed to dry fully and taken to the landfill. Fully dried out quantities of latex paints may be disposed of at a landfill or placed in the garbage for collection.

Paint can be air dried by spreading it out on a board, plastic sheet or other flat surface until all the liquid has evaporated. Dry paint outdoors in a well ventilated area. For safety purposes open flames must not be present. Prevent children, pets or wildlife from coming into contact with the paint.

Management of specialty coatings is determined by the hazard characteristics of each product as identified in the MSDS. For two-component products, special neutralizing agents or procedures may be required. Due to the chemical nature of specialty coatings, the manufacturer or a waste management company should be consulted for the disposal options. EPS may approve the method, subject to conditions.

Consideration will be given to proposals for alternate management methods that provide a level of environmental protection equivalent to complying with this guideline. The EPS may approve the method, subject to conditions.

4 Conclusion

This guideline presents a brief introduction into the management of waste paint. It is intended as a source of basic information and should be read in conjunction with the Guideline for the General Management of Hazardous Waste in Nunavut.

For more information contact:

- 1) Canadian Paint & Coatings Association
9900 Kavendish Blvd. Suite 103
St. Laurent PQ H4M 2V2
Phone: (514) 745-2611; Fax: (514) 745-2031
- 2) Environmental Protection Service
Department of Sustainable Development
P.O. Box 1000, Station 1195
Iqaluit, Nunavut, X0A 0H0
Phone: (867) 975-5900; Fax: (867) 975-5990
- 3) Motor Vehicle Division
Department of Community Government and Transportation
P.O. Box 1000, Station 775
Iqaluit, Nunavut, X0A 0H0
Phone: (867) 975-5380 Fax: (867) 975-5385
- 4) Prevention Services Division
Workers' Compensation Board
P.O. Box 669
Iqaluit, Nunavut, X0A 0H0
Phone: (867) 979-8500; Fax: (867) 979-8501
(867) 873-7468 (accident report); Fax: (867) 873-0262
1-800-661-0792
- 5) Steel Structures Painting Council
40 - 24th Street
Pittsburgh, PA 15222
United States of America
Phone: (412) 281-2331; Fax: (867) 281-9992

If you would like to be placed on a mailing list to receive guideline amendments or for public consultation on Environmental Protection Service legislation please fill this out and mail or fax to:

Environmental Protection Service
Department of Sustainable Development
P.O. Box 1000, Station 1195
Iqaluit, Nunavut, X0A 0H0
Fax: (867) 975-5990

Users of this guide are encouraged to report any errors, misspellings, etc. contained within, to EPS at the above address.

Mailing List for Environmental Protection Service Information

Name: _____

Title: _____

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