MANITOBA CONSERVATION PUBLIC CONSULTATION DRAFT
Proposed *Thermal Treatment Systems Regulation*
under *The Environment Act*

Proposed regulation (will replace the *Incinerators Regulation*, M.R. 81/88 R):

Definitions

1 The following definitions apply in this regulation.

"Act" means *The Environment Act*.

"bulky metallic waste" includes derelict vehicles, farm machinery and large appliances that are capable of being salvaged for recycling or reuse.

"class A thermal treatment system" means a thermal treatment system that processes less than 50 tonnes of waste per month and does not process plastic or hazardous waste.

"class B thermal treatment system" means a thermal treatment system that processes 50 tonnes or more of waste per month or that processes any amount of plastic waste.

"class C thermal treatment system" means a thermal treatment system that processes hazardous waste but is not required by *The Dangerous Goods Handling and Transportation Act* to obtain a licence.

"contractor" means a person who provides a service in respect of a thermal treatment system, such as supervising or taking part in the system's construction.

"dioxins" means polychlorinated dibenzo-p-dioxins.

"domestic incinerator" means an incinerator used for a single family residence or for a two-family residence in duplex or double house form, or for multiple-dwelling units in which the incinerator serves fewer than three apartments.

"emission" means a product of thermal treatment that is conveyed to the atmosphere.

"flue-fed incinerator" means an incinerator provided with a flue which serves as a charging chute in addition to conducting the products of combustion to the atmosphere.

"furans" means polychlorinated dibenzo-furans.

"gasification" means a heat process used to convert a solid or liquid into a gas.

"gasifier" means a system or piece of equipment designed to convert a solid or liquid into a gas through gasification.

"hazardous waste" means a substance that is designated as a hazardous waste by a regulation made under *The Dangerous Goods Handling and Transportation Act*.

"incinerator" means a device, mechanism or structure constructed primarily to thermally treat, through combustion or pyrolysis, a waste for the purpose of reducing its volume, destroying a hazardous chemical present in it or destroying pathogens present in it.

"opacity" means the degree to which emissions reduce the transmission of light and obscure the view of an object in the background.

"particulate matter" means finely divided liquid or solid matter, but does not include water droplets.

"professional engineer" means a professional engineer as defined in section 1 of *The Engineering and Geoscientific Professionals Act*.

"pyrolysis" means a heat process used to convert a compound into one or more products in the absence of oxygen.

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"pyrolysis unit" means a system or piece of equipment designed to convert a solid or liquid into a gas, solid or liquid in the absence of oxygen through pyrolysis.

"thermal treatment system" means a device used for the process of reducing waste or generating heat through oxidation or reduction reactions, or used for both, and from which the products of combustion are conveyed to the atmosphere, including, but not limited to, an incinerator, gasifier or pyrolysis unit, but not including a boiler, furnace or other combustion-based device that generates heat for use in residential buildings.

Permit for class A thermal treatment system

2(1) A person must not

(a) construct on site or install;

(b) operate; or

(c) modify;

a class A thermal treatment system unless the director has issued a permit authorizing the activity under this section.

2(2) An application for a permit must be made by an applicant to the director on a form approved by the director and be accompanied by the information required on the application form and any additional information that the director may require.

2(3) Upon receipt of a permit application under subsection (2), the director, after reviewing the information, may

(a) require the applicant to provide additional information;

(b) issue the permit, with or without terms and conditions, if he or she is satisfied that

(i) the proposed construction, installation, modification, or operation of the thermal treatment system complies with the requirements of this regulation, and

(ii) the proposed, existing or modified thermal treatment system is capable of operating within the emission limits set out in the Schedule: or

(c) refuse to issue a permit if he or she

(i) believes that the thermal treatment system may cause a significant adverse effect,

(ii) is not satisfied that the thermal treatment system meets the requirements of clause (b), or

(iii) determines that the thermal treatment system is a class B or C thermal treatment system.

2(4) The director may suspend or cancel a permit if any of the following occurs:

(a) a term or condition of the permit is found to have been contravened;

(b) a provision of the Act or this regulation is found to have been contravened in relation to the thermal treatment system;

(c) there is a change of circumstances in relation to the system or its site or the director receives new information about the site or the intended operations of the thermal treatment system, as the result of which the director believes that the thermal treatment system or an activity in relation to it no longer qualifies for a permit under this regulation.

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2(5) If a person's permit is suspended or cancelled under subsection (4), he or she must file a new or an amended proposal under subsection (2) if he or she wishes to continue the activity for which the permit was issued.

2(6) A person to whom a permit is issued must comply with any terms and conditions contained in the permit.

2(7) A professional engineer, contractor, or other person who performs work for which a permit has been issued under this section must comply with any terms and conditions contained in the permit.

Development licence for class B and C systems
3 For greater certainty, a person may not construct, alter, operate or set into operation class B or C thermal treatment system unless a licence is issued for the system under section 10, 11 or 12 of the Act.

Emission standards
4 A person must not operate a thermal treatment system of any class that emits any of the following:

(a) pollutants in excess of the emission limits as set out in the Schedule;

(b) exhaust the opacity of which is

(i) 40% or more at any time, or

(ii) 20% or more for a period exceeding four minutes in any hour.

Prohibited incinerators
5 A person must not construct, install, or operate

(a) a domestic incinerator; or

(b) a flue-fed incinerator.

Certain information must be displayed
6 The holder of a permit to operate a thermal treatment system must ensure that the following information is displayed in a prominent location near the system:

(a) the systems' rated capacity;

(b) the type of waste material for which the system is designed;

(c) detailed operating instructions for the system.

Sampling ports required
7 The holder of a permit to operate a thermal treatment system must ensure that sampling ports are located in the stack or breeching of the system in a location acceptable to the director.

Measurement of emissions
8 The method for measurement of emissions from thermal treatment systems must be as approved by the director.

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Transitional provision

9 Until January 1, 2012, this regulation does not apply in respect of a thermal treatment system if it meets all of the following criteria:

(a) the system exists when this regulation comes into force and, if at that time it is required to be registered under the *Incinerators Regulation*, Manitoba Regulation 91/88 R, it is registered under an active registration;

(b) despite the repeal of that regulation, the system is operated in compliance with the requirements of that regulation after this regulation comes into force.

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SCHEDULE
(Section 2)

Emission quality criteria

1(1) The following definitions apply in this Schedule.

"reference cubic metre" means the volume of a dry gas at 25˚C, 101.3 kPa and 11% oxygen.

"Rm^3" means reference cubic metre.

1(2) The pollution emission limits for a thermal treatment system of any class are as set out in the following table:

Pollutant	Emission Limit
Arsenic	1 µg/Rm^3
Cadmium	100 µg/Rm^3
Carbon monoxide	57 mg/Rm^3
Chlorobenzene	1 µg/Rm^3
Chlorophenol	1 µg/Rm^3
Chromium	10 µg/Rm^3
Dioxins and furans	80 pg/Rm^3
Hydrogen chloride	75 mg/Rm^3
Lead	50 µg/Rm^3
Mercury	20 µg/Rm^3
Oxides of nitrogen	400 mg/Rm^3
Particulate matter	50 mg/Rm^3
Polyaromatic hydrocarbons	5 µg/Rm^3
Polychlorinated biphenyls	1 µg/Rm^3
Sulphur dioxide	200 mg/Rm^3