

**Guideline 97 – 03E**

---

**USED OIL  
COLLECTION DEPOT  
GUIDELINE**

***June 1997***

***Revised October 2004***

## **USED OIL COLLECTION DEPOT GUIDELINE**

### **INTRODUCTION**

In recent years greater emphasis has been placed on implementing proper methods for handling and reclaiming of used lubricating oil. Some past practices, such as road oiling, are no longer allowed. Used oil is, however, a commodity which can be recycled into new lubricants, or burned as an alternate fuel supply. Stewardship programs are being developed in several provinces, including Manitoba, to ensure that as much reclaimable used oil as possible is being collected and directed to proper end uses.

The first step in an oil collection system is to ensure that there are collection depots accessible both to the public and to small commercial generators. As with any program of this nature, it is important that one environmental problem is not simply replaced with another. The major environmental concerns associated with used oil collection facilities are soil or groundwater contamination caused by spillage of used oil and the contamination of the used oil by the introduction of other waste streams such as solvents, fuels, etc. Manitoba Conservation has developed this guideline, which describes the basic design and operating parameters for used oil collection depots, in order to minimize the occurrence of these sorts of situations within Manitoba's used oil handling system.

This guideline has been prepared primarily for depots used to collect small volumes of oil from domestic sources and commercial generators for shipment to permitted receivers and processing plants. The sections in bold print are considered to be mandatory provisions that must be complied with in order for the depot to be approved. The other information is intended to provide guidance to agencies which may be considering establishing a used oil collection depot. More specific details can be obtained by contacting one of the Manitoba Conservation offices listed on page 8.

### **DEFINITIONS**

- |                          |  |
|--------------------------|--|
| <i>Domestic Quantity</i> | A quantity of a material which is packaged and marketed for, and used by, an individual household. (As a general rule, a shipment of used oil not exceeding 30 litres and originating from a household will be considered to be domestic quantity. Larger shipments may need to be assessed on an individual basis.) |
| <i>Recycling</i>         | A process which converts a waste material into a usable product, but not including processes where the waste is destroyed in a combustion process or spread on land.   |
| <i>Used Oil</i>          | A petroleum or synthetic crankcase oil, engine oil, hydraulic fluid, transmission fluid, gear oil, heat transfer fluid or other fluid capable of use for lubricating purposes in machinery or equipment which, as a result of use, storage or handling can no longer be used for its original purpose.               |

## **APPLICATION FOR DEPOT APPROVAL**

Most used oils are currently classified as hazardous waste in Manitoba. Because of this classification, facilities that store or process waste oil are considered to be hazardous waste disposal facilities. Hazardous waste disposal facilities require an approval issued by Manitoba Conservation under the authority of *The Dangerous Goods Handling and Transportation Act*. **Applications for approval of used oil collection depots should be submitted to the regional office of Manitoba Conservation in the region where the depot will be located. The addresses of Manitoba Conservation's regional offices are listed on page 8.**

### Application Information

The application for approval must contain, as a minimum, the following information:

- Name, address, phone and fax numbers for the depot owner
- Name and address of land owner, if different than depot owner
- Location of the depot, including legal description
- Information on any previous environmental studies that have been done on the depot site
- Details of the equipment and layout of the depot, showing that the depot conforms to the applicable sections of this guideline
- Details of the operating procedures for the depot, including any special conditions for receiving used oil, training programs, record keeping procedures and any other information that demonstrates that the depot operation will conform with this guideline
- Information on the planned end use of the used oil collected at the depot, including names of carriers and receivers, if known at the time of application
- A plot plan of the depot showing all pertinent features

## **DESIGN CONSIDERATIONS**

### **SITE SELECTION**

Used oil collection depots should be located in areas where the design features described in this guideline can be effectively incorporated. The following features should be considered when selecting a site for a used oil depot:

- Vehicle access is required to allow unloading of containers directly into the containment area. Access is also required for tank vehicles to pump out the collected oil and to remove containers and filters
- Locations close to sensitive occupancies, such as hospitals, schools, etc., should be avoided
- The site must be properly zoned for the intended use (check with the local zoning or land use agency)
- The location of water wells, drainage systems, and environmentally sensitive areas should be noted so that appropriate protective measures can be instituted

Some preferred locations for used oil collection depots include waste disposal grounds, municipal works yards and enclosed commercial sites.

## STORAGE

### Used Oil

**Tanks used to store used oil must be designed specifically for that purpose.** The recommended tank design incorporates a secondary containment system which eliminates the need to construct a separate diked area. **Used oil tanks must also be equipped with overflow protection and an accessible means of emptying containers into the tank.** Underwriters Laboratories of Canada has published a standard for above ground used oil collection tanks:

ULC - S652 "Standard for Tank Assemblies for Collection of Used Oil"

Tanks constructed to meet this standard will display an appropriate ULC label. These tanks must be installed in accordance with the manufacturer's instructions.

### Containers and Filters

**Depots which will be accepting oil containers and used oil filters must ensure that suitable receptacles are provided for these items.** The receptacle should be constructed of metal and designed in such a way that it can contain any used oil which may drain from filters or containers. Consideration should also be given to sizing receptacles to suit the expected throughput of the depot and to ensuring that the contents can be removed safely and effectively. The use of 205 L drums for filter storage is recommended.

## CONTAINMENT

The design of the collection depot must include features that can adequately contain any spillage that may occur during handling or storage of the oil.

### Storage Tank

If a tank with integral secondary containment is used, a spill containment dike is not required. **Single walled tanks require a containment dike with a capacity of not less than 110% of the tank volume. The dike must be constructed of earth with a synthetic liner, or of concrete or metal. Tanks with a capacity of 5000 litres or greater must comply with applicable provisions of the Manitoba Conservation's regulation respecting the storage and handling of petroleum products. Tank installations must also comply with applicable provisions of the Manitoba Fire Code.**

### Loading/Unloading Areas

**A receiving area must be provided immediately adjacent to the storage tank for the placement of full containers being delivered to the depot. This area must be adequately sized and graded to ensure that any spillage that may occur during handling of the containers before or after transfer of the contents to the storage tank can be properly managed.** The surface of the containment area must be concrete or metal or another impermeable material acceptable to Manitoba Conservation. An earthen containment area without a synthetic liner is not acceptable.

The preferred depot design includes a concrete slab large enough to accommodate the storage tank, the container receiving area, plus receptacles for used containers and filters.

## ACCESS AND SIGNAGE

Used oil collection depots must include features to minimize the potential for unauthorized or unsupervised deliveries to the facility. Appropriate signage should also be posted identifying the site as a used oil collection depot.

### Fencing

**The storage tank, container and filter bins and the receiving area, must be surrounded by a firmly anchored fence with a minimum height of 1.8 metres designed to discourage unauthorized entry. The fenced area must be equipped with a lockable gate.**

**At locations where the depot is situated within a fenced waste disposal ground, or other restricted site, where access is not permitted when operating staff are not on site, an additional fence is not required around the depot site. In this case, however, the storage tank must be capable of being locked in a manner which can prevent unauthorized deliveries of used oil into the tank.**

### Signage

**Legible, weather-proof signs must be posted at the entrance to the depot identifying the area as a used oil collection facility. The sign must indicate the hours of operation, a contact number and a warning not to leave used oil products at the depot when an operator is not available to accept the delivery.** Instructions on how and where to deposit materials at the depot may also be included on the sign.

## OPERATING PROCEDURES

### RECEIVING USED OIL AT THE DEPOT

#### Acceptance Criteria, Volume

Depots are designed primarily for domestic quantities and small commercial consignments of used oil products, but they will occasionally receive shipments from commercial generators. Acceptance of large volumes of oil may overload the facility and restrict the accessibility to the general public. Depending on the operational capacity of the depot, restrictions on the type and quantity of materials that can be received may be necessary to ensure that the overall function of the facility is not hampered.

The depot operator should consider the need to establish criteria for maximum volumes of used oil that can be received from an individual generator. If such criteria are to be used, they should be clearly communicated to any affected generators.

#### Acceptance Criteria, Quality

It is very important to ensure that used oil received at a collection depot does not contain contaminants other than those resulting from the routine use of the oil. Even a small concentration of some contaminants can render an entire tank of used oil unfit for certain end uses. **Each container of used oil delivered to a depot must be visually examined before the contents are transferred to the collection tank. Oil which does not have the characteristic colour and viscosity of used lubricating oil should not be accepted until it has been confirmed that the material falls within the definition of used oil as outlined in this guideline.** In addition to the appearance of the oil, odours can also be an indicator of contamination. If a distinctive odour of gasoline or solvent is noticed when the container is opened, the oil should not be accepted until the exact nature of the material is confirmed.

### Registered Generators

Generators of used oil (other than domestic quantities) must be registered with Manitoba Conservation as hazardous waste generators. **Used oil collection depots are not allowed to receive used oil from unregistered generators, other than domestic “do-it-yourself” sources.** Hazardous waste generators are issued a registration number which consists of the prefix "MBG" followed by five digits. The depot supervisor should record the registration number for all non-domestic deliveries to the depot.

### Waste Manifests

**If the used oil collected at the depot is not being shipped to a recycling operation, the delivery to the depot must be made by a licensed hazardous waste carrier and the load must be accompanied by a hazardous waste manifest form.** The depot supervisor will be required to sign Part C of the manifest confirming receipt of the shipment.

## **SUPERVISION**

### Supervisor Responsibilities

**A trained supervisor must be on site at all times when the depot is open to receive used oil.** It is the responsibility of the supervisor to ensure that all shipments comply with the acceptance criteria and that the day to day operation of the depot is in accordance with the conditions of the Director’s Order or licence. The supervisor should be the only person who physically transfers or directly supervises the transfer of used oil to the collection tank. If the supervisor’s other duties require him/her to leave the depot area, the facility should be locked to prevent unauthorized deliveries.

### Training

**The depot owner must ensure that all persons who will be assigned duties as operators of the depot receive adequate training.** In the case of a depot functioning as part of a stewardship program, a training program may be available through the stewardship organization. As a minimum, the training should include the following features:

- explanation of the types of materials which can be received at the depot
- procedures for examining oil shipments in relation to the acceptance criteria
- maintaining a log book
- operating procedures for the collection tank and any associated equipment including tank unloading
- response procedures for spills and leaks
- handling of accumulated run-off water
- proper occupational safety and health procedures
- regulatory requirements, including Transportation of Dangerous Goods

## **HOUSEKEEPING**

### Disposal of Run-off Water

**Run-off or melt water which has accumulated in spill containment areas at the depot must be examined before it can be discharged.** Generally, discharge can occur if there is no visible layer of oil on the water. In some sensitive areas more specific discharge criteria may be applied and these will be included in the operating permit or licence for the facility. A standard

disposal procedure for accumulated oil and contaminated water should be documented and provided to the depot supervisor.

#### Spills and Leaks

**Any spillage that occurs during handling of materials at the site must be contained and cleaned up promptly. Appropriate clean-up materials must be available to the supervisor for this purpose.**

### **SHIPMENTS FROM DEPOT**

#### Taking Samples

**Prior to arranging for a load of used oil to be shipped from a collection depot, a representative sample of oil must be taken from the collection tank.** The sample should be held in storage until confirmation is received that the oil has been received and processed. The depot manager should make arrangements with a qualified laboratory for suitable sample containers and procedures for sample storage. Where analysis of the sample is required, it should be analyzed for the following parameters:

- solvent scan
- heavy metals
- total halogens
- PCB
- flash point

Samples must also be taken for analysis where requested by an Environment Officer.

#### Carriers

**If the used oil is not being shipped from the depot to a recycling facility in Manitoba, the oil must be transported by a licensed hazardous waste carrier.** The shipment must be accompanied by a waste manifest showing the depot manager as the consignor. In all cases, shipments of oil from the depot must comply with applicable parts of the Transportation of Dangerous Goods Regulations.

#### Receivers and End Uses

**The depot manager must ensure that a written agreement is in place with the carrier or receiver of the used oil shipped from the depot at all times during the operating life of the facility.** The agreement should state how and where the oil will ultimately be used. This agreement will be used to determine where the exemptions for waste destined for recycling will apply. A copy of this agreement must be available for inspection by an Environment Officer.

### **DEPOT CLOSURE**

**When a depot is to be permanently closed, a decommissioning plan must be prepared and submitted to Manitoba Conservation.** The plan should, as a minimum, address the following:

- soil and groundwater testing for residual contamination
- removal and final disposition of the collection tank and any associated equipment
- proposed future use of the site

**FOR ADDITIONAL INFORMATION,  
PLEASE CONTACT ONE OF THE FOLLOWING REGIONAL OFFICES**

**CENTRAL REGION**

123 Main Street, Suite 160  
Winnipeg MB R3C 1A5

Telephone: (204) 945-7100  
Facsimile: (204) 948-2338

**NORTHWEST REGION**

P.O. Box 2550, Provincial Bldg.  
The Pas MB R9A 1M4

Telephone: (204) 627-8248  
Facsimile: (204) 623-1773

**CENTRAL REGION**

75 – 7<sup>th</sup> Ave.  
Gimli MB R0C 1B9

Telephone: (204) 642-6091  
Facsimile: (204) 642-6108

**ENVIRONMENTAL SERVICES**

1007 Century Street  
Winnipeg MB R3H 0W4

Telephone: (204) 945-7084  
Facsimile: (204) 948-2420

**WESTERN REGION**

1129 Queens Ave.  
Brandon MB R7A 1L9

Telephone: (204) 726-6064  
Facsimile: (204) 726-6567

**EASTERN REGION**

Air Services, Provincial Highway #502  
Lac du Bonnet MB R0E 1A0

Telephone: (204) 345-1486  
Facsimile: (204) 345-1440

**NORTHEAST REGION**

59 Elizabeth Drive  
Thompson MB R8N 1X4

Telephone: (204) 677-6703  
Facsimile: (204) 677-6652

# USED OIL COLLECTION DEPOT

Hours of Operation

Monday to Friday

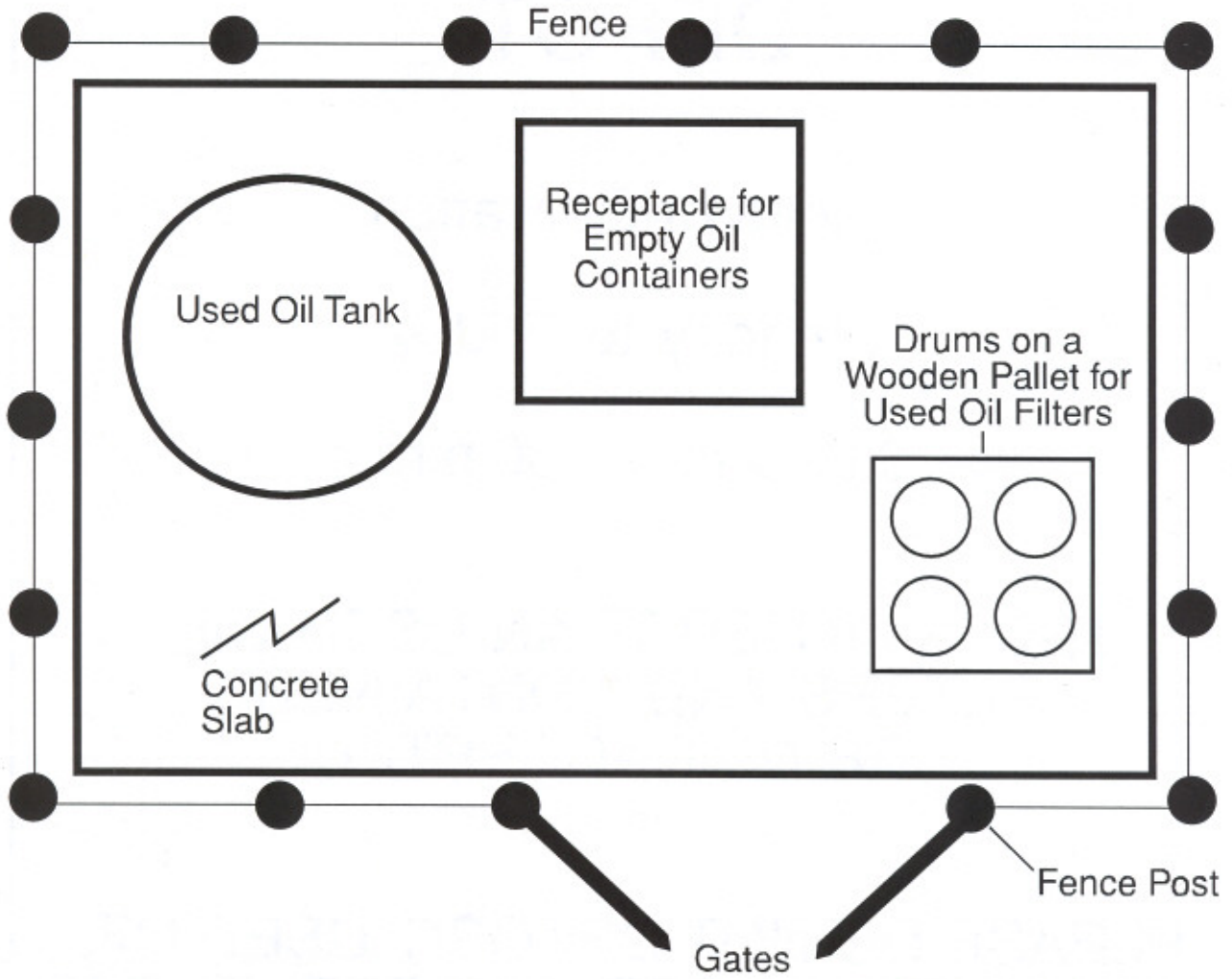
8:00 a.m. - 5:00 p.m.

ITEMS OTHER THAN USED OIL,  
FILTERS AND CONTAINERS  
ARE NOT ACCEPTED

PLEASE DO NOT DEPOSIT USED OIL  
PRODUCTS UNLESS AN OPERATOR IS  
AVAILABLE AT THE DEPOT

THIS DEPOT IS OPERATED BY \_\_\_\_\_  
PHONE NUMBER \_\_\_\_\_

**Typical Used Oil Collection Depot Signage**



**Preferred Used Oil Collection Depot Layout**