



MANAGEMENT OF USED OIL FILTERS

NORTH DAKOTA DEPARTMENT OF ENVIRONMENTAL QUALITY

DIVISION OF WASTE MANAGEMENT

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The Department encourages the recycling of used oil filters whenever possible and practical. Not only does this conserve resources, but it eliminates pollution of our environment from improper disposal.

What is a Used Oil Filter? A used oil filter is a filter that has been used to remove debris from the lubricating oil in a machine, normally an engine. It does not include fuel or water filters. Filters come in two main types: screw on canisters or paper inserts. Management for each type is similar, though paper inserts do not have some of the features of screw-on canisters.

Management Prior to Disposal or Recycling. Used oil filters are exempt from regulation as hazardous waste under the North Dakota Hazardous Waste Management Rules provided the used oil filters are properly drained before subsequent management. Some used oil filters, those that are manufactured of terneplate (a metal containing lead) commonly fail the toxicity characteristic test for lead.

To be considered exempt, the Department requires that used oil filters must be hot-drained for a minimum of 12 hours, at a temperature of 60°F or higher, using one of the following gravity hot-draining methods:

- Puncture the filter's anti-drain back valve or the filter dome end and hot-drain;
- Hot-drain and crush (crushers must be equipped with a drip pan or other device to contain all used oil drained during the crushing process);
- Dismantle and hot-drain (once dismantled, the paper filter element should be wrung to remove any residual used oil it contains); or
- Any other equivalent hot-draining method which removes used oil. Other methods that meet this requirement include centrifuging (spinning) and wringing. The Department has seen facilities that do a combination of the above methods to ensure recovery of the maximum amount of used oil possible.

Some studies have shown that filters that are tilted between 30 and 60 degrees from vertical will drain significantly more used oil than those drained in a vertical position. Some facilities have constructed drain pans with tilted pins to place filters on when draining.

Dispose or Recycle? The Department has been working with both landfills and scrap metal recyclers in an effort to reduce or eliminate used oil filters from landfill disposal.

Once the used oil is removed, recycle the scrap metal and used oil. Recycling is the recommended option for managing used oil filters. Some recyclers require that used oil filters be managed in a particular way in order to be acceptable scrap. The cleanest scrap comes from dismantled filters though this method requires some extra work on the generator's part. Other recyclers want only crushed filters. In order to find a willing recycler, you must be prepared to meet their requirements.

If a recycler cannot be found or if you have used paper filters, properly drained used oil filters may be disposed in a permitted municipal or industrial waste landfill contingent upon approval by the local landfill authority. Some landfills may not accept properly drained used oil filters. In such a case, the filters must be either recycled or sent to an industrial waste landfill.