

Maintenance Advisory

MA 2010-01

April 20, 2010

From Jon W. Reincke, Engineer of Operations

MDOT
Division of Operations
Maintenance
6333 Old Lansing Road
Lansing, MI 48917

For questions regarding
this advisory, contact:

Corey Rogers, Engineer
Structure Maintenance
Section
Phone: 517-322-3320
RogersCo@michigan.gov

Andrew Bouvy, Engineer
Structure Maintenance
Section
Phone: 517-322-3325
BouvyA@michigan.gov



jwr:cr:ab

Oil/Water Separator

Oil/water separators are utilized at many maintenance facilities to treat wastewater generated during equipment maintenance and washing. They remove oil, grease, and solids before wastewater is discharged to a storm or sanitary sewer. The devices function by temporarily detaining wastewater to allow suspended sediment to settle and employ a series of baffles to trap oil. Proper maintenance is required to prevent an unwanted discharge and ensure ground and surface water are not contaminated.

In order for the separator to function as designed, accumulated sediment and oil must be removed when their volumes become too high. Inspections should be conducted at a minimum of every six months to ensure the unit will operate efficiently. If inspection of the vessel cannot be done from the surface, a confined space entry permit may be required.

Documenting inspections will aid in determining how often a separator may need to be inspected and/or cleaned, as well as provide justification for the relative costs. It is important not to rely on the manufacturer's suggested timeframe for removing the materials since accumulation of contaminants varies with usage. Significant items the inspection should include are:

- The overall condition of the cover(s), visible walls and baffles.
- The amount of sediment and sludge in the chamber near the influent pipe. A pole may be used to estimate the level of the solids in comparison to the tank bottom. When the solid build-up is approximately twenty percent of the wetted tank height, it should be cleaned.
- The amount of oil and grease floating on the surface. Once the level exceeds two inches, it should be removed.

All material removed from the oil/water separator must be tested and/or characterized by a reputable liquid industrial waste hauler and/or approved for hauling and disposing of waste property prior to disposal. The test and/or waste characterization will determine whether the material may be treated as hazardous or non-hazardous determining the method of disposal. The contractor's manifest shall be maintained onsite demonstrating material hauled, its characteristics, and name and address of the landfill where it was disposed. Once the separator has been cleaned, it must be filled with clean potable water before discharging may begin.