

Regulated Medical Waste Management and Disposal Guidance



**State of Idaho
Department of Environmental Quality**

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Introduction

The transport, treatment, and disposal of waste generated at hospitals, clinics, physicians' offices, dental practices, blood banks, veterinary hospitals/clinics, medical research facilities, and laboratories is governed by local, state, and federal regulations. This document provides general guidance for regulated medical waste management and disposal. Please refer to the United States Environmental Protection Agency (EPA), United States Occupational Safety and Health Administration (OSHA), United States Food and Drug Administration (FDA), and United States Department of Transportation (DOT), Idaho Department of Health & Welfare and Idaho Department of Environmental Quality regulations for regulated medical waste management and disposal requirements.

What is Regulated Medical Waste?

Regulated medical waste, also known as infectious waste and biohazardous waste, is a waste that is known or reasonably expected to contain pathogens. Pathogens are microorganisms (including bacteria, viruses, rickettsiae, parasites, prions, and fungi) and other agents that can cause disease in humans or animals. Other state or federal agencies may also regulate regulated medical waste as biohazardous waste or infectious waste. DOT utilizes the United Nations' identifiers for transportation that divides this waste into Category A (highly infectious materials) and Category B (materials of concern). Examples of regulated medical waste include the following:

- **Bloodborne Pathogens.** Pathogenic microorganisms that are present in human blood and can cause disease in humans. These include, but are not limited to, hepatitis B virus and human immunodeficiency virus.
- **Pathological and Anatomical Waste.** Tissues, organs, body parts, and body fluids removed during surgery and autopsy.
- **Human Blood and Blood Products.** Includes waste blood, serum, plasma, blood products, and other potentially infectious materials.
- **Cultures and Stocks of Infectious Agents.** Also called microbiological waste. Includes specimens from medical and pathology laboratories; culture dishes and devices used to transfer, inoculate, and mix; and discarded live and attenuated vaccines.
- **Sharps.** Including but not limited to contaminated hypodermic needles, syringes, scalpel blades, Pasteur pipettes, and broken glass.
- **Isolation Waste.** Generated by hospitalized patients who are isolated to protect others from communicable disease.
- **Contaminated Animal Carcasses, Body Parts, and Bedding.** Also includes related wastes that may have been exposed to infectious agents during research or pharmaceutical testing.

How to Dispose of Regulated Medical Waste

Methods of safely disposing regulated medical waste include the following:

- **Incineration:** Regulated medical waste may be transported to a state-approved incinerator where the waste is burned at high temperatures and residency times that effectively kill infectious agents. The remaining ash must be properly characterized and disposed.
- **Steam Sterilization (Autoclave):** Regulated medical waste may be heating in a steam sterilizer, such as an autoclave, at temperatures and residence times that effectively kills infectious agents; the resulting waste may be disposed in approved landfills.
- **Other Methods:** Other effective methods to treat regulated medical waste include chemical disinfection, thermal inactivation, irradiation, and gas/vapor sterilization.
- **Highly Infectious Materials:** DOT “Category A” waste should be treated at the point of generation and not transported. However, once treated it can then be classified as “Category B” and packaged as regulated medical waste for transportation and further treatment at approved facilities.

Regulated Medical Waste Disposal Services

Regulated medical waste transportation and/or disposal services are available through private companies. These companies collect the waste and ensure the waste is transported, treated, and/or disposed in accordance with applicable requirements. Because generators of regulated medical waste remain potentially liable for their waste through final disposal, generators should select transportation and/or disposal companies that are in compliance with state and federal requirements. 49 CFR 172.201(e) requires generators to maintain shipping papers for a minimum of two years. Transport/disposal companies must use DOT-approved containers (49 CFR 173.134, use and maintain shipping papers for one year (49 CFR 177.817), use properly marked and dedicated vehicles (49 CFR 172), maintain minimum insurance levels (49 CFR 387.9), perform daily safety inspections on every vehicle (49 CFR 396.11), be prepared to respond to emergencies (49 CFR 172.600-606), and meet OSHA Bloodborne Pathogen (BBP) standards (29 CFR 1910.1030) and hazard communication requirements (49 CFR 172.604).

Regulated Medical Waste Containers and Packaging

Several federal regulations apply to containers and packaging used for regulated medical waste. OSHA standards for BBP apply in the workplace. These standards require BBP waste to be placed in bags that are either labeled with the biohazard symbol, are colored red, or both. Used sharps must be placed in containers meeting FDA puncture-resistant and leak-proof certification.

During transportation of regulated medical waste, DOT requires packaging to be marked with the proper shipping name “regulated medical waste” and appropriate identification number “UN3291” for regulated medical waste. Shipping papers are also required and must provide the appropriate name and identification number plus the proper hazard and packing group, total quantity, number and type of packaging, emergency response phone number, and shipper’s certification.

Regulated Medical Waste Transportation

Vehicles transporting regulated medical waste must comply with DOT's Federal Motor Carrier Safety Administration requirements (49 CFR 173.134). Under these DOT requirements, vehicles without the capacity to secure loads shall not be used to transport regulated medical waste [49 CFR 171.1(b)].

When solid waste, including regulated medical waste is transported to a location and subsequently transported off-site, that location is considered a transfer station and regulated under Idaho's Solid Waste Management Rules, IDAPA 58.01.06. Anyone wishing to operate a transfer station should contact the Idaho Department of Environmental Quality to discuss applicable requirements. Regulated medical waste generators who store their waste prior to collection or facilities disposing regulated medical waste are not considered transfer stations.

Regulated Medical Waste Training Requirements

Generators, transporters, and facility owners/operators who manage regulated medical waste are required to meet certain training requirements (29 CFR 1910.1030(g)(2)). Training is required for new employees and existing employees taking on new tasks related to medical waste, and must be taken at least once a year as required by OSHA and every three years as required by DOT. Other state and federal agencies may have additional training requirements.

Idaho Hospitals

Hospitals are required to comply with all applicable requirements under the "Rules and Minimum Standards for Hospitals in Idaho" (IDAPA 16.03.14) including specific requirements for the transportation, treatment and disposal of infectious waste. Questions regarding infectious waste as defined in IDAPA 16.03.14.001.19 should be directed to the Idaho Department of Health and Welfare, Administrative Procedures Section, at (208) 334-5564 or DHWRules@dhw.idaho.gov.

For More Information

Idaho Department of Health and Welfare

Rules and Minimum Standards for Hospitals

<http://adminrules.idaho.gov/rules/current/16/0314.pdf> (Navigate to Section 550)

US Food and Drug Administration

<http://www.fda.gov/MedicalDevices/ProductsandMedicalProcedures/HomeHealthandConsumer/ConsumerProducts/Sharps/ucm263236.htm>

US Department of Labor Occupational Safety and Health Administration

https://www.osha.gov/pls/oshaweb/owastand.display_standard_group?p_toc_level=1&p_part_number=1910

Idaho Department of Environmental Quality

www.deq.idaho.gov/assistance-resources/industry-specific-assistance/hospitals.aspx

Federal Motor Carrier Safety Administration

<http://www.fmcsa.dot.gov/safety-security/hazmat/complyhmregs.htm>

Health Care Without Harm

www.noharm.org

US Environmental Protection Agency

<http://www.epa.gov/osw/nonhaz/industrial/medical/index.htm>

Practice Greenhealth

<https://practicegreenhealth.org>