



1. INTRODUCTION

Universal waste is generated in numerous places around the Notre Dame campus and is handled by university employees. Universal waste is a subcategory of hazardous waste that poses low risk to human health when handled and transported safely. It consists of batteries, pesticides, mercury-containing equipment, and lamps (light bulbs). The University recognizes that there are potential hazards associated with the use and disposal of universal waste materials. This policy is based on the federal regulation 40 CFR part 273 and state regulation 329 IAC 3.1-16. It regulates the handling and disposal of universal waste.

2. SCOPE

Universal waste is a potentially hazardous waste that is considered “universal” to all work environments. This policy applies to all University generated universal waste. It applies to the departments who generate or handle the waste and the employees who work with it.

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4. RESPONSIBILITIES

4.1 Maintenance Department:

- 4.1.1 Ensure that responsibilities of this policy are assigned to individuals within their department.
- 4.1.2 Actively support the implementation and follow-through of this policy within the department.
- 4.1.3 Collect and store universal waste lamps according to this policy and universal waste regulations.
- 4.1.4 Contact the current lamp disposal contractor to pick up and dispose of universal waste lamps within the one year accumulation time limit.
- 4.1.5 Identify department employees who require training.

4.2 Athletics:

- 4.2.1 Ensure that responsibilities of this policy are assigned to individuals within their department.
- 4.2.2 Actively support the implementation and follow-through of this policy within the department.
- 4.2.3 Collect and store universal waste lamps for the athletic department according to this policy and universal waste regulations.
- 4.2.4 Contact the current lamp disposal contractor to pick up and dispose of universal waste lamps within the one year accumulation time limit.
- 4.2.5 Identify department employees who require training.

4.3 Recycling Department:

- 4.3.1 Ensure that responsibilities of this policy are assigned to individuals within the department.
- 4.3.2 Actively support the implementation and follow-through of this policy within their department.
- 4.3.3 Collect and store universal waste batteries from Notre Dame's campus according to this policy and universal waste regulations.

- 4.3.4 Contact the current battery disposal contractor to pick up and dispose of universal waste batteries within the one year accumulation time limit.
- 4.3.5 Identify department employees who require training.

4.4 Transportation:

- 4.4.1 Ensure that responsibilities of this policy are assigned to individuals within the department.
- 4.4.2 Actively support the implementation and follow-through of this policy within their department.
- 4.4.3 Collect and store universal waste car batteries from Notre Dame's campus according to this policy and universal waste regulations.
- 4.4.4 Ensure that all car batteries are exchanged or properly disposed of.
- 4.4.5 Identify employees who require training.

4.5 Risk Management and Safety Department:

- 4.5.1 Develop a universal waste policy and revise it as needed.
- 4.5.2 Ensure that training is provided to all universal waste handlers through cooperation from the departments who have handlers.
- 4.5.3 Maintain training records.
- 4.5.4 Provide technical support to departments and employees when questions arise with regards to universal waste.
- 4.5.5 Pick up any mercury containing equipment and respond to mercury spills.
- 4.5.6 Respond to any broken fluorescent light incidents.

4.6 Office of Sustainability:

- 4.6.1 Track universal waste quantities for Notre Dame's campus.
- 4.6.2 Maintain tracking records.

5. TRAINING

- 5.1 A small quantity waste handler must ensure that all employees who handle or are responsible for managing universal waste are informed on the proper handling and emergency procedures appropriate to the specific universal waste(s) they handle.
- 5.2 Employees whose responsibilities include universal waste must review the Universal Waste Training PowerPoint.
- 5.3 Training will include the following:
- Background and Policy Information
 - Waste Accumulation/ Handling Procedures
 - Waste Handler Status
 - Shipping Policy
 - Waste Labeling Requirements
 - Response to Release Procedure
 - University Procedures for Specific Universal Wastes

6. WASTE CATEGORIES

There are four categories of universal waste:

6.1 Batteries:

- 6.1.1 A device consisting of one or more electrically connected electrochemical cells which is designed to receive, store, and deliver electric energy. The term battery also includes an intact, unbroken battery from which the electrolyte has been removed. Low or non-mercury containing alkaline and carbon zinc batteries can be recycled or disposed of as non-hazardous solid wastes. Examples of universal waste batteries are:
- Sealed lead acid
 - Nickel-cadmium
 - Lithium ion
 - Mercuric oxide
 - Silver oxide
 - Other alkaline batteries

6.2 Lamps:

6.2.1 The bulb or tube portion of an electric lighting device. Examples of universal waste lamps are:

- Fluorescent
- High intensity discharge
- Neon
- Mercury vapor
- High pressure sodium
- Metal halide lamps

6.2.2 This category does not include associated light fixture components such as ballasts.

6.3 Pesticides:

Unused/cancelled pesticides subject to voluntary recall under section 19(b) of FIFRA (Federal Insecticide, Fungicide, and Rodenticide Act). Section 19(b) directs the EPA to order a recall if the recall is necessary to protect health or the environment. It is not waste until the decision is made to discard it.

6.4 Mercury Containing Equipment:

A device or part of a device (excluding batteries and lamps) that contains elemental mercury integral to its function. This does not include cathode ray tubes nor mercury waste generated as a by-product. Examples of mercury containing equipment are:

- Thermometers
- Manometers
- Barometers
- Relay switches
- Mercury reg. meters
- Pressure gauges
- Sprinkler system contacts

7. WASTE HANDLER STATUS

7.1 In universal waste management there are two types of handlers: small quantity waste handlers and large quantity waste handlers.

7.1.1 A small quantity waste handler is generator of universal waste who does not accumulate 5,000 kg of waste at any time.

7.1.2 A large quantity waste handler is a generator of universal waste who accumulates 5,000 kilograms or more of universal waste at any time. If given, this designation retained through the end of the calendar year in which the 5,000 kilogram limit is met or exceeded.

7.2 The university is considered to be a small quantity waste handler.

8. WASTE HANDLING

8.1 Universal Waste Lamps

- 8.1.1 Lamps shall be placed in containers or packages that are structurally sound, adequate to prevent breakage, and compatible with the contents of the lamps.
- 8.1.2 Containers shall remain taped closed unless adding or removing lamps.
- 8.1.3 Containers shall lack evidence of leakage or damage that could cause leakage under reasonably foreseeable conditions.
- 8.1.4 Flaps should not be ripped off of a cardboard lamp container as this makes it harder to close.
- 8.1.5 A universal waste label shall be affixed to all waste containers and be marked with the contents of the container and the accumulation start date.
- 8.1.6 If a lamp breaks, it is now considered hazardous waste rather than universal waste and shall be dealt with according to hazardous waste regulations and by calling Risk Management.
- 8.1.7 When the waste container is full, contact maintenance to pick it up for proper storage at the storage area in Maintenance (100 Maintenance Center).
- 8.1.8 Maintenance will call the current lamp disposal contractor to pick up and dispose of the waste.
- 8.1.9 Athletics will collect their used lamps for collection by the current lamp disposal contractor for pickup and disposal.

8.2 Universal Waste Batteries

- 8.2.1 Universal waste batteries shall be stored in an approved plastic container with the proper universal waste label affixed and filled-out with the contents and the accumulation start date.
- 8.2.2 Batteries may be stored individually, but if stored individually each individual battery shall have a universal waste label affixed.
- 8.2.3 When batteries are stored in a container, cover positive and negative terminals using electricians tape or a similar material prior to placing in the container.

- 8.2.4 If a battery shows evidence of damage or leakage, it is considered a hazardous waste and shall be dealt with according to hazardous waste regulations.
- 8.2.5 When the waste container is full, contact Recycling to pick it up for storage at the Mason Services Building (100 Mason Services Building).
- 8.2.6 Recycling shall properly store the batteries until they are picked up by Battery Solutions for disposal.
- 8.2.7 All batteries are to be picked up by Recycling. This includes batteries that are collected in the battery buckets.

8.3 Universal Waste Pesticides

- 8.3.1 Universal waste pesticides shall be stored in a container that remains closed, structurally sound, compatible with the pesticide.
- 8.3.2 The container shall lack evidence of leakage, spillage, or damage that could cause leakage under reasonably foreseeable conditions.
- 8.3.3 The container shall be affixed with a universal waste label, the name of the pesticide product, and the date of the start of accumulation.
- 8.3.4 If the pesticide is used completely, it will not be disposed of via universal waste methods.

8.4 Universal Waste Mercury Containing Equipment

- 8.4.1 Mercury containing equipment shall be managed in a way that prevents releases of any universal waste or component of a universal waste.
- 8.4.2 Mercury containing equipment shall be properly affixed with a universal waste label and filled out with the accumulation start date.
- 8.4.3 Risk Management and Safety shall be contacted to pick up any mercury containing equipment.
- 8.4.4 If mercury is spilled, contact must be made to Risk Management and Safety. If after hours call Notre Dame Security Police (NDSP) at 631-5555.

9. LABELING

9.1 Universal waste containers must be labeled with the following information:

- The label that was on or accompanied the product as sold or distributed

- The words “Universal Waste-(type)(s)” or “Waste-(type)(s)”
- The date the waste was first accumulated in the container

9.2 Universal waste batteries are not required to be stored in a container, but if they are not in a container each individual battery must be labeled.

9.3 The universal waste label currently being used at Notre Dame:



10. ACCUMULATION

- 10.1** Any site where universal waste is collected is considered to be an accumulation site, regardless of the amount of waste collected there.
- 10.2** Universal waste may be accumulated for no longer than a year from the date the universal waste was first generated or received.
- 10.3** The handler must demonstrate the length of time the waste has been accumulating by either writing the accumulation start date on the waste label or by keeping an inventory system.

11. TRANSPORTATION and SHIPPING

- 11.1** A small quantity handler of universal waste is prohibited from sending or taking universal waste to a place other than another universal waste handler, a destination facility, or a foreign destination.

- 11.2 Universal waste must be transported by a qualified universal waste transporter. A universal waste transporter is a person engaged in the off-site transportation of universal waste by air, rail, highway, or water.
- 11.3 If a universal waste being offered for off-site transportation meets the definition of hazardous materials under 49 CFR parts 171 through 180, a small quantity handler of universal waste must package, label, mark and placard the shipment, and prepare the proper shipping papers in accordance with the applicable Department of Transportation regulations under 49 CFR parts 172 through 180.
- 11.4 The current transporter of universal waste lamps for Notre Dame is Graybar.
- 11.5 The current transporter of universal waste batteries for Notre Dame is Battery Solutions.

12. RESPONSE TO RELEASE

- 12.1 A small quantity handler of universal waste must immediately contain all releases of universal wastes and other residues from universal wastes.
- 12.2 A small quantity handler of universal waste must determine whether any material resulting from the release is hazardous waste, and if so, must manage the hazardous waste in compliance with all applicable requirements of 40 CFR parts 260 through 272.
- 12.3 The handler is considered the generator of the material resulting from the release, and must manage it in compliance with 40 CFR part 262.

13. RECORDKEEPING

- 14.1 Small quantity waste handlers are not required to notify the EPA about their waste handling activities. They are not required to keep records of universal waste shipments.
- 14.2 At Notre Dame, quantity records are to be kept by the Department of Sustainability.

14. RELATED DOCUMENTS

Policy Document	Web Address
Universal Waste Regulations	http://www.ecfr.gov/cgi-bin/text-idx?SID=2823e509529d20edead9be056599da69&node=pt40.27.273&rgn=div5

15. CONTACTS

Subject	Office or Position	Telephone Number	Office Email or URL
Policy Clarification	Risk Management and Safety	(574) 631-5037	http://riskmanagement.nd.edu/
Lamp Pickup Information	Maintenance	(574) 631-7701	ndmaint@nd.edu
Battery Pickup Information	Recycling	(574) 631-7026	ihogan1@nd.edu
Web Address for this Policy			http://riskmanagement.nd.edu/safety-policies-consumer-warnings-and-reports/general-workplace-policies/