



MANAGEMENT OF UNIVERSAL WASTE

ENVIRONMENTAL GUIDELINES



TABLE OF CONTENTS

Table of Contents.....	2
Activity Description.....	3
Potential Environmental Risks	3
Recommended Operating Controls	3
Prohibited Activities.....	3
General Considerations.....	4
Training Requirements.....	4
Storage and Materials Management	4
PLanning Requirements	4
Critical Tasks.....	5
Emergency Response	5
Inspection and Maintenance Requirements.....	5
Expected Records and Outputs.....	5
References	5
Contacts	5
Guidance Materials	5
Training Materials	6
Related Environmental Documents.....	6
Applicable Regulations.....	6



ACTIVITY DESCRIPTION

The activity of properly identifying, storing, handling, transporting, and disposing of universal waste. Although universal waste is a subset of hazardous waste, universal waste consists mainly of everyday items in widespread use. Universal waste includes:

- Batteries;
- Aerosol cans;
- Pesticides;
- Mercury-containing devices (such as mercury thermostats);
- Mercury-containing lighting (such as fluorescent bulbs); and
- Electronic devices and components (such as computers and monitors).

In order to be classified as a universal waste, a waste must first be classified as a hazardous waste. The Department of Aviation assumes all of the above waste streams meet definitions of hazardous waste and chooses to manage those waste streams under the less-stringent universal waste regulations, instead of the more-stringent hazardous waste regulations, as allowed by federal and state law. The Department of Aviation believes it does not purchase new mercury-containing devices, and therefore does not generate waste mercury-containing devices.

Classifying and managing the above waste streams as universal wastes is intended to encourage their recycling. Economical recycling options exist for most of these wastes. In addition, classifying material as universal waste means that they are subject to less stringent management requirements than those for hazardous waste.

POTENTIAL ENVIRONMENTAL RISKS

The following environmental concerns are associated with these activities:

- Improper storage, handling, or disposal of universal waste

Potential consequences from performing the activity incorrectly:

- Property damages, personal injury, or damage to the environment
- Noncompliance, Notices of Violation from the regulators, and related (financial and non-financial) penalties.

NOTE: The following guidance applies only to Universal Waste.

Use General Waste Management to facilitate waste classification.

RECOMMENDED OPERATING CONTROLS

Prohibited Activities



Do not dispose of waste batteries, waste aerosol cans, waste pesticides, waste lamps, or waste electronic devices and components in a trash can or trash dumpster unless generator knowledge or other information confirms that the waste is not a hazardous or universal waste.

General Considerations

- A generator of universal waste is called either a “large quantity handler (LQH)” or a “small quantity handler (SQH)” of universal waste. This document will use LQH and SQH when referring to those who generate or accumulate universal waste.
- Identify materials requiring universal waste management.
- Characterize and properly manage universal waste.
- Segregate universal waste as appropriate.
- Generate and maintain a profile with the recycling/disposal facility for all universal waste.

Training Requirements

Employee training programs shall inform personnel at all levels of responsibility who are involved in Universal Waste generation or management and are conducted annually. Universal Waste training shall address topics such as hazards, spill response, good housekeeping, and material management practices.

Storage and Materials Management

- Maintain legible labels and markings on all containers and tanks; labels on all containers must have the name of the owner of the container and an associated contact telephone number and must clearly indicate the contents; The labeling shall conform to CDPHE HMWMD requirements including the owner, the owner USEPA ID Code, RCRA description of waste and applicable codes, facility address, the start date for when the container is first used for accumulation.
- Waste accumulation – manage to prevent releases; one-year accumulation time limit;
- Waste shipment – no manifest required; other evidence of shipping recommended;
- Notification – SQH not required to notify the Colorado Department of Public Health and Environment (CDPHE); LQH must notify CDPHE and obtain an EPA Id. Number;
- Training – SQH employees must be informed of proper handling and emergency procedures; LQH employees must be thoroughly familiar with universal waste management requirements and emergency response appropriate to their level;
- Spills – immediately containerize and appropriately manage any spills, residues, or releases of universal wastes; be aware of the need to determine if a hazardous waste has been newly generated;
- Records – SQH not required to maintain records, but should document waste management activities to evidence SQH status; LQH must keep written records of types and quantities of universal waste shipped and received for 3 years; no training records are required.

PLANNING REQUIREMENTS

Maintain adequate resources to ensure correct management of universal waste.



CRITICAL TASKS

None.

EMERGENCY RESPONSE

- If a spill occurs, refer to Environmental Guideline Spill Response.
- Call DEN Communications Center immediately at 303-342-4200 for all spills.
- Spills of any kind shall not be washed into any sewer, storm drains, or water way, or onto any soil.

INSPECTION AND MAINTENANCE REQUIREMENTS

- Maintain good housekeeping practices in universal waste storage areas.
- Arrange for immediate recycling/disposal when universal waste storage areas/containers become nearly full or when the 1 year accumulation start date is approaching.

EXPECTED RECORDS AND OUTPUTS

Evidence of training

- While formal certifications are not necessary, some form of “proof of training” (such as sign-in sheets and handouts) is recommended and should be maintained on file by the operator.

Waste profiles and land disposal restriction profiles

- Obtain waste profiles and land disposal restriction profiles prior to recycling/disposal of universal waste. Try to recycle universal waste whenever possible.

Shipping documentation

- Records of shipments, such as invoices or bills of lading, are required for LQHs (recommended for SQHs).
- All LQH shipping records must be maintained on file for at least three years.

REFERENCES

Contacts

- DEN Communications Center (for spill reporting): 303-342-4200
- DEN Environmental Services (Main Line) : 303-342-2730; DIA.Environmental@flydenver.com
- Kim Ohlson (Environmental Services: 303) 342-2637; Kim.Ohlson@flydenver.com

Guidance Materials

- CDPHE Compliance Bulletins on Universal Waste
 - Universal Waste Rule
 - Aerosol cans
 - Batteries
 - Electronics (computers, etc.)



- Lighting Waste
 - Mercury containing Devices
- Universal Waste Work Instruction
- Material Safety Data Sheets (MSDS)
- E-waste recycling procedure

Training Materials

- DEN hazardous and universal waste management training
- Site specific waste management materials (if any)

Related Environmental Documents

- Management of Pesticides and Herbicides
- Spill Response
- General Waste Management
- Management of Recyclable and Reusable Materials
- Management of Hazardous Waste
- Management of Special Waste

Applicable Regulations

- USEPA 40 CFR 273 (Federal universal waste regulations)
- US DOT 49 CFR 171-180 (Battery Shipping Instructions)
- CDPHE 6 CCR 1007-3, Part 273 (State universal waste regulations)
- DEN Rules and Regulations
- State solid waste use fee statute (C.R.S. 25-16-104.5)