Universal and Electronic Waste Management for the MIT Community

1. **Purpose / Background**
   The purpose of this document is to provide a clear definition of universal waste from a regulatory standpoint as well as clearly identify the handling requirements of these items to ensure compliance with relevant federal and state regulations. Campus operational procedures are located within the Department of Facilities and Division of Student Life.

Universal wastes are a special classification of hazardous waste. These wastes tend to meet the following criteria:

1. Widespread among industry and households
2. Commonly found in medium to large volumes
3. Exhibit low-level hazards to human health and the environment
4. Contain hazardous materials that may be recycled

Electronic wastes often contain similar contaminants of concern and can be managed by the same vendors.

Some of MIT’s solid waste streams meet the regulatory definition of universal waste. If these universal waste items are not managed under the universal waste regulations, they shall be accumulated, collected, transported, stored, treated and disposed of in compliance with the hazardous waste regulations; 310 CMR 30.000. These waste streams include used mercury containing light bulbs, such as fluorescent and UV light bulbs; all used rechargeable batteries including sealed lead-acid batteries, and mercury-containing equipment such as thermostats. Federal and state regulations outline requirements for identifying, handling, storing, labeling, and recycling universal waste. Massachusetts regulations indicate additional items to be managed similarly to Universal Waste items, such as, Cathode Ray Tubes and Lead Batteries.

2. **Scope**
   This Standard Operating Procedure identifies the different universal waste streams and their associated handling & storage requirements, as well as regulatory requirements for training, monitoring and records retention as stated in the State and Federal regulations.

3. **Prerequisites**
   Universal Waste awareness training is required prior to handling items identified in this procedure. See Section 6 for more details.

4. **Identification & Handling Requirement**
   **4.1. Universal Waste Management**
   Universal waste streams are managed at MIT to encourage recycling, minimize disposal costs, eliminate potential environmental impacts, and meet regulatory requirements.
4.1.1 Waste Types

Universal and electronic wastes accumulated at MIT comprise four general types:

- **Batteries** – rechargeable batteries collected from miscellaneous electronic equipment, such as mobile telephones, portable computers, and emergency backup lighting. Specific types include nickel-cadmium, lithium ion and lead-acid batteries. Automotive type batteries are also regulated. See Section 4.2 for guidance on Automotive Batteries for Reclamation.

- **Light bulbs** – tube and compact fluorescents, mercury vapor, high-intensity discharge (HID), UV and neon lamps.

- **Mercury-containing devices** - thermometers, thermocouples, manometers, barometers, sphygmomanometers, and electrical switches and relays.

- **Cathode Ray Tubes (CRTs)** in monitors, televisions, and certain laboratory equipment.

Note: Not all used batteries and light bulbs contain hazardous materials: Non-rechargeable alkaline batteries and standard incandescent lamps may be managed as non-hazardous waste.

Certain Pesticides may also be managed as Universal Wastes per the Federal and State regulations. However, MIT uses all of their pesticides, therefore, not generating any waste pesticides.

4.1.2 Universal and electronic Waste Handling and Storage

Universal Waste materials shall be accumulated and stored in areas that are clearly labeled with the words “Universal Waste” and follow the following criteria:

a) **Labeling** – Containers that accumulate or store universal waste must be labeled with an appropriate Universal Waste label indicating "Universal Waste”, type of material and the accumulation start date. The accumulation start date is the date at which the first item is placed in the container for storage. For example – “Universal Waste Batteries” and the date that the first battery was put in the container.

b) **Storage** – Universal waste may be accumulated onsite for up to one year. Universal waste storage containers should be situated so that labels are clearly visible. Universal waste must be stored in a manner to prevent breakage and damage.

c) **Container Condition** - Containers must be in good condition, to prevent leaks, spills, damage or breakage of waste materials. There may not be severe dents, or other conditions that could cause leaks.
d) Waste Condition – Waste items shall remain intact and in their original state in order to be considered Universal Wastes. Otherwise they are considered Hazardous Wastes and should be managed under 310 CMR 30.000.

e) Compatibility/Containment - Containers should be compatible with the universal waste stored in them.
   - Batteries should be stored in containers, such as cardboard boxes or poly open top containers, after being placed in plastic bags or taped to prevent contacts from short circuiting and fire.
   - Used lamps should be stored in original purchase boxes or containers that are empty of all new lamps, or in containers provided by the recycling vendor.

f) General Housekeeping – In general, accumulation areas should be kept clean and orderly, with easy access for container movement and inspections.

4.2. Automotive Batteries

Lead acid automotive batteries are recycled under relaxed regulations that allow them to be returned to a vendor for reclamation. As proof of these transactions, the EHS Office recommends that records of this transaction be maintained. With the exception of labeling, all universal waste management requirements described in this document must be followed.

5. Roles & Responsibilities

EMP provides regulatory oversight for universal waste operations to ensure proper universal waste management, including:

- Training and/or providing training materials to faculty, staff and laboratory personnel who accumulate universal waste;

- Guidance on universal waste identification and determination;

- Guidance on proper clean up procedures for broken universal waste materials;

- Annual review of shipment paperwork and certificates of destruction to ensure proper waste management.

- Disposal facility audit review

- Maintain copies of shipment paperwork (Non Hazardous Waste Manifests, Bills of Laden & Certificates of Destruction / Recycling) for both DOF & DSL

- Responsible for the proper management of mercury containing devices other than light bulbs as Universal Wastes at MIT. Duties include pick-ups from labs, proper accumulation, shipment and disposal of these devices.

- Assist with Universal Waste removal from labs upon request
DOF & DSL Operational personnel are responsible for collecting and managing most universal and electronic waste and ensuring its proper shipment and disposal, as well as, the proper cleanup of broken bulbs. For specific operational information please refer to the department specific documentation. The Universal Waste Management Program – Collection and Handling Guideline (see Appendix A)

Principal Investigators (PI’s)/Supervisors have the primary responsibility for ensuring that their personnel follow the Institute’s procedures for the management of universal waste(s).

Laboratory and facility/DSL personnel are responsible for making the initial determination when a material becomes a universal waste and following Institute procedures governing the handling and treatment of universal waste.

6. **Training**
MIT personnel involved in the management of universal waste must receive handling and clean up procedure training appropriate to the types of Universal Wastes indicated in this procedure. MIT’s training course, 505c, is provided by the EHS Office for this purpose. (310 CMR 30.1035)

7. **Monitoring Requirements**
Universal waste accumulation areas are to be monitored and inspected on a routine basis to verify all handling and storage requirements outlined in this procedure. DOF and DSL universal waste storage areas are monitored and inspected on a routine basis by local supervisors and annually during Level II inspections. Universal waste storage areas are also monitored to evaluate compliance with regulatory requirements, to evaluate the quantities of waste accumulated onsite, and to identify pollution prevention opportunities. Appendix B provides an example inspection form used by EHS for spot check inspections.

8. **Record Management**
MIT retains the shipment paperwork; either the bill of lading or non-hazardous waste manifest and their corresponding certificates of destruction, for a minimum of three (3) years.

Copies are kept in the Department of Facilities Grounds Department for campus shipments and with the Division of Student Life’s EHS Coordinator for Housing shipments. The EHS Office maintains training records for Institute employees participating in universal waste management training sessions indefinitely.

9. **References**
Additional resources that may be useful in performing the procedures identified in this SOP include:
EH&S Training Program

The MIT Universal Waste Management Program - Collection and Handling Guidelines
9.1. Standards
40 CFR 260 – 268 RCRA Regulations for the Management of Solid Waste
40 CFR 273 – RCRA Universal Waste Management Standards
310 CMR 30 – Massachusetts Hazardous Waste Regulations
310 CMR 16.02, 16.05, 19.043(5) (k), 30.010, and 30.104 – Cathode Ray Tube (CRT) Regulations

9.2. Other SOP/ SOGs
Hazardous Waste Management
Hazardous Waste Removal and Disposal
Spill Response Procedures
EHS Records Retention

10. Definitions
Universal Waste – Certain commonly generated hazardous wastes. Specifically, a hazardous waste exhibiting any of the following characteristics can be classified as a universal waste: 1) frequently generated by a wide variety of settings other than industrial settings; generated in a vast community and in sufficient quantities to cause difficulties in managing the waste properly for both the regulated community and regulators; and the waste is present in significant volumes in the municipal solid waste stream (non-hazardous waste management systems).

Universal Waste Accumulation Area – The defined area where containers of universal waste are collected for storage prior to shipment offsite.
APPENDIX A

THE MIT

UNIVERSAL WASTE

MANAGEMENT PROGRAM

COLLECTION AND HANDLING GUIDELINE

DEPARTMENT OF FACILITIES

ENVIRONMENT, HEALTH & SAFETY OFFICE

DIVISION OF STUDENT LIFE
MIT Universal Waste Collection and Handling Procedures
Department of Facilities (DOF)
Division of Student Life (DSL)
Central Utility Plant (CUP)
Environment, Health & Safety Office (EHS)

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Responsibilities

Repair and Maintenance (R&M)

R&M Staff are responsible for removing all fluorescent bulbs, ballasts, mercury- and lead-containing devices related to all trades, to their centralized Zone Collection Site. All items must be placed into provided containers (OEM, 4’ & 8’ boxes, mixed bulb boxes and 5 & 55 gallon drums) and marked for Universal Waste, with an accumulation start date. Proper handling and packing of containers must be managed to minimize breakage and maximize space. Containers must be taped and drums need proper lid for pick-up. Do not tape light bulbs together. Improperly packaged materials will not be removed by Grounds on their monthly schedule.

R&M Staff are also responsible for the removal of all bulbs, ballasts, mercury- and lead-containing devices related to all trades, from individual customer areas upon customer request. R&M Staff are also responsible for informing Grounds Services of the locations of CRT monitors and larger pieces of electronic equipment for removal by Grounds Services.

R&M Staff are responsible for the clean up of all broken bulbs or devices in their Zone, following all safety procedures as outlined in the EHS SOP for handling Universal Waste. Zone Supervisors are responsible for obtaining items indicated in the Bulb Handling and Clean-Up Kit (see Kit checklist on page 6).

The R&M Supervisor, Paul Motroni, is the overseer of each accumulation area and is responsible for conducting preventative maintenance (PM) monthly inspections through SAP to maintain good order of each Zone accumulation area. Paul is responsible for ensuring the availability of Universal Waste labels and waste containers for each Zone accumulation area. Requesting waste containers from Grounds can be accomplished by placing a work order through SAP. Original bulb containers (OEM) can be used for collection of light bulbs. Universal Waste labels can be printed on Avery Label #5164 (see UW Label on page 9).

Grounds Services

Grounds Services Staff is responsible for monthly service of centralized Zone Collection Site containers. Containers will be picked up by Grounds during the first week of each month or via request through the SAP tracking system.

- Grounds Services will only pick properly packaged Universal Waste containers.
- Containers need to be taped and drums need proper lid for pick up.
- In the event bulbs break Grounds Services will clean up debris (page 7).
- Place IRN shipping & tracking labels to each unit prior to shipment (page 10).

Grounds Services Staff are responsible for providing collection containers upon request to centralized Zone Collection Sites, Dormitory Collection Sites and project sites. Requests for containers from Zone Supervisors & House Managers come through the SAP work order system and are indicated on monthly preventative maintenance reports.

Grounds Services serves as the point of contact for operational questions or issues pertaining to Universal Waste.
Grounds Services manages the Universal Waste contract and payment of invoices related to Universal Waste shipments, and ensures all certificates of destruction are kept on file with shipment documentation for the required 3 year timeframe. When negotiating new contracts for the management of Universal Waste items, Grounds Services takes into consideration the ultimate destination of the items, as well as, the monetary value of the contract.

Grounds Services is ultimately responsible for:

- removing packaged universal waste from Zone & DSL locations on a scheduled basis, as well as the CUP upon request from CUP management
- shipment preparation and scheduling with the vendor
- maintaining paperwork and payment of invoices
- forwarding certificates of destruction to EHS
- reporting & tracking of Universal Waste as specified by Massachusetts State Law, Federal Law and the MIT EHS Office

CUP Staff
CUP Staff are responsible for removing all fluorescent bulbs, ballasts, mercury- and lead-containing devices related to all trades, to their designated area, 43-001. All items must be placed into provided containers (OEM, 4’ & 8’ boxes, mixed bulb boxes and 5 & 55 gallon drums) and marked for Universal Waste, with an accumulation start date. Proper handling and packing of containers must be managed to minimize breakage and maximize space. Containers must be taped and drums need proper lid for pick-up. Do not tape light bulbs together. Improperly packaged materials will not be removed by Grounds on their monthly schedule. CUP management should ensure that any broken bulbs are cleaned up according to the guidelines on page 7 of this document by their staff and that adequate supplies are available.

DSL Managers
House Managers are responsible for supervising dorm staff with the correct/safe collection & storage of UW items prior to scheduled pick-ups through the Grounds Department. Managers should ensure that any broken bulbs are cleaned up according to the guidelines on page 7 of this document by DSL custodians and that adequate supplies are available.

DSL Custodial Staff
Custodial staff & maintenance mechanics are responsible for collecting and storing UW items in the proper containers in designated collection areas and assisting with scheduled pick-ups as needed. They are also responsible for the clean up of all broken bulbs or devices following all safety procedures as outlined in the EHS SOP for handling Universal Waste, also indicated on page 7 of this document.

Environment, Health and Safety (EHS)
EHS is responsible for the proper handling, storage, shipment preparation and disposal of Mercury Containing Devices through their Hazardous Waste vendor services. EHS will work in conjunction with R&M, DSL Managers, CUP staff and laboratory personnel to retrieve mercury containing devices; such as, thermometers, thermostats, switches and sensors for proper disposal under the Universal Waste regulations.
EHS is responsible for identifying Universal Waste items and their proper management according to State and Federal regulations.

EHS is responsible for providing awareness training and PPE fitting.

EHS is responsible for conducting routine inspections of each Facilities accumulation area on campus and reporting issues to the specific R&M Zone Supervisor, the R&M Manager, the Recycling Coordinator and the Facilities EHS Coordinator. EHS and the assigned EHS Coordinators (Facilities & DSL) are responsible for conducting Level II Inspections of the accumulation areas annually.

EHS is responsible for maintaining shipment paperwork, received electronically from the Universal Waste vendor to uwaste@mit.edu. This email address covers Grounds, R&M, DSL and EHS. EHS conducts an annual review of paperwork from Universal Waste shipments.

**Collection Locations**

Collection areas are for bulbs, ballasts, batteries and other Universal Waste items:

### R&M Zone Collection Sites

<table>
<thead>
<tr>
<th>Location</th>
<th>Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main Campus</td>
<td>7-029</td>
</tr>
<tr>
<td>Main Campus</td>
<td>32-Loading Dock (Stata)</td>
</tr>
<tr>
<td>Main Campus</td>
<td>43-001 (CUP)</td>
</tr>
<tr>
<td>East Campus</td>
<td>16-028</td>
</tr>
<tr>
<td>East Campus</td>
<td>68-026</td>
</tr>
<tr>
<td>East Campus</td>
<td>14N-0808</td>
</tr>
<tr>
<td>East Campus</td>
<td>76-068C (loading dock)</td>
</tr>
<tr>
<td>East Campus</td>
<td>E19-006</td>
</tr>
<tr>
<td>East Campus</td>
<td>E19-009 (lead acid batteries)</td>
</tr>
<tr>
<td>East Campus</td>
<td>E19-102 (batteries)</td>
</tr>
<tr>
<td>West Campus</td>
<td>W20-005</td>
</tr>
<tr>
<td>West Campus</td>
<td>W31-041a</td>
</tr>
<tr>
<td>West Campus</td>
<td>W79-Loading Dock</td>
</tr>
<tr>
<td>West Campus</td>
<td>NW86-Loading Dock</td>
</tr>
</tbody>
</table>

### DSL Collection Sites

<table>
<thead>
<tr>
<th>Location</th>
<th>Residence</th>
</tr>
</thead>
<tbody>
<tr>
<td>NW35-1065</td>
<td>Ashdown</td>
</tr>
<tr>
<td>W7-004</td>
<td>Baker</td>
</tr>
<tr>
<td>W13-002</td>
<td>Bexley</td>
</tr>
<tr>
<td>W51-058</td>
<td>Burton-Conner</td>
</tr>
<tr>
<td>64-003</td>
<td>East Campus</td>
</tr>
<tr>
<td>E55-008</td>
<td>Eastgate</td>
</tr>
<tr>
<td>NW10-026A</td>
<td>Edgerton</td>
</tr>
<tr>
<td>W61-0004</td>
<td>MacGregor</td>
</tr>
<tr>
<td>W4-009</td>
<td>McCormick</td>
</tr>
<tr>
<td>W70-B116 / F128</td>
<td>New House</td>
</tr>
<tr>
<td>W71-029</td>
<td>Next House</td>
</tr>
</tbody>
</table>
Accumulation Area Requirements
Each collection area is responsible for maintaining proper accumulation of universal waste within their respective zone or house. Accumulation requirements include:

- Label area as the accumulation area (example page 8)
- Label container or items **UNIVERSAL WASTE** (example page 9) (type of universal waste, **start date**, location)
  "Universal Waste - Mercury Light Bulbs"
  "Universal Waste – Mixed Batteries"
- Separate from usable products
- Good housekeeping of area – i.e. no broken bulbs or leaking batteries

Containers
Containers suitable for each waste type are ordered (from Grounds) and distributed by either the R&M Zone Supervisor for each centralized Zone Collection Site or by the DSL Manager for each House Collection Site.

By law, each container must be marked specifically for a waste type, therefore containers marked for one type of waste should not be used for another (for instance, a container marked for bulbs should not be used for ballasts). In addition, wastes should not be mixed together in one container (for instance, placing batteries with ballasts) and re-marked as such.

The container types are as follows:

8-foot bulb* = Large cylinder made of reinforced paperboard
4-foot bulb* = Medium cylinder made of reinforced paperboard or original bulb boxes.
Miscellaneous Bulbs* = Small cylinder made of reinforced paperboard or 5 gallon bucket
Other Devices = 5-gallon bucket and/or pallet for sealed lead acid batteries (<2lbs)

Each collection site is required to maintain enough containers to accommodate the monthly volume of wastes produced. Additional containers may be requested at any time from Grounds.

Specialized containers may be provided for other Universal Wastes that do not fit in the above containers.

*Original light bulb containers are acceptable for the collection of waste bulbs.
Quick Lists

Broken Bulb Handling and Clean-Up Kit Checklist
(PPE & Equipment can be purchased through the MIT stockroom & should be available for cleanup process. Grounds will collect broken bulb materials annually for recycling.)

<table>
<thead>
<tr>
<th>PPE</th>
<th>Equipment</th>
</tr>
</thead>
<tbody>
<tr>
<td>Latex or nitrile gloves</td>
<td>Five gallon bucket</td>
</tr>
<tr>
<td>Dust mask (2-banded)</td>
<td>Spray bottle filled with water</td>
</tr>
<tr>
<td>Safety glasses</td>
<td>Broom (not disposable)</td>
</tr>
<tr>
<td>Close-toed shoes</td>
<td>Dust Pan (not disposable)</td>
</tr>
<tr>
<td>Long pants</td>
<td>Paper towels (to dry floor)</td>
</tr>
<tr>
<td>Long-sleeved shirt</td>
<td>Disposable sponges (optional)</td>
</tr>
</tbody>
</table>

Universal Waste Quick List
Below is a list of common Universal Waste items at MIT

<table>
<thead>
<tr>
<th>Bulbs</th>
<th>Batteries*</th>
<th>Mercury/Lead Devices</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fluorescent</td>
<td>Nickel Cadmium (NiCd)</td>
<td>Electrical switches**</td>
</tr>
<tr>
<td>High-intensity discharge</td>
<td>Lead-acid</td>
<td>Relays</td>
</tr>
<tr>
<td>Neon (Ne)</td>
<td>Nickel Metal Hydride (NiMH)</td>
<td>Thermostats**</td>
</tr>
<tr>
<td>Mercury-vapor (Hg)</td>
<td>Lithium Ion (Li-ion)</td>
<td>Pilot light sensors**</td>
</tr>
<tr>
<td>High-pressure sodium (Na)</td>
<td>Any wet-cell battery</td>
<td>Thermometers**</td>
</tr>
<tr>
<td>Metal halide (MH)</td>
<td>Any rechargeable battery</td>
<td>Barometers**</td>
</tr>
<tr>
<td></td>
<td>Any button battery</td>
<td></td>
</tr>
<tr>
<td>9V Alkaline battery</td>
<td>Central Processing Units (CPU)</td>
<td></td>
</tr>
<tr>
<td>Alkaline (as of 10/1/09)</td>
<td>Blood pressure gauges</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Any monitor or screen</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Cathode Ray Tube (CRT) Monitors/Televisions</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Liquid Crystal Display (LCD) Monitors/Televisions</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Plasma Screen Monitors</td>
<td></td>
</tr>
</tbody>
</table>

*Battery terminals must be taped or collected in such a way to prevent heating or short circuit. Collection containers are found in: most DCMs, Dorm welcome desks, EHS Office (N52-496), Facilities (NE49-2000), VWR stock room (56-068), E19-107 stock room, Stata Center & Stratton Student Center (W20).

**Mercury containing devices are collected by the EHS Hazardous Waste Management Team as indicated under the Responsibilities section above.
Broken Bulb Clean-Up Instructions

The US EPA suggests vacating the space where broken mercury containing bulbs are located for approximately 15 minutes, immediately following breakage, to allow particles to settle. If windows are available it is suggested to open these prior to vacating the room. Upon returning to the space for clean-up, use the Broken Bulb Handling and Clean-Up Kit and the following steps:

1. Don PPE as listed on the Kit checklist.
2. Wet area or use damp sponges to sweep debris and powder into dustpan. (You can also use stiff paper or cardboard to collect the broken glass & powder but the area should be wiped down with a damp sponge or paper towel afterwards.)
3. Place sponge/paper towels into the five gallon bucket, along w/ broken glass & powder. Wipe the dustpan clean.
4. Seal the bucket with the lid.
5. Place a Universal Waste sticker on the bucket and indicate “Broken Bulb Cleanup” in the “Other” section of the label and date the label. (This bucket can be used again for broken bulb cleanup, so long as the bucket is removed by Grounds within one year of the date on the bucket for recycling.)
6. Disposable gloves may be thrown out in the regular trash only after all handling has been completed.
7. Grounds will remove the Broken Bulb Cleanup materials either upon request through SAP or once per year.
8. Collection area managers are responsible for maintaining spill kit supplies.

Broken Monitor Clean-Up Instructions

The hazard associated with broken monitors, or CRTs, is the lead imbedded in the glass. The leaded glass should be cleaned up using the spill cleanup materials contained in the Broken Bulb Handling and Clean-Up Kit, while following these steps:

1. Don PPE as listed on the Kit checklist.
2. Sweep broken glass into dustpan and wipe area with damp sponge or paper towels. (You can also use stiff paper or cardboard to collect the broken glass but the area should be wiped down with a damp sponge or paper towel afterwards.)
3. Place sponge/paper towels into the five gallon bucket, along w/ broken glass. Wipe the dustpan clean.
4. Seal the bucket with the lid.
5. Place a Universal Waste sticker on the bucket and indicate “Broken Monitor Cleanup” in the “Other” section of the label and date the label. (This bucket can be used again for broken monitor cleanup debris, so long as the bucket is removed by Grounds within one year of the date on the bucket for recycling.)
6. Disposable gloves may be thrown out in the regular trash only after all handling has been completed.
7. Broken Monitor Glass buckets will be removed from the location by Grounds upon receipt of request through SAP.
Universal Waste Accumulation Area

Broken Bulb Clean Up Guideline:
• Vacate area for ~15min; open window if available
• Don PPE (see checklist)
• Use damp sponge to sweep debris & dust into dustpan
• Place cleaning materials into bag w/in 5G bucket, along w/ broken glass & powder
• Wipe dustpan clean
• Place bag in bucket & seal with lid
• Place UW sticker on bucket & indicate Broken Bulb Cleanup in “Other” section; indicate date on label
• Dispose of gloves & booties in the trash

REMEMBER:
- Fill in the label (TYPE & DATE)
- Keep containers closed
- Separate waste from new items
- Use the correct container type

Lithium Ion & Polymer Batteries
Alkaline
Nickel Cadmium Batteries
Lead Acid Batteries

-Page 8 -
UNIVERSAL WASTE

CONTENTS: Mercury Containing Lamps: Please select size
     Straight Lamps____ Shaped Lamps____ Mixed Lamps____
Other Universal Waste: CFLs____ Ballasts (non-PCB)____
Rechargeable Batteries____ Alkaline Batteries____
Mixed Batteries____ Other____________________

ACCUMULATION START DATE _______________

SHIPPER: Massachusetts Institute of Technology

ADDRESS: 77 Massachusetts Avenue

CITY, STATE, ZIP: Cambridge, MA 02139__________
## APPENDIX B

R&M Inspection Form Template

**Universal Waste Inspection Form - Facilities Zones**
**Monthly EHS Inspections**

<table>
<thead>
<tr>
<th>R&amp;M Zone Locations</th>
<th>Zone Manager</th>
<th>Area Labeled</th>
<th>UW Labeled</th>
<th>w/in 365 days</th>
<th>Container Condition</th>
<th>Housekeeping</th>
<th>Broken UW</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>East Zone 68-026</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>East Zone 16-028</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>East Zone 76-068C (loading dock)</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>East Zone E19-009 (lead acid batteries)</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>East Zone E19-102 (batteries)</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>East Zone E19-006</td>
<td>Paul Motroni</td>
<td>y/n</td>
<td>y/n</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Main Zone 7-029</td>
<td>Paul Motroni</td>
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**Contact Information**

- Paul Motroni 617.258.6535
- Kevin Connolly 617.324.0453
- Jarrod Jones 617.253.4111
- Ed Akerley 617.452.2312
- Brandon Andrews 617.452.2416
- Eric Hammond 617.258.5642
- Niamh Kelly 617.258.5639
**DSL Inspection Form Template**

**Universal Waste Inspection Form - Housing**

**Monthly EHS Inspections**

<table>
<thead>
<tr>
<th>Inspector Name:</th>
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<th>Housing Locations</th>
<th>House Managers</th>
<th>Area Labeled</th>
<th>UW Labeled</th>
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<th>Container Condition</th>
<th>Housekeeping</th>
<th>Broken UW</th>
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<td>Ashdown NW35-1065</td>
<td>Denise Lanfranchi</td>
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<td>Baker/Green W7-004</td>
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**Comments:**


