# EXHIBIT TABLE OF CONTENTS


| **Description** (including Part # \| Item # as applicable) | **Page #** |
|---|---|
| 1.0 Purpose | 2 |
| 2.0 Scope | 2 |
| 3.0 Prerequisite Tools and Information | 2 |
| 4.0 Definitions | 2 |
| 5.0 Responsibilities | 3 |
| 6.0 Container Labeling | 3 |
| 7.0 Material Safety Data Sheets (MSDS) | 4 |
| 8.0 Inventory of Materials | 6 |
| 9.0 Employee Training | 6 |
| 10.0 Hazards of Non-Routine tasks | 6 |
| 11.0 Outside Contractors | 6 |
| 12.0 Program Review | 7 |
| 13.0 Referenced Documents | 7 |
| 14.0 Documentation and Record Keeping | 7 |
| 15.0 Change Record | 7 |
| 16.0 Approvals | 7 |
| 17.0 Distribution List | 7 |

| Hazard Communication | Document #: HS-02002 | Revision Date: 7-29-09 | AERC RECYCLING SOLUTIONS |
|---|---|---|---|
| 2591 Mitchell Ave, Allentown, PA 18103<br>APPLIES TO ALL OPERATING LOCATIONS | Department: Regulatory Affairs | Revision #: B | Page: Page 1 of 6 |

## 1.0 Purpose

1.1 To protect the health and safety of employees that may be exposed to chemicals at AERC.com, Inc. (AERC) and to train employees in the proper use, storage, labeling and disposal of chemicals found in the workplace.

1.2 To establish compliance program elements in agreement with the applicable federal and state regulations as set forth by the Occupational Safety and Health Administration's (OSHA), including:

1.2.1 29 CFR 1910 1200 - Federal *Hazard Communication Standard,* and

1.2.2 Title 8 CCR 5194 – CAL OSHA *Hazard Communication Regulation*.

## 2.0 Scope

2.1 This program applies to all personnel including employees and contractors working at AERC facilities.

2.2 The program is based upon applicable requirements (as noted above) with regard to the broad scope of hazardous substances that have the potential to be found within AERC operating facilities. Furthermore, it details additional activities as may be required by associated regulatory standards for individual hazardous substances to which employees may be exposed. Most notably, CAL OSHA requirements set forth in Title 8 CCR 5198 (l) [lead]; CCR 5207 (m) [cadmium]; and 5214 (m) [arsenic].

## 3.0 Prerequisite Tools and Information

3.1 None specified.

## 4.0 Definitions

4.1 "*Hazardous and/or toxic substances*" are defined as those chemicals present in the workplace which are capable of causing harm. In this definition, the term *chemicals,* includes dusts; mixtures; and common materials such as paints, fuels, and solvents. OSHA currently regulates exposure to approximately 400 substances.

4.1.1 NOTE: Other regulating authorities, e.g., Cal/OSHA, may broaden the scope of the definition by also including other materials or more strictly classify the hazards of certain chemicals. Specifically, Proposition 65 requires employers in California to notify employees and provide a clear and reasonable warning of the hazards from those chemicals that may be found in the workplace which cause cancer, birth defects and/or reproductive harm.

## 5.0 Responsibilities

5.1 The Director of Regulatory Affairs is responsible for:

5.1.1 Issuing and maintaining this program and ensuring the program satisfies the requirements of all applicable federal, state and local hazard communications (HAZCOM) standards.

5.2 The Health, Safety and Environmental (HSE) Coordinator and/or HSE Services Specialist is responsible for:

5.2.1 Assisting the Director of Regulatory Affairs in maintaining this program and ensuring the program satisfies the requirements of all applicable federal, state and local HAZCOM standards.

5.2.2 Providing initial training and retraining (through supervisors assistance) to all employees as per OSHA guidelines detailed here-in.

5.2.3 Acting as a consultant to supervisors on any interpretation of the HAZCOM standards.

5.2.4 Reviewing the safe use of new chemicals in our benches which are introduced at AERC – Allentown and at customer sites.

5.2.5 Maintaining and updating the MSDS Master File and Index at AERC Regulatory Affairs Department offices in Allentown PA.

5.3 The Facility Managers or Designee is responsible for:

5.3.1 Ensuring all employees authorized to work in the facility receive initial and annual training on appropriate HAZCOM procedures. Initial training must be completed before an employee works on equipment with chemicals.

5.3.2 Immediately responding to any employee concerns and requests for information.

5.3.3 Ensuring MSDS files are updated periodically and are consistent with current chemicals used in the workplace.

5.4 Employees are responsible for:

5.4.1 Consulting an applicable MSDS, supervisor or the Health, Safety & Environmental Coordinator if they have a question regarding chemical handling/labeling.

5.4.2 Knowing the locations of MSDS books in the workplace.

5.4.3 Using PPE as required; and

5.4.4 Knowing how to interpret and understand an MSDS.

## 6.0 Container Labeling

6.1 All chemical containers and material shipments will be properly labeled from the manufacturer to include at a minimum: identity of the product hazard warnings and the name and address of the manufacturer or other responsible

party. All labels will be written in English. If an employee discovers an unlabeled container, notify supervisor and the HSE Coordinator immediately.

6.2 There is no uniformly accepted system for labeling containers at this time, however several systems and standards for labeling hazards exist. Common labeling systems used by AERC our chemical manufacturers/suppliers and customers include: Department of Transportation (DOT) Hazard Labeling System; Hazardous Materials Information System (HMIS); and National Fire Protection Association (NFPA) 704.

6.3 The Department of Transportation (DOT) Hazard Labeling System uses a color-coded diamond in which there is a symbol and a term describing the major hazard of the material. DOT hazard classes include explosives, gases (flammable, non-flammable, corrosive and poison), flammable liquids, flammable solids, oxidizers, poisons, radioactive materials and corrosives. Most chemicals are rated by what the DOT considers to be the single major hazard, but many chemicals have subsidiary hazard categories as well. The DOT system is used for the transportation of hazardous materials.

6.4 The National Fire Protection Association (NFPA) has developed a color-coded system called NFPA 704. The system uses a color coded diamond with four quadrants in which numbers are used in the upper three quadrants to signal the degree of emergency for health hazard (**blue**), fire hazard (**red**), and reactivity hazard (**yellow**). The bottom quadrant (**white**) is used to indicate water reactivity, radioactivity, biohazards or other special hazards. The NFPA 704 System is used primarily by emergency response personnel and for emergency planning and as such does not adequately signal occupational hazards or precautionary information. The NFPA system is good for alerting personnel to the degree of hazard of the chemical and helpful in drawing attention to storage needs and emergency equipment

## 7.0 Material Safety Data Sheets (MSDS)

7.1 Chemical manufacturers and importers must develop or obtain MSDS for each hazardous chemical they produce or import. Each MSDS will be written in English and will contain at least the following:

7.1.1 The identity of the chemical used on the label; If the hazardous chemical is a single substance, its chemical and common name(s); If the hazardous chemical is a mixture, which has been tested as a whole to determine its hazards, the chemical and common name(s) of the ingredients which contribute to any known hazards and the common name(s) of the mixture itself; and If the hazardous chemical is a mixture which has not been tested as a whole:

7.1.2 The chemical and common name(s) of all ingredients which have been determined to be health hazards, which comprise 1 percent or greater

of the composition, except that chemicals identified as carcinogens shall be listed if the concentration is 0.1 percent or greater;

7.1.3 The chemical and common name(s) of all ingredients which have been determined to be health hazards which comprise less than 1 percent (0.1 percent for carcinogens) of the mixture, if there is evidence that the ingredient(s) could be released from the mixture in concentrations which would exceed the OSHA PEL or ACGIH TLV or could present a health risk to employees;

7.1.4 The chemical and common name(s) of all ingredients which have been determined to present a physical hazard when present in the mixture.

7.1.5 The physical and chemical characteristics of the hazardous chemical (i.e. flashpoint, vapor pressure, etc.);

7.1.6 The physical hazards of the hazardous chemical, including the potential for fire, explosion and reactivity;

7.1.7 The health hazards of the hazardous chemical, including signs and symptoms of exposure and any medical conditions which are generally recognized as being aggravated by exposure to the chemical;

7.1.8 The hazardous chemical primary route of entry (i.e. inhalation, ingestion, absorption) and the OSHA PEL or ACGIH TLV;

7.1.9 Whether the hazardous chemical is listed in the National Toxicology Program (NTP) annual report on carcinogens (latest edition) or has been found to be a potential carcinogen in the International Agency for Research on Cancer (IARC) monographs (latest edition) or by OSHA;

7.1.10 Precautions for safe handling and use including hygienic practices, protective measures during repair and maintenance of contaminated equipment and procedures for cleanup of spills and leaks;

7.1.11 Chemical exposure control measures including engineering controls, administrative controls and PPE requirements;

7.1.12 The date of preparation of the MSDS or the latest revision;

7.1.13 The name, address and telephone number of the chemical manufacturer, importer or other responsible party preparing the MSDS, who can provide additional information on the hazardous chemical and emergency procedures, if necessary, and

7.1.14 If no relevant information is found for any given category on the MSDS, the chemical manufacturer or importer preparing the MSDS, the MSDS shall be marked to indicate that no applicable information is found.

7.2 Notification must be made to the Regulatory Affairs Department for the use of any new chemicals. The HSE Coordinator shall be given a copy of MSDS or chemical data sheet and provide for an update to the MSDS Master File.

## 8.0 Inventory of Materials

8.1 AERC will have all MSDS's in a master file in the HSE Coordinator's office.

8.2 An MSDS book will be developed and maintained at each location where chemicals are either used or stored.

8.3 Due to the nature of AERC's waste management activities, MSDS are not received prior to receipt of each individual universal or hazardous waste. As such, representative data sheets shall be maintained for the types of materials commonly received, e.g., fluorescent lamps or lead-acid batteries.

8.4 Those chemicals for which an MSDS is not required, a chemical component of a manufactured universal waste article, a summary data sheet will be secured and placed into the facility MSDS book.

8.5 The chemical listing for each location shall be maintained as Attachment 1 to this procedure.

## 9.0 Employee Training

9.1 All AERC employees will receive initial and annual Hazard Communication (HAZCOM) training in their corresponding training courses.

9.2 Training will be updated when a new process is introduced or the employee shows a deficiency in the area of HAZCOM.

9.3 Employee training will consist of:

- 9.3.1 Chemicals and gasses found in the workplace;
- 9.3.2 Physical and health hazards of the chemicals in the work area;
- 9.3.3 Measures employees are to take to protect themselves;
- 9.3.4 How to read and interpret an MSDS;
- 9.3.5 How to read and interpret the different labeling systems in use; and
- 9.3.6 Locations of MSDS books and files.
- 9.3.7 Emergency procedures for working with chemicals.

## 10.0 Hazards of Non-Routine tasks

10.1 Presently, we do not have non-routine tasks involving the potential to expose workers to hazardous chemicals. If a non-routine task should arise, the Health, Safety and Environmental Coordinator and the Facility/Operations Manager will review the non-routine task and train accordingly.

## 11.0 Outside Contractors

11.1 Outside contractors performing work on company property will be notified of the hazardous chemicals that are present on site and the locations of MSDS books throughout the facility.

11.2 Outside contractors will be required to provide MSDS's for the hazardous chemicals they intend to bring into our facilities.

## 12.0 Program Review

12.1 The HSE Coordinator shall review this Plan at least annually for necessary changes. Adjustments shall be reviewed with the Director of Regulatory Affairs & Compliance as well as Facility Management prior to implementation. Retraining on the Plan will be done as necessary (as noted above).

## 13.0 Referenced Documents

13.1

## 14.0 Documentation & Record Keeping

14.1

## 15.0 Change Record

| Rev | Date | Responsible Person | Description of Change |
|---|---|---|---|
| NA | 8-16-02 | William Bogari | Previously Created & Released Version |
| A | 8-6-08 | Jane Rodgers | Updates Specifically for Virginia Compliance. Additional Updates to Follow for All Locations. |
| B | 7-29-09 | Jeff Smith | Conversion to New Formatting and Overhaul of Previously Released Components. Addition of discussion to broaden scope to more clearly include state requirements, e.g., Cal/OSHA. |

## 16.0 Approvals

Approved:

**TITLE:** *Director of Regulatory Affairs* **Jeffery Smith** 7/29/09 **Date**

## 17.0 Distribution List

- Regulatory Affairs – Electronic and Master Hard Copy
- Individual Locations – Hard Copy with site specific Attachment 1