MEDICAL WASTE DISPOSAL PROGRAM

Environmental Health & Safety
California State Polytechnic University, Pomona
3801 West Temple Avenue
Pomona, California 91768
(909) 869-4697

(Revised 07/03/2023)

TABLE OF CONTENTS

PREFACE

California State Polytechnic University is a public educational institution/business that produces Medical Waste.

This Medical Waste Disposal Program was prepared to provide campus laboratory and clinical personnel current information on medical waste disposal techniques. The purpose of this program is to bring together information, which will assist employees in carrying out their legal responsibilities in the proper disposal of medical waste materials.

Medical waste is generated as part of the University's daily operations. The University generates approximately 900 pounds of Medical Waste per month, which includes sharps, contaminated solids/liquids, and a few expired pharmaceuticals. Most of the medical waste is generated in the University Health Center and Biological Sciences. Minor amounts of medical waste are occasionally generated in Athletics, Animal Laboratories and Chemistry. The major storage areas are located in Biological Sciences and the University Health Center. The specific locations are in Building 4, Building 8. Building 92 and in locked storage bins outside Building 46. Biological Sciences is the only department that treats medical waste in autoclaves. All sharps waste and the medical waste generated in the other specified departments are stored in the bins at building 46 and shipped to a treatment facility once each week. Because of the need to reuse laboratory glassware and other items, Biological Sciences operates several steam autoclaves located in building 4 and 8. A list of Medical Waste Autoclaves can be found in Appendix F. The estimate maximum onsite treatment capacity of the Autoclaves is 100,000 pounds per month.

All personnel using biohazardous materials or sharps should become familiar with this medical waste disposal program and conduct their operation in accordance with the level of risk of the materials they handle. The success of any control program depends upon the personnel who are motivated toward a safe working environment and who have knowledge of safe operational procedures. The Environmental Health and Safety Department at Cal Poly endeavors to do its part by providing accurate information and technical assistance to aid in the establishment of adequate biohazard controls for the protection of University personnel, the campus community, and the surrounding environment.

As the Director of Environmental Health & Safety, I declare that to the best of my knowledge and belief that the statements made in this written program are complete, accurate, true and correct.

Signature:_____ Date:_____
Name: Erick Guandique

1.0 REFERENCE. Chapter 6.1 of Division 20 of the California Health and Safety Code (Appendix A)

2.0 POLICY. It is the policy of California State Polytechnic University, Pomona to handle and dispose of medical wastes in a manner which will not adversely affect (1) the health, safety and well-being of students, faculty, staff, and visitors; and (2) the environment.

3.0 OBJECTIVE

3.1 To provide students, faculty, staff, and visitors to the campus with the maximum personal safety from illness or injury commensurate with the essential nature of research, teaching, and patient care responsibilities of the University.

3.2 To assure that medical waste materials are not spread to the surrounding communities.

4.0 BACKGROUND

The state of California has determined that medical waste poses a health hazard based either upon the potential virulence of the waste material, or the sheer volume of material present. As a result, the provisions of the Medical Waste Management Act apply to any person or company that generates medical waste materials. This includes hospitals, veterinary clinics, microbiology laboratories (includes analysis, research, and production laboratories), intermediate care facilities, and animal care facilities.

5.0 RESPONSIBILITIES

5.1 University Administrative Officers. The administrative officers of California State Polytechnic University, Pomona have the responsibility to ensure that all research, teaching, and patient care activities under their control are conducted in a manner that presents the least possible hazard to employees, students, visitors, and to the surrounding community.

5.2 Department. Responsibility for the health and safety of employees, students, and visitors ultimately rests with the department head. The department head interprets institutional policies and recommendations and assures compliance with their provisions. The department head is responsible for approving the methods for handling and disposing of medical wastes.

5.3 Supervisors. Supervisors at every level have responsibility for biohazard control and the safe handling of sharps. They are responsible for the training of employees in safe practices, for correcting errors and defective conditions which could result in personal injury and/or property damage, and for developing a positive attitude among employees toward biohazard safety and accident prevention. Additionally, they are responsible for ensuring that individuals handling medical waste receive initial training and annual training thereafter on the operation of any treatment equipment used, proper protective equipment to wear, how to clean up spills and the University's Medical Waste Management Plan. This training shall be documented, and the documentation will be retained for at least three years.

5.4 Employees. The success or failure of any safety program ultimately rests with each employee. Each employee is responsible for complying with all safety rules, regulations, and procedures required for the task assigned. This is for his or her own protection as well as that of fellow employees. Each employee is responsible for reporting all facts to the immediate supervisor regarding all incidents resulting in personal injury, illness and/or property damage, or any action or condition which may exist that could result in such accidents.

5.5 Environmental Health and Safety Department. The Environmental Health and Safety Department is primarily concerned with accident prevention and health safeguards. It is responsible for the development, implementation, and administration of the health and safety programs at the University.

6.0 CATEGORIES OF WASTE MATERIALS

6.1 General Waste. Paper, plastics, cloth, etc.

6.2 Medical Waste includes:

a. Laboratory Wastes. Specimen or microbiologic cultures, stocks of infectious agents, live and attenuated vaccines, and culture mediums.

b. Blood or body fluids. Liquid blood elements or other regulated body fluids, or articles contaminated with blood or body fluids.

c. Sharps. Needles, syringes, razor blades, stylets, sharp cutting objects, glass, pasteur or other pipettes.

d. Contaminated Animals. Animal carcasses, body parts, or bedding material.

e. Surgical Specimens. Human or animal parts or tissues removed surgically or by autopsy.

f. Isolation Waste. Waste contaminated with excretion, exudate, or secretions from humans or animals that are isolated due only to the highly communicable diseases listed by Centers for Disease Control as requiring Biosafety Level 4 precautions.

6.3 Hazardous Waste. Spent or used solvents, acids, bases, carcinogens.

6.4 Radioactive Wastes.

7.0 Definition of Medical Waste.

Medical waste shall include any of the following, except for hazardous waste, radioactive waste, or waste generated from normal and legal farm operations:

7.1 Laboratory wastes, including cultures of etiologic agents, which pose a substantial threat to health due to their volume and virulence.

7.2 Pathologic specimens, including human or animal tissues, blood elements, excreta, and secretions, which contain etiologic agents, and attendant disposable fomites.

7.3 Surgical specimens, including human, or animal parts and tissues removed surgically or at autopsy, which in the opinion of the attending physician or veterinarian contain etiologic agents, and attendant disposable fomites.

7.4 Equipment, instruments, utensils, and other disposable materials which are likely to transmit etiologic agents from the rooms of humans, or the enclosures of animals, which have been isolated because of suspected or diagnosed communicable disease.

7.5 Human dialysis waste materials including arterial lines and dialysate membranes.

7.6 Carcasses of animals infected with etiologic agents, which may present a substantial hazard to public health if improperly managed.

7.7 Sharps, including needles, syringes, razor blades, stylets, etc.

7.8 Any other material, which, in the determination of the facility infection control staff, presents a significant danger of infection because it is contaminated with etiologic agents.

NOTE: As used in this section "etiologic agent" means a type of microorganism, helminth, or virus which causes, or significantly contributes to the cause of, increased morbidity or mortality of human beings.

8.0 MEDICAL WASTE CONTAINMENT AND SEPARATION.

8.1 Medical waste, except for sharps capable of puncturing or cutting, shall be contained for storage in disposable plastic bags, which are impervious to moisture and have a strength sufficient to preclude ripping, tearing, or bursting under normal conditions of usage and of handling the waste-filled bags. Bags will be supplied by the individual departments.

8.2 Each bag shall be marked and certified as having passed the tests prescribed for tear resistance (480 grams in both parallel and perpendicular planes) in the ASTM D1922 and for impact resistance (165 grams) in ASTM D1709 as published on January 1, 2014. Bags shall be red, except when yellow is used to segregate trace chemotherapy waste and white is used to segregate pathology waste.

8.3 The bags shall be securely tied to prevent leakage or expulsion of solid or liquid wastes during storage, handling or transport.

8.4 Each bag will be labeled with the words "Biohazardous Waste" or with the international biohazard symbol and the word "Biohazard".

8.5 Sharps shall be contained for disposal in rigid puncture-resistant containers, which are taped close or tightly lidded to make reopening difficult and prevent loss of any liquid or the contents. The rigid containers shall be labeled with either the words "Sharps Wastes" or the international biohazard symbol and the word Biohazard".

8.6 Sharps shall not be recapped, bent, or broken prior to placement in a sharps container.

8.7 Medical waste shall be separated from other wastes at the point of origin by designated personnel.

8.8 Pharmaceuticals are not to be placed into red biohazardous waste bags. All pharmaceuticals must be placed in a container or secondary container labeled with the biohazard symbol and “HIGH HEAT OR INCINERATION ONLY” on the lid and on the sides, so that it is visible from any lateral direction. Pharmaceuticals will be incinerated or treated using an approved method at a permitted medical waste treatment facility. Pharmaceuticals will be secured from unauthorized access and any theft will be reported to the appropriate agency(s).

9.0 MEDICAL WASTE STORAGE AND SPILL RESPONSE

9.1 Medical waste storage shall be in a manner and location which protects it from animals, rain and wind and does not provide a breeding place or food source for insects or rodents.

9.2 Bagged biohazardous waste or sharps containers shall be placed in a rigid leak resistant container with a tight-fitting lid. The container shall be labeled with the words "Biohazardous Waste" or with the international biohazard symbol and the word "biohazard" on the sides and the lid so that it is visible from any lateral direction. The rigid container shall be kept clean and in good repair.

9.3 Medical waste shall not be contained or stored above 0 ^{o}C (32 ^{o}F) for more than seven days. Medical waste maybe stored below 0 ^{o}C (32 ^{o}F) for not more than 90 days before treatment with the written approval of the Department of Health Service. Full sharps containers shall not be stored for more than seven days without the written approval of the Department of Health Services.

9.4 Reusable rigid containers used for the storage of bagged medical waste shall be protected by disposable liners or other devices, which will be removed with the waste. Containers, which become contaminated, shall be decontaminated by agitation combined with one of the following procedures:

a. Exposure to hot water of at least 82 ^{o}C (180 ^{o}F) for a minimum of 15 seconds.

b. Exposure to chemical sanitizer by rinsing with, or immersion in, one of the following for a minimum of three minutes: (1) Hypochlorite solution (500 ppm available chlorine); (2) Phenolic solution (500 ppm active agent); (3) Iodoform solution (100 ppm available iodine); or (4) Quaternary ammonium solution (400 ppm active agent).

c. Exposure to a commercially available sanitizer for at least the time specified by the manufacturer, but never less than three minutes. The commercial sanitizer must contain one of the ingredients and concentrations specified in section 9.4b.

9.5 Supervisors shall train all employees who handle medical waste regarding the use of available sanitizers and spill response procedures in this section. In the event of a leak or spill of medical waste the following procedures should be followed:

a. Evacuate the immediate vicinity of the spill.

b. Assess the health risks to personnel.

c. Obtain necessary personal protective clothing: (1) Impervious gloves; (2) Impervious protective suits; (3) Respirators; and (4) Remote equipment for handling of sharps.

d. If safe to do so, stop the flow of any liquids and contain the spill.

e. Apply absorbent to liquids and collect all spilled material in appropriate red bags or sharps containers.

f. Decontaminate the area by misting or otherwise applying one of the chemical sanitizers listed in sections 9.4b or c.

g. Make sure the chemical sanitizer remains on the contaminated area for at least 3 minutes and thoroughly contacts all contaminated surfaces and cracks. Contact time for commercial sanitizers must be at least the time specified by the manufacturer, but never less than three minutes.

h. Notify the Environmental Health & Safety Office at extension 4697.

i. If the spill cannot be safely controlled by department personnel or threatens the safety of the environment or human beings then Public Safety and Environmental Health & Safety should be immediately notified by dialing extensions 911 and 4697 respectively.

j. After approval of the Environmental Health & Safety Director or his designee, the sanitized area may be cleaned by regular mopping and disposal of the rinse water into the sewer system.

9.6 Medical waste, as defined in Section 6.2, shall be stored separately from other wastes.

9.7 Any enclosure, designated area, or room where medical waste is stored shall be properly secured or supervised continuously.

9.8 Any enclosure, designated area, or room where medical waste is stored shall be posted with signs visible from all directions of approach from a distance of 25 feet. The wording on the signs shall be in English, "CAUTION--BIOHAZARDOUS WASTE STORAGE AREA--UNAUTHORIZED PERSONS KEEP OUT" and in Spanish, "CUIDADO--ZONA DE RESIDUOS--BIOLOGICOS PELIGROSOS--PROHIBIDA LA ENTRADA A PERSONAS NO AUTHORIZADAS".

9.9 The department shall include the location of all rooms where medical wastes are stored on their hazardous materials inventory.

10.0 MEDICAL WASTE DESTRUCTION

10.1 All medical or toxic materials, and all contaminated equipment or apparatus should be decontaminated before being washed and stored or discarded. Autoclaving is the preferred method, except for sharps, which will be incinerated by a licensed incineration facility. Each individual working with biohazardous materials should be responsible for decontamination before disposal.

10.2 To minimize the hazard to emergency response personnel, all biohazardous materials should be placed in an appropriately marked refrigerator or incubator, or sterilized, or otherwise confined at the close of each workday.

10.3 All autoclaves will be certified for operating efficiency by the monthly use of the biological indicator Bacillus stearothermophilus placed at the center of the load. All autoclaves should bear a sign indicating the maximum permissible pressure and last date of certification. The recording and/or indicating thermometers must be checked during each complete cycle to ensure the attainment of 121 deg. C (250 deg. F) for one-half hour or longer. Thermometers must be calibrated annually.

10.4 Heat sensitive tape or another device must be used for each container that is processed to indicate the attainment of adequate sterilization conditions.

10.5 Each department shall provide written operating procedures for autoclaves used to treat medical waste. These procedures shall be posted at or near each autoclave.

10.6 Operating procedures for autoclaves shall specify: (1) Use of heat sensitive tape and biological indicators; (2) Operating time; (3) Temperature; (4) Pressure; (5) Type of waste; (6) Type of containers; (7) Closure on containers; (8) Pattern of loading; (9) Water content; and (10) Maximum load quantity.

10.7 Each department shall maintain an up-to-date operating log for each autoclave which documents the temperature achieved, duration of temperature, results of heat sensitive tape, results of biological indicator (if used), weight of waste treated, date of treatment, comments or results of annual calibration and signature of operator (Appendix C).

10.8 Copies of the operating procedures, operating log and other records documenting sections 10.3, 10.4 and 10.5 shall be maintained by the department for a period of three years and made available for inspection by the Environmental Health & Safety Office or appropriate regulatory agency.

10.9 Special precautions should be taken to prevent accidental removal of material from an autoclave before it has been sterilized or the simultaneous opening of both doors on a double-door autoclave. Biohazardous materials should not be placed in autoclaves overnight in anticipation of autoclaving the next day.

10.10 Dry hypochlorides or any other strong oxidizing material MUST NOT be autoclaved with organic materials such as paper, cloth, or oil (i.e. OXIDIZER + ORGANIC MATERIAL + HEAT = MAY PRODUCE AN EXPLOSION).

10.11 All rooms containing biohazardous materials should designate two separate areas for containers labeled:

BIOHAZARDOUS - TO BE AUTOCLAVED

and

NON-INFECTIOUS - TO BE CLEANED

10.12 All floors, laboratory benches, and other surfaces where biohazardous materials are handled should be disinfected as often as deemed necessary by the supervisor. The surroundings should be disinfected after completion of operations involving plating, pipetting, centrifuging and similar procedures with biohazardous materials. It is the responsibility of the supervisor to determine that the disinfectant and the time and method of exposure is effective against the biological agent(s) used in the facility. However, exposure time must be at least 3 minutes with the utilization of a chemical sanitizer listed in section 9.4.b.

10.13 Floor drains should be flooded with water or disinfectant at least once each week in order to fill traps and thus prevent the backflow of sewer gases.

10.14 Floor cleaning procedures, which minimize the generation of environmental aerosols, should be used. Wet mopping or wet vacuum pick-up is recommended. Water used to mop floors should contain a disinfectant or disinfectant detergent. Dry mopping or dusting should be avoided. Where wet procedures are impractical, dry vacuum cleaning with a HEPA filter on the exhaust, sweeping compound used with push brooms, or dry dust mop heads treated to suppress aerosolization may be used.

10.15 Stock solutions of suitable disinfectants should be maintained in each appropriate room for disinfection purposes. The disinfectant should be kept readily available in the use-dilution.

10.16 General criteria for sterilization of typical contaminated materials are presented in Appendix B. Supervisors are encouraged to review the type of materials being handled and to establish standard conditions for sterilization. Treatment conditions to achieve sterility will vary in relation to the volume of material treated, its contamination level, the moisture content, and other factors.

11.0 MEDICAL WASTE PICK-UP AND TRANSPORTATION

11.1 All sharps waste and the medical waste generated in the other specified departments are stored in the bins at building 46 for later weekly shipment to a treatment facility. Campus medical waste generators may transport medical waste generated in limited quantities up to 35.2 pounds to the primary medical waste storage location behind building 46 if the following criteria are met:

1. Other than a Category A infectious substance, biological products or regulated medical waste transported from on-campus sites to the primary medical waste accumulation site must be contained in a combination packaging:

    a. <u>For Liquids</u>: Inner packaging must be leak-proof, and the outer packaging must contain sufficient absorbent material to absorb the entire contents of the inner package.
    b. <u>For Sharps</u>: Inner packaging must be constructed of a ridged material resistant to punctures and securely closed to prevent leaks or punctures, and the outer packaging must be securely closed to prevent leaks or punctures.
    c. <u>For Solids, Liquids, Sharps</u>: Outer packaging must be a strong, tight packaging securely closed and secured against shifting, including relative motion between packages, within the vehicle on which it is being transported.

i. <u>For a regulated medical waste:</u> Combination packaging must consist of one or more inner packagings, each of which may not contain more than 8.8 lbs. (4 kg) or 1 gallon (4 L), and an outer packaging containing no more than 35.2 lbs. (16 kg) or 4.2 gallons (16 L).

2. A person transporting medical waste from an on-campus site to the primary medical waste accumulation location shall provide a log to the Environmental Health and Safety Department, which will be maintained for a period of two years by EH&S, containing all the following information:

    a. The name of the person transporting the medical waste.
    b. The number of containers of medical waste transported.
    c. The date the medical waste was transported.

11.2 Medical waste transported off campus is stored in locked and labeled storage bins outside building 46. The Medical waste transported will be treated using an approved method at a permitted medical waste treatment facility. The Environmental Health & Safety Office will contract with a registered hazardous waste hauler. The hazardous waste hauler will typically pick up waste on Tuesdays and Fridays and transport the medical waste to a permitted medical waste facility. The vehicle driver and/or handler, upon arriving at the University, will move the sealed storage container to the closed, secured vehicle. The hazardous waste hauler will provide the driver and/or handler with:

a. Disinfectant solution for self-use in disinfection if medical waste accidentally comes in contact with the body.

b. Instruction in the proper use of disinfectant application.

c. Protective clothing and gloves to be worn while handling and transporting medical waste.

11.3 The transport vehicle will be:

a. Cleaned and decontaminated as often as required, using an approved disinfectant solution.

b. So constructed as to provide damage resistant access and a driver's compartment that is a sealed, separate enclosure.

c. Completely enclosed.

d. Posted with instructions inside the driver's compartment of the transport vehicle indicating who is to be contacted by telephone in case of an accident, spill, or leakage of medical waste.

e. Transporting the medical waste only to a facility, which has all appropriate and necessary permits and approvals.

f. Labeled with the hazardous waste hauler's name or trademark in a color contrasting with the background to be readily legible during daylight hours from a distance of 50 feet, along with the international biohazard symbol and the word "Biohazard".

11.4 The hazardous waste hauler shall ensure that medical waste is transported in fully enclosed rigid containers.

11.5 The hazardous waste hauler will maintain a complete tracking document and provide the generator with a copy at the time medical waste is picked up. The tracking document shall contain the following information:

a. Name, address, and telephone number of the hazardous waste hauler.

b. Type and weight of medical waste transported from the university.

c. Name of the university.

d. Name, address, telephone number, and signature of an authorized representative of the permitted incinerator receiving the waste.

12.0 CLOSURE PLAN

12.1 In the event that all or any treatment area is shutdown all untreated medical waste will be properly treated on site or shipped to an approved treatment facility. The area(s) and all equipment will be decontaminated using the methods specified in Section 9.4. The area and all equipment will be left in an acceptable sanitary condition.

EFFECTIVE USE OF THE AUTOCLAVE

The application of heat, either moist or dry, is recommended as the most effective method of sterilization. Steam at 121 °C (250 °F) under pressure in the autoclave is the most convenient method of rapidly achieving sterility. Sterility is not guaranteed by the machine merely reaching this temperature, because many variables influence whether materials inside such as labware, reagents and waste are sterilized. The autoclave should be monitored to ensure that the methods used are resulting in sterilization of materials. Two methods of monitoring exist, chemical and biological. Chemical, although adequate for routine daily monitoring, is not considered an acceptable definitive test. Challenging an autoclave with a biological indicator is the current accepted method of testing. This is done with spores, usually Bacillus Stearothermophilus, which can survive 250 °F for 13 minutes. These microorganisms are more resistant to temperature than most and thus provide an adequate safety margin when validating sterilization procedures.

The following information has been compiled from manufacturer's recommendations, the literature and local testing. Many sizes and types of autoclaves exist at the University; therefore, no one set of conditions will be valid for every laboratory. It is important to review individual laboratory procedures in the light of the information presented here and verify the effectiveness of your procedures with biological indicators.

Ideally, the autoclave should be available on the same floor on which the laboratory is located. Materials should be carried to the autoclave in a sealed leak proof container.

A. COMMONLY USED AUTOCLAVABLE CONTAINERS

1. Polypropylene containers 5 and 12 gallon (tall) and sterilizing pans (shallow).
2. Metal pails or pans (stainless steel).
3. Polypropylene bags (frequently referred to as biohazards or autoclavable bags).
4. Glass containers (flasks, bottles).
5. Heavy waxed paper bags.

Metal (Stainless Steel)

Stainless steel is a good conductor of heat and is least likely to increase sterilizing time. Where containment of waste is mandatory and available autoclaving time is limited, metal containers are the best choice. The high cost of metal containers is a drawback to their use.

Polypropylene

Polypropylene is an inexpensive resin, which can withstand autoclaving temperatures. Polypropylene containers are available in a variety of shapes and forms including pans and bags. The bags must be opened to allow steam to penetrate and should have water placed in the bottom to facilitate heat transfer to the items being sterilized.

Glass

Glass must be of the Pyrex type to be autoclaved. It may still break when the autoclave door is opened. The door should be released slightly to allow heat to escape, and the material should be allowed to cool approximately 10 minutes prior to removal.

B. AUTOCLAVING SUGGESTIONS

It is impossible to list fixed autoclaving times due to the variability of autoclaving conditions. However, two recommendations can be made.

1. Test autoclave procedures with a biological indicator. This should be repeated at regular intervals. The autoclave should be monitored in the following manner:

   a. Biological Monitoring - Weekly, using a reliable spore test system.

   b. Mechanical Monitoring - Each run should be monitored for temperature, time and pressure.

   c. Chemical Monitoring - Chemical monitors should be used in each run.

2. Autoclave waste materials for at least 30 minutes, after the autoclave has reached the required temperature. It may take over 30 minutes to get to 121 °C if the load is heavy. Most tests have established 30 minutes as a minimum time.

In order to establish autoclaving time guidelines, a number of loads of waste material were autoclaved using a variety of conditions. The following autoclaving times are suggested:

- Low-sided polypropylene pans/basins with bags « filled and loosely gathered - minimum 30 minutes.
- Low-sided polypropylene pans/basins with bag tightly closed - more than 60 minutes.
- 6 and 12 gallon polypropylene (tall) containers without lids, bag open and « full - more than 90 minutes.
- Metal pails with bags loosely gathered, « full, lid off - 30 minutes.
- Metal pails with lid on - 45 minutes

PLEASE NOTE THESE RESULTS ARE NOT DEFINITIVE. THEY ARE INCLUDED TO GIVE AN INDICATION OF REALISTIC TIMES WHICH ARE NECESSARY TO STERILIZE WASTE PRODUCTS.

Appendix B

California State Polytechnic University, Pomona
Environmental Health & Safety
Operation Log for the Autoclaving of Medical Waste

Page _____

Department: _____

Autoclave Manufacturer: _____

Autoclave Model: _____ Autoclave Serial: _____

Date of Treatment	Maximum Temper-ature Achieved	Duration of Maximum Temper-ature	Results of Heat Sensitive Tape	Monthly Results of Biological Indicator	Weight of Medical Waste Treated	Comments or Result of Annual Calibration	Signature of Operator

California State Polytechnic University, Pomona
Environmental Health & Safety

Annual Medical Waste Autoclave Calibration

Autoclave being calibrated:

Manufacturer: _____

Model: _____ Serial Number: _____

Description: _____

Test Results:

Test Point	Autoclave Reading	True Reading	Offset to be Applied

Comments:

_____

_____

_____

Calibrated by:

Signature: _____ Date: _____

Printed Name: _____

Company: _____

Medical Waste Hauler and Treatment Information

Medical Waste Hauler:

Veolia Environmental Services
241 West Laurel Street
Colton, California 92324
(909) 370-0730

Medical Waste Treatment Facility:

Veolia Environmental Services
241 West Laurel Street
Colton, California 92324
(909) 370-0730

Reverse Distributors Pharmaceuticals Waste

GRx Guarenteed Returns (Reversed Distributor)
100 Collin Drive
Holbrook, New York 11741
(800) 473-2138

Inmar Rx Solutions (Reversed Distributor)
3845 Grand Lakes Way, Suite 100
Grand Prairie, Texas 75050
(800) 765-1277

Appendix E

List of Medical Waste Autoclaves

Department	Location	Autoclave Number	Manufacturer	Model	Serial Number	Active (Yes/No)
Biological Sciences	Bldg. 4, Room 2-774E (steam generator for autoclave #1 located in 4-2-583)	1	STERIS-AMSCO Eagle (Steam Generator is AMSCO)	SG3053	013009929	Yes
Biological Sciences	Bldg. 4, Room 2-774E	2	STERIS-AMSCO Century	SG120	13089905	Yes
Biological Sciences	Bldg 4, Room 2-549	3	Getinge IC Production	LSS 275	BAA110403	No
Biological Sciences	Bldg 4 Room 2-714	4	STERIS-AMSCO Century	SG120	013089904	No
Biological Sciences	Bldg. 4, Room 3-527	5	STERIS-AMSCO Century	SG120	013109902	Yes
Biological Sciences	Bldg. 4, Room 3-527	6	STERIS-AMSCO Century	SG120	012809825	Yes
Biological Sciences	Bldg. 8, Room 140	9	STERIS-AMSCO Century	SG120	010270016	Yes
Animal Facility	Bldg. 92, Room 116	Bldg 92	STERIS-AMSCO Century	AMSCO 3033	R8118193-2	Yes

Appendix F

Emergency Procedures for Transportation or Treatment Medical Waste

In the event that the Waste Hauler's truck should breakdown, another vehicle will be scheduled to pick up the waste and transport it to the treatment facility or an alternate facility. Since the University ships waste every three days, it would be very unlikely that waste would be stored above 0 ^{o}C for more than seven days. Additionally, the University has several Medical Waste Autoclaves that can be used to treat the waste or the University can store the waste at 0 ^{o}C for up to 90 days.

If any one of the several Medical Waste Autoclaves breaks down the waste can be treated in one of the remaining autoclaves or transported the Offsite Medical Waste Treatment Facility.