

1.0 Purpose

The Bloodborne Pathogen Standard was put into effect by the California Division of Occupational Safety and Health Administration (Cal/OSHA) as part of the California Code of Regulations (CCR) under Title 8§5193. The purpose of the Bloodborne Pathogen Standard is to reduce occupational exposure to human materials and Other Potentially Infectious Materials (OPIM) that employees may encounter in their workplace. This Exposure Control Plan is designed to meet the letter and intent of the Cal/OSHA Bloodborne Pathogens Standard as well as the hazard communication requirements of the Injury Illness and Prevention Program Standard, Title 8, CCR 3203.

2.0 Scope and Application

This BBP-ECP applies to all personnel of Sacramento State who may come in contact with BBP materials during the course of their work. This ECP also applies to teaching laboratories at Sacramento State and non-research support staff (e.g., custodians, facilities worker's, police officers, etc.) and complies with the California Occupational Safety and Health Administration (Cal/OSHA) Bloodborne Pathogens (BBP) Standard.

3.0 Responsibilities

1.1 Department Heads/Chairs

- 1.1.1 Be familiar with this Plan and its contents and objectives.
- 1.1.2 Support the Plan and oversee its implementation.
- 1.1.3 Ensure that proper administrative and engineering controls are provided in the work area.

1.2 Managers/Supervisors

- 1.2.1 Must know where human blood or other potentially infectious materials are used, produced, stored, or handled in any manner in the department.
- 1.2.2 Must be familiar with this Plan and its contents and objectives.
- 1.2.3 Identify employees who may be at risk of exposure and implement this plan to prevent identified risks. Risk will be determined by reviewing employee tasks that could result in an occupational exposure to blood or other potentially infectious materials. Exposure identification information must be made available to departmental employees. Departments are expected to consult with Environmental Health and Safety (EH&S) if there is a question regarding risk of employee exposure.
- 1.2.4 Managers/supervisors must review and update exposure information annually and more often, if necessary, to accommodate changes in tasks of employees.
- 1.2.5 Ensure that employees have applicable information and training before beginning specific tasks involving blood or other potentially infectious materials.

- 1.2.6 Identify and develop safety procedures (SOP) when work activities involve the use of blood and/or other potentially infectious materials. Specific procedures for spills, waste disposal, decontamination, and accident response procedures must be developed by the department.
- 1.2.7 Provide proper personal protective equipment (PPE) to employees who work with blood or bloodborne pathogens.
- 1.2.8 Monitor work sites and correct deficiencies.
- 1.2.9 Refer all exposures immediately to an emergency care facility for assessment and exposure follow-up (CDC states HIV exposure assessment must be completed within 4 hours).
- 1.2.10 Complete Part I of an accident report (attachment 2, EHS Form 1) for every bloodborne pathogen exposure.

1.3 Employees

- 1.3.1 Shall be familiar with this Plan and its contents and objectives.
- 1.3.2 Conduct each task in accordance with the applicable training, exposure risk information, or department SOP.
- 1.3.3 Participate in required training sessions.
- 1.3.4 Use PPE and other protective devices when required.
- 1.3.5 Report work site deficiencies and any unknown occupational bloodborne pathogen exposure to your manager/supervisor.
- 1.3.6 Complete Part II of an accident report attachment 2, (EHS Form 1) for every bloodborne pathogen exposure.
- 1.3.7 Reports immediately to a health care provider upon direction of their supervisor after a bloodborne pathogen exposure.

1.4 Environmental Health and Safety (EH&S)

- 1.4.1 Monitors the Bloodborne Pathogen Control Plan.
- 1.4.2 Provides guidance to handlers of biohazardous materials on how to develop departmental control procedures in accordance with this Plan.
- 1.4.3 Specifies guidance and training on how to properly segregate, package, and label solid and liquid wastes that are contaminated with blood or other infectious materials, as requested. Conducts worksite monitoring as needed and inform departments of the results. Approves department SOPs and oversee corrections of reported deficiencies. Advises departments on proper PPE requirements. Schedules employees for HBV immunizations through the CSUS Medical Monitoring Program.

2.0 Employee Exposure Determination

2.1 Category A Employees: Moderate – to – High Risk Exposure

- 2.1.1 Health care providers with patient care responsibilities. Includes professionals, assistants, and other employees directly involved in the patient care process. Research investigators, technicians, and laboratory assistants who work with bloodborne pathogens, human blood, or other potentially infectious materials.
- 2.1.2 Initial Responders: Law enforcement employees.
- 2.1.3 Athletic sports medicine employees.
- 2.2 Category B: Low - to - Moderate Risk Exposure**
 - 2.2.1 Custodial personnel responsible to clean up spills of blood or other potentially infectious material.
 - 2.2.2 Maintenance plumbers responsible for opening sewage lines.
 - 2.2.3 Child care assistants.
 - 2.2.4 Clinical instructors in Special Education.
 - 2.2.5 Employees responsible for laundry cleaning.
- 2.3 Category C: No Risk - to - Low Risk Exposure**
 - 2.3.1 Office support staff.
 - 2.3.2 Custodians not required to clean up spills of blood or other potentially infectious materials.
 - 2.3.3 Personnel responsible for waste collection and hauling.
 - 2.3.4 Laboratory technicians with no assigned tasks involving blood or other potentially infectious materials.
 - 2.3.5 Employees whose job description defines no tasks related to exposure of blood or other potentially infectious materials.
- 2.4 Unclassified Risk Exposure**
 - 2.4.1 To be determined by EH&S, department managers/supervisors on a case-by-case basis.

3.0 Employee Protection

3.1 Employee Information

- 3.1.1 If employee information indicates that occupational exposure to blood or other potentially infectious material exists on the job, the department must follow the procedures of this Plan.
- 3.1.2 Universal precautions (treating body fluids/materials as if infectious) must be followed in all job activities where risk of exposure has been identified.
- 3.1.3 Departments must provide, at no cost to the employee and require employees to use, appropriate personal protective equipment such as gloves, gowns, masks, mouthpieces, and resuscitation bags; and must clean, repair and replace these when necessary.
- 3.1.4 Gloves must be worn when it can be reasonably anticipated that the employee may have hand contact with blood or other potentially infectious materials, and when handling or touching contaminated items or surfaces.

- 3.1.5 Appropriate protective clothing such as, but not limited to, gowns, aprons, lab coats, clinic jackets, or similar outer garments must be worn in risk exposure situations. The protective clothing, that is needed, will depend upon tasks and degree of risk of occupational exposure anticipated. It is required that each department conducts evaluations of risk and mandates the proper use of protective gowns/apparel.
- 3.1.6 Proper masks, in combination with eye protection devices (goggles or glasses with solid side-shields or chin length face shields), must be worn when it can be reasonably anticipated that eye, nose, or mouth exposures may occur as a result of splashes, sprays, or from droplets of blood or other potentially infectious materials.

3.2 Sharps Disposal

- 3.2.1 Sharps must be disposed of in an approved sharps container that is rigid and puncture-resistant, and when sealed, is leak-resistant and cannot be reopened without difficulty. Note: In no instance should a used sharp be transported to a sharps container; keep the container in the immediate worksite, and then, if necessary, transport the container after the sharp has been deposited.
- 3.2.2 Sharps containers must remain upright, not overfilled, and be closed prior to removal. When sharps container become half full, please contact EH&S at 8-2020 for disposal.
- 3.2.3 Containers for contaminated sharps must be red in color and have a biohazard label. Sharps containers shall be replaced when 2/3 full. If the sharps container must be sterilized before disposal, placed in an approved secondary container, and properly dispose of it. The secondary container must also have the biohazard label.

3.3 Contaminated Laundry

- 3.3.1 Departments shall establish procedures for handling contaminated laundry to minimize exposures. A written schedule must be developed for cleaning and identifying the method of decontamination to be used. Cleaning requirements following contact with blood or other potentially infectious materials must be included in these written procedures.

3.4 HIV and HBV Research Laboratories and Production Facilities

- 3.4.1 If laboratories used HIV and/or HBV they must follow standard microbiological practices as outlined in the National Institutes of Health (NIH) guideline, "Biosafety in Microbiological and Biomedical Laboratories". These guidelines specify practices intended to minimize exposure of employees working with concentrated infectious agents and to reduce the risk of occupational exposure

for other employees at the facility. Departments falling under these guidelines must have required containment equipment, and in some instances, an autoclave for decontamination of waste. NOTE: At this time there are no research facilities falling into this category at Sacramento State.

4.0 Engineering and Work Practice Controls

- 4.1 Hand washing facilities must be provided in the work areas.
 - 4.1.1 Employees must use them following exposure to blood and body fluids.
 - 4.1.2 When hand washing is not feasible, the department must provide either an appropriate antiseptic cleanser, in conjunction with clean cloth/paper towels, or antiseptic towelettes.
 - 4.1.3 Hands must always be washed before leaving the work place.
- 4.2 Eating, drinking, application of cosmetics or lip balm, or any other activity that increases the risk to a bloodborne pathogen in the work area is prohibited. These activities must take place in designated areas outside of the contaminated area.
- 4.3 Employees must remove contaminated clothing and wash hands prior to entering an area designated for these activities.
- 4.4 Clean and disinfect contaminated work surfaces with an appropriate disinfectant before beginning work and at the end of each day at a minimum.

5.0 Training and Hazard Communication (Labeling)

5.1 Training Requirements

- 5.1.1 Training for employees identified as having occupational exposure is conducted upon initial hiring and annually thereafter by the supervisor, designated department trainer or EH&S
- 5.1.2 Training at a minimum shall include:
 - (a) Location of the regulatory text of the Cal-OSHA standard and explanation of its contents
 - (b) General discussion of bloodborne pathogen diseases and their transmission
 - (c) This and/or the department's Bloodborne Pathogen Exposure Control Plan
 - (d) Engineering and work practice controls (Universal Precautions)
 - (e) Required use of personal protective equipment
 - (f) Hepatitis B vaccinations
 - (g) Proper response to emergencies involving blood
 - (h) Handling exposure incidents
 - (i) The post-exposure evaluation and follow-up(j) Biohazard waste – packaging, collection, labels, color-coding and storage.
- 5.1.3 Laboratory and production facility workers must receive additional, specialized training depending on the nature of the work conducted.

- 5.1.4 Training records must be maintained by the department for three (3) years and must include:
- (1) Dates and location of training
 - (2) Contents of the training program or a summary
 - (3) Trainer's name
 - (4) Names and job titles of all persons attending the sessions

5.2 Labeling

- 5.2.1 The standard orange or orange-red biohazard warning label must be affixed to containers of biohazard waste.
- 5.2.2 Refrigerators, freezers, and other containers that are used to store or transport blood or other potentially infectious materials must display a biohazard warning label.
- 5.2.3 When a department uses universal precautions in the handling of specimens, labeling of those individual specimens is not required within the department (i.e. laboratory samples).
- 5.2.4 Laundry handled with universal precautions (considered contaminated with blood and body fluids) need to be labeled.
- 5.2.5 If blood samples are tested and found to be infected with HIV or HBV, they must have a biohazard-warning label affixed to the sample, otherwise normal or routine blood samples need not be labeled.
- 5.2.6 Biohazard waste, which has been decontaminated, need not be labeled. However, sharps, contaminated or not, must be placed in a sharps container prior to disposal.
- 5.2.7 The standard biohazard warning sign must be used to identify restricted areas in HIV and HBV research laboratories and production facilities.

6.0 Medical Surveillance

6.1 Hepatitis B Vaccination

- 6.1.1 Hepatitis B Vaccinations are scheduled through the Medical Monitoring Program managed by EH&S.
- 6.1.2 All Category 1 and 2 Employees will be offered and encouraged to have Hepatitis B Vaccinations at no charge to the employee.
- 6.1.3 Employees who decline Hepatitis B vaccinations, leaving themselves at risk for infection, must sign a "Hepatitis B Vaccine Declination" form (Attachment 1), if they choose not to be vaccinated annually (when re-offered to the individual). This form is co-signed by the supervisor.

6.2 Post-Exposure Evaluation and Follow-up

- 6.2.1 Employees who have had an exposure incident must receive a follow-up evaluation from the CSUS's emergency employee medical provider (currently UC Davis Medical Group during normal office hours and any emergency clinic

during no-office hours or weekends). This service is provided at no cost to the employee. Evaluations must be completed within 4 hours of the incident if anti-HIV therapy is to be fully effective.

6.2.2 The medical provider will determine what follow-up care is necessary. This may include, but is not limited to, HBV, HCV, or HIV testing, HBV vaccinations, counseling, or drug therapy (Anti-viral drugs).

6.2.3 Whenever possible a blood sample from the source should be brought to the emergency care facility for testing.

6.2.4 The incident must be documented on an "Accident Report" EH&S form 1 (Attachment 2).

6.3 Medical Records

6.3.1 Records for each employee with occupational exposure are kept for the duration of employment plus thirty (30) years. The CSUS contract health care provider (UC Davis Medical Group) maintains these records.

6.3.2 Medical records must be made available to the employee and/or to anyone with written consent of the employee. These records are not available to the employer.

7.0 Terms and Conditions

7.1 **Blood** - Human blood, human blood components, and products made from human blood.

7.2 **Bloodborne Pathogen** - Pathogenic organisms that are present in human blood and can cause disease in humans. These pathogens include, but are not limited to, Hepatitis B Virus (HBV), Hepatitis C Virus (HCV) and Human Immunodeficiency Virus (HIV).

7.3 **Contaminated** - the presence or the reasonably anticipated presence of blood or other potentially infectious materials on a surface or in or on an item.

7.4 **Exposure Incident** - A specific eye, mouth, or other mucous membrane; non-intact skin; or parenteral contact with blood or other potentially infectious materials that result from the performance of an employee's or student's duties.

7.5 **Occupational Exposure** - "Reasonably anticipated" skin, eye, mucous membrane, or parenteral contact with blood or other potentially infectious materials that may result from the performance of an employee's or student's duties.

7.6 Other Potentially Infectious Materials - Includes:

7.6.1 The following human body fluids: semen, vaginal secretions, cerebrospinal fluid, synovial fluid, pleural fluid, peritoneal fluid, amniotic fluid, saliva in dental procedures, any body fluid that is visibly contaminated with blood, and all body fluids in situations where it is difficult or impossible to differentiate between body fluids;

- 7.6.2 Any unfixed tissue or organ (other than intact skin) from a human (living or dead);
- 7.6.3 Blood, organs, or other tissues from experimental animals; or
- 7.6.4 Culture medium or other solutions.
- 7.7 **Regulated Waste** – "Regulated Waste" means waste that is any of the following:
 - 7.7.1 Liquid or semi-liquid blood or OPIM;
 - 7.7.2 Contaminated items that:
 - a) Contain liquid or semi-liquid blood, or are caked with dried blood or OPIM; and
 - b) Are capable of releasing these materials when handled or compressed.
 - 7.7.3 Contaminated sharps.
 - 7.7.4 Pathological and microbiological wastes containing blood or OPIM.
 - 7.7.5 Regulated Waste includes "medical waste" regulated by Health and Safety Code Sections 117600 through 118360.
- 7.8 **Sharps** - any object used or encountered in the industries covered by subsection (a) that can be reasonably anticipated to penetrate the skin or any other part of the body, and to result in an exposure incident, including, but not limited to, needle devices, scalpels, lancets, broken glass, broken capillary tubes, exposed ends of dental wires and dental knives, drills and burs.
- 7.9 **Universal Precautions** - An approach to infection control that assumes all human blood and other potentially infectious materials may carry HIV, HCV, HBV, and other bloodborne pathogens.
- 7.10 **Work Practice Controls**- Controls that reduce the likelihood of exposure by defining the manner in which a task is performed (e.g., prohibiting recapping of needles by a two-handed technique and use of patient-handling techniques).

8.0 Attachments

- 8.1 Hepatitis B Declination
- 8.2 Report of Incident or Accident form