University of Pittsburgh Safety Manual

EH&S Guideline Number: 05-017

Subject:

BIOHAZARDOUS SPILL CLEANUP

Effective Date 09/08/2014

Page 1 of 2

STANDARD OPERATING PROCEDURE (SOP) BIOLOGICAL MATERIAL SPILLS

Each Principal Investigator/laboratory director must develop specific spill cleanup methods tailored to the biological agent(s), quantities, and procedures being implemented in the lab, and ensure that the appropriate spill response material is immediately accessible. The following procedures shall be utilized as a basis for cleaning spills of biological materials including potentially infectious agents, bloodborne pathogens, and/or recombinant or synthetic nucleic acid molecules.

- 1. Minor Biological Spills
 - 1.1 A Minor Biological Spill is one that the laboratory staff is capable of handling safely without the assistance of EH&S or external emergency personnel. Minor biological spills involve low risk materials (*e.g.* BSL-1) or spills of a small volume of material inside a biological safety cabinet or other primary containment device.
 - 1.2 If the spill occurred inside a biological safety cabinet, close the sash and allow the cabinet to operate for at least 15 minutes before proceeding with the spill cleanup.
 - 1.3 Alert people in area of spill and secure the affected area.
 - 1.4 If any material has been splashed on you, follow the <u>Procedure for Exposure to</u> <u>Potentially Infectious Material</u>.
 - 1.5 Remove and disinfect any contaminated clothing.
 - 1.6 If you have not been exposed, don the appropriate personal protective equipment for the cleanup operation, which include at a minimum liquid barrier gloves, a combination of safety glasses or full face shield and surgical mask, and lab coat.
 - 1.7 Cover the spill with paper towels or other absorbent material to prevent further aerosol formation.
 - 1.8 Pour an approved disinfectant gently over the covered spill, working from the outside inwards.
 - 1.9 Wait at least 15 minutes for the disinfectant to penetrate through the contained spill and achieve the required contact time for disinfection.
 - 1.10 Do not utilize hands if glass or other sharps are involved in the spill. Use a tool (e.g. shovel or forceps) to remove the absorbent material and debris. Place all materials in a biohazard bag for autoclaving and subsequent disposal.
 - 1.11 Clean the original spill area with detergent.

University of Pittsburgh Safety Manual	EH&S Guideline Number: 05-017	
Subject: BIOHAZARDOUS SPILL CLEANUP	Effective Date 09/08/2014	Page 2 of 2

1.12 Notify your supervisor of the incident.

- 2. Major Biological Spill
 - 2.1 A Major Biological Spill is one that requires assistance of EH&S and/or external emergency personnel. Major Biological Spills involve releases of BSL-2 or higher materials outside of a biological safety cabinet, or spills of such materials that involve excessive splashing or aerosol formation.
 - 2.2. Alert personnel in the laboratory of the spill, and eliminate entrance of additional personnel via notification or posting of area.
 - 2.3 If any material has been splashed on you, if you have been exposed to the agent, or if any of your personal protective equipment has been breached, follow the <u>Procedure for</u> <u>Exposure to Potentially Infectious Material</u>.
 - 2.4 Remove and disinfect any contaminated clothing.
 - 2.5 Notify your supervisor and the Department of Environmental Health and Safety (EH&S) at 412-624-9505 of the incident.
 - 2.6 If the situation involves an imminently life-threatening injury or a release outside the building; or has other catastrophic potential, call 412-624-2121.
 - 2.7 Have persons knowledgeable of incident and laboratory available to assist EH&S and/or emergency personnel.