

Handling Human Materials Outside of a Biosafety Cabinet

This SOP applies to splash-or spray-generating procedures with human materials conducted outside of a biosafety cabinet (BSC). Although an aerosol containment device (e.g., BSC, chemical fume hood) is preferred, it is not required for procedures with human materials that do not create aerosols (e.g., pipetting). In the absence of an aerosol containment device, splash or spray protection is needed for the worker.

Procedure:

1. Conduct all work with open containers behind a splash shield
2. Decontaminate and clean spills as soon as they occur.
3. Decontaminate the work area, including the splash shield, using a hospital-approved disinfectant
4. Dispose of all waste as biohazard waste following approved waste handling SOPs
5. Remove and dispose of PPE
6. Wash hands with soap and water

Cautions & Considerations

- A face shield and surgical mask can be used in place of the splash shield
- Consult with EH&S Biosafety if it is unclear whether a procedure creates aerosols
- Handling human blood or tissue requires at least BSL2 containment
- Work with open containers outside of a biosafety cabinet is not permitted in BSL2+ facilities, under any circumstances
- If samples are known to contain airborne-transmissible pathogens, work must be conducted in a biosafety cabinet

Resources

- [Biosafety Manual](#)
- [BMBL 5th Edition](#)