

Safety requirements (SOP)

Chem. Sci. Bld. Room S012. Bio-Imaging Facility, Cell Culture Room

BSL-1/2 Standard Microbiological Practices as described in the [Laboratory Biosafety Manual](#) will be used when working with cell cultures and other potentially infectious materials. Special attention will be paid to the following:

1. All procedures involving the manipulation of cells, tissues or other potentially infectious materials will be performed in a certified biological safety cabinet and in a manner that minimizes splashing, spraying or aerosolization.
2. To avoid both personal contamination and contamination to cultures, a separate laboratory coat will be designated for use during cell and tissue culture procedures and will not be worn outside the tissue culture room. *Upon request users can be assigned storage place for gloves, lab-coats and other supplies.*
3. Before leaving the laboratory, all personal protective equipment shall be removed and placed in an appropriately designated place for storage, washing, decontamination or disposal.
4. Clothing exposed to potentially infectious materials shall be removed immediately or as soon as possible.
5. Hands shall be washed after removing PPE, after contact with potentially infectious materials and before leaving the work area/laboratory.
6. Used needles and other contaminated sharps must be discarded immediately after use into a sharps disposal container. Needles and other sharps shall not be sheared, bent, broken, recapped or re-sheathed unless required by a specific procedure and it can be demonstrated that there is no other feasible alternative.
7. Eating, drinking, smoking, applying cosmetics or lip balm or handling contact lenses is prohibited in laboratories.
8. Food and Drink shall not be eaten or stored in the Laboratory.
9. Mechanical devices are used for all pipetting and suctioning procedures (no mouth pipetting).

Personal Protective Equipment (PPE)

Laboratory Coat

Laboratory coats capable of preventing liquids from soaking through and contaminating an individual's clothing or skin shall be worn when working with cell cultures and other potentially infectious material. Disposable laboratory coats should be discarded as biohazardous waste when they become contaminated or soiled. Non-disposable laboratory coats that are soiled or contaminated should be chemically decontaminated with a 10% bleach solution or sterilized by autoclaving before removing them from the facility for laundering.

Gloves

1. Gloves made from nitrile or another appropriate material will be worn when working with cell and tissue cultures and other potentially infectious materials.
2. Never touch your eyes, nose, mouth or your face while wearing gloves.
3. To prevent the spread of contamination gloves must be removed before touching "clean" surfaces such as door knobs, computer keyboards, books, telephones/cell phones, etc. Similarly, gloves used for other laboratory activities should be removed and new clean pair put on before beginning work with cell and tissue cultures.
4. Do not wash or reuse disposable gloves.
5. Dispose of single use gloves properly. Gloves used when working with cell cultures and other potentially infectious materials are discarded as biological waste and autoclaved before their ultimate disposal as decontaminated medical/biological waste.
6. Gloves must be changed when they become contaminated, or if they are torn, punctured or otherwise compromised.
7. Gloves must be removed in a manner that prevents the unintentional transfer of hazardous or infectious material from the outside contaminated surfaces of the glove to unprotected skin or clothing.
8. Consider wearing two pair of gloves for particularly hazardous work as this permits removal of a contaminated outer glove with minimal risk of exposure.
9. Gloves must not be worn outside the laboratory. If a hazardous material or sensitive experiment needs to be transported to another laboratory, it should be placed into a secondary container that can be safely handled without gloves.

Eye and Face Protection

1. When used appropriately, a biological safety cabinet (BSC) will provide the necessary protection of the eyes and face from splashes or spray. For other procedures outside the BSC select eye and face protection that is appropriate to the task being performed.
2. Do not put on or remove face/eye protection while wearing gloves that are potentially contaminated.
3. Individuals who wear contact lenses in the laboratory should also wear eye protection. Contact lenses do not provide protection to the eyes. Foreign material splashed into the eye may become trapped under the contact lens and result in more serious injury.
4. If eye protection is deemed necessary in a laboratory, then an emergency eyewash station should also be available.
5. Contaminated eye and face protection must be disposed of with other contaminated laboratory waste or be cleaned and decontaminated with a 10% solution of household bleach or another suitable disinfectant before reuse.
6. When hazardous or infectious materials must be handled outside of a biosafety cabinet, or other containment device, eye and face protection must be worn if there is a possibility that the procedure may create a splash or spray of harmful material.