Biological Safety Cabinet Standard Operating Procedure

# Installation and General Maintenance

* Installation should be in a place where fluctuations in air supply and exhaust do not interfere with proper operations, located away from doors, windows that can be opened, heavily traveled laboratory areas, and other possible airflow disruptions.
* Vacuum lines should have liquid disinfectant traps.
* Do not use for chemicals, storage, etc. It is not a storage cabinet, and many chemicals can damage the HEPA filter.
* Prior to use, check the certification date. All biosafety cabinets in use are to be certified annually by an NSF-Certified Vendor. Annual certification of cabinet will help ensure that the HEPA filter works properly to decontaminate air in cabinet. A properly functioning biosafety cabinet should protect the researcher and the work done inside of it.
* Minimize foot traffic near BSC, by keeping the laboratory access restricted or notifying personnel ahead of time to avoid foot traffic near there while work is in progress.

# Operation of BSC

* Don PPE: Always wear lab coat/ gown, gloves, and safety glasses. Additionally, if respiratory protection is required, make sure it is operating properly prior to donning it in the laboratory.
* Turn off UV light (if included and does not have an automatic shut-off).
* Turn on the BSC to purge system (minimum of 5 minutes). While system is purging, decontaminate interior surfaces with an approved disinfectant (never stick head inside of cabinet- recommended to use a Swiffer or other long-handled cleaning device).
* Set up materials with a clean side and a dirty side, so you can work in a sweeping motion.
* Work at least 10 centimeters inside BSC- ideally working as far back as you can comfortably reach. Keep the front and rear grills open while working in the cabinet to ensure proper airflow.
* Keep the sharps and biohazard waste containers in cabinet (disinfect prior to cabinet removal).
* Never run any Bunsen burner or continuous flame device in the cabinet.

# Decontamination of BSC and Biohazardous Waste

* Using an appropriate disinfectant, decontaminate and remove ALL items from the interior work area.
* Decontaminate interior surfaces with an approved disinfectant (never stick head inside of cabinet- recommended to use a Swiffer or other long-handled cleaning device). Bleach is not recommended as it will corrode the stainless steel.
* If you have a UV light you choose to supplement after decontamination, turn on after decontaminating surface to run while the system purges for at least 5-10 minutes. Do not rely on the UV to decontaminate on its own.
* Turn off the blower when the purging has been completed.