DOHS Primary Barrier Program

Policy Modification for Gaseous Decontamination for Routine Certification

**Background:** The Division of Occupational Health and Safety (DOHS) policy on decontamination prior to certification had not been revised since 2008. At BSL-2, the DOHS Primary Barrier Program historically required a formaldehyde gas decontamination prior to certification for Type A BSCs that used certain biological agents including Vaccinia virus, Epstein-Barr virus, Mycobacterium tuberculosis, slow viruses/prions, and other Risk Group 2 agents used in large quantities. DOHS’ Technical Assistance Branch and Biorisk Management Branch performed a joint review of the current availability of EPA-registered disinfectants for biological agents used at Biosafety Level 2 (BSL-2).

**Risk Assessment Findings:** Given the availability of Environmental Protection Agency (EPA)-registered or Institutional Biosafety Committee-approved disinfectants for inactivating these agents, gaseous decontamination for routine certification is not required. Laboratory standard operating procedures dictate that a thorough surface disinfection be performed before and after all work in the BSC. Surface disinfection should now also be performed prior to the certification process and the BSC emptied of any non-essential equipment prior to certification.

**Policy Revision:** Beginning September 1, 2022, DOHS is eliminating the requirement to perform a gaseous/vapor-based decontamination, regardless of agent, for all BSC units outside of BSL-3 of BSL-4. End users will perform a full surface disinfection with the appropriate EPA-registered or validated disinfectant of their BSC prior to certification, including the lower work deck and catch tray under the grill. Non-essential equipment is removed prior to certification to ensure manufacturer recommended airflows. A surface wipe will be performed by the DOHS technician with 70% ethyl alcohol for cleaning purposes prior to beginning the certification. This cleaning practice is not a substitution for end user-performed disinfection. End users can contact their DOHS Safety Specialist for guidance in selecting the appropriate disinfectant and conducting an appropriate surface disinfection.

**Policy Scope:**

- Applies to all BSCs housed in any laboratory which is not posted as BSL-3 or BSL-4.
- Does not apply to BSL-3 and BSL-4 laboratories when a full area decontamination has been performed and validated.
- Applies equally to laboratories in clinical, animal, and laboratory research areas.
- Does not change the DOHS policy to conduct decontaminations prior to a BSC repair (such as a motor or filter change), move, or surplus.

**Questions:** Contact the DOHS Primary Barrier Program Manager, LT Joshua Greenberg, joshua.greenberg@nih.gov