

Participation of Tufts University at the National Biosafety Stewardship



Recent lapses in biosafety practices at Federal laboratories have prompted increased vigilance at the national level and outreach to the scientific community. These lapses included the mistaken shipment of live anthrax samples by a biodefense laboratory at the Centers for Disease Control and Prevention (CDC) in Atlanta; the discovery of 60-year-old vials of smallpox on the National Institutes of Health (NIH) campus in Maryland; and the accidental contamination at CDC of benign poultry flu samples with the deadly H5N1 avian influenza. As a result of these occurrences, The White House issued a memorandum entitled “Enhancing Biosafety and Biosecurity in the United States”, instructing all Federal Departments and Agencies that possess, use, or transfer human, animal, or plant infectious agents or toxins to perform a “Safety Stand Down.” In response to the Federal

memo, the National Institutes of Health (NIH) issued the Notice of National Biosafety Stewardship Month and Health and Safety Requirements for NIH Grantees. This notice asks all Institutional Biosafety Committees (IBC) to participate in an analysis of their institutional biosafety practices.

Biosafety stewardship includes the following goals:

1. To examine current policies and procedures for biosafety practices and oversight to ascertain whether they require modification to optimize their effectiveness.
2. To reinforce biosafety training of investigators, laboratory staff, and members of IBCs to include: Reexamining training materials and practices, updating materials as appropriate and ascertaining the appropriate frequency of training.
3. Conduct inventories of infectious agents and toxins in all laboratories (regardless of whether they involve recombinant or synthetic nucleic acids) to ensure that the institution has a record of which infectious agents and toxins are being utilized, has documentation that those materials are properly stored under the appropriate containment conditions, and has documentation that cites the party responsible for appropriate stewardship of the materials.

What is Tufts University doing to reach Biosafety stewardship goals?

Goal #1 and #2: Both the Tufts University IBC office and Environmental Health and Safety are involved with these two goals. All research conducted at Tufts University involving recombinant or synthetic nucleic acid molecules or the use of infectious agents must be registered with the IBC. In order to be active and compliant on an IBC registration, several requirements must be met. Please refer to <http://viceprovost.tufts.edu/ibc/training-personnel-requirements/>. Biosafety training is provided by Environmental Health and Safety (<http://publicsafety.tufts.edu/ehs/training/schedule/>). Various resources about the biosafety program, including information and manuals, are available online to help investigators and laboratory staff secure the proper safety procedures (<http://publicsafety.tufts.edu/ehs/biological-safety/>).

Goal #3: On October 15, 2014, the Office of the Vice Provost for Research sent an email to Principal Investigators asking them to perform a comprehensive audit of their freezers and/or liquid nitrogen tanks to generate a complete list of biological agents used and stored in their research area(s). Principal investigators were then asked to use this information to complete an online survey so that the Biosafety Office can create a comprehensive inventory of agents and locations. As February 2015, about 50% of principal investigators with IBC registrations have completed the survey and results are being analyzed by the Biosafety Office. Final survey results will be reported to our IBCs and Tufts community.

This is a great opportunity for Tufts University researchers to reinforce safety practices, ensure that all pathogens and toxins are accounted for, and to properly dispose of any samples that are no longer needed