

Biological Safety in Boston Research Laboratories

There are many biological research laboratories in the city of Boston. The Boston Public Health Commission (BPHC) regulates and oversees these laboratories. The BPHC is a national leader and has instituted the strongest local regulations in the nation.

Is biological research being conducted in Boston?

Yes, Boston is known worldwide as a leader in biological research. There is an array of research being conducted in these laboratories and the work is categorized to reflect the level of risk to individuals, the general public and the environment. Ranging from Biological Safety Levels (BSL) 1 – 4, each level has work practices and facility requirements. The level of control and oversight increases as the risk from the organism increases. More information may be found at <http://www.cdc.gov/OD/OHS/biosfty/bmbl4/bmbl4toc.htm>

How much research is there in Boston?

There are approximately 5,000 biological and/or chemistry laboratories at BSL1 and BSL2 in Boston. There are 11 laboratories currently conducting research at BSL3. There is no BSL4 research being conducted in the city of Boston.

How is biological research being regulated in Boston?

The Boston Public Health Commission has several regulations to ensure the appropriate level of oversight necessary to protect workers, the general public and the environment. BPHC Regulations include:

- [Recombinant DNA Technology: Use Regulations](#) (passed March 22, 1994). BSL 1- 3 laboratories conducting research with rDNA must obtain a permit to operate. In Boston, the use of rDNA requiring BSL4 containment is not permitted.
- All significant illness must be reported to the BPHC within 24 hours. Any laboratory worker who has been absent for two consecutive days must be examined by a licensed health care provider and report examination results in accordance with the regulation. [Disease Surveillance and Reporting Regulation](#) (passed March 30, 2004) with accompanying [Guidelines](#).
- [Biological Laboratory Regulation](#) (passed September 19, 2006) with accompanying [Guidelines](#) have been established to oversee BSL3 and BSL4 laboratory research in Boston. Permits must be obtained and stringent inspections are conducted by staff of the BPHC Biological Safety Office and the Infectious Disease Bureau.

If you have additional questions, please follow the link to the BPHC Biological Research Office at <http://www.bphc.org/programs/cib/environmentalhealth/biologicsafety> or call the Biological Safety Office at (617) 534-5965.