INFLUENZA LABORATORY RESEARCH SAFETY



The following is general information for those involved in the laboratory-based research of influenza. Contact occupational.health@cuanschutz.edu if you have any questions.

ABOUT INFLUENZA VIRUS

Influenza viruses are highly contagious and evolutionarily dynamic. Seasonal influenza viruses change year to year, necessitating a seasonal influenza vaccine. Infection with influenza can lead to a number of complications including bacterial pneumonia and ear or sinus infections. Individuals working with influenza virus in research are at elevated risk for exposure.

EXPOSURE TO INFLUENZA VIRUS

- Accidental exposure to influenza may occur through
 - o Inhalation of aerosolized virus
 - Mucous membranes or broken skin contact with infectious particles
 - Contact with infected animal materials (tissues, secretions, feces, etc.)

INFLUENZA VIRUS INFECTION

- · Commonly referred to as the "flu"
- Mild to severe illness
- Symptoms
 - Fever and/ or chills
 - Fatique
 - Headache and body aches
 - Sore throat
 - Cough
 - Stuffy nose
- Symptoms typically appear 1 to 4 days after exposure
- Treatment for influenza includes antivirals, pain medication, and rest

VACCINATION FOR INFLUENZA WORK



- For those involved in laboratory-based research of influenza, seasonal influenza vaccination is recommended annually
 - The CDC recommends seasonal flu vaccination in September or October

INFLUENZA EXPOSURE SAFETY

Follow proper exposure reporting protocols

- If you are injured on the job, promptly report the incident to your supervisor
 - Immediately call or email Occupational Health (303) 724-9145 during business hours
 - Outside of normal hours seek medical attention at emergency department or other healthcare provider
 - Fill out incident report for exposure to biological hazards
 - File a claim with University Risk Management
 - https://www.cu.edu/risk/file-claim
- Minor cuts and abrasions should be immediately cleansed with antibacterial soap
 - Protect injuries from exposure

Tell your physician you work with influenza

 Whenever you are ill, mention to your physician that you work with influenza virus

PPE FOR INFLUENZA



- Personal protective equipment (PPE) for working with influenza virus
 - Laboratory coat, gloves; safety goggles; surgical mask
- Do not reuse PPE used for work with biohazards
 - Dispose of all PPE as biohazardous waste
- Always wash your hands after removing gloves and after handling biohazards

CONTROLS FOR INFLUENZA

- Additional protections for procedures likely to produce droplets or aerosols
 - Utilize biosafety cabinets
 - Additional precautions such as centrifuge safety cups, sealed centrifuge rotors

For more information, refer to the Occupational Health website: https://research.cuanschutz.edu/ehs/home/divisions/occupational-health or contact Occupational Health at occupational.health@cuanschutz.edu



Updated: 3/21/2025

Sources

- 1. Centers for Disease Control and Prevention. Influenza. August 13, 2024. Accessed December 13, 2024. www.cdc.gov/flu/about/index.html.
- 2. Cornell University. Influenza A Biological Agent Reference Sheet (BARS). August 26, 2024. Accessed February 13, 2025. ehs.cornell.edu/research-safety/biosafety-biosacurity/biological-safety-manuals-and-other-documents/bars-other/influenza-a-virus.