

Staff Wellness

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BLOOD BODY FLUID EXPOSURE (BBFE) INFORMATION

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Experiencing a blood or body fluid exposure can be a stressful and overwhelming experience. It is important to act quickly to reduce the risk of transmission of bloodborne pathogens and to seek medical care as soon as possible. This information resource provides guidance on what to do after a blood or body fluid exposure, including recommended medical and psychological care, steps to prevent transmission to others, and other resources. It is important to remember that timely intervention and follow-up care can help to reduce the risk of infection and to promote overall health and well-being.

WHAT TO DO NEXT IF YOU HAVE EXPERIENCED A BLOOD AND BODY FLUID EXPOSURE

- 1. Ensure that the University's <u>Post-exposure Protocol for Biological Hazards</u> as well as any lab or work specific post-exposure protocols are followed.
- Follow the instructions provided by your healthcare provider for any post-exposure prophylaxis (PEP) treatment or testing that may be required. Make sure to attend any follow-up appointments and take any medications as directed.
- 3. Monitor yourself for any symptoms of infection, such as fever, fatigue, nausea, or yellowing of the skin or eyes. If you notice any of these symptoms, contact your healthcare provider.
- 4. Get appropriate vaccinations for exposure to blood and body fluids, such as Hepatitis B if you have not already done so, as this can greatly reduce your risk of contracting the virus in the future.
- 5. Experiencing a blood and body fluid exposure can be stressful and you may experience a range of feelings and emotion. Consider talking to someone about how your feeling and seeking support as needed.

RISK OF BLOOD BORNE INFECTIONS FROM A BLOOD OR BODY FLUID EXPOSURE

The three primary viral infections that can occur from a blood or body fluid exposure include Hepatitis B, Hepatitis C, and HIV. Risk factors for acquiring infection include the immune status of the exposed individual, viral load and other risk factors of the source of exposure (*e.g. individuals with multiple sexual partners, men* who have sex with men, sexual partner or close family member infected with a blood borne virus, history of injection drug use, immigration from an endemic country (prevalence $\geq 8\%$), history of incarceration, and history of blood transfusions prior to 1970).

Hepatitis B: The risk of acquiring hepatitis B from a percutaneous (needlestick or sharp object) exposure to hepatitis B-positive **blood** is estimated to be **6-30%**. The risk from a **mucous membrane** exposure (splashes to the eye, nose, or mouth) is estimated to be **0.1-5%**. Hepatitis B immunization (received prior to exposure) is nearly 100% effective at preventing transmission of the virus.

Hepatitis C: The risk of acquiring hepatitis C from a percutaneous exposure to hepatitis C-positive **blood** is estimated to be **1.8%**. The risk from a **mucous membrane** exposure is estimated to be less than **0.1%**.

HIV: The risk of acquiring HIV from a **percutaneous** exposure to HIV-positive blood is estimated to be **0.3%**. The risk from a **mucous membrane** exposure is estimated to be less **than 0.1%**.

POST-EXPOSURE PROPHYLAXIS (PEP) FOR BLOOD AND BODY FLUID EXPOSURE

Hepatitis B: PEP with hepatitis B immune globulin (HBIG) and hepatitis B vaccine within 24 hours of exposure is estimated to be **85-95%** effective in preventing hepatitis B infection. The effectiveness decreases with delay in starting PEP.

Hepatitis C: There is no specific PEP available for hepatitis C, but early treatment with direct-acting antivirals (DAAs) has been shown to be highly effective in preventing chronic hepatitis C infection after an exposure.

HIV: PEP with a combination of **antiretroviral drugs** within 72 hours of exposure is estimated to be **81%** effective in preventing HIV infection. The effectiveness decreases with delay in starting PEP.

PREVENTING SPREAD OF INFECTION TO OTHERS

It may take up to **six months** of testing following an exposure to know whether an infection has been acquired. During the testing period, **it may be possible to spread infection to others**. It is important to take precautions during this possible infectious period to prevent spreading a possible infection onto others.

Here are some general recommendations to follow to prevent transmission to others:

- Avoid sharing personal items such as razors or toothbrushes.
- Practice safe sex, including using barrier methods such as condoms.
- Cover open wounds or sores with bandages or dressings.
- Avoid donating blood, plasma, organs, or tissues during the possible infectious window.
- Inform healthcare providers, including dentists and other medical personnel, about the exposure and the possibility of infectious transmission.

It is important to note that the recommended precautions may vary depending on the specific type of exposure and the potential for transmission of infectious agents. It is recommended to consult with a healthcare provider or a qualified medical professional to determine the appropriate precautions to take during the possible infectious window.

INFORMATION ON THE RECOMMENDED LAB OR SEROLOGICAL TESTING FOLLOWING A BLOOD AND BODY FLUID EXPOSURE

You may be sent for more blood work following your exposure by Staff Wellness or another healthcare provider. Bloodwork type and frequency may vary based on your immune status and other risk factors. Testing that **may** be required:

- Baseline (HIV, Hepatitis C, Hepatitis B)
- 4-6 weeks after exposure (HIV, Hepatitis C, Hepatitis B)
- 12 weeks after exposure (HIV)
- 6 months after exposure (HIV, Hepatitis B)

Again, these may vary based on the situation and healthcare provider assessment.

CARING FOR YOUR MENTAL HEALTH FOLLOWING AN EXPOSURE

Experiencing a blood and body fluid exposure can be a stressful and traumatic event that can impact your psychological health. It is normal to feel a range of emotions such as fear, anxiety, anger, and distress after an exposure incident. It is important to take care of yourself both physically and mentally to promote healing and recovery.

If you are experiencing psychological distress after a blood and body fluid exposure, it is important to seek support from a mental health professional or an employee and family assistance program (EFAP) provider such as TELUS Health. EFAP providers offer confidential counseling services to employees and their families to support their emotional well-being and mental health.

Here are some tips to help you cope with the psychological impact of a blood and body fluid exposure:

- Seek support: Reach out to a trusted friend or family member, a mental health professional, or an EFAP provider to talk about your feelings and emotions.
- **Practice self-care:** Take care of your physical health by eating nutritious foods, getting enough sleep, and exercising regularly. Engage in activities that you enjoy and that help you relax, such as reading, listening to music, or practicing mindfulness.
- Manage stress: Use stress-management techniques such as deep breathing, meditation, or yoga to help you cope with the stress and anxiety.
- Learn about the infection risks and prevention: Educate yourself on the risks of blood-borne infections and ways to prevent them to help alleviate fears and anxiety.

QUESTIONS AND ADDITIONAL RESOURCES

If you have any questions about your exposure or any of the information included here, please contact the Occupational Health Nurse by confidential e-mail (<u>ohn@ucalgary.ca</u>) or though the main Staff Wellness contact number: 403.220.2918.

Counselling and other support:

Employee and Family Assistance Program (TELUS HEALTH): <u>https://www.ucalgary.ca/hr/wellness/wellbeing-</u> worklife/employee-and-family-assistance-plan

Student Wellness Services: https://www.ucalgary.ca/wellness-services

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