

## BLOODBORNE PATHOGENS

### *Infection Control Awareness*



Bloodborne pathogens (BBPs) are infectious microorganisms present in blood or other potentially infectious materials (OPIM) that can cause disease in humans.

#### TYPES OF BBPS:

The most common types of pathogens include:

- **Hepatitis B Virus (HBV)** – It is the most infectious BBP and can survive outside the body for up to a week. It causes inflammation of the liver. Symptoms may include flu-like symptoms, abdominal pain, jaundice, dark urine, and clay-colored stools.
- **Hepatitis C Virus (HCV)** – It causes liver disease. The virus does not survive well outside the body. Treatments are available but no vaccine. Symptoms may include abdominal pain, jaundice, fatigue, appetite loss, nausea, dark-colored urine, and pale stools.
- **Human Immunodeficiency virus (HIV)** – It attacks the body's immune system and causes AIDS. There is no cure or vaccine available and can sometimes take up to 10 years or more to develop symptoms. It can cause flu-like symptoms, night sweats or fever, weight loss, fatigue, swollen glands, and AIDS-related illnesses.

While not all blood or OPIM carry these harmful pathogens, it's impossible to know for sure so we must take universal precautions to prevent the spread of BBPs.

#### HOW BBPS ARE SPREAD

BBPs can be spread a variety of ways, but the most common transmission modes in the workplace include:

- Exposure through broken skin
- Exposure through mucous membranes (eyes, nose, mouth)
- Punctures by sharp objects or needle sticks
- When cleaning up blood or OPIM
- When providing first aid

#### PREVENTING THE SPREAD

The key to prevention is understanding when you may be exposed to BBPs. There are some job classifications where most employees have an occupational exposure and there are other job classifications where only some employees may have an exposure, depending on the task.

Examples of job classifications where **most** employees have an occupational exposure:

- Firefighters
- EMTs / Paramedics
- Lifeguards
- Healthcare

Examples of job classifications where **some** employees may have an occupational exposure:

- Janitorial
- Maintenance
- Wastewater operations
- Parks and recreation workers



## PREVENTING THE SPREAD

Talk to your supervisor to identify tasks and operations where you may be exposed to BBPs. Always assume blood and OPIM is contaminated and take the following universal precautions when exposed to BBPs in the workplace:

- **Personal Protective Equipment** - Always protect your hands, face, and body when working around sources of BBPs. This may include wearing the appropriate personal protective equipment (PPE) such as disposable nitrile, rubber, or latex gloves, goggles, face shields, and protective clothing.

- **Handling Sharps** - If handling sharps that may be contaminated, try not to handle with bare hands. Use tongs, pliers, or any other means to protect your hands and dispose in a sharps container.



- **Handwashing** - Immediately after exposure thoroughly wash your hands with soap and water. If you can not immediately wash your hands, avoid touching your eyes and mouth until your hands have been washed.

## DECONTAMINATION

If you are asked to clean-up a blood/OPIM spill, be sure to wear your required PPE, spray the area with an EPA-rated germicide, and allow to stand for 10 minutes after the initial clean-up. Dispose of wipes or towels used in the clean-up process in bio-hazard containers.

Remember to review the germicide's safety data sheet for any additional PPE requirements and safe handling requirements.

## HEPATITIS B VACCINATIONS

If it has been determined that your job classification has an occupational exposure to BBPs, your employer is required to offer you the vaccination at no cost to you.

You may refuse your employer's offer, but if you do, you must sign a declination form. If you change your mind at a later date and decide you do want the vaccination, your employer must provide it to you at no cost.

Receiving the Hepatitis B vaccination is one way you can protect yourself from acquiring the hepatitis B virus. This vaccination is considered to be safe and effective in controlling the virus.

The vaccination is a series of three shots administered over a six-month period. There may be some minor side effects for the shot, such as soreness, swelling, or redness at the injection site, but the long-term benefits certainly outweigh the short-term discomfort.