Suspect Monkeypox Infection Prevention Guidance

General Information:

Current Outbreak:

Monkeypox is a rare disease caused by infection with the monkeypox virus (MPV). The Centers for Disease Control and Prevention (CDC) are tracking multiple cases of MPV infections that have been reported in several countries that do not normally report MPV, including the United States.

Signs and Symptoms:

MPV symptoms usually start 1-2 weeks after exposure to the virus and can include fever, chills, malaise, headache, muscle aches, lymphadenopathy, and rash. Lymph nodes may swell in the neck (cervical & submandibular), armpits (axillary), or groin (inguinal) and occur on both sides of the body or just one. The rash often involves vesicles or pustules that are deep-seated, firm or hard, and well-circumscribed; the lesions may umbilicate or become confluent and progress over time to scabs. These lesions can appear on the face, inside the mouth, and on other parts of the body, like the hands, feet, chest, genitals, or anus. The illness typically lasts 2-4 weeks.

Transmission (see also CDC’s How It Spreads):

MPV can spread from person-to-person through direct contact with the infectious rash, scabs, or body fluids. It also can be spread by respiratory secretions during prolonged, face-to-face contact, or during intimate physical contact, such as kissing, cuddling, or sex. Touching items (e.g., clothing, linen, or towels) that previously touched the infectious rash or body fluids is another way monkeypox spreads. Monkeypox can spread from the time symptoms start until the rash has fully healed and a fresh layer of skin has formed.

Suspect Cases:

It is important to note that anyone can contract and spread monkeypox, but early data from this outbreak suggest that men who have sex with men make up a high number of initial cases. Due to the often atypical presentation of MPV in this outbreak, we are encouraging clinicians to have a high level of suspicion for MPV, especially in persons with reported risk factors within the three weeks before onset, including travel history to areas with MPV cases or contact with a symptomatic person.

Countermeasures:

MPV and smallpox viruses are genetically similar, which means that antiviral drugs and vaccines developed to protect against smallpox may be used to prevent and treat MPV infections. Antivirals, such as tecovirimat, may be recommended for people who are more likely to get severely ill, like patients with weakened immune systems. Providers should consult their local health department or MDHHS at 517-335-8165 to coordinate procurement of vaccines and antivirals.
If Patient Presents Requesting Testing OR with Symptoms/Rash Suspicious for Monkeypox:
• Screen patient using “Beaumont Health Emerging Diseases Preparedness Plan – MONKEYPOX” flowsheet and take next steps accordingly

If Preparing for an Outpatient Visit to an Emergency Center for Swabbing:
• Confirm the hospital to which the patient is reporting
• Confirm when the patient will arrive to the hospital and note vehicle make and model
• Provided the patient with the Emergency Center direct number to call upon arrival
• Remind the patient to wear a face mask and cover rash/lesions
• Notify the EC Charge Nurse of the patient’s anticipated arrival time
• Notify on call infection prevention. If afterhours or on the weekend, page the clinical infection preventionist on-call.
• Notify the onsite laboratory of the patient’s anticipated arrival time to arrange courier services

Upon Patient’s Arrival to EC:
• Screen patient using “Beaumont Health Emerging Diseases Preparedness Plan – MONKEYPOX” flowsheet and take next steps accordingly
• If patient meets epidemiological criteria + high suspicion for monkeypox complete the following:
  • Apply mask on patient (if not already wearing one)
  • Place patient (with mask) immediately into single patient room, preferably with a private bathroom, with door closed. Use negative pressure room (if available). Special air handling is not required
  • Place Contact+Enhanced Respiratory isolation sign on the patient’s door
  • Notify Physician/Practitioner/Provider verbally that a Suspected Emerging Disease case has arrived
  • Notify site Infection Prevention to help coordinate management and public health reporting
  • Don/doff appropriate PPE, utilizing proper protocol (gown, gloves, fit-tested N-95 respirator, eye protection)
  • Order Enhanced Respiratory and Contact Precautions
  • Cover rash/lesions (if not already completed)
  • Complete other unit-specific assessment and documentation
  • Limit personnel/staff entry and maintain staff entry room log (personnel name(s), date, time of entry, time of exit)
  • Notify the onsite laboratory of patient arrival to make arrangements for courier services

Required PPE:
• All HCP interacting with the patient require PPE for Contact/Enhanced Respiratory Precautions
  • Isolation Gown, Gloves, Eye Protection, and fitted N-95 Respirator
    ▪ Eye Protection: Goggles or a face shield that covers the front and sides of the face
    ▪ HCP should have been fit tested for their N-95 within the past 12 months
• Don PPE prior to the estimated time of patient arrival
• Perform an N-95 seal check prior to entering the patient’s room
Specimen and Photo Collection:

- Preferred specimen collection instructions:
  - Specimen Type: Swab of skin lesion in universal viral transport media (UVTM)
  - Supplies: UVTM kit (sterile polyester swab and round bottom tube with media)
  - Specimen Volume: 1 sterile swab
  1. Swab or brush skin lesion vigorously with 1 sterile swab.
  2. Place swab in VTM.
  3. Containers must be labeled with the source of the lesion
  4. The specimens should be double bagged, and bags completely sealed and labeled as suspect monkeypox.
  5. Specimens may be walked to the lab or transported through the pneumatic tube system if double bagged.

- Alternative specimen collection instructions:
  - Specimen Type: Dry swab of skin lesion
  - Supplies: sterile FLOQSwab and sterile urine container or conical tube
  - Specimen Volume: 2 Dry swabs in same 1 sterile tube
  1. Swab or brush skin lesion vigorously with 2 sterile dry swabs.
  2. Place both swabs in a single sterile, empty container (no gel, liquid, foam, or cotton).
  3. Containers must be labeled with the source of the lesion
  4. The specimens should be double bagged, and bags completely sealed and labeled as suspect monkeypox.
  5. Specimens may be walked to the lab or transported through the pneumatic tube system if double bagged.

- Refer to BH lab bulletin and lab test directory for more details
- Refer to page five of this document for collection information, including photos
- The specimens should be double bagged, and bags completely sealed and labeled
  - Place the specimens in the first bag and ensure the bag is completely sealed
  - Wipe the first bag down with disinfectant wipes
  - Place the first bag into a second bag and ensure the second bag is complete sealed
  - Label second bag “Suspect Monkeypox”
  - Place a laboratory order for Monkeypox (Orthopoxvirus) DNA, PCR.
  - The state requests photos from each site where lesions are present for CDC outbreak investigation
    - The Photo Release Form must be signed and completed by the patient and uploaded into EPIC

Transporting Specimens to the On-Site Laboratory:

- Specimens may be walked to the on-site laboratory or sent through the pneumatic tube system if double bagged.
- Notify laboratory/micro that the specimens are for transport to BH Receiving Laboratory
  - BH Receiving Laboratory will be Dearborn for South sites and Royal Oak for North sites
Environmental Infection Control:

- During in-patient care strictly follow Precautions, using PPE and following routine waste management
  - For soiled laundry follow standard practices, avoiding contact with lesion material that may be present on the laundry. Soiled laundry should be gently and promptly contained in an appropriate laundry bag and **never be shaken or handled in manner that may disperse infectious material**
  - After the patient leaves, standard cleaning and disinfection procedures should be performed using a hospital approved disinfectant (i.e., Purple PDI Wipes, Orange Top PDI Wipes, or Oxivir)
    - **Wet cleaning methods are preferred.**
      - Activities such as dry dusting, sweeping, or vacuuming should be avoided
    - Follow the manufacturer’s directions for concentration, contact time, and care and handling.
      - Products with Emerging Viral Pathogens claims may be found on EPA’s List Q.

Notifications:

- Consult Site Infection Prevention & Epidemiology Department

Waste Management:

- Waste management (i.e., handling, storage, treatment, and disposal of soiled PPE, patient dressings, etc.) should be performed in accordance with U.S. Department of Transportation (DOT) Hazardous Materials Regulations (HMR; 49 CFR parts 171-180.)
  - During the ongoing 2022 multi-national outbreak of **West African clade** monkeypox, if a clinician or their public health authority determine that a patient does not have known epidemiological risk for the **Congo Basin clade** of monkeypox virus (e.g. history of travel to the Democratic Republic of the Congo, the Republic of Congo, the Central African Republic, Cameroon, or Gabon in the prior 21 days) it is appropriate to manage the patient’s waste as **Regulated Medical Waste**.
    - However, if epidemiological risk factors indicate a risk for Congo Basin clade monkeypox virus, waste should be managed as a **Category A** infectious substance pending clade confirmation, and while local and state public health authorities are consulted.
  - Required waste management practices and classification (i.e., assignment to a category under the HMR) currently differ depending on the monkeypox virus clade (strain). The DOT indicates that waste contaminated with the **West African clade** of monkeypox virus should be managed as UN3291 Regulated Medical Waste (RMW) in the same manner as other potentially infectious medical waste (e.g. soiled dressings, contaminated sharps). The Congo Basin clade is classified as Category A under the HMR and should be managed accordingly. See the DOT website for more information.
    - Facilities should also comply with state and local regulations for handling, storage, treatment, and disposal of waste, including RMW.
  - Pursuant to 49 CFR 173.134(a)(1)(i), classification of waste as a Category A substance for transportation must be based on the known medical history or symptoms of the patient, endemic local conditions, or professional judgment concerning the individual circumstances of patient.
Collect specimens from each site where lesions are present

**Preferred Specimen:**

**Specimen Type:** Swab of skin lesion in universal viral transport media (UVTM)

**Supplies:** UVTM kit (sterile polyester swab and round bottom tube with media)

**Specimen Volume:** 1 sterile swab

**Collection Instructions:**
1. Swab or brush skin lesion vigorously with 1 sterile swab.
2. Place swab in VTM.
3. Containers must be labeled with the source of the lesion.
4. The specimens should be double bagged, and bags completely sealed and labeled.

**Alternative Specimen:**

**Specimen Type:** Dry swab of skin lesion

**Supplies:** sterile FLOQSwab and sterile urine container or conical tube

**Specimen Volume:** 2 Dry swabs in same 1 sterile tube

**Collection Instructions:**
1. Swab or brush skin lesion vigorously with 2 sterile dry swabs.
2. Place both swabs in a single sterile, empty container (no gel, liquid, foam, or cotton).
3. Containers must be labeled with the source of the lesion.
4. The specimens should be double bagged, and bags completely sealed and labeled.
Resources:

Resources on the provider intranet site

Information on infection prevention and control in healthcare settings is provided on the CDC website [Infection Control: Healthcare Settings | Monkeypox | Poxvirus | CDC](https://www.cdc.gov/poxvirus/monkeypox/clinicians/index.html) CDC is currently reviewing this information to consider the need for updates.

[https://www.cdc.gov/poxvirus/monkeypox/clinicians/index.html](https://www.cdc.gov/poxvirus/monkeypox/clinicians/index.html)

[https://www.cdc.gov/poxvirus/monkeypox/response/2022/hcp/index.html](https://www.cdc.gov/poxvirus/monkeypox/response/2022/hcp/index.html)

[https://www.cdc.gov/poxvirus/monkeypox/clinicians/infection-control-healthcare.html](https://www.cdc.gov/poxvirus/monkeypox/clinicians/infection-control-healthcare.html)

[https://www.cdc.gov/poxvirus/monkeypox/response/2022/index.html](https://www.cdc.gov/poxvirus/monkeypox/response/2022/index.html)

Beaumont site Infection Prevention & Epidemiology:

- Dearborn: (313) 593-7000
- Farmington Hills: (947) 521-8315
- Grosse Pointe: (313) 473-1715
- Royal Oak: (248) 992-2847
- Taylor: (313) 295-5000
- Trenton: (734) 671-3800
- Troy: (248) 955-1679
- Wayne: (734) 467-4000