

**Monkeypox Clinical Management Tool**

**Summary**

Monkeypox (MPX) is a viral infection that is manifested mainly by skin lesions and usually preceded by nonspecific symptoms of infection such as fever, headache, malaise, myalgias, and lymphadenopathy. However, recent experience with cases in North America suggests that genital/anal/perineal lesions can be the first manifestation and some patients have no systemic symptoms or systemic symptoms that follow the skin lesions. A high index of suspicion is necessary in the right clinical and epidemiological setting. Antiviral treatment is not often required. Post-exposure prophylaxis may be warranted as directed by Public Health.

**When seeing a patient with genital sores and/or other skin lesions, who identifies as at potential risk for MPX:**

- Ask the patient to put on a medical mask if not already wearing one
- Put the patient in a private room with the door closed
- Wear an isolation gown, gloves, N95 respirator, and eye protection
- Wear dedicated footwear that can be decontaminated; boot covers are not recommended

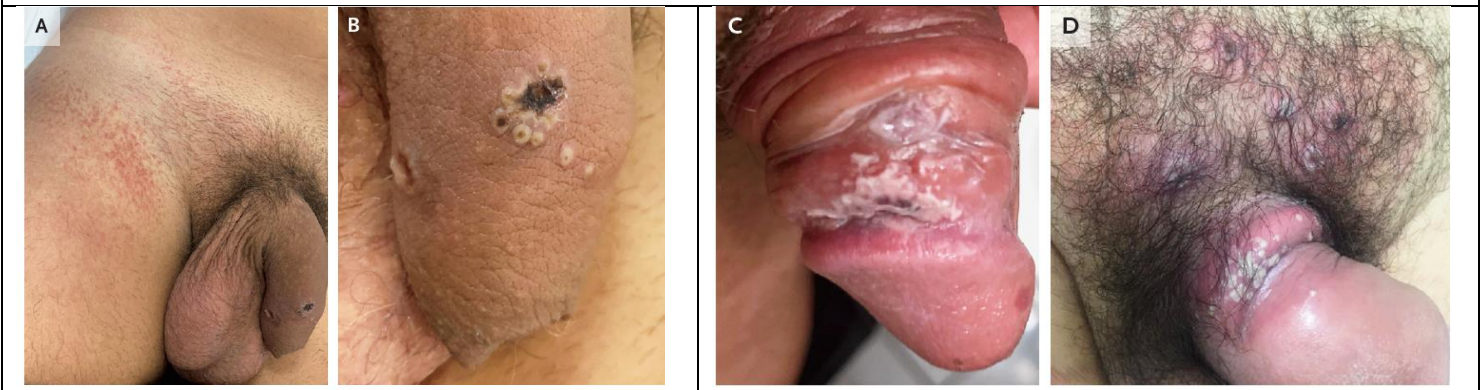
***Making the diagnosis:***

<p><u>Clinical features</u></p> <ul style="list-style-type: none"> <li><input type="checkbox"/> Fever</li> <li><input type="checkbox"/> Malaise</li> <li><input type="checkbox"/> Myalgias</li> <li><input type="checkbox"/> Headache</li> <li><input type="checkbox"/> Lymphadenopathy</li> <li><input type="checkbox"/> Skin &amp;/or mucous membrane lesions (may be itchy or painful)             <ul style="list-style-type: none"> <li><input type="checkbox"/> macules</li> <li><input type="checkbox"/> papules</li> <li><input type="checkbox"/> vesicles</li> <li><input type="checkbox"/> pustules</li> <li><input type="checkbox"/> crusts</li> </ul> </li> </ul>	<p><u>Key points:</u> This outbreak has some unique features compared to historical MPX infection:</p> <ul style="list-style-type: none"> <li>• Historically, the skin manifestations have been preceded by systemic symptoms, but with the current outbreak the skin manifestations have not always been preceded by other symptoms or have been completely absent</li> <li>• Historically, the skin lesions have all been at the same stage of development, but with the current outbreak some individuals have had skin lesions at different stages at the same time. The lesions are often umbilicated (like molluscum).</li> <li>• Historically, the lesions have been mainly on the face and extremities (including palms and soles) and less often on the genitals, but with the current outbreak some individuals have had only or primarily genital lesions</li> <li>• Given the above, the diagnosis may be missed and the individual diagnosed with syphilis or herpes simplex</li> <li>• The patient could have 2 infections: MPX and a concurrent sexually transmitted infection</li> </ul>
<p><u>Asses Who is at Risk – exposure within the 3 weeks prior to onset of symptoms</u></p> <ul style="list-style-type: none"> <li><input type="checkbox"/> Close contact with someone known to have MPX</li> <li><input type="checkbox"/> Close contact with someone whose health status is unknown to them             <ul style="list-style-type: none"> <li><input type="checkbox"/> In an endemic area</li> <li><input type="checkbox"/> From an outbreak country or province</li> </ul> </li> </ul>	<p><u>Key points:</u> While anyone who has close sexual or non-sexual contact with someone with MPX can acquire this infection, the current outbreak, to date, has been linked primarily to sexual contact in men who have sex with men, particularly men who have had multiple and/or anonymous partners.</p>

***Physical exam***

<ul style="list-style-type: none"> <li><input type="checkbox"/> Skin &amp;/or mucous membrane lesions (may be painful)             <ul style="list-style-type: none"> <li><input type="checkbox"/> macules</li> <li><input type="checkbox"/> papules</li> <li><input type="checkbox"/> vesicles</li> <li><input type="checkbox"/> pustules</li> <li><input type="checkbox"/> crusts</li> </ul> </li> </ul>	<p>Skin Lesions</p> 
------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------	----------------------------------------------------------------------------------------------------------

Examples of genital lesions- most commonly genital, perineal, or perianal



2022 Jun 15. doi: 10.1056/NEJMicm220689 3. Antinori A, et al .Euro Surveill. 2022 Jun;27(22):2200421. doi: 10.2807/1560-7917.ES.2022.27.22.2200421.

**Laboratory testing**

MPX is detected using PCR on suspect lesion

- **Collect TWO separate swabs in separate viral transport media:** use the swabs included in viral transport media to rub the base of ulcerated lesions vigorously (like doing an HSV swab). Place in viral transport media. If the vesicle or pustule is intact can unroof first, then swab base of lesion
- If biopsy is taken or crusts removed place in a sterile urine container
- Swabbing multiple suspect lesions can increase diagnostic yield
- *Serology is not available at this time*
- *NP swab can be used in patients who present before the appearance of skin lesions*
- **Notify the microbiologist on call if collecting suspect MPX samples (902-473-2220)**

- **Key points:** Co-infections are possible and other more common infections that should be considered include herpes simplex, varicella zoster, hand-foot-mouth (enterovirus), syphilis, chancroid, and lymphogranuloma venereum (LCV) and HIV. **Two swabs are needed to ensure enough specimen is available for MPX and other viral pathogens**
- Specimens that should be collected on a suspected case of MPX include:
  - swab of lesion for MPX in viral transport media
  - swab lesion for: HSV/VZV or enterovirus in separate viral transport media
  - chlamydia on a chlamydia swab
  - chancroid on a bacterial swab
  - blood for syphilis and HIV serology
- MPX specimen to be shipped to laboratory using your courier that follows NSH policy in accordance with TDG regulations, but it must include TU 0886 on the outer packaging. (see [Temporary certificates for more details](#))

**Managing the patient:**

- Management of mild to moderate cases includes any type of antipyretic in adults and analgesics. Specific antiviral treatment is available for severe infections.
- Instruct the patient to isolate at home, wear a mask, keep lesions covered, refrain from sexual encounters, avoid contact with household members and pets
- Provide handout on home management and potential complications (link)

**Key points:** Individuals at high risk for complications, including immunosuppressed patients, patients with HIV, those who are pregnant, and children, should be referred to the infectious diseases physician on call.

**Waste disposal in clinic:**

- Full guidance on management of contaminated waste is under development
- For clinic guidance see attached documents developed by NS Health Infection Prevention and Control (IPAC)–
- [FAQs sheet](#) for Team Members
- For a snapshot of IPAC measures for suspect/confirmed case of Monkeypox: **[“IPAC At a Glance for Monkeypox- Inpatient Care”](#)** and **[“IPAC at a Glance for Monkeypox - Ambulatory/Primary Care”](#)**.

**Notify Public Health and Infectious Disease immediately (call 472-2220 and ask for Public Health nurse and ID on call) with any suspect cases**

**CME on the Canadian outbreak can be seen on You tube:** <https://www.youtube.com/watch?v=8cwme53DR5U>