As cities rev up for summer festivals, Pride celebrations, or other large events, public health officials have warned clinicians that the season could also bring a resurgence in mpox cases. In May, the US Centers for Disease Control and Prevention (CDC) issued a health alert cautioning that community transmission is ongoing. Case in point: during a recent 3-week period, the Chicago Department of Public Health received reports of 1 probable and 12 confirmed mpox cases. By mid-May, the case count had risen to 21, Demetre Daskalakis, MD, MPH, deputy director of the White House national mpox response, said during a CDC press briefing.

“The cluster of cases in Chicago is not entirely unexpected,” Boghuma Titanji, MD, PhD, an infectious diseases physician at Emory University in Atlanta, said in an interview. Although vaccination contributed to a steady decline in new cases since the August 2022 peak of about 460 per day, Daskalakis said most of the recent Chicago cases occurred among people who previously received 1 or both vaccine doses. It’s not clear why those infections occurred after vaccination, but Daskalakis suggested that immunity may wane over time. “Several ongoing studies are looking at this issue, and we will be examining data from these studies closely for clues,” he noted.

In the meantime, experts warn that without renewed prevention efforts, especially vaccination, the US could be headed for an mpox resurgence. They've also urged clinicians to review information on symptoms, specimen collection, laboratory procedures, and treatment. “Mpox will not fade into obscurity,” Titanji said.

In the differential diagnosis

Since the global mpox outbreak began in the spring of 2022, more than 30 000 cases have been diagnosed in the US and 42 deaths have occurred. Infections have disproportionately affected gay and bisexual men, other men who have sex with men, and transgender people. Because mpox symptoms can resemble other conditions such as chickenpox or some sexually transmitted diseases, Jason Zucker, MD, an infectious diseases physician at Columbia University in New York, advised clinicians to consider mpox when patients present with a rash even if they've been vaccinated or previously infected.

“Out of sight, out of mind. People have forgotten about mpox,” Zucker said in an interview, urging clinicians to keep mpox in their differential diagnosis. “If you see a penile lesion, you might think about syphilis and not mpox, but you can’t tell what it is just by looking, and it’s easy to be fooled.” Mpox may also cause ophthalmic disease, including eyelid or periorbital skin lesions, blepharoconjunctivitis, and keratitis.

A thorough patient history and physical examination are the basis of an accurate diagnosis. In particular, obtaining a detailed sexual history is essential for any patient with suspected mpox, which spreads through close, sustained physical contact. During the current global outbreak, mpox has been almost exclusively associated with sexual contact. By carefully examining the skin and the oral, genital, and anal mucosa, clinicians can identify lesions that the patient may not have noticed.

Zucker advocates for a “sex positive” approach to patient care. “Be available and offer resources,” he explained. For example, some patients he has seen for mpox care at a sexual health clinic have brought along a partner who may not have been linked to medical care. In contrast, Zucker has heard from patients who presented to urgent care centers and other sites where mpox-associated stigma negatively affected their care.

Although the focus may be on mpox, clinicians shouldn’t forget about recommending routine vaccines, testing for other sexually transmitted infections, and preexposure prophylaxis to prevent HIV infection for patients who need those services.

The Importance of Vaccination

JYNNEOS, a vaccine approved to prevent mpox, is recommended for people at high risk of exposure. Although vaccine supply was an issue last summer, Zucker said adequate supplies are available this year. The vaccine should be given in 2 doses 28 days...
In addition to preventing infection, JYNNEOS can be given as postexposure prophylaxis to people with known or presumed exposure to the mpox virus. Vaccination should occur as soon as possible, ideally within 4 days of exposure. Administration up to 14 days after exposure may still provide some protection.

Titanji highlighted the importance of partnerships for successful vaccination efforts. "Primary care providers know their patients and know who might be eligible for vaccination, and [they can] provide proactive outreach and a gentle reminder," she said. Local health departments are essential for large-scale vaccination; community groups play important roles, too.

Treatement Considerations
Most patients with mpox have mild disease and can be treated with supportive care and symptom management. Antivirals generally are reserved for those who are hospitalized or at risk of complications, Zucker explained. Severe pain of the genitals, anus, or oropharynx sometimes leads to hospitalization.

Although rare, some patients may develop severe, potentially fatal disease, especially those with advanced or untreated HIV infection. Patients with severe symptoms can receive the antiviral medication tecovirimat (TPOXX) by participating in a clinical trial or through emergency use access. If a clinician intends to prescribe tecovirimat, Zucker encourages enrollment in the Study of Tecovirimat for Human Monkeypox Virus (STOMP), which aims to determine the drug’s efficacy. "Treatment of mpox is currently based on limited data and expert opinion," explained Zucker, who is a vice chair and site principal investigator of the study.

STOMP includes a placebo-controlled, randomized group, and an open-label option for individuals with severe disease or those who decline randomization. Enrollment is remote, allowing anyone who is eligible to join. Patients who aren’t eligible for STOMP or choose not to participate can receive oral tecovirimat from the Strategic National Stockpile under the CDC’s expanded access investigational new drug protocol if they meet eligibility requirements.

Looking Ahead
As the US works to prevent mpox outbreaks this summer and beyond, the virus remains endemic in several African nations. On May 12, the World Health Organization declared an end to the mpox global health emergency. Yet some experts have said they worry that ending the emergency could mean neglect of countries most in need of resources. Titanji, who is originally from Cameroon, is among them.

"What did the declaration do for African nations?" she asked. "There is no vaccine, no tecovirimat," she said, noting that even post-exposure vaccine can only be obtained through a clinical trial in places such as the Democratic Republic of Congo and Nigeria. She urged a broader view on health and vaccine equity, noting that another global emergency "will happen again," and that next time mpox could take the form of the more severe Congo Basin variant, now known as clade I.

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Conflict of Interest Disclosures: Dr Titanji reported receiving grant funding from the Emory Center for AIDS Research and honoraria for speaking engagements from the Infectious Diseases Society of America, the American Academy of Pediatrics, Harvard University, Mount Sinai School of Medicine, ISMIE, and GSK for a shingles public awareness campaign; and being a paid consultant for Critica, of which she is the chief scientific advisor. Dr Zucker reported receiving funding from the National Institutes of Health for STOMP and HIV prevention research and from the CDC as the assistant medical director of the New York City STD/HIV Prevention Training Center.

Note: Source references are available through embedded hyperlinks in the article text online.