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Letter to the Editor

**Skin lesions due to monkeypox virus
in a well-controlled HIV patient**

**Lesiones cutáneas por virus de la viruela del mono
en un paciente VIH bien controlado**

Dear Editor,

Monkeypox virus is a zoonotic smallpox-like infection initially diagnosed in Africa (Democratic Republic of the Congo) late twentieth century¹ however non-endemic outbreaks outside Africa, mainly but not exclusively identified amongst men who have sex with men (MSM), have emerged in recent years, without established travel links to endemic areas, so it is important to identify suspected cases and stop transmission.^{1–3}

A Caucasian MSM 48-year-old HIV-seropositive man presented to the emergency service with not-umbilicated pustular lesions in his face and upper limbs in the setting of a sexual intercourse eighteen days ago. Fifteen days after the unprotected anal-sex he developed the lesions accompanied by cough and low-grade-fever. Three months ago, he was also diagnosed of primary syphilis, receiving a single dose of 2.4 million units of benzathine penicillin G administered intramuscularly. Human immunodeficiency virus infection (HIV) had been established 3 years earlier and treated with combined elvitegravir/cobicistat/emtricitabine/tenofovir alafenamide, having an undetectable viral load. He was unvaccinated for smallpox. A physical examination revealed well-circumscribed, bright yellow pustules and vesicles on his face and upper limbs, with mild cervical lymphadenopathy (Fig. 1). Blood test was not remarkable. A serological test for chickenpox was requested, which was negative for IgM and positive for IgG. PCR tests of cytomegalovirus and herpes were also negative. A monkeypox polymerase chain reaction (PCR) from an open pustule was performed, obtaining a positive laboratory-confirmed result. Patient was isolated for 5 weeks and immediately notified to the public health services. He received symptomatic treatment with acetaminophen.

Human monkeypox is an emerging global health threat. Monkeypox is an uncommon zoonosis caused by an Orthopoxvirus recognized as a distinct infection in humans by the 1970s in the Democratic Republic of the Congo,^{1–3} and rarely seen outside of West and Central Africa.¹ Recently, few emerging outbreaks have been reported in developed non-endemic countries.^{1,2} Monkeypox virus can be transmitted to humans through direct contact (sexual or skin-to-skin), respiratory droplets, and virus-contaminated fomites.^{1,4,5} Monkeypox is often a self-limiting infection. Mean incubation period ranges from 1 to 4 weeks. An initial febrile prodrome is usually accompanied by asthenia, cutaneous lesions and generalized lymphadenopathy (prior or concomitant with the skin lesions). Lymphadenopathy could help in the differential



Fig. 1. Monkeypox-related facial pustules and vesicles in a well-controlled HIV patient.

diagnosis with smallpox and chickenpox.^{1,5} Fever often declines between 1 or 3 days after rash onset. Typical skin lesions include macules, papules, vesicles and pustules, sometimes healing with scar. A wide spectrum of complications has been described (e.g., diarrhea, keratitis, pneumonia), and severe complications were found to be more common among unvaccinated than vaccinated patients.^{1,3,5} Case fatality rates vary substantially, ranging from 1% to 10% in the Congo Basin, and less than 3% in Nigeria and developed countries.^{1,3} To date, mortality rate seems to be slightly higher in children, immunocompromised and HIV-patients. Cross-reactivity between orthopoxviruses might be a substantial barrier to serological diagnosis of human monkeypox, especially in patients vaccinated to smallpox.⁵ PCR is the preferred laboratory test given its accuracy and sensitivity.^{1,5} Optimal diagnostic samples for monkeypox are vesicles, pustules, and dry crusts. A specific monkeypox vaccine is not available yet,^{1,5} but data suggest that prior immunization with smallpox vaccine may have a protective effect against monkeypox virus and may improve clinical prognosis. In most cases of monkeypox supportive care is typically sufficient while antivirals such as tecovirimat, brincidofovir, cidofovir and immune globulin can be considered in severe disease or compromised areas.^{1,3,5}

Authors' contributions

All authors have contributed to this research.

Funding

None declared.

Conflicts of interest

None declared.

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Francisco Javier Melgosa Ramos^{a,*}, Marina Parra Civera^b,
Jesús José Pons Fuster^c

^a Department of Dermatology,
University Hospital Doctor Peset, Valencia, Spain

^b Department of Microbiology,
University Hospital Doctor Peset, Valencia, Spain

^c Department of Emergency Services,
University Hospital Doctor Peset, Valencia, Spain

* Corresponding author.

E-mail address: javimelgo2017@gmail.com (F.J. Melgosa Ramos).