

Chikungunya: Is it more common than we thought?

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Madam, Chikungunya fever is an arthropod-borne virus (arbovirus). It was first described in 1952, following an outbreak on the Makonde Plateau, along the border of Tanganyika and Mozambique. The word "chikungunya" was derived from the Kimakonde language, meaning 'to become contorted'. This refers to the 'stooped' appearance of those suffering with joint pain.^{1,2}

Chikungunya is transmitted by mosquitoes, *Aedes aegypti* and *Aedes albopictus*. It is manifested worldwide and has been identified in Asia, Africa, Europe and the Americas, in more than 40 countries worldwide which includes Pakistan as well as India.²

Chikungunya affects all age groups, and both genders are equally affected. On the onset of the disease, arthralgias, myalgias, and skin rash are noted along with fever usually ranging from 102-105°F. Headache, sore throat, abdominal discomfort and constipation may also be evident. The fever is of short duration and lasts only 3-4 days and the joint pain resolves in about 4 months to about 3-5 years but complications can arise if it goes from an acute to a chronic stage.¹

Pakistan is a tropical country with progressively harsher summers each year. The rising temperature has paved way for many arboviral diseases to arise especially dengue and malaria and as of recent times, Chikungunya. The current outbreaks have been said to have started in the second week of November of last year with an estimate of over 30,000 patients but only recently has it been confirmed by the World Health Organization as a problematic outbreak in Pakistan.³ A total of 803 cases have been reported since 19 December 2016 in the Sindh Province, including 29 cases in various parts of Karachi. Of the 92 samples sent to the National Institute of Health for testing, 71 were reported to be Chikungunya.⁴

What is even worse is that the origin of the disease has similar signs to that of dengue. Due to this reason, it may be possible that many diseases which are classified as the dengue fever

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may, in fact, be Chikungunya in disguise. Chikungunya and dengue are both transmitted by the *Aedes* mosquitoes and both present as acute febrile illnesses characterised by fever, myalgia and lethargy. Chikungunya is rarely fatal, but dengue has to be diagnosed early so that it does not develop further complications.⁵

Steps should be taken to differentially diagnose both diseases. A clinical picture of Chikungunya is a patient who presents with an acute onset of fever with chills for 3 to 5 days with multiple joint pain, particularly in the extremities, for weeks or months. In its chronic stage, it is characterized by fever, asthenia and exacerbation of arthralgia and stiffness. It may also manifest inflammatory polyarthritis and subacute bursitis.¹ An accurate history should be taken especially travel history. The presentation should be treated as dengue before an accurate differential diagnosis is made so that it is confirmed that the disease is in fact, Chikungunya. Diagnostic tests such as RT-PCR and IgM immunoassay should be done. Most of the effort should be placed on prevention of mosquito bites like using nets, mosquito repellants and protective clothing in order to shield oneself from the bites.

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