

There are seventeen species of birds that are the known carriers of and transmit West Nile Encephalitis (WNE) to humans via the Culex, Aedes, and Anopheles mosquitoes. WNE first causes symptomatic or asymptomatic illness in wild migratory birds that act as viral replication factories. Wild birds infected with WNE contain high titers of the virus and remain viremic for 1-2 weeks, making them ideal hosts to perpetuate the disease. Mosquitoes transmit WNE from birds to humans. Horses, dogs, and other small animals may harbor WNE after being bitten; however, they are inefficient transmitters because viral titers are relatively low, and WNE viremia is short-lived in these animals. In the US the initial cases of WNE were first identified in the greater New York area, but cases have now occurred in western states. Wild birds with WNE virus have also been identified in parts of Canada. WNE is common in the Middle East, Asia, and Africa. WNE seropositivity of children in Egypt is approximately 50%. WNE is the most common cause of viral aseptic meningitis or encephalitis in patients presenting to emergency departments in Cairo. Both sexes are affected equally and it is more frequent in elderly patients.