

West Nile Virus

Human Health Risk	L
Ecological Risk	M - L
Socioeconomic Risk	L

West Nile virus is transmitted by mosquitoes and found throughout Africa, the Middle East, West Asia and Europe. In 1999, West Nile virus was identified in North America for the first time, during an epidemic in the New York metropolitan area. The virus has emerged as a significant threat to human, equine, and wild bird health in New Jersey and the entire northeastern United States. All human cases in the United States have resulted from mosquitoes biting humans after feeding on infected birds. There is no risk of human-to-human transmission of West Nile virus.

What's at risk?

Everyone in the state is potentially exposed to the bite of an infectious mosquito. The elderly are at increased risk of developing severe illness as a result of infection. Horses are at relatively higher risk than humans, and susceptible wild bird populations include crows, blue jays, hawks and falcons.

What are the human health impacts in New Jersey?

Infection with West Nile virus can cause a form of encephalitis or meningitis. Most infections produce no symptoms in people, or are mild or moderate. More severe infections may lead to death. In New Jersey in 2000, there were six confirmed cases of severe West Nile virus, from five counties including one death. The fatality rate is less than 1%.

What are the ecological impacts in New Jersey?

In 1999, West Nile virus was detected in birds from 16 of 21 New Jersey counties, with the majority in the north central area of the state. In 2000, 496 crows tested positive in similar areas, and infected mosquito pools were detected in Bergen County.

What are the socioeconomic impacts in New Jersey?

Socioeconomic risks from present incidences of West Nile virus were judged to be low, but it is impossible to predict the course that the disease will take over the next five years. It is clear that the virus is still spreading throughout the northeastern U.S.

What's being done?

New Jersey has set up monitoring systems and mosquito control operations to track and manage the threat.