



MOSQUITO and VECTOR MANAGEMENT DISTRICT of Santa Barbara County

DISEASE SURVEILLANCE REPORT

March 2018

West Nile Virus Activity

No West Nile virus (WNV) activity has been detected in Santa Barbara County in 2018 to date. There has been a total of three WNV positive dead birds in two California counties: two in Santa Clara County and one in San Mateo County.

Statistics for California WNV activity can be found online at www.westnile.ca.gov. National statistics for WNV can be found at the National Centers for Disease Control and Prevention website at www.cdc.gov.

St. Louis Encephalitis Virus Activity

No St. Louis encephalitis (SLE) virus activity has been detected in California in 2018 to date. SLE activity has never been confirmed in Santa Barbara County. Most SLE cases occur in hot inland areas.

Zika Virus and Invasive *Aedes* Mosquito Update

The Santa Barbara County Public Health Department has reported a total of 10 travel related cases of Zika infection in Santa Barbara County to date, three in calendar year 2017. No invasive *Aedes* sp. mosquitoes have been found in Santa Barbara County to date. Overall the number of Zika cases were down throughout the Americas in 2017. There have been 640 total imported cases of Zika virus into 37 California counties as of March 2, 2018 (508 in 2015-16, 127 in 2017-18), but no local mosquito transmitted cases. In Mexico in 2017, the highest number of Zika cases occurred in central Mexico as opposed to southern Mexico in 2016. Locally acquired cases of Zika have been reported as far north as Ensenada, Baja California, Mexico. Local mosquito transmitted cases of Zika infections have also been reported in southern Florida and southern Texas. Invasive yellow fever mosquitoes (*Aedes aegypti*) and Asian tiger mosquitoes (*Aedes albopictus*) have now been found in 197 cities and communities (39 with both) in 14 California counties. No *Ae aegypti* have been detected in Alameda and San Mateo counties in two years, so those counties are no longer considered to be infested. A third species, the Australian backyard mosquito (*Aedes notoscriptus*) appears to be getting established in parts of Los Angeles County and a single specimen has been found in Orange County. *Ae. aegypti* and *Ae. albopictus* can transmit dengue, chikungunya, and yellow fever viruses as well as Zika virus. *Ae. notoscriptus* is an excellent vector of dog heartworm.

Zika virus information can be found at <https://www.cdph.ca.gov/Programs/CID/DCDC/Pages/Zika.aspx> and at <http://www.cdc.gov/zika/>.

Sentinel Chicken Flocks

The District obtained 28 new chickens from Demler Egg Ranch in San Jacinto, California on February 15, 2018. They have replaced the two year old chickens in the Goleta and Mission Hills flocks along with the WNV positive flock at Solvang. Also the flock at the U.S. Forest Service Ranger Station on Paradise Road has been re-established. The chickens at the Carpinteria Sanitary District will serve for another season. The 2018 sentinel chicken sampling season will begin the week of April 1, 2018.

Samples of blood are collected from each chicken on strips of filter paper and dried overnight. They are then submitted to the California Department of Public Health Vector-Borne Disease Laboratory at Richmond, California where they are analyzed for antibodies to WNV and other mosquito-borne encephalitis viruses.

