#### California Arbovirus Surveillance Bulletin #2

Week 15 Friday, April 14, 2017



## Weekly Update

#### Humans

No human infections have been reported in 2017.

### **Dead Birds**

No positive dead birds were reported this week. To date this year, three birds from three counties have tested positive for West Nile virus (WNV). At this time last year, 13 WNV positive birds had been reported from four counties.

The WNV and Dead Bird Hotline will begin taking live calls starting April 17. The public can report dead birds via the hotline (877-WNV-BIRD) or website (www.westnile.ca.gov).

### **Mosquito Pools**

No positive mosquito pools have been reported in 2017. At this time last year, one WNV positive mosquito pool had been reported from Los Angeles County.

### **Sentinel Chickens**

No seroconversions have been reported in 2017.

2016 & 2017 YTD West Nile Virus Comparisons					
	2016	2017			
Total # Dead Bird Reports	1,024	797			
# Positive Counties	4	3			
# Human Cases	0	0			
# Positive Dead Birds / # Tested	13 / 140	3 / 80			
# Positive Mosquito Pools / # Tested	1/ 1,613	0 / 2,866			
# Seroconversions / # Tested	0 / 133	0 / 64			

Website Information: For updated information on WNV in California, please visit the California WNV website, <a href="https://www.westnile.ca.gov">www.westnile.ca.gov</a>, or the California Vectorborne Disease Surveillance System website, <a href="https://www.calsurv.org">www.calsurv.org</a>. For national information on WNV and other arboviruses, please visit the CDC website, <a href="https://www.cdc.gov">www.cdc.gov</a>, and the USGS website, <a href="https://www.westnilemaps.usgs.gov">www.westnilemaps.usgs.gov</a>

# California Arbovirus Surveillance Bulletin #2

Week 15 Friday, April 14, 2017

YTD WNV Activity by Element and County, 2017							
County	Humans Dead Birds Mosquito Pools Sentinel Chickens						
Orange		1					
San Diego		1					
San Mateo		1					
Totals	0	3	0	0			

# **TESTING SUMMARIES**

### Humans

		WNV	SLE	WEE
Human Cases	Week	0	0	0
	YTD	0	0	0

Dead Birds Chickens

		Number Tested	WNV Positive
Dead Birds	Week	2	0
	YTD	80	3

		Number Tested	WNV Positive	SLEV Positive	WEEV Positive
Chicken Sera	Week	0	0	0	0
	YTD	64	0	0	0

# Mosquitoes

		Positive / Total Tested						
		WNV SLEV WEEV CHIK DENV ZIKA						
Mosquito Pools	Week	0 / 668	0 / 643	0 / 576	0/2	0/2	0/2	
	YTD	0 / 2,866	0 / 2,803	0 / 2,707	0 / 287	0 / 287	0 / 287	

#### California Arbovirus Surveillance Bulletin #2

Week 15 Friday, April 14, 2017

# **Test Protocols**

#### **Humans:**

Specimens are tested by local laboratories with an IgM or IgG immunofluorescent assay (IFA) and/or an IgM enzyme immunoassay (EIA). Specimens with inconclusive results are forwarded to the California Department of Public Health Viral and Rickettsial Disease Laboratory (VRDL) for further testing or confirmation.

#### **Dead Birds**

Oral swab samples from corvids are collected onto RNA preservation cards and tested by the UC Davis Center for Vectorborne Diseases (CVEC) for West Nile virus by the singleplex RT-PCR Taqman assay and confirmed with a second primer set. Some local agencies test birds using the RAMP© test or conduct RT-PCR on tissue samples.

#### **Sentinel Chickens:**

Dried blood spot specimens from sentinel chickens are submitted to the California Department of Public Health Vector-Borne Disease Laboratory and tested for the presence of antibodies to West Nile, western equine encephalomyelitis, and St. Louis encephalitis viruses by EIA. Positive samples are confirmed by IFA, western-blot, or PRNT.

#### **Mosquito Pools:**

Mosquito pools are submitted to CVEC and screened for West Nile, western equine encephalomyelitis, and St. Louis encephalitis viral RNA using a Taqman multiplex RT-PCR. CVEC no longer performs confirmatory testing on PCR-positive pools of *Cx. tarsalis* and *Cx. quinquefasciatus* but will continue to confirm multiplex PCR-positive results for other mosquito species using singleplex RT-PCR.

Prepared by the Vector-Borne Disease Section (Infectious Diseases Branch), California Department of Public Health, 850 Marina Bay Parkway, Richmond, CA 94804. Questions concerning this bulletin should be addressed to Tina Feiszli by phone (510) 412-6253 or email: <a href="mailto:tina.feiszli@cdph.ca.gov">tina.feiszli@cdph.ca.gov</a>.