



## Florida Arbovirus Surveillance Week 7: February 11-17, 2024

Arbovirus surveillance in Florida includes endemic mosquito-borne viruses such as West Nile virus (WNV), Eastern equine encephalitis virus (EEEV), and St. Louis encephalitis virus (SLEV), as well as exotic viruses such as dengue virus (DENV), chikungunya virus (CHIKV), Zika virus (ZIKV) and California encephalitis group viruses (CEV). Malaria, a parasitic mosquito-borne disease is also included. During the period of February 11-17, 2024, the following arboviral activity was recorded in Florida.

This report contains information for 2024 only. Please visit the following website for up-to-date 2023 numbers as final data cleaning occurs: [FloridaHealth.gov/diseases-and-conditions/mosquito-borne-diseases/surveillance.html](https://www.floridahealth.gov/diseases-and-conditions/mosquito-borne-diseases/surveillance.html).

**WNV activity:** No human cases of WNV infection were reported this week. No horses with WNV infection were reported this week. No sentinel chickens tested positive for antibodies to WNV this week. No mosquito pools tested positive for WNV this week. In 2024, positive samples from five sentinel chickens have been reported from two counties.

**SLEV activity:** No human cases of SLEV infection were reported this week. No sentinel chickens tested positive for antibodies to SLEV this week. In 2024, no cases of SLEV have been reported.

**EEEV activity:** No human cases of EEEV infection were reported this week. One horse with EEEV infection was reported this week in Marion County. No sentinel chickens tested positive for antibodies to EEEV this week. In 2024, positive samples from three sentinel chickens, one horse, and one emu have been reported from three counties.

**International Travel-Associated Dengue:** Five cases of dengue were reported this week in persons that had international travel. In 2024, 39 travel-associated dengue cases have been reported.

**Dengue Cases Acquired in Florida:** No cases of locally acquired dengue were reported this week. In 2024, two cases of locally acquired dengue have been reported from two counties.

**International Travel-Associated Chikungunya Fever Cases:** No cases of chikungunya fever were reported this week in persons that had international travel. In 2024, no cases of travel-associated chikungunya fever have been reported.

**Chikungunya Fever Cases Acquired in Florida:** No cases of locally acquired chikungunya fever were reported this week. In 2024, no cases of locally acquired chikungunya fever have been reported.

**International Travel-Associated Zika Fever Cases:** No cases of Zika fever were reported this week in persons that had international travel. In 2024, no travel-associated Zika fever cases have been reported.

**Zika Fever Cases Acquired in Florida:** No cases of locally acquired Zika fever were reported this week. In 2024, no cases of locally acquired Zika fever have been reported.

**Advisories/Alerts:** Palm Beach, Pasco, and Walton counties are currently under a mosquito-borne illness advisory. Broward, Escambia, Hardee, and Miami-Dade counties are currently under a mosquito-borne illness alert. No other counties are currently under a mosquito-borne illness advisory or alert.

There are currently multiple travel health notices from the Centers for Disease Control and Prevention related to mosquito-borne diseases.

Dengue			Western Equine Encephalitis	Oropouche	Chikungunya		Yellow Fever
Africa and the Middle East	Americas	Asia and the Pacific Islands	South America	South America	Africa	Asia	Africa
Burkina Faso	Brazil	Bangladesh	Argentina	Brazil	Burkina Faso	Timor-Leste	Nigeria
Cape Verde	Colombia	Cambodia					
Côte d'Ivoire	Costa Rica	Malaysia					
Ethiopia	French Guiana	Sri Lanka					
Mali	Guadeloupe						
Mauritius	Guatemala						
Senegal	Haiti						
Sudan	Jamaica						
	Martinique						
	Mexico						
	Nicaragua						
	Panama						
	Paraguay						
	Saint Barthelemy						
	Saint Martin						
	Turks and Caicos						

Level 1 Travel Health Notice, Level 2 Travel Health Alert: [wwwnc.cdc.gov/travel/notices](http://wwwnc.cdc.gov/travel/notices).

For a map of arboviral disease activity in the United States visit: <https://www.cdc.gov/fight-the-bite/at-risk/index.html>.

### 2024 Human Case Summary

**2024 International Travel-Associated Dengue Cases:** Thirty-nine cases with onset in 2024 have been reported in individuals with travel history to a dengue-endemic area in the two weeks prior to onset. Counties reporting cases were: Brevard, Broward (3), Collier, Duval, Lee (3), Miami-Dade (27), Orange, Pasco, and Volusia. Two cases were reported in non-Florida residents. One case met the criteria for severe dengue. In 2024, 35 cases of dengue reported in Florida have been serotyped by PCR. Please see the table below for a breakdown of cases by country of origin and serotype.

Country of Exposure	DENV-1	DENV-2	DENV-3	DENV-4	DENV-2/DENV-3	Unknown	Total
Brazil	2						2
Colombia			2				2
Cuba			14	2	1	3	20
Dominican Republic			4				4
Jamaica		1					1
Mexico	2	1	2				5
Paraguay		1					1
Puerto Rico		1					1
Saint Barthelemy		2				1	3
<b>Total</b>	<b>4</b>	<b>6</b>	<b>22</b>	<b>2</b>	<b>1</b>	<b>4</b>	<b>39</b>

**2024 Dengue Cases Acquired in Florida:** In 2024, two cases of locally acquired dengue have been reported in Miami-Dade and Pasco counties with onset in January. Both cases have been serotyped by PCR. Please see the table below for a breakdown of cases by county and serotype.

County of Exposure	DENV-3	Total
Miami-Dade	1	1
Pasco	1	1
<b>Total</b>	<b>2</b>	<b>2</b>

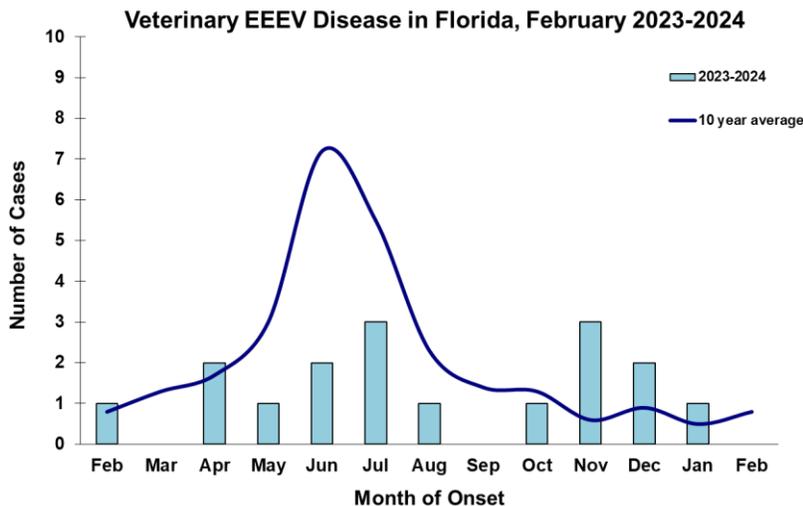
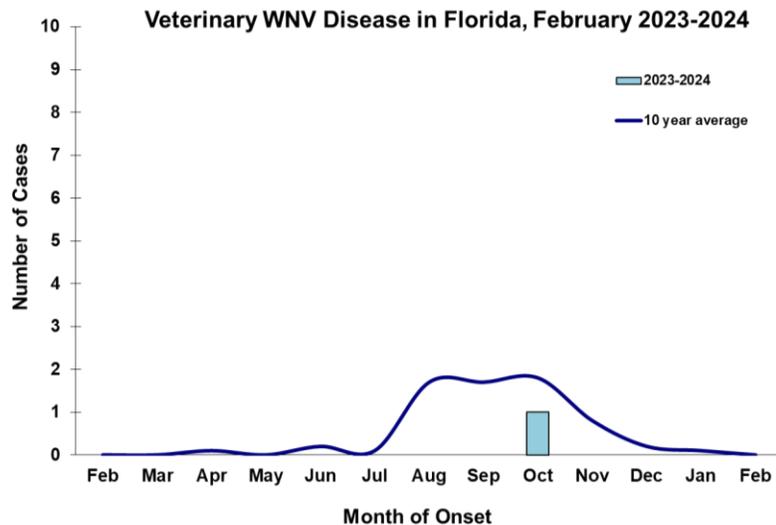
**2024 International Travel-Associated Malaria Cases:** Nine cases of malaria with onset in 2024 have been reported in individuals with a travel history to a malaria-endemic area. Counties reporting cases were: Broward (2), Collier, Lee, Orange (3), Osceola, and Pinellas. Please see the table below for a breakdown of cases by country of origin and *Plasmodium* species.

Country of Exposure	<i>Plasmodium falciparum</i>	<i>Plasmodium vivax</i>	Total
Angola	1		1
Cameroon	1		1
Gabon	1		1
Mexico		1	1
Nigeria	3		3
Multiple countries		2	2
<b>Total</b>	<b>6</b>	<b>3</b>	<b>9</b>

### Veterinary Cases\*\*

\*\*Veterinary cases are reported by date of onset. Only mammalian veterinary cases are included in the graphs.

One horse with EEEV infection was reported this week in Marion County.



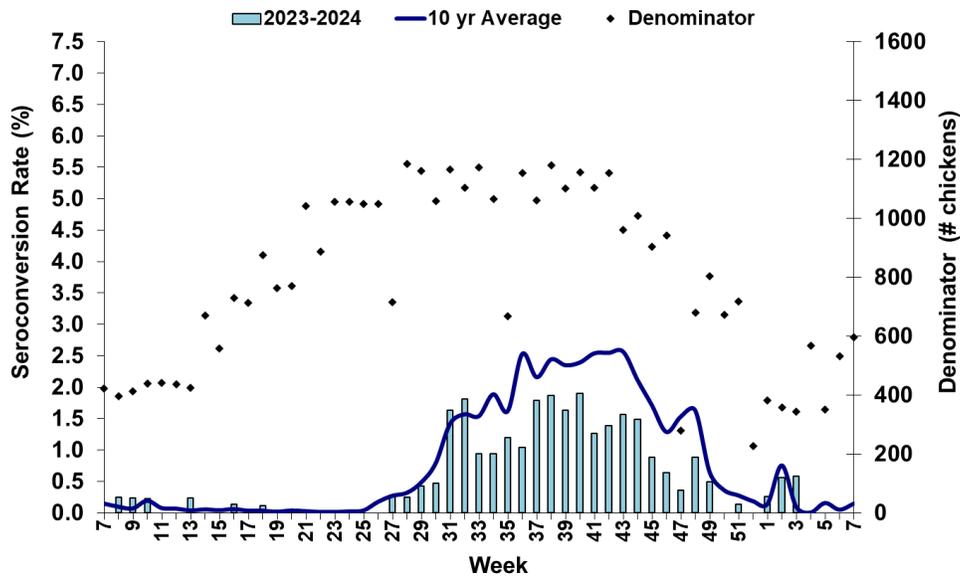
## Sentinel Chickens

The table below is for the reporting of confirmatory laboratory results from this week. Some of the samples were collected at earlier dates. The date of collection is recorded for samples collected on that day along with the total number of positives and the corresponding seroconversion rate for the week the sample was collected.

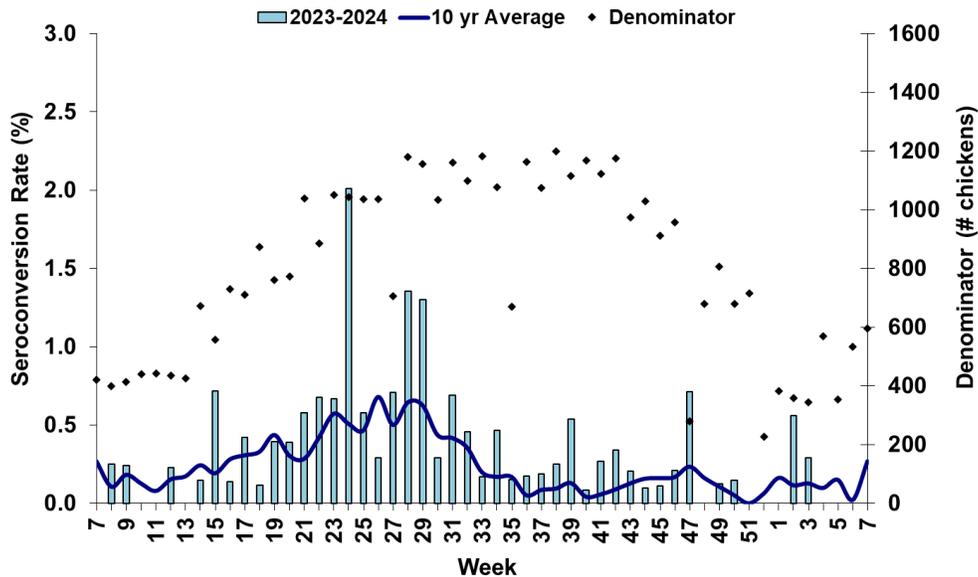
No sentinel chickens tested positive for antibodies to SLEV, WNV, EEEV or HJV this week.

County	Collection Date	Seroconversion Rates (%)						County Totals	
		Flavi	SLEV	WNV	Alpha	EEEV	HJV	Collection Week	YTD

**Sentinel Seroconversions to WNV in Florida, 2023–2024**



**Sentinel Seroconversions to EEEV in Florida, 2023–2024**



## Mosquito Pools

No mosquito pools tested positive for WNV or EEEV this week.

County	Collection Date	Result	Species	County YTD

## Dead Birds

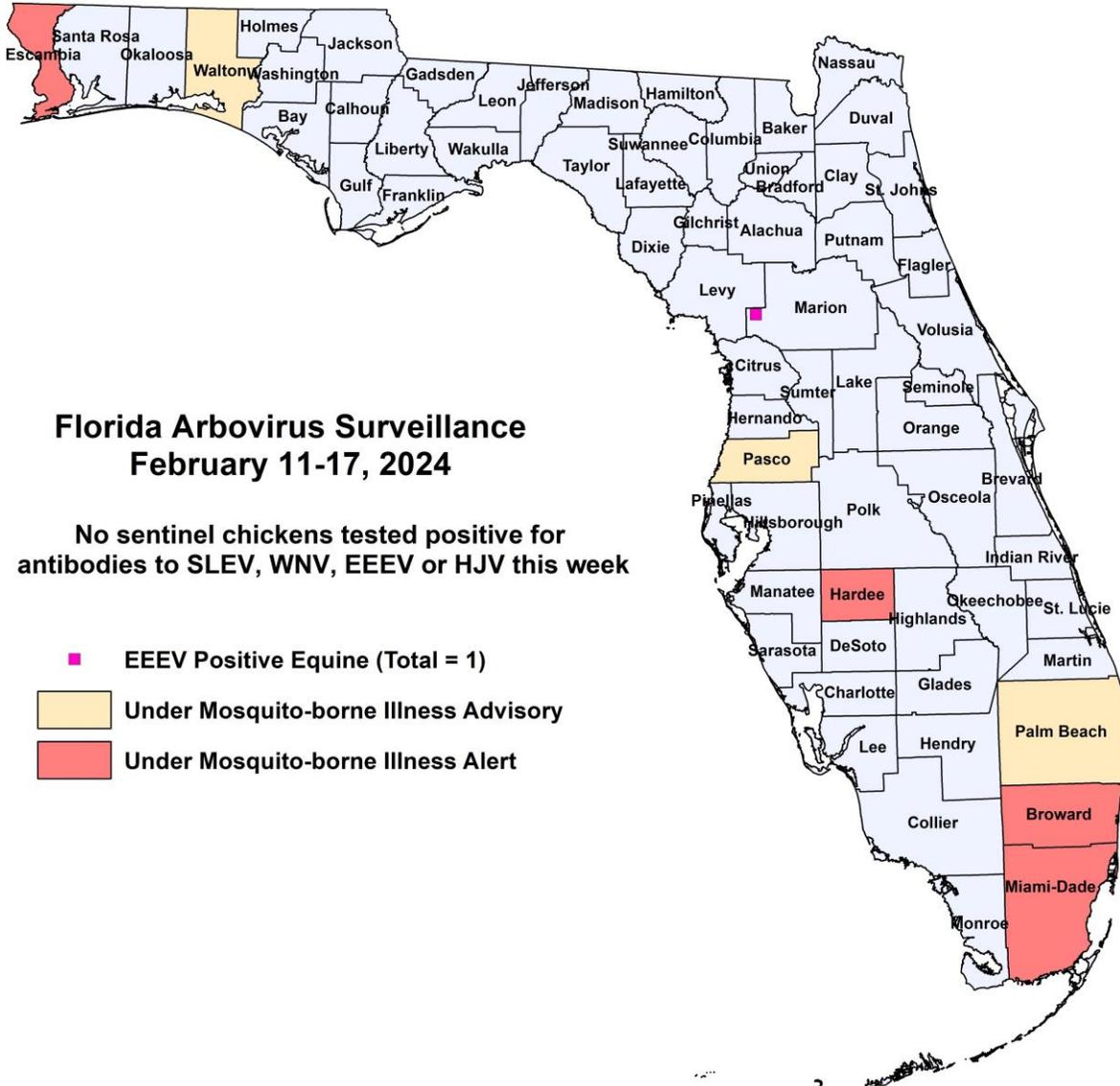
The Fish and Wildlife Conservation Commission (FWC) collects reports of dead birds, which can be an indication of arbovirus circulation in an area. This week, 16 reports representing a total of 25 dead birds, including one crow and one raptor, were received from nine counties.

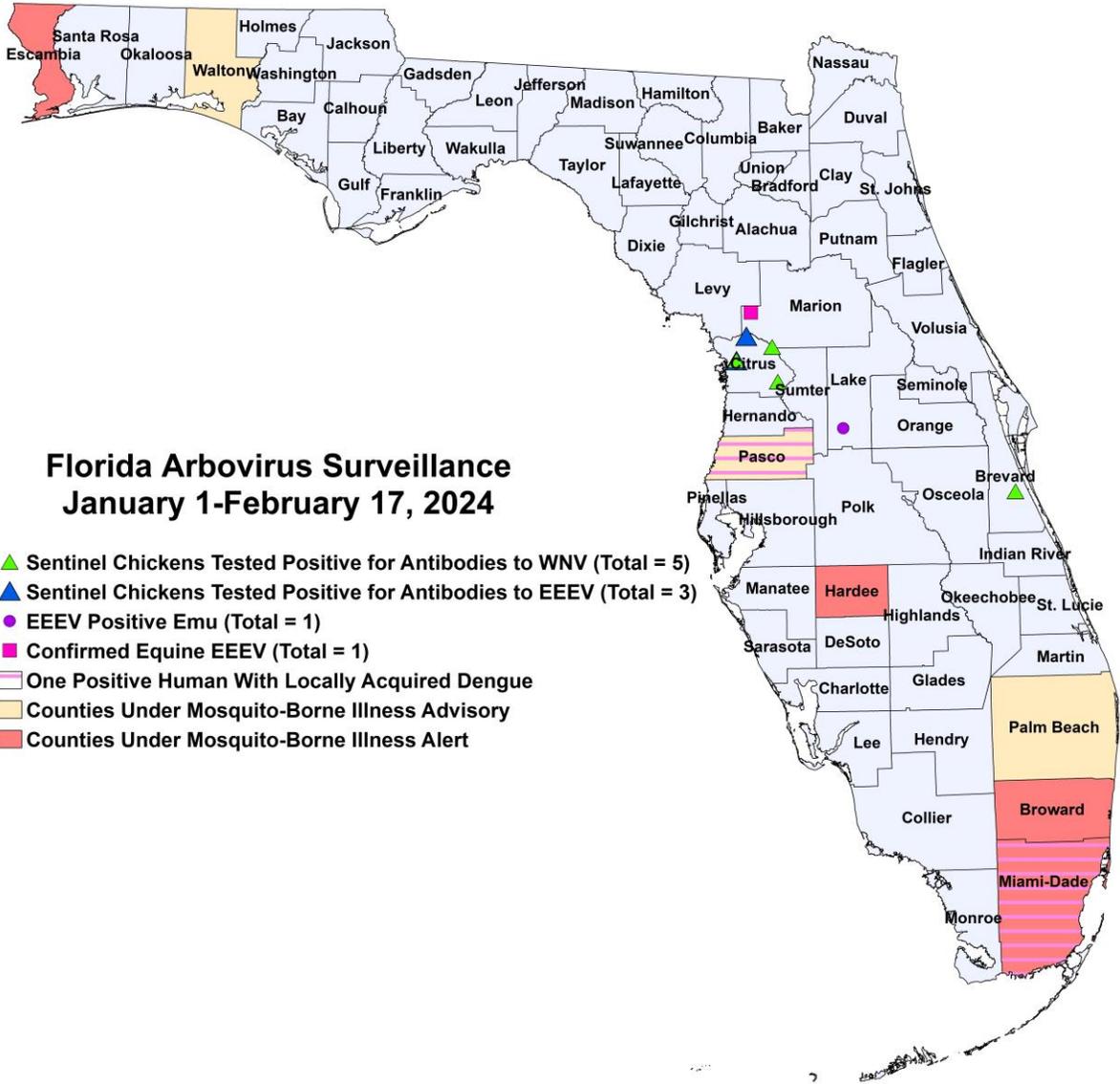
In 2024, 192 reports representing a total of 444 dead birds (13 crows, 0 jays, 23 raptors, 1 dove) were received from 39 of Florida's 67 counties.

### 2024

County	Total Dead Birds	Crows	Jays	Raptors	Doves
Bay	8	0	0	0	0
Duval	1	0	0	0	0
Franklin	2	0	0	0	0
Indian River	2	0	0	0	0
Lake	1	0	0	1	0
Martin	1	0	0	0	0
Palm Beach	6	0	0	0	0
Pinellas	1	0	0	0	0
St. Johns	3	1	0	0	0

# Maps





**2024 Mosquito-Borne Disease Activity by County**

County	Humans	Equines	Sentinel Chickens	Other
Brevard			1 WNV (1/3)	
Citrus			4 WNV (1/9, 1/15) 3 EEEV (1/9, 1/15)	
Lake				1 EEEV emu (2/6)
Marion		1 EEEV (1/31)		
Miami-Dade	1 dengue (January)			
Pasco	1 dengue (January)			

## Acknowledgements and Data Sources

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**For more surveillance information, please see the DOH website at:** [www.floridahealth.gov/diseases-and-conditions/mosquito-borne-diseases/surveillance.html](http://www.floridahealth.gov/diseases-and-conditions/mosquito-borne-diseases/surveillance.html)

**For arbovirus surveillance information for the United States, please see the Centers for Disease Control and Prevention website at:** [www.cdc.gov/ncidod/dvbid/westnile/surv&control.htm](http://www.cdc.gov/ncidod/dvbid/westnile/surv&control.htm)

Case tallies included in the weekly Florida arbovirus surveillance report include confirmed and probable cases for EEE, WNV infection, SLE, dengue, chikungunya, and malaria by date of onset. Suspect cases are not included. Activity is mapped by county of exposure rather than county of residence. Case definitions being used in Florida are consistent with national criteria provided by the Council of State and Territorial Epidemiologists (CSTE) and may be viewed at: [www.floridahealth.gov/diseases-and-conditions/disease-reporting-and-management/disease-reporting-and-surveillance/index.html](http://www.floridahealth.gov/diseases-and-conditions/disease-reporting-and-management/disease-reporting-and-surveillance/index.html). Case tallies reported by CDC do not include suspect cases and cases are reported by patient state of residence rather than where the exposure occurred. Data is provided by county health departments, Department of Health Bureau of Public Health Laboratories, Department of Agriculture and Consumer Services, mosquito control agencies, Florida Fish and Wildlife Conservation Commission, medical providers and veterinarians. Equine cases are provided by the Department of Agriculture and Consumer Services.