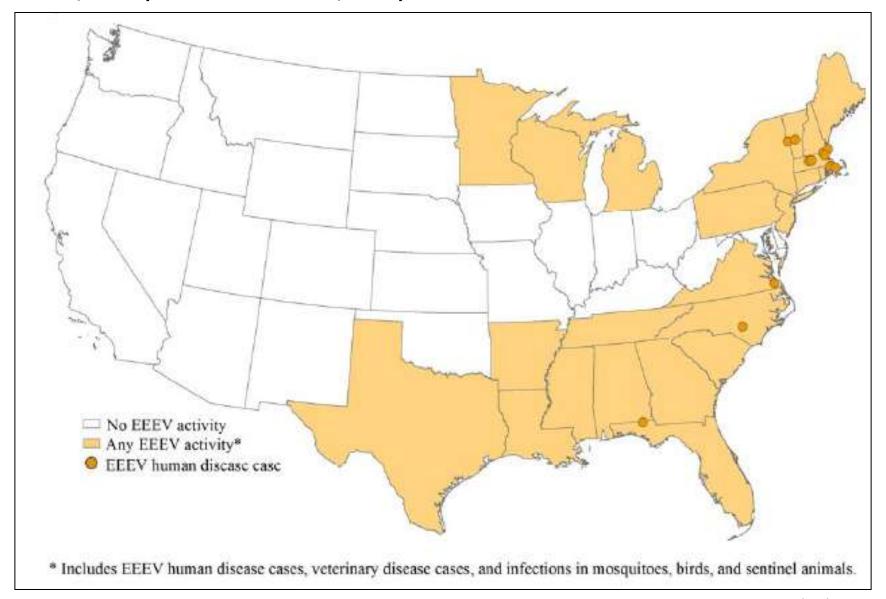
## **Eastern Equine Encephalitis (EEE)**

- Most Severe Domestic Arbovirus (Arthropodborne virus)
  - US average of 6 cases a year since 1964
  - Majority of people infected asymptomatic
  - Severe illness characterized by
    - High fever, headache, chills, vomiting, encephalitis, seizures, disorientation, coma
  - 33% Mortality Rate
    - Most survivors suffer significant brain damage
  - Risk Factors:
    - Persons over age 50 or under age 15
    - Outdoor exposures (recreational or professional) in endemic areas
- In 2012 there have been 12 reported human EEE cases with 5 deaths in the United States

# Eastern equine encephalitis virus (EEEv) activity reported to ArboNET, by state, United States, 2012 (as of November 27, 2012)



### 2012: Northern New England EEE Activity

#### Massachusetts

- 7 human cases, 3 deaths
- 5 equine cases, 2 alpaca cases
- 166 positive mosquito pools

#### Vermont

- 2 human cases, 2 deaths
- 2 equine cases
- 10 positive mosquito pools

### New Hampshire

- 2 equine cases, 2 avian cases (emus)
- 9 positive mosquito pools

### Maine

 1 pheasant flock (1 confirmed death, >30 birds expired, flock eventually culled to prevent further transmission)

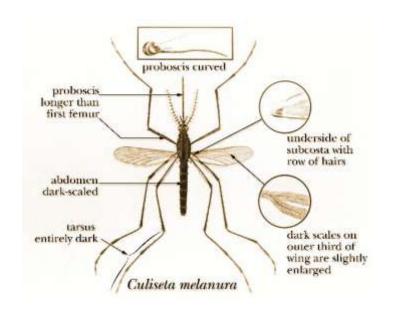
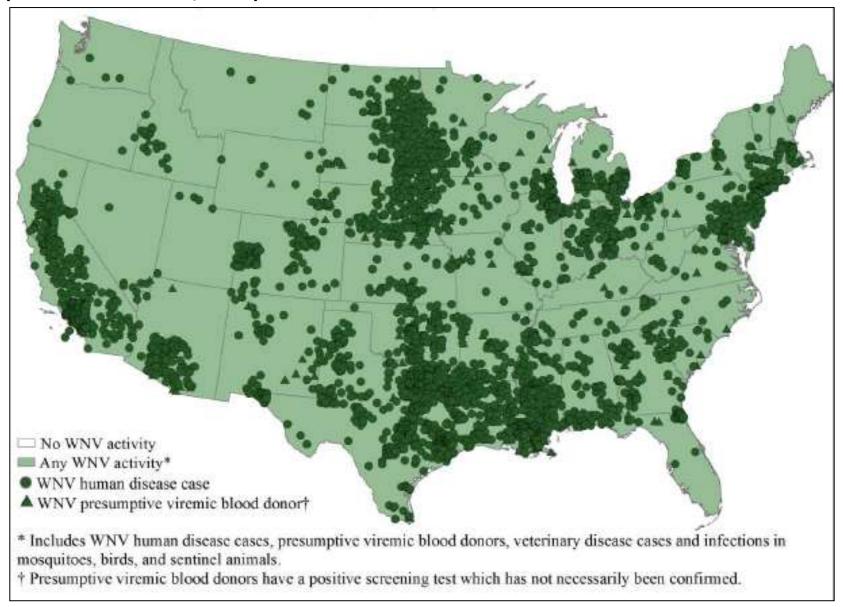


Image: Federal CDC

### West Nile Virus (WNV)

- Arbovirus introduced to North America in 1999
- Swiftly spread throughout the United States
- 2012 is the most active year for WNV since 2003 with 5,245 cases reported as of November 27<sup>th</sup>
  - 1/3 of the national case load comes from Texas
  - 51% of the cases were classified as neuroinvasive disease
    - Cases presenting with symptoms such as encephalitis or meningitis
  - There have been 234 deaths associated with WNV this year
- Most people infected with WNV are asymptomatic
- Risk factors:
  - Persons over age 50
  - Outdoor exposures (recreational or professional) in endemic areas

## West Nile virus (WNV) activity reported to ArboNET, by state, United States, 2012 (as of November 20, 2012)



### WNV in Maine, 2012

- 8/1/12:
  - 1 WNV + mosquito pool collected in Lebanon, York County
  - 1 WNV + mosquito pool collected in Gorham, Cumberland County
- 8/23/12
  - 2 WNV + mosquito pools collected in Gorham & Standish, Cumberland County
- 8/30/12
  - 1 WNV + mosquito pool collected in Scarborough, Cumberland County
- 8/31/2012
  - 1 WNV + mosquito pool collected in Scarborough, Cumberland County
- 9/06/2012
  - 1 WNV + mosquito pool collected in Biddeford, York County

#### AND...

### WNV in Maine, 2012 (continued)

- 10/1/12
  - Symptom onset of Maine's first EVER locally acquired case of WNV neuroinvasive disease in a Maine resident from Cumberland County
  - Previously healthy, no travel history
  - Presented with encephalitis, meningitis, double vision, extreme muscle weakness...
  - Laboratory diagnosed with WNV IgM present in serum & CSF
  - Patient has since recovered



Image: Federal CDC