

# VECTOR SURVEILLANCE IN NEW JERSEY

## EEE, WNV, SLE and LAC

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CDC WEEK 38: September 16 to September 22, 2012

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### *Culiseta melanura* and Eastern Equine Encephalitis

SITE/Boxes	Inland / Coastal	Historic Population Mean	Current Weekly Mean	Total (Collected) Tested*	Total Pools (Submitted) Tested	EEE Isolation Pools	MFIR
Bass River (Burlington Co.)/10	Coastal	na	0.40	(49) 45	(8) 7		
Green Bank (Burlington Co.)/25	Coastal	2.18	1.04	(417) 391	(14) 13	1	2.56
Corbin City (Atlantic Co.)/25	Coastal	1.20	0.40	181 <sup>‡</sup>	14		
Dennisville (Cape May Co.)/50	Coastal	3.74	0	178	15	2	11.24
Winslow (Camden Co.)/50	Inland	0.91	0.46	1960	47	8	4.08
Centerton (Salem Co.)/50	Inland	2.60	0.38	513	19	3	5.85
Turkey Swamp (Monmouth Co.)/48	Inland	0.77	0.29	(654) 640	(21) 20	2	3.12
Glassboro (Gloucester Co.)/50	Inland	1.03	0.26	212	16	1	4.72

\*Including trial run last week in May. ‡ Incomplete, to be updated.

**Remarks:** There were no new detections of EEE in either *Cs. melanura* or any other species at the traditional resting box sites. There was one additional positive *Cs. melanura* pool in the county sites (see next page).

To date 4120 *Cs. melanura* from 151 pools have been tested from the traditional resting box sites, with three additional pools in the system to be tested. Seventeen positive pools have been detected at these sites, for an MFIR of 4.13. A total of 27 positive pools have been detected in New Jersey, with 10 detected positive pools in traps set by individual counties for a county site MFIR of 1.61 (see below). Overall *Cs. melanura* MFIR value for the state is 2.62. All positive pools remain in *Culiseta melanura*.

Three hundred fifty-three additional pools containing 6204 *Cs. melanura* have been tested from other sites using other traps in addition to resting boxes. One additional positive pool was detected in a CO<sub>2</sub> trap from Burlington County. A season total of 10 positive *Cs. melanura* pools from these sites have been detected.

<b>Additional <i>Cs. melanura</i> trapped by counties</b>				
*traps with positives indicated in <b>BOLD</b> .				
<b>County</b>	<b>Trap types*</b>	<b>Number collected (pools)</b>	<b>Number of positives pools</b>	<b>MFIR</b>
Atlantic	<b>CO<sub>2</sub></b>	18 (1)	1	55.56
Burlington	<b>CO<sub>2</sub></b> , Other	4012 (92)	2	0.50
Cape May	Gravid, RB	523 (114)		
Cumberland	CO <sub>2</sub> , Gravid, RB	303 (23)		
Gloucester	CO <sub>2</sub> , <b>RB</b>	1239 (95)	6	4.84
Monmouth	Gravid	9 (2)		
Ocean	<b>CO<sub>2</sub></b> , Gravid, RB	97 (23)	1	10.20
Salem	CO <sub>2</sub>	3 (3)		
<b>TOTAL</b>		<b>6204 (353)</b>	<b>10</b>	1.61

**Horses and Humans:** To date, six EEE positive horses have been identified, including with the above: 1) A presumptive positive horse with an unusually early onset date of 25 May has been reported for Burlington County. The horse was reportedly vaccinated in early May. 2) A second horse has been reported, also from Burlington County. Date of onset was 22 July, with the 3.9 yo mare euthanized on the same date and no reported vaccination history. 3) A 3 yo mare from Atlantic County with date of onset of 10 Aug was euthanized on the same day (no vaccination history), 4) a 4 yo mare from Camden County with date of onset 18 Aug was euthanized on same date, no vaccination history and 5/6) two 2 yo colts from Camden County with onset date of 9 Sep, both euthanized on 10 Sep, both with no vaccination or travel history.

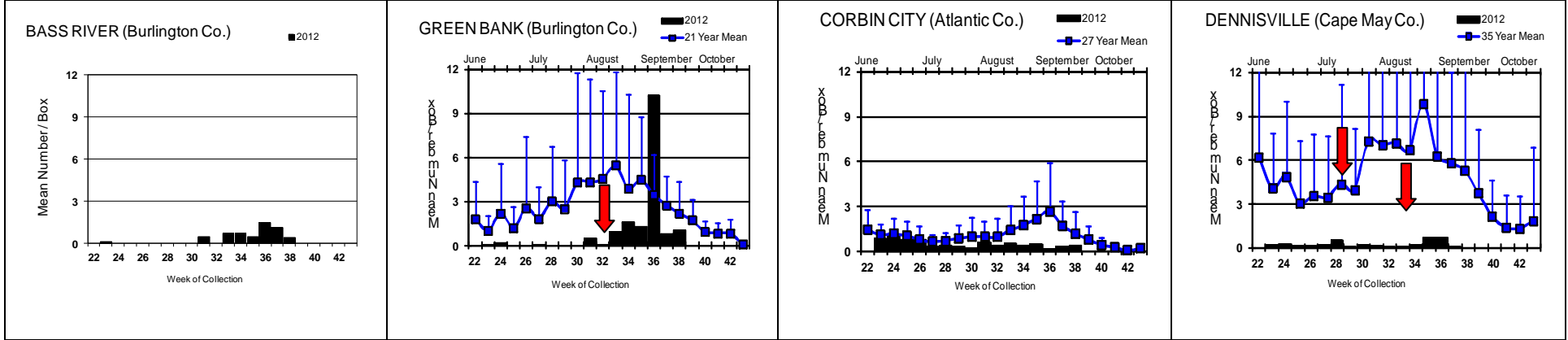
**Horses and Vaccinations:** The fate of unvaccinated equids reinforces the necessity of maintaining a vaccination schedule for arboviruses. For vaccination schedules recommended by the American Association of Equine Practices, see: [http://www.aaep.org/vaccination\\_guidelines.htm](http://www.aaep.org/vaccination_guidelines.htm)

Species other than <i>Cs. melanura</i>	Pools	Mosquitoes	Positives	MFIR
<i>Aedes albopictus</i>	8	40		
<i>Aedes canadensis canadensis</i>	13	310		
<i>Aedes cantator</i>	36	472		
<i>Aedes japonicus</i>	18	72		
<i>Aedes mitchellae</i>	4	60		
<i>Aedes sollicitans</i>	20	163		
<i>Aedes sticticus</i>	1	8		
<i>Aedes triseriatus</i>	4	4		
<i>Aedes trivittatus</i>	1	2		
<i>Aedes vexans</i>	7	83		
<i>Anopheles bradleyi</i>	59	344		
<i>Anopheles crucians</i>	5	39		
<i>Anopheles punctipennis</i>	28	135		
<i>Anopheles quadrimaculatus</i>	23	138		
<i>Coquillettidia perturbans</i>	69	1636		
<i>Culex erraticus</i>	234	7549		
<i>Culex pipiens</i>	653	6089		
<i>Culex restuans</i>	13	67		
<i>Culex salinarius</i>	174	778		
<i>Culex sp.</i>	154	4583		
<i>Psorophora columbiae</i>	2	6		
State Total	<b>1526</b>	<b>22578</b>		

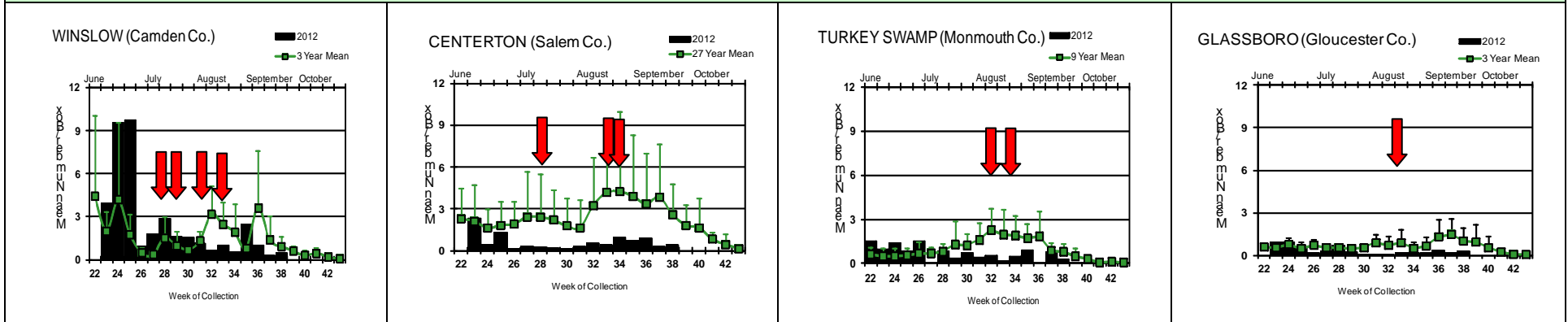
The table to the left indicates non-*Cs. melanura* mosquitoes tested for EEE. An additional 20 species of mosquitoes have been tested with no detection of EEE.

# Culiseta melanura Population Graphs

## Coastal



## Inland



Very modest increases in populations of *Culiseta melanura* occurred at all sites except for Dennisville (no *Cs. melanura*) and Turkey Swamp.

= Positive pool(s) detected.

EEE in US (2012 cumulative cases): (Black or Red = previous + new reported cases occurring)

- equine: 7(AL) 22(FL) 8(GA) 44(LA) 5(MA) 1(MI) 28(MS) 14(NC) 1(NH) 6(NJ) 2(NY) 12(SC) 1(VT) 4(WI)
- mosquito pools: 5(CT) 3(LA) 260(MA) 4(NH) 27(NJ) 1(NY) 4(RI) 137(VA) 10(VT)
- sentinel: 1(AL) 1(DE) 41(FL) 1[2 wild](ME) 3(NC) (2 emu NH) 33(VA)
- human: 1(FL) 6(MA) 1(VA) 2(VT)

## West Nile Virus

West Nile in US (2012 cumulative cases): Single black values indicate no change from previous week. Black values / red values equals previous week/**New totals**.

Note: Data reported by all states should be considered provisional and subject to change. Sources for this table can be found [here](#).

	Birds	Mosquito Pools	Sentinels	Horses	Humans
Alabama	15		13	3	18/20
Alaska					0
Arizona	1	104/134	2	1	37/50
Arkansas					39/43
California	1205/1290	2282/2417	321/389	11/17	114/147
Colorado		201/209		8/9	51/75
Connecticut		226/231		0	14/15
Delaware	17		9	0	6
DC					2
Florida	1	2/4	168/181	2/4	33/40
Georgia	0	97	0	4	42
Hawaii					
Idaho	1/2	35		7/8	11/13
Illinois	88/97	3652/3759		5	95/120
Indiana	2	652/702		18/21	45/56
Iowa		3	11/12	12/18	12/14
Kansas		2		1	25/31
Kentucky		2		11/12	3/6
Louisiana		2393/2418	90/104	42	215/251
Maine		7			1
Maryland		7/8			25/30
Mass.		233/241		2	14/17
Michigan	25/26	16		2/3	155/162
Minnesota	26	72/95		8	52/60
Mississippi		55		10	169/186
Missouri		119		6	13

	Birds	Mosquito Pools	Sentinels	Horses	Humans
Montana	1	8/11		1/6	1/3
Nebraska	11/13	217/221		2/11	55/85
Nevada		2		1	1/2
New Hampshire		40		0	1
New Jersey	104/117	906/952		2/3	22/31
New Mexico	1	20		9	27/30
New York		931/963		1	52/62
North Carolina				1/2	5/6
North Dakota	2	0		13/14	70/154
Ohio		1125/1172		6/7	53/79
Oklahoma	1	29/30		3/5	133/150
Oregon	1	58	0	1	2
Pennsylvania	119/123	3231/3321		27/39*	20/22
Rhode Island		4		0	0
South Carolina	14/16	1		3/4	28/33
South Dakota	3/4	77		9	144/158
Tennessee	2/3	702/732		1/4	21/24
Texas	150/166	1278/1305		41/49	1219/1375
Utah		16	1	1	3
Vermont		1		0	1
Virginia		208	19		5/9
Washington	0	5		1	4
West Virginia		183/238			3
Wisconsin	26	0		1	19/25
Wyoming	3	13		4	6/7

\* Can include other species (e.g., dogs, cows) reported positive.

Protocol: New Jersey Department of Health (NJDH Public Health Environmental and Agricultural Laboratories, PHEAL) and the Cape May County Department of Mosquito Control tests mosquito pools using RT-PCR Taqman techniques.

## Mosquito Species Submitted and Tested for West Nile Virus Testing through 24 September 2012

Species	Pools	Mosquitoes	Positives	MFIR
<i>Aedes albopictus</i>	1257	9634	5	0.519
<i>Aedes atlanticus</i>	10	14		
<i>Aedes atropalpus</i>	8	21		
<i>Aedes canadensis canadensis</i>	69	1638		
<i>Aedes cantator</i>	72	883		
<i>Aedes grossbecki</i>	2	2		
<i>Aedes japonicus</i>	494	2597	6	2.310
<i>Aedes mitchellae</i>	4	60		
<i>Aedes sollicitans</i>	24	175		
<i>Aedes sticticus</i>	7	124		
<i>Aedes taeniorhynchus</i>	39	460		
<i>Aedes triseriatus</i>	274	650		
<i>Aedes trivittatus</i>	6	10		
<i>Aedes vexans</i>	106	675	1	1.481
<i>Anopheles bradleyi</i>	88	677		
<i>Anopheles crucians</i>	10	47		
<i>Anopheles punctipennis</i>	117	421	1	2.375
<i>Anopheles quadrimaculatus</i>	144	524	1	1.908
<i>Coquillettidia perturbans</i>	90	1876		
<i>Culex erraticus</i>	262	7808		
<i>Culex pipiens</i>	1418	31654	139	4.391
<i>Culex restuans</i>	370	1794	1	0.557
<i>Culex salinarius</i>	217	1054	1	0.949
<i>Culex sp.</i>	3393	119777	787	6.571
<i>Culex territans</i>	45	71		
<i>Culiseta melanura</i>	545	10468	10	0.955
<i>Culiseta minnesotae</i>	1	2		
<i>Orthopodomyia signifera</i>	15	15		
<i>Psorophora ciliata</i>	1	1		
<i>Psorophora columbiae</i>	18	169		
<i>Psorophora ferox</i>	13	68		
<i>Psorophora howardii</i>	2	2		
<i>Uranotaenia sapphirina</i>	3	5		
<b>State Total</b>	<b>9124</b>	<b>193,376</b>	<b>952</b>	<b>4.923</b>

**Remarks:** To date, there have been 193,376 mosquitoes tested in 9,124 pools from 32 species. Currently, 952 positive pools have been detected in *Aedes albopictus*, *Ae. japonicus*, *Aedes vexans*, *Anopheles punctipennis*, *Anopheles quadrimaculatus*, *Culex pipiens*, Mixed Cx. species, *Culex restuans*, *Culex salinarius* and *Culiseta melanura*. Mixed *Culex* pools continued to increase in positive pools from 754 to 757, with MFIR values increasing from 6.498 to 6.571.

**Humans, Horses and Wild Birds:** Thirty-one human cases have been reported in the following counties: Atlantic (1), Bergen (2), Burlington (2), Camden (4), Cape May (1), Essex (3), Gloucester (2), Hudson (1), Mercer (1), Middlesex (4), Monmouth (2), Ocean (4), Passaic (1) Salem (1) and Somerset (2). See <http://www.state.nj.us/health/cd/westnile/techinfo.shtml> for further information.

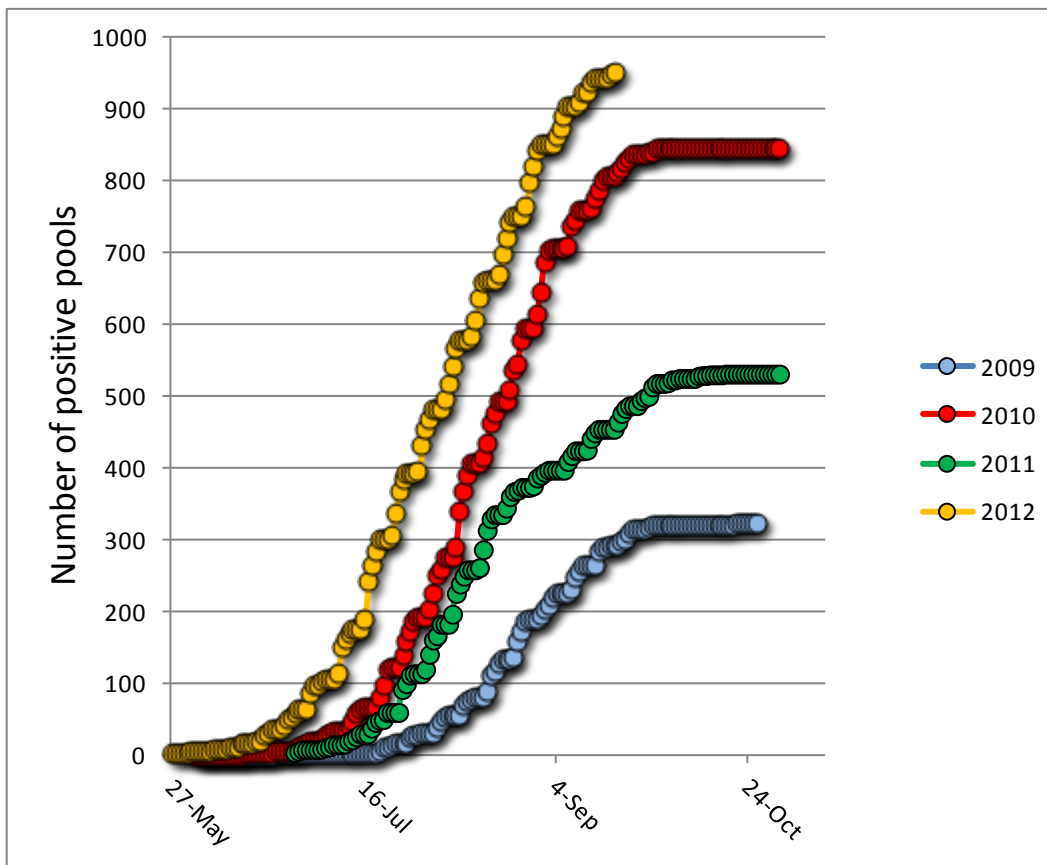
Three positive WNV horses have been reported to date: 1) A 11 yo quarter horse from Salem County, with onset of symptoms on 4<sup>th</sup> August. The horse was put down the same day. Generally horses have either an unknown or no vaccination history, but this horse was reported as vaccinated. See [http://www.esrutgers.com/downloads/NJDA\\_08102012.pdf](http://www.esrutgers.com/downloads/NJDA_08102012.pdf) In the very active year of 2010, the first WNV horse case had

an onset date of 17 August. 2) A 25 yo gelding from Monmouth County, onset of symptoms 14 July, was vaccinated and is recovering. 3) An additional Monmouth County horse (2 yo mare) with date of onset on Sep 15 was euthanized Sep 17. No vaccination history was reported.

Bird testing began in mid-April. To date, WNV has been detected in 117 birds out of 269 tested. WNV was first detected in an American Crow (*Corvus brachyrhynchos*) from Morris County, collected 9 April. To date, testing includes: American Crow (*Corvus brachyrhynchos* 54/60), Fish Crow (*Corvus ossifragus* 14/41), unidentified Crow (*Corvus* spp. 13/23), Blue Jay (*Cyanocitta cristata* 30/40), Hawk/Raptor (1/9) and other avian species (5/96). Counties submitting birds are Atlantic, Bergen, Burlington, Cape May, Cumberland, Essex, Gloucester, Hunterdon, Mercer, Middlesex, Monmouth, Morris, Ocean, Somerset, Sussex and Warren.

2012 Positive Mosquito pools to date / Total Mosquito Pools Submitted	This time last year
952 / 9124 (0.104)	481 / 6023 (0.080)
2012 Positive Birds to date / Total Birds Submitted	This time last year
117 / 269 (0.435)	30 / 101 (0.297)

Activity, as seen by plotting cumulative positive pools (graph below) has now gone above 2010 levels. It should be noted that testing began earlier this year.



### WNV Results by County through 24 September 2012

County	Species	Pools	Mosquitoes	Positives	MFIR
Atlantic		121	2413	5	2.072
	<i>Aedes albopictus</i>	17	268		
	<i>Aedes canadensis canadensis</i>	1	2		
	<i>Aedes cantator</i>	2	11		
	<i>Aedes japonicus</i>	8	32		

	<i>Aedes sollicitans</i>	1	9		
	<i>Aedes taeniorhynchus</i>	2	89		
	<i>Aedes triseriatus</i>	4	17		
	<i>Aedes trivittatus</i>	1	2		
	<i>Aedes vexans</i>	5	83		
	<i>Anopheles bradleyi</i>	3	7		
	<i>Anopheles punctipennis</i>	2	16		
	<i>Anopheles quadrimaculatus</i>	2	5		
	<i>Coquillettidia perturbans</i>	2	3		
	<i>Culex erraticus</i>	9	77		
	<i>Culex</i> spp.	38	1546	5	3.234
	<i>Culiseta melanura</i>	19	228		
	<i>Psorophora columbiae</i>	2	2		
	<i>Psorophora ferox</i>	2	15		
	<i>Psorophora howardii</i>	1	1		
<b>Bergen</b>		<b>227</b>	<b>12115</b>	<b>156</b>	<b>12.877</b>
	<i>Aedes albopictus</i>	2	43	1	23.256
	<i>Aedes japonicus</i>	3	13	2	153.846
	<i>Aedes triseriatus</i>	1	1		
	<i>Aedes vexans</i>	1	4		
	<i>Anopheles punctipennis</i>	1	1		
	<i>Anopheles quadrimaculatus</i>	1	1	1	1000.000
	<i>Culex salinarius</i>	1	3	1	333.333
	<i>Culex</i> spp.	217	12049	151	12.532
<b>Burlington</b>		<b>436</b>	<b>13660</b>	<b>30</b>	<b>2.196</b>
	<i>Aedes albopictus</i>	20	363		
	<i>Aedes atropalpus</i>	1	2		
	<i>Aedes canadensis canadensis</i>	9	281		
	<i>Aedes cantator</i>	2	30		
	<i>Aedes japonicus</i>	23	120	1	8.333
	<i>Aedes mitchellae</i>	4	60		
	<i>Aedes sticticus</i>	1	8		
	<i>Aedes triseriatus</i>	6	55		
	<i>Aedes trivittatus</i>	1	2		
	<i>Aedes vexans</i>	6	88		
	<i>Anopheles bradleyi</i>	5	82		
	<i>Anopheles crucians</i>	3	37		
	<i>Anopheles punctipennis</i>	6	25		
	<i>Anopheles quadrimaculatus</i>	3	11		
	<i>Coquillettidia perturbans</i>	25	983		
	<i>Culex erraticus</i>	10	106		
	<i>Culex pipiens</i>	6	222		
	<i>Culex restuans</i>	3	55		
	<i>Culex salinarius</i>	10	182		
	<i>Culex</i> spp.	178	6494	25	3.850
	<i>Culiseta melanura</i>	112	4448	4	0.899
	<i>Orthopodomyia signifera</i>	1	1		
	<i>Psorophora columbiae</i>	1	5		
<b>Camden</b>		<b>265</b>	<b>8017</b>	<b>46</b>	<b>5.738</b>
	<i>Aedes albopictus</i>	34	160	1	6.250
	<i>Aedes japonicus</i>	22	40	1	25.000
	<i>Aedes triseriatus</i>	2	6		
	<i>Aedes trivittatus</i>	1	2		

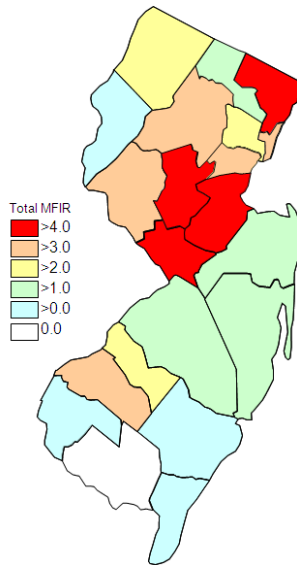


<i>Aedes vexans</i>	3	7		
<i>Anopheles crucians</i>	1	1		
<i>Anopheles punctipennis</i>	1	2		
<i>Culex erraticus</i>	1	1		
<i>Culex</i> spp.	152	5835	43	7.369
<i>Culiseta melanura</i>	47	1960	1	0.510
<i>Uranotaenia sapphirina</i>	1	3		
<b>Cape May</b>	<b>3065</b>	<b>24450</b>	<b>17</b>	<b>0.695</b>
<i>Aedes albopictus</i>	610	1722		
<i>Aedes atlanticus</i>	6	9		
<i>Aedes atropalpus</i>	7	19		
<i>Aedes canadensis canadensis</i>	9	78		
<i>Aedes cantator</i>	45	460		
<i>Aedes japonicus</i>	114	167		
<i>Aedes sollicitans</i>	21	164		
<i>Aedes taeniorhynchus</i>	36	370		
<i>Aedes triseriatus</i>	159	292		
<i>Aedes vexans</i>	27	68		
<i>Anopheles bradleyi</i>	59	343		
<i>Anopheles punctipennis</i>	23	27		
<i>Anopheles quadrimaculatus</i>	95	332		
<i>Coquillettidia perturbans</i>	6	25		
<i>Culex erraticus</i>	200	7197		
<i>Culex pipiens</i>	857	10481	17	1.622
<i>Culex restuans</i>	325	916		
<i>Culex salinarius</i>	178	668		
<i>Culex</i> spp.	81	295		
<i>Culex territans</i>	41	67		
<i>Culiseta melanura</i>	144	727		
<i>Orthopodomyia signifera</i>	14	14		
<i>Psorophora columbiae</i>	5	6		
<i>Psorophora ferox</i>	1	1		
<i>Uranotaenia sapphirina</i>	2	2		
<b>Cumberland</b>	<b>184</b>	<b>1717</b>		
<i>Aedes albopictus</i>	22	91		
<i>Aedes atlanticus</i>	3	3		
<i>Aedes canadensis canadensis</i>	4	25		
<i>Aedes cantator</i>	3	11		
<i>Aedes japonicus</i>	15	34		
<i>Aedes triseriatus</i>	9	17		
<i>Aedes vexans</i>	5	17		
<i>Anopheles crucians</i>	4	158		
<i>Anopheles bradleyi</i>	5	8		
<i>Anopheles punctipennis</i>	9	18		
<i>Anopheles quadrimaculatus</i>	3	3		
<i>Coquillettidia perturbans</i>	6	89		
<i>Culex erraticus</i>	13	157		
<i>Culex pipiens</i>	21	354		
<i>Culex restuans</i>	11	90		
<i>Culex salinarius</i>	12	150		
<i>Culex</i> spp.	7	26		
<i>Culex territans</i>	3	3		
<i>Culiseta melanura</i>	24	337		
<i>Psorophora columbiae</i>	2	104		

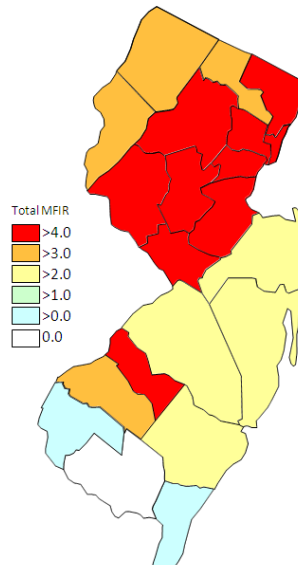
<i>Psorophora ferox</i>	3	22		
<b>Essex</b>	<b>423</b>	<b>6297</b>	<b>28</b>	<b>4.447</b>
<i>Aedes albopictus</i>	71	530		
<i>Aedes canadensis canadensis</i>	2	2		
<i>Aedes grossbecki</i>	2	2		
<i>Aedes japonicus</i>	48	421	1	2.375
<i>Aedes sticticus</i>	5	113		
<i>Aedes triseriatus</i>	12	31		
<i>Aedes vexans</i>	16	220		
<i>Culex</i> spp.	266	4974	27	5.428
<i>Psorophora ferox</i>	1	4		
<b>Gloucester</b>	<b>564</b>	<b>17095</b>	<b>61</b>	<b>3.568</b>
<i>Aedes albopictus</i>	41	1115		
<i>Aedes japonicus</i>	7	141		
<i>Aedes triseriatus</i>	1	7		
<i>Aedes vexans</i>	3	12		
<i>Anopheles punctipennis</i>	23	139		
<i>Anopheles quadrimaculatus</i>	21	133		
<i>Coquillettidia perturbans</i>	1	2		
<i>Culex pipiens</i>	355	14092	57	4.045
<i>Culiseta melanura</i>	112	1454	4	2.751
<b>Hudson</b>	<b>231</b>	<b>13295</b>	<b>77</b>	<b>5.792</b>
<i>Culex</i> spp.	231	13295	77	5.792
<b>Hunterdon</b>	<b>288</b>	<b>12726</b>	<b>56</b>	<b>4.400</b>
<i>Culex</i> spp.	288	12726	56	4.400
<b>Mercer</b>	<b>333</b>	<b>8498</b>	<b>70</b>	<b>8.237</b>
<i>Aedes albopictus</i>	88	928		
<i>Aedes japonicus</i>	39	214		
<i>Aedes triseriatus</i>	5	11		
<i>Aedes vexans</i>	1	3		
<i>Culex erraticus</i>	2	9		
<i>Culex pipiens</i>	170	6419	65	10.126
<i>Culex restuans</i>	21	530	1	1.887
<i>Culex</i> spp.	7	384	4	10.417
<b>Middlesex</b>	<b>265</b>	<b>9662</b>	<b>84</b>	<b>8.694</b>
<i>Aedes albopictus</i>	19	222		
<i>Aedes japonicus</i>	15	120		
<i>Aedes triseriatus</i>	3	14		
<i>Culex</i> spp.	228	9306	84	9.026
<b>Monmouth</b>	<b>356</b>	<b>4509</b>	<b>11</b>	<b>2.440</b>
<i>Aedes albopictus</i>	68	362	1	2.762
<i>Aedes canadensis canadensis</i>	12	129		
<i>Aedes cantator</i>	8	43		
<i>Aedes japonicus</i>	50	176	1	5.682
<i>Aedes triseriatus</i>	16	22		
<i>Aedes vexans</i>	7	12		
<i>Anopheles crucians</i>	1	1		
<i>Anopheles punctipennis</i>	19	25		

<i>Anopheles quadrimaculatus</i>	1	1		
<i>Coquillettidia perturbans</i>	4	5		
<i>Culex erraticus</i>	10	125		
<i>Culex pipiens</i>	1	1		
<i>Culex salinarius</i>	3	14		
<i>Culex</i> spp.	125	2923	9	3.079
<i>Culex territans</i>	1	1		
<i>Culiseta melanura</i>	27	664		
<i>Psorophora columbiae</i>	2	3		
<i>Psorophora ferox</i>	1	2		
<b>Morris</b>	<b>361</b>	<b>12324</b>	<b>73</b>	<b>5.923</b>
<i>Aedes albopictus</i>	2	25		
<i>Aedes japonicus</i>	24	327		
<i>Aedes triseriatus</i>	3	14		
<i>Aedes vexans</i>	1	1		
<i>Anopheles punctipennis</i>	3	66		
<i>Coquillettidia perturbans</i>	3	149		
<i>Culex</i> spp.	325	11742	73	6.217
<b>Ocean</b>	<b>390</b>	<b>6442</b>	<b>15</b>	<b>2.328</b>
<i>Aedes albopictus</i>	106	2507	1	0.399
<i>Aedes atlanticus</i>	1	2		
<i>Aedes canadensis canadensis</i>	29	1112		
<i>Aedes cantator</i>	11	327		
<i>Aedes japonicus</i>	34	141		
<i>Aedes sollicitans</i>	2	2		
<i>Aedes taeniorhynchus</i>	1	1		
<i>Aedes triseriatus</i>	17	38		
<i>Aedes trivittatus</i>	1	2		
<i>Aedes vexans</i>	14	54	1	18.519
<i>Anopheles bradleyi</i>	9	41		
<i>Anopheles punctipennis</i>	2	2		
<i>Anopheles quadrimaculatus</i>	2	2		
<i>Coquillettidia perturbans</i>	20	430		
<i>Culex erraticus</i>	2	2		
<i>Culex restuans</i>	1	1		
<i>Culex salinarius</i>	12	36		
<i>Culex</i> spp.	98	1640	13	7.927
<i>Culiseta melanura</i>	23	97		
<i>Psorophora columbiae</i>	1	1		
<i>Psorophora ferox</i>	3	3		
<i>Psorophora howardii</i>	1	1		
<b>Passaic</b>	<b>160</b>	<b>2778</b>	<b>11</b>	<b>3.960</b>
<i>Aedes albopictus</i>	29	128	1	7.813
<i>Aedes japonicus</i>	34	335		
<i>Aedes triseriatus</i>	13	29		
<i>Anopheles punctipennis</i>	4	15		
<i>Coquillettidia perturbans</i>	1	2		
<i>Culex</i> spp.	79	2269	10	4.407
<b>Salem</b>	<b>276</b>	<b>2694</b>	<b>2</b>	<b>0.742</b>
<i>Aedes albopictus</i>	46	133		
<i>Aedes canadensis canadensis</i>	2	6		
<i>Aedes cantator</i>	1	1		

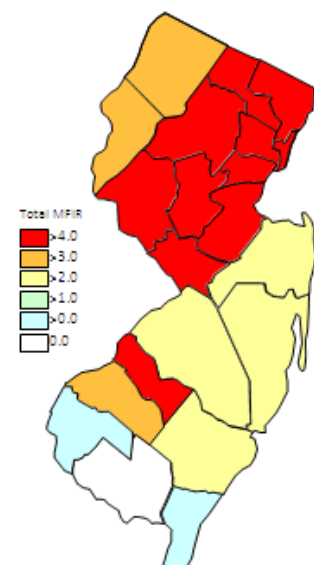
<i>Aedes japonicus</i>	10	24		
<i>Aedes sticticus</i>	1	3		
<i>Aedes triseriatus</i>	4	4		
<i>Aedes vexans</i>	11	83		
<i>Anopheles bradleyi</i>	8	46		
<i>Anopheles punctipennis</i>	9	15		
<i>Anopheles quadrimaculatus</i>	11	31		
<i>Coquillettidia perturbans</i>	20	144		
<i>Culex erraticus</i>	15	134		
<i>Culex pipiens</i>	4	26		
<i>Culex restuans</i>	3	16		
<i>Culex</i> spp.	94	1418	1	0.705
<i>Culiseta melanura</i>	28	538	1	1.859
<i>Culiseta minnesotae</i>	1	2		
<i>Psorophora ciliata</i>	1	1		
<i>Psorophora columbiae</i>	5	48		
<i>Psorophora ferox</i>	2	21		
<b>Somerset</b>	<b>254</b>	<b>4610</b>	<b>39</b>	<b>8.460</b>
<i>Aedes albopictus</i>	18	114		
<i>Aedes canadensis canadensis</i>	1	3		
<i>Aedes japonicus</i>	19	137		
<i>Aedes triseriatus</i>	4	42		
<i>Aedes vexans</i>	1	8		
<i>Anopheles punctipennis</i>	4	25	1	40.000
<i>Culex</i> spp.	207	4281	38	8.876
<b>Sussex</b>	<b>295</b>	<b>8940</b>	<b>33</b>	<b>3.691</b>
<i>Aedes albopictus</i>	1	1		
<i>Coquillettidia perturbans</i>	1	43		
<i>Culex pipiens</i>	4	59		
<i>Culex restuans</i>	6	186		
<i>Culex salinarius</i>	1	1		
<i>Culex</i> spp.	273	8635	33	3.822
<i>Culiseta melanura</i>	9	15		
<b>Union</b>	<b>312</b>	<b>14118</b>	<b>114</b>	<b>8.075</b>
<i>Aedes albopictus</i>	59	838		
<i>Aedes japonicus</i>	5	64		
<i>Aedes triseriatus</i>	1	15		
<i>Culex</i> spp.	247	13201	114	8.636
<b>Warren</b>	<b>318</b>	<b>7016</b>	<b>24</b>	<b>3.421</b>
<i>Aedes albopictus</i>	4	84		
<i>Aedes japonicus</i>	24	91		
<i>Aedes triseriatus</i>	14	35		
<i>Aedes trivittatus</i>	2	2		
<i>Aedes vexans</i>	5	15		
<i>Anopheles punctipennis</i>	11	45		
<i>Anopheles quadrimaculatus</i>	5	5		
<i>Coquillettidia perturbans</i>	1	1		
<i>Culex</i> spp.	252	6738	24	3.562
<b>Grand Total</b>	<b>9124</b>	<b>193376</b>	<b>952</b>	<b>4.923</b>



Cumulative WNV activity in 2011.



WNV activity to 24 Sept 2012.



WNV activity last week, 2012.

### Saint Louis Encephalitis (SLE) through 24 September 2012.

New Jersey will be selectively testing for SLE this year. SLE has had previous activity in New Jersey, most notably in 1964 and 1975 (CDC's SLE [website](#)), the latter prompting the surveillance reporting by Rutgers. SLE is a flavivirus and has a similar transmission pattern to West Nile, with *Culex* species as the predominant vectors.

No pools have tested positive for SLE to date in 2012.

County	Species	Pools	Mosquitoes	Positives	MFIR
<b>Burlington</b>		<b>270</b>	<b>9283</b>		
	<i>Aedes albopictus</i>	6	107		
	<i>Aedes canadensis canadensis</i>	6	214		
	<i>Aedes cantator</i>	2	30		
	<i>Aedes japonicus</i>	18	72		
	<i>Aedes mitchellae</i>	4	60		
	<i>Aedes sticticus</i>	1	8		
	<i>Aedes triseriatus</i>	3	3		
	<i>Aedes trivittatus</i>	1	2		
	<i>Aedes vexans</i>	4	65		
	<i>Anopheles bradleyi</i>	1	4		
	<i>Anopheles crucians</i>	3	37		
	<i>Anopheles punctipennis</i>	2	13		
	<i>Anopheles quadrimaculatus</i>	3	11		
	<i>Coquillettidia perturbans</i>	20	892		
	<i>Culex erraticus</i>	3	71		
	<i>Culex pipiens</i>	6	222		
	<i>Culex restuans</i>	3	55		
	<i>Culex salinarius</i>	10	182		
	<i>Culex</i> spp.	118	4683		
	<i>Culiseta melanura</i>	55	2547		
	<i>Psorophora columbiae</i>	1	5		
<b>Camden</b>		<b>75</b>	<b>2601</b>		
	<i>Aedes albopictus</i>	7	31		

	<i>Aedes japonicus</i>	4	6		
	<i>Aedes triseriatus</i>	1	5		
	<i>Anopheles punctipennis</i>	1	2		
	<i>Culex</i> spp.	62	2557		
<b>Essex</b>		<b>200</b>	<b>3900</b>		
	<i>Aedes albopictus</i>	23	48		
	<i>Aedes canadensis canadensis</i>	2	2		
	<i>Aedes grossbecki</i>	2	2		
	<i>Aedes japonicus</i>	30	251		
	<i>Aedes sticticus</i>	5	113		
	<i>Aedes triseriatus</i>	9	22		
	<i>Aedes vexans</i>	16	220		
	<i>Culex</i> spp.	112	3238		
	<i>Psorophora ferox</i>	1	4		
<b>Hudson</b>		<b>74</b>	<b>4966</b>		
	<i>Culex</i> spp.	74	4966		
<b>Grand Total</b>		<b>619</b>	<b>20750</b>		

## La Crosse Encephalitis (LAC) through 24 September 2012.

New Jersey will be selectively testing for La Crosse (LAC) virus this year. New Jersey has had 3 cases of this encephalitic disease since 1964 (see CDC's LAC [website](#)). The mortality is low but like other encephalitides, LAC can have both personal (lasting neurological sequelae) and economic impacts. LAC is a bunyavirus with a transmission cycle involving mosquitoes such as *Aedes triseriatus* and small mammals such as squirrels and chipmunks. LAC can not only infect *Aedes albopictus* but transovarial transmission was also demonstrated. (Tesh and Gubler 1975 Laboratory studies of transovarial transmission of La Crosse and other arboviruses by *Aedes albopictus* and *Culex fatigans*. American Journal of Tropical Medicine and Hygiene 24(5):876-880).

No pools tested positive to date for 2012.

County	Species	Pools	Mosquitoes	Positives	MFIR
<b>Burlington</b>		<b>1</b>	<b>39</b>		
	<i>Aedes triseriatus</i>	1	39		
<b>Cape May</b>		<b>130</b>	<b>251</b>		
	<i>Aedes triseriatus</i>	127	246		
	<i>Culex</i> spp.	1	2		
	<i>Orthopodomyia signifera</i>	1	1		
	<i>Psorophora columbiae</i>	1	2		
<b>Cumberland</b>		<b>8</b>	<b>16</b>		
	<i>Aedes triseriatus</i>	8	16		
<b>Salem</b>		<b>1</b>	<b>1</b>		
	<i>Aedes triseriatus</i>	1	1		
<b>Union</b>		<b>1</b>	<b>15</b>		
	<i>Aedes triseriatus</i>	1	15		
<b>Grand Total</b>		<b>141</b>	<b>322</b>		