

VECTOR SURVEILLANCE IN NEW JERSEY

EEE and WNV

CDC WEEK 32: August 03 to August 09, 2008

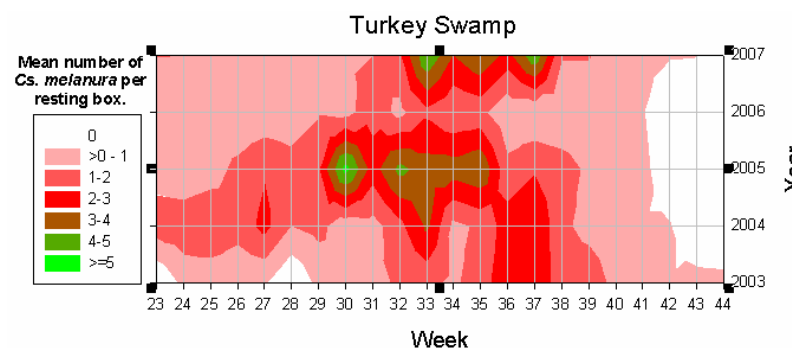
Prepared by Lisa M. Reed, Scott Crans Dina
Fonseca and Marc Slaff at the Center for Vector
Biology, Rutgers University.
Supported by funding from the NJ State
Mosquito Control Commission.

Culiseta melanura and Eastern Equine Encephalitis

SITE	Inland / Coastal	Historic Mean	Current Weekly Mean	Total Collected to Date*	Total Pools Submitted	EEE Isolations	MFIR
Green Bank (Burlington County)	Coastal	5.2	< 0.1	35	16		
Corbin City (Atlantic County)	Coastal	1.1	0.4	130	37		
Dennisville (Cape May County)	Coastal	7.7	0.2	371	31		
Waterford (Camden County)	Inland	0.5	0	0	0		
Centerton (Salem County)	Inland	1.8	0	190	28		
Turkey Swamp (Monmouth County)	Inland	1.9	0.3	136	32		
Glassboro (Gloucester County)	Inland	no history	0	9	6		

*Including trial run last week in May.

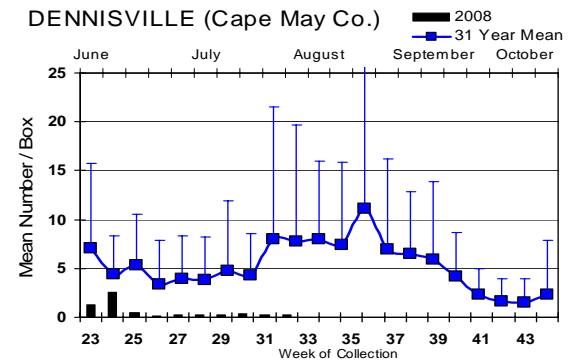
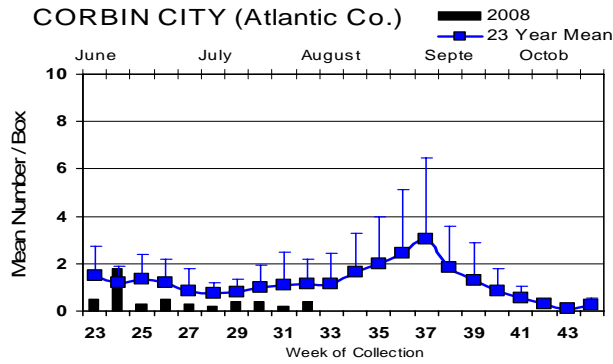
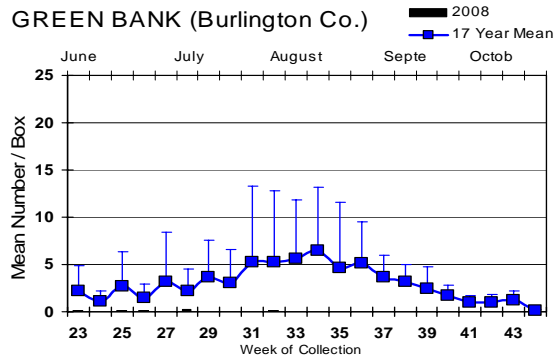
Remarks: *Culiseta melanura* are barely being caught at the monitoring resting box site, with three sites (all inland sites: Centerton, Glassboro and Waterford) catching no mosquitoes. This week's contour graph of the Turkey Swamp site illustrates the advantage and disadvantage of using such a graph. Intuitively, we tend to assign time between each year, such as going from 2004 upward to 2005. But time travels on the X axis, not the Y. The disadvantage is that we give credence to the number in the space between years (not a reality). However, this disadvantage allows us to more easily visualize the peaks each year and how they shift between years (as the shift to later peaks in 2007 as compared to 2005 at Turkey Swamp) without the difficulties associated with 3D images (hidden, inaccessible information).



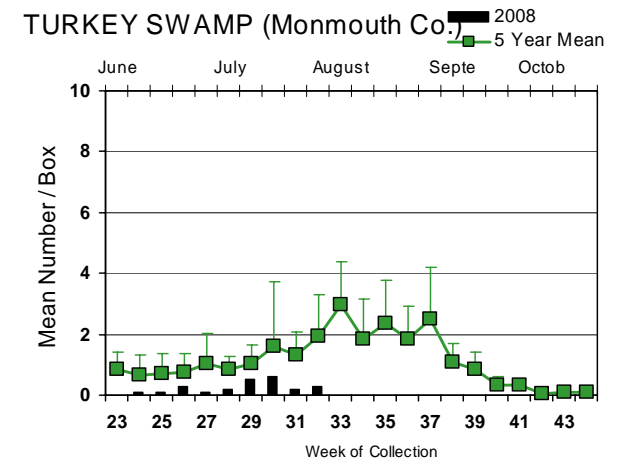
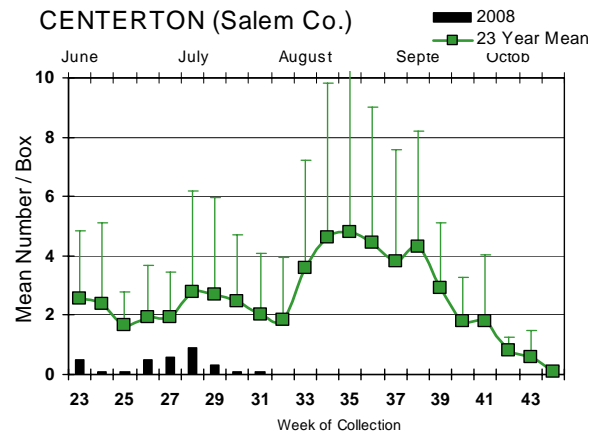
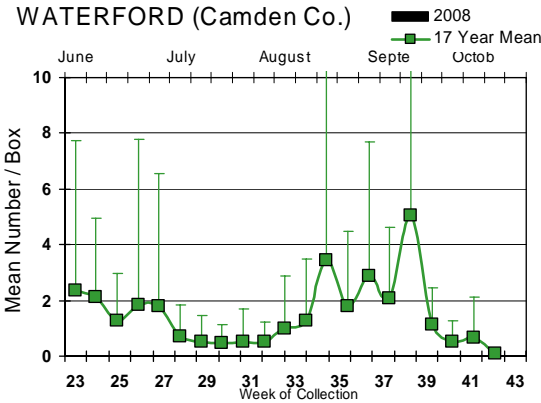
To date, 150 pools from 871 *Cs. melanura* mosquitoes have been sent for EEE testing from the resting box collections. No positives have been detected from these pools or from pools submitted by the counties. An additional 183 pools of 1568 individual mosquitoes from 28 species other than *Cs. melanura* have also been tested and all pools were found to be negative. These species include: *Aedes albopictus*, *Ae. canadensis canadensis*, *Ae. cantator*, *Ae. cinereus*, *Ae. communis*, *Ae. grossbecki*, *Ae. japonicus*, *Ae. sollicitans*, *Ae. sticticus*, *Ae. taeniorhynchus*, *Ae. triseriatus*, *Ae. vexans*, *Anopheles bradleyi*, *An. crucians*, *An. punctipennis*, *An. quadrimaculatus*, *Coquillettidia perturbans*, *Culex erraticus*, *Cx. pipiens*, *Cx. restuans*, *Cx., salinarius*, *Mixed Culex*, *Cx. territans*, *Culiseta inornata*, *Orthopodomyia signifera*, *Psorophora ciliata*, *Ps. columbiae*, *Ps., ferox*, and *Uranotaenia sapphirina*.

Culiseta melanura Population Graphs

Coastal



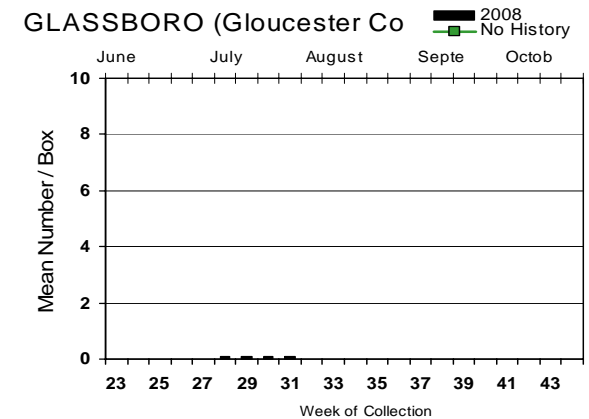
Inland



Figures: Inland and coastal resting box sites showing current weekly population levels (in bars) against historical trends (lines with standard deviation). The number of years for historical population levels varies by site.

An additional inland resting box site has been added. This site is located near Glassboro, in Gloucester County. The location is in a wildlife management area, with box location in a mixed forest swamp (Red Maple/White Pine).

In seventeen years of catching mosquitoes at the Waterford site, results have been quite variable. Average number of *Culiseta melanura* per box has ranged from below 1 to double digit highs in the 40's. Several times, a number of weeks will pass by without catching any mosquitoes. But, those trends are not longer than 5 weeks. Then (generally) small numbers of mosquitoes are caught. Sometimes, the zero trend will begin again for a few weeks afterwards. This year has proved to be particularly depauperate in mosquito numbers; after 10 weeks, no mosquitoes have been caught at Waterford.



EEE in US (2008 cumulative cases): (Red = new reported cases occurring)

- equine: 2(AL), 68(FL), 16(GA) 1(LA) 5(MS)
- mosquito: 3(FL), 1(GA), 1(VA)
- sentinel: 3(AL), 67(FL, 41 wild)
- human: 1(AL)

West Nile Virus

West Nile in US (2008 cumulative cases): Single black values indicate no change from previous week. Black values / red values equals previous week/**New totals**.

	Birds	Mosquito Pools	Sentinels	Horses	Humans
Alabama				1	1
Alaska					
Arizona	1	27/56	15/16		2/5
Arkansas		11		1	2/4
California	808/981	604/712	30/50	4/5	29/55
Colorado		7/17			14/18
Connecticut		44/73			1
Delaware					
Florida	2/3 live		2	1	
Georgia					
Hawaii					
Idaho	1/2	5 counties			7/9
Illinois	4/6	65/102		1	1
Indiana	1	2/21			
Iowa		1			1
Kansas					
Kentucky					
Louisiana		337/414		1	5
Maine					
Maryland		2			
Mass.	9/21	10/28			
Michigan	1/2	1			
Minnesota		1/3			3/8
Mississippi		1			34/35
Missouri		149/158		1	3
Montana					
Nebraska	1/3	4/18			2/3

	Birds	Mosquito Pools	Sentinels	Horses	Humans
Nevada		2/13			2
New Hampshire					
New Jersey	5/11	109/168			
New Mexico		1		1	
New York	13/25	40/135			
North Carolina				1	
North Dakota				1	6/8
Ohio		7/15			1
Oklahoma					3/5
Oregon		1/4			
Pennsylvania	2/3	61/144			1
Rhode Island					
South Carolina	2/3				
South Dakota	1	10/30		1	5/11
Tennessee		103/161			1/3
Texas		40/47			8/11
Utah	2	32/41			2/3
Vermont		1			
Virginia		97			
Washington		2/4		2/4	
West Virginia	2	10		2	1
Wisconsin	4/11			1	1
Wyoming		2/10			1/2

Note: Some data reported by states are provisional and are subject to change.

Protocol: New Jersey Department of Health and Senior Services (NJDHSS Public Health and Environmental Laboratories, PHEL) tests mosquito pools using RT-PCR Taqman techniques.

Mosquito Species Submitted for West Nile Virus Testing through 11 August 2008

Species	Pools	Mosquitoes	Positives	MFIR
<i>Aedes abserratus</i>	1	9		
<i>Aedes albopictus</i>	314	2561		
<i>Aedes atlanticus</i>	1	4		
<i>Aedes atropalpus</i>	1	1		
<i>Aedes canadensis canadensis</i>	52	1228		
<i>Aedes cantator</i>	24	356		
<i>Aedes cinereus</i>	1	3		
<i>Aedes communis</i>	1	1		
<i>Aedes grossbecki</i>	3	4		
<i>Aedes japonicus</i>	195	1010	1	0.990
<i>Aedes punctor</i>	1	1		
<i>Aedes sollicitans</i>	13	161		
<i>Aedes sticticus</i>	5	85		

<i>Aedes taeniorhynchus</i>	9	61		
<i>Aedes thibaulti</i>	5	13		
<i>Aedes triseriatus</i>	94	302		
<i>Aedes trivittatus</i>	2	2		
<i>Aedes vexans</i>	93	1625		
<i>Anopheles barberi</i>	1	1		
<i>Anopheles bradleyi</i>	35	736		
<i>Anopheles crucians</i>	3	4		
<i>Anopheles punctipennis</i>	81	547		
<i>Anopheles quadrimaculatus</i>	62	1029		
<i>Coquillettidia perturbans</i>	68	679		
<i>Culex erraticus</i>	32	195		
<i>Culex pipiens</i>	305	8328	24	2.882
<i>Culex restuans</i>	164	2901		
<i>Culex salinarius</i>	101	2727		
<i>Culex spp.</i>	1303	54836	143	2.608
<i>Culex territans</i>	23	61		
<i>Culiseta inornata</i>	2	4		
<i>Culiseta melanura</i>	190	1172		
<i>Orthopodomyia signifera</i>	6	15		
<i>Psorophora ciliata</i>	1	1		
<i>Psorophora columbiae</i>	7	31		
<i>Psorophora ferox</i>	13	103		
<i>Psorophora howardii</i>	1	4		
<i>Uranotaenia sapphirina</i>	7	36		
Grand Total	3220	80837	168	2.078

Remarks: Submitted pools (3,220) comprised of 80,837 individual mosquitoes produced 168 positive pools from 12 different counties. The first non-*Culex* positive bridge vector (*Aedes japonicus*) has been found in Essex County. Submissions are from 37 different species and are from all 21 counties.

In 2003, *Aedes canadensis* was the first non-*Culex*, non birdfeeder pools to be found positive for WNV in New Jersey. Since then, the two highly WNV competent species *Ae. albopictus* or *japonicus* have been found positive, sometimes the first species after *Culex*. The table to the right show the CDC weeks when these two species have come up positive in New Jersey. *Ae. japonicus* appears to show more variability in acquiring the virus. It is not unreasonable to expect a positive pool of *Ae. albopictus* soon, particularly when this species has been generating numerous complaints for mosquito control agencies. "np" stands for "not positive" for that year.

Year	<i>Aedes albopictus</i>	<i>Aedes japonicus</i>
2001	30	26
2002	30	31
2003	31	33
2004	np	np
2005	np	34
2006	32	40
2007	29	31
2008	?	31

Humans, Horses and Wild Birds: To date, there have been 99 dead birds submitted for West Nile virus testing with 11 positives. Although last year, the first positive bird showed up two days earlier than this year, to the same date last year, there were only 4 positive birds through 115 submissions.

2008 Positive Mosquito pools to date / Total Mosquito Pools Submitted	This time last year
168 / 3,220	113 / 2,751

WNV Results by County through 11 August 2008

County	Species	Pools	Mosquitoes	Positives	MFIR
Atlantic		156	3128	7	2.238
	<i>Aedes albopictus</i>	12	310		

<i>Aedes canadensis canadensis</i>	3	12		
<i>Aedes cantator</i>	2	16		
<i>Aedes japonicus</i>	2	3		
<i>Aedes sollicitans</i>	1	9		
<i>Aedes taeniorhynchus</i>	4	38		
<i>Aedes thibaulti</i>	4	8		
<i>Aedes triseriatus</i>	3	12		
<i>Aedes vexans</i>	5	49		
<i>Anopheles bradleyi</i>	5	22		
<i>Anopheles punctipennis</i>	2	2		
<i>Anopheles quadrimaculatus</i>	1	1		
<i>Coquillettidia perturbans</i>	4	41		
<i>Culex erraticus</i>	3	62		
<i>Culex restuans</i>	4	39		
<i>Culex salinarius</i>	2	2		
<i>Culex sp.</i>	53	2339	7	2.993
<i>Culex territans</i>	5	16		
<i>Culiseta melanura</i>	39	134		
<i>Psorophora ferox</i>	2	13		
Bergen	305	11751	42	3.574
<i>Aedes albopictus</i>	18	91		
<i>Aedes canadensis canadensis</i>	1	6		
<i>Aedes japonicus</i>	21	134		
<i>Aedes sollicitans</i>	1	1		
<i>Aedes triseriatus</i>	11	39		
<i>Aedes vexans</i>	11	81		
<i>Anopheles barberi</i>	1	1		
<i>Anopheles bradleyi</i>	1	3		
<i>Anopheles punctipennis</i>	4	31		
<i>Coquillettidia perturbans</i>	16	150		
<i>Culex pipiens</i>	58	1771	4	2.010
<i>Culex restuans</i>	25	307		
<i>Culex salinarius</i>	39	1710		
<i>Culex spp.</i>	97	7206	38	5.273
<i>Culex territans*</i>	1	1		
*error corrected – positives in Culex mixed pools, not territans				
Burlington	207	1893		
<i>Aedes albopictus</i>	11	58		
<i>Aedes canadensis canadensis</i>	21	598		
<i>Aedes cantator</i>	4	148		
<i>Aedes cinereus</i>	1	3		
<i>Aedes grossbecki</i>	1	1		
<i>Aedes japonicus</i>	8	22		
<i>Aedes sollicitans</i>	1	18		
<i>Aedes sticticus</i>	2	5		
<i>Aedes taeniorhynchus</i>	1	2		
<i>Aedes triseriatus</i>	10	37		
<i>Aedes vexans</i>	25	238		
<i>Anopheles bradleyi</i>	2	6		
<i>Anopheles crucians</i>	3	4		
<i>Anopheles punctipennis</i>	13	29		
<i>Anopheles quadrimaculatus</i>	4	6		
<i>Coquillettidia perturbans</i>	17	227		
<i>Culex erraticus</i>	2	2		

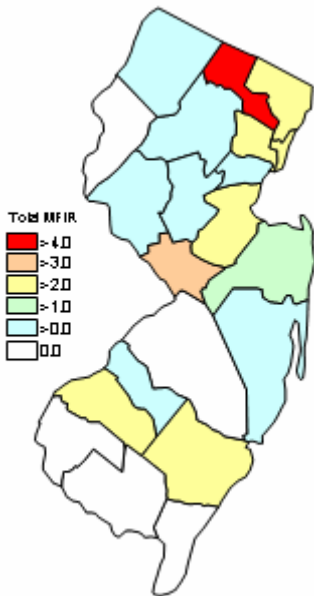
	<i>Culex pipiens</i>	2	18		
	<i>Culex restuans</i>	4	27		
	<i>Culex salinarius</i>	1	1		
	<i>Culex sp.</i>	27	265		
	<i>Culex territans</i>	3	6		
	<i>Culiseta inornata</i>	1	3		
	<i>Culiseta melanura</i>	31	145		
	<i>Orthopodomyia signifera</i>	3	11		
	<i>Psorophora ciliata</i>	1	1		
	<i>Psorophora columbiae</i>	2	3		
	<i>Psorophora ferox</i>	3	4		
	<i>Uranotaenia sapphirina</i>	3	5		
Camden		107	1972	2	1.014
	<i>Aedes albopictus</i>	17	169		
	<i>Aedes canadensis canadensis</i>	1	19		
	<i>Aedes cantator</i>	1	22		
	<i>Aedes japonicus</i>	11	27		
	<i>Aedes triseriatus</i>	1	1		
	<i>Aedes trivittatus</i>	1	1		
	<i>Aedes vexans</i>	4	46		
	<i>Anopheles punctipennis</i>	7	31		
	<i>Anopheles quadrimaculatus</i>	4	5		
	<i>Coquillettidia perturbans</i>	4	16		
	<i>Culex erraticus</i>	1	1		
	<i>Culex pipiens</i>	11	495		
	<i>Culex restuans</i>	16	479		
	<i>Culex salinarius</i>	3	14		
	<i>Culex sp.</i>	21	641	2	3.120
	<i>Culiseta melanura</i>	1	1		
	<i>Orthopodomyia signifera</i>	2	3		
	<i>Psorophora columbiae</i>	1	1		
Cape_May		196	3884		
	<i>Aedes canadensis canadensis</i>	4	71		
	<i>Aedes cantator</i>	8	82		
	<i>Aedes japonicus</i>	5	13		
	<i>Aedes sollicitans</i>	3	81		
	<i>Aedes taeniorhynchus</i>	2	8		
	<i>Aedes triseriatus</i>	1	1		
	<i>Aedes vexans</i>	2	13		
	<i>Anopheles bradleyi</i>	15	442		
	<i>Anopheles punctipennis</i>	6	101		
	<i>Anopheles quadrimaculatus</i>	13	493		
	<i>Coquillettidia perturbans</i>	3	27		
	<i>Culex erraticus</i>	3	15		
	<i>Culex pipiens</i>	30	625		
	<i>Culex restuans</i>	40	798		
	<i>Culex salinarius</i>	11	425		
	<i>Culex sp.</i>	16	309		
	<i>Culex territans</i>	1	2		
	<i>Culiseta melanura</i>	33	378		
Cumberland		94	1236	1	0.819
	<i>Aedes albopictus</i>	17	63		

	<i>Aedes japonicus</i>	9	10		
	<i>Aedes triseriatus</i>	6	6		
	<i>Coquillettidia perturbans</i>	1	1		
	<i>Culex erraticus</i>	5	16		
	<i>Culex spp.</i>	55	1102	1	0.907
	<i>Culiseta melanura</i>	1	38		
Essex		142	2592	19	7.330
	<i>Aedes albopictus</i>	27	175		
	<i>Aedes japonicus</i>	13	69	1	14.493
	<i>Aedes triseriatus</i>	8	12		
	<i>Aedes trivittatus</i>	1	1		
	<i>Aedes vexans</i>	1	1		
	<i>Anopheles punctipennis*</i>	2	2		
	<i>Anopheles quadrimaculatus</i>	3	10		
	<i>Coquillettidia perturbans</i>	2	2		
	<i>Culex spp.</i>	85	2320	18	7.759
	<small>* Ae. punctator was An. punctipennis</small>				
Gloucester		265	5986	15	2.506
	<i>Aedes abserratus</i>	1	9		
	<i>Aedes albopictus</i>	14	192		
	<i>Aedes canadensis canadensis</i>	7	245		
	<i>Aedes communis</i>	1	1		
	<i>Aedes japonicus</i>	16	97		
	<i>Aedes thibaulti</i>	1	5		
	<i>Aedes triseriatus</i>	5	14		
	<i>Aedes vexans</i>	6	251		
	<i>Anopheles bradleyi</i>	4	86		
	<i>Anopheles punctipennis</i>	15	61		
	<i>Anopheles quadrimaculatus</i>	12	33		
	<i>Coquillettidia perturbans</i>	2	31		
	<i>Culex erraticus</i>	1	37		
	<i>Culex pipiens</i>	136	4211	15	3.562
	<i>Culex restuans</i>	14	581		
	<i>Culex salinarius</i>	6	34		
	<i>Culex territans</i>	4	11		
	<i>Culiseta melanura</i>	17	61		
	<i>Psorophora ferox</i>	1	4		
	<i>Uranotaenia sapphirina</i>	2	22		
Hudson		83	4214	16	3.797
	<i>Culex spp.</i>	83	4214	16	3.797
Hunterdon		110	5316	2	0.376
	<i>Aedes albopictus</i>	1	2		
	<i>Anopheles punctipennis</i>	1	50		
	<i>Anopheles quadrimaculatus</i>	1	11		
	<i>Culex erraticus</i>	1	10		
	<i>Culex spp.</i>	105	5242	2	0.382
	<i>Culiseta inornata</i>	1	1		
Mercer		142	1130	4	3.540

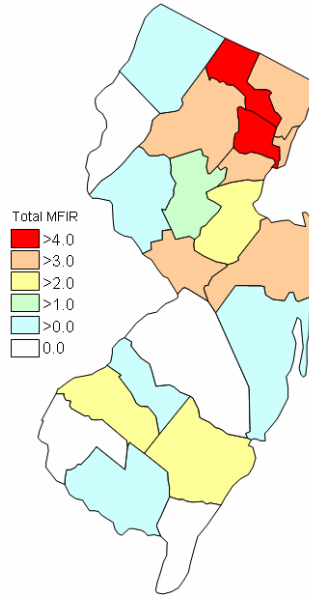
<i>Aedes albopictus</i>	66	396		
<i>Aedes atropalpus</i>	1	1		
<i>Aedes japonicus</i>	27	58		
<i>Aedes triseriatus</i>	9	23		
<i>Culex erraticus</i>	8	26		
<i>Culex pipiens</i>	14	342	4	11.696
<i>Culex restuans</i>	3	18		
<i>Culex salinarius</i>	8	154		
<i>Culex spp.</i>	6	112		
Middlesex	155	3253	7	2.152
<i>Aedes albopictus</i>	15	120		
<i>Aedes japonicus</i>	10	51		
<i>Aedes triseriatus</i>	2	7		
<i>Aedes vexans</i>	4	111		
<i>Culex erraticus</i>	1	1		
<i>Culex pipiens</i>	12	121		
<i>Culex restuans</i>	6	108		
<i>Culex salinarius</i>	4	102		
<i>Culex spp.</i>	99	2617	7	2.675
<i>Culex territans</i>	1	8		
<i>Uranotaenia sapphirina</i>	1	7		
Monmouth	256	2938	10	3.404
<i>Aedes albopictus</i>	32	106		
<i>Aedes canadensis canadensis</i>	3	18		
<i>Aedes cantator</i>	4	5		
<i>Aedes japonicus</i>	10	21		
<i>Aedes sollicitans</i>	5	30		
<i>Aedes taeniorhynchus</i>	2	13		
<i>Aedes triseriatus</i>	5	10		
<i>Aedes vexans</i>	12	104		
<i>Anopheles punctipennis</i>	7	10		
<i>Anopheles quadrimaculatus</i>	1	1		
<i>Coquillettidia perturbans</i>	4	5		
<i>Culex pipiens</i>	31	252		
<i>Culex restuans</i>	25	170		
<i>Culex salinarius</i>	8	24		
<i>Culex spp.</i>	70	2020	10	4.950
<i>Culex territans</i>	5	13		
<i>Culiseta melanura</i>	32	136		
Morris	90	4308	15	3.482
<i>Aedes japonicus</i>	1	6		
<i>Coquillettidia perturbans</i>	1	50		
<i>Culex spp.</i>	88	4252	15	3.528
Ocean	201	3979	1	0.251
<i>Aedes albopictus</i>	45	632		
<i>Aedes canadensis canadensis</i>	5	77		
<i>Aedes cantator</i>	1	9		
<i>Aedes japonicus</i>	17	40		
<i>Aedes sollicitans</i>	1	21		
<i>Aedes triseriatus</i>	5	17		
<i>Aedes vexans</i>	8	36		

<i>Anopheles bradleyi</i>	2	2		
<i>Anopheles punctipennis</i>	2	5		
<i>Anopheles quadrimaculatus</i>	1	1		
<i>Coquillettidia perturbans</i>	4	15		
<i>Culex pipiens</i>	7	247	1	4.049
<i>Culex restuans</i>	15	245		
<i>Culex salinarius</i>	13	92		
<i>Culex sp.</i>	64	2449		
<i>Culex territans</i>	1	1		
<i>Culiseta melanura</i>	7	79		
<i>Psorophora ferox</i>	3	11		
Passaic	55	2256	14	6.206
<i>Aedes albopictus</i>	1	11		
<i>Aedes japonicus</i>	3	32		
<i>Aedes triseriatus</i>	1	2		
<i>Culex spp.</i>	50	2211	14	6.332
Salem	187	2579		
<i>Aedes albopictus</i>	11	34		
<i>Aedes atlanticus</i>	1	4		
<i>Aedes canadensis canadensis</i>	6	180		
<i>Aedes cantator</i>	4	74		
<i>Aedes grossbecki</i>	2	3		
<i>Aedes japonicus</i>	8	21		
<i>Aedes sollicitans</i>	1	1		
<i>Aedes sticticus</i>	3	80		
<i>Aedes triseriatus</i>	10	25		
<i>Aedes vexans</i>	14	688		
<i>Anopheles bradleyi</i>	6	175		
<i>Anopheles punctipennis</i>	18	220		
<i>Anopheles quadrimaculatus</i>	21	467		
<i>Coquillettidia perturbans</i>	6	33		
<i>Culex erraticus</i>	7	25		
<i>Culex pipiens</i>	2	5		
<i>Culex restuans</i>	5	12		
<i>Culex salinarius</i>	6	169		
<i>Culex spp.</i>	15	56		
<i>Culex territans</i>	2	3		
<i>Culiseta melanura</i>	29	200		
<i>Psorophora columbiae</i>	4	27		
<i>Psorophora ferox</i>	4	71		
<i>Psorophora howardii</i>	1	4		
<i>Uranotaenia sapphirina</i>	1	2		
Somerset	123	2606	4	1.535
<i>Aedes albopictus</i>	9	28		
<i>Aedes canadensis canadensis</i>	1	2		
<i>Aedes japonicus</i>	23	229		
<i>Aedes triseriatus</i>	17	96		
<i>Anopheles punctipennis</i>	4	4		
<i>Anopheles quadrimaculatus</i>	1	1		
<i>Culex pipiens</i>	2	22		
<i>Culex restuans</i>	2	19		

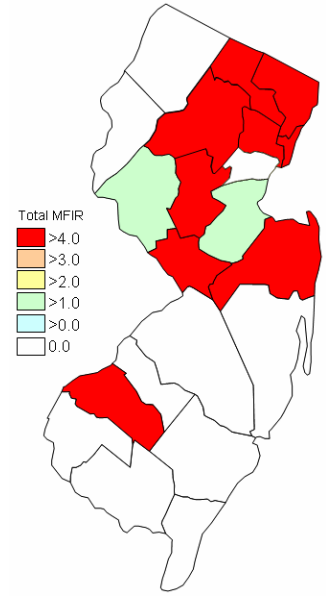
<i>Culex spp.</i>	63	2204	4	1.815
<i>Orthopodomyia signifera</i>	1	1		
Sussex	150	7384	1	0.135
<i>Aedes japonicus</i>	5	122		
<i>Coquillettidia perturbans</i>	4	81		
<i>Culex restuans</i>	4	96		
<i>Culex spp.</i>	137	7085	1	0.141
Union	77	2518	8	3.177
<i>Aedes albopictus</i>	18	174		
<i>Aedes japonicus</i>	4	6		
<i>Aedes vexans</i>	1	7		
<i>Anopheles punctipennis</i>	1	2		
<i>Culex restuans</i>	1	2		
<i>Culex spp.</i>	52	2327	8	3.438
Warren	119	5914		
<i>Aedes japonicus</i>	2	49		
<i>Culex spp.</i>	117	5865		
Grand Total	3220	80837	168	2.078



Cumulative activity to last week



Cumulative activity to this week



Current 2 Week Activity 7/28 to 8/04)

The above graphs are meant to illustrate viral activity through mosquito MFIR values. Cumulative results can show increases in activity but are loaded with inertia, as they can show high MFIR values that may have occurred several weeks ago. Current MFIR values (the graph on the right) are better at showing “snapshot” activity as weekly values do not carry the inertia of past high activity. The most recent two week period appears to be inclusive of the changes we observe (more so than the most recent one week period).

RAMP (Rapid Analyte Measurement Platform). More than half of the counties in New Jersey are incorporating the use of RAMP results in their vector surveillance programs. Counties participate with the PHEL Lab in monitoring the efficacy and sensitivity of the RAMP results by sending in samples to be confirmed. Note that not all samples done by the counties are sent in to PHEL and therefore the number of pools submitted can differ from the number of pools reported by the counties.

RAMP Results for 11 August 2008

County	Species	Pools	Mosquitoes	Positives	PHEL (submitted/+/-)
Monmouth		75	671		
	<i>Aedes albopictus</i>	4	11		
	<i>Aedes canadensis</i>	8	38		
	<i>Aedes cantator</i>	3	13		
	<i>Aedes japonicus</i>	11	42		
	<i>Aedes triseriatus</i>	1	1		
	<i>Anopheles punctipennis</i>	3	6		
	<i>Coquillettidia perturbans</i>	1	1		
	<i>Culex spp.</i>	2	2		
	<i>Culiseta melanura</i>	1	1		
Warren		42	1758		
	<i>Culex restuans</i>	1	4		
	<i>Culex spp.</i>	39	1754	2	9/0/2