

NEW JERSEY STATEWIDE SURVEILLANCE

Week 29 Report for 14 July to 20 July, 2004

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Purpose: Data from 84 New Jersey light traps contributed by county mosquito control agencies are used to calculate trends in mosquito populations for species of nuisance or health concerns.

Calculations are based on regional distributions, with emphasis on mosquito habitat and land use. Trends will allow a statewide evaluation of changing mosquito populations, in response to control and/or changes in habitat.

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Figure 1a: Map of ten regions selected for the New Jersey Surveillance Program overlaid with county borders.

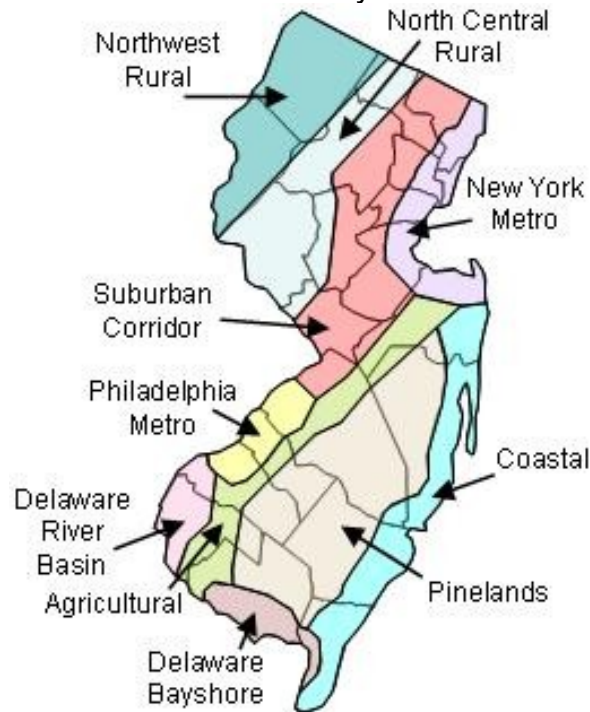


Figure 1b. Trap lat-long locations.



Summary table

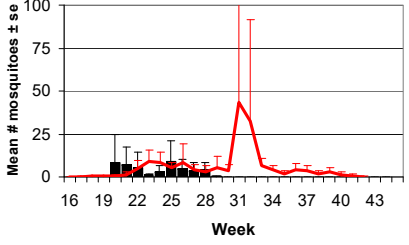
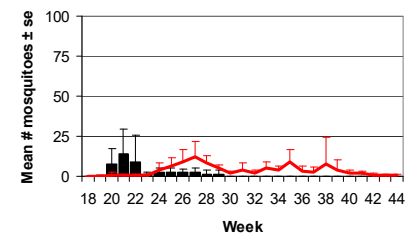
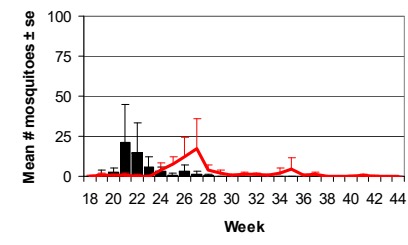
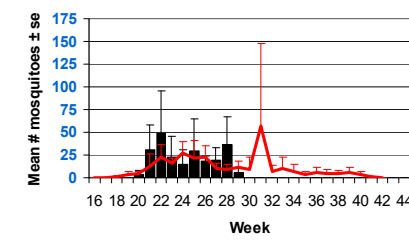
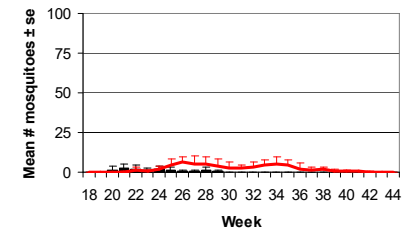
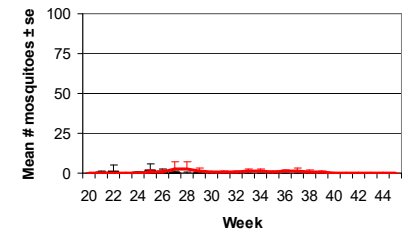
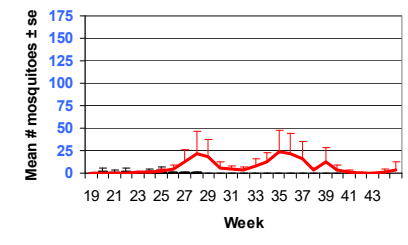
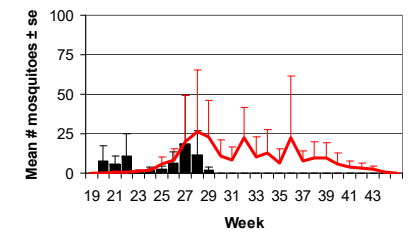
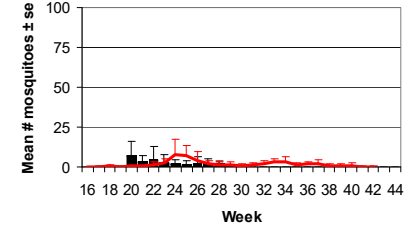
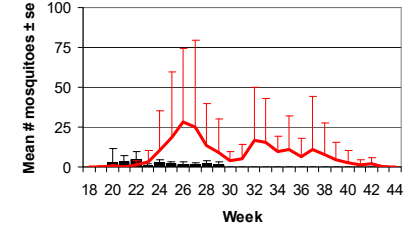
	<i>Aedes vexans</i>		<i>Culex complex</i>		<i>Coquillettidia perturbans</i>		<i>Ochlerotatus sollicitans</i>	
Region	This Week	Average*	This Week	Average*	This Week	Average*	This Week	Average*
Agricultural	0.36	4.13	4.76	14.19	0.14	0.51	0.14	0.37
Coastal	1.54	5.11	0.75	15.52	0.33	0.36	44.44	14.93
Delaware Bayshore	0.00	1.81	9.12	44.69	1.19	1.83	44.90	3.02
Delaware River Basin	5.89	9.86	3.64	11.48	0.14	0.08	0.07	0.16
New York Metro	0.51	4.00	0.20	8.51	0.12	0.46	0.24	0.21
North Central Rural	0.37	0.39	0.39	2.13	0	0.18	0.00	0
Northwest Rural	0.19	5.78	0.48	9.37	0	0.31	0.00	0
Philadelphia Metro	2.03	11.08	1.24	6.75	0.21	0.32	0.00	0
Pinelands	0.65	1.91	0.58	7.27	0.36	0.88	0.01	0.06
Suburban Corridor	1.14	8.67	1.79	6.78	0.50	5.75	0.00	0

- Complete data not yet available.

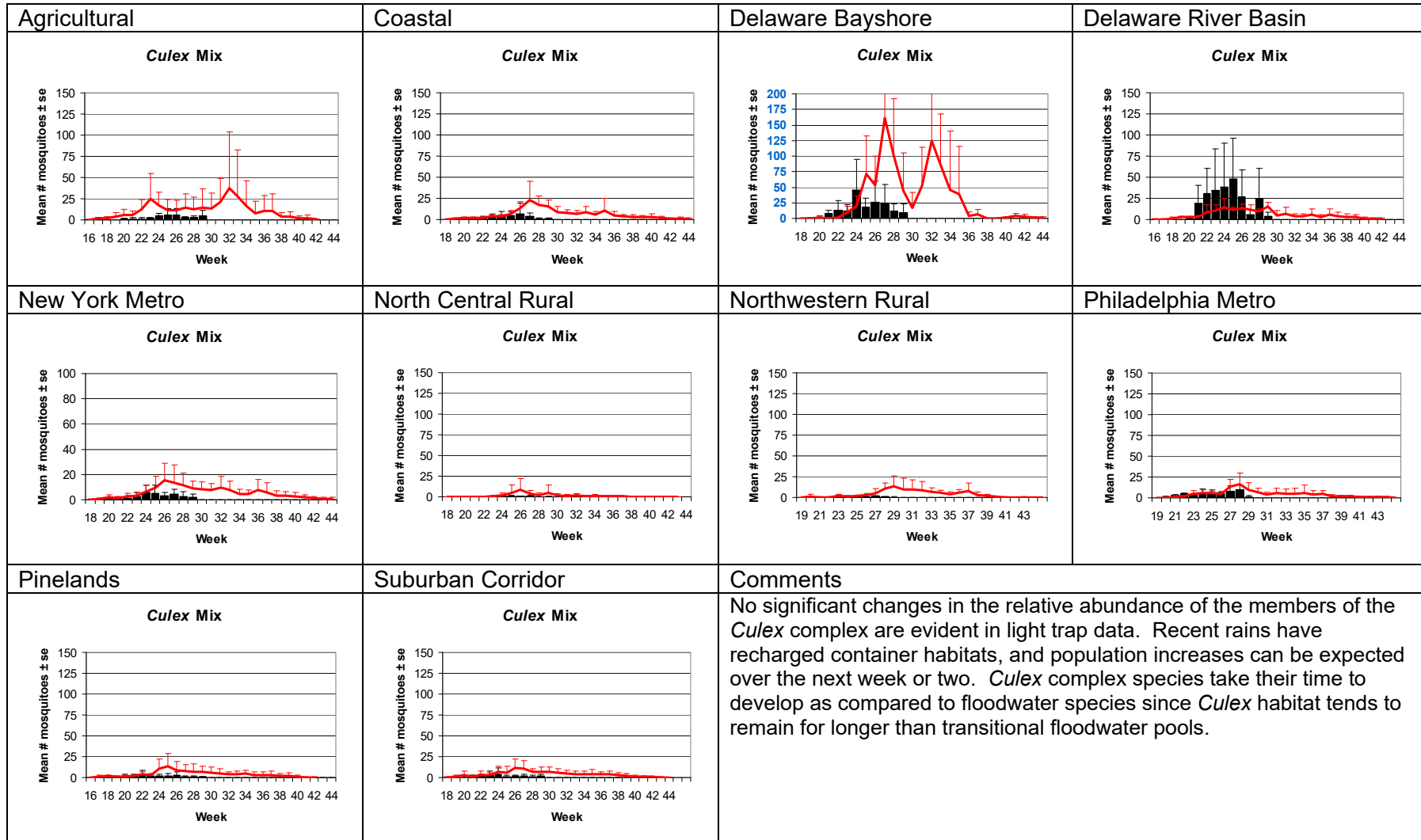
Additional Species, include *Cs. melanura* and *Ochlerotatus canadensis*.

17 Counties reporting (20 counties on week 28).

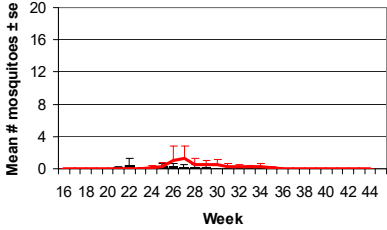
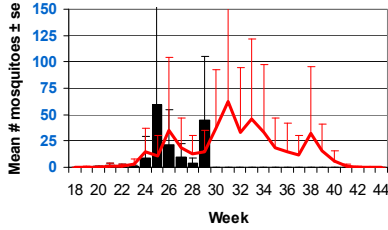
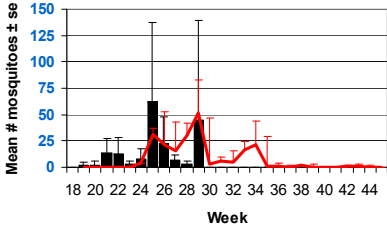
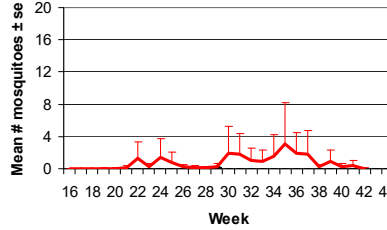
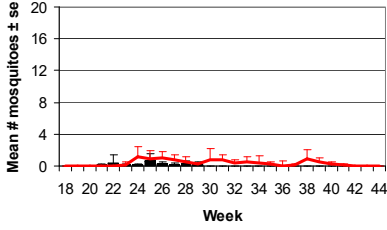
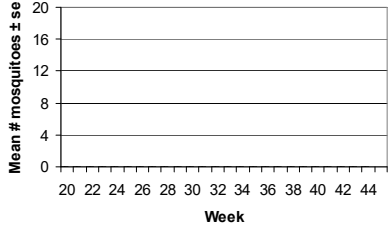
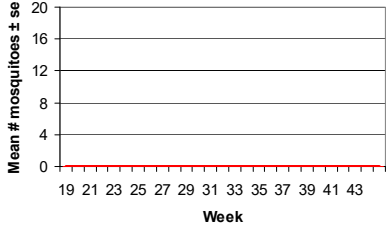
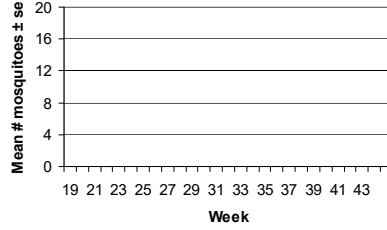
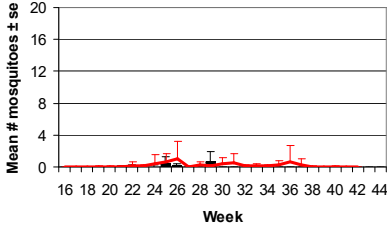
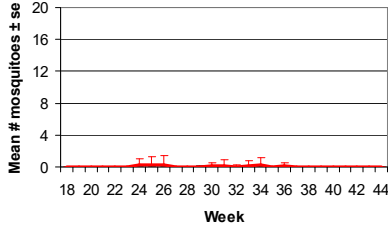
Aedes vexans - Fresh Floodwater Species

Agricultural	Coastal	Delaware Bayshore	Delaware River Basin
<i>Aedes vexans</i> 	<i>Aedes vexans</i> 	<i>Aedes vexans</i> 	<i>Aedes vexans</i> 
New York Metro	North Central Rural	Northwestern Rural	Philadelphia Metro
<i>Aedes vexans</i> 	<i>Aedes vexans</i> 	<i>Aedes vexans</i> 	<i>Aedes vexans</i> 
Pinelands	Suburban Corridor	Comments	
<i>Aedes vexans</i> 	<i>Aedes vexans</i> 	Flooding conditions over the past week has undoubtedly created suitable habitat for <i>Aedes vexans</i> and other floodwater species. These mosquitoes have not yet appeared in the State Surveillance light traps, but are expected to once they emerge in the next several days.	

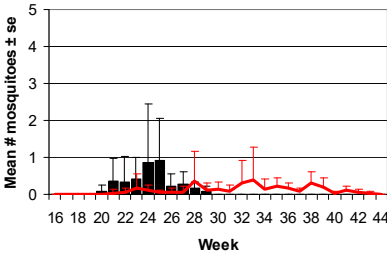
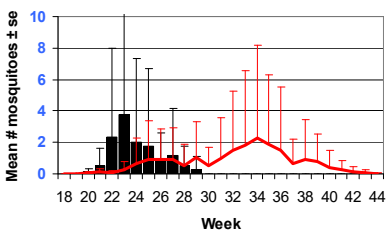
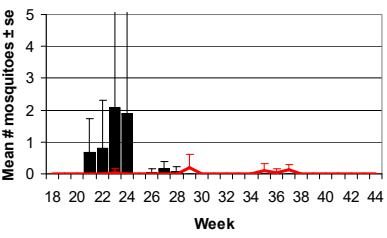
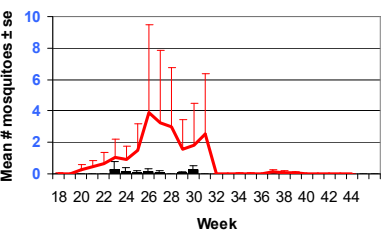
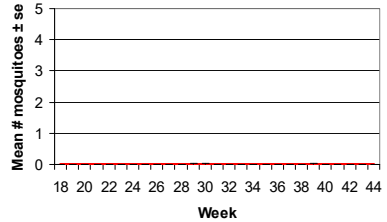
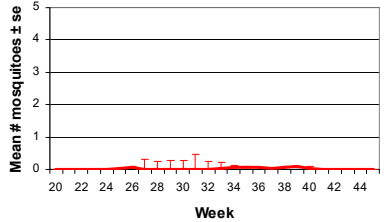
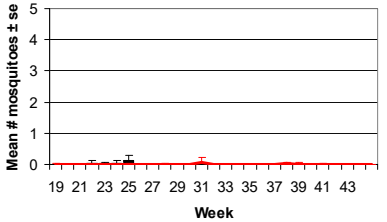
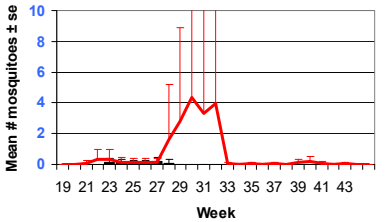
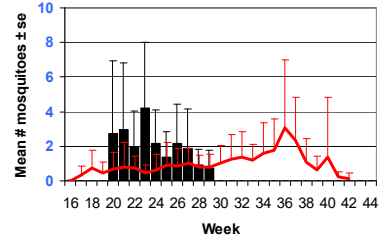
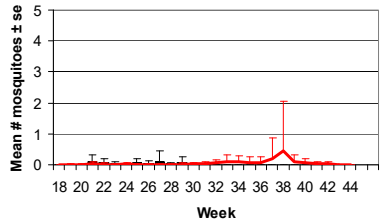
Culex Complex - Multivoltine Culex Species



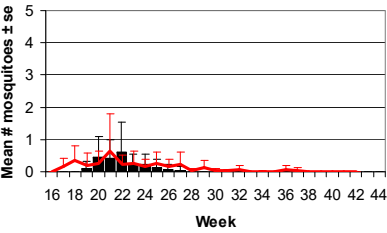
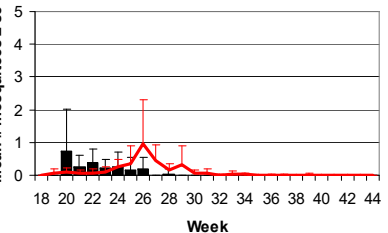
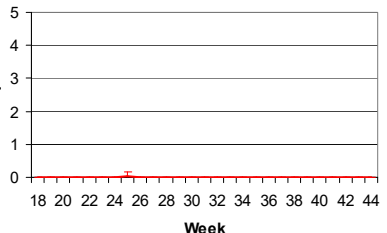
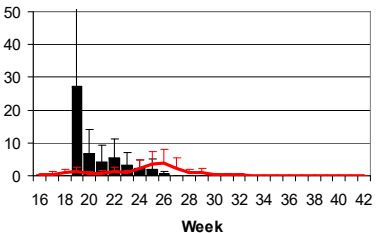
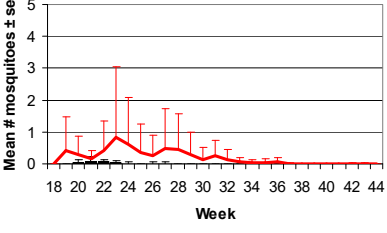
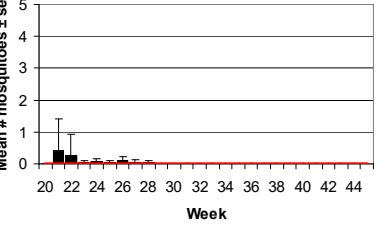
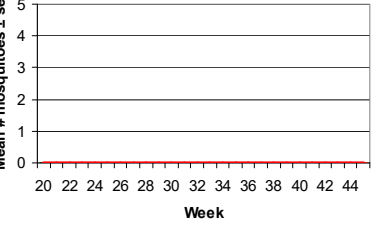
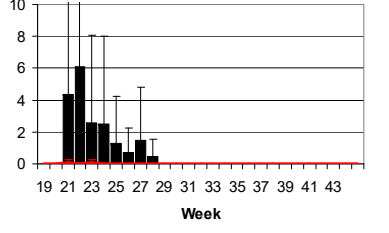
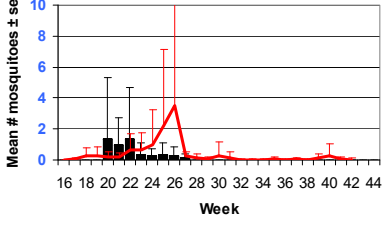
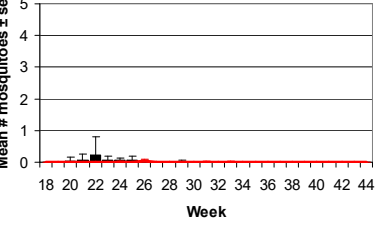
Ochlerotatus sollicitans - Salt Marsh Floodwater Species

Agricultural	Coastal	Delaware Bayshore	Delaware River Basin
<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 
New York Metro	North Central Rural	Northwestern Rural	Philadelphia Metro
<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 
Pinelands	Suburban Corridor	Comments	
<i>Ochlerotatus sollicitans</i> 	<i>Ochlerotatus sollicitans</i> 	State Surveillance light trap data show that a major emergence of <i>Ochlerotatus sollicitans</i> has occurred in the Coastal and Bayshore regions of the state. This brood may be large enough to enter light traps well inland as they migrate through to the Agricultural and Pineland regions.	

Culiseta melanura - Miscellaneous Group

Agricultural <i>Culiseta melanura</i> 	Coastal <i>Culiseta melanura</i> 	Delaware Bayshore <i>Culiseta melanura</i> 	Delaware River Basin <i>Culiseta melanura</i> 
New York Metro <i>Culiseta melanura</i> 	North Central Rural <i>Culiseta melanura</i> 	Northwestern Rural <i>Culiseta melanura</i> 	Philadelphia Metro <i>Culiseta melanura</i> 
Pinelands <i>Culiseta melanura</i> 	Suburban Corridor <i>Culiseta melanura</i> 	Comments Resting box data from the vector surveillance program shows an increase in <i>Culiseta melanura</i> abundance over the past four weeks. This increase is not reflected in the light trap data to date.	

Ochlerotatus canadensis Early Season Species

Agricultural <i>Ochlerotatus canadensis</i> 	Coastal <i>Ochlerotatus canadensis</i> 	Delaware Bayshore <i>Ochlerotatus canadensis</i> 	Delaware River Basin <i>Ochlerotatus canadensis</i> 
New York Metro <i>Ochlerotatus canadensis</i> 	North Central Rural <i>Ochlerotatus canadensis</i> 	Northwestern Rural <i>Ochlerotatus canadensis</i> 	Philadelphia Metro <i>Ochlerotatus canadensis</i> 
Pinelands <i>Ochlerotatus canadensis</i> 	Suburban Corridor <i>Ochlerotatus canadensis</i> 	Comments This years' population trends of <i>Ochlerotatus canadensis</i> clearly show it's univoltine nature. This species frequently re-appears later in the season when suitable flooded habitat appears and the eggs that require more than one flooding develop. Recent rains may produce a second, atypical brood this year.	