

Mosquito Surveillance Report

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Introduction

The Mosquito Surveillance Program at the New Jersey Agricultural Experiment Station is now entering the eleventh year of reporting the status of the major pest species in the various regions of New Jersey. This year marks the beginning of our use of the IBM personal computer in storage and analysis of the light trap data. We are using the "dBASE-II" software to enter and manipulate the data, a BASIC program to calculate the Williams means, and a Hewlett-Packard plotter to draw the graphs. These advances should enable the reports to be put together and distributed more quickly (once all the bugs are worked out!). I certainly welcome your comments and suggestions regarding the Mosquito Surveillance Report.

The data presented in this report were generously supplied by the various county mosquito control agencies of New Jersey. The data are somewhat incomplete because some counties have not been able to supply the information at this time. As additional data are received for the first two weeks of this report, the graphs will be corrected accordingly.

The precipitation has been greater than average this spring with the corresponding increase in mosquito habitat. The average temperatures during the period covered by this report were 2 to 6 degrees (F) below average. This has reduced the developmental rate of the larvae and the activity of the adult mosquitoes.

Early Season Aedes

The early season Aedes were abundant in most areas of New Jersey this year. Unlike last year, there was not a rapid drying of the habitats this year. The cool temperatures resulted in reduced activity of the adults of this group, but considerable annoyance was experienced in many areas of the state. In general these species are not attracted to light, thus the population levels can not be determined by trap records.

Floodwater and <u>Culex</u> mosquitoes

Spring floodwater <u>Aedes</u> were at normal levels throughout most of the State during this period. The warmer weather will increase activity of these mosquitoes and result in increased trap collections as well. The <u>Culex</u> mosquitoes were about average, and are expected to increase in numbers through the summer.

Salt Marsh Mosquitoes

Aedes cantator populations were higher than average again this year along the Atlantic coast and the Delaware Bay. Last year this species persisted well into the summer, though it is usually abundant only in the spring and very early Aedes sollicitans populations were higher than average along the Atlantic summer. coast due to flooding from both tides and rain.

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