

Mosquito Control Update

November 26, 2012

The arrival of cooler weather has resulted in a decrease in mosquito activity. When temperatures are about 55 degrees, biting activity of adult mosquitoes is reduced. Over the past few weeks the area has been experiencing mild daytime temperatures and cool to cold nighttime temperatures. As a result, mosquito activity has been mainly in the early to late afternoon before sunset when temperatures begin to fall. After sunset, mosquito activity is very low. Light trap data has confirmed the reduced nighttime activity with the small amounts of adult mosquitoes collected throughout the parish. Because there is very little adult mosquito activity at night, spray trucks and the aircraft have been employed only on those nights when temperatures were above 55 degrees. Spraying at night with temperatures below about 55 degrees is not effective. The aerosol sprays by the trucks and aircraft are designed to produce very fine droplets that are suspended in the air long enough for flying mosquitoes to be impacted. The sprays, which metabolize within hours, have no residual activity. So, if mosquitoes are not actively flying at nighttime due to cool temperatures, the spraying does no good. Earlier in the month, spray trucks conducted some limited spraying at night. Also, some truck spraying was conducted in selected areas in early afternoon by mosquito control inspectors and biologists. These are areas where the inspectors and biologists encountered relatively high mosquito counts in the course of their mosquito surveillance duties. One aerial adulticide mission was conducted last week in the Mandeville and Slidell areas, treating 15,360 acres.

It appears that the West Nile virus season is over for St. Tammany Parish, although there have been recent reports of human cases in other parts of the state. The last reported positive mosquito pool for West Nile virus in St. Tammany Parish occurred on October 5. The last onset for a human case in the parish was September 5. Even though viral activity has not been detected for almost 2 months, larvicide crews continue to treat the roadside ditches for the control of *Culex quinquefasciatus*, the southern house mosquito, the primary carrier of West Nile virus. The breeding index of this mosquito for the past two weeks has only been 1.2-1.4 larvae per dip. Even though the temperatures have been cool, this mosquito will continue to go through its life cycle, but at a much slower pace.

Soon, mosquito control personnel will begin winter projects such as annual preventative maintenance of all equipment, vehicles and sprayers, and mapping. Mosquito inspection and control will be performed on an as needed basis.