

Summary of Pheromone Trapping and Orchard Scouting in 2007 – Dagsboro, DE

Methods:

(1) **Pheromone trapping Program:** Traps were placed in the orchard by the producer on April 1 and the first moths were caught in the traps on May 1. Three trapping locations per species were established and traps were checked on a weekly basis. Insects monitored included: Oriental fruit moth, Lesser peach tree borer, Greater peach tree borer and Tufted apple bud moth. Lures were changed every 2-3 weeks.

(2) **Orchard Scouting:** The orchard was scouted on a weekly basis from May 1st to August 16th to help monitor the success of using mating disruption pheromones for oriental fruit moth and to insure that other pest populations remained below a treatment level. The orchard was split into three zones by the producer, with a total of nineteen varieties distributed among each of the zones. In each variety, the following sampling was done each week:

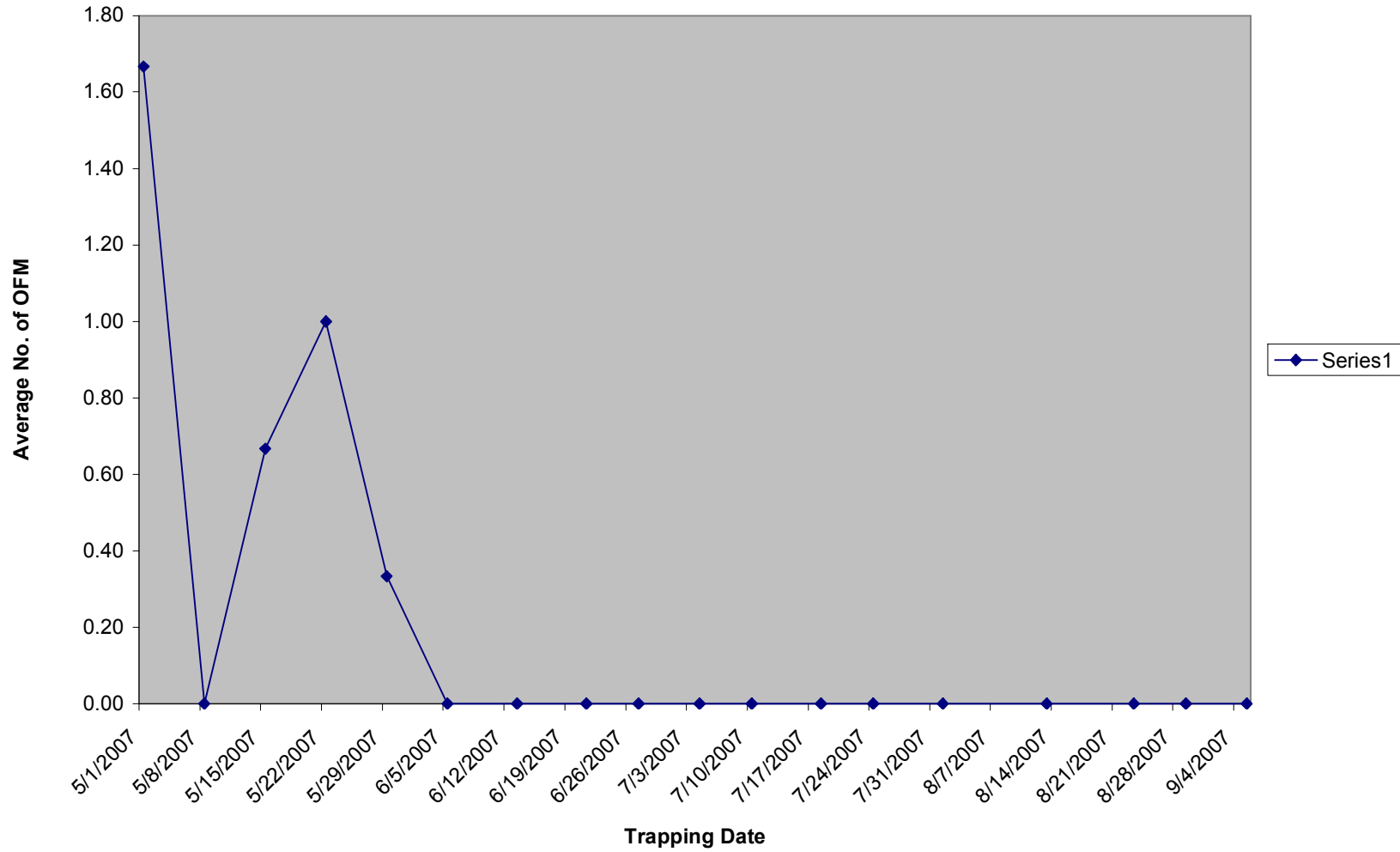
(a) **Ten Sweeps Using a Standard 15-inch Diameter Sweep Net:** In general, this method was used to look for fast moving insects including leafhoppers, grasshoppers, lygus bugs and stinkbugs.

(b) **One Beat cloth sample:** Five limbs were beat and insects that dropped on a beat cloth were counted. The primary focus of this sampling method was for detection of plum curculio.

(c) **Whole Tree Samples:** Two trees were also examined in each of the varieties to locate possible flagging caused by oriental fruit moths and used as an indication to the success of mating disrupting.

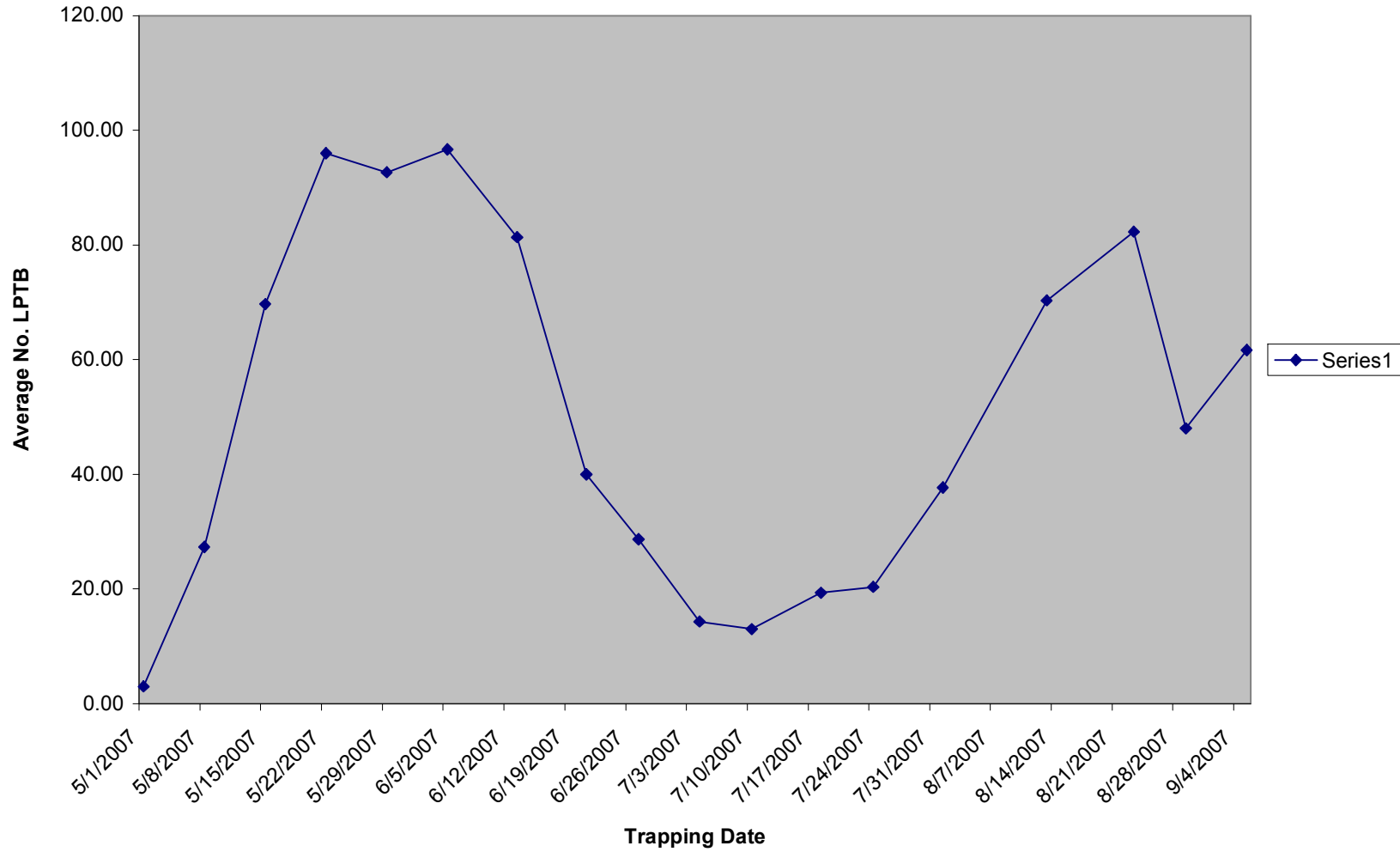
Results: Overall, mating disruption appeared to work again for oriental fruit moth control. Although early season sprays were applied, no insecticide sprays were applied in the main part of the season for this pest. Lesser peach tree and Greater peach tree borer populations required treatment at the end of the season. All other insect populations remained low throughout the season with Japanese beetle and Green June beetles being the most common insects encountered. Low levels of leafhoppers and stinkbugs were also encountered. No plum curculio or tufted apple bud moth damage was detected. After two years of evaluation, it appears that mating disruption can be successfully used to manage oriental fruit moth in peach orchards.

Oriental Fruit Moth Trap Catches



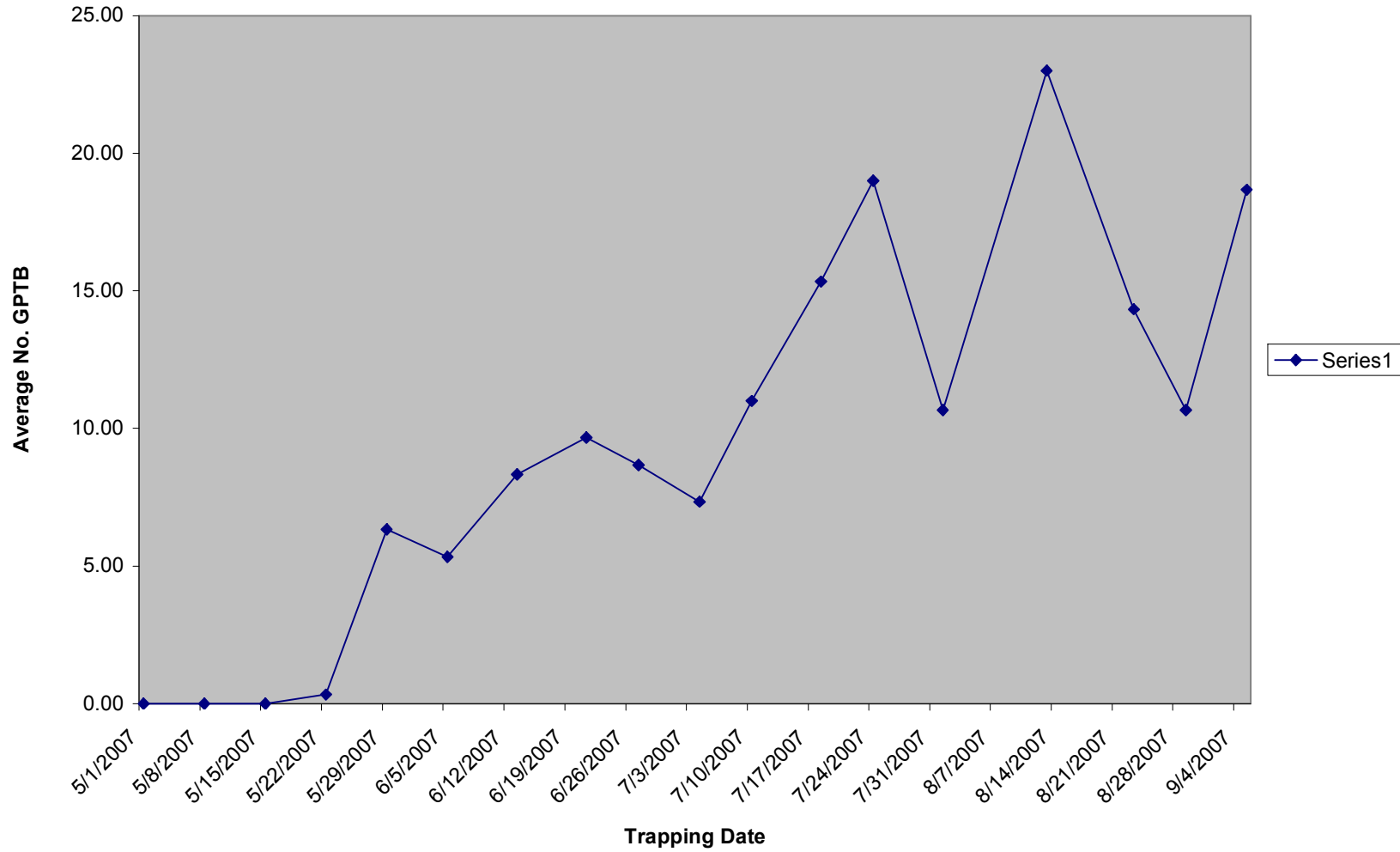
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Lesser Peach Tree Borer Trap Catches



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Greater Peach Tree Borer Trap Catches



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