July 29, 2004

COTTON PEST MANAGEMENT NEWSLETTER #9

COTTON SITUATION: The Georgia Weekly Weather and Crops Report for the week ending July 25th listed the crop as 98 percent squaring and 82 percent setting bolls. This crop is progressing rapidly. A few areas are in need of moisture.

INSECT SITUATION: Not much has changed since last week's newsletter concerning insects. Populations of caterpillar pests and bugs are patchy and spotted. Some fields are experiencing fairly heavy pressure where others are not. This is the reason we recommend that all fields are scouted and treated on an as needed basis. Insect pests observed this week include stink bugs (both southern green and brown species), tobacco budworm, corn earworm, fall armyworm, and a few beet armyworm.

Boll Feeding Bugs: A complex of boll feeding bugs including stink bugs, tarnished plant bugs, clouded plant bugs and leaf-footed bugs are capable of damaging developing bolls. Scouts must be observant for bug activity so we can determine which species are causing the damage. Scouts should sample bolls which are approximately the diameter of a quarter (about a 12 day old boll) to quantify internal boll damage. Treatment is recommended when 20 percent of the bolls exhibit symptoms of bug feeding injury which includes warts or callous growths on the inner surface of the boll wall or stained lint. Bolls of this size can be easily squashed between your thumb and index finger. It is important that scouts are "calibrated" correctly when sampling bolls for internal damage. When the correct size of bolls is being sampled we usually observe a decrease in internal boll damage 7 days following insecticide treatment for bugs. If bolls are sampled which are too large, we will be seeing old damage and the counts may not decrease following insecticide treatment. During the past week we have observed increased stink bug activity as adults are migrating to cotton from other host plants such as field corn. We will continue to see adult migration into cotton for the next several weeks. Thus the primary developmental stage which stink bug sprays are targeting is adults.



Bolls approximately the diameter of a quarter should be sampled to determine internal boll damage for bug pests. Bolls of this size can be easily squashed. Bolls which are not damaged will have a smooth whitish inner surface (far left). The inner surface of damaged boll walls will have callous or warty growths and/or stained lint (right).

Tobacco Budworm and Corn Earworm: It is likely we will encounter mixed populations of tobacco budworm (TBW) and corn earworm (CEW) for the remainder of the season. This is especially true in parts of the state that have historically been infested with TBW. TBW has also been more prevalent in east Georgia this month than during recent years. Our best indicator of what species are infesting a field is by moth flushing counts. Scouts should note which species (TBW or CEW) of moths they are observing in fields. When dealing with TBW or mixed populations which TBW makes up a majority, a non pyrethroid insecticide such as Tracer, Steward, or Denim should be used. In various parts of Georgia, we have not achieved control of TBW with pyrethroids. This is most likely due to pyrethroid resistant TBW.

Fall Armyworm: Fall armyworm (FAW) populations are very sporadic. The key to success is early detection. Be sure to be observant for small FAW etching boll bracts in the mid to lower canopy and their presence in white and pink blooms.

INSECT UPDATES: Check the **Cotton Insect Hotline (1-800-851-2847)** for updates on current insect conditions. The Cotton Pest Management Newsletter is also posted on the UGA Cotton Homepage at: http://www.griffin.peachnet.edu/caes/cotton/

Sincerely,

Phillip Roberts Extension Entomologist