First State Impact

UNIVERSITY OF DELAWARE
COOPERATIVE EXTENSION

Extending Knowledge - Changing Lives

Redheaded Flea Beetle Education

In-person presentations, fact sheets and recommendations inform growers on increasing problems from this native insect

ISSUE

Redheaded flea beetles have become a critical nursery pest over the past eight years. Adults cause substantial chewing damage to foliage, leading to unsalable crops. The Mid-Atlantic area sees at least two generations of the beetles per year with activity occurring from May until mid-November. Nursery operators apply broad spectrum insecticides weekly for managing this pest; consequently, IPM practices on some crops are disrupted due to non-target impacts. The majority of research on redheaded flea beetles is conducted at UD. Thus, other regions dealing with this pest request additional information from UD.

RESPONSE

Last year an Ornamentals IPM specialist visited NC, SC, and GA to share research results. AL, IN, MI, TN, GA and Quebec were e-mailed fact sheets and recommendations, which were also distributed nationally through the ornamentals listserv. Applied research results in knowledge of insect phenology, host plant preferences, biological control or biopesticide opportunities. Results from insecticide efficacy trials targeted adults and immature flea beetles. Results also focused on trap crop opportunities and examining the nutritional quality of hosts.

IMPACT

Presentations in other regions and sharing with colleagues provided collaborative opportunities on projects regarding host plant preferences, impacts of irrigation, selection of non-neonicotinoid insecticides, or impact of biological control agents. A representative sample post-presentation evaluation survey results indicated the following:

- 95% of professionals learned new information about redheaded flea beetle
- 50% of attendees stated they learned twice as much as they knew prior to attending
- 72% of nursery operators in attendance stated they learned how to scout for the larva stages
- 82% learned how to use the Growing Degree Days (GDD) as a tool and what websites are available to assist with tracking GDD
- 60% stated they increased their knowledge of management tactics available for redheaded flea beetles
- 18% intend to use GDD to track the flea beetle life cycle
- 9% said they intend to try to use biological control as a management strategy
- 60% are likely to start using insecticide drenches or incorporate granular products into soil media to target larvae as part of their management strategy