Vegetable Insect Update – Russell L. Groves, Professor and Extension Specialist, UW-Madison, Department of Entomology, 608-262-3229 (office), (608) 698-2434 (cell), or e-mail: groves@entomology.wisc.edu.

Torac® 15EC insecticide (Nichino America, Inc.), containing the active ingredient tolfenpyrad, was granted a label expansion by US EPA allowing use in potatoes in states east of the Mississippi River. Previously restricted to states west of Mississippi River, this label now allows the product to be eligible for registration in all states. Torac had previously been registered in Wisconsin, but only covered insect pests affecting crops in the leafy vegetables (except brassica vegetables) crop group (Group 4). Approval occurred at 2 pm on Wednesday, June 27th by the Wisconsin Department of Agriculture, Trade and Consumer Protection and the new release label, allowing for the use of Torac in potato production east of the Mississippi River, can be found at Kelly Solutions:


Torac is considered a contact insecticide and works by directly contacting the insect target during application, or by having an appropriate residue on leaves where mobile insects can encounter the compound later. The material does require an appropriate spreading surfactant to ensure good coverage on leaves, and works by blocking cellular respiration across a variety of life stages including eggs, immatures (larvae and nymphs) and adults. Very fortunately, Torac belongs to the METI (Mitochondrial Electron Transport Inhibitor) class of compounds, IRAC Group 21A Insecticide (http://www.irac-online.org/), which now provides us with a new mode of action for second generation Colorado potato beetle. In addition, the product has efficacy against both potato leafhopper and colonizing aphid species in potato.

In portions of southern Wisconsin, newly emerged adults of the second generation are emerging from the soil, and others will follow in central sands region by the early part of July. With the recent warm temperatures during both the day and nighttime, populations can be expected to emerge quickly and begin feeding and laying eggs right away. Based on the label, potato growers can make two applications per crop cycle in a rate range of 14 to 21 fl oz per acre for potato specifically. Growers should scout fields and begin applications when second generation adults have begun to feed and before an estimated 5% of new defoliation has occurred. Do recognize that the label currently states a 12-hour reentry interval (REI), a 14-day preharvest interval (PHI), plus a 14 day re-application window between successive treatments.