

INTEGRATED CROP MANAGEMENT

Soybean aphid invades Iowa

A new pest of midwestern soybean has invaded eastern and central Iowa. Initial identifications and reports from neighboring states suggested that this insect was the cotton aphid (also known as the melon aphid) but it has now been positively identified as the soybean aphid, *Aphis glycines*. This aphid is native to southeastern and eastern Asia and may have been in the United States during the past couple of years. It was first detected in Wisconsin this summer and has now been confirmed in Minnesota, Illinois, Michigan, and Ohio. On August 17, there were no reports of soybean aphids in Iowa but prompt and extensive surveys conducted by the Iowa Department of Agriculture and Land Stewardship (IDALS) have determined that it is in about half of Iowa's counties.

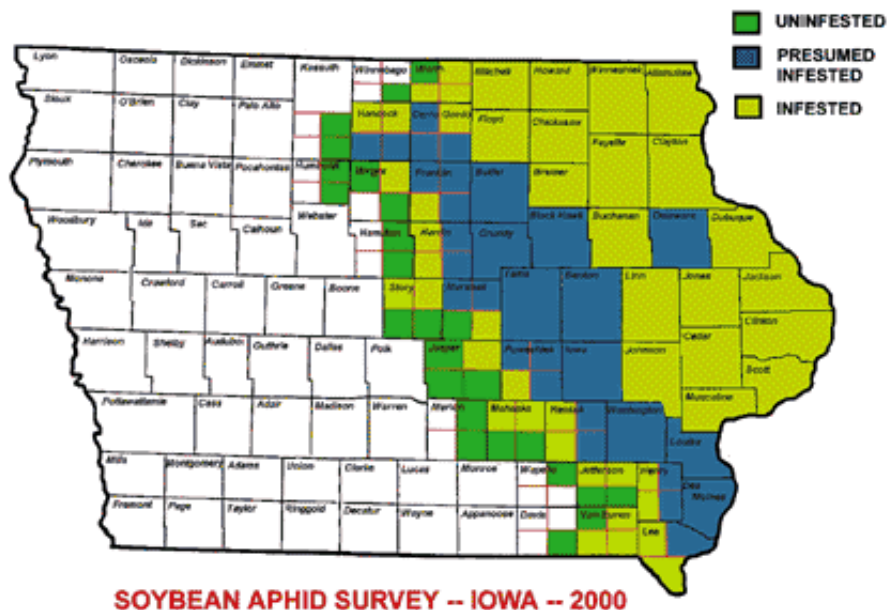
Most of the field problems from this aphid have been detected in Wisconsin. David Hogg and John Wedberg, entomologists at University of Wisconsin-Madison, report very high aphid populations in Grant, which is across the river from Dubuque, Rock, and Kenosha counties across southern Wisconsin to as far north and east as Waushara and Sheboygan counties in the state. Tom Klubertanz, entomologist at UW-Rock County, counted the aphids on whole plants from an infested field. These plants were not stunted and they looked normal at a distance of several feet. But on two plants he counted more than 1000 aphids per plant. More than 100 aphids per leaf was common, colonizing the whole plant. Single pods at the R3.5 stage were covered with 50 aphids. More details on the Wisconsin situation can be found at <http://ipcm.wisc.edu/wcm/00-22insect1.html> [1].

Kevin Steffey and Mike Gray, entomologists at the University of Illinois, report "aphids in fields of soybeans in some counties in northern Illinois, including Kane and Grundy counties. Some FS fieldmen have reported to Ria Barrido with Growmark, Inc., in Bloomington that they can find aphids in soybean fields in the northern tier of counties in Illinois."

There are no economic thresholds for this insect and Wisconsin entomologists report that the population is declining so insecticides are unlikely to be necessary. Reports from John Haanstad, IDALS, indicate that populations are low in all areas of Iowa. There should not be any soybean fields in Iowa that will be economically damaged by soybean aphids this late in the growing season.

Entomologists Murray Fletcher and Peter Desborough, in Australia, have a Web site at <http://www.agric.nsw.gov.au/Hort/ascu/insects/aglycin.htm> [2] that discusses this aphid in detail, including hosts, damage, and life cycle, with photographs of these aphids and colonies on soybean.

Thanks to John Haanstad, IDALS, and his coworkers for conducting the aphid survey and producing the map.



Known distribution of the soybean aphid in Iowa, September 8, 2000.

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Source URL:

<http://www.ipm.iastate.edu/ipm/icm//ipm/icm/2000/9-18-2000/soybeanaphid.html>

Links:

[1] <http://ipcm.wisc.edu/wcm/00-22insect1.html>

[2] <http://www.agric.nsw.gov.au/Hort/ascu/insects/aglycin.htm>

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