

Aster leafhoppers and Aster Yellows
Casey Hoy and Sally Miller

Aster leafhoppers were collected in Celeryville, Ohio on May 25, 1998, and were tested by Dr. Sally Miller for aster yellows infection. Of 27 leafhoppers collected, 2 tested positive by PCR (polymerase chain reaction, a sensitive and accurate molecular test) for the aster yellows pathogen. The estimated percentage of infected leafhoppers would be 7.4%, which would be high enough to result in aster yellows problems in susceptible crops (lettuce, carrots, celery). We have collected additional leafhoppers and will continue to test infection levels. For now, growers should assume that the potential for aster yellows is present. Based on research at the Muck Crops Branch farm and the Wooster campus of OARDC, we estimate that two well-timed applications of insecticides to control aster leafhoppers per lettuce crop are sufficient to control aster yellows. The first application should be approximately 10-14 days after crop emergence or transplanting if leafhoppers are present; this will minimize transmission of the disease within the treated field. Insecticides with longer residual activity against newly arriving leafhoppers are a good choice for the first application. The second application should be approximately 2-3 weeks before harvest; this will minimize the spread of disease to new plantings by leafhoppers that have survived the first application. Insecticides giving rapid and thorough control are the best choice for the second application and residual activity is not as important. Additional insecticide applications beyond these two are estimated to have very little additional impact on either the aster leafhopper population or the spread of aster yellows. Furthermore, it may be possible to discontinue leafhopper control in the second half of the growing season if control of the disease is successful in June and early July.

Crop Reports
Brad Bergefurd and Hal Kneen

SouthEast.

Planning to cut early cabbage by the weekend. Tomatoes growing extremely quickly this past week with some growers starting their second stringing of the plant to hold up new growth. Staking and trellising almost complete. Good hot days and warm nights for growing. Some growers are beginning to irrigate. Sweet corn under plastic are silking and forming ears. Bare grown sweet corn is starting to tassel. Peppers are forming fruit: green - 1.5 inches and Hungarian wax - 2-4 inches long. Beginning to harvest for local farm markets: peas, onions, lettuce beans and beets. A hail storm rolled through Gallia county during mid afternoon on Tuesday, June 2. The swath sweep through the Gallipolis and the countryside up to Rodney, OH. Some processing pepper growers, small vegetable producers and gardens were devastated. Wiped out were fields of sweet corn, tomatoes, peppers and tobacco.

Insect Report through June 1.

Variegated cutworm: 4;

ECB -29 this week, slight increase;

CEW - 5 this week.

Flea beetles attacking processing pepper transplants which were planted in the last couple of weeks.

SouthWest.

Fresh Market and Processing Pepper planting is completed by most growers. Sweet corn is beginning to tassel, whereas plastic corn is at silk stage. Melons have vined out with male and female blossoms present. Summer Squash planting continues. Growers began to plant pumpkins towards the end of last week. Sweet corn planting continues. Strawberry harvest continues. Cabbage planting continues.

Corn borer are present in sweet corn plantings with growers beginning their insecticide applications.

There have been some reported damage by growers of root rot type symptoms in peppers, melons, cucumbers and tomatoes especially in areas of heavy rainfall. The exact cause of this is still being diagnosed. Botrytis symptoms have also been reported on pepper transplants going to the field.

Stewarts wilt is present in early sweet corn fields, with some varieties showing up to a 20% infection rate, whereas other types are showing no symptoms.

Sidedressing of all crops with nitrogen continues due to the excessive rainfalls the past few weeks.

Fall Cauliflower, Broccoli and cabbage seedings have been made in the greenhouse.

TOMCAST Report

Disease Severity Value (DSV) Hotline -1-800-228-2905

Jim Jasinski

What's New At The VegNet Web Site

Visit: "The Problem of The Week" For Pictures of...

Botrytis on Pepper Transplants. View pictures of both foliar and stem lesions on pepper seedlings plus some general comments on probable cause.

Late Blight on Tomato Transplants

White Rust of Brassicas

Early Views of Vegetable Crops from SE Ohio, (Sweet corn on plastic + squash)

Check Out the New Look of the Tomcast Section (requires your browser to be able to view frames.)

+ A New Tomato Research Report by C. A. Wyenandt, R. M. Riedel, M. Bennett and C. Welty.

From The Vegetable Crops Planner: Links now provided to the National Weather Service Offices in Cleveland and Wilmington, OH. Provides Agricultural Observations, soil temperatures, climate summaries, growing degree days and much more.

1998 Ohio Vegetable Production Guide - Online. Visit: "The Library

Return to Vegetable Crops Homepage Ohio State University Extension

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