Vegetable Crop Insects - Joanne Whalen, Extension IPM Specialist; jwhalen@udel.edu

Trap Catches.
Although trap catches have been lower for the last couple of weeks, the final trap catches (Sept 20) are indicating higher moth flights in some areas. Be sure to check our website for the recent trap catches in your area http://www.udel.edu/IPM/traps/latestblt.html

Cabbage.
Continue to sample fields for diamondback, cabbage looper, fall armyworm and beet armyworm. A treatment should be considered if you find 5% of the plants infested.

Lima Beans.
Continue to scout fields for corn earworm and soybean loopers.

Peppers.
Be sure to maintain a 5-7 day spray schedule for corn borer, corn earworm, beet armyworm and fall armyworm control. You should also continue to watch for aphid explosions. We have one report of heavy whitefly populations. Since we have not seen economic levels in the past, we do not have experience with timing or the best control options. A number of products are labeled on peppers for whitefly control; however, most entomologists in the region do not have experience with the efficacy of these products. Information from Ohio indicates that Provado (0 day PHI) and Assail (7 day PHI) can provide good control. However, both products state on the label that they should not be applied to heavy populations and they must be applied before nymphs are present. In addition, multiple applications will probably be needed. So, at this time, control options are limited and control levels may be less than desired depending on population levels at treatment time.

Snap Beans.
Continue to spray snap beans from the bud stage through harvest for corn borer and corn earworm control. We continue to hear reports of beet armyworm in a few fields.

Spinach.
Continue to scout for webworms, beet armyworm and aphids. As a general guideline, controls should be applied when 5% of the plants are infested with small worms and before they have moved deep into the hearts of the plants. Also, remember that both insects can produce webbing on the plants. You should also watch for an increase in aphid populations. A combination of the cooler summer temperatures and a switch to a warm dry fall can result in population explosions. Assail, dimethoate, Fulfill and Provado are labeled for aphid control in spinach. With aphid control, good coverage is essential. Remember to check the label for days to harvest after the last application.
**Sweet Corn.**
All fresh market silking sweet corn should be sprayed on 2-3 day schedule for the remainder of the season.

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**Field Crops**

**Uneven Soybean Fields** - Richard W. Taylor, Extension Agronomist, rtaylor@udel.edu

Recently a question came up about why so many full-season soybean fields are up and down in height. For most fields, the situation showed up following heavy rain or wind and after the beans had reached the R6 stage of growth (full sized seeds filling the seed pod cavity at one of the four upper most nodes on the main stem with a fully expanded leaf). The ideal growing conditions this year have resulted in soybeans that reach chest to shoulder high. Once they begin to be loaded with the weight of the seed crop and certain environmental conditions such as heavy or pounding rains and/or wind occur, the plants begin to lodge. This usually is not a uniform condition since plants in some areas can be shorter in height due to less favorable soil or growing conditions or in other areas some plants may be slightly behind the majority of the field with respect to stage of maturity. These differences often result in the up and down appearance we now see in many full-season and some double-cropped (especially beans after barley) fields.

Is there a concern that yield potential could be severely impacted by the lodging? In taking light sensor readings this year in soybean plots with varying plant populations, we found that most light is intercepted by the upper canopy of soybeans. Very little light actually makes it to the lower levels of the canopy. This should mean that unless lodging is very severe there will be only small impacts on yield potential. Also, since most of the lodging that has been reported has been after the beans are well into the R6 growth stage, the plants have gone a long way in filling the seeds so yield impacts from the shading that might occur with lodging should be small. The biggest impact will be on the speed at which the farmer will be able to harvest the beans. Large plants, heavily podded plants, and lodged plants will necessitate that growers slow down during the combining process or risk increasing their combine harvest losses. When growers begin to combine a field that lodged, they should check behind the combine to determine if harvest losses are unacceptable. If losses are high, slowing down and making adjustments to the combine should help minimize harvest loss.

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**Fall Control of Perennial Weeds** - Mark VanGessel, Extension Weed Specialist, mjv@udel.edu

Fall is the most practical time to treat perennial weeds because it is the time that plants are able to move the herbicide to the roots where it will do the most good and it is easier to get into the field. When considering fall weed control the emphasis should be on what the patch of weeds will look like next spring or summer not the amount of dead stems this fall. Also, it is important to consider that a fall application will not eradicate a stand of perennial weeds; the fall application will reduce the stand size or the stand vigor the next year. Fall applications of glyphosate is the most flexible treatment for most perennial weeds such as artichoke, bermudagrass, Canada thistle, common milkweed, common pokeweed, dock, hemp dogbane, horsenettle and johnsongrass. Rates of 33 to 42 oz/A of Roundup WeatherMax or 1.5 to 2 qts/A Touchdown IQ are consistently the most economical. Banvel at 2 to 4 pints is also labeled for artichoke, bindweeds, dock, hemp dogbane, horsenettle, milkweeds, pokeweed or Canada thistle. (Planting small grains must be delayed after Banvel application - 20 days per pint of Banvel applied.) Allow 10 days after treatment before disturbing the treated plants. Fall herbicide applications should be made to actively growing plants. Allow plants to recover after harvest before treating them. Consider the options of spot treating in a standing crop; keeping the combine header as high as possible.
so the weeds are quicker to recover; or combining around the weed patches and then spraying those patches immediately after harvesting. Weed species differ in their sensitivity to frost; some are easily killed by frost (i.e., horserettle) others can withstand relatively heavy frosts. Check the weeds prior to application to be sure they are actively growing.

**Considerations For Small Grains** - Mark VanGessel, Extension Weed Specialist, mjv@udel.edu

More and more fields are being planted as no-till small grains. These fields need a non-selective herbicide prior to emergence (either Gramoxone or glyphosate). Too often these fields look ‘clean’ at planting time, but numerous weeds have emerged and are quite small. These weeds are much easier to control prior to planting than later. Harmony GT or Harmony Extra are not replacements for these non-selective herbicides.

There have been a considerable number of fields with rye-strips planted for vegetables in some areas, and these fields are very convenient to plant small grains in the fall. However, keep in mind that there is no herbicide available to control volunteer rye in wheat or barley. There are a few herbicides that will control or suppress Italian (or annual) ryegrass in these crops, but they will not control grain rye used for wind breaks. So if the windbreaks were allowed to produce seed this year, you can expect the rye to act as a competitive weed in your small grains. Rye seeds generally germinate the same year they are produced, so it is not a long-term problem. But it can be an issue if you planted rye strips this summer and then plant small grains this fall.

Working the fields and then letting them set for a few weeks to allow the seeds to germinate followed by working it once more before planting or spraying a non-selective herbicide may help reduce the density of the rye.

**Grain Marketing Highlights** - Carl German, Extension Crops Marketing Specialist; clgerman@udel.edu

**Harvest Pressure Taking Prices Lower.**

Early reported yields for the ’04 U.S. corn and soybean crops have commodity traders speculating that the record and near record crops that were forecast in USDA’s September Crop report are likely to get larger. Word from the CBOT trading floor has traders now anticipating the nation’s corn crop to exceed 11 billion bushels and the soybean crop to exceed 3 billion bushels. Pressure from the possibility that the size of these crops will grow, as the harvest season progresses, is keeping a lid on new crop corn and soybean prices with new contract lows posted this week.

Some support for corn and soybean prices is likely to come from the larger than expected export sales report. Corn shipments for the week were reported at 46.4 million bushels as compared to the pre-report high end of trader expectations at 37.4 million bushels. Soybean shipments were also reported to be much higher than expected with sales reported at 36.9 million bushels versus the high expectation of 23 million bushels. Wheat sales were reported near the low end of expectations at 15.9 million bushels.

**Market Strategy.**

As indicated above, some price support is expected from the favorable export sales report for new crop corn and soybeans coupled with the idea that new crop futures contracts are now in an oversold situation. However, the impact is likely to be minimal due to favorable weather and the advancing harvest. New crop corn basis for Southern Delaware is now even with the soybean basis at 10 over delivered in September and 15 under the November for harvest delivery into Salisbury. LDPs are being hit for field direct delivered new crop corn. Grain and/or soybean storage decisions can be discussed by calling Carl German at 302-831-1317 or email clgerman@udel.edu.
Upcoming Meetings:

ORNAMENTALS SHORTCOURSE ANNOUNCEMENT
Basics of Fertilizing Greenhouse & Nursery Plants

Date: Thursday, September 30, 2004
Time: 7-9 pm
Place: University of DE Research and Education Center, Georgetown, DE
Registration: Phone (302) 730-4000 if you will be attending
Instructors: Jay Windsor and Gordon Johnson

Topics: nutrient needs of various plants, fertilizer types, specialty fertilizers and their use, fertilizer application methods, application equipment, fertilization and growth control, reducing nutrient losses.

Pumpkin and Sweet Corn Twilight

Date: Wednesday, September 29, 2004
Time: 5:00 – 7:00 pm
Place: Wye Research and Education Center, Queenstown, MD

Come see the 2004 Pumpkin Variety Trials and see the results of two fungicide schemes: conventional and reduced risk. See how they performed, particularly in the face of this year’s downy mildew. See how 10 different cover crop regimes affected pumpkin production. Refresh your pumpkin disease identification skills.

Exciting new sweet corn possibilities too! See the new fresh market BT sweet corn hybrids and hear results of a variety trial looking at husk characteristics for resisting sap beetles.

***Light fare will be provided***

For information call (410) 313-2707 (Maryland Cooperative Extension, Howard County) or (410) 827-8056 x 115 (WREC)

Pre-registration is not necessary. If you need special assistance to participate in this program, please contact Mrs. Carolyn Kulp at (410) 313-2707 by September 15.

Next Week is the Last Issue of Weekly Crop Update for the 2004 Season.

Weather Summary

http://www.rec.udel.edu/TopLevel/Weather.htm

Week of September 17 to September 23, 2004

Rainfall:
0.59 inches: September 18

Readings taken for the previous 24 hours at 8 a.m.

Air Temperature:
Highs Ranged from 85°F on September 22 to 67°F on September 19.
Lows Ranged from 68°F on September 17 to 47°F on September 20 and September 21.

Soil Temperature:
70°F average.
(Soil temperature taken at a 2 inch depth, under sod)

Web Address for the U of D Research & Education Center: http://www.rec.udel.edu

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