

North Carolina Pest News

Departments of Entomology and Plant Pathology



Stephen J. Toth, Jr., editor

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CAUTION !

The information and recommendations in this newsletter are applicable to North Carolina and may not apply in other areas.

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http://ipm.ncsu.edu/current_ipm/pest_news.html

FIELD AND FORAGE CROPS

From: Jack S. Bachelier, Extension Entomologist

“Droughty” Cotton Worsens

With the weather continuing so hot and dry, it’s hard to paint a very rosy picture of the present circumstances regarding cotton. Light trap levels appear well over their peak for the year, although lower or residual bollworm moths can still cause problems for cotton that has received timely rainfalls and is still fruiting normally. Eighty to 90 percent of our cotton acreage appears to be hurting for water, with yield prospects seemingly declining by the day. One wonders if a

category 1 or 2 hurricane might be preferable to a continuation of our present drought. Still, we have seen scattered spots where the yield prospects are good.

I expect the final flight of bollworm moths to begin sometime this coming week in Robeson County. In a typical year, this moth flight is of lower intensity than the preceding major flight, and often arrives too late to cause economic damage to mature cotton. In cotton with medium bolls all the way to the top, for the most part bollworms, stink bugs and plant bugs should not be an economic problem from here on out.

Scattered infestations of beet and fall armyworms are still being reported. Hot dry weather seems to favor these species. In the case of beet armyworms, where blooming has stopped the only way that this species could become a problem would be if high levels of beet armyworms were defoliating the leaves at the base of bolls that are required to fill out those bolls. This does not happen often in North Carolina. Fall armyworms can become established at this time of year in dry cotton, particularly if some blooms are available. These pests are capable of feeding on large bolls and are difficult to control. In most years, fall armyworms have a difficult time getting beyond the first or second stage in North Carolina once the first week of September is underway. Fortunately, throughout September most fall armyworms seem to die as second stage larvae feeding on the bracts of large and medium bolls down in the plant canopy.

No reports of significant spider mite or cotton aphid problems have been received this week. The weather and yield prospects just seem dominate most conversations lately.

From: Ames Herbert, Entomologist, Virginia Tech University, Tidewater Agricultural Research and Extension Center, Suffolk, Virginia

Provost/Baythroid Tank Mix Problem

Pat Phipps, Plant Pathologist, Virginia Tech University, Tidewater Agricultural Research and Extension Center, has issued the following statement regarding Provost and Baythroid:

“A recent report has been verified that Provost and Baythroid are not compatible in tank mixes for control of leaf spot and corn earworms in peanuts. Whenever applying Provost with an insecticide for corn earworm control, growers will need to use an insecticide other than Baythroid for control of corn earworm. So far, this is the only product, other than what may be listed on the label, that is known to not be compatible with Provost.”

From: Rick L. Brandenburg, Extension Entomologist

Peanut Insect and Mite Pests

Spider mites continue to be a threat in certain areas while some other locations were helped late last week with good rainfall. Corn earworms have increased dramatically the past week and are above threshold in many fields. Due to the threat of spider mites, do not treat for “worms” unless it is a real threat to the crop. Also make sure of the species. A few beet armyworms are out there, but they are not as damaging as corn earworms.

From: Jim Dunphy, Extension Crop Science Specialist, and Steve Koenning, Extension Plant Pathologist

Soybean Rust Update

Asiatic soybean rust has been confirmed on soybeans in a research plot and in a commercial field in Brooks County, Georgia, on the Florida border. This puts rust about 350 miles from Charlotte, 575 miles from Elizabeth City, 405 miles from Fayetteville, 300 miles from Murphy, 450 miles from Raleigh, 505 miles from Washington, 410 miles from Wilmington, and 415 miles from Winston-Salem.

To date, Asiatic soybean rust has been found on soybeans or kudzu in 5 counties in Alabama (1 on soybeans), 4 counties in Arkansas (all on soybeans), 11 counties in Florida (3 on soybeans), 5 counties in Georgia (1 on soybeans), 14 parishes in Louisiana (13 on soybeans), 2 counties in Mississippi (1 on soybeans), 5 counties in Oklahoma (all on soybeans), and 25 counties in Texas (24 on soybeans).

Weather conditions in North Carolina are currently too hot and dry to consider rust likely to thrive if it does arrive in the state. The same is true for most of Georgia and South Carolina.

ORNAMENTALS AND TURF

From: Stephen B. Bambara, Extension Entomologist

Return of the Elm Tree?

If you remember "Captain Kangaroo," you may also remember the American elm in all its glory. Dutch elm disease killed a huge portion of the population, especially in the eastern United States. A native (Figs. 1 and 2) and smaller European elm bark beetle spread this fungal disease among the trees. Scientists worked hard to develop an American elm that was resistant to the disease. Over recent years, several cultivars have been identified and released. We may never return to a street lined with large elms in every town, but the elm is worth a new look. In a bit of possible irony, it may turn out that elm is a good replacement for the threatened ash.



Fig. 1. Native elm bark beetle. Image by J. R. Baker (www.forestryimages.org).

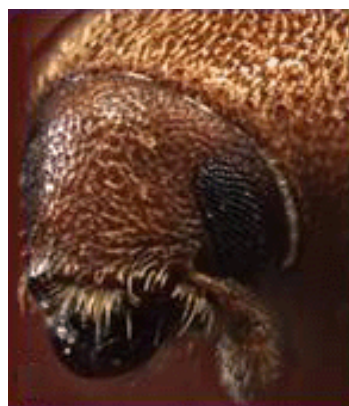


Fig. 2. Native elm bark beetle. Image by J. R. Baker (www.forestryimages.org).

"Liberty" and "Princeton" are two such cultivars touted to be resistant. The Elm Research Institute claims that in 16 years, only 100 of 250,000 Liberty elm trees planted have died. The Princeton elms which line Washington Road in Princeton, New Jersey (see photograph at http://www.nytimes.com/imagepages/2004/05/07/nyregion/07elm_street.html) have been chosen to line Pennsylvania Avenue in front of the White House in Washington, DC. (I don't know if that was a political decision.) The Princeton elm supposedly has ties to an elm that stands over the grave of Vice President Aaron Burr in a Princeton cemetery. (I've seen Aaron Burr's grave and he used to lie under two overgrown boxwoods.) Work performed at the National Arboretum showed that varieties Valley Forge, Jefferson NA3487, Princeton, Delaware and R18-2 showed the highest tolerance to Dutch elm disease, followed closely by New Harmony. There are also several hybrids available. Some have Asian origin. For more information, see the following web site: <http://www.ars.usda.gov/IS/AR/archive/jul96/elms0796.htm>.

Floats like a Butterfly, Stings like a Caterpillar

It is stinging caterpillar season. Some of the stinging caterpillars are called slug caterpillars because their prolegs lack the tiny hooks that most other caterpillars have and the prolegs are so short that some of the slug caterpillars resemble slugs. Several species of slug caterpillars, saddleback caterpillars (Fig. 3), hag moth caterpillars and stinging rose caterpillars have stinging hairs that can inflict a quite painful sensation.



Fig. 3. Saddleback caterpillar. Image by J. R. Baker.

Some people are sensitive to exposure and may require professional medical treatment. Slug caterpillars overwinter in tough silk cocoons. Moths emerge the following spring and summer and lay flat eggs on leaves of various trees and shrubs. Puss caterpillars (Fig. 4) are one of the stinging caterpillars in the family of flannel moths. They produce a stinging sensation when brushed against due to tiny hollow spines, which are filled with an urticating fluid. Puss caterpillars feed on various deciduous trees and shrubs, especially oak, elm, hackberry, maple and sycamore trees. The moths are yellow-brown in color and have fluffy, wavy, white hairs. The young larvae sometimes feed in groups on the surface of the leaf. Older larvae devour the entire leaf. The caterpillars finally spin a dense cocoon in which they spend the winter. Puss caterpillars are usually not abundant enough to be noticed, although rare outbreaks may be widespread and may cause noticeable defoliation. Two generations probably occur each year, and the winter is spent in the cocoon spun some place on the host tree. Sevin or one of the *Bacillus thuringiensis* (*B.t.*) pesticides should give adequate control, although *B.t.* is not very effective on older caterpillars. Usually only a few are found and chemical control is not needed. Crush the insects with a stick or rock, if desired. You can also leave it alone. For more information, see the Extension publication *Stinging and Venomous Caterpillars* from the University of Florida at: <http://edis.ifas.ufl.edu/IN014>.



Fig. 4. Puss caterpillar (left) and adult moth (right). Images by J. R. Baker.

INSECT TRAP DATA

From: Thomas G. Pegram, Agricultural Extension Agent, Union County

Light Trap Data from Anson, Stanly and Union Counties

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*****
                                Number of Adult Insects
*****
      Anson S      Anson N      Union S      Union N      Stanly
*****          *****          *****          *****          *****
Date      CBW  GR  BR  CBW  GR  BR  CBW  GR  BR  CBW  GR  BR  CBW  GR  BR
*****
July 9      -  -  -    0  0  0    6 36  0    7  4  2   10  0  0
July 11     -  -  -    0  0  0    6 40  0    4  4  0    3  0  0
July 13     -  -  -   10  0  0    7 41  0   10  3  2    4  0  0
July 16     9 53  0   15  -  -    7 19  -    4  7  0   10  0  0
July 18     9 55  0    -  -  -    9 27  -    8  5  1    6  1  0
July 20    12 64  2   19  -  -   26 39  -    7  9  0    6  0  0
July 23    13 58  0   20  -  -  power outage 11  2  0   12  1  0
July 25    12  2  0   22  -  -   37  7  0    7  0  0   13  1  0
July 27    31  4  0   85  -  -   28  3  0   10  1  0   17  0  0
July 30    72 18  1   75  1  -   56 21  -    7  3  1   13  0  0
August 1   29  5  0   67  1  -   32 16  -   19  4  0   18  2  0
August 3   55 23  0   51  1  -  104 18  -   12  1  0   19  1  0
August 6  139 22  1   78  0  0  245 51  0   38  6  1   38  1  0
August 8  142 21  0   60  0  0  270 78  0   52  5  0   30  3  0
August 10 175 21  0   58  3  0  294 67  0  117 14  0   16  0  0
August 13  -  -  -   63  0  0  251 54  0   40 12  0   45  1  0
August 15  -  -  -   light out 143 12  0   54  7  0   13  0  0
August 17  -  -  -    46  0  0  135 25  0   31  2  0   16  1  0
*****

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CBW = cotton bollworm moths; GR = green stink bugs; BR = brown stink bugs

From: Richard W. Rhodes, County Extension Director, Bertie County

Light Trap Data from Bertie County

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*****
                Windsor      Woodard      Hexlena      Roxobel      Colerain
                *****      *****      *****      *****      *****
Date            BW GSB BSB    BW GSB BSB    BW GSB BSB    BW GSB BSB    BW GSB BSB
*****
July 19         0  0  0      7  3  0      0  0  0      16  5  0      -  -  -
July 20         5 16  0      24  3  0      0  4  0      -  -  -      -  -  -
July 21         0  0  0      -  -  -      0  0  0      10  3  0      -  -  -
July 22         3  0  0      -  -  -      0  0  0      -  -  -      -  -  -
July 23         0  0  0      14  2  0      0  0  0      16  0  0      0  0  0
July 24         3  4  0      7  0  0      6  0  0      13  1  0      29  0  0
July 25         4  1  0      16  1  0      -  -  -      16  1  0      47  0  0
July 26         5  0  0      26  1  0      3  0  0      12  0  0      30  0  0
July 27         3  0  0      27  1  0      6  0  0      22  2  0      69  0  0
July 28         3  0  0      -  -  -      -  -  -      -  -  -      -  -  -
July 29         9  1  0      -  -  -      -  -  -      -  -  -      -  -  -
July 30         7  1  0      41  1  0      11  0  0      23  0  0      115  1  0
July 31         4  0  0      10  0  0      14  0  0      14  0  0      40  0  0
August 1        11  0  0      11  1  0      15  0  0      9  0  0      57  0  0
August 2        14  0  0      11  0  0      19  0  0      14  0  0      54  0  0
August 3        26  0  0      15  0  0      26  0  0      5  0  0      62  4  0
August 4        32  2  0      -  -  -      -  -  -      -  -  -      -  -  -
August 5       118  3  0      -  -  -      -  -  -      -  -  -      -  -  -
August 6        48  0  0      82  7  0     168  0  0      24  2  0     258  41  0
August 7       111  3  0      -  -  -      23  0  0      12  3  0     119  9  0
August 8       128 11  0     136  5  0     164  0  0      11  1  0      88  13  0
August 9        88 10  0      43  5  0      82  22  0      24  4  0      82  3  0
August 10       -  -  -      39  4  0      44  0  0      13  3  0      -  -  -
August 11       -  -  -      18  0  0      -  -  -      32  0  0      -  -  -
August 12       60  3  0      -  -  -      -  -  -      -  -  -      -  -  -
August 13       11  0  0      42  0  0      28  0  0      8  1  0      -  -  -
August 14       18  0  0      28  0  0      9  0  0      28  0  0      -  -  -
August 15       -  -  -      25  1  0      7  0  0      14  2  0      -  -  -
*****

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BW = Bollworm moths; GSB = Green stink bugs; BSB = Brown stink bugs

From: Mike Williams, County Extension Director, Chowan County

Light Trap Data from Chowan County

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*****
                        Adult Insects
                        *****
Date                    CEW      GSB      BSB      ECB
*****
July 25                 11      -      -      -
July 26                 35      -      -      -
July 27                 25      -      -      -
July 28                 19      1      -      -
July 29                 -      -      -      -
July 30                 30      2      -      -
July 31                 18      0      -      -

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August 1	28	0	-	-
August 2	30	1	-	-
August 3	48	4	-	-
August 4	38	1	-	-
August 5	68	2	-	-
August 6	36	12	-	-
August 7	136	4	-	-
August 8	163	4	-	-
August 9	223	10	-	-
August 10	210	8	-	-
August 11	-	-	-	-
August 12	110	0	-	-
August 13	lost	-	-	-
August 14	60	3	-	-
August 15	24	0	-	-
August 16	37	14	-	-
August 17	53	7	-	-

CEW = Corn earworms (bollworms); GSB = Green stink bugs;
 BSB = Brown stink bugs; ECB = European corn borers

From: Mike Carroll, Agricultural Extension Agent, Craven County

Light Trap Data from Craven County

Number of Adult Insects

Date	THW	TBW	CEW	GSB	BSB	ECB	FAW	BAW	Looper
July 6	3	1	11	1	1	-	2	-	-
July 9	5	1	26	2	1	-	1	-	-
July 11	2	-	22	1	1	-	-	-	-
July 13	4	-	28	2	-	-	1	-	-
July 16	4	2	34	2	1	-	3	-	-
July 18	3	-	10	1	-	-	-	-	-
July 19	5	1	23	3	2	-	1	-	-
July 23	7	2	31	2	1	-	2	-	-
July 25	1	-	29	-	-	2	1	-	-
July 27	1	-	33	1	-	-	2	-	-
July 30	-	-	-	-	-	-	-	-	-
August 1	1	-	73	1	-	-	4	-	-
August 3	-	2	141	1	-	3	5	-	-
August 6	5	-	342	8	-	-	6	-	-
August 8	3	-	451	3	-	-	10	-	-
August 10	4	-	375	8	-	-	-	-	-
August 13	8	-	176	6	-	-	1	-	-
August 15	4	-	71	5	-	-	2	-	-

THW = tobacco hornworms; TBW = tobacco budworms; CEW = corn earworms;
 GSB = green stink bugs; BSB = brown stink bugs; ECB = European corn
 borers; FAW = fall armyworms; BAW = beet armyworms

Location of trap: Cove City
 Cooperators: R&W McCoy Farms and Cove City Fertilizer

From: Colby S. Lambert, Agricultural Extension Agent, Cumberland County

Light Trap Data from Cumberland County

```
*****
                        Number of Adult Insects
                        *****
Date      THW      CEW      GSB      BSB
*****
July 11   0         3         5         0
July 13   0         2         5         0
July 16   4         33        12        0
July 18   2         66         6         0
July 20   7         160        20        0
July 23  23         214         0         0
July 25  14         150         6         0
July 27  12         202         13        0
July 30   6         197         12        0
August 1  -          -          -          -
August 3  -          -          -          -
August 6  -          -          -          -
August 8   9         442        19         0
August 10 5         271        18         0
August 13 15         283        10         0
August 15 3         463        22         0
August 17 1         207         7         0
*****
```

THW = tobacco hornworms; CEW = corn earworms;
GSB = green stinks bugs; BSB = brown stink bugs

Trap located in Godwin at Cumberland/Harnett County Line
at Lewis Farms off of Highway 301

From: Curtis D. Fountain, Agricultural Extension Agent, Duplin County

Light Trap Data from Duplin County

```
*****
                        Number of Adult Insects
                        *****
Date      BW      GSB      BSB
*****
July 2    0         1         0
July 4    0         0         0
July 6    0         4         4
July 9    4         8         0
July 11   1         11        0
July 13   4         7         2
July 16   3         6         0
July 18   9         13        0
July 20  21         23        0
July 23  22         3         0
July 25  15         0         0
July 27  53         4         0
July 30  73         1         0
August 1  98         2         0
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August 3      71          3          0
August 6     293         12          0
August 8      84         24          0
August 10     28         11          0
August 13     33          2          0
August 15     44          9          1
*****

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BW = cotton bollworms; GSB = green
stink bugs; BSB = brown stink bugs

Trap location: approximately two miles east of Albertson
Cooperator: Justin Murphy

From: Arthur R. Bradley, Jr., Agricultural Extension Agent, Edgecombe County

Light Trap Data from Edgecombe County

```

*****
                        Number of Adult Insects
*****
      W Edgecombe /a      Coakley /b      Lawrence /c
*****
Date      CEW  BS  GS      CEW  BS  GS      CEW  BS  GS
*****
July 10      -  -  3      14  0  46      -  -  -
July 11      -  -  6       4  0  28      -  -  -
July 13       0  0  7       8  0  44      -  -  -
July 15       0  0  5      10  0  49      -  -  -
July 18       0  0  8       2  0  39      -  -  -
July 20       8  0  1       1  0  56      4  0  4
July 23       8  0  0       8  0  3       1  0  0
July 25      17  0  2       -  -  -       7  0  0
July 27      24  0  3      14  0  5      10  0  3
July 30      29  0  8      28  0  5       2  0  2
August 1     12  0  2      11  0  2      16  0  1
August 3     36  0 15      33  0  2       8  0  1
August 6     40  0 10     235  0 30     133  0 11
August 8     35  0  7     318  0 58     117  0  9
August 10    35  0  7     280  0 65     50  0  8
August 13     7  0  6     133  0 12       5  0  0
August 15    10  0 14     82  0 17       2  0  1
August 17    11  0  7     195  0 42      25  0  5
*****

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Abbreviations: CEW = corn earworms;
BS = brown stink bugs; GS = green stinks bugs

a = trap located 12 miles west of Tarboro; maintained by Tom Porter.
b = trap located 5 miles east of Tarboro; maintained by Glenn O'Neal.
c = trap located at Lawrence; maintained by Terri Thomas.

From: Arthur Whitehead, Jr., Agricultural Extension Agent, Halifax County

Light Trap Data from Halifax County

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*****
                Scotland
                Neck
                East
                Enfield
                West
                Enfield
                *****
Date            CEW  GSB  BSB  CEW  GSB  BSB  CEW  GSB  BSB  CEW  GSB  BSB
*****
July 18         2   0   0   -   -   -   -   -   -   6   2   0
July 20         4   4   0   -   -   -   -   -   -   21  10  1
July 23         2   0   0   2   0   0   -   -   -   29   3   3
July 25         7   0   0   4   0   0   12  1   0   13   1   0
July 27        10   3   0   3   0   0   10  1   0   6   2   0
July 30         2   2   0   2   0   0   15  0   0   19   2   0
August 1       16   1   0   1   0   0   10  0   0   26   0   2
August 3        8   1   0   4   0   0   -   -   -   11   2   0
August 6      133  11   0   37  2   0   45  8   0   14   1   1
August 8      113   9   0   141 5   1   75  1   0   5   1   1
August 10       50   8   0   -   -   -   35  0   0   4   0   2
*****

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*****
                Glenview
                Weldon
                Roseneath
                *****
Date            CEW  GSB  BSB  CEW  GSB  BSB  CEW  GSB  BSB
*****
July 18         -   -   -   -   -   -   -   -   -
July 20         -   -   -   -   -   -   -   -   -
July 23         14  3   0   -   -   -   -   -   -
July 25         1   0   0   18  0   0   1   1   0
July 27        25  0   0   30  1   0   2   0   0
July 30        23  0   0   35  1   0   5   1   0
August 1       16  0   0   26  1   0   5   0   0
August 3       46  0   0   20  0   0   9   0   0
August 6      108 11   0   76  6   0   66  4   0
August 8       82 22   1   60  5   0   86  5   0
August 10       -   -   -   -   -   -   78 12   0
*****

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Abbreviations: CEW = corn earworms;
 GSB = green stinks bugs; BSB = brown stink bugs

From: Franky J. Howard, Agricultural Extension Agent, Jones County

Light Trap Data from Jones County

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*****
                Number of Adult Insects
                *****
Date            BW    BSB    GSB    HW
*****
July 2          0     0     0     0
July 4          0     0     0     0
July 6          1     0     0     1

```

July 9	7	0	0	0
July 11	0	0	0	1
July 13	0	0	0	0
July 16	0	1	1	15
July 18	0	4	0	18
July 20	0	0	1	7
July 23	1	0	0	4
July 25	5	0	1	10
July 27	23	0	0	2
July 30	27	0	0	0
August 1	49	0	1	2
August 3	34	0	0	5
August 6	41	0	3	11
August 8	12	0	0	0
August 10	48	0	3	10
August 13	23	0	0	18
August 15	1	0	0	4
August 17	4	0	0	14

Trap Location: Comfort
Monitored by: Morris and Brett Pike

BW = bollworms; BSB = brown stink bugs;
GSB = green stink bugs; HW = hornworms

From: Alan A. Harper, Lenoir County

Light Trap Data from Lenoir County

June

Number of Adult Insects

Date	HW	CEW	ECB	AW	AWC	GSB	BSB	TBW
June 15	0	5	0	5	2	0	0	0
June 16	0	7	0	1	3	0	0	0
June 17	0	0	0	2	2	2	0	1
June 18	0	1	1	1	4	0	0	0
June 19	0	3	0	0	2	2	4	0
June 20	0	5	1	0	3	0	2	0
June 21	-----no electric power-----							
June 22	0	2	0	0	1	0	0	0
June 23	1	10	1	3	14	1	0	1
June 24	0	3	0	1	4	0	0	0
June 25	0	1	1	1	2	1	0	0
June 26	0	0	5	0	6	3	0	0
June 27	0	3	4	1	2	2	0	0
June 28	0	4	1	0	3	1	0	0
June 29	0	4	0	1	2	0	0	0
June 30	0	4	2	1	5	0	0	0

July

```

*****
                        Number of Adult Insects
*****
Date      HW      CEW      ECB      AW      AWC      GSB      BSB      TBW
*****
July 1    -----no electric power-----
July 2      0       3       0       0       3       2       0       0
July 3      0       6       2       0       6       1       0       0
July 4      0       1       0       0       3       0       0       0
July 5      0       2       1       0       5       4       0       0
July 6      0       3       1       0       2       1       0       0
July 7      0       3       1       1       3       4       0       0
July 8    -----no electric power-----
July 9      0       2       2       0       5       3       0       0
July 10     0       2       0       0       0       7       0       0
July 11     0       1       0       0       3       3       0       0
July 12     0       0       0       0       1       1       0       0
July 13     0       2       2       0       5       9       0       0
July 14     0       4       2       0       3       1       0       0
July 15     0       0       3       4       1       4       0       0
July 16     1       2       1       1       4       9       0       0
July 17     0       3       2       1       2       3       0       0
July 18     0       2       0       0       1       1       0       0
July 19     1      12       1       0       3      15       0       0
July 20     0      11       2       0       7       7       2       0
July 21    -----unplugged-----
July 22     0      12       2       0       7       0       0       0
July 23     0       8       4       0       4       1       0       1
July 24     1      13       0       1       2       0       0       0
July 25     0      22       1       1       2       3       0       0
July 26     0      21       3       1       4       1       0       0
July 27     0      19       1       0       3       3       0       0
July 28     0      27       6       1       3       2       0       2
July 29     0      28       4       1       4       2       0       0
July 30     0      41       0       1       3       2       0       0
July 31     1      31       3       0       3       3       0       0
*****

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August

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*****
                        Number of Adult Insects
*****
Date      HW      CEW      ECB      AW      AWC      GSB      BSB      TBW
*****
August 1      2      37       2       0       8       5       1       0
August 2      0      85       3       0       2      11       0       0
August 3      0      76       4       0       3       6       0       0
August 4      0      84       2       0       1      18       0       0
August 5      0      76       4       1       4      14       0       0
August 6      0      99       1       0       2      16       0       0
August 7      0      55       5       0       0      25       0       0
August 8      1      65       1       0       1      32       0       0
August 9      1      60       3       0       4      13       1       0
August 10     1      30       2       0       0      23       0       1
August 11     1      20       0       2       2       4       0       1
August 12     0      48       2       1       3       9       0       0
August 13     0      41       2       1       2       1       0       0

```

August 14	1	23	2	1	1	3	0	0
August 15	2	70	2	6	1	7	0	1
August 16	1	14	2	0	0	2	0	0
August 17	1	11	2	0	0	1	0	0

Abbreviations: HW = hornworms; CEW = corn earworms; ECB = European corn borers; AW = true armyworms; AWC = armyworm complex; GSB = green stink bugs; BSB = brown stink bugs; TBW = tobacco budworms

From: J. B. Coltrain, County Extension Director, Martin County

Light Trap Data from Martin County

Date	Farm Life			Robersonville		
	BW	GSB	BSB	BW	GSB	BSB
July 16	7	3	-	0	8	-
July 18	4	5	-	0	5	-
July 20	1	3	-	0	7	-
July 23	7	0	-	7	0	-
July 25	11	0	-	6	1	-
July 27	9	0	-	10	0	-
July 30	17	2	-	16	2	-
August 1	16	0	-	10	1	-
August 3	22	1	-	27	1	-
August 6	32	8	-	175	4	-
August 8	39	11	-	270	7	-
August 10	57	3	-	105	4	-
August 13	39	1	-	42	5	-
August 15	39	3	-	39	2	-
August 17	47	2	-	95	5	-

BW = Bollworm moths; GSB = Green stink bugs; BSB = Brown stink bugs

From: Charlie Tyson, Agricultural Extension Agent, Nash County

Light Trap Data from Nash County

Date	Number of Adult Insects		
	CEW	GSB	BSB
July 13	3	-	-
July 16	10	-	-
July 18	5	3	-
July 20	8	10	1
July 23	14	3	0
July 25	1	0	0
July 27	25	0	0
July 30	23	0	0

```

August 1    16          0          0
August 3    46          0          0
August 6   108          0          0
August 8    82         22          1
August 10   72         17          0
August 13  118          2          0
August 15   41          1          0
*****

```

CEW = corn earworms; GSB = green
stink bugs; BSB = brown stink bugs

Trap location: near Hickory Crossroads

From: Craig Ellison, Agricultural Extension Agent, Northampton County

Light Trap Data from Northampton County

```

*****
                        Number of Adult Insects
*****
      Woodland      Conway      'Neck      Seaboard      Gaston      Jackson
*****      *****      *****      *****      *****      *****
Date      CEW GR BR      CEW GR BR      CEW GR BR      CEW GR BR      CEW GR BR      CEW GR BR
*****
July 18   - - -      - - -      - - -      3 4 -      - - -      0 12 0
July 20   - - -      - - -      - - -      2 2 0      - - -      12 89 2
July 23   - - -      4 2 0      - - -      6 0 0      - - -      25 2 0
July 25   0 0 0      - - -      - - -      12 4 0      - - -      26 5 0
July 27   0 0 0      5 1 0      - - -      16 2 0      1 0 0      37 3 0
July 30   3 1 0      - - -      - - -      14 2 0      3 0 0      79 7 0
Aug. 1    3 0 0      4 1 0      - - -      12 4 0      7 0 0      59 9 0
Aug. 3    5 0 0      13 3 0      - - -      18 9 0      5 0 0      119 7 0
Aug. 6    10 1 0      12 4 0      - - -      65 21 0      12 0 0      358 19 0
Aug. 8    12 7 0      24 8 2      - - -      115 32 0      19 0 0      331 38 0
Aug. 10   14 9 1      16 4 0      - - -      37 6 0      - - -      249 60 0
Aug. 13   3 1 0      15 4 2      - - -      16 2 0      24 1 0      184 27 0
Aug. 15   - - -      38 5 1      - - -      - - -      - - -      104 5 0
Aug. 17   - - -      18 2 0      - - -      24 3 0      14 2 0      204 5 0
*****

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CEW = corn earworms; GR = green stink bugs; BR = brown stink bugs
Locations: Woodland, Conway, 'Neck, Seaboard, Gaston and Jackson
Monitored by: L. Culpepper, K. Edwards, B. Johnson, T. Flythe,
D. Grant and B. Bryant

From: Tray Bridgers, Agricultural Extension Agent, Onslow County

Light Trap Data from Onslow County

```
*****
                        Number of Adult Insects
                        *****
Date      Bollworms   GSB    BSB   Hornworms
*****
July 4      6         3     0     0
July 6     20         7     0     0
July 9     25         19    3     0
July 11    21         10    0     0
July 13    33         10    3     1
July 16    31         10    0     0
July 18    34         3     5     3
July 20    39         18    2     6
July 23    25         5     0     3
July 25    25         0     0     0
July 27    57         4     0     2
July 30   105         7     0     0
August 1   70         3     0     3
August 3  185         3     0     0
August 6  190         40    0     0
August 8  288         88    0     3
August 10 200        100   0     4
August 13 110         20    0     0
August 15 85          15    0     0
*****
```

GSB = green stinks bugs; BSB = brown stink bugs

Trap location: Richlands; Cooperator: Richland Farms
Insect counts are from a single black light trap
located approximately 1 mile east of Richlands.

From: Kent Wooten, Agricultural Extension Agent, Robeson County

Light Trap Data from Robeson County

```
*****
                        Number of Adult Insects
                        *****
Date      BW     GSB    BSB    FAW
*****
July 6      12     -     -     -
July 7-8    23     -     -     -
July 9      18     -     -     -
July 10     15     -     -     -
July 11     11     -     -     -
July 12     14     -     -     -
July 13-15  47     18    3     -
July 16     18     7     1     2
July 17-18 132     17    4     -
July 19     98     11    1     11
July 20    105     7     1     9
July 21-22 172     5     0     13
*****
```

July 23	105	2	0	2
July 24	102	3	0	0
July 25	97	5	1	3
July 26	93	4	0	4
July 27-29	165	6	0	3
July 30	58	3	0	4
July 31-1	191	35	1	4
August 2	69	2	1	1
August 3-5	168	18	1	3
August 6	63	7	0	0
August 7	52	6	0	2
August 8	48	6	0	0
August 9	53	5	1	0
August 10-12	131	17	1	2
August 13	56	6	0	2
August 14	43	7	1	1

BW = bollworms; GSB = green stick bugs;
 BSB = brown stink bugs; FAW = fall armyworms

Location is Rowland; monitored by Kay McGirt

From: Josh Gaddy, Agricultural Extension Agent, Sampson County

Light Trap Data from Sampson County

 Number of Adult Insects

Date	BW	GSB	BSB	THW
July 2	----- trap set up -----			
July 5	3	0	1	1
July 6	3	0	0	0
July 9	3	7	0	4
July 11	3	1	1	2
July 13	4	4	0	8
July 16	----- power failure -----			
July 18	12	0	0	12
July 20	57	5	0	8
July 23	132	2	0	17
July 25	50	0	0	4
July 27	93	1	0	3
July 30	118	5	0	3
August 1	124	1	1	2
August 3	130	5	0	1
August 7	178	4	0	9
August 10	215	5	0	20
August 13	57	1	0	45
August 15	72	3	1	38

BW = cotton bollworms; GSB = green stink bugs;
 BSB = brown stink bugs; THW = tobacco hornworms

Black trap located 6 miles south of Clinton on
 US-701S on the farm of Mike and James Hope.

From: David E. Morrison, Agricultural Extension Agent, Scotland County

Light Trap Data from Scotland County

```

*****
                        Number of Adult Insects
*****
                Gibson                John's                Laurinburg
                *****                *****                *****
Date            BW  GSB  BSB  FAW      BW  GSB  BSB  FAW      BW  GSB  BSB  FAW
*****
July 11        13  14   0   0       22  33   1   0       12  10   1   0
July 13         8  10   0   0       17  25   6   0        3   7   0   0
July 16        16  14   0   0       61  14   0   0       26   5   0   0
July 18        16   5   0   0       74  24   2   0       57   6   0   0
July 20        41   7   0   0      223  41   0   0      156  11   0   0
July 23        26   1   0   0      268   3   0   0       81   1   0   0
July 25        62   3   0   0      138   1   0   0      146   6   0   1
July 27        53   4   0   0      164   4   0   0      110   5   0   0
July 30       133   9   0   0      377   5   0   0      175   5   0   1
Aug.  1        27   2   0   0      274   0   0   0       96   3   0   0
Aug.  3       142  23   0   0      308   1   0   0      323   9   0   0
Aug.  6       195  25   0   0      240  13   0   0      266  44   0   0
Aug.  8       123  19   0   0      132  17   1   0       44   9   1   2
Aug. 10        80  14   0   0       94  27   1   0       40   6   0   2
Aug. 13        43  11   0   0       80   7   1   0       38   2   0   1
Aug. 15        70   4   0   0       64   0   1   0       32   0   0   2
Aug. 17       148  10   0   0        -   -   -   -        9   3   0   0
*****

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BW = bollworm moth; GSB = green stink bugs;
 BSB = brown stink bugs; FAW = fall armyworms

From: Kevin Johnson, Agricultural Extension Agent, Wayne County

Light Trap Data from Wayne County

```

*****
                        Number of Adult Insects
*****
                Seven Springs                Goldsboro
                *****                *****
Date            GSB  BSB  CEW  HW      GSB  BSB  CEW  HW
*****
July 6          -   -   -   -        2   0   1   0
July 9          -   -   -   -       23   6   1   0
July 11         -   -   -   -        1   0   1   0
July 13         1   0   1   2        5   0   3   1
July 16         2   0   6   4        -   -   -   -
July 18         0   0   5   0       10   -  11   2
July 20         4   0   4   3        -   -   -   -
July 23         1   0   8   5        2   0  61   2
July 25         -   -   -   -        1   1  50   3
July 27         2   0   4   3        3   0 120   0
July 30         2   1   6   2        7   5  75   0
August 1        5   0  12   2        5   1  51   0
August 3        -   -   -   -        0   2  25   1

```

August 6	2	2	10	20	1	0	111	5
August 8	4	0	26	2	7	1	101	3
August 10	-	-	-	-	-	-	-	-
August 13	11	0	44	10	-	-	-	-

GSB = green stink bugs; BSB = brown stink bugs;
 CEW = corn earworms; HW = hornworms

Cooperators: D. M. Price (Seven Springs); Willie Howell (Goldsboro)

From: Norman E. Harrell, Agricultural Extension Agent, Wilson County

Light Trap Data from Wilson County

Number of Adult Insects

Date	Lucama			Pender's Xrds			Sims			Fountain		
	CEW	BS	GS	CEW	BS	GS	CEW	BS	GS	CEW	BS	GS
July 16	-	-	-	-	-	-	-	-	-	4	0	9
July 18	-	-	-	14	0	1	0	0	2	4	0	25
July 20	-	-	-	10	0	0	3	0	0	18	0	24
July 23	12	0	0	17	0	1	0	0	0	37	0	3
July 25	2	0	1	25	0	0	1	0	0	13	0	3
July 27	4	0	2	15	0	1	4	0	0	20	0	14
July 30	7	0	2	12	0	1	9	0	0	36	0	26
August 1	4	0	0	12	0	0	0	0	0	26	0	0
August 3	6	0	1	31	0	0	0	0	1	58	0	10
August 6	25	0	6	46	0	2	22	0	3	121	0	60
August 8	25	3	2	28	0	1	11	0	3	94	0	78
August 10	3	1	2	17	0	1	4	0	2	27	0	38
August 13	4	1	0	43	0	0	3	0	0	12	0	11
August 15	38	0	5	62	0	0	1	0	0	29	0	5
August 17	8	0	0	26	0	0	5	0	2	48	0	5

Locations: Lucama, Pender's Crossroads, Sims and Fountain
 Monitored by: Chris Bass, Adam Gardner, Thad Sharpe and Barbara Smith

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