

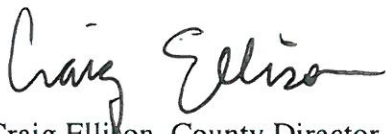
August 2016

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# Ag News

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The mention of brand names does not imply endorsement, nor discrimination against similar products not listed. Users are responsible for complying with regulations and label instructions.

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## Pesticide Credit Opportunities...

**August 30** – Severn Peanut Field Day, 9:00 AM – 12:00 PM. Located at 479 Willis Hare Rd, Pendleton, NC. **One hour of D, N, O and X** offered for private pesticide applicators.

**August 31** – Northampton County Replicated Cotton Trial and Grain Sorghum Research Tour 3:30 PM. **One hour of D, N, O and X** offered for private pesticide applicators. See page for more details.

**September 7** – Pesticide Recertification – JW Faison Auditorium 10:00 AM-12:00 Noon; and 1:00-3:00 PM – **Two hours each of pesticide credits “V”** for private pesticide applicators.

## Upcoming Events...

**August 30** – Severn Peanut Field Day - see above.

**August 31** – Northampton County Replicated Cotton Trial and Grain Sorghum Research Tour – see page 2.

**September 7** – Pesticide Recertification – see above.

**September 8** – 64<sup>th</sup> Annual Peanut Field Day – Lewiston-Woodville, NC. Registration at 8:30 AM with program 9:00 AM-3:00 PM.

**September 15** – Cotton Field Day, Rocky Mount, NC 11:45 AM-4:30 PM.

**September 20** – Peanut Pod Blasting, 8:30 AM – 12:00 Noon, Meherrin Peanut Buying Station, Conway, NC

**November 1** – Nickels for Know-How Referendum – Polls will be in the Extension Office at Northampton and Hertford Counties – voting 8:30 AM – 5:00 PM. See page 2.

## **Northampton County Replicated Cotton Trial and Grain Sorghum Research Tour**

The Northampton County Replicated Cotton Trial Tour is scheduled for **Wednesday, August 31, 2016 at 3:30 PM**. Dr. Guy Collins will be on hand to share and discuss Cotton Variety Characteristics for 2016.

The plot is located across the road from 2624 Big John Store Road. Directions: Drive North on Peanut Farmers Market Road to Big John Store Road. Turn right onto Big John Store Road. Plot is located 1/3 mile on the right.

We will also be viewing grain sorghum research plots with Area Grain Agent, Scott Tilley. The grain sorghum plots are located just outside the city limits of Jackson at the Holly Ridge Research location. One hour of N, O, D, & X credits will be available for private pesticide applicators.

## **County Nickels for Know-How Referendum Announcement**

The County Nickels for Know-How Referendum will be held on Tuesday, November 1, 2016.

Two polling places have been established, one in Northampton County and one in Hertford County and will be open from 8:30 AM to 5:00 PM. The polling locations are as follows:

- 1 Northampton County Extension Office at 9495 NC Hwy 305 N, Jackson, NC, and;
- 2 Hertford County Extension Office at 301 Tryon Street, Winton, NC.

The referendum is being held to let users and producers of feed or fertilizer decide if they wish to continue the self-assessment program.

This program has been in place since 1948, and the law requires that a new referendum be held every six years.

A 2/3 favorable vote will mean that growers are willing to continue to assess themselves to support agricultural research and education. The assessment is fifteen cents per hundred ton on feed and fertilizer produced in North Carolina.

The funds, about \$1.4 million annually, are collected by the North Carolina Department of Agriculture and Consumer Services, and then allocated by the NC Agricultural Foundation, Inc.'s 148 volunteer Board of Directors to support agricultural research and extension projects at NC State University benefiting agriculture in North Carolina.

For more information on the referendum, please call the County Extension Office at 252-534-2711.



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Content From:

Cotton

<https://cotton.ces.ncsu.edu/2016/08/managing-bollworms-in-bt-cotton-through-seasons-end/>

# Managing Bollworms in Bt Cotton Through Season's End

— Written By Dominic Reisig (2 days ago)

Written by Drs. Guy Collins and Dominic Reisig

As predicted, we have had an extraordinary year for bollworms in Bt cotton, some growers stating that cotton looks like it did before Bt. We can assure you that Bt is still working, since the non-Bt plots in Rocky Mount and Plymouth are devoid of fruit, while the Bt plots still have fruit (albeit loaded with bollworms in some cases). Let's also not forget that Bt cotton is phenomenal to manage tobacco budworm, but has never been 100% effective on bollworm. We know that there are bollworms in the system with some level of Bt resistance, but a number of other factors have probably played into this year's deluge including: increases in corn acreage, lots of bollworms in the system, lots of bollworms coming out of Bt corn, oversprays for plant bugs and stink bugs that were well timed to manage these bugs but poorly timed to manage bollworms, late planted cotton, weather, etc.

Right now if you have large bollworms, they are probably inside bolls and you won't touch them with an insecticide. This generation of corn earworm is pretty much done, but we can expect another one soon and they can sometime be even more numerous than before. Generally this isn't a big concern, but we have a lot of late-planted cotton that could still be susceptible. Some tips to manage them through the season are below:

**Scout, scout, scout.** This point cannot be overstated. You need to make a special effort to scout for bollworm detailed [here \(https://cotton.ces.ncsu.edu/insect-scouting-guide/\)](https://cotton.ces.ncsu.edu/insect-scouting-guide/) in the scouting guide. If you are only checking for stink bug injury on quarter-sized bolls, you could miss a potential problem. Watch light trap data (found [here \(https://cotton.ces.ncsu.edu/trap-data/\)](https://cotton.ces.ncsu.edu/trap-data/)) in your area to see if a flight could be occurring. Also, as we move into the fall, make sure to properly identify bollworms, as well as fall armyworms that could be problematic in a few rare cases, as this influences product selection.

**Note what size the larvae are and where they are feeding.** You won't kill larvae underneath bloom tags or in bolls with insecticides, unless these worms come out of bolls to feed in other locations on the plant. Small larvae are much easier to kill than large, which is why a spray for larvae is recommended in the [scouting guide \(https://cotton.ces.ncsu.edu/insect-scouting-guide/\)](https://cotton.ces.ncsu.edu/insect-scouting-guide/) when larvae are in their second stage of growth (just larger than 1/8 inch).

**Make sure you know how susceptible each field is.** There are several things to consider. We generally recommend stopping bollworm control when cotton plants are 3 nodes above white flower. However, there are a few cases that are somewhat unique to this year that could influence the susceptibility of each field. It is very important to evaluate each field thoroughly to determine how long bolls should be protected from insect pests. Depending on fall weather, the last



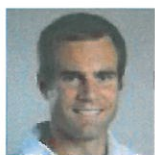
effective bloom date generally falls between August 15<sup>th</sup>-20<sup>th</sup> and August 25<sup>th</sup>-September 1<sup>st</sup> depending on geography and the year. The early end of this spectrum may be somewhat conservative whereas the later dates become more risky in terms of how often growers can effectively harvest later-set upper bolls. Naturally, sunny and warm weather during the fall with intermittent but timely rains may help develop more upper bolls that bloom towards the later end of this range, whereas cool and cloudy weather with an early frost may not allow for development of some upper bolls, resulting in a last effective bloom date towards the early end of this range. Bolls should be full-sized by mid/late September in order to be harvestable, again, dependent on heat unit accumulation and timeliness of rains needed to fill out these bolls during the early fall. This year, many fields are planted somewhat later than normal, and some fields may have experienced drought stress during squaring or early in the bloom period, or boll losses due to plant bugs on lower nodes. In either of these cases, the upper bolls may contribute a higher than normal proportion of the total harvestable boll population. Therefore, growers should decide how many upper bolls they want to protect from caterpillars based on 1) the percentage of total harvestable bolls that upper later-set bolls may contribute and 2) the most reasonable last effective bloom date for their region, based on experience, historical heat unit accumulation data, and the amount of risk they want to take in waiting for upper bolls to develop.

Additionally, you need to look at the fruit load and identify how many susceptible bolls that you have. Bolls that are big and hard cannot be penetrated by a bollworm, even if cotton is non-Bt. One difference we have noted this year is that medium-small bollworm larvae are able to penetrate larger than normal bolls of WideStrike (most PhytoGen varieties) cotton. This has not happened in previous years so pay special attention to these varieties. Again, proper identification of caterpillars is important as fall armyworms may penetrate some larger, tougher bolls.

**Continue to use the [egg threshold and Prevathon spray \(https://cotton.ces.ncsu.edu/2016/07/be-prepared-to-spray-bollworm-in-bt-cotton-this-year-change-in-recommendation/\)](https://cotton.ces.ncsu.edu/2016/07/be-prepared-to-spray-bollworm-in-bt-cotton-this-year-change-in-recommendation/) overtop susceptible PhytoGen cotton, while using the larval threshold once eggs have hatched (see [scouting guide \(https://cotton.ces.ncsu.edu/insect-scouting-guide/\)](https://cotton.ces.ncsu.edu/insect-scouting-guide/) for larval threshold).** Please note that this threshold will be used for 2016 only, since there are so few tobacco budworms this year. Since you will be evaluating the percent of susceptible bolls, if you have only a fraction of bolls that are susceptible, it's probably safe to modify the larval threshold accordingly. For example, if you have only 1/5 of the bolls that are susceptible, you could probably multiple the threshold value by 5 (in this example, you'd need 15 live larvae on 100 plant parts in a single scouting trip to trigger a spray).

**Pyrethroids tend to be ok for bollworm overtop Bt cotton.** Even when bollworm can grow and develop on Bt, they are still inhibited from growing. In these cases, pyrethroids work better than they do other crops like soybeans, which is detailed [here \(https://soybeans.ces.ncsu.edu/2016/08/update-for-bollworm-mearworm-management-in-soybean-and-cotton/\)](https://soybeans.ces.ncsu.edu/2016/08/update-for-bollworm-mearworm-management-in-soybean-and-cotton/). Larvae must either be contacted by the insecticide or feed in order to die. Bifenthrin is a pyrethroid, but is weaker than other types (on bollworms, not bugs) and should be avoided for direct bollworm control. Alternative pyrethroid examples that should work include Baythroid, Karate, and Mustang. Worm-specific products should work as well, but in product testing in the past, have not worked better than pyrethroids alone once larvae were present. Examples include Blackhawk, Consero, Intrepid Edge, Prevathon, and Steward. Blackhawk and Consero have always rated a little lower than these. Pre-mixed products such as Besiege (Prevathon + Karate active ingredients) should work as well.

WRITTEN BY



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POSTED ON AUG 20, 2016