

NC Cooperative Extension, Craven Center



Agricultural Update

November 2025

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Important Note: Registration deadline for events listed below will vary from as few as 24 hours prior the event to as much as 3-4 days prior the event so please register as much in advance as possible. Also, while attendance is open to anyone, meals, when served, will only be provided for those that register in advance.

UPCOMING EVENTS

2025 CCA Training - This training, hosted by Extension Agents from the Southeast District, will take place on December 9-11, 2025 in the auditorium of the Johnston County Ag Center (2736 NC Highway 210, Smithfield, NC 27577). For pay-at-the-door registrants, expect a registration delay and please be prepared to pay the \$200 fee by check (made payable to Duplin County Extension Center) or \$200 cash (exact change). Check is preferred and credit card/debit card is not accepted. Your registration fee includes class materials, light breakfasts, refreshment breaks, and lunches. This training provides 20 total CCA CEUs. Registration forms and additional information is found at the [Johnston County Extension website](#).

US Flue-cured Tobacco GAP meetings have been scheduled. For producers within NC, all meetings are scheduled for January 2026. Below is the scheduled meetings. All will be held within the NC Extension office of the location listed and will begin at 9 AM. Specific details, updates, cancellations, or changes are posted at [GAP Connections](#).

Date	Location
Jan 5th	Wilson
Jan 7th	Smithfield
Jan 20th	Goldsboro
Jan 28th	Greenville

The NC Commodities Conference will take place on January 14-15, 2026 at the Greenville Convention Center located at 303 SW Greenville Blvd., Greenville, NC. Please Note : This is now a one day event on Jan 15th, 2026! Registration, agenda, hotel discounts and more information is found at the [NC Commodity Conference website](#).

*Mark Eubanks now serves as the Pesticide Coordinator and will present these classes. For questions regarding the certification process or other license concerns, please contact him at 252-633-1477 or by email to: meubank2@ncsu.edu

HOLD THESE DATES

As always, we reserve the right to make last minute changes but we have the following dates, topics and locations that we can share.

- January 22, 2026 - Area Corn & Soybean Production to be held at the Jones County Civic Center, Trenton, NC
- February 16, 2026 - Peanut Production meeting in Pitt County
- February 20, 2026 - Area Cotton Production meeting to be held in Trenton, NC

NC Small Grain Referendum, December 4, 2025

Whether North Carolina growers of small grain (wheat ,rye, oats, barley, rape seed/canola and grain sorghum) continue to assess themselves an assessment of ½ of 1% on the gross dollar amount sales on all small grain produced on their farms for a six year period-collection will be determined on December 4, 2025. If passed, these funds will be collected by the North Carolina Department of Agriculture and Consumer Services and paid to the North Carolina Small Grain Growers Association for grower education, research, marketing, legislation and enhancing small grain profitability for North Carolina Farmers.

Voters must be at least 18 years old and involved in production of grains. Voting will occur in all NC Cooperative Extension office during normal office hours. Past funds have fully or partially funded, support for FFA, 4-H, Wheat Yield Contest (National and State), National Wheat Growers Associations, NC Seedsmen's Association, NC Commodity Conference, Blacklands Farm Managers Tour, UMO Ag Fest, Extension/ School Systems teaching young people importance of Agriculture and where their food is produced, demonstrations at Farm Shows and Community Ag Awareness Programs and field days for producers.

Cast your vote on December 4th in the auditorium of the Craven County Agricultural Building from 8 am – 5 pm. (Recall that the Extension office has been moved into the room during remodeling construction).

Corn Production in Wet, Dry and Optimal Soil Moisture

Dr. Chad Poole has released his 2025 study for corn grown in optimum, dry, and wet soil regimes. Testing included both late (116+ day) and medium (112-115 day) maturity groups. The entire study can be downloaded below. It is worth the time to review the entire data to discover some of the finer points. A few of the highlights are below.

Late Maturity Group

- Combining all late maturing varieties the average yield for optimum, dry, and wet soil regimes are 222, 219 and 165 bu/ac, respectfully. This shows two important points. First, irrigation was not needed for optimum yield in 2025. Secondly, as, always, wet soils, even early in the year, are devastating to yield. Excessively wet soils resulted in the lowest yield.
- Within the optimum soil production for late maturing varieties, DKC 66-02 & DKC 68-67 were significantly lower than all other varieties but there was no statistical difference in yield among all other varieties.
- Within the dry soil production for late maturing varieties, DKC 68-94, RV1839VT2P, DKC70-45VT2P, DK68-69, and DK68-35VT2P were significantly higher in yield than all other varieties.
- Within the wet soil production for late maturing varieties, DK68-35VT2P, DK65867, and RV1839VT2P are significantly lower than all other varieties.
- When all late maturing varieties for all soil moisture regimes are combined, DKC68-94, DKC70-45VT2P, DK68-39, and P1767YHR are significantly higher than other varieties but not significantly different from one another. The average yield is 201 bu/ac.
- Assuming \$1,000 per acre for production and subtracting the bottom yield from the top yielding varieties, then economic loss resulting from poor varietal choice for optimum soil conditions is \$161/ac. For dry soil conditions is \$112/ac and for wet soil conditions \$233/ac.
- All Bt and non-Bt varieties yielded similar within each soil regime (i.e. no difference between the Bt and non-Bt yield).

Medium Maturity Group

- The overall mean yield was 192 bu/ac when averaged across all soil moisture regimes. The mean for optimal soil moisture, dry soil conditions, and wet soils is 209, 203 and 165 bu/ac respectively.

- A greater number of varieties were included in this test. Varietal response varied greatly for some, depending upon the soil regime. There were a few noteworthy trends. As example, Scout GT5914TRE was numerically the highest yielding variety for all soil moisture regimes. Pioneer P1377PWVE ranked high in the optimal and dry soil moisture regimes but poorly in the wet soil regime. Meherrin RV1577VT2P yielded well in optimal and wet soil conditions but was significantly lower in the dry soil conditions.
- While trends, and often significantly higher yield could be noted within the medium maturity group, the ranking of many varieties seemed more dependent upon the soil moisture regime. Again, one can only note "trends" because many of these varieties are not statistically different from another. You may note other trends when you examine the data.
- Using the same economic metrics as the presented for late maturing corn, poor varietal choice relates to \$187/ac, \$195/ac and \$244/ac under optimal, dry, and wet soil conditions respectively.

This type of testing provides great data to evaluate which varieties consistently performs highly across all types of environmental conditions. Too, it demonstrates those that perform better under optimal conditions vs dry conditions. (Truth be told, few did very well in wet soil conditions). Several critical items to consider when examining this data include the trend, actual yield, and costs. Realize that production in this area can indeed provide corn yield 200+ bu/ac but not for all soil types. So, examine the list of varieties that performed well under optimal soil conditions to plant these on our more productive soils. Similarly, for less productive, sandier soils, choose varieties that performed well under the dry soil moisture regimes. If your soils vary widely, (and many farms do indeed), then use the overall data to determine varieties that did better in all conditions.

As always, we strongly prefer to use multiple years of data rather than a single year of data. However, some companies have not contributed to this trial consistently enough for us to provide information for multiple years. As such, one must rely upon this limited, one year of data. Having said, if a particular variety in this trial performed very well or poorly, one can still ask about the genetic background of these varieties and choose (or avoid) ones with a similar genetic heritage. Simply ask your seedsman for the details.

Another consideration for this study should be that wet soils always greatly reduce yield. This has been proven whether the excessive soil moisture arrives early in the year or later in the year. As little as 24 hours of saturated soils greatly reduces yield. In direct contrast, several years of this type of testing has shown that while we do indeed lose yield due to dry soil conditions, we still have good yield even under such dry conditions. It is the wet soil regimes that devastates yield. So, given this information, we should concentrate on our greatest weakness.....lack of soil drainage.

For some, correcting for a lack of water or excessively poor drainage (or both) may be relatively simple. For others, it may take an intensive research to install tile drainage, crown fields, put in water control structures, irrigation, or more. However, one must ask which is greater, the cost per acre in loss of corn yield or the cost of installing proper tools for water management. The estimates from this study show that excessive water cost \$230-\$240/acre. According to the Fall 2025 Corn Growers Association of North Carolina, irrigation increased yield 124%. Soil drainage systems boost yield between 71-112%, depending on soil characteristics and management. As such, examine your potential yield and assume that such improvements add 90% yield. As example, assume an average yield on a farm without irrigation and drainage of 120 bu/ac. Adding these improvements would increase yield to 228 bu/ac. The 108 bu/ac increase would add \$432/ac if sold at \$4/bu.

Okay, so this is realistic data, but as we all know, things just don't always happen exactly as projected. So, be more conservative when you estimate. Assume 120 bu/ac average and only

a 75 bu/ac increase. At \$4/bu, this still adds \$300/ac in sales. Will this pay for improvements? You decide what is best for you but it merits consideration.

[Download the 2025 Corn Water Resiliency Study](#)

Using Farm Ponds for Flood Mitigation

Over the past years, the concept of using farm ponds to collect water during tropical storm systems or other heavy rainfall event has been studied. Several research sites have installed whole farm drainage tile and irrigation systems with 2-4 acre ponds as the water source. These studies have dual goals. The first is to evaluate the economic feasibility of installation of what we would normally consider poor, sandy soils. The second goal is to determine whether pond design and management could be used to collect water upstream from flood-prone areas during extreme rainfall events to prevent downstream flood damage. The data shows that both can be done.

As for the economic possibility, there are too many assumption to provide a clear justification. Yield for corn and soybean crops under this type of system has consistently been 170+ bu/ac and 55+ bu/ac for a three year average. Realize the corn crop is being produced on soils that historically were 100 bu/ac or less. So yes, we can increase yield as well as provide a consistent income. However, whether this system is feasible to install depends entirely upon commodity price and how long the farmers intends to farm.

As for "water farming" concept, ponds that were full or almost full just prior a storm event were drained partially to accept the amount of water anticipated to fall on the farm during the storm event. Ponds that were low were not drained but simply allowed to collect water during the storm event. For both, excessive water captured in the pond during the storm event were held in the pond for 24-72 hours after the storm and then released to a normal pond level. This type of system did indeed prevent downstream flooding.

The main point of mentioning this topic is that plans are now progressing to consider whether the USDA cost share programs could be designed to provide cost share for such system. Too, should wetland areas already exist on a farm, purchase of the wetland from the landowner is another consideration. Too, some annual payment paid to the farmer is considered for use of the pond as flood mitigation effort. This is all good. However, as typical for evaluating payment to farmers, it is common to examine the current income of farmers and make payments slightly greater than existing income given current economic conditions. This type of system ignores the true cost savings to society since, by design, this system should eliminate flooding to downstream homes, business, infrastructure, etc. Perhaps a better means to ensure that the farmer can remain farming in perpetuity is to allow annual payments that also include some cash value for equipment maintiance as well as prevention of flooding to property downstream.

Equally as important (at least in our view) is that natural systems such as this are not well suited for all areas. The pond water collection systems actually work better within the Coastal Plain but not in portions of landscape with a steep slope. Too, no system is perfect so storms that have extremely high rainfall amounts will still cause flooding. So, this begs the question as to whom might be financially responsible for damage should damage occur in spite of all planning efforts? Too, who will monitor storms and project the gallons of water to release prior a storm? Who will pay for maintenance of the system? These are just a few things to consider. Most can be easily mitigated but the issue of liability needs to be clear to protect the farmer and/or landowner.

Give this some thought. At the moment, nothing other than discussion has occurred. Too, other "natural means" have been discuss. (Read at least one report by NCSU faculty, Dr. Barbara

Doll, [Determining the costs, revenues, and cost-share payments for the "floodwise"](#)

[program: Nature-based solutions to mitigate flooding in eastern, rural North Carolina](#)).

Be prepared to discuss how this type of effort could be implemented on your farm as well as concerns you might have. Bring this to the attention of grower associations, Farm Bureau, local community leaders, and current government representing this area.

2026 Private Applicator Safety Training

Mark Eubanks will provide future classes for recertification of those with pesticide licenses. Due to construction work on the Craven County Agricultural Building, most classes in 2026 will be held in other counties or within the Craven on a limited basis. As such, pre-registration will be required to ensure we have adequate seating space. (All rooms have a capacity of 20).

To date, tentative classes scheduled but not yet NCDA & CS approved are listed below. Check the [NCDA & CS Pesticide Training Course Calendar](#) or our [Event Webpage](#) in early 2026 for registration information.

- **Jan 29th** at the CMAST Building in Carteret from 2-4 pm, Pesticide Safety, Category V
 - **Feb 11th** at the CMAST Building in Carteret from 9 am-1pm,. This class offers Private Applicator Safety, Category V and Specialty Credits for Category X
 - **Feb 25th** at River Bend Large Conferences Room (51 shoreline Drive New Bern) from 9 am-1pm. This class offers Private Applicator Safety, Category V and Specialty Credits for Category X.
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Wheat Management

The newest version of the wheat production guide was printed in 2021 but it still offers excellent information, links to web addresses, tools, images, formulas, evaluation techniques and more. Download it [HERE](#).

One item that it does not cover is how to deal with poor plant populations that resulted from very dry soil conditions when planted. As such, we offer this advice. Simply wait and let the plant grow. January is the time to evaluate plant population for additional nitrogen. At this time, if the field consistently has 50 tillers per square foot, the field is on track for good yield. If the field has 20-30 tillers per square foot, then adding nitrogen in January or early February is beneficial. (Refer to pages 35-37 in the Small Grain Production Guide).

Craven County Agricultural Building Remodeling

Just a reminder that remodeling is scheduled for the Craven County Agricultural Building beginning in September 2025 through June 2026. As such, the auditorium will be closed to the public during this time. Production meetings, events, pesticide classes, etc. will be held in other buildings within the county or in other counties. Please note the location in these counties when announcements arrive in future emails, web posts, or newsletters.



NC Farm Help Line

Tariffs, low economic prices, unpredictable weather, age, labor problems, and many other factors contribute to stress of farming. In fact, whether we like it or not, agriculture has one of , if not the highest, accidental death rates due to equipment use, as well as the highest suicide rate for occupations. Do consider potential impact of things that can be a negative influence on production but please don't worry about things you cannot change! If you find yourself depressed, well, we can listen! If you are not comfortable discussing issues with us, help is available 24/7, through the Help Line that connects individuals experiencing a crisis or in need of other help with resources including mental health, financial, legal, farm safety/health, Cooperative Extension and more at 844-325-3276 or online at <https://ncfarmstress.org/crisis-and-resource-lines/>. Additionally, for tobacco producers, legal or labor assistance is available free from [GAP Connections](#)

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Mike Carroll, Director and Field Crops	mike_carroll@ncsu.edu
Ashley Brooks, 4-H & Youth Development	albrook4@ncsu.edu
Stephanie Stephenson, Family & Consumer Sciences	stephanie_stevenson@ncsu.edu
Lisa Rayburn, Specialty Crops & Markets	lisa_rayburn@ncsu.edu
Kristi Welke, Area Livestock Agent	kdwelke@ncsu.edu
Mark Eubanks, Consumer Horticulture	meubank2@ncsu.edu
Debbie Titus, Administration	debbie_titus@ncsu.edu

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