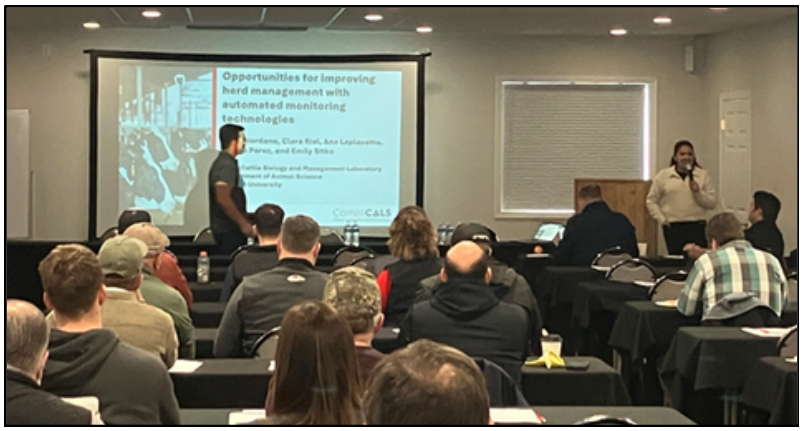
Cornell Cooperative Extension
Central New York Dairy, Livestock and Field Crops

ANNUAL
REPORT
2025

2025 Dairy Day in Madison & Saratoga County

Farms can benefit from having access to new information and research on different management practices that could represent a profitable strategy for their farms.
Dairy farms depend on quality feed to maximize milk, and new opportunities with High Oleic Soybeans have been of interest to dairy farms. This feed could represent an opportunity for low-cost diets and at the same time, a feed that can increase milk fat without too much risk of milk fat depression.
On the other hand, automated monitoring technologies are more common in dairy herds, depending on the farm management, this could represent an advantage on labor costs, increased reproduction efficiency, and more importantly, prompt care for sick cows.
The CNYDLFC team organized an event for farmers to hear from Cornell University professors, extension agents, and industry experts. The event also included a farmer panel, where farms that have already adopted these strategies could share their experiences and expertise with the rest of the audience.
The event was held in two different locations, with a total attendance of more than 140 attendees.



Central NY Corn and Soybean Day

Central NY Corn Day got a soybean boost for the first time this year, as Field Crops Specialist Erik Smith was keen on expanding the focus of his annual crop congress. Also new this year was a change in venue, as Central NY Corn & Soybean Day was held in both Hamilton and Ballston Spa. Nearly 100 total attendees heard talks featuring updates and management information for the latest invasive corn diseases to strike NY, tar spot and corn stunt, as well as management strategies for invasive, herbicide resistant weeds in soybeans and corn. Olivia Godber, of the Nutrient Management SPEAR Program, discussed her work on soil nutrient balances in NY farm fields. We also heard from DEC specialists on how to effectively manage vertebrate pests like deer, bear, and birds on farms.

Dr. Olivia Godber speaks to attendees at Central NY Corn & Soybean Day, held at the White Eagle Conference Center in Hamilton.

Field Crop & Vegetable IPM Roadshow

This spring, CNYDLFC teamed up with the Eastern NY Commercial Horticulture Program and CCE of Madison County to take their show on the road. Between March 25-28, the Field Crop & Vegetable IPM Roadshow was held in seven locations throughout Central NY and the Mohawk Valley region, focused on equipping crop farmers with the latest Integrated Pest Management (IPM) strategies for insect pests, diseases, and weeds. A few of the topics discussed by Erik Smith, Regional Field Crop Specialist, were the identification and management of invasive weeds like Palmer amaranth and tall waterhemp, and crop diseases like fusarium head blight of small grains. He also provided updates on seedcorn maggot research, and updates on the spread of corn tar spot and NY's newest corn pathogen, corn stunt. Regional Vegetable Specialist, Crystal Stewart-Courtens, and Madison County Agricultural and Horticulture Resource Educator, Mary Ellen Sheehan, discussed IPM in sweet corn and pumpkins, including updated weed control recommendations, variety recommendations, and spray programs for insects and diseases in both crops. A surprise attendee at our Cobleskill location was the NY State Commissioner of Agriculture, Richard Ball, who was one of nearly 70 who attended this program across all 7 locations.

Dr. Erik Smith, speaking about weed biology and Integrated Pest Management principles to a group of farmers at the Field Crop and Vegetable IPM Roadshow in Cobleskill.

Precision Feeding for Grass Fed Beef

Ashley, and Erik are working on the NYFVI grant project. The delayed state budget held up funding for the NYFVI. Even though we have begun work on this grant, details on reporting benchmarks and producer meetings have been delayed and the grant will now be complete in the spring of 2025.

Central NY Continues to Grow!

Meet our new Farm Business Management Specialist

Raevyn Saunders grew up in Michigan on a fruit and vegetable farm, where she developed a strong passion for agriculture. After moving to Central New York, she continued gaining hands-on experience working on local dairy and equine farms throughout the region. These experiences inspired her to pursue a career in agricultural business to better support the agricultural industry.

Raevyn holds a Master of Science in Food and Agricultural Business from SUNY Morrisville and a BBA in Agricultural Business, where she completed interdisciplinary coursework in agricultural economics, agribusiness marketing, human resources, and financial management. Her graduate work included developing onboarding and labor audit tools for farm employers, evaluating supply chains, and analyzing market pathways for value-added food products. These experiences have prepared her to support producers through financial planning, compliance support, and business planning to achieve operational goals.

Raevyn previously worked for Cornell Cooperative Extension as a Farm to School Coordinator and Agricultural Educator, leading grant-funded initiatives to connect local farms with institutional markets and designing hands-on agricultural resources for local producers. Most recently, she worked in the heavy equipment industry at Milton CAT, where she managed service logistics and technician support for construction and agricultural customers across New York. With both practical experience and a strong educational foundation, Raevyn is excited to partner with producers to strengthen farm businesses and support the future of agriculture.

My name is Heer Patel

I'm the new Program Aide for the CNYDLFC Regional Team.

I was born & raised in India, and grew up in Pennsylvania. I studied Agricultural Sciences at Penn State University where I attained a Bachelor of Science with minors in Soils and International Ag. My passion for sustainable farming and soil health grew from a young curiosity about where my food comes from. This led me to diverse experiences, including studying the Himalayan environment in Bhutan in 2022, where I gained valuable insights into sustainable agricultural practices and soil management in a global context. While with the Pennsylvania Association for Sustainable Agriculture, I contributed to the Soil Health Benchmark study where I coordinated sampling efforts and gained deeper knowledge in scientific research. As an undergraduate, I also collaborated with professors and grad students on the development of a Nitrogen decision-making tool, gaining hands-on experience in research field management. In my free time, I enjoy helping out at Patchwork, a small organic produce & vegetable farm in Central PA.

I'm excited to contribute to the team's ongoing efforts, particularly the neonic project, which I'm eager to dive into. Having participated in conferences like the 2022 Tri-Society Conference and the Women for the Land Learning Circle, I gained valuable networking experience and further strengthened my commitment to addressing agricultural and sustainability challenges. I am passionate about using science & collaboration to address key agricultural challenges, and excited to continue learning and growing with the team at CNYDLFC.

Developing a Plan to Reach your Farm's Dairy Cow Replacement Needs

Farms plan one year in advance for forage, and a critical part of the planning process is developing a plan for the herd. Regardless of the size of the dairy, this is a process that has to be carefully thought out. The herd inventory depends on how many acres the farm has access to and how well the forage is used and managed.
There are many factors that could affect this plan, leaving the dairy short on forage inventory or not reaching the dairy's milk production goal, consequently affecting the dairy's financial status.

The CNYDLFC team organized an event for Amish communities to develop a plan for herd inventory and forage inventory. The event had 13 Amish farmers who were able to work on their dairy plan for herd and forage inventory.

The **Fencing 101 with The NY Farm Ops** program, held at the end of May, was a great success, drawing 20 enthusiastic participants. The hands-on training provided attendees with valuable foundational skills in fencing techniques and farm infrastructure planning. Feedback from participants was overwhelmingly positive, with many producers expressing strong interest in additional, more advanced training opportunities. The high level of engagement and demand for further education highlights the program's effectiveness and its importance to the agricultural community

Corn and Soybean Seed Treatment Research:
Will conventional growers lose yield without the protection of neonicotinoid insecticides?

With the ban of neonicotinoid insecticide seed treatments set to take effect on corn, soy, and grain crops in 2029, Erik has been heavily involved in Cornell's efforts to assess the threat that various insect pests pose to our field crops, and to identify viable alternative pest management strategies. Seed treatment trials are currently growing in 12 fields around our region this year (one intended trial could not be planted due to the wet spring weather), including a demonstration plot at SUNY Cobleskill, which will investigate and show how different cropping strategies affect seedcorn maggot pressure and damage.

Tapped by the state to conduct this research, Cornell researchers across upstate NY are busy tending to trial plots all summer long.

This project will help us understand the potential risks of not having insecticide seed treatments once the ban goes into effect. There are alternative chemistries to neonicotinoids, and our work will show whether those alternatives are viable if needed.

Erik will host a Field Day focused on this project on July 22nd at SUNY Cobleskill. This research will continue through 2027.

From left to right: Planting trial plots at SUNY Cobleskill; Heer Patel (CNYDLFC Program Aide) and Zach O'Donnell (intern from Colgate University) collect samples from the plots; germinated corn seed with a seedcorn maggot.

2025 Bovine Respiratory Disease Workshop – Madison County

Bovine Respiratory Diseases represent millions of dollars in losses due to mortality, morbidity, reduced performance, milk loss, and treatment costs across animals of all ages, from pre-weaned calves to adult dairy cows. This disease is complex due to the interaction between different pathogenic agents, such as viruses and bacteria, that can be primary infectors or primary and secondary infectors. It is essential to know what the different types of viruses are and the characteristics that can help us understand factors and how to prevent infection.

The CNYDLFC team organized a workshop for farmers to better understand the respiratory bovine disease complex, prevention and control as well as vaccination guidelines. This workshop was a collaboration between the CNYDLFC team, PRO-DAIRY, and Zoetis.

The event was attended by 10 people, farmers included, and the recording is available at: https://vod.video.cornell.edu/media/BRD+Workshop_Madison+County_Apr+2025/1_vfbj43jy

Corn Silage Dry Down Day - September 2025

Erik, Heer, and Raevyn participated in the regional Corn Silage Dry Down Day hosted by the CNYDLFC team. Producers brought corn samples from their fields, which were chopped and tested on-site for dry matter and starch content. Raevyn assisted with the testing process and farmer coordination, ensuring accurate results for each farm.

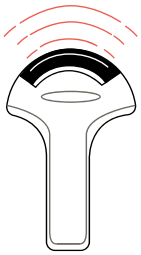
Educational materials were distributed explaining the importance of dry matter and starch in forage quality and the optimal percentages for harvest and storage. Producers learned how these measurements directly influence feed efficiency, silage fermentation, and herd performance, helping them make more informed harvest decisions.

Erik & Heer collecting and processing silage samples during Corn Dry Down Day, September 2025.

New York State Fair in Syracuse

Each year Ashley has been asked to organize the State Livestock judging competition at the state fairgrounds along with the Swine Educational contest. Over the two programs there were almost 200 participants.

Live Evaluation & Ultra Sounding for Carcass Data



Ashley has been participating in trainings to be able to be a certified ultrasound technician for carcass ultra sounding.

What is Ultra Sounding?

Ultrasound for carcass evaluation in live animals, often called real-time ultrasound, is a non-invasive, safe technology used primarily in livestock (cattle, pigs, and sheep) to estimate internal body composition traits that predict the quality and yield of the final carcass.

How Do We Scan?

The process is essentially the same as medical or pregnancy ultrasound:

1. A technician applies a water-based gel to a specific, shorn area on the animal's hide (typically between the 12th and 13th ribs for cattle).
2. A transducer (probe) emits high-frequency sound waves (generally 2 to 10 MHz) into the animal's body.
3. The sound waves travel through the tissues and reflect back to the transducer when they encounter boundaries between tissues of different densities (like the interface between hide, fat, and muscle).
4. The ultrasound machine processes these reflections in real-time to create a cross-sectional image on a monitor, allowing the technician to visualize the internal structures.
5. Measurements are taken directly from this image using the machine's software.

Traits Measured

Ultrasound provides valuable data that can be used to estimate retail yield and meat quality without having to slaughter the animal. Common traits measured in beef cattle, for example, include:

Backfat (BF) / Rib Fat (RF):

A measurement (in inches or millimeters) of the external fat thickness, which is a key factor in predicting the animal's yield grade (percent of closely trimmed retail cuts).

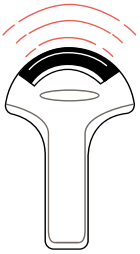
Ribeye Area (REA) / Longissimus Muscle Area (LMA):

A measurement (usually in square inches or \text{cm}^2) of the cross-section of the largest muscle in the back, giving an estimate of the animal's muscling or total lean product.

Intramuscular Fat (IMF) / Percent Intramuscular Fat (PIMF):

An objective estimate of the marbling (fat within the muscle), which is the primary factor determining the final meat's quality grade (e.g., USDA Select, Choice, or Prime).

Rump Fat (RF): An additional fat measurement taken over the rump to estimate overall external body fat more accurately.



Live Evaluation & Ultra Sounding Importance

The ability to accurately assess carcass traits in a live animal offers significant advantages for livestock producers and the industry.

Educational Opportunity

It provides a hands-on method for youth and producers to visualize and understand the internal composition of live animals. Non-Invasive: Because technology is harmless to the animal and the operator, it allows valuable data collection without requiring the animal to be processed.

Genetic Selection

It allows breeders to gather carcass data on young breeding stock (like bulls and heifers) before they are old enough to have progeny tested or are themselves harvested. This information is critical for calculating Expected Progeny Differences (EPDs) for carcass traits, which accelerates the rate of genetic improvement for meat quality and yield.

Management Decisions

Producers can use the data to sort feedlot animals into groups based on estimated finish and project their optimal time for harvest, helping to meet target carcass specifications.

IPM Strategies to Protect Corn and Soybean Seed in NYS - Schoharie County

Dr. Katja Poveda & Chloe Cho (Ph.D. Candidate) presenting their research at the SUNY Cobleskill plot.

In coordination with Cornell IPM and researchers from the Department of Entomology, Erik hosted a field day at SUNY Cobleskill to highlight the statewide research being conducted on neonicotinoid seed treatments. Two of Erik and Heer's research plots are located at SUNY Cobleskill, who generously provided meeting space and wagon rides between plots for more than 50 attendees.

SUNY Cobleskill's President Marion Terenzio and Provost Darcy Medica welcomed the attendees and shared some updates about the Institute for Rural Vitality before turning the event over to Erik and the researchers. In addition to learning more about the goals of the study, eligible attendees earned DEC pesticide applicator recertification credits and Certified Crop Advisor CEUs. The event was such a success, plans are in the works for a repeat field day in 2026.

Dr. Alejandro Calixto (Director of Cornell Integrated Pest Management) Presenting on neonicotinoids at SUNY Cobleskill's Champlin Hall.

Seedcorn Maggot Population Dynamics and Seed Treatment Efficacy

With the ban of neonicotinoid insecticide seed treatments set to take effect on corn, soy, and grain crops in 2029, Erik and Heer have been heavily involved in Cornell's efforts to assess the threat that various insect pests pose to our field crops, and to identify viable alternative pest management strategies. Seed treatment trials were conducted in 12 fields around our region this year, including a demonstration plot at SUNY Cobleskill, which will investigate and show how different cropping strategies affect seedcorn maggot pressure and damage. Yield data was collected this fall from September through December, and results will be shared at this winter's CNY Corn and Soybean Day crop congress.

and the Cornell Cooperative Extension Associations of Chenango, Fulton, Herkimer, Madison, Montgomery, Otsego, Saratoga and Schoharie Counties.

Yield data collection during harvest for the neonicotinoid project.

Farm Business Management Retreat – October 2025

Raevyn attended the Farm Business Management Retreat, where regional specialists, state faculty, and Extension educators collaborated on advancing business management programming and education across New York State. The retreat focused on producer education in cost control, benchmarking, and risk management. Raevyn participated in breakout sessions on financial planning tools and program evaluation, gaining insights that will enhance future programming for Central New York producers.

Farmer Engagement and Outreach

Since joining the team in, Raevyn conducted one-on-one consultations with multiple producers across Central New York to support farm management decision-making. Discussions focused on identifying funding opportunities for farm expansion projects and capital improvements, as well as determining land rental rates for their region. Conversations around land rentals included reviewing when the land was last used for production, analyzing current property tax rates on a per-acre basis, and discussing recent appraisals to establish equitable values. Raevyn also guided producers through considerations such as insurance coverage and developing clear lease agreements that protect both landowners and tenants. These meetings helped producers make informed financial and legal decisions while strengthening their understanding of farmland valuation and long-term access strategies.

Farm Business Management Outreach & Winter Planning Support

Raevyn focused on farm business management outreach and one-on-one technical assistance as producers transitioned into winter planning and financial decision-making. Efforts emphasized supporting farmers as they evaluated profitability, managed risk following the growing season, and prepared for upcoming production and investment decisions. Her efforts also included planning and coordination for winter educational programming relevant to farm business management.

Farmer Consultations & Technical Assistance

- Raevyn fielded multiple calls and emails from farmers seeking one on one assistance with farm financial planning and general business management considerations.
- In response to a difficult growing season, Raevyn received questions regarding product pricing, cost-of-production calculations, and break-even analysis to support profitability decisions.
- Assisted farmers with questions related to farm loan options and capital access, connecting producers with appropriate lending resources.

Program Support & Resource Development

- Collaborated with Extension colleagues across counties to provide farm business management support for local producers and respond to referrals.
- Began developing and refining farm financial tools and worksheets (e.g., pricing, budgeting, and cost of production calculators).
- Participated in internal meetings and professional development activities to strengthen farm business management capacity and regional coordination.

Vegetable and Cover Crop Management at Common Thread Farm

Erik, Heer, and Raevyn participated in a field day at Common Thread Farm in Madison, coordinated by educators from CCE Madison. Led by farm owner Asher Burkhart-Spiegel, the farm tour focused on cover crop management, pest issues, soil health, irrigation, and farm equipment. Most attendees were from local Plain communities, and it was a very educational event and a great opportunity to make new connections.

Dairy Technology Farm Tour

The Team co-hosted a farm tour with Cornell PRO-DAIRY at Indian Camp Dairy on the Madison-Chenango border. The tour highlighted the farm's recent technology improvements, including a new barn with robotic milkers and a new manure aeration system. More than 50 attendees were on hand for a very cold, windy day, but were delighted to learn more about these popular technologies that are becoming more and more popular throughout our region.

So you Bought the Farm

The CNYDLFC team partnered with CCE Herkimer to hold a two-day training for new and aspiring farm owners. Topics included soil health, farm business management, pest management, beekeeping, livestock production, marketing, value-added products, and crop production. This was a virtual event that featured multiple breakout rooms for attendees to choose from.

Other Educational Activities in 2025

- The team measured alfalfa crops at more than 50 field sites as part of their annual First Cutting Forage Quality program.
- Funding and Program Development: Worked to identify and pursue new funding opportunities to support regional programming and producer education. This included contributing to grant proposal development aimed at strengthening farm business management, workforce training, and risk management resources across the eight-county region. (Saunders)
- Individual assistance, questions and issues centered on dairy alternatives, livestock grazing opportunities, and overall, the livestock industry (McFarland)
- Assisted with port supply plans if/when ASF (African Swine Fever) hits the U.S. (McFarland)
- Participated and helped organize speakers for the Veteran Affair Annual Conference with almost 400 attendees between multiple locations. (McFarland)
- Completed work on their grant-funded project investigating forage quality and finishing metrics in beef. (McFarland & Smith)
- Guest lecturer at SUNY Cobleskill, speaking to students about growing small grains in NY. (Smith)
- Began his annual corn pest pheromone trap program at 5 farms around the region. (Smith)
- Erik is collaborating with Cornell IPM on a corn leafhopper trapping program. This insect transmits a bacterial plant pathogen that causes corn stunt disease, first detected in NY in 2024. (Smith)
- Collaborated with Crystal Stewart-Courtens to hold a Field Crop and Vegetable Farm Walk at a plain community farm in Fort Plain. (Smith)
- Taught Weed ID and Management to the Herkimer-Otsego-Schoharie Master Gardeners. (Smith)
- Erik and Heer taught soil science to the Hamilton Central School Ag in the Classroom middle schoolers. (Smith & Patel)
- Collected soil samples for a state-wide soybean cyst nematode survey led by USDA-ARS. (Patel)
- Collected soil samples for a state-wide soil survey aimed at accurately converting soil analysis results between major soil analysis labs and technologies. (Patel)
- Conducted weekly monitoring of corn pest pheromone traps throughout the region. (Patel)
- Worked with Colgate intern, Zach O'Donnell, to monitor 36 alfalfa fields around the region for potato leafhoppers, sharing economic threshold data with farmers as needed. (Patel)
- Organized a 7 week webinar series from January -March about dairy welfare and longevity. (Gonzalez)
- Provided training on milk quality and milking routines in different dairy farms. (Gonzalez)
- Held a presentation about new research on colostrum with Dr. Melissa Cantor from Penn State University, 21 producers attended. (Gonzalez)
- Presented a module on "Ag Supervisory Leadership certificate" in Spanish. (Gonzalez)
- Completed Agricultural Supervisory Leadership course. (Gonzalez)
- Provided training on milk quality and milking routines on different dairy farms. (Gonzalez)
- Recorded an episode of monthly podcast with regional Dairy Specialists statewide. (Gonzalez)
- Participated in recording a monthly podcast episode with regional Dairy Specialists from across New York State. (Gonzalez)
- Attended BRD Conference for the Northeastern Highlander Association. (Gonzalez)
- Assisted at the Birthing Center during the NY State Fair. (Gonzalez)
- Held forage and herb inventory meetings. (Gonzalez)
- Organized a Bovine Respiratory Complex Disease workshop. (Gonzalez)
- Completed reproduction evaluation and assessments for different dairies. (Gonzalez)
- Attended Dairy Cattle Welfare Council Symposium. (Gonzalez)
- Provided training on milk quality and milking routines in different dairy farms. (Gonzalez)
- Participated in a monthly podcast with regional specialists statewide. (Gonzalez)

On the Agenda for 2026

- Dairy Day will be held in Hamilton on January 14.
- Erik will plan the 2026 CNY Corn and Soybean Day crop congress, to be held January 20 and 21 in Hamilton and Ballston Spa, respectively.
- Ashley will host biweekly Swine Co- Hort Series starting January through July.
- With Maryellen Sheehan of CCE Madison Co, Erik and Heer will hold DEC Pesticide Applicator license exam trainings at CCE offices around the region in February.
- Erik and Heer will complete FAA drone pilot licensing in order to support the Neonic project for the upcoming field season.
- Raevyn will support and deliver winter educational programming focused on farm profitability, labor, and farm business management.
- From Dry to Fresh -- Setting Up Cows for Success will be held on March 16.
- Ashley will host a Fencing 101 Workshop on May 2nd.
- The Meat Conference – Pro-Livestock will be held on July 17 and 18 at SUNY Cobleskill.
- Erik will host farm walks with Plain communities (July).
- Erik will host a Field Day at SUNY Cobleskill again, focused on the neonicotinoid seed treatment research he and other regional teams and Cornell IPM are conducting around the state.
- Raevyn will continue expanding one-on-one farm business management consultations with producers across the region.
- Raevyn will further develop and deploy farm financial decision-making tools for use in workshops and individual consultations.
- The team will once again measure alfalfa crops at more than 50 field sites as a part of their annual First Cutting Forage Quality program.

Ashley McFarland, PAS

Area Livestock Specialist
Phone: 315-604-2156
Email: am2876@cornell.edu

Raevyn Saunders, MS

Area Farm Business Management Specialist
Phone: 680-316-2357
Email: res422@cornell.edu

Erik Smith, Ph.D.

Team Leader
Area Field Crops Specialist
Phone: 315-219-7786
Email: eas56@cornell.edu

Website: cnydfc.cce.cornell.edu
Facebook Page: facebook.com/cnydlfc
Join our E-mail list: http://eepurl.com/hh3vBj