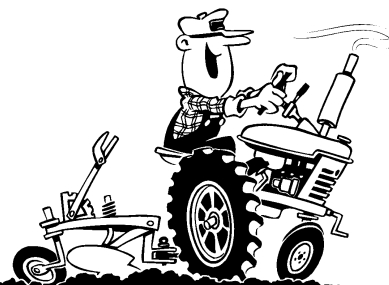


Cultivating Cumberland

November - 2019 VOL. 24, ISSUE 11



Inside this issue:

Purchasing Pesticide Manuals Online	1
The Center for Produce Safety Awards 11 New Research Projects	2
2019 RFP Grant Recipients	3
Gramoxone/paraquat Mandatory Training Required Before Use	4
2020 Nursery Meeting Save the Date	5
Northeast SARE Seeks Farmer Grant Applications	5
2019 High Tunnel Production Guide for Raspberries & Blackberries	5
New Rutgers Fact Sheet	5
FSMA Trainings	6
Calendar of Important Events	7-9
Cultivating Cumberland Newsletter Subscription Renewal	10

Purchasing Pesticide Manuals Online

Visit <https://ce-catalog.rutgers.edu/checkoutsigin.cfm>

1. Create an account
2. Sign in
3. Click on "Products" on the left hand side
4. Click the manual you need
5. Select if your tax exempt or if you will pay sales tax
6. Click "Add to Cart"
7. Click "Checkout"
8. You will enter your tax exempt number or type "N/A" if you are not tax exempt. Click "Next"
9. Check the box "General Refund Policy" after you have read the terms and conditions
10. Click "Place Order"
11. Review your cart and click "Continue"
12. Click on how you would like to pay: "Pay with Bank Account" or "Pay with Card"
13. Enter your payment information

Purchase manuals in our office or purchase pesticide manuals online through Rutgers and have them shipped to you. Orders will be fulfilled Wednesday and ship on Thursday of each week. Shipping UPS 2nd Day.

Please note, manuals can still be purchased in our office.

The Center for Produce Safety Awards 11 New Research Projects

Woodland, CA, October 3, 2019—The Center for Produce Safety (CPS) announced today 11 new research awards valued at a little over \$2.7 million. The awards are for research projects directed at answering critical questions in specific areas of food safety practices. Among this year's topics - *Cyclospora* prevalence, *Listeria* intervention, and new technologies.

"If you take a step back and look at the Center for Produce Safety's latest grant recipients, their project topics address the most pressing relevant produce food safety issues. Right now you hear a lot about *Cyclospora* causing issues with fresh produce, or about how transference of pathogens in water is initiating problems in general in our industry," said Dave Corsi, Vice President of Produce and Floral at Wegmans Food Markets, and Chair for the CPS Board of Directors. "We congratulate the 2019 award recipients and feel encouraged by their focus on addressing these relevant issues. Fund the Science is the main thrust behind CPS' mission, which will eventually assist the funded scientists to Find Solutions to food safety issues and then, finally, to Fuel Change in all parts of the supply chain."

Xiangyu Deng, PhD, University of Georgia, is aiming high with his funded research project, *Possibility, duration, and molecular predictors of sanitizer tolerance in Listeria monocytogenes*. "Through this project we want to help settle the debate on whether *Listeria monocytogenes* develops tolerance to common sanitizers," stated Deng. "We will further explore if such tolerance is relevant to sanitizing practices in the produce industry by studying its possibility, duration, and genetic predictors."

Paul Dawson, PhD, Clemson University, is a first-time award recipient for his project, *Verification and validation of environmental monitoring programs for biofilm control in the packing house*. Dr. Dawson is focusing on *Listeria monocytogenes* as a pathogen of concern for his project. "In this project we will collect data from the quantification and modelling of *L. monocytogenes* and the resident microbial community biofilms on surfaces like those found in the packing house. Based on the results, we aim to build a user-friendly model, such as an Excel Add-in, that will predict biofilm growth rates and ultimately optimal environmental sampling time and sanitation intervals for the packing industry."

The awards were made possible by funds provided by the Center for Produce Safety's Campaign Contributors, the Specialty Crop Block Grant programs in California Department of Food and Agriculture, Washington State Department of Agriculture, Florida Department of Agriculture and Consumer Services, and Texas Department of Agriculture.

2019 RFP Grant Recipients—All projects will begin January 2020

Ana Allende, PhD, Centro de Edafología y Biología Aplicada del Segura (CEBAS) - CSIC

Produce surface treatments based on bacteriophages and bacteriocin-producing cultures to consistently reduce 2-log of *Listeria monocytogenes* on leafy greens and pre-cut fruit and vegetables

Paul Dawson, PhD, Clemson University

Verification and validation of environmental monitoring programs for biofilm control in the packing house

Xiangyu Deng, PhD, University of Georgia

Possibility, duration, and molecular predictors of sanitizer tolerance in *Listeria monocytogenes*

Laurel Dunn, PhD, University of Georgia

Environmental microbial risks associated with vented produce in distribution centers

Alexander Fridman, PhD, Drexel University

Post-harvest fresh produce wash water disinfection by submerged cold plasma non-chemical continuous treatment system

Kalmia Kniel, PhD, University of Delaware

Analysis of the presence of *Cyclospora* in waters of the Mid-Atlantic states and evaluation of removal and inactivation by filtration

Mia Mattioli, PhD, Centers for Disease Control and Prevention

Sources and prevalence of *Cyclospora cayentanensis* in Southeastern US irrigation water sources and growing environments

Ynés Ortega, PhD, University of Georgia

The prevalence of *Cyclospora* in water and produce

Gloria Sánchez Moragas, PhD, Instituto de Agroquímica y Tecnología de Alimentos - CSIC

Occurrence and accumulation of potentially infectious viruses in process water and impact of water disinfection practices to minimize viral cross-contamination

Martin Wiedmann, PhD, Cornell University

Factors affecting persistence of *Listeria monocytogenes* need to be identified for evaluation and prioritization of interventions

Martin Wiedmann, PhD, Cornell University

Listeria develops reduced sanitizer sensitivity but not resistance at recommended sanitizer use levels

Rutgers Cooperative Extension Plant and Pest Advisory

Gramoxone/paraquat Mandatory Training Required Before Use

October 10th, 2019 Thierry Besancon



All pesticide certified applicators must successfully complete an EPA-approved training program before mixing, loading, and/or applying paraquat.

Anyone using Gramoxone, Firestorm, Helmquat, Parazone, and other paraquat products must complete an EPA-mandated training before application.

After November 14, 2019, the EPA requires companies to have newly labeled products on the market.

The following are items related to the new label for paraquat products:

- Only certified applicators, who successfully completed the paraquat-specific training, can mix, load or apply paraquat.
- No longer allow application “under the direct supervision” of a certified applicator.
- Restricting the use of all paraquat products to certified applicators only.
- EPA required Online Training – users must create an account with username and password.
- A certificate will be delivered by the end of the training after successful completion of the online exam.
- Applicators must repeat training every three years.

For additional information and FAQs about the paraquat training go to the EPA Paraquat Training website

Visit <https://www.epa.gov/pesticide-worker-safety/paraquat-dichloride-training-certified-applicators>

How to Register for the Online Course

1. Visit <https://campus.extension.org/course/view.php?id=1660>
2. Create an account or login
3. After reading the introduction in the first section, click “How To Safely Use and Handle Paraquat-Containing Products” in the “Watch this Course” section
4. After watching the course, click “Final Assessment” under the “Take the Final Assessment” section
5. After you have completed the assessment, your certificate will be available to print under the “Print your Certificate” section

*Save the Date***2020 South Jersey Nursery Meeting****Rutgers Cooperative Extension of Cumberland County****March 12th, 2019****9 AM – 4 PM**

Pesticide credits requested for: CORE, PP2, 1A, 3A, and 10

Meet the New Rutgers Extension Agents working with the nursery industry:

Tim Waller (Cumberland) and Bill Errickson (Monmouth)

Educational presentations on spotted lantern fly, pesticide safety and regulations, irrigation scheduling, weeds, and pathogens.

Northeast SARE Seeks Farmer Grant Applications**Due 5 p.m. ET on December 3, 2019**

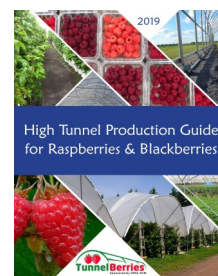
The Northeast Sustainable Agriculture Research and Education (SARE) Program has released the call for applications for 2020 Farmer Grant projects. Proposals are due online by 5 p.m. ET on Tuesday, December 3, 2019.

Farmer Grants provide research funds for commercial farms to explore new ideas in almost any aspect of production, marketing and other topics that influence successful farming in the region. Application materials, including detailed instructions and supporting documents, are posted on the Northeast SARE website at www.northeastsare.org/FarmerGrant

2019 High Tunnel Production Guide for Raspberries & Blackberries

The new "High Tunnel Production Guide for Raspberries & Blackberries" is now available for download at <https://www.tunnelberries.org/>

Helpful information on site selection, preparation, water quality, tunnel orientation, tunnel selection, tunnel sizing, tunnel construction, production systems, planting, plant selection, tunnel management, pest management considerations, harvesting fruit, and construction budgets.

**New Rutgers Fact Sheet**

The following new fact sheets are now available from Rutgers:

E359 Think Twice, Plant Once: Does a Tree Fruit Orchard Make Sense for Your Farm?

Muehlbauer, M., Gohil, H., and Polanin, N.

<https://njaes.rutgers.edu/e359>



TRAININGS

*on-farm food
safety team*

Food Safety Modernization Act (FSMA): Produce Safety Alliance Grower Training and Third Party Audits

December 9 & 10, 2019

PITTSTOWN, NJ

December 17 & 18, 2019

MILLVILLE, NJ

January 7 & 8, 2020

EWING, NJ

February 6, 2020

ATLANTIC CITY, NJ

March 3 & 4, 2020

MILLVILLE, NJ

March 18, 2020

CHATSWORTH, NJ

FSMA Produce Rule Training is required by the FDA on all farms that aren't exempt or qualified exempt. For more information on FSMA visit our website at onfarmfoodsafety.rutgers.edu
9 AM - 4 PM - Lunch Provided - \$50 Day 1 - \$25 Day 2

REGISTRATION AND MORE DETAILS

[HTTPS://RUTGERSONFARMFOODSAFETY.EVENTBRITE.COM](https://rutgersonfarmfoodsafety.eventbrite.com)

IF YOU ARE UNABLE TO REGISTER ONLINE CALL BRANDI

AT (856) 451-2800 X 1 OR EMAIL AT BRANDIWI@CO.CUMBERLAND.NJ.US

Sponsored by The New Jersey Department of Agriculture (#5U18FD005877-020) and The National Association of State Departments of Agriculture (#5U01FD005334-04) *Funding for this program was made possible, in part, by the Food and Drug Administration through grant PAR-16-137. The views expressed in written materials or publications and by speakers and moderators do not necessarily reflect the official policies of the Department of Health and Human Services;

Calendar of Important Events

✓ Indicates a newly added event since the last calendar

✓ **November 11**

Chambourcin; Sharrott Winery, 370 S Egg Harbor Rd., Hammonton, NJ; 1:00 PM—4:00 PM; Participants are invited to bring their own wine release. Each wine tasting will be followed by discussions on harvest parameters, clones, fermentation materials and techniques, etc. Pre-Registration Required. \$20 Registration for each workshop. Light lunch will be served. Space is limited. RSVP to Joan Medany at jmedany@co.gloucester.nj.us or 856-224-8030; Checks made payable to Rutgers, the State University of New Jersey. Organized by Hermant Gohil, Gloucester County Agricultural Agent and NJ Center for Wine and Research Education

November 13-14

Sensory Evaluation; Cook Student Center, 59 Biel Road, New Brunswick, NJ 08901; 8:30 A.M. – 4:30 P.M.; \$995 before October 30 or \$1025 after; Breakfast and lunch included; Build your sensory evaluation skills and develop a greater understanding of the science behind food aroma, taste, color, and texture in this 2-day class; For more information or to register online go to <http://www.cpe.rutgers.edu/courses/current/lf0606ca.html>

✓ **November 14**

2019 Evening of Science & Celebration; Cook Student Center, 59 Biel Road, New Brunswick, NJ 08901; Buffet dinner, 4-H round-up team presentations, keynote presentation, gold medal horse farm award, equine science center presentations, spirit of the horse award, and so much more; \$15 for students or \$35 for adults; For more information

✓ **November 15**

Strawberry Growers School; Berks County Ag Center 1238 County Welfare Rd., Leesport, Pennsylvania, 19533;(8:00 AM - 4:00 PM); The Strawberry Growers School is an all-day workshop for both current and prospective strawberry growers eager to learn more about producing a healthy and profitable crop. Experts from Pennsylvania and Maryland will educate attendees on all aspects of strawberry production. Register by November 13th at <https://extension.psu.edu/strawberry-growers-school>

✓ **November 19-21**

2019 Mid-Atlantic Crop Management School; Princess Royale in Ocean City, MD; The school offers a 2 1/2 day format with a variety of breakout sessions. Individuals needing training in soil and water, nutrient management, crop management and pest management can create their own schedule by choosing 5 program options offered each hour. Registration and program details are online at <https://app.certain.com/profile/form/index.cfm?PKformID=0x3034320abcd>

November 25

Cabernet Franc; Unionville Vineyards New Jersey, 9 Rocktown Rd., Ringoes, NJ; 1:00—4:00 PM; Participants are invited to bring their own wine release. Each wine tasting will be followed by discussions on harvest parameters, clones, fermentation materials and techniques, etc. Pre-Registration Required.

\$20 Registration for each workshop. Light lunch will be served. Space is limited. RSVP to Joan Medany at jmedany@co.gloucester.nj.us or 856-224-8030; Checks made payable to Rutgers, the State University of New Jersey. Organized by Hermant Gohil, Gloucester County Agricultural Agent and NJ Center for Wine and Research Education

✓ **December 5**

NJNLA Annual Awards Dinner; Hold the date and mark your calendars. More information to follow. Go to njnla.org or contact Jeanne Ondusko at 609-291-7070

December 4

Ecological Evaluation; Rutgers Continuing Education at The Atrium, Suite 101, Room 114 Red Oak North, 300 Atrium Drive, Somerset, NJ 08873; The NJDEP's Ecological Evaluation Technical Guidance document and its revisions provide details on how to conduct an Ecological Evaluation (EE) and an Ecological Risk Assessment (ERA) for environmentally sensitive natural resources (ESNR) that may be impacted by contaminated sites. For more information or to sign up go to www.cpe.rutgers.edu/environmental

December 10

Regulatory Training in Underground Storage Tanks; Cook Student Center, Multipurpose Room A, B, C, 59 Biel Rd, New Brunswick, NJ 08901; The NJ Department of Environmental Protection (NJDEP) regulates Underground Storage Tanks (USTs) and requires the professionals who work on them to be trained, certified/recertified every three (3) years.; For more information or to sign up go to www.cpe.rutgers.edu/environmental

✓ **December 10-12**

44th Green Expo Turf & Landscape Conference; The Borgata Hotel, 1 Borgata Way, Atlantic City, NJ; Early registration until November 11, all three days for \$245 for members or \$360 for non-members; See the latest in turf and landscape for your business, for your environment, and for your technology; Register online at www.njturfgrass.org

December 17-18

Food Safety Modernization Act (FSMA): Produce Safety Alliance Grower Training and GAP Audits; Rutgers Cooperative Extension of Cumberland County; 291 Morton Avenue, Millville, NJ 08332; 9 A.M.— 4 P.M.; Lunch included; Day 1 is \$50 and Day 2 (optional) is \$25; This training meets the FDA requirements for the FSMA Produce Rule Training; Find more information or register online at <https://FSMAdec17.eventbrite.com> Call Brandi or Katie with questions 856-451-2800 ext 1

January 8-10, 2020

MANTS 2020; (Mid-Atlantic Nursery Trade Show). Baltimore Convention Center, One West Pratt Street, Baltimore, MD. Contact: MANTS, PO Box 818, Brooklandville, MD 21022; 800.431.0066; Fax, 410.296.8288; email, info@mants.com; www.mants.com

✓ **January 10, 2020**

29th Annual Rutgers Turfgrass Symposium; Center for Turfgrass Science, Room 138A Foran Hall, 59 Dudley Road, New Brunswick, NJ 08901; 9:00 AM—4:00 PM; Oral presentations by Dr. Carolyn Young, Noble Research Institute; The complete agenda and registration can be found at www.turf.rutgers.edu.

Pre-registration recommended by 12/13/19

✓ **January 9-12, 2020**

Southeast Regional Fruit and Vegetable Conference; Savannah International Trade and Convention Center,

1 International Dr, Savannah, GA 31421; Networking Opportunities, Industry Tradeshow, 85+ hours of Production Education, Fun Events and Activities, Commodity Business Meetings, Award Presentations, and a lot more!; Early Bird Registration ends 12/9, \$170 for all four days. \$210 after 12/9; Register online at www.seregionalconference.org

✓ **January 9-11, 2020**

Global Organic Produce Expo; Fontainebleau Luxury Hotel, Miami Beach, FL; Keynote Speaker, Antoni Porowski, Food and Wine connoisseur of Netflix Original—Queer Eye; Networking, innovations, solutions, powerful content, learn insights; Full Registration for Suppliers, Growers, Packers, Shippers \$1,295; Register online at <https://globalorganicexpo.com/>

January 13, 2020

2020 Becker Forum; Marriott Syracuse Downtown; Syracuse, NY; The New York State Vegetable Growers Association is hosting the 2020 Becker Forum on January 30, 2020 at the Marriott Syracuse Downtown.

January 14-16, 2020

Empire State Producers Expo; The Oncenter Civic Center Theaters, 800 S. State St., Syracuse Tue.; 8am-5pm; Wed. 8am-5pm; Thurs. 8am –2pm For Exhibitors Information; Please Contact: Lee Trade Shows 800 -218-5586 or dwren@leepub.com

January 17-19, 2020

Northeast Organic Farming & Gardening Conference; The Oncenter Civic Center Theaters, 800 S. State St., Syracuse, NY; Save the date; More information coming this fall

✓ **January 17-19, 2020**

North Jersey Orchid Society; Douglass Student Center, Rutgers University, 100 George Street, New Brunswick, NJ; 10:00 AM—4:00 PM; Free admission and free parking, breathtaking orchid displays, world-renown vendors, orchid workshops and education, “Ask the Orchid Doctor”; Visit njorchids.org for more information or to register

✓ **February 12-13, 2020**

Women in Ag Conference 2020; Dover Downs Hotel & Casino, Dover, DE; The full conference agenda and additional details will soon be available at <https://extension.umd.edu/womeninag/annual-conference/2020-conference>

✓ **February 26 & 27, 2020**

Delmarva Soil Summit; Delaware Technical Community College, Georgetown, DE; Join fellow farmers, researchers, and other experts to learn about the latest innovations in soil health and fertility. Learn more and sign up at DelmarvaSoilSummit.com

Upcoming Cultivating Cumberland Subscription Renewal

If you wish to continue receiving “Cultivating Cumberland” and other educational mailings from our office, now is the time to renew your subscription.

If you are not already receiving the newsletter via email, please consider doing so. The email comes with all the same information and in full color. If you are already receiving the newsletter via email, thank you for helping us go green.

Reactivation forms (for mailed newsletters only) are due back to our office no later than February 14th, 2020. We will begin using the updated mailing list for the March 2020 issue.

You can reactivate your subscription to “Cultivating Cumberland” in one of the following ways:

- Call Katie at 856-451-2800 x1
- Email: KatieSi@co.cumberland.nj.us
- Fax this form back to 856-451-4206
- Return this form by mail to
ATTN: Katie Silvers, Agriculture Department, 291 Morton Ave, Millville, NJ 08332

Don't miss out on all the up-to-date information. Be sure to renew your subscription to “Cultivating Cumberland” by February 14th. If you have any questions, please feel free to contact Brandi or Katie at

Cultivating Cumberland Mailed Subscription Renewal

Name: _____ Farm Name: _____

Address: _____

City: _____ State: _____ Zip: _____

Phone: _____ Cell: _____ Fax: _____

Email Address: _____

Please circle an option: I prefer my newsletter Mailed Emailed

Check all options that apply below:

My Business Affiliation	Ornamentals	Vegetables	Other
<input type="radio"/> Commercial Farmer	<input type="radio"/> Nursery	<input type="radio"/> Fresh Vegetables	<input type="radio"/> Small Fruit
<input type="radio"/> Ag-Related Business	<input type="radio"/> Turf	<input type="radio"/> Processing Vegetables	<input type="radio"/> Tree Fruit
<input type="radio"/> Private Consultant	<input type="radio"/> Landscape	<input type="radio"/> Herbs	<input type="radio"/> Hay Production
<input type="radio"/> Agricultural Agent	<input type="radio"/> Greenhouse	<input type="radio"/> Specialty Crops	<input type="radio"/> Other Field Crops
<input type="radio"/> Rutgers	<input type="radio"/> Christmas Tree	<input type="radio"/> Farm Market	<input type="radio"/> Livestock
<input type="radio"/> Other University/College	<input type="radio"/> Golf Course	<input type="radio"/> Pick Your Own	
<input type="radio"/> Government Agency			
<input type="radio"/> Media			
<input type="radio"/> Food Safety			

REGULARLY SCHEDULED MEETINGS

✓ Indicates meeting will be held at RCE of Cumberland County

Extension Education Bldg., 291 Morton Ave, Rosenhayn, NJ (Between Carmel and Rosenhayn)

<p>✓</p> <p>Cumberland County Pesticide Certification Exam Schedule</p> <p>291 Morton Avenue Millville, NJ 08332 (Between Rosenhayn & Carmel)</p> <p><u>2020</u></p> <p>Jan 22 Feb 12 Mar 18 Apr 15 May 20 Jun 17 Aug 26 Sep 23 Oct 21 Dec 16</p> <p>To Register call 609-984-6614 Information call 856-451-2800</p>	<p>Cumberland County Agriculture Development Board</p> <p>County Administration Bldg. Freeholder Room 164 W. Broad Street Bridgeton, NJ 08332</p> <p><u>2019</u></p> <p>Nov 12 Dec 10</p> <p>Reg. Meetings start at 7 p.m. Information call 856-453-2211</p>	<p>✓</p> <p>Cumberland County Board Of Agriculture</p> <p>291 Morton Avenue Millville, NJ 08332 (Between Rosenhayn & Carmel)</p> <p><u>2019</u></p> <p>Nov 21 Dec 19</p> <p>Meetings start at 7 p.m. Information call Lew DePietro, President at 856-981-9843</p>
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The program in Cumberland County is suspended until further notice.

Cumberland County Improvement Authority (CCIA)

Pesticide Container Recycling

9:00 a.m. to 12 Noon

Cumberland County Solid Waste Complex

169 Jesse's Bridge Rd. (located off Route 55 Exit 29)

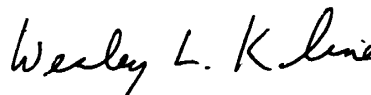
Deerfield Township, New Jersey

Questions? Call Division of Ag & Natural Resources, NJ Dept. of Ag 609-292-2242

Sincerely,



Salvatore S. Mangiafico, Ph.D.
County Agent II/Associate Professor
Environmental & Resource Management
Email: Mangiafico@njaes.rutgers.edu



Wesley L. Kline, Ph.D.
County Agent II/Associate Professor
Vegetable & Herb Production
Email: wkline@njaes.rutgers.edu

Pesticide User Responsibility: Use pesticides safely and follow instructions on labels. The user is responsible for the proper use of pesticides, residues on crops, storage and disposal, as well as damages caused by drift.

Use of Trade Names: Trade names are used in this publication with the understanding that no discrimination is intended and no endorsement is implied. In some instances the compound may be sold under different trade names, which may vary as to label.

Have you visited the Cumberland County website for the
Present and/or past issues of "Cultivating Cumberland"? It's a great
resource for information and dates...
<http://Cumberland.njaes.rutgers.edu/>

Public Notification and Non-discrimination Statement

Rutgers Cooperative Extension is an equal opportunity program provider and employer. Contact your local Extension Office for information regarding special needs or accommodations. Contact the State Extension Director's Office if you have concerns related to discrimination, 848-932-3584.

Cooperative Extension of Cumberland County



1915-2019

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Experiment Station