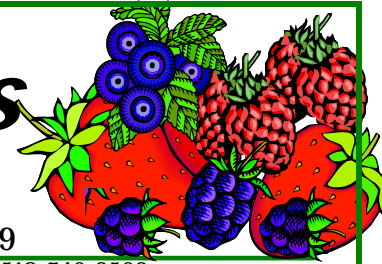




New York Berry News

CORNELL UNIVERSITY



Volume 08, Number 11

November 12, 2009

What's Inside

1. Currant Events

- a. Introduction to Commercial Berry Growing for New Growers, December 14th, Belmont, NY
 - b. 2010 EXPO Berry Program
 - c. Getting Started in High Tunnels in NNY CONFERENCE Set for December 12th in Watertown
 - d. Agriculture Secretary Vilsack Launches National Institute of Food and Agriculture, Announces Vision for Science and Research at USDA
 - e. 2009 NASGA Annual Meeting and Conference – Final Program
 - f. Why Rye Cover Crops Are Great Natural Weed Killers
 - g. Agriculture Deputy Secretary Merrigan Announces \$49 Million in Grants under the Specialty Crop Block Grant Program
 - h. Commissioner Awards Federal Funds For Buy Local Advertising
 - i. LSU AgCenter Receives \$518,000 to Develop Blueberry Web Site
 - j. Predicting Impacts from Climate Variations
 - k. Discussion Continues on the Possible Establishment of an International Blueberry Organization
 - l. Don't Mulch Your Strawberries Prematurely
 - m. That's A Berry Good Question!
- ### 2. Strawberry Anthracnose Crown Rot – Kathy Demchak
- ### 3. Your Farm Image: What Makes a Good website? – Simon Huntley
- ### 4. Primocane-fruited Blackberries - Research Briefs – Cathy Heidenreich
- ### 5. Weather Report - Last of the Season!

CURRENT EVENTS

November 18, 2009. NE IPM Berry Webcast Series #5: Blueberry/Cranberry Disease Management: blueberry viruses, cranberry diseases. More information: Laura

McDermott, lgm4@cornell.edu, 518-746-2562, or go to: <http://www.fruit.cornell.edu/Berries/webinarindex.htm>.

December 2, 2009. NE IPM Berry Webcast Series #5: Blueberry/Cranberry production: site prep and fertility; blueberry pollination challenges. More information: Laura McDermott, lgm4@cornell.edu, 518-746-2562, or go to: <http://www.fruit.cornell.edu/Berries/webinarindex.htm>.

Dec. 7, 2009. NASGA Annual meeting as part of the Great Lakes Fruit Vegetable and Farm Market Expo. DeVos Place Convention Center, Grand Rapids, MI. More information: <http://www.nasga.org/>.

Dec. 8-10, 2009. Great Lakes Fruit Vegetable and Farm Market Expo. DeVos Place Convention Center, Grand Rapids, MI. For more information www.gleexpo.com.

December 9, 2009. NE IPM Berry Webcast Series #5: Blueberry/Cranberry Insect Management: winter moth, Japanese beetle. More information: Laura McDermott, lgm4@cornell.edu, 518-746-2562, or go to: <http://www.fruit.cornell.edu/Berries/webinarindex.htm>.

January 25-27, 2010. Empire State Fruit and Vegetable EXPO/NYS Farmer's Direct Marketing Association Annual Conference. OnCenter, Syracuse, NY. Mark your calendars – berry session Wednesday January 27th.

February 2-4, 2010. Mid-Atlantic Fruit and Vegetable Convention, Hershey Lodge, Hershey, PA. For more information visit <http://www.mafvc.org/html/>.

Feb 5-12, 2010. North American Farmers Direct Market Association 25th Anniversary Convention, Lancaster PA. More information to follow.

February 24-26, 2010. North American Raspberry & Blackberry Conference, Monterey, California, preceded by preconference tour. More information: <http://www.raspberrylblackberry.com/>.

June 22-26, 2011. 10th International Rubus and Ribes Symposium, Zlatibor, Serbia. For more information contact: Prof. Dr. Mihailo Nikolic, Faculty of Agriculture, University of Belgr, Belgrade, Serbia. Phone: (381)63 801 99 23. Or contact Brankica Tanovic, Pesticide & Environment Research Inst., Belgrade, Serbia. Phone: (381) 11-31-61-773.



Introduction to Commercial Berry Growing for New Growers

Monday, December 14th, 2009

9:00 am - 12:00 pm

Cornell Cooperative Extension Allegany & Cattaraugus Counties
5435A County Road 48, Belmont NY 14813



Cathy Heidenreich, Cornell Berry Extension Support Specialist Department of Horticulture, College of Agriculture and Life Sciences, Cornell University will present this three hour workshop to help potential berry growers understand the principles of **start-up costs, marketing, site selection, preparation and layout**, selecting and planting the right **cultivars, crop production and management** as well as considering the **labor expense and profitability** of becoming a berry producer. Strawberries, brambles, blueberries, currants and gooseberries will be included in the discussions.

Cathy will also touch on the important aspects of **nutrient management, weed, insect and disease control, trellising** of crops, **irrigation** options and she will answer questions from participants. This is the perfect venue to help you decide if you want to grow berries commercially.



Cost for this workshop is \$10.00 per person/farm and pre-registration is required by December 7th, 2009. Contact Colleen Cavagna at (585) 268-7644 Ext. 12 to sign-up.

Registration Form for Introduction to Commercial Berry Growing for New Growers

Monday, December 14th, 2009

CCE Allegany/Cattaraugus Counties, 5435A County Road 48, Belmont, NY

Cost: \$10 per person/farm

Name: _____

Please Print Clearly

Address: _____

Phone number (in case of cancellation): _____

Number attending: _____ Total amount enclosed: \$ _____

Please make check payable to "Cornell Cooperative Extension Allegany County" and **mail to:**



Cornell University
Cooperative Extension
Allegany-Cattaraugus Counties

Attn.: Colleen Cavagna
CCE Allegany County
5435A County Road 48
Belmont, NY 14813

"Please contact the Cornell Cooperative Extension Allegany County office if you have special needs by Nov. 30th."

Building Strong and Vibrant New York Communities

Cornell Cooperative Extension provides equal program and employment opportunities.

2010 Empire State Fruit and Vegetable EXPO Berry Session Program
Wednesday, January 27, 2010
OnCenter, Syracuse NY



BERRY

Ballroom West

8:45 Announcements/DEC credit sign up Paul Baker, NYS Berry Growers' Association

9:00 Managing root feeding insects of strawberries Richard Cowles, Connecticut Agr. Expt. Station

9:30 What's New from Industry Paul Baker

9:35 Site considerations for strawberries and raspberries Laura McDermott, Capital District Vegetable and Small Fruit Program

10:05 Breeding strawberries for tolerance to root pests Richard Cowles, Connecticut Agr. Expt. Station

10:35 Internet to enhance berry crop marketing a panel discussion Moderator: Craig Kahlke, Lake Ontario Fruit Program; Allison Pritts, Allisons Acres, Trumansburg; Oscar Vizcarra, Becker Farms and Vizcarra Vineyards, Gasport; Anu Rangarajan and David Dahle, Brookside Berry Farm, Freeville

10:55 NYSBGA –logo update Dale Ila, NYS Berry Growers Association

11:00 NYSBGA Annual Meeting Dale Ila, Paul Baker, NYS Berry Growers Association

11:00 Adjourn

11:00-12:30 Lunch

12:15 PM Announcements/DEC credit sign up Paul Baker, NYS Berry Growers' Association

12:30 Understanding the role of root diseases in strawberry and raspberry decline Kerik Cox, Cornell

1:00 Herbicides: Injury ID and Prevention Marvin Pritts, Cornell

1:30 Results of a NYS Blueberry IPM Survey Juliet Carroll, NYS IPM Program

2:00 Nutrient Management Update Marvin Pritts, Cornell

2:30 – 3:30 PM Ice Cream Social

3:30 Strawberry Trials and Variety Reviews Courtney Weber, Cornell

Value-added berry wineries a panel discussion Moderator: Marvin Pritts, Cornell; Margo Bittner, The Winery at Marjim Manor, Appleton; Oscar Vizcarra, Vizcarra Vineyard and Becker Farms, Gasport; John Tamburello, Glenhaven Farm Winery, Trumansburg.

4:20 Expand Your Fall Market with Berry Crops Cathy Heidenreich, Cornell, Steven McKay, Hudson Valley Fruit Program

4:50 2009 Berry Pricing Survey Results Marvin Pritts, Cathy Heidenreich Cornell

5:10 PM Adjourn

GETTING STARTED IN HIGH TUNNELS IN NNY CONFERENCE SET FOR DECEMBER 12th IN WATERTOWN

Growing season extension done properly can be profitable

Watertown, NY -- Extending the growing season for the commercial production of vegetables, berries and cut flowers is attracting more and more growers in Northern New York. To accommodate that interest Cornell Cooperative Extension is hosting a Getting Started in High Tunnels Conference on Saturday, December 12 from 10am to 2:30pm at the Cornell Cooperative Extension of Jefferson County office at 203 N. Hamilton Street in Watertown, NY. Conference sponsors include the Northern New York Agricultural Development Program and the New York Farm Viability Institute.

Conference Coordinator and Extension Educator Amy Ivy says, The Getting Started in High Tunnels Conference agenda will help growers who plan to or have recently erected a covered, greenhouse-like structure that shelters crops from weather and moderate temperatures.

The tunnel structures may be Quonset-style hoop houses, Gothic-style peaked roof structures, or caterpillar-style closer-to-the-ground tunnels that allow growers to start plants earlier in the spring and harvest later in the fall and into the winter season.

New York State Vegetable Specialist Judson Reid and Nelson Hoover of Hoover Family Farm in Penn Yan, NY, are the featured speakers. Topics to be covered include the different types of season-extension structures and soil preparation. An in-depth session will focus on tomato production. A discussion of other possible crops for high tunnel crop production is also on the agenda.

A panel of local and greenhouse growers will share their experiences using tunnels and greenhouses in Northern New York's cold climate.

Earlier this year, Cornell researchers released economic impact data for high tunnel production. Their report showed a net income per square foot of high tunnel space for some growers of 57 cents/sq. ft. to \$1.44/sq. ft. of tomatoes; and \$1.51/sq.ft. for raspberries.

The conference cost is \$20 per person and includes a catered local foods lunch. Registration is requested by December 8. For a program brochure and registration, contact Cornell Cooperative Extension of Jefferson County at 315-788-8450 or Amy Ivy at adi2@cornell.edu <[adi2@cornell.htm](mailto:adi2@cornell.edu)>.

Learn more about Northern New York agriculture by contacting your local Cornell Cooperative Extension office or visit the Northern New York Agricultural Development Program website at www.nnyagdev.org.

AGRICULTURE SECRETARY VILSACK LAUNCHES NATIONAL INSTITUTE OF FOOD AND AGRICULTURE, ANNOUNCES VISION FOR SCIENCE AND RESEARCH AT USDA

Agricultural Science Poised to Make Major Contributions to Health, Environmental Challenges

WASHINGTON, October 8, 2009 - Agriculture Secretary Tom Vilsack today launched the National Institute of Food and Agriculture (NIFA) with a major speech regarding the role of science and research at USDA. At an event at the National Press Club with John Holdren, Assistant to the President for Science and Technology, Vilsack outlined his vision for addressing the some of the world's major challenges over the coming decades: Below are excerpts from Vilsack's prepared remarks:

"The opportunity to truly transform a field of science happens at best once a generation. Right now, I am convinced, is USDA's opportunity to work with the Congress, the other science agencies, and with our partners in industry, academia, and the nonprofit sector, to bring about transformative change. We can build on recent scientific discoveries - incredible advances in sequencing plant and animal genomes, for example. We have new and powerful tools -- biotechnology, nanotechnology, and large-scale computer simulations -- applicable to all types of agriculture.

"These discoveries and tools come not a moment too soon. The United Nations' Food and Agriculture Organization predicts that food production will need to double by 2050 to meet demand, and this has to happen in an environment where our production system already is under threat. For every one degree increase in temperature from global warming, we expect a 10 percent drop in yields. Water is in increasingly short supply in the U.S. and abroad for drinking, for irrigation, and for livestock production. Climate change already is disrupting farming and grazing patterns and food

production, and not just overseas -- many sectors of the U.S. agricultural economy are exceptionally vulnerable to climate stress.

"USDA science needs to change to respond to these pressures, to ensure the sustainability of the American food, fuel, and fiber system and to address some of America's - and the world's -- most intractable problems. Ultimately - our success in science has to be matched by impact in society. Already [Under Secretary of Research, Education, and Economics Raj Shah] has begun an in-depth and systematic analysis of our research programs, their goals, and their outcomes to help me better match available resources to critical outcomes for solving national and international problems.

"Formed in the main from the existing Cooperative State Research, Education, and Extension Service, NIFA will be the Department's extramural research enterprise. It is no exaggeration to say that NIFA will be a research "start-up" company - we will be rebuilding our competitive grants program from the ground up to generate real results for the American people. To lead NIFA, President Obama has tapped a preeminent plant scientist from the Danforth Plant Science Center in St. Louis - Roger N. Beachy, winner of the Wolf Prize in Agriculture and a member of the National Academy of Sciences. "I want USDA science to focus most of its resources on accomplishing a few, bold outcomes with great power to improve human health and protect our environment:

- USDA science will support our ability to keep American agriculture competitive while ending world hunger. At a time when disruptive climate change threatens production of some of the world's staple foods, some of the biggest gains we can make in ending world hunger will involve development of stress-resistant crops.
- USDA science will support our ability to improve nutrition and end child obesity. At USDA we want to take the nutrition and food choice insights we have gained from our science to test out some new approaches to school lunches, breakfast and our other nutrition assistance and education programs.
- USDA science will support our efforts to radically improve food safety for all Americans. Each year in the U.S. alone, food-borne pathogens like E. coli kill 5,000 people and sicken 75 million more; the cost to the economy from these infections exceeds \$35 billion.
- USDA science will secure America's energy future. President Obama has set ambitious but achievable goals for securing America's energy future from new domestic sources, including 60 billion gallons a year from biofuels by 2030. We plan to focus specifically on rapidly improving the amount and quality of plant-based feedstocks that will be the source of biofuels.
- USDA science will make us better stewards of America's environment and natural resources. We believe that research in this priority area will identify agricultural operations in the United States that, within 10 years, will be net carbon sinks.

"President Obama this spring pledged to invest more heavily in the nation's basic sciences, and to commit as much as 3 percent of America's GDP to science. Agricultural science needs to be part of that strategic investment strategy. Focus, scale, and impact - these are the levers Raj, Roger, and I will use to launch a new paradigm for the science that underpins our food, agriculture, and natural resources systems research.

"I am asking today for a commitment of will and energy to bring about our generation's new era of agricultural science. I look forward to charting a course together to accelerate the pace of scientific discovery in the agricultural sciences, speed the application of new knowledge to address challenges facing US and global food and agriculture, and translate new knowledge into tangible benefits for the American people and the world."

North American Strawberry Growers Association Annual Meeting and Conference at the Great Lakes EXPO

Amway Grand Plaza Hotel
Grand Rapids, Michigan

December 7, 2009

NASGA Workshop Strawberry Plasticulture
Monday morning 9:00 am



Summary: Growing strawberries on raised beds with plastic mulch and drip irrigation has been adapted by growers in the mid-Atlantic and northern states and provinces. By using short day varieties such as Chandler, Camarosa, Cavendish and Jewel and day neutral varieties with Seascape and Albion, growers can extend the season of locally grown high quality fruit. To achieve this, growers use different plant types, planting dates and varieties together with intensive management of soil and crop nutrition.

This workshop will introduce growers to various strawberry production systems on plastic. Recent developments in soil management and fumigation, colored mulches and soil moisture management will round out the program. This workshop will be conducted by guest speaker Dr. Barclay Poling and other regional specialists.

Moderator: Pam Fisher, Berry Crop Specialist, OMAF

NASGA Workshop- Fundamentals of Strawberry Production

Monday morning 9:00 am

Summary: This workshop will be led by David Handley from the University of Maine. It will cover general strawberry culture as an introduction to new growers or a refresher for experienced growers. Some of the topics to be covered include strawberry plant growth, matted row production practices, varieties, and insect pest, disease and weed control. The workshop will conclude with plenty of time for questions and discussion.

Moderator: David Handley, Univ. of Maine

NASGA Annual Meeting and Luncheon

Monday afternoon 12:00 noon

NASGA General Session

Monday afternoon 2:00 pm

2:00 p.m. Changes in UK Strawberry Production to Meet the Requirements of a Sophisticated Market Place
Peter Vinson, Edward Vinson Ltd., Faversham, Kent, England

2:40 p.m. What's New in Strawberry Weed Management
Doug Doohan, Horticulture & Crop Science Dept., Ohio State Univ.

3:10 p.m. Review of June-bearing Strawberry Varieties - Panel Discussion
Brian Smith, Univ. of Wisconsin/River Falls
David Handley, Univ. of Maine
Pam Fisher, Berry Crop Specialist, OMAF
Nate Nourse, Nourse Farms, Inc.

3:55 p.m. Branding Quebec Strawberries
Caroline Thibeault, Quebec Strawberry and Raspberry Growers Association

Great Lakes EXPO Strawberry

Tuesday December 8, 2009

9:00 a.m. Frost Protection Strategies
Barclay Poling, Horticulture Dept., North Carolina State Univ.

9:30 a.m. Current Status and Future Prospect for Day-Neutral Strawberry Production
Jim Hancock, Horticulture Dept., MSU

10:00 a.m. Grower Experiences with Day-Neutral Strawberries - Panel
Experiences in Ontario, Norm Charbonneau, HiBerry Farm, Port Elgin, Ontario
Initial Observations in Michigan, George Hemmeter, Hemmeter's Farm Market, Saginaw, MI
Lessons Learned in Quebec, Marie-France Chevrefils, Ste Anne des Plaines, Quebec

10:45 a.m. Trends in U.K. Berry Marketing
Peter Vinson, Edward Vinson Ltd., Faversham, Kent, England

Lunch on your own – Visit Trade Show

Tuesday afternoon 2:00 pm

2:00 Management Options for Black Root Rot
p.m. Annemiek Schilder, Plant Pathology Dept., MSU

2:30 Update on Strawberry Virus Diseases
p.m. Bob Martin, Oregon State Univ.

3:00 Winter Injury Management Techniques in the Frigid North: What's Hot and What's Not
p.m. Brian Smith, Univ. of Wisconsin/River Falls

3:30 Row Covers for Strawberry Production
p.m. Barclay Poling, Horticulture Dept., North Carolina State Univ.

NASGA Evening Session

Tuesday evening 8:00 pm

Summary: Please join the North American Strawberry Growers Association for a fascinating presentation by one of the most knowledgeable experts in the world.

Moderator: Nate Nourse

8:00 p.m. Changes and Trends in Worldwide Strawberry Production
Tom Sjulín, Berry Consultant, Aromas, CA

WHY RYE COVER CROPS ARE GREAT NATURAL WEED KILLERS

Dennis O'Brien, Public Affairs Specialist, USDA Agricultural Research Service Information Staff, Room 1-2212-B, 5601 Sunnyside Ave, Beltsville, MD 20705-5129

John Teasdale is trying to answer a question that might seem obvious: Why does rye work as a cover crop? Rye suppresses weeds without herbicides, making it a common cover crop on organic farms. The mechanics of how it works seem simple enough. When cut down and flattened on the soil, rye stalks block sunlight and prevent germinating weeds from getting the light they need. Rye's root system also captures nutrients and holds the soil, preventing erosion and making it particularly attractive to farmers in the Chesapeake Bay watershed and other areas where runoff is a concern. It also grows at cold temperatures, making it ideal for fall planting and winter growth.

But Teasdale, research leader at the Sustainable Agricultural Systems Laboratory in Beltsville, Maryland, has teamed up with Cliff Rice, an [ARS](#) chemist, to see if more is going on with rye. They think that something in rye affects soil chemistry in ways that help the plant suppress weeds. In their studies, they are trying to determine when and at what levels some of the plant's key organic compounds are released into the soil and whether they enhance weed suppression. Their goal is to find ways—either through improving varieties of rye or determining when and how it should be managed—to improve its weed-controlling abilities.

They raised rye in test plots in Beltsville, killed it with herbicide, and then either tilled it shallowly into the soil or left the dead rye stalks untilled on the surface. They planted pigweed and lettuce and took soil samples at weekly intervals. Then they extracted organic material from the soil and measured the levels of compounds known as “benzoxazinoids” that were released from the rye.

The study was one of the first attempts to measure rye-derived benzoxazinoids in field soil and examine their impact on weeds under field conditions. Previous work focused on rye extracts studied in controlled laboratory or greenhouse experiments.

The researchers say that other compounds could be involved in weed suppression, but their early results suggest that benzoxazinoids affect soil chemistry in ways that enhance rye's weed-suppressing ability and are worthy of further study.



Rye cover crop. (D1507-11)

There were lower-than-expected concentrations of the benzoxazinoids in the soil, and weeds began to grow better as concentrations of the compounds diminished—within a few weeks of when the rye was killed. The benzoxazinoids reached peak levels about a week after the rye was killed and those levels dropped considerably within 2 or 3 weeks.

Additional studies will be required before the researchers can provide guidance on growing and management techniques. They still need to examine other factors that likely play a part in weed suppression, such as how long rye should be grown before it is killed, the impact of weather and soil conditions, and the amounts of biomass needed to maximize its effects.—

The research is part of Soil Resource Management, an ARS national program (#202) described on the World Wide Web at www.nps.ars.usda.gov.

John Teasdale and Cliff Rice are with the USDA-ARS [Sustainable Agricultural Systems Laboratory](http://www.ars.usda.gov), 10300 Baltimore Ave., Beltsville, MD 20705-2325; phone (301) 504-5504, fax (301) 504-6491.

*"Why Rye Cover Crops Are Great Natural Weed Killers" was published in the [October 2009](#) issue of *Agricultural Research* magazine.*

AGRICULTURE DEPUTY SECRETARY MERRIGAN ANNOUNCES \$49 MILLION IN GRANTS UNDER THE SPECIALTY CROP BLOCK GRANT PROGRAM

WASHINGTON, October 15, 2009 - Agriculture Deputy Secretary Kathleen Merrigan today announced the award of 55 grants totaling approximately \$49 million for 745 projects to enhance the competitiveness of specialty crops, which are defined as fruits, vegetables, tree nuts, dried fruits, horticulture and nursery crops, including floriculture. Upon reviewing states' plans for funding, USDA selected projects that support local and rural agriculture interests, increase the competitiveness of small producers, and promote or create direct marketing opportunities for specialty crop producers.

"Developing local and regional food systems that spur economic opportunity is the purpose of our 'Know Your Farmer, Know Your Food' initiative and these grants today are a significant part of achieving that goal," said Merrigan. "We are pleased to be continuing this partnership in every state across the country to support their diverse efforts to promote healthy eating and grow specialty crop markets by expanding access to fresh, local foods."

Funds will be used by the 50 states, the District of Columbia, the Commonwealth of Puerto Rico, Guam, the U.S. Virgin Islands, and the Commonwealth of the Northern Mariana Islands, according to their plans submitted to USDA that describe how the state agency will carry out the program. New York State Department of Agriculture & Markets received \$1,098,809.97. Summaries of all awards can be viewed at www.ams.usda.gov/scbgp.

Through the Specialty Crop Block Grant Program, USDA is committed to increasing child and adult nutrition knowledge and consumption of specialty crops; improving efficiency and reducing costs of distribution systems; assisting all entities in the specialty crop distribution chain in developing Good Agricultural, Good Handling and Good Manufacturing practices, including cost share arrangements for funding audits of small farmer, packer and processor systems; investing in specialty crop research; enhancing food safety; developing new and improved specialty crop varieties; eradicating pest and plant health issues; and fostering organic and sustainable production practices.

The 'Know Your Farmer, Know Your Food' initiative emphasizes the need for a fundamental and critical reconnection between producers and consumers. The effort builds on the 2008 Farm Bill, which provides for increases and flexibility for USDA programs in an effort to promote local foods. Consumer demand for locally grown food in the United States is expected to rise from an estimated \$4 billion in 2002 to as much as \$7 billion by 2012.

Since May, an inter-agency USDA 'Know Your Farmer, Know Your Food' task force has been working to align existing USDA programs with the needs of local and regional food systems; conducting outreach activities so that the linkages are understood; helping communities build local food systems by providing new initiatives; and engaging the American public in conversation about local and regional agriculture.

COMMISSIONER AWARDS FEDERAL FUNDS FOR BUY LOCAL ADVERTISING

56 Pride of New York Members Receive \$127,000 in Awards; New Round of Funding Announced

Jessica Chittenden Ziehm, Director of Communications, NYS Department of Agriculture & Markets, 10B Airline Drive, Albany, NY 12235, 518-457-3136, <http://www.agmkt.state.ny.us>

November 13, 2009. New York State Agriculture Commissioner Patrick Hooker today awarded \$127,000 in federal funds to 56 recipients of the Pride of New York Buy Local Cooperative Advertising Program. This funding was provided through the 2006 USDA Specialty Crop Block Grant Program with the intentions to increase the sales and competitiveness of New York's specialty crops. The Commissioner also announced an additional round of funding for the same program, which includes \$129,000 made available from the 2007 USDA Specialty Crop Block Grant Program.

There has never been a more opportune time for the States farmers and food processors to promote their locally grown products than now, the Commissioner said. These grants will help enable producers to take advantage of the on-going buy local trend by initiating advertising and marketing plans to help further direct consumers to their locally grown products. If a producer missed out on this round of funding, we are offering the same program again with 2007 funds that we received from USDA.

The Pride of New York's Buy Local Cooperative Advertising Grant Program was a pilot project of the Department that provided up to \$5,000 in matching funds to members of the Pride of New York Program. These grants were offered on a first-come, first-served basis to help create and develop promotional messages, purchase media time, print space or signage or pursue other promotional activities. There were 153 applications submitted for the program and enough funding to fund 56 projects. The awards recipients are listed below.

With federal funds the State obtained through the 2007 USDA Specialty Crop Block Grant Program, the Commissioner also announced today the availability of \$129,000 in matching funds to continue the Buy Local Cooperative Advertising Program. Round 2 of the program will again provide up to \$5,000 to create and develop promotional messages, purchase media time, print space or signage or pursue other promotional activities, and will be offered on a first come, first serve basis. Applications for Round 2 can be found at <http://www.agmkt.state.ny.us/RFPS.html>.

The Pride of New York program is the States marketing program for food and agricultural products grown or processed in New York State. The program was created to help consumers identify fresh, high-quality New York State products where they shop. The Pride of New York also assists farmers and food processors in branding their products by using the Pride of New York emblem, and encourages retailers and restaurants to highlight the New York State products they use and sell by displaying the emblem. To find out more about the Pride of New York Program, call 1-800-554-4501 or visit <http://www.prideofny.com>.

The federal funds used for this program were targeted to promote specialty crops, which include fruits and vegetables, maple, honey, wine, horticulture and nursery crops. Specialty crops generate \$1.34 billion annually in New York and make up one-third of the States total agricultural receipts. They also rank high nationally in both production and economic value. For example, New York is the second largest state in the nation for apples, cabbage and maple syrup; third for grapes and cauliflower; and fourth for tart cherries, pear, snap beans and sweet corn.

Pride of New York Buy Local Cooperative Advertising Program 2009 Grant Recipients

WESTERN NEW YORK

Abundance Cooperative Market (Monroe County)	\$2,202
Badding Bros. Farm Market (Erie County)	\$2,500
Becker Farms/Vizcarra Vineyards (Niagara County)	\$5,000
Eden Valley Growers (Erie County)	\$ 500
Gro-Moore Farms (Monroe County)	\$2,000
Hidden Hollow Farms (Monroe County)	\$ 483
Lagoner Farms (Wayne County)	\$4,969
Murphys Orchards (Niagara County)	\$3,824
Niagara County CCE (Niagara County)	\$ 509
Zehrs Farm Market & Nursery (Niagara County)	\$3,715

FINGER LAKES

Bakers Acres (Tompkins County)	\$3,200
Elderberry Pond Country Foods (Cayuga County)	\$2,700
Goose Watch Winery (Seneca County)	\$2,275
Penguin Bay Winery (Schuyler County)	\$1,625
Swedish Hill Winery (Seneca County)	\$2,125
Three Brothers Winery (Ontario County)	\$ 500

CENTRAL NEW YORK

Alambria Cooperative Market (Madison County)	\$ 300
Central NY Regional Market (Onondaga County)	\$4,000
Chenango-Madison Bounty (Madison County)	\$3,978
Delaney Farms (Onondaga County)	\$ 500
Hunter & Hilsberg (Onondaga County)	\$5,000
Navario Orchard (Onondaga County)	\$4,983
Nelson Farms (Madison County)	\$5,000
Pauls Nursery (Oswego County)	\$1,500
Windy Hill Orchard (Oneida County)	\$1,950

SOUTHERN TIER

Ebenezer Hill Gardens (Alleghany County)	\$ 110
Plantasia Nursery (Tioga County)	\$ 925
Purdy & Sons Foods (Chenango County)	\$1,500
Upstate Harvest (Chenango County)	\$ 662

NORTH COUNTRY

Adirondack Maple Producers (Essex County)	\$1,000
Carthage Area Chamber of Commerce Farmers Market (Jefferson County)	\$ 473

NORTH COUNTRY (continued)

Hurlbut's Maple Products (St. Lawrence County)	\$2,463
North Country Farms (Jefferson County)	\$3,000
North Croghan Outpost (Jefferson County)	\$ 448
Orebed Sugar Shack (St. Lawrence County)	\$ 481
Rhodes Greenhouses (Jefferson County)	\$2,500
St. Lawrence County Maple Association	\$1,650
Thousand Islands Winery (Jefferson County)	\$4,000

MOHAWK VALLEY

Canajoharie Farmers Market (Montgomery County)	\$ 441
Cooperstown Farmers Market (Otsego County)	\$2,507
Fly Creek Cider Mill (Otsego County)	\$5,000
Maple Shade Farm (Delaware County)	\$1,000
Pick-A-Pumpkin Patch (Schoharie County)	\$1,125

CAPITAL DISTRICT

Ellms Family Farm (Saratoga County)	\$3,751
Upper Hudson Maple Producers Association (Washington County)	\$2,200
Zorbas Natural Food (Saratoga County)	\$ 750

HUDSON VALLEY

Evergreen Farm (Dutchess County)	\$1,347
Fishkill Farms (Dutchess County)	\$5,000
Kingston Farmers Market (Ulster County)	\$1,639
Little Tikes/Awesome Foods (Dutchess County)	\$ 500
Raspberry Fields Farm (Ulster County)	\$ 648
Soons Orchard (Orange County)	\$5,000
Stoutridge Vineyard (Ulster County)	\$ 500
Suffern Farmers Market (Rockland County)	\$2,177

NEW YORK CITY

Ricks Picks LLC (New York County)	\$4,583
-----------------------------------	---------

STATEWIDE

New York State Maple Producers Association	\$4,000
--	---------

Statewide total

\$126,718

LSU AGCENTER RECEIVES \$518,000 TO DEVELOP BLUEBERRY WEB SITE

October 13, 2009. The LSU AgCenter, along with a Mississippi agriculture agency and three other southern universities, has been awarded a \$518,000 grant to develop an interactive, educational Web site about blueberries.

The site's initial purpose will be to teach people in the southeastern United States how to grow this commodity, which is increasingly popular, and to encourage consumers to eat more blueberries, which are a valuable source of many nutrients and fiber.

The "All About Blueberries" site will be part of eXtension.org, which is a national Web site aggregating information from 74 universities across the country.

The grant is from the U.S. Department of Agriculture (USDA) through its Specialty Crop Research Initiative. The LSU AgCenter's four partners in the project are the USDA's Agricultural Research Service in Poplarville, Miss.; Mississippi State University in Starkville; Auburn University in Auburn, Ala.; and North Carolina State University in Raleigh.

“Most major blueberry production traditionally occurs in other parts of the country,” said [Natalie Hummel](#), LSU AgCenter extension entomologist and the director of the project. “We see this as an economic development opportunity for Louisiana and the rest of the South.”

The grant will cover development of educational content over three years using a variety of approaches, Hummel said. These include video clips, audio podcasts, photo galleries, interactive teaching modules and social networking tools such as Facebook and Twitter.

“We’ll try to include everything anybody would want to know about blueberries,” Hummel said.

She said the blueberry production information will be developed for the growing conditions in the southeastern United States.

“Mississippi State and NCSU have well-developed, robust research and extension programs that support the blueberry industries in those states,” she said. “Our initial focus will be on southern blueberry production. But we will expand to address nationwide blueberry production opportunities.”

The consumer information, however, will be for anybody anywhere. “We’ll include nutritional information and even recipes,” Hummel said.

The Web site also will include a section devoted just to 4-H, with lesson plans on production and consumption of blueberries for use at 4-H Club meetings and for 4-H projects.

Many people from many disciplines at these universities will be involved in the project, Hummel said. Her chief collaborators at the LSU AgCenter include Don Ferrin, plant pathologist; Heli Roy, nutritionist; and Krisanna Machtmes, associate professor in Organization Development & Evaluation.

PREDICTING IMPACTS FROM CLIMATE VARIATIONS

[Don Comis](#), Public Affairs Specialist, USDA Agricultural Research Service Information Staff Room 1-2218-B, 5601 Sunnyside Ave, Beltsville, MD 20705-5129

“Weather” is the temperature, wind, rain, humidity, sunshine and cloudiness that we see on a daily basis. But “climate” is the average of day-to-day weather, over months, years, or centuries.

Climate varies over time, and forecasts of next season’s through next year’s climate are being issued monthly by the National Oceanic and Atmospheric Administration (NOAA). [ARS](#) scientists are working to translate these climate forecasts into useful information for farming and water management in the coming year.

“It’s the short-term variations or departures from the long-term averages—like droughts and floods during the crop growing season—that farmers are concerned about. Those are the climate and weather issues we focus on,” says Jeanne Schneider, a meteorologist at the ARS Great Plains Agroclimate and Natural Resources Research Unit in El Reno, Oklahoma.

Making Forecasts More Useful to Farmers

Since 1995, NOAA has issued seasonal climate forecasts covering large regions—about half the size of Oklahoma or three times the size of smaller states such as Maryland. But these forecasts have seen little use in agriculture. One problem was that they cover too large an area for direct agricultural application. Another problem was that seasonal forecasts are issued for 3-month periods, which are too long for effective agronomic applications. Also, no one was sure how useful the forecasts were for specific regions.

Schneider found that NOAA predictions of periods of above-average temperatures were dependable enough to have potential usefulness for agriculture over most of the lower 48 states. “But currently available forecasts for cooler-than-average temperatures are generally too unreliable for many uses anywhere in the country,” she says.

Forecasts for wetter- or drier-than-average conditions were mostly useful in regions known to experience the strongest El Niño or La Niña effects on precipitation—about 10 percent of the lower 48 states. In these regions, seasonal precipitation predictions may assist crop insurance programs and other agricultural enterprises that operate at regional scales.

Schneider and ARS hydraulic engineer Jurgen Garbrecht continue to work with NOAA to meet the needs of farmers and other users. The forecasts have evolved greatly over the years, and major improvements continue to be made.

Adding Forecasts to Computer Models is Next

Garbrecht, Schneider, and ARS hydrologist John Zhang are researching ways to apply seasonal climate forecasts at the farm level by developing computer models for climate-related decision support.

Schneider developed new methods to downscale seasonal forecasts to the farm scale and express them in 1-month increments. Garbrecht modified an ARS-developed software program to generate daily weather outcomes corresponding to these monthly climate forecasts. And Zhang developed a winter wheat grazing model to assess potential impacts of the seasonal forecasts on forage, beef, and grain production. The forecast-derived information can then be used to anticipate grazing opportunities, estimate crop yields, adapt management and agronomic operations, reduce climate-related risks, and increase profitability.

“Given the rapid rate of development of forecast methodologies, farmers and ranchers can expect continuing improvements,” Schneider says. “Demonstrations of specific agricultural applications in regions that currently benefit from forecasts should help spur wider use elsewhere as forecasts improve.”

This research is part of Global Change (#204) and Water Availability and Watershed Management (#211), two ARS national programs described on the World Wide Web at www.nps.ars.usda.gov.

Jeanne M. Schneider, Jurgen D. Garbrecht, and John Zhang, are with USDA-ARS [Great Plains Agroclimate and Natural Resources Research Unit](http://www.nps.ars.usda.gov), 7207 W. Cheyenne St., El Reno, OK 73036; phone (405) 262-5291, fax (405) 262-0133.

*"Predicting Impacts From Climate Variations" was published in the [November/December 2009](#) issue of *Agricultural Research* magazine.*

DISCUSSION CONTINUES ON THE POSSIBLE ESTABLISHMENT OF AN INTERNATIONAL BLUEBERRY ORGANIZATION

Blueberries have become a truly international fruit with increasing acreage and blueberry production in North and South America, Europe, and Asia, as well as in South Africa, Australia and New Zealand. With this growth, the blueberry industry will enjoy tremendous opportunities, but will also face considerable challenges that will need to be addressed through education, communication and cooperation. In order to meet these challenges the North American Blueberry Council (NABC) has proposed that blueberry growers and marketers worldwide consider the development of, and participation in, an International Blueberry Organization (IBO). The primary focus of this organization will be to allow blueberry industry members from throughout the world to meet annually to discuss blueberry industry developments and worldwide market opportunities.

The primary goal of an International Blueberry Organization (IBO) would be to encourage industry communication in areas such as health and production research; promotion; food safety and blueberry industry technology. To date an International Blueberry Organization (IBO) Steering Committee of eleven individuals has been formed with representatives from the USA, Chile, Uruguay, Argentina, Australia, England and South Africa. An effort is also being made to add a representative from New Zealand and possibly Japan, China and Korea.

The first action of the IBO Steering Committee will be to work on the initial formation of a possible IBO and to generate consensus on the recommended by-laws that would govern the organization as well as the recommended initial and on-going funding sources and necessary budget to accomplish objectives. The committee will also discuss the potential host country for the initial IBO meeting and the recommended location and resources for registration and incorporation of an IBO. Plans are being considered to have the IBO working group meet at a future show such as *Fruit Logistica* in Germany this February to continue discussions and plan next steps.

(Reprinted from: The USHBC Bluespaper, October 2009)

DONT MULCH YOUR STRAWBERRIES PREMATURELY

(adapted from Kevin Iungerman, Cornell Extension, Northeastern NY)

Applying mulch prematurely can unwittingly rob your strawberry planting of its maximum edge going into winter. Even though early stage dormancy in strawberries is reached in October, mulching anytime before mid-November can shut down light interception too early, meaning that the plants will have less energy to support their winter

acclimation. Since survival over the winter often hinges upon very small differences in energy available to maintain plant health, the negative effects of premature mulching can be quite significant.

The latter part of November is generally recommended as the strawberry mulch window in our area. Defer even later, into early December, if weather conditions allow (no snow and the fields are still amenable to tractors, wagons, and equipment. Track the progression of ground temperatures, noting when time where soil temperatures are running at 40F over several consecutive days. You should apply your mulch prior to the ground freezing.

Straw remains the mulching material of choice on strawberries. Wheat, rye, Sudangrass, barley and oat straws work well (and my preference is in the same order). But clean straw is essential! If your primary criterion is the price per bale, then you are inviting trouble! If possible, examine the straw for its grain or weed seed contamination before you buy it, and certainly before you apply it! Don't import headaches that might largely be avoided with just a little extra care. If need be, it is preferable to grow it yourself or to have it contract-grown so that you can closely control or monitor its cutting time. (Cut before the seed is viable!) It is no bargain to use seed-contaminated straw, as you will surely pay for the hidden extras in herbicides, cultivation, labor and headache.

There are plenty of reasons to mulch strawberries adequately. Unprotected strawberry plants are very vulnerable to desiccation from exposure to drying winter winds. Don't skimp. Cold can do considerable mortal damage. Crowns reportedly kill when their plant cells reach temperatures of about 7F to 10 F. Raised bed plantings have greater vulnerability as they can be several degrees colder than flat beds because they have greater soil surface area exposed to radiant cooling. In spring you take advantage of the same principle but to reverse effect: greater warming. Consequently, add more straw to raised beds - perhaps twice the amount for adequate coverage (4-5 tons). The same might be done on less hardy cultivars or in windier locations. Remember to maintain a reserve of bales in a dry, freeze-free location so they are available for immediate replacement of straw that blows off during the winter. Monitor coverage often, especially if snow cover is light and it's windy.

(Reprinted from Vermont Vegetable and Berry News – November 10, 2009)

THAT'S A BERRY GOOD QUESTION!!!

[Kathy Demchak](#), Penn State Horticulture

Q. I'd like to submit a soil sample from my blueberry field. It's mulched with sawdust. I'm uncertain of how to take the sample, because it could end up being mostly mulch. What should I do?

A. This is a good question for sure. The problem is that how thick the mulch layer is, how decomposed it is, and what it is made of could all affect the results. It makes sense to me to make sure that the soil test results reflect what the roots actually experience, so scrape the mulch away until you get to a very decomposed mulch layer in which you start to see some blueberry roots. Most of the plants' roots will be located from here and downward in the mulch/soil interface. Then take soil cores 6 to 8 inches deep of this lower mulch layer and the soil below it. This is what I do with our fields, and it seems to be a pretty good reflection of the plant situation. Now, the next logical question is – if the pH of the mulch is different, won't that later affect the pH in this soil interface area? It probably will, but if you continue to monitor the soil with a test every 2 years or so, you can make adjustments over time if needed. And another question - since you apply any needed sulfur to the mulch surface, will this intercept some of the applied sulfur? It may, but it seems that the pH evens out over time.

(Reprinted with permission from: Penn State Vegetable and Small Fruit Gazette, Vol. 13 No. 11, October 2009.)

ANTHRACNOSE CROWN ROT IN STRAWBERRIES

[Kathy Demchak](#), Penn State Horticulture

Anthracnose crown rot, caused by *Colletotrichum gloeosporioides* or *C. fragaria*, can be a big problem for strawberry producers in warmer areas of the country such as the southeastern U.S. We're finding that anthracnose crown rot can be a problem for growers in Pennsylvania as well. While it's possible that anthracnose crown rot could occur in either matted row or plasticulture plantings, the material in this article is directed towards plasticulture production where the disease is



more common. Here's some information on symptoms and management. (Photo above courtesy Marvin Pritts)

Symptoms: At first, plants may just generally appear to lack vigor and fail to grow, especially under cool conditions, as it takes some time for the fungus to invade the crown. As the name indicates, the crown of the plant ceases to grow and dies. Branch crowns may or may not be present, and their presence can make it difficult to see what's going on in the center of the plant. Eventually the entire plant may die, though this may not happen until warm conditions occur during fruiting. Digging out some plants and cutting through the crown is the best way to see what's going on. Look for a reddish-brown discoloration of the crown. Note that because of the cool wet conditions we had this entire summer and much of this fall, slow growth has been common and alone isn't a cause for panic.

Source of plant infection: Most commonly these diseases come in on plants from the nursery, but it's possible that if tips were bought in, the disease didn't originate where the plug plants were rooted. *C. gloeosporioides* in particular can be present on a wide range of plants including apples, peaches, and some weeds, so it's difficult to eliminate all possible sources.

Cultural management: The disease organism(s) are most problematic under warm (above 80 degrees F) humid conditions. Thus in plasticulture, avoiding situations that make conditions warmer - such as leaving the row covers on during warm spells - should be avoided. If the disease is present, manage row covers to keep plant temperatures as cool as possible, even though this may mean not having the first ripe berries. Using straw mulch between the rows and around the plants helps by keeping temperatures cool and minimizing rain splash, which spreads inoculum from infected to uninfected plants. Removing plants from the field that show symptoms of crown rot - plus a few of their neighbors - can help greatly with reducing inoculum and spread of the disease.

Chemical management: Captan, Topsin-M, Switch, and the strobilurin-containing (QoI) fungicides Pristine, Abound, and Cabrio are all fairly effective on anthracnose in general. However, wording on individual product labels varies as to which species or type of anthracnose (fruit or crown rot) is covered. In general, a spray or two of Captan and Topsin in the fall before row covers are pulled on helps to minimize diseases such as leaf spot and Botrytis whether anthracnose is present or not. In the spring, concentrate on protecting plants especially during warm spells, with fungicides applied every 7 to 10 days if necessary. Keep in mind that if applying bloom sprays for gray mold, Pristine and Switch are also very good gray mold materials. Alternate with or include Captan to minimize buildup of resistant fungicide strains. Be sure to follow label recommendations for alternating fungicides to minimize development of resistant disease strains.

Thanks for Dr. Frank Louws at North Carolina State University for providing background information for this article, and reviewing its accuracy.

(Reprinted with permission from: Penn State Vegetable and Small Fruit Gazette, Vol. 13 No. 11, October 2009.)

YOUR FARM IMAGE: WHAT MAKES A GOOD WEBSITE?

Simon Huntley, Lead Developer, Small Farm Central, <http://www.smallfarmcentral.com>, 412-567-3864

(**Editor's Note:** Winter is an excellent time to think about adding or improving your farm website. Below is a "hands-on" activity to help you get started. Take time to review the comments and click through the featured web sites to get fresh ideas on how to sell your berries!)

Having a great farm website takes time, effort, and some investment, but many farms make this effort pay off with increased customer loyalty, better new customer retention, and an understanding from the public about what it takes to raise a crop. Small Farm Central currently works with 250 farms across the country and serves over a million farm web page views per month, so we know farm web marketing. More information about our service is available at <http://www.smallfarmcentral.com> or 412-567-3864.

I have reviewed some great and not-so-good examples of how NC Strawberry Association farms are utilizing the web. I am always looking at best practices and what works and what does not. A little constructive criticism can improve a web marketing approach, provided there is time and expertise to make the changes suggested.

<http://www.iseleyfarms.com> Attractive, updated site with all the important basics: about page, what's in season, and easy contact information.

<http://www.carriganfarms.com> Carefully considered use of video on "The Quarry" page is smart and good marketing for wedding events.

<http://www.berniesberries.com> The idea of a “daily update” is good, but perhaps a bit overly optimistic since it has not been updated since April 2008. Another weakness is that the daily update takes the user to another site; better is to have the blog integrated in to the regular site.

<http://www.carolinacountryfresh.com> Attractive, clean site, but the GoDaddy ads at the top are an immediate turn-off. (*Editor's note: Looks like they may have removed these already*)

<http://www.allamericanwineries.com/nc/crs/> Extremely simple site, but it provides the basic information. The “email notification” option is good, but better if it was an automated process.

<http://www.mcadamsfarm.com/vegetables.html> The product availability graph is a good, educational option to add to a farm website.

<http://www.pattersonfarminc.com/> Automated mailing list addition, but the form asks for a lot of information. The process should be as easy as possible for the user. Giving a coupon for joining the list is a great idea.

<http://www.hallfamilyfarm.com> Photo gallery is a good start, but let's see more farm photos!

<http://www.vollmerfarm.com/folkssay.html> Testimonials are an important marketing tool for your farm website.

(Reprinted with permission from the 2009 Southeast Strawberry EXPO Proceedings, November 8-10, 2009.)

PRIMOCANE-FRUITING BLACKBERRIES - RESEARCH BRIEFS

Cathy Heidenreich, Berry Extension Support Specialist, Department of Horticulture, Cornell University CALS, Ithaca, NY 14853

Three research briefs are presented here on primocane-fruiting blackberries. They are summaries of three journal articles by berry researchers from Arkansas and Oregon on this new type of blackberry. The first paper, by Clark et al., is a description of the premier commercially released primocane-fruiting blackberry cultivars, ‘Prime-Jim’, and ‘Prime Jan’, from the University of Arkansas breeding program (2004). The second, authored by Strik and Thompson, is a feature article detailing cultural practices to increase yield and modify fruiting season of primocane blackberries. The last is a very recent paper (October 2009) comparing production of primocane blackberries in high tunnels vs. open field. This should provide a good overview of their development and what is known about their commercial production to date. While there is still more work to be done on these fall blackberries, you may want to consider adding them to your berry operation in the future.

‘Prime-Jan’ and ‘Prime-Jim’ Primocane-Fruiting Blackberries

Blackberry production has potentially been revolutionized with the introduction of the first two primocane-fruiting blackberries, which flower and fruit on the current season's growth. All other cultivated blackberries fruit on floricanes, requiring canes to be overwintered.

Crosses leading to these cultivars were made by J. Lopez-Medina as part of his doctoral dissertation where he was investigating inheritance of the primocane-fruiting trait (Lopez-Medina et al., 2000). Both cultivars exhibited the primocane-fruiting trait; the source of this trait in both cultivars is a diploid cultivar ‘Hillquist’ in their parentages.

‘Prime-Jan’ is a cross between Ark. 1836 and ‘Arapaho’; ‘Prime-Jan’ resulted from a cross of ‘Arapaho’ and Ark. 830. The cultivars were named in honor of James and Juanita Moore. Dr. Moore founded the University of Arkansas breeding program in 1964; his wife Juanita contributed to many of the success of that breeding program.

The two new cultivars were evaluated extensively in Arkansas and Oregon and also on a more limited basis in New York, Mississippi, and Indiana.

Standard cultural practices for erect blackberries were used for all plantings in Arkansas and Oregon, including annual preemergent and postemergent herbicide applications and spring nitrogen applications (50.8 lb/A ammonium nitrate). A single application of liquid lime sulfur was used at budbreak to control anthracnose. No additional pest management was done. Plots were irrigated as needed using overhead sprinkler irrigation.

Prime-Jan®**Prime-Jim®**

(Photos courtesy [University of Arkansas Cooperative Extension Service](#))

Table 1: Characteristics of 'Prime-Jan' and 'Prime-Jim' Primocane-Fruiting Blackberries

Characteristics	'Prime-Jan'	'Prime-Jim'
Berry weight range	4.0 – 5.5 g	3.7 - 6.4 g
Average berry weight	4.9 g	5.1 g
Yield/A*	3,617 lb/A – 15,136 lb/A	1,437 lb/A – 17,360 lb/A
Fruit characteristics	Blocky, conical, glossy black finish	Blocky, conical, glossy black finish
	Firmness rating (6.8) lower than 'Arapaho' or 'Ouachita' (8.2) but comparable to 'Choctaw' (6.2)	Firmness rating (7.0) lower than 'Arapaho' or 'Ouachita' (8.2) but comparable to 'Choctaw' (7.2)
	Soluble solids 7.9% below those of 'Arapaho' (9.7%)	Soluble solids 9.6% comparable to those of 'Arapaho' (9.7%)
	Flavor rating (7.2), comparable to 'Arapaho' (7.6), a cultivar rated very high among most evaluators.	Flavor rating (7.2), comparable to 'Arapaho' (7.6), a cultivar rated very high among most evaluators.
	Preliminary post harvest evaluations (leakage, softness, decay) indicate this cultivar may not be suitable for long distance shipping in terms of storability	Preliminary post harvest evaluations (leakage, softness, decay) indicate this cultivar may not be suitable for long distance shipping in terms of storability
Flowering date (Geneva, NY)	Late July	Late July
Fruiting Date (Geneva, NY)	1 September	1 September
Plant characteristics	Thorny	Thorny
	Erectness (7.6)	Erectness (8.4)
	Good vigor (7.2)	Good vigor (7.8)
	Average health (8.2)	Average health (8.2)
Diseases	No orange rust under high disease pressure, susceptible to anthracnose	No orange rust under high disease pressure, susceptible to anthracnose
Insects	Japanese beetles were observed to be feeding heavily on primocane blooms in mid to late summer (Indiana); the potential exists for crop reductions due to flower damage	Japanese beetles were observed to be feeding heavily on primocane blooms in mid to late summer (Indiana); the potential exists for crop reductions due to flower damage

*Yields varied greatly by location; lower berry weights, yields, and reduced berry quality were found in Arkansas due to high temperatures during bloom. Authors concluded these cultivars would probably perform best in areas with cooler summers such as upper Midwestern, northeastern, and northwestern US.

No differences in single (primocane only) or double (floricane and primocane) cropping were noted in this study. Authors indicated however, that hardiness concerns would still exist in cold climates under a double cropping system. Single (primocane only) cropping effectively eliminates that concern.

To read the 'Prime-Jim' and 'Prime-Jan' cultivar description article in its entirety see: Clark, John R., Moore, J.N., Lopez-Medina, J., Finn, C. and Perkins-Veazie, P. 2005. 'Prime-Jan' (APF-8) and 'Prime Jim' (APF-12) primocane-fruited Blackberries. *HortScience* Volume 40 No. 3 June 2005, pages 852-854.

Primocane-Fruiting Blackberries: Potential for Extending Harvest Season and Production Regions

Authors of this feature article examined cultural practices that would increase yield and extend harvest season for primocane –fruiting blackberries ‘Prime-Jim’ and ‘Prime-Jan’. These practices included early season soft tipping to increase fruit yield, and harvest season manipulation (advance, delay, or extension) through removing of primocanes and the use of tunnels/rowcovers.

Increasing Fruit Yield: “Soft-tipping”

Primocanes of ‘Prime-Jim’ and ‘Prime-Jan’ have a natural tendency toward branching, generally having a couple of branches near the base. Canes that are not summer pruned may reach over 9 ft in height (Oregon). Effects of “soft-tipping” (removal of the top $\frac{3}{4}$ to 2” of the primocane) on yield and berry size depended on tipping date. Late tipping (after flower buds appeared or later) reduced yields in both Arkansas and Oregon compared to untipped canes. Authors found however that primocanes soft-tipped at a height of 3 ft early in the season produced 3-fold the yield of untipped canes. They observed an average of 5 branches per cane and a 3-fold increase in flower number on tipped vs. untipped canes. “Double-tipping” (soft-tipping of primocane branches) also shows promise for increasing yield.

Based on their field experiences, authors suggest not expecting a commercial primocane crop the planting year when starting from tissue culture plants (2 ft in-row spacing, 10 ft between row spacing). Preplant soil amendment was done based on analyses. Researchers allowed plants to grow un-trained and un-manipulated during the planting year. They recommend a simple 2-wire trellis system (wire spacing 1 ft, 5.5 ft) to reduce wind breakage and bending over of vigorous canes. Weed management was done using preemergent herbicides and mechanical methods. Row width was maintained at 18’ using cultivation. Soil moisture was maintained through drip irrigation.

Fruiting Season Modification

Rowcovers/tunnels - Authors were able to advance flowering 14 days by placing rowcovers (Remay, 5 mm white spun bound polyester, 85% transparent), over rows prior to primocane emergence in the spring. Covers were removed from rows when primocanes became too tall for unimpaired growth under cover (~14’ - 18”). Primocanes under row cover grew faster, blooming earlier than uncovered canes. Authors suggest flower bud initiation may be similar to that of primocane-fruited raspberries; day-neutral and dependant on cane age.

Removing Primocanes – Authors’ research to date indicated removing canes created a delayed flush of new growth, delaying harvest.

Concluding Remarks

Although primocane-fruited blackberries are still relatively new to the horticultural world, authors feel this type of blackberry will have tremendous impact on the blackberry fresh market world wide. Easy to manipulate, these blackberries offer great potential for extending the fresh market season for blackberries. New cultivars under evaluation will offer a higher number of branches per primocane, shorter more compact growth habits and thornlessness further increasing their desirability (and production).

To read the feature article in its entirety see: Strik, Bernadine and Thompson, Ellen. 2009. Primocane-fruited Blackberries: Potential for Extending Harvest Season and Production Regions. HortScience Volume 44 No. 1 February 2009, pages 23-24.

Please note: some research plot production information detailed in the preceding summary comes from cited literature: *Acta Horticulturae* 777:423-428.

High Tunnel Versus Open Field: Management of Primocane-Fruiting Blackberry Using Pruning and Tipping to Increase Yield and Extend the Fruiting Season

The final research paper summarized in this series further explored the use of training, tipping and protected production to increase yields and extend fruiting season of ‘Prime-Jan’ primocane-fruited blackberry, as compared to open field production. The researchers also evaluated the effect of tunnel culture on the production of primary and secondary metabolites in fruit vs. those produced in open field. These metabolites (phenolic compounds and flavonoids) have been determined to have beneficial antioxidant, anti-inflammatory, anti-allergic, anti-ulcer, antibiotic and anticarcinogenic activity.

Pruning and Tipping

Work was done at the North Willamette Research and Extension Center, Aurora, Washington. Plantings were established in the same manner as described above. In the second planting year, the following treatments were applied to plots (5 plants, 10 ft of row):

1. all primocanes cut to ground when averaging 10" tall; later emerging canes soft-tipped (top $\frac{3}{4}$ – 2") at 20" in height.
2. all primocanes cut to ground when averaging 20" tall; later emerging canes soft-tipped (top $\frac{3}{4}$ – 2") at 20" in height.
3. all primocanes were double tipped (soft-tipped at 20" then subsequent laterals soft-tipped at 20" in length.
4. all primocanes cut to ground when averaging 20" tall (control)

Treatments were replicated 4 times both under tunnel and open field production. The tunnel was covered with plastic (Luminance THB 6mm plastic film) 1-2 weeks before fruit harvest through the end of harvest to protect it from inclement weather. Plastic covered only the roof of the tunnel; sides were left open.

Measurements made in plots included: date of primocane emergence, pruning and soft-tipping, first open flower, full black king fruit, total primocane length at bloom, apical branch length, numbers and lengths of fruiting and non-fruiting canes, primocane fresh weight (November), total numbers of nodes, flowering sites, reproductive nodes per cane, fruit harvest dates (berries picked every 7 days), yield per plot, average berry weight, numbers of set/unset drupelets.

Other data collected from the experiment included percent soluble solids, pH, acidity, total monomeric anthocyanins and total phenolics.

Canopy temperature and light penetration data was also collected, along with ambient air temperature and relative humidity.

Results

Year	Culture	Treatment	Total nodes (cane+branches)	Total flowers per plot	Fruiting canes per plot	Yield (kg/plot) ^z	Berry wt (g)
2006	Tunnel	1 (10c/20t)	64	41	*54	5.4	5.0
		2 (20c/20t)	61	48	34	**1.5	**4.0
		3 (20c/20tb)	106	*111	29	*9.9	*6.8
		4 (20/ck)	155	**27	29	**2.7	4.4
	Open Field	1 (10c/20t)	58	44	56	4.3	3.4
		2 (20c/20t)	58	26	46	**0.3	**1.9
		3 (20c/20tb)	73	56	48	*5.8	4.1
		4 (20/ck)	81	23	41	2.8	3.1
2007	Tunnel	1 (10c/20t)	65	43	*82	4.4	**6.9
		2 (20c/20t)	67	50	59	4.9	7.5
		3 (20c/20tb)	*118	99	48	17.9	*8.1
		4 (20/ck)	*96	53	55	6.9	**6.5
	Open field	1 (10c/20t)	69	37	87	2.0	5.9
		2 (20c/20t)	60	38	80	1.3	5.7
		3 (20c/20tb)	*99	*100	69	8.4	*7.2
		4 (20/ck)	82	51	73	4.0	5.9

* indicates numbers are significantly *higher* than others within same year and type of culture.

** indicates numbers are significantly *lower* than others within same year and type of culture.

^zTo convert kg (kilograms to pounds, multiply value by 1,000 (g/kg) and then divide by 454 (g/lb).

Concluding remarks

Early cutting of canes to the ground increased cane numbers but did not necessarily improve yield.

Cutting canes to the ground late in the season resulted in reduced yields, probably due in part to shortened growing season, low light, and cool fall temperatures. Summer removal (cutting) of actively growing primocanes may also have reduced large amounts of carbohydrate reserves as well.

Double-tipped primocanes produced on average 33% heavier fruit than the other pruning treatments, as compared to the control.

Tunnel production allowed harvest extension for an extra 3 weeks in both years of the trial. The authors note however fruit ripening began to slow with cooler fall temperatures and overall berry quality began to decline at that point as well.

. Berry weight under tunnel production for 2006 and 2007 averaged 6.8 g; open field production was 4.7 g. Double-tipping gave the best yield results under tunnel production.

Double-tipping/protected production (tunnel) gave the most favorable response in growth, time of harvest, and yield overall. Yields under this production system were increased by 267% in 2006 and 159% in 2007, respectively. The largest yields under this system occurred during September and October – well within the desired harvest timeframe.

Tunnel production did not appear to affect fruit chemistry other than pH which appeared to be higher in the open field.

The authors point in closing that economic analysis still needs to be done to determine if possible increased yields off set double-tipping labor costs. Tunnel plastic placement and removal, and venting during wind events are also labor-intensive; these costs need to be considered as well.

To read the original journal article in its entirety see: Thompson, Ellen, Strik, Bernadine, Finn, Chad E., Zhao, Yanyun, and Clark, John R. 2009. HortScience Vol. 44, No. 6, October 2009.

WEATHER NOTES

NEW YORK CROP WEATHER SERVICE NOTES

Week ending October 18th: Temperatures for the week averaged nearly ten degrees below normal. The week was also fairly dry except for Long Island where 0.7 to 1.5 inches fell mostly on the 15th and the upper Genesee and Allegheny Valleys where 0.4 to 0.8 inches of rain fell on the 15th, 16th, and 17th. The week began with a cold frontal passage on Sunday the 11th. That was followed by a deep upper trough with a surface high for Monday thru Wednesday. Many areas across the state experienced a hard freeze on Monday morning recording lows in the 20's to around 30. A low moved up along the coast Thursday spreading rain across most of the region but especially over Long Island and parts of far western New York. This was followed by another deep trough over the Great Lakes which brought continued unseasonable cold into the region.

Week ending October 25th: This is the last edition of the New York "Weather and Crops" for the 2009 season. The New York Agricultural Statistics Service gratefully acknowledges the weekly cooperation of the Agricultural Weather Information Service, Inc., National Weather Service personnel, Agricultural Extension agents, FSA representatives, and independent volunteer observers who collectively make this report possible.

Temperatures averaged above normal for the week in nearly all regions of the state by as much as 5 degrees at Binghamton and Elmira. Growing Degree accumulations dwindled as temperatures dropped and ended up being below normal for the season in most areas. Precipitation ranged from 0.26 inches in Elmira to 2.92 inches in Glens Falls. Most areas received above normal amounts for the week. Totals for the season were above normal in all but a few areas by as much as 8.48 inches.

Questions or Comments about the New York Berry News?

Ms. Cathy Heidenreich
NYSAES Cornell, 630 W. North Street, Geneva, NY 14456
Phone: 315-787-2367 Email: mcm4@cornell.edu

Editor's Note: We are happy to have you reprint from the NYBN. Please cite the source when reprinting. In addition, we request you send a courtesy [E-mail](#) indicating NYBN volume, issue, and title, and reference citation for the reprint. Thank you.

Check out the NYSAES Tree Fruit and Berry Pathology web site at: www.nysaes.cornell.edu/pp/extension/tfabp

**Cornell University provides equal program and employment opportunity.*

**WEATHER REPORTS OF TEMPERATURES AND PRECIPITATION THROUGHOUT
NEW YORK STATE FOR WEEK ENDING SUNDAY 8:00am, October 18th, 2009**

	Temperature				Growing Degree Days (Base 50)			Precipitation (inches)			
	High	Low	Avg	DFN ¹	Week	YTD ²	DFN	Week	DFN	YTD	DFN
	Hudson Valley										
Albany	56	28	41	-10	0	2553	64	0.25	-0.38	26.45	5.21
Glens Falls	56	24	39	-10	0	2131	-11	0.24	-0.39	23.94	2.85
Poughkeepsie	63	29	44	-8	0	2712	82	0.25	-0.41	30.26	5.94
Mohawk Valley											
Utica	48	23	35	-11	0	1521	-146	0.15	-0.83	31.07	0.52
Champlain Valley											
Plattsburgh	53	23	38	-10	0	2037	-134	0.36	-0.20	21.29	0.81
St. Lawrence Valley											
Canton	50	24	36	-11	0	1878	-75	0.27	-0.43	23.50	1.10
Massena	51	22	37	-11	0	2094	58	0.13	-0.50	21.40	1.03
Great Lakes											
Buffalo	51	32	40	-12	0	2424	-5	0.07	-0.60	25.69	3.65
Colden	49	28	37	-13	0	1854	-101	0.20	-0.62	24.92	-1.12
Niagara Falls	52	29	40	-12	0	2417	-18	0.04	-0.56	23.68	2.18
Rochester	50	28	40	-12	0	2286	-74	0.06	-0.45	20.91	2.11
Watertown	51	23	37	-12	0	2076	59	0.05	-0.52	18.76	0.83
Central Lakes											
Dansville	50	28	37	-15	0	2335	-28	0.56	0.00	18.73	-1.98
Geneva	51	28	39	-12	0	2245	-89	0.14	-0.49	20.15	-0.42
Honeoye	50	27	38	-15	0	2166	-302	0.20	-0.43	24.88	4.52
Ithaca	52	28	38	-12	0	2014	-89	0.31	-0.43	22.90	0.54
Penn Yan	52	27	40	-11	0	2395	61	0.19	-0.44	17.83	-2.74
Syracuse	53	30	41	-11	0	2544	166	0.19	-0.51	20.95	-2.44
Warsaw	46	27	35	-13	0	1792	6	0.40	-0.32	28.27	3.88
Western Plateau											
Alfred	50	29	37	-11	0	1676	-88	0.70	0.05	25.62	2.70
Elmira	54	25	40	-10	0	2236	17	0.02	-0.61	15.88	-4.90
Franklinville	47	27	36	-12	0	1712	93	0.53	-0.30	30.29	5.47
Sinclairville	49	30	37	-11	0	2003	169	0.66	-0.23	29.75	1.91
Eastern Plateau											
Binghamton	52	30	38	-11	0	2168	31	0.30	-0.33	23.89	1.95
Cobleskill	53	24	37	-13	0	1991	3	0.22	-0.44	24.92	1.27
Morrisville	49	32	40	-9	0	1885	-2	0.49	-0.27	28.67	4.69
Norwich	54	27	38	-11	0	1967	-18	0.35	-0.35	31.20	7.61
Oneonta	54	38	38	-10	0	2038	219	0.20	-0.54	24.38	-0.74
Coastal											
Bridgehampton	65	38	48	-6	6	2676	123	1.46	0.73	28.68	5.54
New York	65	39	50	-8	14	3510	101	0.81	0.18	29.79	5.72

1. Departure from Normal

2. Year to Date: Season accumulations are for April 1st to date. Weekly accumulations are through 7:00 AM Sunday Morning

The information contained in this weekly release is obtained in cooperation with Cornell Cooperative Extension, USDA Farm Service Agency, the National Weather Service, Agricultural Weather Information Service and other knowledgeable persons associated with New York agriculture. Their cooperation is greatly appreciated. Visit our website at www.nass.usda.gov/ny and click on "subscribe to ny reports" for instructions on subscribing electronically. you may also visit our website to access all our reports which are available for free online.

**WEATHER REPORTS OF TEMPERATURES AND PRECIPITATION THROUGHOUT
NEW YORK STATE FOR WEEK ENDING SUNDAY 8:00am, October 25th, 2009**

	Temperature				Growing Degree Days (Base 50)			Precipitation (inches)			
	High	Low	Avg	DFN ¹	Week	YTD ²	DFN	Week	DFN	YTD	DFN
	Hudson Valley										
Albany	74	24	48	0	14	2567	65	1.82	1.19	28.27	6.40
Glens Falls	70	22	46	1	6	2137	-12	2.92	2.26	26.86	5.11
Poughkeepsie	77	26	49	0	22	2734	88	1.69	0.99	31.95	6.93
Mohawk Valley											
Utica	57	26	44	0	1	1522	-152	2.04	1.03	33.11	1.55
Champlain Valley											
Plattsburgh	57	26	45	-2	1	2038	-140	1.27	0.68	22.56	1.49
St. Lawrence Valley											
Canton	60	22	44	-2	3	1881	-79	1.39	0.69	24.89	1.79
Massena	66	21	46	2	12	2106	63	1.55	0.93	22.95	1.96
Great Lakes											
Buffalo	61	30	51	3	18	2442	-2	1.22	0.52	26.91	4.17
Colden	66	26	48	3	13	1867	-99	0.90	0.06	25.82	-1.06
Niagara Falls	62	27	51	3	23	2440	-13	0.66	0.03	24.34	2.21
Rochester	66	27	51	3	23	2309	-68	0.64	0.08	21.55	2.19
Watertown	68	18	49	3	14	2090	63	1.20	0.57	19.96	1.40
Central Lakes											
Dansville	67	26	50	2	21	2358	-22	0.73	0.17	19.42	-1.85
Geneva	70	30	50	3	24	2269	-80	0.57	-0.06	20.72	-0.48
Honeoye	70	26	50	1	23	2189	-298	0.43	-0.20	25.31	4.32
Ithaca	68	23	49	2	17	2031	-85	0.51	-0.19	23.41	0.35
Penn Yan	68	28	51	4	24	2419	70	0.52	-0.11	18.35	-2.85
Syracuse	67	28	51	3	16	2560	165	0.99	0.29	21.94	-2.15
Warsaw	64	27	48	3	12	1804	10	0.89	0.14	29.16	4.02
Western Plateau											
Alfred	66	25	49	4	15	1691	-82	0.74	0.11	26.36	2.81
Elmira	69	23	51	5	26	2262	30	0.26	-0.37	16.14	-5.27
Franklinville	66	21	47	4	12	1724	98	0.62	-0.16	30.91	5.31
Sinclairville	67	24	49	4	16	2019	176	0.68	-0.23	30.43	1.68
Eastern Plateau											
Binghamton	67	31	51	5	21	2189	42	1.61	0.98	25.50	2.93
Cobleskill	73	26	46	1	8	1999	2	1.87	1.21	26.79	2.48
Morrisville	66	33	49	4	12	1897	3	0.73	0.00	29.40	4.69
Norwich	68	23	48	3	12	1979	-13	1.58	0.87	32.78	8.48
Oneonta	70	26	48	3	12	2050	223	2.67	1.90	27.05	1.16
Coastal											
Bridgehampton	69	32	52	0	28	2704	126	2.14	1.35	30.82	6.89
New York	76	41	57	3	61	3571	121	1.62	0.92	31.41	6.64

1. Departure from Normal

2. Year to Date: Season accumulations are for April 1st to date. Weekly accumulations are through 7:00 AM Sunday Morning.

The information contained in this weekly release is obtained in cooperation with Cornell Cooperative Extension, USDA Farm Service Agency, the National Weather Service, Agricultural Weather Information Service and other knowledgeable persons associated with New York agriculture. Their cooperation is greatly appreciated. Visit our website at www.nass.usda.gov/ny and click on "subscribe to ny reports" for instructions on subscribing electronically. you may also visit our website to access all our reports which are available for free online.