

NIFA Clips

[USDA grants assist small farmers who are making a big impact on agriculture](#)

(USDA, 4/30) (Blog by NIFA's Jennifer Martin) Farming and ranching is not a one-size-fits-all approach. Agriculture in the United States is a mixing bowl of diversity, and it's most evident when comparing large- and small-scale farming operations. Having grown up on a small, family farm in Iowa, I saw first-hand not only how important our small farmers and ranchers are to the nation, but also the challenges they face daily.

[USDA awards \\$6 million in grants to 10 schools to study climate change](#)

(USAToday, 4/30) When it comes to finding money to study climate change, 10 universities are getting warmer. Last week, the U.S. Department of Agriculture [announced](#) \$6 million in grants for 10 schools to address the impact of climate change, and the winning colleges will quickly be getting to work. The USDA's National Institute of Food and Agriculture has given out grants like these each year since 2009.

[Frog eggs help MU researchers find new information on grapevine disease \(e!](#)

Science News, 4/30) Research has shown that grapevines are susceptible to powdery mildew, a plant disease, which contributes to significant crop loss for most commercial wine varieties. Now, researchers at the University of Missouri have used frog eggs to determine the cause of this disease, and have found that a specific gene in the varietal Cabernet Sauvignon, contributes to its susceptibility. The study was funded by grants from the USDA National Institute of Food and Agriculture and was published in the journal *Plant and Cell Physiology*.

[High Plains ranch practicum takes applications for classes in Laramie, Riverton,](#)

Kimball (County 10, 4/30) A national award-winning livestock extension program is again being offered for 2014-2015 beginning in June and ending in January. The High Plains Ranch Practicum School is an in-depth, ranch management school hosted jointly by University of Nebraska-Lincoln Extension and University of Wyoming Extension. Producer participants completing course requirements can receive a 50-percent tuition scholarship support through a USDA National Institute of Food and Agriculture Beginning Farmer and Rancher Development Program grant.

[Hunterdon cow-breeding program changed the nation \(NJ.com/5/1\)](#) It's no longer just "cows and cooking," as the 100th anniversary of the Cooperative Extension System approaches. While originally the role of county agricultural agents and the 4-H program was helping farmers and rural youth, the system's work is much different. The county is celebrating the anniversary of the 1914 federal Smith Lever Act, which funded outreach endeavors at Rutgers and other land-grant universities through vocational, agricultural, and home demonstration programs in rural America.

[Food security increased by new scientific model in agricultural production](#)

(EurekAlert, 5/5) Is it possible to optimize production across a much bigger area—say, the whole East Coast of the United States? That's the question a team of USDA-ARS scientists in Beltsville, MD, has begun to tackle by developing a sophisticated new modeling tool. The research is part of a much larger effort called "Enhancing Food Security in the Northeast with Regional Food Systems" (EFSNE) led by Penn State University and funded by the National Institute for Food and Agriculture.

[NIFA awards \\$500,000 to Vermont Law for farmers' market project \(Rutland](#)

Herald, 5/5) The National Institute of Food and Agriculture has awarded the Center for

Agriculture and Food Systems at Vermont Law School and the Northeast Organic Farming Association of Vermont a \$500,000 grant to strengthen farmers' market organizations through legal education. The integrated research and extension project is designed to build stronger market organizations by developing a legal resources toolkit for market organizers and educating them on complex legal issues facing farmers' markets.

[Strawberry fields forever: Compact weather station feeds farmers direct info for fighting diseases \(Times and Democrat, 5/5\)](#) "Deciding when to spray fungicides is not always an easy call," Clemson Extension agent Powell Smith said. "You don't want to spray unnecessarily, but you don't want to let the problem go untreated either. The better information the farmer has, the better decision he can make." The fields themselves can provide much of that information – if they're equipped to do so. That's why Smith engaged the help of strawberry farmer Mike Keisler in a research project that stretches from Lexington across the Southeast. Keisler allowed Clemson scientists to erect a compact weather station perched atop a metal post in one of his fields. "Mike donated one acre to spray based on what the weather station tells him. The rest of the field he sprays as he always has," Smith said. In a year in which he would have made 14 fungicide applications, the research plot required only four. The research is part of a regional project based at the University of Florida and funded by a USDA National Institute of Food and Agriculture grant.

[Farming opportunities sprout at the Upper Peninsula Research and Extension Center \(Michigan State University, 5/5\)](#) Demand for local food has grown throughout the nation, but in remote regions, such as Michigan's Upper Peninsula, sourcing fresh, nutrient-rich food is challenging. However, growing conditions in extreme northern climates can be tempered through use of hoopouses and other season-extension technologies. In order to meet this demand for local produce that currently far outweighs the supply, Michigan State University is working on more than just growing food; they are also growing farmers that can eventually supply the local food system. Launch of this project is supported by the [USDA National Institute of Food and Agriculture's \(NIFA\) Agriculture and Food Research Initiative's \(AFRI\) Foundational Grant program](#).

[Mealtime TV viewing during pregnancy may set stage for childhood obesity \(EurekAlert, 5/6\)](#) Researchers found that pregnant women who watched television while eating were more likely to sit in front of the TV while feeding their infant. TV watching during meals is discouraged because it is associated with poorer quality diet, and mothers pay less attention to whether their children are full. This study was supported by a grant from the Agriculture and Food Research Initiative, USDA National Institute of Food and Agriculture.

[Getting geeky at the 3rd annual USA Science and Engineering Festival \(USDA, 5/6\)](#) When you think of agriculture do you think of science and engineering? You should! Farmers are some of our original scientists, tinkering with plant varieties and farming techniques to find ways to reliably grow food. At USDA, we still do that kind of research in a never-ending effort to find better ways to produce food, fuel, and fiber. We also do a lot of research you might not think.

[USDA announces funding for Biodiesel Fuel Education Program \(NIFA, 5/6\)](#) (NIFA press release) The U.S. Department of Agriculture's (USDA) National Institute of Food and Agriculture (NIFA) today announced the availability of almost \$1 million in grant funding to programs that educate consumers about the benefits of biodiesel fuel use. The funding is made available through the Agricultural Act of 2014 (Farm Bill).

LCC grads move on to prestigious internships (Laredo Sun, 5/6) Summer might spell vacation for many students across Texas, but for several Laredo Community College graduates, this summer will include traveling abroad and interning with various United States Department of Agriculture (USDA) agencies. As recipients of the Texas State University and LCC's USDA Food Safety and Agroterrorism Training: Educating our Future Workforce (FATE) grant, these LCC graduates transferred to Texas State University to complete a degree in agriculture or related sciences in order to gain the necessary training for employment with a USDA agency upon graduation. Support for the grant is provided by a Hispanic-Serving Institutions (HIS) grant funded by the USDA-National Institute of Food and Agriculture (NIFA).

Lake Joy teacher honored for agricultural education (The Telegraph, 5/7) A Lake Joy Elementary School teacher is one of five educators nationwide chosen for an Excellence in Teaching about Agriculture Award. The award is from the U.S. Department of Agriculture Institute of Food and Agriculture and the National Agriculture in the Classroom Consortium. Peavy uses a worm bed, water cycle bracelets and garden in a glove as some of his agricultural learning tools.

Sec. Vilsack outlines more progress on farm bill implementation (AgriPulse, 5/7) Agriculture Secretary Tom Vilsack told members of the Senate Committee on Agriculture, Nutrition and Forestry today that his team has made new progress on implementing every title of the new 2014 farm bill. USDA noted that, after the 2008 Farm Bill passed, it took over one year to set up disaster assistance programs. In 2014, it took under 10 weeks to reboot many of the same disaster programs that had been allowed to expire, along with modifications approved in the Agricultural Act of 2014. As of May 1, 2014, approximately 33,000 applications have been received and \$16.3 million in payments has been disbursed. Progress to date on all of the farm bill titles includes: TITLE IV - Nutrition Programs – Community Food Projects: On February 27, 2014, the National Institute of Food and Agriculture (NIFA) released a Notice of Funding Availability for the Community Food Projects Competitive Grants Program, with \$5 million available.

Area women participate in farm management seminar (Vinton Today, 5/7) Women are the heart of the family farm and often play an important communication and planning role in farm transitions. Recognizing this, the Annie's Project team at Iowa State University Extension and Outreach collaborated with educators from across the country to develop a new course for farm women of all ages on the topic of farm transition. The Managing for Today and Tomorrow courses in Iowa are partially supported by Farm Credit Services of America and the USDA Beginning Farmer and Rancher Development Program of the National Institute of Food and Agriculture.

Climate change effecting nutrient content of staple crops (Jagranjosh, 5/8) Scientists on 7 May warned that rise in the level of Carbon Dioxide (CO₂) will badly hit the nutritional value of key cereals like wheat and rice. The warning was issued after conducting experiments by simulating conditions expected by mid-century. Researchers at Harvard University reported decline of two important nutrients namely Zinc and Iron in wheat, rice, soybeans and field peas, which were grown in open-air fields where the scientists created CO₂ concentrations at the level as forecasted for the Earth by roughly 2050 about 550 parts per million. Support for the study was provided, in part, by the National Institute of Food and Agriculture.

Feds: S.C. State can't borrow from 1890; another option exists for \$6 million (Times and Democrat, 5/8) The U.S. Department of Agriculture says it won't allow South Carolina State University to borrow \$6 million from its 1890 program to meet its most

pressing bills. USDA's National Institute of Food and Agriculture (NIFA) has reviewed the university's request and determined that the 1890 program's funds, "may not be used to offset the current cash deficit or serve as a source of loan funds to satisfy SCSU financial obligations." NIFA states that the funds "can only be used to support continuing agricultural and forestry extension activities at eligible institutions and for contributing to the retirement of employees."

Study of food safety practices for fresh produce at farmers markets (PhysOrg, 5/9) Improvement of food safety practices by fresh produce vendors at farmers markets is the goal of a major research project being led by the University of Arkansas System Division of Agriculture. One expected result of the work is development of web- and smartphone-accessible food safety materials for market vendors, managers and consumers. The \$414,185 project is a three-year effort supported by a competitive grant award from the U.S. Department of Agriculture's National Institute for Food and Agriculture.

Extension grows here: The national STEM crisis (Lincoln Times-News, 5/9) The new buzzword across education and the nation is STEM. STEM is an acronym for Science Technology Engineering and Math. In 2008, a goal was set by 4-H National Headquarters, National Institute of Food and Agriculture, United States Department of Agriculture, Cooperative Extension System and the National 4-H Council, "One Million New Scientists. One Million New Ideas." 4-H achieved this milestone in 2012 and has reached over 1.33 million children through 4-H science. Each year, over five million 4-H science projects are completed in plant and animal science, engineering and technology and environmental science and alternative energy.

Purdue studies weather impact on cover crops (Palladium-Item, 5/10) A team of Purdue University researchers is studying how cover crops and controlled water drainage might help agriculture become more resilient to weather and climate changes and long-term issues such as those reported in the third National Climate Assessment. The Purdue researchers are part of an effort of 10 land-grant universities, the U.S. Department of Agriculture's Agricultural Research Service and farmers in the upper Midwest studying ways to make corn-based cropping systems more resilient and sustainable. The project, known as the Sustainable Corn Project, is funded by the USDA's National Institute of Food and Agriculture.

USDA expanding release of parasitic wasp to combat citrus disease (USDA, 5/13) United States Agriculture Secretary Tom Vilsack today announced more than \$1.5 million in funding to expand bio-control efforts to fight Huanglongbing (HLB), also known as citrus greening. This action is the first designation of funds by the Huanglongbing Multi-agency Coordination Group (HLB MAC Group) since it was established by Vilsack in December. The Group includes representatives from USDA's Animal and Plant Health Inspection Service (APHIS), Agricultural Research Service (ARS), and National Institute of Food and Agriculture (NIFA), as well as State departments of agriculture and the citrus industry.

Grants further environmental policy research (Cornell Chronicle, 5/13) Biofuels tick many boxes off policymaker wish lists: energy security, environmental quality, improved farm incomes. But as ethanol has shown, they can also have unintended consequences on domestic and international economies by increasing demand – and prices – of former food crops such as corn. A \$499,998 grant from the U.S. Department of Agriculture's National Institute of Food and Agriculture – one of two awarded to Cornell as part of a \$12 million program – will allow researchers to delve deeper into the intricate interactions between crops and biofuel policies at home and abroad, and their implications for the international competitiveness of U.S. agriculture.

USDA offers more support for smaller operations (Iowa Farmer Today, 5/13) USDA has announced additional support and resources for farmers and ranchers with small and mid-sized operations. This is the second major USDA package this year in support of small and mid-sized producers. Efforts include awards, made by USDA's National Institute of Food and Agriculture (NIFA), that focus on developing models to assist small farmers in their decision making with respect to management strategies, new technologies, sustainability, competitiveness and viability. For example, the University of Illinois received \$495,000 to research risk mitigation participation strategies for small and mid-sized producers in the advanced biofuel industry.

Learn how to be a fish farmer (Hoosier Ag Today, 5/14) A new set of how-to videos that teach beginning aquaculturists the ins and outs of fish farming is now available online. The free, five-part video series offers an in-depth look at key issues in fish farming in a short, succinct, easy-to-understand format. It was produced by the Ohio Center for Aquaculture Research and Development at Ohio State University South Centers as part of its yearlong Aquaculture Boot Camp program. The videos were funded through a three-year grant from the U.S. Department of Agriculture's National Institute of Food and Agriculture. The grant also funded the aquaculture boot camp program.

Purdue team aims to increase agricultural resilience amid climate change (AgriNews, 5/14) A team of Purdue University researchers is studying how cover crops and controlled drainage of water might help agriculture become more resilient to the stresses of variable weather and climate as farmers adapt to long-term issues such as those reported in the third National Climate Assessment. The project, known as the Sustainable Corn Project, is funded by the USDA's National Institute of Food and Agriculture.

Four USDA grants advance regional food systems research at MSU (Farmers' Advance, 5/14) Researchers on staff and affiliated with the Michigan State University (MSU) Center for Regional Food Systems (CRFS) have been awarded four grants, totaling \$1.95 million, from the U.S. Department of Agriculture's National Institute of Food and Agriculture (NIFA). The grants, made through NIFA's Agriculture and Food Research Initiative, will support much-needed research on local and regional food systems in Michigan.

Survey reports fewer winter honeybee losses (PCT, 5/15) Total losses of managed honey bee colonies from all causes were 23.2 percent nationwide for the 2013-2014 winter, according to the annual survey conducted by the Bee Informed Partnership and the U.S. Department of Agriculture (USDA). This survey was funded in part by a grant from USDA's National Institute of Food and Agriculture, which also provides significant funding for the Bee Informed Partnership.

Insects for dinner? Potential tool in the toolkit to achieve global food security (USDA, 5/16) (Blog by NIFA Director Dr. Sonny Ramaswamy) As an entomologist, the notion of eating insects isn't new to me. However, for most Americans, the thought can make their stomachs churn. And yet, maybe seeing insects on their dinner plates is something Americans should get used to seeing. Insects have served as a human food source for tens of thousands of years and may be part of our toolkit in the future in helping solve global food security challenges.

Agriculture experiment stations share work load (Daily Record, 5/19) While it might seem agricultural experimental stations like the Ohio Agricultural Research and Development Center are independent operators, there is actually an extensive network of cooperation and communication among the experimental stations across the

country. Leaders of the ag-focused experimental stations have established national priorities, among them profitability and food production, food safety and availability, improved nutrition, pest management, water quality and quantity, and communications and marketing.

[USDA grants to boost food production and improve food security \(Dairy Herd, 5/20\)](#) The U.S. Department of Agriculture's (USDA) National Institute of Food and Agriculture (NIFA) today announced \$6 million in grants to support research, education and Extension efforts to increase food security and improve food production.

[Termite genome lays roadmap for 'greener' control measures \(Purdue, 5/20\)](#) A team of international researchers has sequenced the genome of the Nevada dampwood termite, providing an inside look into the biology of the social insect and uncovering new genetic targets for pest control.

[Survey shows better results for pollinators \(AgriView, 5/20\)](#) A yearly survey of beekeepers shows fewer colony losses occurred in the U.S. during the winter of 2013-2014 than in recent years, but beekeepers say losses remain higher than the level that they consider to be sustainable. According to survey results, total losses of managed honey bee colonies from all causes were 23.2 percent nationwide. USDA personnel from 10 Department agencies, including the National Institute of Food and Agriculture, meet regularly to coordinate and evaluate efforts as USDA strives toward improving pollinator health and ensuring our pollinators continuing contributions to our nation's environment and food security.

[OTA annual policy conference to address key organic issues \(Gnomes 5/20\)](#) Key players in the North American organic industry will find a full plate of issues to digest when they gather in Washington, DC, for the Organic Trade Association's Annual Policy Conference on May 21. Secretary of Agriculture Tom Vilsack will speak to the conference on Wednesday and share his views about the future of organic and its role in American agriculture. Vilsack will be joined in attendance at the conference by officials from USDA agencies, including the National Institute of Food and Agriculture.

[K-State ag dean discusses how past trends dictate positive future \(Midwest Producer, 5/20\)](#) The College of Agriculture at Kansas State University has experienced significant growth in the number of undergraduate and graduate students, dollars invested in research and private fundraising compared to 10 years ago, and this growth has happened with fewer resources, faculty, staff, and K-State Research and Extension personnel, according to John Floros, dean of the College of Agriculture and director of K-State Research and Extension. K-State has earned 13 national or regional Excellence in College and University Teaching Awards from the National Institute of Food and Agriculture and Association of Public and Land-grant Universities, which is more than any other land-grant university in the nation.

[ISU to work on herbicide resistance strategies with USDA research grant \(KTIC, 5/20\)](#) An Iowa State University project on managing herbicide-resistant weeds is one of 12 grants to increase food security and improve food production announced this week by the U.S. Department of Agriculture's National Institute of Food and Agriculture (NIFA). The \$910,000 grant to ISU will work to develop and facilitate adoption of strategies that manage herbicide-resistant weeds in major crop systems.

[Cooperative Extension System: Trends and economic impacts on U.S. agriculture \(Choices Magazine, 1st Quarter 2014\)](#) To vitalize rural America and improve rural life,

the Morrill Act of 1862 and 1890 established land-grant universities and colleges (LGU) to educate citizens in agriculture, home economics, and other practical professions. Today, the USDA's National Institute of Food and Agriculture (NIFA) provides annual grants—including formula funds based on population-related formulas and funds for specific programs—to land-grant universities.

Helping honey bees' health (USDA, 5/23) You've probably heard that the honey bees in this country are in trouble, with about one-third of our managed colonies dying off every winter. As part of the current budget, USDA has requested \$25 million to establish the Pollinator and Pollinator Health (PPH) Innovation Institute. The PPH would be administered by the USDA's [National Institute of Food and Agriculture \(NIFA\)](#) and, with help from stakeholders, would be responsible for addressing the biological, environmental and management issues associated with the wide-spread decline of honey bees and other pollinators in our country. If established, the PPH will support the activities already identified in the joint USDA-Environmental Protection Agency action plan and build on current pollinator research and extension projects.