



Jennie Huntrods, a graduate student in the Auburn College of Agriculture's rural sociology program, has been raising puppies for Leader Dogs for the Blind for more than a year now and is currently training her second puppy, a golden retriever named Dinah. Her first puppy was a Labrador retriever and German shepherd cross named Cora.

Leader Dogs for the Blind, a not-for-profit organization, was established in 1939 by the Lions Club civic organization, which Huntrods is a member of. Although it is based in Rochester Hills, Mich., Huntrods says the organization provides guide dogs to those with disabilities in 49 states, seven provinces and 31 countries.

Huntrods says her desire to become a "puppy raiser" began after some of her friends began raising them. While unable to care for one at home, she began raising money to support the dogs that were being raised through Iowa prisons, which is another avenue through which Leader Dogs are trained.

Soon after she graduated from Iowa State University with a bachelor's degree in family and consumer sciences education and studies, Huntrods decided she had arrived at a point in her life that she could raise a puppy in her home.

Puppies are about 8 weeks old when their trainers receive them from the Leader Dogs organization. As is true with dogs raised as pets, these puppies receive training in housebreaking and basic obedience, good manners and socialization.

"These skills are the basic foundation all guide dogs must have before training in harness," Huntrods says.

In addition to these training methods, the Leader Dogs puppies also go everywhere their trainers go, to simulate what the guide dog might do in daily "work" situations. The puppies in training also wear a special training collar, leash and jacket to school, so everyone knows they are working.

"The dogs I train go with me to class, to the library, out to lunch and ride the Tiger Transit," Huntrods says. "I am grateful to Auburn University for allowing me to utilize campus facilities for training purposes."

Huntrods also takes the dogs shopping, to festivals and conferences, to church services and elsewhere that will aid in adapting to new situations.

Dogs in training do get some time off, and at the end of any day, they go for walks, play with toys and lie around the house.

Training a guide dog is not without adversity, however.

Puppies in training are cute, and Huntrods says when walking on campus, she is met with people who all want to pet Dinah, often without asking.

"When people pet the dog without asking permission, they are basically 'undoing' what I have been working for months to do-get the dog to ignore certain stimuli and focus on work," she says.

And, when the puppies are older and appear full grown, Huntrods notices that people she passes on the sidewalks and concourses think she has a disability and that the dog is helping her in some way.

"It's surprising how differently people on campus and in other public places treat me when



TRAINING LEADERS Cora, the black Lab mix at left, was the first pup College of Agriculture graduate student Jennie Huntrods trained through Leader Dogs for the Blind, a national not-for-profit that provides guide dogs to people who are blind and visually impaired. Cora has gone back to the organization for formal training as a guide dog, and Huntrods is about three months into training her second future leader dog, Dinah, a golden retriever, above. Volunteer puppy-raisers typically have their future leader dogs 12 to 15 months.

they think I have a disability," Huntrods says. "It has opened my eyes to the discrimination and challenges those with disabilities face."

Also, although businesses are OK with her coming in with a larger, 10- to 12-month-old puppy, they are less receptive of allowing a small, 15-week-old puppy into their stores. Huntrods says currently only two states grant access rights to Leader Dog puppies in training, and Alabama isn't one of them, so she does not have the legal right to go to businesses with the puppy without permission from the store and its owner.

In keeping with the puppy-raising theme, Huntrods decided to do something different this past year for Christmas: She sponsored a Leader Dogs puppy that is being raised in a prison in Fort Dodge, Iowa.

"After much thought, I concluded that no amount of sweaters, socks and CDs would change my loved ones' world," she says. "How-

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# ViewAGhill

As 2012 begins, I am looking for ways that the College of Agriculture and the Alabama Agriculture Experiment Station can contribute to economic development in Alabama. In the next several decades, it will be important that land-grant universities become the economic drivers of local growth through research and technology transfer. With this in mind, I am currently focused on state and federal funding and legislative issues for the college and AAES, which represents an investment in economic development.

Looking back over the past year, I am very thankful for a small increase in AAES funding provided by the state of Alabama for the current fiscal year. This needed relief after several years of budget



Speaker of the House Mike Hubbard, R-Auburn

cuts has provided bridge funding for several important programs, including the National Poultry Technology Center, which provides technology solutions to reduce operating costs of poultry farmers, and the Fish Farming Center located in Hale County, which provides technology solutions to make Alabama catfish farms more profitable. I am grateful to Speaker of the House Mike Hubbard for securing more than \$14 million in state matching funds needed for Auburn to construct the Center for Advanced Science, Innovation and Commerce building in Auburn's research park. This building will house research programs including genetics and genomics, bioenergy, food safety and water resources, all of which are important to Alabama's economic development. This center will allow researchers from across the university to work together to develop technology that will lead to new industries in Alabama. Under Speaker Hubbard's leadership, Alabama is doing its part to invest in programs that will lead to economic development in the state.

In January, we hosted a tour for the Alabama Senate's Agriculture, Conservation and Forestry Committee. I commend Senator Tom Whatley for bringing his committee to Auburn. We discussed issues such as the current immigration policy, development of an irrigation bill providing incentives for farmers to move to irrigation and conservation reserve policy land issues. Each of these issues was discussed in terms of their potential for economic development in Alabama. I commend our senators for taking time out to visit our campus and helping determine what can be done to increase economic development in Alabama.

This past year, we formed the Ag Hill Society, with the goal of providing direct support to the dean's office for functions that cannot be funded by state allocations. We were overwhelmed to have more than 60 members join this society since the summer of 2011. Members provide at least \$1,000 annually to support College of Agriculture functions, which include a variety of College of Agriculture projects and functions. We also look forward to growth in younger membership of the society as Auburn alumni who have graduated within 10 years can join for \$500. I am grateful to all of you for your support.



Bill Batchelor

DEAN, COLLEGE OF AGRICULTURE

DIRECTOR, ALABAMA AGRICULTURAL EXPERIMENT STATION

(RAISING HOPE, from page 1)

ever, to receive a Leader Dog would change the lives of both the prisoner who raises it and the visually impaired individual who receives it."

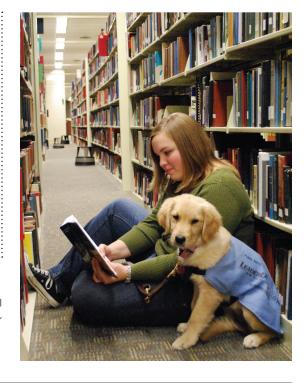
Huntrods and other volunteer trainers usually work with their dogs 12-15 months, and then the dogs return to the Leader Dogs campus in Michigan. Upon arrival there, the canines receive a full medical checkup to ensure they are healthy, have sound hips and joints and are spayed or neutered. Then the dogs are subdivided into groups of five to 10 and are trained to work using a harness.

Leader Dogs are given to those who need them, free of charge. They are approximately 16 months old when this happens.

While Leader Dogs training isn't for everybody, Huntrods says that those who are responsible and love dogs and can afford the financial commitment and balance a hectic schedule are the best candidates for this program.

To learn more about the Leader Dogs for the Blind program and raising or sponsoring a puppy, contact Huntrods at jjh0014@tigermail.auburn.edu or visit www.leaderdog.org. 🕊

**SIDE BY SIDE** Future leader dog Dinah sits obediently while Jennie Huntrods, a master's student in rural sociology, catches up on a reading assignment in the library between classes. As a trainer in the Leader Dogs for the Blind program, Huntrods is seldom seen without Dinah by her side.



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### Advancing Science

# Almost Like Being There

### **Virtual Field Trips Will Help Hort Students Learn Nursery Industry**

by JAMIE CREAMER

my Wright likes to travel as much as the next person, but 18 trips covering 43,000 miles with 42 stops in 22 states, all in less than a year and all while maintaining research and teaching responsibilities as a university faculty member, would have been enough to make even the most ardent road warrior road weary.

So, yes, the Auburn University horticulture associate professor did breathe the proverbial sigh of relief back in October when she and a team of collaborators wrapped up a grueling 11-month working tour of some of the most innovative and influential nursery operations in the nation.

Their mission: to film a myriad of liveas-they're-happening production practices on location at nurseries across the country and then edit that footage into a series of "virtual field trips" that horticulture faculty at universities nationwide can incorporate into their classroom lectures in lieu of traditional nursery visits.

"Nursery field trips are extremely beneficial in preparing students for careers in nursery management and production because they give the students the chance to actually see the concepts they're learning about in class being carried out in day-to-day nursery operations," Wright says.

The problem, she says, is that a growing number of horticulture instructors, faced with logistical challenges and, especially, budget constraints, are phasing out those valuable class outings.

"Funding issues are forcing many colleges and universities to revamp their horticulture programs and merge nursery management in with greenhouse management or other courses, and faculty are realizing they don't have the time or resources for comprehensive field trips," Wright says.

Thus was born the idea for "Creating Virtual Nursery Trips to Improve On-Campus and Distance Education in Nursery Production," a three-year project in which Wright has teamed with Auburn horticulture professor Ken Tilt, University of Arkansas Cooperative Extension horticulturist Jim Robbins and Texas A&M University Extension horticulture specialist Mengmeng Gu to deepen horticulture students' understanding of key aspects of nursery production and technology and, ultimately, to ensure the growth and profitability of the U.S. nursery industry into the future.

The video project is supported by a \$307,000-plus award from the USDA's Higher Education Challenge Grants Program, which funds efforts aimed at developing ingenious solutions to significant educational needs at the state, national or international level. Wright and company had established the need for their endeavor in 2009 with an online survey of 97 nursery production instructors around the country that confirmed shifts in traditional horticulture courses such as nursery



BIRD'S-EYE VIEW Kevin Quinn, videographer with the Arkansas Cooperative Extension System, shoots footage inside a cold-storage unit at Bailey Farms in Minnesota in November 2011 as part of a three-year federally funded project led by Auburn horticulture associate professor Amy Wright. Wright and collaborators are producing a series of virtual nursery tours that, by fall, horticulture professors nationwide can access online and incorporate into their nursery management and production classes

management and production and indicated faculty would be receptive to supplementing their lectures and labs with quality videos filmed on site at premier nurseries.

Year one of the effort was all about capturing the footage of each specific production activity at each particular nursery on the four academics' detailed outline. Arkansas Extension videographer Kevin Quinn was the cameraman at all 42 nursery



THE HAPPY TRAVELERS Four university horticulture experts and a videographer on a mission to create online virtual nursery tours that will enhance horticulture students' understanding of nursery production pause for a group photo while visiting Martin's Nursery in Semmes last July. The team, which logged 43,000 miles and filmed 42 nursery operations in 22 states, includes, from left, Texas A&M University Extension horticulture specialist Mengmeng Gu, University of Arkansas Cooperative Extension horticulturist Jim Robbins, Arkansas Extension videographer Kevin Quinn, Auburn horticulture associate professor and project leader Amy Wright and Ken Tilt, a veteran professor in Auburn's Department of Horticulture

operations, which were scattered from central Florida westward to Texas and California, then up to Olympia, Wash., and over to Hartford, Conn.

Wright says the innovative production techniques and technologies she and her colleagues witnessed as they toured—one nursery was using robots to move plants, for instance—were exciting, but the year of travel was not what she'd call fun.

"It was cool to see all the different parts of the country and how all these nurseries were operating, but it was hard work," says Wright. "On every trip we took, we stopped at several nurseries. The longest we were out at one stretch was five nights, with stops in Connecticut, Delaware, New Jersey, Pennsylvania and Virginia."

With all the travel and tension, did the crew members ever grow weary of each other?

"Yes," Wright says. No further comment

Once the final segment was recorded, the group began year two of the project and the unenviable task of editing miles of footageor, in digital-technology terms, 60 hours and 240GBs' worth of high-definition video at 1920x1080 resolution—into a usable format.

"The editing process is very tedious, especially

when you're communicating with each other mostly through emails, but we're getting there," Wright says. "The finished products will be professionally narrated DVDs and a series of downloadable video podcasts and Web-based streaming videos that are organized by the major topics in nursery production and arranged so that instructors can choose the specific segments they want to incorporate into their classes."

All videos will be available to faculty, free of charge, by fall semester 2012, Wright says. Auburn will host the video website; instructors anywhere can request a password to access the videos for use as they see fit. Wright does note, however, that these resources are not intended as substitutes for classroom lectures.

"These will be supplemental resources that should help students gain a deeper understanding of what the industry is about," she says. "And instructors will learn some things, too."

As an added bonus, the videos will include company profiles of all 42 nursery operations featured in the videos.

"The nurseries were amazing," Wright says. "They knew in advance when we were coming and were so supportive of what we were doing, because they realize that how prepared and knowledgeable our graduates are directly impacts their future success."

Year three of the project will focus on evaluations of the videos by both instructors and students and adjustments and fine-tuning of the videos based on comments and suggestions.

Horticulture instructors at any university or college interested in learning more about the nursery management and production videos can contact Wright at wrigham@auburn.edu. 😘

#### Returning Home

# Rediscovering Heritage

# Family History a Source of Strength for Sandy Pouncey by KATIE JACKSON

hen Sandy Pouncey was growing up in the Mobile County community of Eight Mile, her family harbored a long-kept secret.

Today, that secret is a point of pride and source

Today, that secret is a point of pride and source of strength for Pouncey, who recently retired as an information technology specialist for the College of Agriculture and Alabama Cooperative Extension System.

Pouncey's great-grandfather was a Kentucky-born Cherokee Indian who walked the Trail of Tears to a Missouri reservation where he met and married Olivia Emery.

At some point the couple with their eight children "jumped the reservation," ending up in Arkansas and later in Alabama's Washington County, and it was somewhere along the covered-wagon trip from Arkansas to Alabama that Olivia instigated a necessary deceit. She convinced her children that they were not Indians to protect them from discrimination and retribution.

"Up until 1964 when Lyndon Johnson signed the Civil Rights Act, if you were a Native American and it was known, the government had the right to take all you had and send you back to the reservation," Pouncey says.

So, for the next three generations, Pouncey's family kept its Cherokee heritage under wraps. By the time Pouncey, who is one-quarter Cherokee, was born, the family didn't have to hide its Cherokee roots, but all were far removed from the traditional ways and teachings.

"My grandma taught us a lot of stuff, but we learned odd things from her," Pouncey says, things like a fig tree won't bear fruit if it's planted in an open field. "She knew things, but she didn't know why she knew them."

While the family didn't have access to Native American ceremonies and spirituality, Pouncey did get a full immersion in Christianity through a childhood spent in an Assembly of God church and through exploring other protestant religions during her first and second marriages.

When her second marriage ended in 1986, Pouncey was living in the east-central Alabama community of Beulah, the single mother of two young boys and sorely in need of emotional support and faith and she began searching for her true spiritual home.

She began exploring her Native American roots and discovered the Free Cherokee, an organization founded to reconnect Native Americans whose culture and connections had been lost so many generations before. Pouncey set off on a vision quest, spending three chilly fall days and nights on a mountain in Brevard, N.C., with nothing but water and a sleeping bag.

On the second day of her quest, thousands of small birds—chickadees, finches and titmice—had gathered in the woods around her. "They were all flitting around in the trees, but they weren't singing," she recalls. The next day, the birds returned. "This time they were tearing up the woods out there singing and chirping, chirping, chirping."

Not long after Pouncey came off the mountain, she became chief of the Free Cherokee's Bird Clan, one of six bands, clans or councils that are part of the Free Cherokee organization. And it was during that first vision quest that Pouncey also found her Cherokee name, Red Arrow, which has since evolved into Chief Mama Red Arrow. "Half the tribe calls me Mama, even the ones way older than me, which I don't quite understand," she laughs.

Pouncey also found a desire to educate others about Native American culture and spiritual beliefs. She became involved in an interfaith group that brought together people from many diverse backgrounds—Buddhists, Christians, Muslims and others—to share information about spiritual beliefs with other members of the local community. Through that group she has visited every school in Lee County to help teach children about diverse cultures and beliefs as well.

Pouncey also helped Pete Dunaway, a Muskogee Creek Indian who is now retired from Auburn University's facilities division, establish the Auburn University American Indian Association and the Native American Festival, which is held each fall on the Auburn campus.

Through the years that Pouncey was rediscovering her Cherokee connections, she was also raising her two boys—Chuck and John Keahey—under difficult circumstances. Though she was the first person in her family to get a high-school degree, Pouncey had not gone to college herself and struggled to make ends meet.

Through a Job Training Partnership Act program, she landed a job in the College of Agriculture's Department of Agricultural Economics and Ru-



**DIVERSITY IN PRACTICE** Sandy Pouncey, a recently retired information technology specialist, has worked tirelessly, both on the Auburn campus and beyond, to promote awareness of her Native American culture and other diverse cultures. Ever since she rediscovered her own heritage, she has been passionate about sharing her story and learning more about the stories and lives of others.

ral Sociology as an administrative assistant in December of 1987 and, thanks to JTPA training, discovered that she loved computer work. As she learned more about computers, she soon found herself taking on more and more information technology duties in the college; however, her opportunities for promotions were limited by her lack of a formal education.

That's when her younger son, John, a 1997 graduate of Auburn's mechanical engineering program, and his wife, former Ag Ambassador Rachel Grimes, came to Pouncey with a request.

"They asked me to go back to school and get a degree," Pouncey says. "John paid for my books and tuition and would even call me on the phone and ask about my grades."

Thanks in no small part to the support of her family, Pouncey graduated from Southern Union Community College in 2000 with a degree in computer science and became a full-fledged member of the Computer Technology Unit that serves the College of Agriculture, Alabama Agricultural Experiment Station and Alabama Cooperative Extension System.

All the while that Pouncey was in school, she worked full time in the College of Ag, and she continued her efforts to enlighten people about Native American culture, both on campus and in area schools, a fact that was not lost on her bosses. In 2008, former College of Agriculture Dean Richard Guthrie established a new diversity committee for the college, and named Pouncey a college diversity committee member, and later co-chair of the committee.

Work on that committee and with others on campus has been extremely gratifying for Pouncey, though she believes there is still much work to be done in promoting diversity, both on campus and off.

"I think diversity programs should be about sharing," she says. "Not to make you believe what someone else does, but to help you understand why they are the way they are. You can still be the way you are, but just be respectful of others."

Raising awareness about Native American culture is also a struggle, one that Pouncey feels is made harder by the portrayals of Native Americans in movies, on television shows and in history books. But she hopes that the public at-large is gradually becoming more aware of what it means to be Native American.

"Being Native American does not have much to do with your blood anymore, since a lot of us are one-quarter or one-half Native American," she says. "It's about what is in your heart and how you walk on the earth and treat other people."

Not long after Pouncey was honored for her diversity efforts by the College of Agriculture, health problems caused her to take an early retirement from Auburn. However, despite the fact that her ability to get to schools and community meetings and talk about her culture and beliefs is now quite limited, she is not giving up.

"I am still a teacher and as long as my mouth works I will be a teacher," she says. "I guess the Creator has other plans for me, I just don't know what they are, yet."

To learn more about Pouncey and her teachings go to www.facebook.com/#!/sandy.pouncey. 😘

#### **Faculty and Staff Accomplishments**

**Bill Batchelor**, dean of the College of Agriculture and director of the Alabama Agricultural Experiment Station, was recognized as one of 20 fellows of the Food Systems Leadership Institute during the 2011 annual meeting of the Association of Public and Land-Grant Universities.

**Nannan Liu**, Faculty Endowed Professor of entomology, received second-year funding totaling \$407,687 from the National Institutes of Health for her project, "Characterization of Sodium Channel Mutations Involved in Insecticide Resistance in the Mosquito."

**Ed Sikora**, professor and Extension specialist in plant pathology, received funding totaling \$330,550 from the United Soybean Board for his project, "Sentinel Plot Monitoring Program for Soybean Rust."

**Robert Taylor**, Alfa Eminent Scholar and professor of agricultural and resource policy in the Department of Agricultural Economics and Rural Sociology, was recently presented the President's Award "For Outstanding Service to American Family Farm and Ranch Agriculture, and for Leadership on Behalf of Competitive Markets" by the Nebraska Farmers Union.



Henry Fadamiro

Henry Fadamiro, Alumni Professor in the Department of Entomology and Plant Pathology, has been named Auburn University's Presidential Administrative Fellow for 2012 and will be working to develop a university-wide initiative to facilitate international programming on campus, with special focus on developing countries. The fellowship program is designed to help individual faculty members gain senior administrative experience while applying his or her faculty experience to issues and programs that impact a broad segment of the university community.

**Dale Coleman**, associate professor of animal sciences, was recognized with a regional Food and Agricultural Sciences Excellence in College and University's Teaching award during the Association of Public and Land-Grant Universities 124th annual meeting in November. Coleman won for his exceptional work as a teacher, adviser and mentor.



Patricia Curtis, professor of poultry science and director of the Auburn University Food Systems Initiative, is part of the Food and Drug Administration's Virtual Food Systems Training Consortium. To learn more and view a video related to her work, go to www.ag.auburn.edu/go/234.

Patricia Curtis

**Curtis Jolly**, chair of the Department of Agricultural Economics and Rural Sociology, Alumni Professor and the Charles W. Barkley Endowed Professor of Diversity, received the Outstanding Academic Alumnus award from the Department of Agricultural Economics at Louisiana State University in November.



**FEATURED AUTHORS** Deacue Fields, above left, associate professor and Extension economist, and Norbert Wilson, above right, associate professor, both in the Department of Agricultural Economics and Rural Sociology, and Extension economist Thomas Hall co-authored an article featured in the November/December 2011 issue of USDA's Rural Cooperatives publication. The article, "Keeping customers happy in farmer co-op stores," can be found at www.ag.auburn.edu/go/235, beginning on page 29.

#### **Student Accomplishments**

**Crystal Shank**, who graduated in December with a degree in horticulture, served as graduation marshal for the College of Agriculture in the fall 2011 commencement ceremony.



Clark Roper

**Clark Roper,** who graduated cum laude in December with a bachelor's degree in agricultural business and economics, received the Dean's Award, which is given to a high-achieving graduating senior who has demonstrated leadership and service in the College of Agriculture.

**Ting Li**, a Ph.D. student working under the direction of Auburn entomologist **Nannan Liu**, placed first in the student competition for the President's Prize during the Entomological Society of America's 2011 annual meeting in November.

**Waudell Tucker**, a senior in horticulture, was selected for the USDA Outlook Forum Student Diversity Program based on a submitted essay, "Agriculture as a Career."

**Scott Moore**, a doctoral student under the direction of plant pathology associate professor **Kathy Lawrence**, won the Graduate Student Achievement Award at the 30th anniversary meeting of the Alabama Cotton Commission in Prattville. Moore also works closely with faculty members Francisco Arriaga, Brenda Ortiz and Dale Monks, all in agronomy and soils, and Joe Kloepper in entomology and plant pathology.

The College of Agriculture has established a year-long research fellowship for undergraduate students in the College of Agriculture and biosystems engineering and environmental science. The fellowship will be for the period summer 2012 through spring 2013. More information is available at www. ag.auburn.edu/go/236.

An agreement signed Jan. 6 with Nha Trang University in Vietnam offers teaching opportunities and a source of new students for the Department of Agricultural Economics and Rural Sociology. The agreement will enhance international collaboration on academic program development and research in the areas of economics of aquaculture and fisheries for both institutions. To learn more, contact Joe Molnar molnjj@auburn.edu or 334-844-5615 or visit www.ag.auburn.edu/oia/.



**RAISING MONEY** The Mr. and Miss College of Agriculture philanthropy event, sponsored last fall by Ag Council, raised \$654.22 for the annual Beat Bama Food Drive. Winners included, from left, Daily Thomas, runner-up; Austin Vollenweider, Mr. CoA; Anna Adcock, Miss CoA; and Landria Curtis, runner-up.

#### Relevant Research

## Pigs Gone Wild

#### **Researchers Focus on Oral Contraceptive Vaccine To Control Invasive Species**

by JAMIE CREAMER

or Auburn University agricultural business alumnus David Pitchford, learning that researchers at his alma mater are well on their way to developing an oral contraceptive for wild pigs is cause for celebration.

"That's the most exciting thing I've heard in a long while," Pitchford says from his Henry County farm. "Right now, there is no feasible way to get rid of them. Something like that (the contraceptive) would be the only way to have an impact."

Pitchford speaks from experience. Since spying the first wild pig in a pasture on his southeast Alabama farm on Thanksgiving Day 2008, he has seen the population of the rooting, crop-ravaging animals explode, and neither shooting nor trapping puts a dent in it.

That's largely because wild pigs are extremely prolific yearround breeders that can reach sexual maturity as early as 6 months of age and from that point forward bear two litters of, on average, six piglets each a year. With a gestation period of 115 days—"three months, three weeks and three days," Pitchford says—a typical sow will have farrowed as many as two dozen piglets by age 2. The current wild pig population nationwide is estimated at 4 million, and counting.

Enter the multidisciplinary research team at Auburn and its quest for an inexpensive oral birth control method that is highly effective in blocking fertility in wild pigs but not in other animals, says study leader Tatiana Samoylova. The associate research professor in Auburn's College of Veterinary Medicine calls that "a species-specific immunocontraceptive."

"An immunocontraceptive works in the same way a vaccine does against a disease," Samoylova says. "In this case, it would stimulate the animal's own immune system to produce antibodies that interfere with certain events in the reproductive process.

"Current control programs that focus on wild pig eradication via trapping and shooting are expensive and ineffective," she says. "Contraceptive vaccines can, over time, significantly reduce populations to manageable numbers and are more acceptable means of population control to the general public."

In the project's first three years—funded by grants from the Alabama Farmers Federation, the AAES and the vet college—the scientists developed and tested multiple antigens that can lead to infertility in wild swine. In lab testing, the most promising proved to trigger the production of anti-sperm antibodies.

"Those antibodies potentially could interfere with sperm delivery or genital-tract functioning, resulting in contraceptive effects," Samoylova says.

Work on the project is ongoing, but Samoylova says new sources of funding will be necessary to continue with the next phases of the study, in which the researchers will focus on identifying a bait that is highly attractive to wild pigs, developing a commercially viable species-specific immunocontraceptive that can be delivered in that bait and conducting extensive field tests on the product.



SEEKING CONTROL Auburn scientist Tatiana Samoylova works in her lab at the College of Veterinary Medicine on an oral contraceptive that would be effective in wild pigs only and would help control the exploding population of the highly prolific, extremely destructive animals. The coarsely bristled creatures that damage livestock, crops, forests and native flora and fauna have invaded every Alabama county.

Samoylova's co-investigators in the project are College of Veterinary Medicine researchers Nancy Cox, Valery Petrenko and Skip Bartol and, from the School of Forestry and Wildlife Sciences, Steve Ditchkoff.

For the record, Ditchkoff says "wild pigs" is the preferred term among wildlife ecologists and is used to include both feral hogs, which actually are domesticated swine that have escaped captivity, and non-native wild boars that were first introduced into the U.S. from Eurasia in the early 1900s for sport hunting purposes. As an exotic species, wild pigs have no known natural predators here, a factor that exacerbates the wild pig problem.

And it is a problem, not only in Alabama, where the swine have bulldozed their way into all of the state's 67 counties, but in at least 43 other states.

For Pitchford and other Alabama farmers, these aggressive, highly intelligent and ever-ravenous creatures are a plague, causing an estimated \$44 million in crop losses statewide in 2009, mainly in corn and peanuts.

But the damage they inflict with their rooting, wallowing, trampling and gluttony extends far beyond the farm gate, to forests, water supplies, soils, turfgrass, native flora and fauna, reptiles, ground-nesting birds, young livestock and the overall environment. They also can transmit a number of serious diseases to livestock and to humans.

The use of immunocontraceptives as a nonlethal method for controlling the populations of nuisance or destructive wildlife species is not a brandnew concept. Such a vaccine has been approved for white-tailed deer, and, in addition, Samoylova and other scientists across the country are working on similar products for feral dogs and cats. Those vaccines, however, are not species-specific and must be injected into the animals. 😘

## 124 Years of AAES Pubs Now Available Digitally



THAT'S THE BREAKS Alabama Agricultural Experiment Station publications—like the bulletin from the Canebrake Experiment Station, which dates to 1889, and including publications produced in 2012—are now available online in the Auburn University Libraries digital collections. Subjects covered range from environmental topics to forage and field crops, from rural sociology issues to ornamental crops and fruits, nuts and vegetables.

Digital copies of 1,800-plus Alabama Agricultural Experiment Station publications dating from 1888 to the present are now available online through the Auburn University Libraries' digital collections repository in a searchable database that allows farmers, faculty, students, researchers and the general public to locate documents by topic, date, author, title or series.

The collection of bulletins, circulars, research reports, departmental series, quarterly publications and more can be found by going to http://repo.lib. auburn.edu/repo/ and clicking on the experiment station link under the heading "Communities in DSpace." A link to the online repository also can be found on the AAES website at www.aaes. auburn.edu/comm/pubs.

Claudine Jenda, agriculture librarian for the Auburn libraries system, says the AAES collection is a valuable resource, and not just for the wealth of agricultural information it contains.

"This collection tells the history of Alabama," Jenda says. "It is a record of research conducted by many key figures and agricultural leaders at Auburn and in the state, it details major events such as the destruction of cotton crops by the boll weevil and it also gives a snapshot of farm and rural life from as far back as the late 1800s."

Jenda says the searchable AAES digital collection is a work in progress, in that the 1,800 documents currently accessible are only the ones that have been scanned into the system to date. The collection ultimately will contain about 3,000 documents and also will be accessible through the USDA's National Agriculture Library, the Agriculture Network Information Center and Google search.

## **Study Will Help Farmers Make the Most of Climate Patterns**

by JAMIE CREAMER

Alabama farmers have grown all too familiar with El Niño and La Niña and the havoc the two climatic patterns can wreak on rainfall and temperature patterns and, subsequently, on profit margins in the Southeast, but an Auburn University agronomist is on a mission to show producers across the state that they can get an upper hand on the climate phenomena.

"What I want to do," says Brenda Ortiz, an Alabama Agricultural Experiment Station researcher and Extension agronomist in the Department of Agronomy and Soils, "is help characterize climate patterns in a way that farmers understand not only how these effects are likely to play out but also the best management practices they can follow to optimize their opportunities or reduce their risks during El Niño or La Niña phases."

To accomplish that, Ortiz is in her third year of collecting detailed weather, climate and production data from trial plots planted at four AAES research centers around the state to document the relationship between climatic conditions and crop growth, diseases and yield. To supplement that information, she is also analyzing historic yield data from variety trials Auburn has conducted through the years.

Specifically, the assistant professor of agronomy and soils is focusing on winter wheat, a crop typically under production during the times of year—fall through spring—when these patterns most impact Alabama's climate.

One thing evident from her research thus far is that in El Niño and La Niña years, the effects on rainfall totals and temperatures vary measurably from one part of the state to another.

"For example, during La Niña phases, from January to March, rainfall in south Alabama is significantly lower than in north Alabama, but the opposite is true in El Niño years," she says.

As part of her efforts, Ortiz is experimenting with different wheat varieties in the AAES research plots to identify the best climate information—based management practices for producers, mainly in terms of planting dates and variety selections.

"Our ultimate goal is to use the data to develop a highly interactive and accessible management tool farmers can use to identify the wheat varieties best

tailored to their locations, planting times and growing conditions based on whether El Niño patterns prevail, or La Niña," Ortiz says.

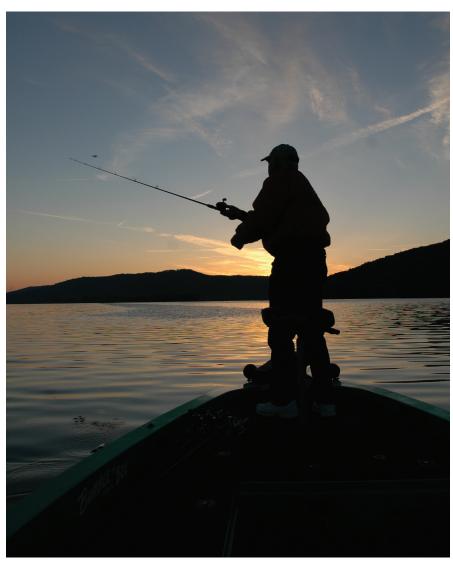
The resource will be part of a set of climate-based decision-support tools producers can access online at www.agroclimate.org. AgroClimate is a service of the multidisciplinary, multi-institutional Southeast Climate Consortium, a group that sponsors most of Ortiz's projects.



**CROPS AND CLIMATE** Brenda Ortiz, assistant professor in the College of Ag's agronomy and soils department, is putting several winter wheat varieties to the test in AAES research centers around Alabama as part of a project designed to help producers manage their crops more effectively based on climate conditions.

Ortiz also aims to incorporate into the best management practices information on reducing agriculture's water, carbon and nitrogen footprints and is working with scientists from several disciplines to development management recommendations that will help farmers deal with increased disease and insect pressures that often accompany climate patterns.

# Study Will Put Value on Lake's Lure for Anglers by JAMIE CREAMER



**THIS IS THE LIFE** A lone fisherman waits patiently for a nibble as the sun sets on Lake Guntersville, a body of water known among recreational and tournament anglers alike as one of the best bass fisheries in the world. Auburn researchers are conducting a study to determine the lake's economic impact locally, regionally and statewide. The photo was taken by Birmingham photographer Karim Shamsi-Basha and provided courtesy of the Jackson County Chamber of Commerce.

At 69,000 surface acres, Lake Guntersville is the largest reservoir in the state, and fishing—both recreational and tournament—is very big business. Just how great an economic impact angling has on Guntersville in Marshall County and Scottsboro in Jackson County is what Auburn researchers will determine in a new three-year study funded by the Alabama Department of Conservation and Natural Resources.

In the study, Terry Hanson, associate professor of aquaculture/fishery economics at Auburn, and fisheries research associate Steve Sammons will collect and analyze comprehensive data on recreational and competitive anglers' spending habits in Guntersville, Scottsboro and surrounding communities in terms of travel, food, lodging, permits, tackle, bait, equipment rental and more.

A mainstream impoundment on the Tennessee River, the 75-mile-long Lake Guntersville is located in Marshall and Jackson counties in Alabama, on up into Marion County in Tennessee, and is used for navigation, flood control, hydropower and recreation, with fishing accounting for 65 percent of that recreational activity. Lake Guntersville is considered one of the best bass fisheries in the world, and that reputation has made it a popular site for largemouth-bass tournaments, but the multitude of anglers who fish for pleasure have a lot of luck with crappie, sunfish and catfish, too.

Hanson, an Alabama Ag Experiment Station researcher, says putting a dollar figure on fishing's contributions to local and state economies and their tax bases will provide valuable information to local governments, fishing agencies and associations and chambers of commerce and will be useful in policy development.

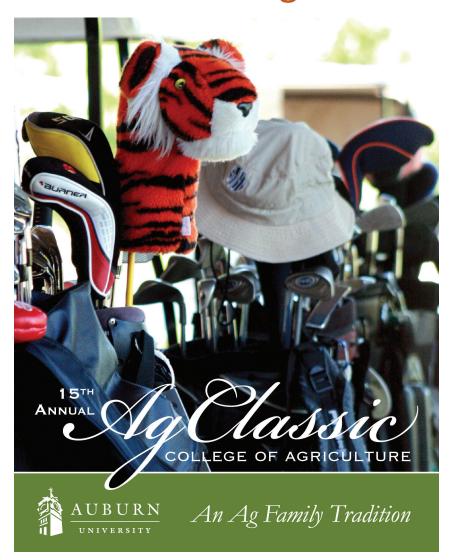
"Economic valuation of recreational fishing's impact will provide interested parties—such as local and state governments, chambers of commerce, the state conservation and natural resources agency and fishing associations—with an understanding of the current status of the fishery at Lake Guntersville, and they can use the information in policy development for the resource," he says.

Guntersville Mayor Bob Hembree seconds that.

"Fishing on Guntersville Lake is very important to our local economy, and having this information will be very beneficial," Hembree says. "We are working to promote our city as a destination, and the information will help us, our chamber and our county's convention and tourism bureau with our various efforts such as recruiting retail establishments, events and long-range planning."

The \$152,305 grant from the ADCNR's Division of Wildlife and Freshwater Fisheries is one of seven external grants totaling almost \$468,000 that Hanson was awarded in 2011.

### Save the Date for Ag Classic!



Join us May 2-3 for our 15th annual Ag Classic event.

Ag Classic is one the College of Agriculture's most popular events, providing an informal setting for alumni and friends to return to Auburn for fun and fellowship. In addition to the golf and fishing tournaments, Ag Classic events include a social hour, dinner and auction, proceeds from which help support student scholarships in the College of Agriculture and other programs and activities. Learn more at www.ag.auburn.edu/development/agclassic/.

#### **AAES Home to Two New Institutes**

On Friday, Feb. 3, the Auburn University Board of Trustees approved two new institutes that will be administered through the Alabama Agricultural Experiment Station.

One, the International Hunger Institute will provide the university with another tool to use in the fight against domestic and global hunger. The proposal from the College of Human Sciences was based on the college's ongoing relationship with the United Nations World Food Programme and the university's role as a land-, space- and sea-grant institution. College of Human Sciences Dean June Henton will serve as the institute's executive director and Harriett Giles, CHS's director of external affairs, will be the Institute's director of programming until funding is acquired to hire permanent staff.

The other, the Aquaculture and Fisheries Business Institute, is a collaboration between the College of Agriculture, Department of Fisheries and Allied Aquacultures and the College of Business. It will be led by three fisheries and allied aquacultures faculty members at Auburn—professor emeritus John Jensen and associate professors and Extension specialists Jesse Chappell and Terry Hanson. They will serve as part-time co-directors until a permanent part-time director is found.

More information on both institutes will be featured in the April/May issue of Ag Illustrated.

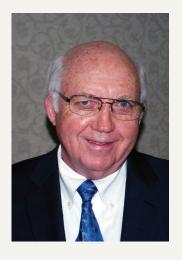
#### **In Memoriam**



Harold Edward Pate, 81, of Lowndesboro passed away Jan. 14 at his home. Pate, a College of Agriculture alumnus, was a leader in the beef industry, winning awards for his registered Charolais herd. He was a charter member of the Auburn Agricultural Alumni Association and, among his many honors, was inducted into the Alabama Agricultural Hall of Honor in 2010. Donations in his honor may be sent to Lowndesboro Baptist Church, P.O. Box 98, Lowndesboro, AL 36752.

## From the President

# Gilley Outlines Whos, Whats and Whys of Ag Alumni Association



Bill Gilley

Ever wondered what the Auburn University Agricultural Alumni Association is and what it does? President Bill Gilley provides an overview of its goals and projects.

The primary purpose of the Ag Alumni Association is to improve all fields of agriculture in the state of Alabama. The association does this by working with the College of Agriculture at Auburn University and by providing scholarships, val-

ued at up to \$26,500 annually, to Auburn University students.

The Ag Alumni Association is governed by a board of directors, comprised of a representative from each of the association's 18 districts statewide and from Tennessee, Mississippi, Georgia and Florida. The board meets four times a year, including at the annual meeting and awards banquet held each February. During the awards banquet, the Ag Alumni Association inducts three individuals into the Alabama Agriculture Hall of Honor and awards two Pioneer Awards posthumously to past leaders.

The Fall Roundup and Taste of Alabama Agriculture, the association's big fundraiser of the year, is held each fall at Ag Heritage Park prior to the homecoming football game. Ag Roundup, which begins in the morning prior to the game and continues until an hour before kickoff, provides fellowship activities for agricultural alumni and friends centered around food, exhibits, door prizes and an auction that funds scholarships.

The Ag Alumni Association also provides valuable assistance in recruiting students to the College of Agriculture and Auburn University and in distributing literature on ag-related careers. Members of the association assist with Career Days held across the state.

The Ag Alumni Association has been involved in the creation and construction of Ag Heritage Park. While much work has been accomplished at the park, one area still under development is the Dairy Barn and surrounding grounds. When this area is completed, it will be a place of pride for agricultural alumni and friends to meet, and it will offer classroom space and provide a multimedia area to showcase the past, present and future of Alabama agriculture. The Ag Alumni Association is helping raise funds for this project and will continue to play a role in the future development and use of Ag Heritage Park.

The Ag Alumni Association welcomes new members. You may become a life member or join as an annual member. For more information on membership, contact Elaine Rollo at 334-844-3204 or rollome@auburn.edu, or visit www.ag.auburn.edu/go/237.

Editor's Note: In this and future issues of Ag Illustrated, we will highlight each of the College of Agriculture's eight academic departments. For this installment, the Department of Poultry Science is in the spotlight.



# Poultry Science

### **From Farm Yards to Board Rooms**

#### **Backyard Beginnings**

What began at Alabama Polytechnic Institute in 1912 as a poultry husbandry course designed to help small family farmers do a better job of providing meat, eggs and egg money for their families laid the foundation for what is today, a century later, Alabama's leading agricultural industry.

Department Head - Don Conner

57 undergraduates

25 graduate students

16 faculty members

**Undergraduate Career Tracks:** 

Production

**Processing and Products** 

Pre-Veterinary Medicine

**Food Science** 

M.S. and Ph.D.

graduate degree programs

**Poultry Science** 

Food Science

According to Don Conner, head of the Auburn University Department of Poultry Science, the past 100 years have seen remarkable changes in how poultry products are produced. Auburn has been there each step of the way, helping make Alabama the third largest broiler-producing state in the nation and helping the state's poultry industry thrive, so much so that the industry's economic impact exceeds \$9 billion and now represents approximately 10 percent of the state's entire economy.

All that growth did not happen overnight for Alabama or for Auburn's poultry program, which was moved in its early years from agriculture to

home economics—a natural fit because, at the time, the women typically cared for most home flocks—and then back to agriculture.

A catalyst for the initial growth of poultry and egg industries in the United States was the national Cooperative Extension Service (now System), which in the 1920s began sponsoring egg-laying contests in each state to encourage small farmers and farm families to choose the right breeds, feeds and environments for their birds to maximize egg production.

"It was important for each state to do this because the birds that worked well in New York didn't necessarily work well in Alabama," Conner says.

As breed choices and bird care improved, so did production, and those families that once grew chickens for their own food and a little egg money began increasingly to sell meat and eggs to their urban neighbors. That, in turn, led to several advances in lighting and housing—many of which were developed by Auburn faculty—that furthered the concept of a poultry "industry."

#### Out of the Yard

"That moved us from the backyard flock into a more commercial enterprise," says Conner, a shift that was soon followed by the development of an integrated production and processing system, an approach that really took off in the mid-1940s.

"After World War II, the only folks who had money or access to money were the feed companies," says Conner. "Those companies, most of which were based in north Alabama, began giving birds to growers and letting them grow them, then settling with the growers once the birds were sold.

"That's when the broiler industry began to get a foothold in north Alabama and really take off," he adds.

However, it was not long before the industry ran into all kinds of disease and health problems, so in the 1960s and '70s, Auburn scientists shifted their focus to broiler health issues.

"That really put Auburn on the map from a health standpoint," Conner says, noting that, in his view, the department's greatest research accomplishment to date was the late Allen Edgar's development of a Coccidia parasite vaccine that is still used today.

The department continued to work on development of other vaccines as well, and, thanks in large part to that work, many of the diseases that devastated birds in the 1960s and 1970s are no longer an issue.

As health issues were resolved and consumer attention centered on issues such as food safety and quality and environmental concerns, the department redirected its focus yet again.

#### **Keeping Up with the Times**

"Through the years, our department has shifted our faculty expertise to help stay out in front of the industry to help them address the issues they will be facing," says Conner. And that collaboration continues today as the



industry faces new changes and challenges, such as food safety, environmental impact, feed and energy costs and product development. Auburn's poultry science department is on the forefront of addressing them.

A prime example: In 2010, the food science program, which had previously been housed in the College of Human Sciences, moved to the Department of Poultry Science.

To some, it may seem an unlikely pairing. To Conner, it makes a lot of sense.

"Having food science in our department fits with our continued evolution, and there is great potential for a lot of synergy between the two."

Synergy is certainly something Auburn has shared with the poultry industry. The department boasts a 100-percent job-placement rate for its graduates, and those graduates are not only getting hired, they are advancing rapidly in their jobs.

"If they apply what they have learned, they move up fast," Conner says, noting that a number of young Auburn graduates are already serving as complex managers, chief executive officers and vice presidents in the industry.

#### **Building for the Future**

Though Auburn is one of only six universities in the U.S. that has a poultry science department, and though demand for poultry science graduates far exceeds the supply, Conner is not complacent about the future.

He hopes to increase enrollment by showing nontraditional students the great opportunities available in the poultry and food industries, which is not always an easy task.

"We have to get around the stereotype that they are just going to grow chickens," he says. "We have to show them how dynamic the industry is."

Interestingly, half of the students enrolled in poultry science degree programs at Auburn are female, and many of those young women are choosing the production track. They seem to want to grow chickens like the generations of women before them. "Maybe we are coming full circle, but this time, women are becoming industry leaders," Conner says.

The department offers a wealth of scholarships—enough for every student currently enrolled in the department's degree tracks—and its award-winning Poultry Science Club that in 2010 was voted the best in the nation. It also offers ample opportunities for hands-on experience with birds and with the business of birds, including future plans for study-abroad opportunities.

There's also the new feed mill that is nearing completion near campus. That facility, which will be completed this summer, will offer amazing opportunities for students and all of Alabama's animal industries.

"Auburn's Poultry and Animal Nutrition Center will be a huge addition to our department and our college and will broaden our extension, research and teaching programs," Conner says, explaining that the feed mill was built with industry support and with industry needs in mind.

"I want U.S. poultry production to stay strong, and I want our department to do all it can to keep it strong, things like providing innovative ideas and research and producing high-quality students," says Conner.

Conner says the industry is doing a good job of looking toward the future. "They have to look at different ways to do things that will keep us strong—things like investing in leadership, technology and research," he says. "Universities like ours can help them do just that.

"We have always tried to make a difference in our state, and we will continue to do that," Conner says. "We are still growing chickens, but we are doing so much more."

For more information about the Department of Poultry Science, visit www.ag.auburn.edu/poul or call 334-844-4133.

#### College of Human Sciences

# CHS Boasts Nation's Best Interior Design Program, Hosts Hospitality Grad Student Conference

The undergraduate interior design program in Auburn University's Department of Consumer Affairs is the best in the nation, according to DesignIntelligence magazine's 2012 rankings.

For its annual survey of best architecture and design programs, DesignIntelligence asked 277 leading firms in the industries which institutions best prepare students for success in the profession. Based on interior design programs accredited by the Council for Interior Design Accreditation, Auburn was ranked number one in the nation, tying with the Savannah College of Art and Design for the top spot.

"Being ranked number one is a testament to the efforts that both faculty and students have made to ensure that our graduates are indeed prepared for the professional world," says Carol Warfield, consumer affairs department head. "In fact, after becoming licensed, Auburn interior design program graduates consistently earn placement with top 100 architecture and design firms." Citing the growing importance of collaboration and communication in design education, DesignIntelligence also ranked Auburn's interior design program third nationally for cross-disciplinary teamwork.

Elsewhere in the College of Human Sciences, the college's hotel and restaurant management program hosted the 17th annual Graduate Education and Graduate Student Research Conference in Hospitality and Tourism at The Hotel at Auburn University and Dixon Conference Center in January. It was the first time the industry's premier graduate student education and research conference was held at Auburn. This year's event was supported by 30 leading schools and attracted more than 250 graduate students, graduate program directors and deans from across the country and around the world.

"It was an honor for Auburn to have this opportunity to showcase our efforts in hospitality and tourism education," says Martin O'Neill, head of the Department of Nutrition, Dietetics and Hospitality Management.

#### College of Veterinary Medicine

#### Raptor Center's Goal: Rehab and Release



A SPECIAL DAY Liz Crandall, a raptor rehabilitation specialist at the Southeastern Raptor Center, and Ralph Wood, longtime volunteer, prepare a redtailed hawk for release back into the wild in Tuskegee National Forest. Wood says the days when a bird is released to its home are the most special.

The mission of the Southeastern Raptor Center at Auburn University is to rehabilitate injured or orphaned birds and to educate the public about raptors, also known as birds of prey, which are characterized by their sharp talons, curved beaks and carnivorous diets.

The raptor center is affliated with Auburn's College of Veterinary Medicine and provides an opportunity for volunteers, both university students and adults from the community, to acquire hands-on experience with veterinary medicine and wildlife rehabilitation.

About 70 volunteers spend two to three hours a week at the center. New volunteers start out caring for the birds by preparing food or cleaning cages. As volunteers gain experience, they help with or observe the birds during medical procedures such as blood work, radiographs or veterinary exams for signs of illness or trauma.

"Every day and every case is special in veterinary medicine, and the Southeastern Raptor Center is no exception," says Ralph Wood, a longtime volunteer and third-year veterinary student. "Whether it is a tiny Eastern screech owl with a broken wing, a golden eagle with lead poisoning or something in between, there is never a dull day or a dull case."

The rehabilitation section takes in almost 300 birds annually, with the majority being birds of prey.

"We also accept injured waterbirds and songbirds," says Liz Crandall, a raptor rehabilitation specialist. "We work with permitted rehabilitators in Alabama and Georgia, such as the Alabama Wildlife Center, that share the same goal—to rehabilitate and release birds back into the wild where they belong."



**PERVIOUS POUR** Students in building science classes installed pervious concrete pathways in the arboretum in 2011. Pervious concrete reduces stormwater runoff by capturing stormwater and allowing it to seep into the ground and is one of the Best Management Practices recommended by the EPA to manage stormwater runoff—a major issue in sustainabile building practices.

#### College of Sciences and Mathematics

#### **Arboretum Focuses on Sustainability**

Along with its mission of promoting an understanding and appreciation for the natural world, Auburn University's Donald E. Davis Arboretum also provides a setting for demonstrating sustainable practices for gardens and landscapes.

In the past year, the arboretum staff has collaborated with many on-campus classes and groups to complete several projects that exhibit sustainability. Building science classes that in 2010 paved the arboretum parking lot with the Auburn University Facilities installed additional pervious concrete pathways in the arboretum. Pervious concrete reduces runoff water by allowing water to reenter the ground and increases groundwater supplies. In addition, biosystems engineering and landscape architecture classes helped design an outdoor classroom, a bog and water capture systems.

Other sustainability projects recently completed include the installation of solar-powered pumps, dry stream beds for directing water and bioretention gardens, or rain gardens.

Nanette Chadwick, director of academic sustainability programs and professor of biological sciences at Auburn, has been impressed with the work being done in the arboretum.

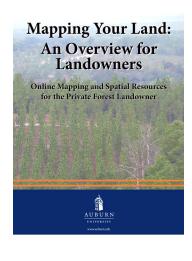
"In the Office of Sustainability, we appreciate these efforts at the arboretum, which we often use as examples of the best practices in sustainability for the campus," Chadwick says. "All of our introductory classes in sustainability take field trips to the arboretum, where the students learn a tremendous amount about how to put sustainability practices into action. I rely on the expertise and actions of the arboretum staff to inform our course discussions and lectures about sustainability on campus and in our community."

Many of the sustainability projects completed at the arboretum support Auburn University President Jay Gogue's commitment to have a carbonneutral campus that sequesters more carbon than it emits.

To read more about the arboretum, go to www.auburn.edu/cosam/arboretum/.

#### School of Forestry and Wildlife Sciences

#### New Online Resource Available for Mapping



Two research associates in Auburn's School of Forestry and Wildlife Sciences have produced a 20-page, online booklet that can help small-scale private forest landowners and forest land managers map their property and make more informed, economical and ecological decisions about how to manage their property for multiple uses.

John Gilbert and John Kush developed the publication, "Mapping Your Land: An Overview for Landowners," using a grant from the Alabama Forests Forever Foundation. The book's subtitle is "Online Mapping and Spatial Resources for the Private Forest Landowner."

The book introduces landowners and managers to the use of online mapping and spatial resources to make maps and the use of aerial photography, topographic layers, soils information, data collected with GPS units and even visual simulations for an area of interest, such as a timber stand, agriculture field or pasture. Designed for beginners, it provides keywords, home-page links, tutorial information, examples and screenshots for online programs such as the USDA/NRCS Web Soil Survey, Google Earth, Alabama Historic Aerial Photo Archive, USDA/NRCS Geospatial Data Gateway and USDA National Agroforestry Center CanVIS.

To download the book for free, go to the Longleaf Pine Stand Dynamics Lab website at http://www.lpsdl.auburn.edu/ and click on "Mapping Booklet" under recent publications.

#### **Poultry Tech Center Helps Growers Save Dollars**

As Gene Simpson sees it, the challenge facing poultry growers is simple—not simple to resolve, but simple to understand. In an increasingly globalized market, growers are caught in a vise between flat-lined revenue and operating costs that have risen between 50 percent and 70 percent.

It is a chronic problem that Simpson, an Alabama Cooperative Extension System economist and Auburn University agricultural economics professor, and colleague Jim Donald have been working for years to resolve, most recently through the Auburn-based National Poultry Technology Center.

Simpson and Donald organized the center five years ago with the goal of improving bottom-line profitability of the live production sector of the U.S. poultry industry by providing timely applied research and education that contribute to increased efficiencies in housing, equipment, energy and environmental control. In the course of loosening the economic vise that grips producers, the two have changed the face of U.S. poultry production.

Simpson and Donald cite many causes behind soaring production costs, but topping the list are heating fuel and U.S. government efforts to promote ethanol production.

"We're dealing with a situation in which this nation's energy and food production policies are in conflict," says Donald, Extension biosystems engineer and a professor in that field. Encouraging ethanol production from corn drives up grain prices at a time when poultry growers can least afford it, but Donald and Simpson say there are proven solutions to dealing with rising costs. One example: Retrofitting aging poultry houses to ensure optimal energy efficiency.

"For the most part, it's all about energy conservation," Simpson says.

On Maze Farms in Horton, grower Dennis Maze and son Jeff have heeded the two experts' advice. Their oldest broiler houses, built almost 40 years ago, are still in operation today and, in terms of production efficiency, consistently rank in the forefront of all Tyson Foods poultry farms. One big reason for that, the Mazes say, is that, in recent years, the poultry technology center has conducted research on Maze Farms' poultry houses in terms of how several practices such as spray foaming and the use of various types of sidewall insulation and dimmable compact fluorescent light bulbs can enhance energy efficiency.

Simpson and Donald strongly advise that, to stay profitable, growers should invest some of their hard-won profits into poultry house improvements.

"What we've learned is that we can cut a grower's heating bill greatly, sometimes by as much as 40 to 50 percent," Donald says. "Even in the most unimproved houses, if growers follow our recommendations, they will reduce their heating costs by half and they will secure a payback in as few as four years."



On the other hand, producers who don't heed this advice often end up paying a heavy price.

"We've seen lots of growers who should update their houses but who dig in their heels and refuse," Simpson says. "They trek along for 10, 15 or 20 years and then face upgrades of as much as \$40,000 or \$50,000 a house in order to remain in production."

The proactive approach really boils down to the old maxim, "an ounce of prevention is worth a pound of cure."

"It's like changing your oil every 5,000 miles," Simpson says. "Yes, it'll cost you, but it will also save you a lot of grief later on."

In early fall, Alabama poultry producers who have benefited from the work of the NPTC showed their appreciation by nominating the NPTC for the first-ever Auburn College of Agriculture Project Team Award, established to recognize an outstanding collaborative program in teaching, research and/ or Extension. The NPTC, which also includes Extension poultry housing specialists Jesse Campbell and Dennis Brothers, won the award.

"This farm remains in the top 10 percent of all Tyson Foods farms in Alabama because of the applied research that has been conducted by the NPTC to make this farm cost-effective," says Dennis Maze. He and son Jeff were among several grateful farmers who nominated the center.

For their part, Simpson and Donald credit their success to their longstanding emphasis on traditional Extension methods.

"We're old guys," Donald says. "It's the way we were taught. We're out there listening to the growers, our customers, focusing on solutions that are going to work for them. That's the Extension philosophy."

## **Center Creates Food-Processing Hub in Chilton**



**OPEN FOR PROCESSING** Chilton County Cooperative Extension Coordinator Center in Clanton. West and Chilton Research and Extension Center director Jim Pitts led the effort to establish the center, which features a fully equipped and state health department-approved community kitchen that local growers now can use to process their surplus produce into profitable items.

Following his retirement as a Houston-based oil company executive, J. Sam Johnson returned to his native Alabama, partly with the intention of giving something back to his hometown: Clanton, the seat of Chilton County, renowned for its copious output of peaches and other produce.

For years, Johnson had been concerned that, every season, as much as 50 percent of his native county's produce was deemed overripe or too small, and instead of being processed into jams, jellies, salsa and other value-added products, it wound

up being tossed. He was bothered, too that many of the processed foods sold in jars at local vendor and retail outlets in the central Alabama county are actually made from Georgia products.

Gay West, Chilton County Cooperative Extension Coordinator with the Alabama Cooperative Extension System, and Jim Pitts, director of the Chilton Research and Extension Center, long had shared Johnson's concerns and agreed the area needed a facility that featured a fully equipped community kitchen where local growers could process their surpluses into profitable items, but there were so many barriers. Case in point: state laws requiring all retail foods to be processed in an inspected kitchen.

But at some point, the idea began picking up steam.

First, industrial kitchen equipment was donated to the CREC, and shortly thereafter, the local school board

offered up the kitchen and cafeteria of a soonto-be-demolished middle school to the effort. West and Pitts brought Extension food safety specialist Jean Weese and others in on the dialog, and, working together, the group secured a specialty crops grant from the Alabama Department of Agriculture and Industries and received additional funding from the Cawaco Resource Conservation and Development Council.

West and Pitts also convened a focus group of central Alabama growers and civic leaders to float the idea of what eventually would become the Chilton Food Innovation Center, and they secured the full support of the Extension System and the Alabama Agricultural Experiment Station administrations as well.

In time, West and Pitts had the makings of what by all accounts was a textbook example of successful partnering—one that, in addition to area growers, has involved the City of Clanton, the Chilton County Board of Education, a local bank and the Alabama Farmers Federation. In addition, Arlie Powell, a retired Auburn University horticulture professor and Extension administrator who now operates a local business with his son, has also lent advice and a helping hand throughout the process.

Christiana Mendoza, a professional food scientist, has been hired to manage the facility and to provide technical assistance to aspiring processors.

"Growers have only about a month and a half each year when they're not super busy," Mendoza says. "That's not enough time to plan and develop a functional commercial kitchen on their own."

Her job is to fill that void. Any grower with an acidified food trying to move a product into retail sales is eligible to use the center, she says. All that is required is filling out an application, which is subject to board approval. Since opening last September, the center has processed products for two local companies.

Johnson, who has been enlisted as the center's business strategist, is hoping big things will come from the center.

"I want to see it develop as a small-business incubator that spawns multiple successful businesses that draw from the produce of central Alabama," Johnson says.

## Calendar<sub>of</sub> Events

March • 2012								
	S	m	t	W	t	f	S	
					1	2	3	
	4	5	6	7	8	9	10	
	11	12	13	14	15	16	17	
	18	19	20	21	22	23	24	
	25	26	27	28	29	30	31	

April • 2012						
S	m	t	W	t	f	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30					

May • 2012								
	S	m	t	W	t	f	S	
			1	2	3	4	5	
	6	7	8	9	10	11	12	
	13	14	15	16	17	18	19	
	20	21	22	23	24	25	26	
	27	28	29	30	31			

#### **March 12-16**

**Auburn University's Spring Break** 

#### **April 2-6**

Ag Week

Auburn

Ag Week, a student-planned event that highlights the College of Agriculture, includes a wide range of activities for students, faculty and staff across the campus. *Contact: Salora Wright at sjw0009@auburn.edu* 

#### **April 5**

Cattle and Forage Field Day

8:30 a.m. to noon

Wiregrass Research and Extension Center Headland

Contact: Brian Gamble at gamblbe@auburn.edu or 334-693-2363

#### **April 6**

**Ribbon Cutting** 

Alabama Farmers Federation Administrative Building

Tennessee Valley Research and Extension Center Belle Mina

Contact: Chet Norris at norribe@auburn.edu or 256-353-3978

#### April 3

**Etiquette Dinner** 

The Hotel at Auburn University and Dixon Conference Center

Auburn

Contact: Megan Ross at mhr0001@auburn.edu

#### **April 10**

**Chilton County Career Day** 

**Chilton Research and Extension Center Clanton** 

This event introduces local high-school students to the College of Agriculture.

Contact: Katherine Pittman at kep0004@auburn.edu

#### **May 2-3**

Ag Classic

Auburn

This event offers golfing and fishing tournaments, social events and an auction, all of which help fund College of Agriculture scholarships and programs. *Contact: Amanda Nims at freinal@auburn.edu* 

#### May 6

**Graduation Breakfast** 

Ham Wilson Arena Auburn University Auburn

Spring 2012 College of Agriculture graduates and their families are honored at this breakfast hosted by the Auburn University Agricultural Alumni Association and sponsored by the Alabama Poultry and Egg Association. Contact: Ann Gulatte at 334-844-2345 or gulatam@auburn.edu



For more information on these and other upcoming College of Ag and AAES events, go to www.ag.auburn.edu and click on the "Calendar" button, or use your mobile device to scan the code above.



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## Delicious Debut

### Wright Reveals Top-Secret Chicken Salad Recipe

onsider this the unveiling of a classic, for never before has Amy Wright revealed her 100-percent original, remarkably healthy and absolutely amazing chicken salad recipe to anyone. Oh, she's had a ton of requests for it, but the truth is, there's never been a bona fide recipe. The associate professor of horticulture at Auburn, who's featured on page 3 of this issue, has been making her refreshing version of chicken salad for quite a while using the "eyeball-it" technique, but she's finally been persuaded to quantify how much of what goes into making this dish a never-fail hit.

Wright says the recipe simply includes all the ingredients she likes in her chicken salad and excludes all those she doesn't, but all ingredients and textures can be adjusted according to personal preference.

#### **Amy Wright's Chicken Salad**

1 (about  $1\frac{1}{2}$ -pound) package boneless skinless chicken breasts

2 bay leaves

½ teaspoon kosher salt

½ teaspoon fresh cracked black pepper

1½ fresh lemons

1 (2.25-ounce) package slivered almonds (½ cup)

½ cup chopped fresh curly or flat-leaf parsley, rinsed and stems removed

4 stalks fresh celery, chopped into  $\frac{1}{2}$ -inch pieces (about  $\frac{1}{2}$  cups)

¹⁄₃ cup mayonnaise

Kosher salt and fresh cracked black pepper to taste



Trim any fat and tendons from chicken breast. Place chicken, bay leaves and salt and pepper in a pot and add water to cover. Bring to a boil, then reduce heat and simmer until chicken is thoroughly cooked, about 45 minutes. Remove chicken, and, if desired, strain and refrigerate broth for other use. Using a fork and knife, shred or cut chicken into 1/2- to 1-inch pieces and place in a large mixing bowl. Squeeze juice from lemons over chicken, tossing to coat. Add almonds, parsley, celery and mayonnaise and stir to blend well. Season with additional kosher salt and cracked black pepper to taste.