

Plow Sharing

January-February 2005

Chatham County Center
North Carolina Cooperative Extension
45 South Street
Post Office Box 279
Pittsboro, NC 27312
Telephone: 919.542.8202
Fax: 919.542.8246

A bi-monthly newsletter promoting awareness, understanding, and practice of sustainable agriculture



Inside This Issue

2004 in Review	1
Pastured Poultry Conference	2
Pruning Rabbiteye Blueberries ...	3
Property Tax Workshop	4
Organic Grain Workshop	5
Biodiesel Comes to Pittsboro	5
Biodiesel Conference	8
New Beekeepers Program	9
New Sections on GSF Website.	10
Calendar of Events	11



I hope you find this newsletter helpful and informative. If you have ideas or suggestions for future issues, call or stop by the office. I always welcome your feedback!

Debbie Roos

Debbie Roos
Extension Agent
Agriculture
919-542-8202
debbie_roos@ncsu.edu

2004 in Review, and Looking Ahead

Happy New Year, everyone! 2004 went by way too fast for me. I did want to take a minute here to reflect back on 2004 and also take a peek ahead to what lies in store for 2005. I want to thank the approximately 200 folks who took the time to fill out the annual feedback forms for this newsletter and my Growing Small Farms website. As I mentioned before, your feedback is critical to my program, and I do take it very seriously. Yes, the Extension Administrators in Raleigh require it, because they hold us accountable for our programs, as they should. But even if they didn't I would still be pestering you for your feedback because it is very helpful to me. I put a lot of time and energy into my work and I don't want to be "barking up the wrong tree" or "paddling down the wrong river"! Your comments and suggestions help to keep me on track. A couple of people encouraged me to adopt a more reader-friendly layout for Plow Sharing, so I will try to work on that. More white space was what I heard. I'll try!

2004 Highlights:

- 9 Enhancing Sustainability Workshops held, with 510 participants; topics included crop rotation, farm tax issues, sustainable soils, truffle production, micro-irrigation, beneficial insects, slow food, website development for farms, and more.
- Plow Sharing newsletter delivered to 1,200 subscribers
- Growing Small Farms website was overhauled and given a completely new look; the site grows every year with 42,000 visits in 2004

2005 Plans

I am busy planning 2005 workshops and potential topics include no-till production, small-scale equipment demo, small fruits, tree fruits, fall vegetables, and more (see page 2 for February workshop).

I want to wish everyone the best season ever. You are all such a joy to work with. I look forward to seeing you at the farm or market soon!

February 23: Pastured Poultry Conference

The Chatham County Center of North Carolina Cooperative Extension and American Livestock Breeds Conservancy present a Pastured Poultry Production Conference from 8:30 a.m.-5:30 p.m. at the Agricultural Building Auditorium in Pittsboro, NC. Learn about pastured chickens, turkeys, ducks, and geese.

Agenda:

- Research on Standard (Heritage Breed) Turkeys—Marjorie Bender, ALBC
- How to Raise Standard Turkeys on Pasture—Alex Hitt, Peregrine Farm



- How to Raise Ducks and Geese on Pasture—speaker TBA
- Appropriate Genetics: Ducks & Geese—Marjorie Bender, ALBC
- Poultry for Pest Management—Debbie Roos, NC Cooperative Extension, Chatham County
- Using Geese for Weed Management—Marjorie Bender, ALBC
- How to Raise Laying Chickens and Broilers on Pasture—Ben Bergmann, Fickle Creek Farm, and Charles Gupton, Shiloh Farm



- Appropriate Genetics: Chickens—Don Schrider, ALBC
- Regulations—Dan Campeau, NC Cooperative Extension, Chatham County
- Processing—Andy Youngblood, Hickory Mountain Poultry Processing
- Marketing Roundtable:
 - Leigh Loraine, Nu Horizons Farm (sells pastured poultry through CSA and farmers' markets)
 - Bret Jennings, Chef Proprietor, Elaine's on Franklin, Chapel Hill
 - Meat buyer from Weaver Street Market—speaker TBA
- Resources—Debbie Roos, NC Cooperative Extension, Chatham County

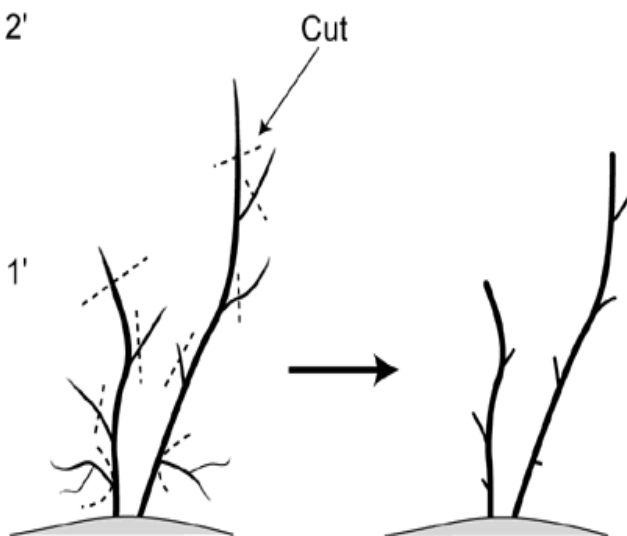
The cost of the workshop is \$25 and includes a catered lunch and a resource notebook. **The deadline for registration is February 14.** Register early as space is limited. To register, download a registration form at <http://www.ces.ncsu.edu/chatham/ag/SustAg/workshops.html> and mail it with your payment to Debbie Roos at PO Box 279, Pittsboro, NC 27312. Contact Debbie Roos at 919-542-8202 for more information.

Pruning Rabbiteye Blueberries



February is a great time to prune blueberries in the Piedmont. Blueberries need less pruning than many other fruit plants, but pruning is still very important. Pruning promotes new growth and large fruit and keeps plants a manageable size for harvesting fruit. Blueberries produce fruit on one-year-old wood from the previous season. When left unpruned, the plants produce smaller, poorer quality fruit.

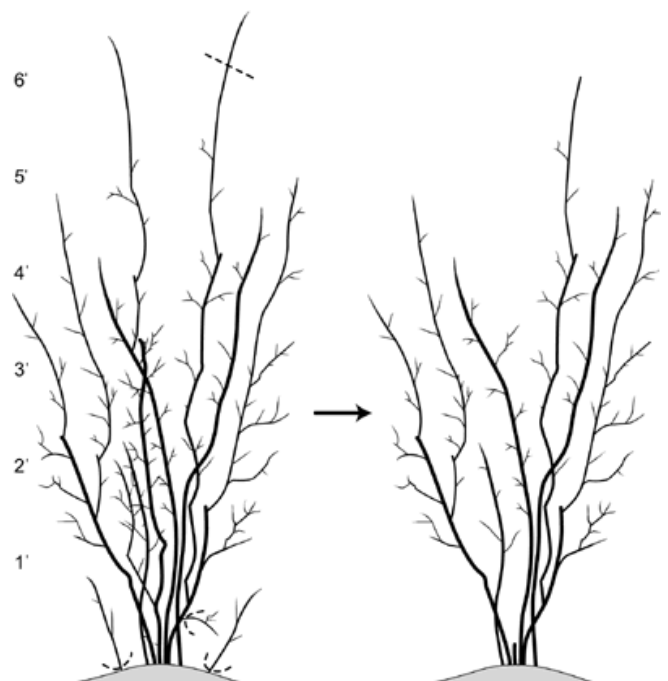
Rabbiteye blueberries are most commonly planted in our region. Plants should be cut back severely at planting: prune approximately $\frac{2}{3}$ of the top growth on bare-root plants and $\frac{1}{2}$ on potted plants leaving only 1 to 3 of the most vigorous upright shoots and remove any remaining flower buds (found at the tips of branches). See illustration below showing pruning at planting.



For at least the first 2-3 years following planting, blueberries should not be allowed to bear fruit. Early fruiting can stunt plants, which can decrease yields in future years.

After establishment, rabbiteye blueberries require little pruning until they reach 6-8 feet in height. During the first three years after planting, excessively tall and limber shoots will need cutting back to stimulate branching and strengthen the shoot. Remove all flower buds to ensure that nutrients and water will go towards root and shoot growth, not fruit. Also remove any weak, damaged or diseased growth. The second or third year after planting, several flower buds can be left on vigorous shoots. Remove root suckers (shoots developing a distance from the crown).

When plants reach mature size you'll need to initiate a cane renewal pruning program. As blueberry canes reach about 6 years old, their ability to produce high yields and quality fruit declines. Removing some of the older canes each year keeps the plant healthy and productive as these old canes are replaced with new growth. Starting with the oldest, remove about 20% of the canes each year, so that over a 5 year period, the entire crown of the plant will have been renewed (see illustration below).



This renewal pruning will help increase yields of quality fruit by encouraging new fruiting canes to develop and by improving sunlight penetration to the plant canopy. Cut off old canes about 6-12 inches above ground to force new canes to develop from stump suckers.

With mature bushes, in addition to the cane renewal pruning, continue to remove old canes that are weak, diseased or damaged. Cut back tall, vigorous shoots to 4-6 inches below the top of the bush to force branching at a lower level and to control bush height. Remove low-growing prostrate branches as these will be shaded by the growth above them and will not be productive.

Rabbiteye blueberries are extremely vigorous growing and can reach up to 20 feet or more in height if left unpruned. If your bushes are excessively vigorous, you may want to do some summer pruning for size control. Cutting back the excessively vigorous shoots immediately after harvest will help control bush height and increase yield.

For more information about growing blueberries and other small fruits, visit the Small Fruits section of the Growing Small Farms website at <http://www.ces.ncsu.edu/chatham/ag/SustAg/smfruitlinks.html>.

**January 27:
Property Tax Workshop
for Chatham Farmers**

7:00-9:00 p.m.
Ag Building - Pittsboro, NC

By Glenn Woolard
Chatham County Extension Director
North Carolina Cooperative Extension

Don't get caught paying back taxes, penalties and fines. Find out how to properly list your farm business personal property. A Chatham County Property Tax Workshop for Farmers will be held on Thursday, January 27, at 7:00 pm. in the auditorium in the County Agriculture Building in Pittsboro. The workshop is being conducted jointly by the Chatham County Center of the

North Carolina Cooperative Extension and the Chatham County Tax Department.

Businesses in Chatham County are currently going through routine county property tax audits. Those of you who are farmers are included in this process. The farm audits have discovered that farmers have unknowingly not listed certain farm equipment and farm supplies. It appears that many poultry farmers have not listed the poultry equipment in their poultry houses and supplies used in the poultry operation. The poultry house equipment is not included in the real property tax value of the poultry house.

This workshop will help farmers better understand the county tax listing requirements. To give farmers more time to meet individually with tax listing personnel and more time to list farm property, Chatham farmers are able to request an extension for listing farm property. Farmers are required to request this property listing extension in writing.

The workshop presenters will include Kimberly Horton, CAE, Chatham County Tax Administrator; Tina Stone, Chatham Business/Personal Property Appraiser; Tonia Bowen, President and Auditor with County Tax Services Inc.; William (Bill) Connolly, Consultant and former Assistant Director of the N.C. Department of Revenue; and Dave Duty, Property Valuation Specialist I with the N.C. Department of Revenue. Connolly also works with County Tax Services Inc.

Farmers can pick up an extension tax listing form at the County Tax Office in Pittsboro. The form is also available on the Cooperative Extension web site at <http://www.ces.ncsu.edu/chatham/>. Click on the "Property Tax Workshop for Farmers" link. The combined workshop flyer and extension tax listing form is also available in the Cooperative Extension publication displays in Siler City at Carolina Stockyard and at Southern States.

The extension tax listing request form has to be completed and received at the County Tax Office in Pittsboro BEFORE 5:00 p.m. on Monday, January 31. The extension forms can also be completed and submitted to the tax personnel at the workshop on January 27.

To help us plan for the workshop, please call the Cooperative Extension Center at 919-542-8202 to pre-register. There is no registration fee. Refreshments will be provided. All Chatham County farmers are urged to attend this workshop!

For more details, call Glenn Woolard, County Extension Director, at 542-8202 or email to glenn_woolard@ncsu.edu. Information is also available on our web site at <http://www.ces.ncsu.edu/chatham/>. Employment and program opportunities are offered to all people regardless of race, color, national origin, sex, age, or disability.



February 1: Organic Grain Production Workshop

6:00-8:00 p.m.
Moore County Extension Center
Carthage, NC

Demand for organic grains is increasing in North Carolina. North Carolina mills are requesting over 100,000 bushels of organic wheat and corn and over 30,000 tons of organic soybean meal. Grains for organic livestock feed are increasingly in demand. The advantages of growing organic grains include increased profitability, lower input costs, and improved soil quality. Prices for organic grains are generally double or more than those of conventionally grown grain.

This program will cover what needs to be done differently to produce organic grain crops: fertility, weed control, pest control, harvesting and storage. It will cover marketing opportunities for NC grown organic grain, as well, and a representative from NC Crop Improvement, an organic certifier in NC, will speak on certification issues. A sponsored dinner will be provided, so **please RSVP** to Molly Hamilton if you plan on attending. Contact Molly at 828-628-2675 or molly_hamilton@ncsu.edu. For directions to the Moore County Extension office, visit <http://www.ces.ncsu.edu/moore/map.html> or call 910-947-3188.

Biodiesel Comes to Pittsboro

By Lyle Estill



Three years ago I was making biodiesel in my backyard, out of used vegetable oil that was left over from deep fried turkey. Instead of dumping four gallons of used oil into the woods, I was converting it into fuel and using it to power my tractor.

I thought I was all alone in the world with my homemade fuel, when I saw a flyer at the Pittsboro General Store advertising a brand new course on “Biofuels” at Central Carolina Community College.

With some trepidation, I headed back to college for the first time in twenty years, where I met Rachel and Leif, who were going to attempt to make fuel out of vegetable oil. I immediately became “The Old Man of Biodiesel.”

Biodiesel is easily made out of any fat. Waste vegetable oil, virgin oils pressed from oilseed crops, beef tallow, even liposuction remains work fine as feedstocks. When we make biodiesel, we simply swap one alcohol molecule (glycerin) for another. We use methanol as a reactant, although biodiesel can also

be made with ethanol. A successful biodiesel reaction yields both fuel and glycerin, which is crude, non-toxic, and can be composted.

The finished fuel can go into any diesel engine, unmodified. If you have a half a tank of petroleum diesel in your pickup truck, and you add a half a tank of biodiesel, the two fuels instantly blend and the engine is none the wiser.

Once in the vehicle, biodiesel burns much cleaner than petroleum diesel. Its lower emissions attract many people to the fuel. Two of my four children have respiratory problems, which makes a cleaner burning fuel really attractive to me.



Others are attracted to biodiesel because it can be made in America. Others are drawn to it because it is renewable. Still others find their way to biodiesel because American farmers can grow the feedstocks.

Most biodiesel in this country is consumed in petroleum blends, and North Carolina consumes more than its fair share of the national output. The numbers vary from source to source, but roughly speaking it is fair to pencil the U.S. in for about 25 million gallons in 2004, and North Carolina's consumption was around a million gallons.

The Biofuels Program that Leif and Rachel run down at Central Carolina Community College turns out a new crop of committed biodiesel enthusiasts each semester, and most of them are running on B100, or 100% biodiesel. From that first bold experimental class to today they have acci-

dentally created a narrow and intense market of biodiesel consumers.

And as a result of the program, a cooperative called Piedmont Biofuels has been formed to meet the market demand. I threw my hat in with Leif and Rachel down at the college, and have been working in biodiesel ever since.

The coop rapidly expanded beyond my back yard and now has a facility on the Pittsboro-Moncure Road where coop members come and produce their own fuel.

Government regulation precludes us from selling our homemade fuel for on-road use - it's simply too expensive for us to get legal - but coop members are allowed to make their own fuel, put it in their own vehicles, and drive down the road.

Taxes are another matter. The IRS has always wanted their cut of every drop of liquid that enters an on-road fuel tank, and now North Carolina is making the same claim. People running on homemade fuel can register with each taxing entity and remit based on the gallons they consume.

And from the beginning we have not been able to make enough fuel to keep up with demand, which is why we bought an old home-heating tank-truck and reconditioned it for biodiesel distribution. We put up a bond with the State and became a legal distributor of on-road biodiesel, which we purchase in Charlotte, and resell around the Triangle. Some of our customers come by our operation, where we have a pump and tank that is operated on the honor system. Others have had us put tanks in their yards so that they can have biodiesel available for their own use.

Chatham County Schools bought a thousand gallons of fuel from us to power their school buses, and they have stayed with biodiesel ever since.





The North Carolina Zoo is buying biodiesel from us, and they use as much diesel fuel as a small town.

Which means Piedmont Biofuels has become a place for homemade fuel production, and has become a source for “store-bought” fuel. We have never been driven by the profit motive, and have spent most of our time on education and outreach.

Along the way we have become known for our reactor design-build, and we are currently working on our seventh biodiesel reactor. We sold one to the North Carolina Solar Center, which is part of NC State University, and another to Sustainable Living in Orange County, and we are currently working with the zoo to help them launch their own homemade fuel operation. One of our former interns is installing a small-scale biodiesel operation out in Washington State, and with the help of the State Energy Office, we constructed a mobile biodiesel processor, which we take around the state to conduct clean technology demonstrations.

Small-scale has been important to us from the start. For three years we have resisted the lure of

large-scale production. We have remained committed to contributing to a micro-nodal model of energy production that allows everyone to make fuel in the shed.

We have tried to stay “open source” in our approach to this fuel, and we have offered information freely to anyone who asks—including those who wish to create million gallon facilities. When I stumbled across an abandoned chemical plant in Pittsboro (see photo above), we succumbed to the idea of opening a larger operation ourselves, and are working toward opening the first commercial scale biodiesel operation in North Carolina.

Along the way, Leif, Rachel, and I have all studied at the Iowa Energy Center, and at the end of January Leif and Rachel are teaching an intensive three-day course on biodiesel at NC State.

Our facility on the Pittsboro-Moncure Rd. has become a registered USDA research farm and one of our members, Dr. Oneas Mufandaedza, conducts research on the oil production possibilities of mustard, sunflower, and other possible feedstocks (see photo page 8). He has also established a herd of goats to which he feeds our glycerin sidestream.



We compost much of our glycerin at this point, and with the help of Doug Jones, who is part of the Sustainable Agriculture program at Central Carolina Community College, we have an active and effective composting system in place.

Much of our story can be found at www.biofuels.coop, where I have been chronicling our journey in a weblog about biodiesel. We have accidentally become a nationally recognized voice in grassroots biodiesel production, and we are continually swamped with interest in what I refer to as “the next renewable fuel.” Want to learn more about biodiesel? Visit the newest section of the Growing Small Farms website at <http://www.ces.ncsu.edu/chatham/ag/SustAg/altenergylinks.html> where you will find links for more information on biodiesel and alternative energy.

And if you want to meet our local, nationally known biodiesel gurus, don't miss this exciting conference opportunity below!

**January 28-29:
Grassroots Biodiesel Conference**

Pittsboro, NC

The Biofuels Educational Program at Central Carolina Community College in conjunction with Piedmont Biofuels Cooperative is hosting a biodiesel conference. Join us for a two-day event focusing on Biodiesel education, Biodiesel consumers' issues, and support for local biofuels endeavors. This event will help network consumers,

small producers, educators, and activists from across America.

Friday, January 28th

4:00 pm – 6:00 pm — Registration

7:00 pm — Welcome and Introductions: Lyle Estill, Piedmont Biofuels

7:15 pm — Keynote Speaker: Larry Shirley, NC State Energy Office

9:00 pm — Social at CCCC and then Pittsboro General Store



Saturday, January 29th

9:00 am - 10:00 am — Saturday Registration

10:00 am - 11:30 am:

- Technical Track 1: Quality in the Biodiesel Industry
- Regulatory Track 2: Starting a Biodiesel Cooperative

11:30 am - 1:00 pm:

- Technical Track 1: Collaborative Biodiesel Tutorial Project
- Regulatory Track 2: Tax incentive & Small Biofuels Businesses

Lunch Break

1:00 pm - 2:00 pm — Refinery tour with compost and oilseed demo

1:45 pm - 2:45 pm — Panel: Why are you interested in Biodiesel?

3:00 pm - 4:15 pm — Wrap-up

Afterwards, travel to the National Biodiesel Board Conference in Ft. Lauderdale, Florida! Workshops and discussions include: Biodiesel Small Businesses, Sustainable Production, Quality in the Biodiesel Industry, Algae and Alternative Feedstocks, Biodiesel Tax Incentive & the Consumer, Starting a Biodiesel Cooperative. For more information about the national conference, visit their website at <http://nbb.org/expo2005/>.

To register for the Pittsboro conference, go to <http://biofuels.coop/registration.php>.

For more information, contact Rachel Burton at rachel@biofuels.coop or 919-542-2900.

Cost-sharing Program for New Beekeepers

The 2005 Chatham County Beekeeping School kicked off on January 3 with 60 participants (see photo below)! We are going to be learning all about honeybees over the course of 6 weeks. The course is conducted by the Chatham County Beekeepers Association and the Chatham County Center of North Carolina Cooperative Extension.



From the NCSU Apiculture Website:

The honey bee (*Apis mellifera*) is a vital component of agriculture in North Carolina. Honey bees and the products of the hive, including honey, pollen, and bees wax account for approximately \$10 million dollars annually in the state. However, the products derived directly from honey bees are only a small part of their true value. As bees visit flowers to collect nectar and pollen, they transfer pollen grains from one flower to another, which fertilizes them and produces fruit and seeds. Without visits from bees, many crops would have lower yields and produce foods of lower quality. In North Carolina, many of the economically important crops, such as cucumbers, apples, blueberries, and melons are dependent on honey bees for pollination and account for \$100 million dollars every year.



Unfortunately, the fate of the honey bee in North Carolina is in question. Because of pests and diseases that have been introduced from other parts of the world, the honey bee population has declined dramatically in the past 20 years. It has been estimated that 98% of the feral (wild) colonies have been eliminated. The numbers of managed colonies have also suffered, dropping in number from a high of 180,000 in the late 1980s to approximately 100,000 at present. Due to the lack of feral colonies, it is of great importance to maintain the numbers of managed honey bee colonies to ensure adequate crop pollination.

The pest that has proven the most serious problem for the honey bee is the Varroa mite (*Varroa destructor*) - see photo below. This is a small mite that lives on honey bees and feeds on the developing bee larvae. A colony of bees can tolerate small numbers of these mites, but when the population of the mites in a bee colony reaches a critical level, the number of bees begins to decline and eventually the colony becomes so weak that it dies. Recent studies have shown that some honey bees have a greater resistance to this mite than others. The Russian honey bee is one that has shown to have a greater resistance.



The Apiculture program at North Carolina State University, with funding from the Golden LEAF Foundation of North Carolina, is promoting a program to increase the number of active beekeepers and honey bee colonies in the state of North Carolina. The program will be open to all residents of North Carolina that are interested in learning the art of beekeeping. The program is a cost-sharing program. Each participant may be able to receive two colonies of Russian honey bees with bee hives, but additional materials—such as protective clothing, smokers, and additional hive equipment (which may cost anywhere from \$50-\$150 per hive)—will be the responsibility of the individual.

The eligibility requirements for the program are:

- applicant must be a current resident of North Carolina
- applicant must be a current member, or willing to join, a local beekeeping organization
- applicant must pick up bees and equip-

ment at specified location on specified date (April 2005)

- only one application per household

Additionally, in order to be considered for the program, applicants must agree to acknowledge the receipt of materials by phone or e-mail; agree not to sell materials obtained through the program within 2 years after receipt; agree to return the bees and materials upon quitting the program; agree to respond to a follow-up survey; assume personal liability for all materials, including honey bees; and be willing to collect and share data related to the project.

All interested parties must fill out an application and return it **no later than February 11, 2005**. Applicants will be screened for eligibility by a panel of NCSU program administrators, officers of the North Carolina State Beekeepers Association (NCSBA), and NCDA Apiary Inspectors. *Interest in the program does not imply acceptance*; demand may exceed our limited supply of resources, in which case participants will be chosen through a lottery system.

Download an application at:

<http://www.cals.ncsu.edu:8050/entomology/apiculture/PDF%20files/Application3.pdf>

Successful candidates will be notified by program administrators in early March and will be given further instructions about how to participate. Participants will be assigned a local beekeeper mentor through the NCSBA and their local county chapters. The mentors will volunteer their time and work with each participant to guide their progress, assist their development, and foster their beekeeping skills.

For additional information about the program, contact the NCSU Apiculture Program at 919-513-7702.

New Sections on the Growing Small Farms Website!

- **Organic Certification Guide:**
www.ces.ncsu.edu/chatham/ag/SustAg/orgcertguide.html
- **Farm Planning and Recordkeeping:**
www.ces.ncsu.edu/chatham/ag/SustAg/farmrecords.html

2005 Calendar of Events

updated weekly on the web:

www.ces.ncsu.edu/chatham/ag/SustAg/calendar.html

January 27, 2005: Property Tax Workshop for Chatham Farmers from 7:00-9:00 p.m. conducted by the Chatham County Center of North Carolina Cooperative Extension. Please call the Cooperative Extension Center at 919-542-8202 to pre-register for the workshop. There is no registration fee. Refreshments will be provided.

January 27, 2005: Viewing of The Future of Food Film, sponsored by the CCCC Sustainable Agriculture Program and Chatham Marketplace. The film will be shown from 7:00-9:00 p.m. at Central Carolina Community College in Pittsboro, NC. This engaging documentary provides an in-depth look into the little known world of genetically engineered foods and the social, economic, health, legal and environmental effects they are already producing. Discussion will follow. Contact Melissa Frey at 919-545-9854 for more information.

January 28-29: Grassroots Biodiesel Conference in Pittsboro, NC. Contact Rachel Burton at 919-542-2900 for more information.

February 1, 2005: Organic Grain Production Workshop from 6:00-8:00 p.m. at the Moore County Extension Center in Carthage, NC. A sponsored dinner will be provided, so please RSVP to Molly Hamilton at 828-628-2675.

February 16-17: The North Carolina Tomato Growers Association's 37th Annual Meeting and the **Winter Vegetable Conference** at the Great Smokies Holiday Inn Sunspree Resort in Asheville, NC. Some of the highlights of this year's program include a whole track devoted to flood issues including how to remediate flooded soils and handle potential pathogen problems. Dr. Allen Straw from the University of Tennessee will speak on strawberry production and pumpkin varieties. There will also be presentations on vegetable disease, insect and weed control, tomato varieties, and marketing. If you have any questions, please call Stephanie Wise, NCDA&CS Marketing Specialist, at 828-253-1691 ext. 18 or email her at stephanie.wise@ncmail.net

February 23, 2005: Chatham County Cooperative Extension and American Livestock Breeds Conservancy present a **Pastured Poultry Production Conference** from 8:30 a.m.-5:30 p.m. at the Agricultural Building Auditorium in Pittsboro, NC. Learn about pastured chickens, turkeys, ducks, and geese. Approximately 12 speakers will discuss breeds, production, processing, marketing, and regulations. Contact Debbie Roos at 919-542-8202 for more info.

February 25, 2005: Northern Piedmont **Specialty Crops School** in Roxboro, NC. For more information, contact Carl Cantaluppi at 336-599-1195 or 919-603-1350.

February 26: Marketing Opportunities for Farmers Conference sponsored by Appalachian Sustainable Agriculture Project (ASAP). The conference will be from 7:30 am til 5:30 pm at Warren Wilson College in Swannanoa, NC. Topics include tailgate marketing, farm-to-school programs, farm planning, packaging and handling, health and safety, farm record-keeping and financial management, farm-to-chef, organic marketing opportunities, direct marketing, large grocers, agritourism, processed foods, medicinal herb opportunities, farm branding, marketing specialty meats, and Internet marketing. For more information and to download a registration form, visit the conference website at www.asapconnections.org/special/marketing/2005Marketing.htm or email conference@asapconnections.org.

March 4-5, 2005: 2nd Annual **Medicinal Herb Conference** at the NC Arboretum in Asheville, NC. Conference will be full of information for everyone associated with the industry including growers, researchers, and health professionals. In addition to sessions on growing, harvesting, propagating, and marketing medicinal herbs, there will a new track devoted to medical issues and an improved research poster session. More information will be available soon at the conference website at <http://ncnaturalproducts.org/>.

March 12, 2005: 12th Annual **Organic Growers' School** at Blue Ridge Community College in Flat Rock, NC. The largest event of its kind in the region. This school is for everyone interested in organic gardening, farming, and sustainable living. A not to be missed conference. For more information, visit the conference website at <http://www.organicgrowersschool.org/> or email info@organicgrowersschool.org.

North Carolina Cooperative Extension Service
NC STATE UNIVERSITY
Chatham County Center
P.O. Box 279
Pittsboro, NC 27312-0279

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Plow Sharing

*A bi-monthly newsletter promoting
awareness, understanding,
and practice of sustainable agriculture*