North Carolina Bee BUZZZ

The Official Newsletter of the NCSBA

Summer Meeting Honey Bee License Plates Bee School Reports And Much More...

Beat the Heat

Summer 2016

North Carolina State Beekeepers Association

The mission of the NCSBA is to advance beekeeping in North Carolina through improved communication with members, improved education about beekeeping, and support of science enhancing the knowledge of beekeeping.

2016 Executive Committee

President: Rick Coor 1st Vice President: Paul Madren 2nd Vice President: Secretary: Lynn Wilson Treasurer: Bob Gaddis Membership Secretary: Suzy Spencer Education Coordinator: Dr. David R. Tarpy State Apiarist: Don Hopkins Past President: Julian Wooten





Regional Directors

Mountain Region

Senior: Allen Blanton Junior: Doug Vinson Sophomore: Eugene Brown Freshman: Burton Beasley

Piedmont Region

Senior: Tim Huffman Junior: Todd Walker Sophomore: Kim Underhill Freshman: Gladys Hutson

Coastal Region

Senior: David Bridgers Junior: Eric Talley Sophomore: Jeff Stone Freshman: Cheryl Newbold

Contact information for the NCSBA Officers and Regional Directors can be found in your Yellow Book Directory and on the NCSBA website **www.ncbeekeepers.org**



Ouestions as to why a beekeeper or club should be part of the NCSBA have been asked many times over the years, and answered by many of the folks who have preceded me in the office of president. Why do people join the NCSBA? Why do people support the NCSBA? What is the purpose of the NCSBA? As the NCSBA president, I have asked myself the question of why am I a member of the association. For me, the answer was easy: I joined in 2004 to learn more about beekeeping. I found that I learned from helping other people with beekeeping as well. Over the years, I have learned many things about the honey bee, and have especially enjoyed the relationships that I have formed with many beekeeping folks and friends. Most of the people I know in the NCSBA are in the organization for similar reasons.

The main purpose of the NCSBA is to promote beekeeping. No other organization does beekeeping like the NCSBA; we are the largest such organization in the US. On the state leadership level, the main focus is to produce the two state meetings and administer the Master Beekeeper Program. The NCSBA leadership conducts two annual state meetings where members that attend are able to visit with major vendors of the industry, hear national renowned experts speak, and experience informational workshops- all to learn more about beekeeping and the honey bee. The MBP serves hundreds of new beekeepers each year, and is made possible only by a legion of chapter volunteers who conduct bee schools. Beekeepers can continue in the program and become Journeyman, Master, or Master Craftsman Beekeepers. Without the NCSBA, there would be no annual meetings for North Carolina beekeepers and no Master Beekeeper Program.

Message From The President by Rick Coor

The Certified Honey Producer Program and the Golden Achievement Program further support the education mission of the NCSBA. The Honey Bee Garden at the North Carolina Zoo was made possible by fundraising efforts of the NCSBA. There would be no honey bee exhibit at the North Carolina Zoo without the continued efforts of the NCSBA. Every year, the NCSBA promotes the goodness of honey at the North Carolina State Fair, where our honey enjoys an ever-increasing demand. I once heard a motivational speaker proclaim that we cannot expect to warm our hands from the stove without first putting in some wood!

The dues for the NCSBA are cheap- \$15 per year. How much can be expected for \$1.25 per month? To benefit from being a member you have to invest something more: your time and interest. Attend the chapter meetings; get involved with your local club; help others; participate in the MBP; attend some of the annual meetings; volunteer at the zoo; do programs for your club and other groups. In doing so you will learn more about keeping bees and the honey bee along the way.

It was once believed that a benefit of being a member of the NCSBA was liability insurance for chapters. The NCSBA was also thought to provide banking benefits for chapters, but the relationship the State Association has with local chapters was never structured to provide such, and the NCSBA was never intended to offer insurance or banking. In regard to insurance, there are thousands of insurance agents in North Carolina and many more available online. Chapter insurance can be obtained for as little as \$200 per year. There are thousands of accounting professionals licensed in our state who offer bookkeeping and banking assistance. Insurance agents and accountants are in business in every county.

In contrast, there is only one North Carolina State Beekeepers Association. No organization serves the beekeepers of North Carolina like the NCSBA. We are a volunteer led association about to mark one hundred years of service! One can best enjoy the benefits of NCSBA membership by being connected and being involved. Thanks for reading!



Logo Design Contest

by Lynn S. Wilson

Help the NCSBA celebrate our upcoming anniversary with updated letterhead! Submit your design to NCSBA Secretary Lynn Wilson at **secretary@ncbeekeepers.org** by **June 21** and earn \$100, generously provided by an anonymous donor, if your design is chosen.

Here are the rules:

- Use or update the existing Honey Bee on NC outline.
- Incorporate the upcoming 100th anniversary in such a way that the letterhead can be used before and after the anniversary date *Example: "2017: Celebrating 100 years of beekeeper support"*.
- Include the initials and the official name of the organization: NCSBA North Carolina State Beekeepers Association
- Include the website address: www.ncbeekeepers.org.
- Do not include officer or board member names, as doing so would limit the shelf life of printed stationery.
- Include layouts for both letterhead and envelope in .jpeg format. To get started, you may want to visit: **ncbeekeepers.org/letterhead-contest** and use the existing logo.





Master Beekeeper Program

by Paul Newbold, Program Chair

New Bern was a great success for the Master Beekeeper Program, and a huge success overall for the NCSBA! We had 50 members who participated in testing over the 3 days. Congratulations to those who passed! And for those who still need a little work, we hope to see you this summer.

As most of you know, there are mini quizzes on the NCSBA website for each level. We hope to expand with more as space and time permit. So keep checking each month on the website, and continue to read and participate at your local chapter. One of the best ways to learn is to give a talk at a local chapter. It is a two-sided benefit: you learn more as you prepare, and you help to pass on the knowledge you gained. Mentor a new beekeeper. You will be surprised at how much you already know!

For those of you working your way through the levels, know that sub-specialties are part of becoming a Master Beekeeper. You will find a list of 19 sub-specialties on the NCSBA website under Becoming A Master Beekeeper. Six are needed for your Masters, and 7 more for Master Craftsman.

Items 1 through 4 are the ones I want to talk about now. The requirements for winning a first or second place must be at a *state* competition, such as the State Fair or at the NCSBA Summer Meeting. The state summer meeting is in Hickory, NC July 7-9. This is a great opportunity to show off your spring honey and possibly win that ribbon you need.

All the rules are on the web: **www.ncbeekeepers.org/members-only** (Password is on your NCSBA membership card)

Look for Contest and Awards, and you fill find the Honey Contest Rules. You will also find how to enter photography, mead, wax, and cooking with honey competitions. Awards are presented Friday night at the banquet. It is free to enter, and easy to do, especially if you are attending the conference anyway.

Written tests will be available to take on Thursday morning, starting at 9:00 AM, Friday afternoon at 12:00 and Saturday morning at 9:00 AM. Allow yourself 45 minutes for the Certified written, and at least 1.5 hours for the Journeyman or Masters test. Journeyman and Master practical exams take an additional 30 minutes to complete. If weather permits, we will also do Certified Practical testing at the convention. Times will be announced later. Practical testing may be limited based on the number of hives and testers available.

Between now and the conference, study, watch for new mini quizzes, and get your honey ready to enter in the "Best Honey in North Carolina" competition!

"Get Thee to a Bee School"

by Cynthia Speed



Yay! School's out! We're all beekeepers now. Well... sort of. Most of the Orange County Beekeepers Association's Bee School students don't actually own bees yet, but they are more than adequately prepared to get started as new beekeepers. Thanks to OCBA's Bee School, which celebrated its sixth year, seventy one students from the surrounding community are now equipped to set up new bee hives and are automatic members of OCBA. Randall Austin, from whom I stole the title of this article, taught this year's bee school. Randall, NC Master Beekeeper and renowned writer, coordinated eleven classes including an equipment building workshop and an apiary field trip, as well as great guest speakers.

The topic beginners covered were classic beekeeper needs from what to do when your package queen is dead to how to handle a bee sting. Students were given a textbook, equipment catalogs from popular vendors, a copy of a recent *Bee Culture* magazine and a 10% off coupon on purchases from Bailey Bee Supply. Students were invited to join NCSBA and to participate in the Master Beekeeper Program. Exams for the certified level beekeeper were offered at the end of the course.

Best of all, in an ongoing effort to ensure success, every student who wanted a continuing education was assigned to a small cluster of students living in close proximity to each other and led by an experienced guide. Dave Eckert, club Mentoring Director, brilliantly orchestrated the cluster concept, where new beeks meet periodically at each other's apiaries. Also, for the first time this year by OCBA, a Master Beekeeper Program Study Group that meets monthly. Beginning beekeepers as well as advanced gather together under the tutelage of Randall Austin to study for Certified, Journeyman, or Master Beekeeper levels of certification. Following the requirements set forth by the NCSBA, each study group participant receives extensive reading assignments to study over the course of a month. At the return meeting, the topics are discussed and reviewed with input from everyone present.

We were so fortunate to have an impressive lineup of bee school lecturers. Randall prepared an opening intro lecture and shared his beekeeping equipment secrets. State Apiary Inspector Will Hicks talked about getting started with the hiving of those bee packages, and led our field trip in the bee vard. Our very own Todd Walker, Piedmont Regional Director and Master Beekeeper lectured on Honey Bee Biology, Bees as Social Insects, and Seasonal Management. Geneva Greene, Master Beekeeper and professional landscaper reviewed Plants for Bees in NC as well as Diseases, Pests, and Treatments. The beautiful Inge Kautzman shared information on what marvelous things can be done with Products of the Hive. Becky Manda from Starrlight Meadery won us over with samples of red and white mead.

Once again it was a topnotch class. We will learn from the surveys of the students how we can make next year's bee school even better. Randall is genuinely interested in how his students fared with their newfound knowledge and the success of their hives. He has informed them that he will check in with them after this year's bee season to see how they've progressed and just how well the bee school prepared them for getting a colony through the year.

If you'd like to meet some of OCBA's members, we meet every 2nd Thursday at 7 pm at the Unitarian Universalists Congregation of Hillsborough, 1710 Old NC 10, Hillsborough, NC. Join us to hear knowledgeable speakers who will help you keep up-to-date with the latest recommendations and best practices in beekeeping. There will be treats!





Randall Austin shares his knowledge

Meet the New Bee Buzz Editors



Dr. Lane Kreitlow

It is a pleasure to introduce myself as one of the new editors of the *Bee Buzz*. My love for honey bees began many years ago when I enrolled in Dr. Ambrose's *Bees and Beekeeping* course as an undergraduate at NCSU. Like many of his students, I sat though his lectures with

trance-like fascination, soaking up every word and wondering if this could possibly be a life's calling. I was hooked.

So much so that I later joined Dr. Ambrose's research team and earned my M.S. degree in entomology, with a focus on apiculture. New opportunities brought with them the chance to continue my education at Virginia Tech working with Dr. Rick Fell.

Upon completion of my Ph.D., I returned to Raleigh and had the privilege of working as a post-doctoral researcher in Dr. David Tarpy's lab. I later served as the Entomological Program Specialist for the NCDA&CS for 4 years. I am currently developing a website devoted to honey bees that will be out later this year. I live in Apex with my husband and son.

It is truly an honor to serve as an editor for the NCSBA. I hope my passion and devotion to honey bees will shine through as I embark on this new opportunity.



Meet Jody Moore, one of the the new editors of the NCSBA *Bee Buzz* Newsletter. A beekeeper since 2001, Jody is a Journeyman Beekeeper, and is currently working toward becoming a Master Beekeeper through the NCSBA Master Beekeeper Program.

A native of Rocky Mount, Jody

graduated from Appalachian State University in Boone with a degree in Geography. He was in the first class designated as having a *Computer Cartography* emphasis.

Jody worked in the Triangle Area as a GIS professional for State, Regional, and Local Governments. He eventually started and ran the Information Technology Department for Chatham County Government, which oversaw all computer activities within County business.

Today, Jody lives near Pittsboro with his wife and daughter. As an aspiring apiarist, Jody wants to learn more about queen rearing and hopes to provide locally raised honey bees as well as honey and other products from the hive.

He hopes to bring into play his technical skills, as well as the ability to meet deadlines, to help make the Bee Buzz better than ever.

From the Bee Buzz Editors:

Please send subscription questions and address changes to Laurie Shaw at **membership@ncbeekeepers.org** We enthusiastically accept article contributions. Tell us about your local association's latest events, your latest successes/failures, or anything else you'd like the NCSBA members to know about. If your submission is not printed immediately, please do not resubmit the same article. We save all submissions and will print when appropriate or when space permits. Submit your article in .doc or .docx format. Photos should be high quality jpg or tiff format. Please include a caption for photos. Do not embed captions in your photos or photos into your news article, but submit these as separate files. If you do not have access to a computer, we will accept typed or clearly handwritten articles. You can reach us here: **beebuzzeditor@ncbeekeepers.org**

Jody & Lane would like to offer a sincere "Thank You" to Rick Coor, Charles Heatherly, Todd Walker, and Suzy Spencer for their support during this transition. Your assistance and patience has been appreciated!



100th Anniversary Commemorative Cookbook

A special "Honey" commemorative cookbook is being prepared in celebration of the NCSBA's 100th Anniversary! Participation is in the early stages and purchases will be available at the 2016 Summer Meeting. Currently, we have award winning recipes from our annual summer cooking competitions, but we would love to have other categories besides breads and desserts. The only caveat is that the recipe must have honey as an ingredient. If you have an award-winning recipe, a family favorite, or a favorite of your bee club, please submit it to the committee. Categories for cookbook entries are: Appetizers & Beverages, Putting It Up With Honey, Dressings & Sauces, Soups & Salads, Vegetables & Side Dishes, Main Dishes, and Cookies and Deserts. We also have a special category of This & That, to include facial masks, body scrubs, sore throat remedies, puppy treats, etc.

We would love to include as many member recipes as possible in the cookbook, so please feel free to send us your favorites. Using the entry form below, you may submit recipes by postal mail to: 18 Pond Meadows Drive, Louisburg, NC 27549. You may also submit recipes and any questions via email to: **sandy@pmbees.com**. For recipe submission via email, please include the same information as requested on the form. The deadline for recipe submission is July 31, 2016. Thank you in advance for your participation! The committee looks forward to receiving your recipes!

Category:	
Submitted By:	Did you win an award?
	How did you place (1*, 2 nd , 3 nd Best of Show)?
Phone No. or e-mail	(in case we have questions):
Ingredients: (spell ou	t cups, teaspoon, tablespoon, quart, ounce, etc)
	Need more space? Use a second page.

Submit via e-mail to sandy@pmbees.com or send to 18 Pond Meadows Drive, Louisburg, NC 27549



Zika and Your Bees

With all the talk about the Zika virus and concomitant mosquito treatments, what that may mean for bees has no doubt crossed our minds. Longtime beekeeper and NCSBA historian Charles Heatherly posed the question to State Health Director Dr. Randall Williams about whether the state of NC intends to implement a statewide treatment for mosquitoes, and this is what he said:

"Charles, as reported to the legislature this morning, the *Aedes aegypti* mosquito does not lend itself to spraying so this not being proposed on any statewide effort."

In other words, spraying is ineffective in the control of *Aedes aeqypti* due to certain behavioral tendencies of this mosquito. *Aedes aegypti* is the

species of mosquito that carries the Zika virus. This is good news for our bees, one less thing we have to worry about. However, there will undoubtedly be uniformed or unscrupulous businesses trying to play on people's fear by attempting to sell them their pesticide services.

Please consider the words of the State Health Director before purchasing mosquito spray service for fear of Zika. Mosquitoes need standing water in which to lay eggs and where larvae develop. Ridding your yard of any standing water on a regular basis can vastly reduce the mosquito population, regardless of the species, without the use of spray treatments.



License Plate Update

by Sandy Carlson

The DMV has begun mailing the "Save the Honey Bee" license plates to those who pre-ordered a plate. The first batch of standard plates has started arriving via postal mail. Once all standard numbered plates have been manufactured, the DMV will begin manufacturing and mailing the personalized plates. The personalized plates are expected to begin arriving via postal mail by the end of May, and continue throughout the summer.

The "Save the Honey Bee" license plate should be on the DMV website sometime in May. Anyone who did not pre-order the plate will be able to order the plate directly from the DMV website at: https://edmv.ncdot.gov/VehicleRegistration/SpecialPlate



If you have a question regarding your order, you may call the DMV at 919-861-3575. There are DMV phone representatives that will be glad to assist you and answer your questions. Remember, \$5 from every plate sale is donated to the Apiculture Program at NC State University for research on the importance of bees to agriculture in our state's economy. Thank you for your support and I hope you enjoy your brand new "Save the Honey Bee" license plate!





Come see us at: 3662 Edgar Rd. Sophia, NC 27350 336-431- BEEZ (2339) <u>Geezneedz@northstate.net</u>

www.beezneedz.com

Shop with us for all your beekeeping supplies & gifts! We also carry gifts for that hard to buy for beekeeper!

A Sweet Idea: The Bottle Helper by Helen Baldwin

H. S. Greene is a member of the Ashe County Beekeepers Association and professional woodworker in the cabinet and molding business. He founded Hidden Happiness Bee Farm (Deep Gap, NC) and has put his skills to work making not only woodenware, but ingenious products to help beekeepers as well. One of his latest and increasingly popular items is the Bottle Helper, designed to ease the process of bottling honey. Made from soft maple lumber and maple plywood, the Bottle Helper has a shelf that accommodates a 5-gallon honey bucket. The shelf tilts from 0 to 45 degrees and locks in any position. It has a stop at the bottom edge so the bucket will



"The Bottle Helper"

not slide off when tilted.

The bottle to be filled sits on an adjustable shelf that fits a 4-oz bottle to a quart bottle, and can be locked at any height. When

a customer wanted to fill wine bottles with honey but couldn't because of the height limitation, H. S. went back to the drawing board. A shelf to accommodate taller bottles is now available.

The Bottle Helper has made bottling honey so much easier on the bottler! No more propping up the bucket for drainage or looking for a helper to hold the bucket up and keep it stationary.

Visit the Hidden Happiness Bee Farm's website hhbeefarms.com or call 336-973-5412 for more information. Hidden Happiness Bee Farm was an NCSBA 2016 Spring Conference Sponsor. Thank You!

The Beekeeper's Companion Since 1861Don't let your beekeeping fall behind the times!ood through 31, 2016You Save 25%!
Published Monthly

Bee School with a Twist

by Lane Kreitlow

The Five County Beekeepers Association (5CBA) joined the ranks of other chapters by hosting its first annual Bee School on April 2nd. Twenty-one aspiring beekeepers devoted an entire Saturday to learn about the fascinating world of bees and beekeeping.

The workshop, held in the lodge of the beautiful Bennett Bunn Plantation in Zebulon, included talks by seven of our club's own experienced members. Participants were encouraged to read "First Lessons in Beekeeping" by Keith Delaplane prior to the class, on which the course was loosely based.

Co-organizer of the course, 5CBA treasurer, NCSBA membership secretary, and Journeyman beekeeper Suzy Spencer got the day started with a motivating talk promoting the Master Beekeeper Program. Lane Kreitlow, co-organizer of the course, newly appointed co-editor of the *Bee Buzz* and Journeyman beekeeper presented a talk on honey bee biology and social structure. Longtime beekeeper and 5CBA vice president C.L. Gobble shared his extensive knowledge on beekeeping equipment.

Our very own 5CBA co-president, NCSBA regional director and Journeyman beekeeper Tim Huffman led students through the different ways to get started with beekeeping. Gov Wallace, our other highly experienced 5CBA co-president and Journeyman beekeeper, got the afternoon session rolling with his insight on hive management and swarming. Dupree's Bees and Woodworking owner/operator and Journeyman beekeeper Craig Dupree led us through a discussion on the many pests and diseases that plague honey bees. Master Beekeeper, NCSBA regional director and owner/operator of Big Oak Bee Farm Kim Underhill rounded out the day with an excellent presentation on products of the hive, honey extraction, and the NC



Honey Standards. The workshop ended with a lively Q&A session about the course material and future goals of the 5CBA.

The course was developed in response to a clever idea orchestrated by 5CBA co-president Tim Huffman: a hive increase project (HIP), whereby brand new beekeepers "split" their way through 18 months of hive management, while learning sound beekeeping practices along the way. The goal is to take one nuc of bees and through a series of subsequent splits, turn it into 12 fully functioning, self-sustaining single-deep, 10-frame colonies by October. Making splits is a way of turning one colony into two or more complete colonies by dividing up the brood and bees into new hives, and allowing the new split(s) to raise their own queen. Tim has mastered this skill and as a result, has never purchased bees in his 9 years of beekeeping!

Tim reflected on his skillful way of expanding his apiary without breaking the bank. "I won my first hive and have never had to buy bees ever since!"

Once there are 12 hives, HIP participants will continue to tend to them and upon successful over-wintering, turn them into 12 double-deep hives in the spring. If all goes well, the hives will produce surplus honey that will be used for club fundraising. It is an ambitious endeavor, indeed, but one that will surely make competent beekeepers out of the participants with this hands-on approach. For more information about this project, please visit the Club Apiary section of our website at **www.5CBA.org**.

NC Bee Buzz - Summer 2016

Continued from previous page

Several club members loaned most of the equipment necessary to pull off this project. After the project concludes, donors will get their equipment back – with bees. Not a bad deal, if you ask me!

Surplus hives will be retained for a new teaching apiary for the club. The HIP is off to a good start. A single nuc collected in February (from Tim's personal apiary) is now 3 single-deeps.

5CBA meets the third Tuesday of every month in Zebulon. The social starts at 6:30 and the main program begins at 7:00. 5CBA includes members from five adjacent counties: Wake, Johnston, Wilson, Nash and Franklin counties, but our doors are open to anyone wishing to join us. A special thanks goes out to all of the participants and speakers for their enthusiasm and hard work on our first annual Bee School, and corresponding HIP project.

We would also like to thank to Tom Hendrickson for allowing us to hold the workshop, and our regular meetings, at the lodge. We look forward to hosting classroom workshops annually.

Intrigued? We will keep you updated on the HIP project as it unfolds...





First Annual 5CBA Bee School at The Bennett Bunn Plantation Lodge in Zebulon



NCSBA To Celebrate 100th Anniversary

by Charles Heatherly, Chairman NCSBA Centennial Committee

The North Carolina State Beekeepers Association is approaching a milestone: the 100th Anniversary of our first meeting held on January 11, 1917 in Winston-Salem. We will be celebrating our long and proud history at the spring meeting in 2017. Few other state organizations have been around longer, or can match the NCSBA's varied achievements. With major accomplishments under our belt like funding a unique honey bee garden and exhibit at the North Carolina Zoo, and supporting the creation of apiculture programs at North Carolina State University and the North Carolina Department of Agriculture & Consumer Services, we surely have earned some bragging rights! Our 4,000 plus membership, a reflection of the rich history of beekeeping in NC, exceeds that of any other state.

A record of our history is posted on our website, including a treatise written by James Greene and Dr. John Ambrose that takes us on an 80-year journey through the history of the organization, beginning with the very first meeting in 1917, in which 40 charter members paid their \$1 dues. The book is available for viewing in the History section of our website: **www.ncbeekeepers.org** Minutes of more recent NCSBA meetings can be found in the Members Only section of our website. Efforts are currently underway to update the minutes.

Activities under consideration for the centennial celebration next year include: production of a video to document our proud history; a fundraising campaign to generate money for building a new apiculture NCSU field lab; and appropriate proclamations by the Governor, the North Carolina General Assembly and the US Congress.

In addition to updating our own NCSBA history, we are asking individual chapters to update their respective histories so that your members will know your chapter's contribution to our success and share in that sense of pride.

Your recommendations and suggestions on how to make this a truly memorable event are welcome. Inquiries and suggestions can be sent to **NCSBA100@gmail.com**

At the NCSBA Library: NEW and IMPROVED!

by Bob Kemper

The steps for requesting materials from the NCSBA Library are being changed. The change should make it easier for you to request materials from the NCSBA collection.

Everything you need to know is under the Audiovisual tab in the Members Only section of the NCSBA website. Since it is members only, you will need the password that is on your NCSBA membership card. Then, just follow the instructions to make a library materials request. It's that easy! What changed? The bibliography link has been replaced with the request form link. You now start with the request form. Select "Request for NCSBA Beekeeping Collection Audiovisual form" and follow the instructions on that form. Fill in the form by copying and pasting the information from the bibliography, or you can type in that information. Then, add your contact information. Click the Submit button at the bottom of the page and you have just completed a request!

If you have any suggestions for new audiovisual titles that we can add to the collection, please let me know-Bob Kemper, NCSBA Librarian at **kemper27530@gmail.com**

Cluster Plan

Does your club have a bee school? How successful has your club been at assigning mentors to those new beeks? Orange County Beekeepers' Association (OCBA) struggled with this dilemma for a while. We think we found a workable solution and would like to share!

OCBA has had a bee school every January for several years. Traditionally, we have about 75 graduating students, many of whom want or need a mentor. We were never really satisfied with our ability to ensure that these newly graduated beekeepers had some guidance as they began the journey through their first year of beekeeping. Two years ago, Master Beekeeper Lewis Cauble, then a member of OCBA and currently one of our State Apiary Inspectors, began mentoring a group of new beekeepers who lived close to him. Around the same time, OCBA was fortunate to have as one of our directors, David Eckert. David, a Journeyman Beekeeper, was charged with overseeing our mentoring program. Challenged to find a workable solution to mentoring new graduates, David used Lewis' idea of working with a group as a jumping off point. From there he developed a fantastic approach to guarantee that all our new beeks have a mentor (or as we call them, a guide) to help them become competent beekeepers.

While bee school was in session, David contacted all the students by email. He asked them to reply if they were interested in having a mentor assigned to them. Approximately 40 students responded! He then created a Google map of the apiary locations of those who replied. Next, he asked club members to respond to him if they were willing to mentor or guide a few graduating students. To encourage people to volunteer, he emphasized that beekeepers with only one year of experience have enough knowledge to help a brand new beekeeper (years of beekeeping experience and Master Beekeeper status are not required). With this encouragement, David was able to secure 14 volunteer guides. As he secured these volunteers, he added their apiary locations to the map that he had created. Using this map, he was able to identify groups of new beekeepers

by Chris Apple



located near a volunteer mentor. He called these groups "clusters" and the mentor the "cluster guide".

The map is chock full of information. The address and contact information for each student and each group guide is easily displayed by clicking on that apiary's place marker. Each cluster group has a particular color, and the guide's apiary is displayed as a star in the cluster color. Using the map, you can see who is in your cluster, how to contact them, and where their apiaries are located.

David introduced the guides to the map at a meeting he organized. During this meeting, he went over the map and detailed what our responsibilities were as guides. Just as important to me as a guide was his detailed account of what we were *not* expected to do. He then sent out an email to the students outlining the same information. Each member of a cluster hosts an apiary visit at least once during the season. All members of that cluster meet at that apiary. The hosting apiary rotates from one member to the next each month. In that way, each apiary is visited at least once during the season. When it is your turn to host, you perform the hive manipulations. The guides are there to answer questions, point out interesting observations in the hive, and suggest alternate ways of performing various tasks. In this way, each new beekeeper in the cluster has a chance to have others inspect their hive with them.

It is hoped that this arrangement will also create bee buddies among the folks in the cluster. Unfortunately, the ideal ratio of one mentor to one new beekeeper has not been an attainable goal for OCBA. There is always room for improvement, but OCBA is on the way to making sure any new beekeeper that wants a mentor has an opportunity to have one!





Wolfpack's Waggle: Happenings at the NCSU Apiculture Lab

by Lane Kreitlow

Ever wonder why some bees are naturally healthier than others? We hear a lot about hygienic behavior, which is the tendency of bees to remove dead or diseased larvae from the hive in order to prevent the spread of germs. Hygienic bees are highly sought after for this natural behavioral resistance to pests and diseases. Hygienic behavior provides resistance at the colony or social level.

What about the immunity of individual bees? Are certain individual bees more resistant to disease because of their physiology, and if so, is it at the expense of 'social level' resistance? Researchers Mike Simone-Finstom and Megan Walz from Dr. David Tarpy's lab at NCSU wondered just that when they looked at how bees keep themselves healthy through behavior and physiology. Results of their study suggest that genetic diversity of individual immune response (acquired by an increased gueen mating number), and not hygienic behavior, results in lower levels of the test pathogen, which was American foulbrood in the study. In other words, genetic diversity provides greater immunity to a colony at the individual level.

In a separate but equally compelling study, post-doctoral fellow and newly appointed NCSU faculty member Margarita López-Uribe compared the immune response of individuals of different species of bees, from solitary to highly social. Results suggest that individual bees of highly social species, like honey bees, had lower immune responses than individuals of bee species that were solitary. Highly social bees live amongst thousands, where individual bees have the benefit of 'social immunity' in addition to individual immunity. Solitary bees, on the other hand, do not have the benefit of 'social immunity' so individual immunity plays a more important role in keeping them healthy. This study supports the idea that in highly social insects, 'social immunity' may be more important in keeping diseases in check than individual immunity.

Pests and diseases are particularly problematic for social insects because germs spread quickly when thousands of potential hosts for those germs are crowded together in a small space. However, there are many benefits to living in a social setting so there are trade-offs at the expense of individuals. How well honey bees withstand pests and diseases is based on immunity at the individual *and* the colony level, but when you are a highly social insect, 'social level' immunity is more important.

Both studies were published in the same issue of *Biology Letters*. Visit the NCSU Apiculture lab newsletter, the Wolfpack's Waggle, at : **https://entomology.ces.ncsu.edu/** for more information about these studies and other activities currently underway at NCSU.



ADVANCE REGISTRATION

NCSBA SUMMER MEETING

HICKORY CONVENTION CENTER

1960-A 13th Avenue Drive, Hickory, NC 28602

JULY 7 - 8 - 9, 2016

Hosted by: NCSBA Local Chapter: CATAWBA VALLEY BEEKEEPERS

Please Print Clearly and Complete Items 1-9

Mail-In Advance Registration Deadline: Midnight, Friday July 1, 2016

1.	Member Name				Member ID #	
		(Last)	(First)			
2.	Spouse Name:				Spouse Member ID	
		(Last)	(First)	Children	n	
3.	Address:					
		(Street)		(City)	(State) (Z	ip)
4.	Local Chapter:			Phone ()		
5.	Email		@	County of Res	idence	

You may also register online at www.ncbeekeepers.org

REGISTRATION FEE

Fees listed below are **ADVANCE** fees. WALK-IN fees at the Summer Meeting will be \$10.00 higher for Individual and Family registrations.

9.	TOTAL AMOUNT ENCLOSED (Check Mad	le Payable to NCSBA Registration)	\$
8.	Banquet Friday night 6:30	- \$25.00 per person	\$
7.	Donation to Apicultural Science Fund (Hone	ey Bee Research) (Optional)	\$
	*NON-NCSBA Family Registration	- \$60.00	\$
	*NON-NCSBA Member Registration	- \$50.00	\$
	Family Registration (NCSBA member)	- \$45.00	Ś
6.	Individual Registration (NCSBA member)	- \$35.00	\$
			AMT. PAID

Mail registration form and check to NCSBA Registration, P. O. Box 1627, Clayton, N C 27528.

*Includes 2016 Annual NCSBA membership for the **primary** registrant. **South Carolina & Virginia Beekeepers** <u>do not</u> need to join the NCSBA to attend the 2016 Summer Meeting but are welcome to do so. If you are a SC or VA and do not wish to join the NCSBA, select the NCSBA Member rate.

NCSBA Members: If you have <u>NOT</u> paid your 2016 Annual Dues (\$15.00), you may do so during registration and receive the NCSBA Membership price. You may register as an active NCSBA Member by providing your membership card or number when registering for the Summer Meeting. 2016 Annual Commercial Memberships are \$30.00.

Attendees are responsible for hotel reservations <u>CUT-OFF DATE</u> for all hotel discount rates is <u>JUNE 23, 2016</u> When registering ask for NC Beekeeper rates

Hickory Convention Center, Hickory, NC			
Best Western, 1520 13th Ave Dr. SE, Hickory, NC 28602	828-323-1150	\$ 78.00 + tax	(2 Queen & breakfast)
		s 83.00 + tax	(King & breakfast)
Court Yard by Marriott, 1946 18th Ave Dr. SE, Hickory, NC 28602	828-267-2100	\$104.00 + tax	(2 Queen or King, no breakfast)
Crown Plaza, 1385 Lenoir Rhyne Rd., Hickory, NC 28602	828-323-1000	s 99.00 + tax	(2 Queen or King, no breakfast)
Fairfield Inn, 1950 13 th Ave Dr. SE, Hickory, NC 28602	828-431-3000	\$ 99.00 + tax	(2 Queen or King & breakfast)
Hampton Inn, 1956 13th Ave Dr. SE, Hickory, NC 28602	828-624-2000	\$129.00 + tax	(2 Queen & breakfast)
		\$129.00 + tax	(King & breakfast)

SEE THE INCISIA WEBSITE FOR A COMPLETE LISTING OF ACCOMODATIONS (www.ncbeekeepers.org)

"Healthy Bees in Hickory" 2016 Summer Conference





Dr. Marion Ellis

Dr. Marion Ellis, retired professor of Entomology at the University of Nebraska will highlight the NCSBA Summer Meeting in Hickory, July 7-9. Dr. Ellis is scheduled to make two presentations during the general session, and possibly conduct additional workshops. The first presentation will be on *Managing Honey Bees for Honey Production*, and the other on, *How to Use Oxalic Acid to Control Varroa Mites*.

Dr. Ellis is a world-class researcher on several topics relating to honey bee health. He retired in 2014 and continues to maintain a rigorous speaking circuit. Here is a link to a YouTube introduction to Dr. Ellis and his recent work: https://youtu.be/apZWJW8H62c

Other presentations at the summer meeting will include:

Mite Biters As a Promising Varroa Control by Jeff Berta

Stressors That Affect Honey Bee Health by Dr. Hongmei Li-Byarlay, a post-doctoral associate at NCSU

The Importance of Nutrition on Colony Health by Dr. Vanessa Corby-Harris, from the Carl Hayden Bee Research Center in Tucson, Arizona

There will be numerous workshops on a variety of subjects of interest to beekeepers. "We have put together an exciting and informative agenda for the Summer Meeting," said NCSBA President Rick Coor. "It promises to be a very worthwhile meeting to attend." The full preliminary program is included in this issue of the *Bee Buzz*, along with registration forms.

See you in Hickory!



NCSBA Summer Conference July 7-9 2016

A Little More About Some of Our Featured Speakers...



Jeff Berta launched Always Summer Herbs in Slippery Rock, PA in 1997 providing high quality, unique and fantastically huge flowers and herbs to commercial garden centers. Jeff expanded the business in 2002 with honey production and onto the web (www.alwayssummerherbs.com) retailing raw honey, herb plants, and teas nationwide. Honey and bee nuclei are the fastest growing segments of our business. Mr. Berta has been awarded US Department of Agriculture Sustainable Agriculture Research Experiment (SARE) grants five out six years (2011- 2016) for his work in the Queen Bee Improvement in Pennsylvania Project. Jeff and a contingent of beekeepers across the state are breeding survivor stock crossed with VSH genetics using chemical free IPM methods to develop more resilient bee stock. In 2014 he was appointed Chairman of the Pennsylvania queen improvement project by the president of the Pennsylvania State Beekeepers Assoc. He has recently joined forces with the Heartland Honey Bee Breeders Coop and Dr. Hunt at Purdue University, helping to

develop and distribute "Indiana Leg Chewers", which is a bee that chews the legs off of varroa mites. During his work with the USDA field study the group discovered other types of "chewing hygienic behavior" in stocks from other sources in the US and in Canada, which are promising. Jeff regularly lectures at local clubs, societies, Home Shows and at the Phipps Conservatory and loves teaching others about growing herbs, brewing teas, and keeping happy, hardy honey bees.



I am **Hongmei Li-Byarlay**, a bee biologist working at North Carolina State University. I obtained my Ph.D. from Purdue University in Entomology and studied insect gut system. I spent three years working with Dr. Gene Robinson at the University of Illinois at Urbana-Champaign and published two big papers on honey bee aggression behavior and epigenetic regulation on gene activities. With my new National Research Council fellowship, I moved to NC to work with Dr. David Tarpy at NC State University and Dr. Olav Rueppell at UNC-Greensboro to focus on honey bee viral stress and physiological stress due to environmental changes. Specifically, most of my work involved in the genomics mechanisms of pathogenic and environmental stressors in honey bee immune system, behavior, and health. My bee research interests focus on the fields of physiology, behavior, and genetics of honey bees (Apis mellifera L.). Current research includes: 1) temporal immune responses and transcriptomic profiling of honey bee pupae after viral infection and 2) the metabolism and metabolic gene expressions, enzyme activities in the mitochondria under oxidative

stress in honey bee castes. My ongoing research is on biotic and abiotic stressors, such as how pathogenic or environmental stressors impact honey bee disease susceptibility, immune response, social behavior, and impacts on their genomic landscaping.



Vanessa Corby-Harris graduated from North Carolina State with a B.S. in Animal Science and then from the University of Georgia with a Ph.D. in Genetics. She then moved to Tucson for an NIH postdoctoral fellowship working on insulin signaling, immunity, and nutrition in mosquitoes. This piqued her interest in nutrition and physiology and she continues working on these topics today. She is now a Research Physiologist at the ARS's Carl Hayden Bee Research Center in Tucson working on how various aspects of nutrition impact bee development and colony health. NCSBA Summer Conference July 7-9 2016

Introducing Our Other Featured Speakers...

Lewis Cauble – NCDA Apiary Inspector Sam Coble – Registered Nurse Brian Fisher – Queen breeder, NCSBA Master Beekeeper Charles Heatherly – NCSBA Master Beekeeper, former NCSBA President Carl Hayden - Honey Bee Research Center, Tucson, AZ Will Hicks – NCDA Apiary Inspector, Biologist Don Hopkins – NCDA Apiary Inspector, Supervisor Pat Jones – NC Department of Agriculture Adolphus Leonard – NCDA Apiary Inspector George McAllister – Hobby Beekeeper, Independent Research Bill Sheppard – Former NCSBA President

Schedule of Events (Subject To Change)

Thursday	9:30 - 4:00	Registration
July 7	9:00 - 12:00	Master Beekeeping testing (no tests issued after 10:30)
	9:00 - 12:00	Master Beekeeping Program: Years 1 - 3, A review from Certified to Journeyman (open to all)
	10:00 - 12:00	General discussion / Q & A with the experts (open to any attendee)
	10:00 - 6:00	Vendor area is open
	12:30 - 1:00	Call to order: Rick Coor, President, NCSBA
		Invocation: Brother Allan Blanton
		Welcome: Dan Hunsucker, Catawba County Commissioner
	1:00 - 2:00	Stressors that affect honey bee health: Dr. Hongmei Byarlay, NCSU
	2:00 - 2:20	Break- visit vendors
	2:20 - 2:35	Door prizes
	2:35 - 3:10	NC Apiary Inspector reports
	3:15 - 4:00	New genetics: Mite biting behavior as promising Varroa control: Jeff Berta
	4:00 - 4:20	Update for the 2017 Celebration of the 100th Anniversary of the NCSBA : Charles Heatherly
	4:30 - 5:00	Pollination report: Bill Sheppard

	N	
	N	CSBA Summer Conference July 7-9 2016
Friday July 8	8:00 - 3:00	Registration continues
July 8	8:15 - 8:30	Opening and announcements: Paul Madren, NCSBA 1st VP
		Johnathan Lutz, President CVBA
	8:30 - 6:00	Vendor area is open
	8:30 - 9:30	New models for state and regional breeding programs: Jeff Berta
	9:30 - 10:00	Break and door prizes
	10:10 - 11:00	Nutrition impact on bee development and colony health: Dr. Vanessa Corby-Harris, Carl Hayden Bee Research Center, Tucson, AZ
	11:10 - 12:00	NCSBA business meeting
	12:00 - 3:00	Master Beekeeping testing (no tests issued after 1:30)
	12:00 - 1:00	Lunch on your own
	1:00 - 1:15	Door prizes
	1:15 - 2:10	Managing bees for honey production: Dr. Marion Ellis, University of Nebraska
	2:30 - 3:30	Workshops
	3:30 - 3:45	Break
	3:45 - 4:45	Workshops continue
	6:30 - 9:00	NCSBA Awards banquet and dinner-Metro Center
Saturday	8:00 - 12:00	Registration continues
July 9	8:00 - 8:15	Welcome and announcements: Doug Vinson, 2nd VP, NCSBA
	8:15 - 8:30	Final door prizes
	8:30	Vendor area opens
	8:30 - 9:20	How to effectively use oxalic acid to control Varroa mites: Dr. Marion Ellis
	9:20 - 9:30	Break
	9:30 - 1015	Bee associated bacteria, pesticides and Varroa: Dr. Corby-Harris
	10:30 - 11:15	Speaker forum
	10:30	Silent auction ends
	11:20 - 11:40	Certified Honey Program report: Kim Underhill
	11:45 - 12:15	Bee Aware Science Team report
	12:15 - 1:00	Lunch on your own
	1:00 - 2:00	Workshops
	2:00 - 2:15	Break
\prec	2:15 - 3:15	Workshops
\succ	3:15 - 3:30	Closing remarks: Rick Coor, President, NCSBA
	3:30	Conference closed
		NC Roo Ruzz - Summor 2016

"Healthy Bees in Hickory" NCSBA Summer Conference July 7-9 2016

Tentative Workshop Schedule

FRIDAY SESSION 1

Scheduling and specialized equipment needed for distributing new genetics	Jeff Berta
The versatile queen castle	George McAllister
Use of an EpiPen [®] to treat anaphylaxis	Sam Coble
The humble bumble bee: Identification and artificial domicile	Dr. Marion Ellis
Miticides: Current concepts and products	Lewis Cauble
Queen ID and marking	Inspector

FRIDAY SESSION 2

Fast and easy ways to spread improved genetics in your region	Jeff Berta
Update on research at USDA Bee Lab, Tucson, AZ	Dr. Corby-Harris
Nectar, honey, pollen and honey bees	B. Townes
Pollinator protection and Field Watch Program	Pat Jones
Are you afraid you are going to goof something up? Well just listen to this!	Will Hicks

"Healthy Bees in Hickory"

NCSBA Summer Conference July 7-9 2016

Tentative Workshop Schedule

SATURDAY SESSION 1

Hive weighing to maximize honey production	George McAllister
Summer splits and requeening: How to, when, why and why not	Brian Fisher
Use of an EpiPen [®] to treat anaphylaxis	Sam Coble
How to read a frame	Inspectors

SATURDAY SESSION 2

How to get that summer split through winter	Brian Fisher
Queen rearing- small scale	Adolphus Leonard
Nectar, honey, pollen and honey bees	B. Townes
Smoker lighting technique	Lewis Cauble

*** All Schedules Are Tentative and Subject to Change ***

For the Bees: Using Chemicals Safely

by Lane Kreitlow

Ah, summer. The birds are chirping, the flowers blooming, and the outdoors are a' calling. It is also time to dust off the weed whacker, pull out the poison ivy salve, and heed to the beckoning call of bug spray. Yes, the season is upon us. If only it were rainbows and butterflies all of the time! But we do not live in Neverland so dealing with weeds and troublesome insects is a fact of life, and chemicals are often a part of the picture.

Whether battling invasive plants or desperate to enjoy the outdoors without getting eaten alive by mosquitoes, there are many reasons why people choose to use chemicals in their environment. The reality is that, while not desirable, using chemicals is sometimes unavoidable. Even if you choose not to use them, your neighbors might, and this could impact your bees. The best we can do as beekeepers and bee advocates is to stay informed about the safest way to use chemicals, and share that information freely. The following are tips for minimizing the negative effect of chemicals on bees when they must be used.

Know your chemicals: Know the chemicals you are using and their toxicity to bees. Label laws require specific mention of the product's toxicity as it relates to bees and other pollinators. There are many chemicals from which to choose, so use ones that are the safest for bees.

Check the "Insect Control" section under "Agricultural Chemicals" here: **content.ces.ncsu.edu/**

READ LABELS CAREFULLY AND FOLLOW THE INSTRUCTIONS PROPERLY: This is perhaps the most important thing you can do. Do not just 'wing it'. Understand how to properly administer the product as indicated on the label. This is not just a friendly public service recommendation; it is the law. As they say, "The label is the law!"

Choose a safer formulation: Use granules, when possible. Liquid is the next best for bee safety. Do not use dust, as drift can be a problem. Microencapsulated formulations are the very worst for bees because the particles are the same size as pollen grains and can be mistakenly be brought back to the hive. Avoid them at all costs.

Timing: Apply treatments late afternoon or early evening when bees are not out foraging.

Avoid drifting: Apply treatments when there is little or no wind to avoid drifting.

Watch for blooms: Do not apply chemicals directly to blooms that attract bees or other pollinators. Remember, bees love many of the weeds that homeowners want to rid their lawn of.

Leave the weeds: In fact, why not consider just leaving those weeds? They aren't *that* bad, are they? Think of the bee food those dandelions are providing before you get rid of them.

Be aware: Do not assume that the person you hire to spray for mosquitoes or weed your lawn will adhere to safe pollinator practices. Hopefully most will, but there will be some who do sloppy work that may pose a risk to your bees. Know the reputation of the company you are using, and watch over them when they come.



Register your hives: If you live in an agricultural community where spraying is inevitable, register your apiary so you will be on the notification list. You will be notified before an aerial treatment is going to be applied so that you have time to cover or move your hives. There are currently two ways to register hives in NC:

1) The first is the State Apiary Registration through the NCDA&CS Plant Industry Division. There is a fee of \$10 per apiary but the registration is protected by regulations and the NC Pesticide Law of 1971: ncagr.gov/plantindustry/Plant/apiary/documents/2015ApiaryRegistrationForm.pdf

2) The second way to register hives is through the new Driftwatch/Beecheck/Fieldwatch Program with the Pesticides Division of NCDA&CS.

www.ncagr.gov/pollinators/Driftwatch.htm This is a free but non-regulated program.

Continued from previous page

Beekeepers are not required to register their hives in NC, but doing so is highly beneficial.

Know your resources: Get to know the NC Cooperative Extension Service, the NCDA&CS and the services they provide for beekeepers. All of the information you need regarding pesticides and pollinators, whether a beekeeper, farmer, landscaper, or homeowner, can be found here: **ncagr.gov/spcap/bee/**

Report losses: If your bees die from what you think was a pesticide kill, contact your regional apiary inspector

www.ncagr.gov/plantindustry/Plant/apiary/apiarymp.html or the pesticides division of the NCDA&CS (919)-733-3556<u>.</u>

For more information about the safe use of chemicals, visit here:



content.ces.ncsu.edu/north-carolina-agricultural-chemicals-manual/pesticide-use-and-safety-information



Mclver - Haas Lifetime Achievement Award Award Nominations Due



Each year, the NCSBA recognizes individuals who have excelled in beekeeping, especially on behalf of the North Carolina State Beekeepers Association. Criteria for Beekeeper of the Year and the McIver Haas Lifetime Achievement Award are posted on the NCSBA Website under the About NCSBA tab.

Please send your nominations to Awards Committee Chair Paul Madren at **firstvp@ncbeekeepers.org**





North Carolina State Beekeepers Association 329 Laurel Street Mount Airy, NC 27030-2911

