



NEWSLETTER

January 2002 Entomology and Nematology News
Entomology and Nematology Student Organization
A University of Florida Publication

Welcome

Welcome to **Roxanne Burrus** from U Mass, a new M. S. student in the urban program.

Publications and Presentations

Robin Giblin-Davis and **Forrest W. Howard**, entomologists at UF's Fort Lauderdale Research & Education Center, published a book on palm insects. Two other authors were Dave Moore of CABI Biosciences and Rey Abad of Dole Food Company. The 400 page book is "Insects on Palms," and was published by CABI Publications and is distributed in the U. S. by Oxford University Press. A description and reviews of the book can be found on Amazon.com. The book has been added to the University of Florida library collections. It is also in the DPI library. A copy of it is in the book display in the Entomology and Nematology building.

McFarland, C. D. and **Marjorie A. Hoy.** 2001. Survival of *Diaphorina citri* (Homoptera Psyllidae), and its two parasitoids, *Tamarixia radiata* (Hymenoptera: Eulophidae) and *Diaphorencyrtus aligarhensis* (Hymenoptera: Encyrtidae), under different relative humidities and temperature regimes. Florida Entomol. 84: 227-233.

Hoy, M. A., A. Jeyaprakash and **R. Nguyen.** 2001. Long PCR is a sensitive method for detecting *Liberobacter asiaticum* in parasitoids undergoing risk assessment in quarantine. Biological Control 22: 278-287.

Rebecca Baldwin, a Ph.D. student working in this area, made additions to The School IPM Web site at <http://schoolipm.ifas.ufl.edu/>. The site now contains sample universal and specific incident notification letters for pesticides in an IPM program. The universal letter is two pages long, the second page being the request by a parent to receive specific notifications. These are found under Administrator Information - Sample Letters They have also added sample pesticide warning signs (in both English and Spanish) for both indoor and outdoor applications of pesticides in both the Warning and Caution categories. These are

found under Administrator Information - Forms. Direct links to the forms and letters are also found under Latest Additions.

M.A. Hoy presented an invited talk "Transgenic Insects for Pest Management Programs: Potential Risks", at the "Workshop on Defining Science-Based Concerns Associated with Animal Biotechnology", organized by the Division on Earth and Life Studies, Board on Agriculture and Natural Resources, National Academy of Sciences, November 27, 2001, Washington, D.C.

Richard Pluke recently organized a workshop for farmers in the central mountain region of Puerto Rico titled "Manejo Integrado de Plagas en Repollo" (Integrated Pest Management in Cabbage). Participants included individuals from industry and from the University of Puerto Rico as well as the farmers themselves. The workshop was used as an introduction to a series of interviews that Richard is doing with the farmers in the area. These interviews are intended to help establish levels of compatibility between the small-scale farming systems of the mountains and proposed integrated pest management strategies in cabbage.

ESA Meeting Presentations

Presented talks and posters at the Entomological Society of America meeting in San Diego, December 8-12, 2001.

Baldwin, R. and Philip Koehler. "Evaluative Judgments - Perceptions of Insects and Insecticides"

Branscome, Deanna and P. Koehler. "Susceptibility of Four Strains of German Cockroaches to CO2 Anesthesia"

Brooks, Shawn and P. Koehler. "Field Evaluation of Dog Assisted and Human Visual Inspection for Termites"

Buss, Eileen. "Perspectives on Turf Grass Pest Management"

McCanless, Kim and P. Koehler. "Lipid Content in the Eastern Subterranean Termite *Reticulitermes flavipes*"

Richman, Dina and P. Koehler. "Risk Assessment of Home Maintenance and Construction Types to Predict Subterranean Termite Infestations"

Neeley, Alison. A poster "Critters in the Classroom - Using Insects to Teach Science"

Hill, Shane and M. A. Hoy. A poster, "Interactions between *Solenopsis invicta* and *Lipolexis scutellaris*, a Parasitoid of *Toxoptera citridica*: Affecting the Efficacy of a Classical Biological Control Agent?"

Hoy M. A., A. Jeyaprakash and R. Nguyen. "Long PCR is a Sensitive Method for Detecting Greening Disease, *Liberobacter asiaticum*, in Parasitoids Undergoing Risk Assessment in Quarantine"

Nguyen, An and P. Koehler "Survivability of Salmonella Bacteria in German Cockroaches"

Jeyaprakash, A. and M. A. Hoy. " A Molecular Ladder Assay Designed Using Mitochondrial 12S rRNA Sequences Can Identify Six Commercially Available Phytoseiids"

Skelley, Lucy and M. A. Hoy. A poster, "Rearing Parasitoids of the Asian Citrus Psylla in a Tri-Trophic Quarantine System"

Tucker, Cynthia and P. Koehler. "Effect of Various Densities of Eastern Subterranean Termites of Tunnel Network Formation"

Walker, Alison and M. A. Hoy. A poster, "Physiological and Behavioral Factors Affecting the Success of Parasitism of *Toxoptera citricida* (Homoptera: Aphididae) by *Lipolexis scutellaris* (Hymenoptera: Aphidiidae)"

Congratulations goes out to the Linnaean Team who received 2nd place at the Linnaean Games in San Deigo. The team members are, Scotty Long, **Matthew Brightman, Jim Dunford, Scot Waring, Katie Barbara** (alternate), **Shane Hill** (coach), and **Dr. Eileen Buss** (advisor).

Congratulations goes out to **Cindy Tucker** who received the \$4000.00 Stan Beck Fellowship at the ESA meeting in San Deigo.

History Buff

In addition to being an entomologist, on many weekends you also will find **Tom Fasulo** dressed as a Civil War soldier. He is an active and well known Civil War living historian at state and national parks in Florida. This past summer, a half hour TV show called "Hardcorps in the Civil War" was broadcast on British TV and Tom was listed as the historical consultant. One of the reasons Tom is considered to be an authentic living historian is that he grows his own body lice instead of having to buy them from the sutlers (period merchants).

Life after UF

Michael Patnaude - recent Ph.D. graduate - sent his wife and two kids on a plane to stay with his parents in New Bedford, MA, while he traveled the 24 hour trek with their fully packed minivan including a Lab and two cats. They later found a house in Connecticut by the ocean and he soon started his job as Director of the Westchester County Arthropod Surveillance program in NY (about 20 miles from ground zero). He spends his time trapping mosquitoes, sampling larvae, tick flagging, supervising, writing reports, having fun with political triangles, making recommendations, freezing to death (he forgot how cold it gets there) and other various mosquito control practices. Mike stays in contact with the department's doings and just

added two excellent photographs to the [green lynx](#) spider publication in Featured Creatures. He is also the author of the [blacklegged tick](#) in Featured Creatures. Contact him if you are visiting the area, want some mosquito/tick samples, or just want to say hi. He can be reached at mapa@westchestergov.com or Westchester County Department of Health, Division of Disease Control, Arthropod Surveillance Program, 420 North Avenue, New Rochelle, NY 10801

Shawn Brooks successfully completed his M. S. degree in Dec. 2001. His thesis was titled "Canine Termite Detection." He will continue on for his Ph.D. under **Phil Koehler**.

If you have any information regarding the post-graduate life of former students (jobs, family, etc.), please submit it for publication in the next newsletter.

Insect Web Site Poster

During the summer of 2000, **Tom Fasulo** hosted two junior high school teachers in his lab. The teachers were participating in the Teacher's Research Upgrade Experience (TRUE) at UF. Gerry Adams, a teacher with the Department of Defense in Germany, conceived the idea of a poster to introduce students (K-12) to the best entomological sites on the Web. He titled the poster, "Creeping and Crawling Across the Web." The poster was delayed since UF/IFAS was due to change many of its Web URLs during the spring of 2001. Gerry Adams, due to his lack of entomological training, also chose most of the Web sites based on the graphics on their main pages and not always because of outstanding content. Once the transition to the new UF/IFAS Web URLs was completed, Tom dragged Alison Neeley, an M.S. student with outreach responsibilities, and Jane Medley, departmental graphic artist, into the project. Alison and Tom then selected many new sites and worked with Jane to develop the poster. The poster retains Gerry Adams' title and has twelve sites displayed. Five are UF sites and seven are from federal agencies, other universities or private authors - all of which provided permission to reproduce portions of their sites. The two by three foot color poster is now at the printers and should be available by the end of January. IFAS will sell the poster for \$5, but discounts are available to authorized resellers (40%) and for quantities of 15 or more (25%). The Entomology and Nematology Student Organization (ENSO) will also sell the poster at the department's front desk. The poster is designed so that outside organizations can include their logo and obtain posters at a greatly reduced price (minimum 1,000 copies) for distribution through their own channels. Questions should be directed to Tom Fasulo.

Featured Creatures

The UF Entomology and Nematology Department and the FDACS Division of Plant Industry have added files on the following organisms to the Featured Creatures WWW site at: <http://creatures.ifas.ufl.edu/>. There are now over 250 Featured Creatures files, with more undergoing development.

Nguyen, R. [Citrus whitefly parasitoid](#), *Encarsia lahorensis* Howard.

Nguyen, R. [Citrus blackfly parasitoid](#), *Amitus hesperidum* Silvestri.

Nguyen, R. [Citrus blackfly parasitoid](#), *Encarsia opulenta* (Silvestri).

Dixon, W.M., and T.R. Fasulo. [Tarnished plant bug](#), *Lygus lineolaris* (Palisot de Beauvois).

Habeck, D.H., F.W. Mead and T.R. Fasulo. [Lantana lace bug](#), *Teleonemia scrupulosa* St l.

Weems, H.W., and W.H. Whitcomb. [Green lynx spider](#), *Peucetia viridans* (Hentz).

McAuslane, H.J. [Oleander aphid](#), *Aphis nerii* Boyer de Fonscolombe

C.F. Miller. [Tea scale](#), *Fiorinia theae* Green.

Auffenberg, K., and L.A. Stange. [Snail-eating snails of Florida](#).

Mead, F.W. [Bigeyed bugs](#), *Geocoris* spp., in Florida.

Capinera, J.L. [American serpentine leafminer](#), *Liriomyza trifolii* (Burgess).

Capinera, J.L. [Vegetable leafminer](#), *Liriomyza sativae* Blanchard.

Scheffrahn, R.H., and B.J. Cabrera. [Western drywood termite](#), *Reticulitermes flavipes* (Kollar).

Dekle, G.W. [Green scale](#), *Coccus viridis* (Green).

Strickland, J.S. [Peachtree borer](#), *Synanthedon exitiosa* (Say).

New text and/or photographs were added to the files on: guava fruit fly, oriental fruit fly, Diaprepes root weevil, house fly, amphipods, tobacco budworm, European corn borer, palmetto weevil, green lynx spider and Florida bromeliad weevil.

To save space, these publications are not listed exactly as they should be cited. The complete correct citation is: Author(s). (date of publication). Full title. *UF/IFAS Featured Creatures*. EENY- ##. URL

Some Requested Featured Creatures

Interested in writing a Featured Creature file and earning a UF/IFAS extension publication? County extension faculty have requested files on the following: cicada killer wasp, gnats, chiggers, sewer gnats, solitary wasps, robber flies, velvet ants, ground pearls, psocids, carpenterworm moth, flea beetles, booklice, ox beetles, springtails, lesser mealworm, phorid flies, drosophilid flies, black soldier fly, clytrine leaf beetle (*Anomoea* sp.), damsel bug, minute pirate bug, green lacewings, sharpshooters, red thrips, whip

scorpion, black widow spider, crane flies, brown stink bug, soybean looper, eastern tent caterpillar, sand fly, sawtoothed grain beetle, confused flour beetle and yellow mealworm.

Please contact **Tom Fasulo** before starting work on any Featured Creature - just to ensure someone else hasn't already claimed it. There may be over a million identified species of insects and only 250 Featured Creatures, but you'd be surprised at the number of times there have been conflicts.

Florida Pest Alert

The Florida Pest Alert WWW site is available at <http://PestAlert,ifas.ufl.edu/>.

Jorge Pena, research entomologist at the University of Florida's Homestead Research Center, released three species of parasitic wasps in the citrus groves to control the harmful diaprepes root weevil. Early results look very good. Links to the press release and a Featured Creatures files on [diaprepes root weevil](#) is available from the Florida Pest Alert site.

Other information available from Pest Alert include a link to a summary of the West Nile virus in America. Florida began the year without the virus and ended it with the virus confirmed in 53 counties. There were eleven confirmed cases, but no deaths. Health officials warn that the virus is still present and care still must be taken to prevent mosquito bites. Detailed information on repellents, DEET and alternatives developed by our own Dr. Jerry Butler, is available from the Pest Alert site.

The Pest Alert listserv ended the year with over 350 subscribers worldwide and the site received over 23,000 hits in 2001. If you have Florida pest-related information, Pest Alert is a good place to place a summary or link so that others can find the information. Information on Pest Alert also is incorporated into many county extension newsletters.

Mole Crickets

The MCricket Web site [<http://molecrickets.ifas.ufl.edu/>] developed by Howard Frank, Tom Fasulo and Don Short was selected by the Natural History Museum of London for its Natural Selection Web site [<http://nature.ac.uk/>]. The Natural Selection Web site is a gateway to quality evaluated Internet resources in the natural world. Natural Selection is part of BIOME [<http://biome.ac.uk/biome.html>], an integrated collection of Internet gateways covering the health and life sciences.

Georgia Approves More Tutorials

The Georgia Pest Control Association [GPCA] has received approval from the State of Georgia to use three more University of Florida Bug Tutorials for CEUs in that state. This makes six such tutorials GPCA has approved for use in Georgia. The tutorials were developed by Thomas Fasulo and others in the department and train certified pesticide applicators and technicians alike in the identification, biology and ecology of common pests. Also available on the UF Buggy Software site are free downloadable tutorials

on mosquitoes, butterflies and several pesticide labels. The mosquito tutorials are authorized for CEUs in Florida and the pesticide tutorials are authorized for CEUs in Florida and West Virginia. The Buggy Software site is at <http://pests.ifas.ufl.edu/software/>.

Image Galleries

Tom Fasulo has added two new insect image Web sites to the Educational and Extension Materials section of the Florida IPM and BioControl Web site at <http://ipm.ifas.ufl.edu/>. This brings the total of such image galleries to eight. The images on these sites, like most of the other image sites listed, are not in the public domain (except for the USDA site), but are available for educational, noncommercial use. You must follow the requirements listed at the sites for use. Remember, these organizations provide very useful photographs and drawing. Violating the posted requirements could result in those organizations pulling these images off the Web. Or as we learned while reading fairy tales - Don't kill the goose that lays the golden egg.

NATL News

In mid December the Physical Plant Division planted more than 2375 longleaf pine seedlings in the upland pine areas of the [Natural Area Teaching Laboratory](#). This is an important step in the restoration of this ecosystem because there was almost no reproduction of longleaf pine in what is now NATL during the 50+ years its pine land went unburned. The pines were planted haphazardly (not in rows) with the planting rate being about 255 per acre for the public area pine land and 160 per acre for the academic area pine land. Because the seedlings are in the grass stage, their buds are in the ground and should not be killed during the controlled burns planned for the pineland this winter.

Outreach

Alison Neeley would like to thank everyone who has helped her the past few months with outreach programs. First, thank you to everyone who donated craft supplies: **Dr. Hall, Dr. Capinera, Dr. Butler, Dr. Smart, Katie Barbara, Rebecca Baldwin, Jane Medley, Steve Lasley**, and all the people who left things in my mailbox. A very special thanks goes out to **Cara Cogdon** and **Christy Chancey** for their very generous donations of new supplies and prizes and to the Urban Entomological Society for the funding to buy other necessities. Thank you all very much. We had many successful programs in part because of your generosity.

Thanks also to everyone who helped with various events throughout the month. **Alison Neeley** and **Rebecca Baldwin** both gave presentations about insects for an after-school program at Idylwild Elementary School. Erin Finn Alison organize and man the department's table at the Florida Museum of Natural History's "Halloween Science Spooktacular" on October 27th. There were live insects, an insect quiz game, and the children made butterfly masks. **Heather Smith, Scotty Long, and Rebecca Baldwin** conducted a tour of the department for about 20 middle school groups from Westwood Hills Christian School while Alison was speaking to 150 students at Bradford County 4-H Field Day. A special thanks also goes out to the individuals who continuously open up their labs for visits: **Lois Wood** from the ant lab, the Nematology lab, **Katie Barbara** from Landscape Entomology, **Aurelien Tartar** from Pathology, the

Urban lab. I recognize how disruptive these visits are and greatly appreciate your sacrifice and time. **Alison Neeley, Aissa Doumbouya** and **Matthew Brightman** helped **Dr. Hall** set up and man the Entomology and Nematology Department's booth at Santa Fe's UF recruitment day. Thanks for all your help.

Volunteers are needed to help man the departmental booth at the upcoming Florida State Fair in Tampa. The dates are February 7-18th and two to three people are needed for each day. Entrance tickets and parking passes will be provided. If you, your friends, or family would like to volunteer, please contact Alison Neeley at 392-1901 x 211.

Awards and Honors

Dr. Gene Gerberg was honored at the recent Commencement Ceremonies for being a World War II veteran, and associated with the University of Florida. Gene was commanding officer of a malaria detachment in the Pacific theater, and stayed in the Army Reserves after the war, and eventually retired as a Colonel. Dr. Gerberg's honors and recognition include listings in American Men of Science and Who's Who in the World, selection to the Sigma Xi honorary scientific fraternity, the presentation of Outstanding Entomologist by the American Registry of Professional Entomologists and the awarding of the U.S. Army Meritorious Service Medal.

Faith Oi and **Phil Koehler** were awarded \$83,700 for an EPA Urban Initiative grant "IPM in Schools and Daycares."

Kim McCanless was awarded the \$500 UES Graduate Student Scholarship for the Fall Semester. Congratulations.

Faith Oi, Phil Koehler and **Cynthia Tucker** were awarded \$7,000 from the Center for IPM (CIPM) for their proposal titled "In-Depth IPM Materials and Training for School Pest Managers in Florida." CIPM is an NSF sponsored, Industry/University cooperative research center which works to support and further IPM.

Philip Koehler and **Faith Oi** were awarded \$39,000 from FDACS to evaluate the effects of residual soil termiticides on CPVC and cross-linked polyethylene pipe, in cooperation with NSF International.

Ricky Vazquez has stepped up as the new president of UES for the Spring Semester.

Bug Pics

If you haven't visited the on-campus Florida Museum of Natural History lately, as in the last few weeks, then you haven't seen the beautiful insect photographs currently on display there. The display illustrates the work of Gainesville-based, USDA research entomologist and award winning photographer **Andrei Sourakov**, who received his Ph.D. in entomology from UF in 1997. Andrei has traveled the world, often on grants, taking photographs of insects for himself, the National Geographic Society, and the Association

for Tropical Lepidoptera Rain Forest Fund . The display at the Museum is from his Lepidoptera collection. (Just so you don't think Andrei is blowing his own horn, **Tom Fasulo** stumbled across the display this past weekend and sent in this notice.)

Pest or Beneficial or Both?

Ray Zerba has been a member of the Clay County Cooperative Extension Faculty for 20 years and has never seen an infestation of the [multicolored Asian lady beetle](#) in homes. In just one week recently he reported five such calls. A very effective predator of agricultural pests, this beetle likes to overwinter in structures in huge numbers. Obviously this beetle is now becoming more of a pest in Florida during the winter months. In case you are contacted about this species, Dr. Russ Mizell of UF's Monticello Research Center, has written a Featured Creatures publication on this species. Mizell is also working on a trap for the beetle that will hopefully reduce the problems in structures, as well as provide hordes of beetles that can be saved for release to agricultural fields in the spring. Mizell and Howard Frank have also written a Featured Creatures Publication on all [lady beetles](#) found in Florida. A link to the multicolored Asian lady beetle is available from the Florida Pest Alert site at <http://PestAlert.ifas.ufl.edu/>. You can also access that publication and the one on all lady beetles from the Featured Creatures site at <http://creatures.ifas.ufl.edu/> A side note: This beetle is often referred to by various names in the press and even by entomologists. However, the approved common name in North American by the Entomological Society of America Committee on Common Names is "multicolored Asian lady beetle."

SOMETHING MISSING FROM YOUR NEWSLETTER?

If there is something you would like to see in future editions of the newsletter, please send all thoughts, suggestions and supportive criticisms to **Rebecca Baldwin**.

A hard copy of this newsletter is given to department members in building 970 only. All others can obtain an electronic subscription by sending a request to listserv@lists.ufl.edu and in the text of the message type:

subscribe UF-bugnews-L yourfirstname yourlastname

Turn off any signature file, if you have one. You will receive instructions for confirming your subscription and further information on the rules for the list server.

This version of the newsletter is prepared for the Web by **Andy Koehler**.

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