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USDA Forest Service Issue No. 02-3 Washington February/March 2002 Forest Health Protection Staff (2150) Forest Health Technology Enterprise Team

## SHORT SUBJECTS AND TIMELY TIPS FOR PESTICIDE USERS Issue No. 02-3

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## **<u>Call For Articles</u>**

### **BIOLOGICAL CONTROL, IPM, AND EXOTIC PESTS PEST CONTROL**

## DISPERSAL OF ANOPLOPHORA GLABRIPENNIS (CERAMBYCIDAE) (M.T. Smith, J. Bancroft, G. Li, R. Gao, and S. Teale)

(Source: Environ. Entomol. 30(6): 1036-1040, 2001)

"Abstract: As a basis for the development of both eradication and management strategies for control of Anoplophora glabripennis Motschulsky (Asian longhorned beetle) investigations of A. glabripennis dispersal were undertaken in Gansu Province, China, in 1999. Data analysis of the first year study of population dispersal, in which > 16,000 adult A. glabripennis were marked and released (mass-mark recapture method), has shown that the mean dispersal distance for A. glabripennis was ~266 m, whereas the 98% A. glabripennis recapture radius was 560 m. More notably, A. glabripennis dispersal potential over a single season was found to be 1,029 m and 1,442 m, for male and gravid female beetles, respectively, which is well over the previously reported distances. There was also a directional bias in dispersal. These results indicate that surveys for adult beetles and infested trees at a minimum of 1,500 m from previously infested trees would assist in preventing continued colonization in the current U.S. infestations in New York and Chicago, and therefore enhance efforts to eradicate A. glabripennis from the United States. Data from the second year of this study (2000) will be used to enhance a predictive model of invasion by A. glabripennis in landscapes at risk in the United States."

> For a copy of this publication -CONTACT: PAT SKYLER (CA)

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# AGE-SPECIFIC FECUNDITY OF ANOPLOPHORA GLABRIPENNIS (COLEOPTERA: CERAMBYCIDAE) ON THREE TREE SPECIES INFESTED IN THE UNITED STATES (M.T. Smith, J. Bancroft, and J. Tropp)

(Source: Environ. Entomol. 31(1): 76-83, 2002)

"Abstract: The spread of Anoplophora glabripennis Motschulsky (Asian long horned beetle), in the United States is dependent on its rates of reproduction and dispersal among host-tree species. Therefore, investigations of the reproductive characteristics of A. glabripennis, including preovipositional period, age specific fecundity and survival, on Norway maple (Acer platanoides L.), red maple (Acer rubrum L.), and black willow (Salix nigra Marshall) were undertaken to quantify its reproductive capacity among these host-tree species under

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laboratory conditions. Differences were found in preovipositional period, fecundity, egg viability and survival among the host-tree species. Oviposition rate was positively correlated with beetle body size, but negatively correlated with beetle age, bolt area, diameter, and bark thickness. Collectively, results show that in terms of adult female A. glabripennis survival and reproductive capacity, Norway and red maple were more suitable than black willow, with Norway maple somewhat more suitable than red maple. We hypothesize bark thickness and woody-tissue characteristics (i.e., nutritional substances, secondary substances, structural features) caused, at least in part, the observed differences in A. glabripennis survival and reproduction. Comparison of the various measures of A. glabripennis reproductive capacity was made with other cerambycids, specifically species of the subfamily Lamiinae, and implications for development of management strategies in U.S. ecosystems are discussed."

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# THE CALIFORNIA HYDRILLA ERADICATION PROGRAM

(Source: Noxious Times, Vol. 4, No. 2, Fall 2001, California Interagency Noxious Weed Coordinating Committee)

Hydrilla (Hydrilla verticillata (L.F.) Royle) is currently "the only noxious weed in California with a specific mandate from the Legislature that it be eradicated from the State wherever it is found (California Food and Agriculture Code Section 6048)." A native of Eurasia, hydrilla was first detected in California in 1976. The California Hydrilla Eradication Program was started in 1977 with the California Food and Agriculture (CDFA) named as the lead agency. The largest infestation currently being actively eradicated is 1,335 acres in Clear Lake (Lake County). CDFA has eight ongoing hydrilla eradication projects at the present time. The Program has several major components including: identification; exclusion; quarantine; survey and detection; research; cultural, biological, physical, and chemical eradication methods; and public awareness and action.

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#### **REGULATORY**

### **PHYTOPHTHORA RAMORUM; QUARANTINE AND REGULATIONS**

(Source: Federal Register: February 14, 2002, Vol. 67, No. 31, pp. 6827-6837)

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Agency: Animal and Plant Health Inspection Service, USDA

"Summary: We are quarantining 10 counties in the State of California [Marin, Alameda, Mendocino, Monterey, Napa, San Mateo, Santa Clara, Santa Cruz, Solano and Sonoma] and a portion of 1 county in the State of Oregon [Curry] because of the presence of Phytophthora ramorum and regulating the interstate movement of regulated and restricted articles from the quarantined area. This action is necessary on an emergency basis to prevent the spread of P. ramorum to noninfested areas of the United States."

The interim rule became effective on February 14, 2002. Consideration will be made to any comments postmarked, delivered, or emailed by April 15, 2002. For information concerning submitting comments or other questions contact Jonathan Jones, APHIS, (301) 734-8247.

For a copy of the document published in the Federal Register -CONTACT: PAT SKYLER (CA)

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# **APPLICATION FOR NEW ACTIVE INGREDIENT**

(Source: The Georgia Pest Management Newsletter, Vol. 25, No. 1, January 2002)

EPA is anticipating a speedy registration for a new biopesticide, Chondrostereum purpureum isolate PFC 2139. It is being proposed as a biological herbicide to control alders, aspens and other hardwoods in rights of ways and forests. Review of the active ingredient is being conducted as a joint review with the Pest Management Regulatory Agency in Canada.

For the most up to date information on Biopesticide Federal Register Notices by active ingredient visit EPA's website at <a href="http://www.epa.gov/pesticides/biop\_fr\_ai.htm">http://www.epa.gov/pesticides/biop\_fr\_ai.htm</a>.

#### HUMAN HEALTH

# **ENVIRONMENTAL, HEALTH GROUPS PETITION EPA TO BAN CREOSOTE WOOD PRESERVATIVES**

(Source: Press Release, Beyond Pesticides/National Coalition Against the Misuse of Pesticides)

"Washington, DC, February 26, 2002 - Citing government inaction to protect the public from exposure to toxic wood preservatives, leading environmental and public health groups petitioned the EPA today to immediately stop the continued use of creosote. The groups say that

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EPA has sufficient data on creosote's health and environmental risks to initiate cancellation and suspension proceedings."

EPA announced a voluntary phase-out of chromated copper arsenate (CCA) by the pressure-treated wood industry several weeks ago. CCA is one of the three most widely used heavy-duty wood preservatives, the other two being pentachlorophenol (penta), and creosote. Beyond Pesticides states in the press release that "the hazards associated with the use, storage and disposal of these three products are unnecessary, given that viable alternatives are available for all uses."

A copy of the press release is available online at <u>http://beyondpesticides.org/main.html</u> or CONTACT: PAT SKYLER (CA)

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### **MISCELLANEOUS**

## FY 2002 FOREST HEALTH PROTECTION SPECIAL TECHNOLOGY DEVELOPMENT PROJECTS FUNDED

Fiscal Year 2002 funding for the USDA Forest Service, Forest Health Protection, Special Technology Development Program, was announced on January 23rd. Funding was approved for 14 new project proposals and all 24 existing projects. For a listing of the project proposals contact Pat Skyler, (916) 454-0817, <u>pskyler@fs.fed.us</u>.

For information about the Program -CONTACT: MARLA DOWNING (CO) (970) 295-5943 <u>mdowning@fs.fed.us</u> <u>back to top</u>

## PESTICIDE EXPORTS FROM U.S. PORTS, 1997-2000

(Source: The Georgia Pest Management Newsletter, Vol. 25, No. 1, January 2002)

"According to the Foundation for Advancements in Science and Education (FASE), U.S. Customs records show that the U.S. exported nearly 3.2 billion pounds of pesticide products from 1997-2000. The average rate per day (2.2 million pounds) is a 15% increase over the daily export rate from 1992-1996. Approximately 60% of the pesticides were shipped to destinations in the developing countries"

The article appeared in Global Pesticide Campaigner, Vol. 11, No. 3, December 2001. The article discusses: Findings, Domestically file:///C|/Inetpub/wwwroot/foresthealth/pesticide/news/subjects\_tips/03\_1/03\_1\_web.html (6 of 14) [3/12/2002 5:21:48 PM]

forbidden products, Highly toxic exports, Restricted use products, adverse health effects: cancer, and Recommendations.

For a copy of this publication -CONTACT: PAT SKYLER (CA)

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# **RISK RATING FOREST STANDS FOR INSECT AND DISEASE IMPACTS: A SIMPLIFIED APPROACH USING AERIAL PHOTOGRAPHY DATA RSAPD (Version 1.0)** (C.L. Schmitt and D.C. Powell)

(USDA Forest Service, Pacific Northwest Region, Report No. BMPMSC-02-03, January 2002))

"Introduction. Risk rating forested conifer communities of the interior Pacific Northwest for vulnerability to multiple insect and disease disturbances, or hazard rating, has been done using several different techniques in recent years (Ager and others 1995, Hessburg and others 1999a, Scott and others 1998, Steele and others 1996). A variety of individual insect and disease models have been developed as well (Amman and others 1977, Schmid and Frye 1976, Weatherby and Their 1993), and some of them were incorporated into stand hazard rating models. Many of the hazard rating models require tree and stand-level data similar to that collected during a 'high resolution' field survey such as a stand examination. For a variety of reasons, but especially cost factors, stand examinations are not being conducted as frequently as in years past, and existing field surveys are often outdated or their geographical coverage is incomplete. As a consequence of these trends, use of 'low resolution' surveys such as remote sensing (aerial photograph interpretation) is increasingly being used to characterize vegetation conditions. Moreover, remote sensing vegetation data, regardless of whether it was interpreted directly from aerial photography or derived from other sources, can be used when calculating simplified, additive risk rating functions (Hessburg and others 1999a)."

This publication is available online at <u>http://www.fs.fed.us/r6/nr/fid/pubsweb/rsapd.pdf</u> or - CONTACT: PAT SKYLER (CA)

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#### **ON THE INTERNET**

Several full text USDA Forest Service publications are available electronically at the following sites: <a href="http://www.fs.fed.us/rm/main/pubs.html">http://www.fs.fed.us/rm/main/pubs.html</a>

http://www.fs.fed.us/r6/nr/fid/pubs.shtml

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http://www.srs.fs.fed.us/pubs/publist.jsp

http://www.ncrs.fs.fed.us/searchtools/search.asp

http://www.fs.fed.us/ne/home/publications/pubonlin.html

http://www.fs.fed.us/pnw/pubs.htm

http://www.psw.fs.fed.us/techpub.html

http://www.fs.fed.us/global/iitf/libpdf.html

Visit the new Forest Health Protection, Pesticide Management and Coordination web page at <u>http://www.fs.fed.us/foresthealth/pesticide/index.html</u>.

Invasive and Exotic Species of North America is a website that provides images in the following categories: Insects, Weeds, Diseases, Biological Control Agents, and Other Invasive or Exotic Organisms. The site is located at <a href="http://www.invasive.org/">http://www.invasive.org/</a>.

The Exotic Forest Pest Information System for North America is a database that "identifies exotic insects, mites and pathogens with potential to cause significant damage to North American forest resources. The database contains background information for each identified pest and is intended to serve as a resource for regulatory and forest protection agencies in North America." The site and database are provided under contract by the NSF Center for Integrated Pest Management, located at North Carolina State University. The USDA Forest Service is a member of the Center. It can be accessed at <a href="http://www.exoticforestpests.org/">http://www.exoticforestpests.org/</a>.

PLANTS database is a single source of standardized information that focuses on vascular plants, mosses, liverworts, hornworts, and lichens of the U.S. and its territories. The database "includes names, checklists, automated tools, identification information, species abstracts, distributional data, crop information, plant symbols, plant growth data, plant materials information, plant links, references, and other plant information. Access the site at <a href="http://plants.usda.gov/home\_page.html">http://plants.usda.gov/home\_page.html</a>.

Pesticide Product Information System (PPIS) is an EPA site that contains information concerning all pesticide products registered in the United States including registrant name and address, chemical ingredients, toxicity category, product names, distributor brand names, site/pest uses, pesticidal type, formulation code, and registration status. Access the site at <a href="http://www.epa.gov/opppmsd1/PPISdata/index.html">http://www.epa.gov/opppmsd1/PPISdata/index.html</a>.

The Sudden Oak Death Task Force has several publications available online at <a href="http://www.cnr.berkeley.edu/comtf/educationmaterials.html">http://www.cnr.berkeley.edu/comtf/educationmaterials.html</a>.

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# **PUBLICATIONS**

Allen, K.K., D.F. Long, and F.J. Cross. 2002. Evaluation of Douglas-fir beetle along the North Fork of the Shoshone River, Shoshone National Forest, Wyoming. Biological Evaluation R2-02-03. USDA Forest Service, Rocky Mountain Region. (Available online at <a href="http://www.fs.fed.us/r2/fhm/reports/be\_r2-02-03.pdf">http://www.fs.fed.us/r2/fhm/reports/be\_r2-02-03.pdf</a>)

Allen, K.K., D.F. Long, and F.J. 2001. Evaluation of mountain pine beetle activity on the Black Hills National Forest. Biological Evaluation R2-02-02. USDA Forest Service, Rocky Mountain Region. (Available online at <a href="http://www.fs.fed.us/r2/fhm/reports/be\_r2-02-02.pdf">http://www.fs.fed.us/r2/fhm/reports/be\_r2-02-02.pdf</a>)

Goheen, E.M., D.J. Goheen, K. Marshall, R.S. Danchok, J.A. Petrick, and D.E. White. 2002. The status of whitebark pine along the Pacific Crest National Scenic Trail on the Umpqua National Forest. General Technical Report PNW-GTR-530. USDA Forest Service, Pacific Northwest Research Station. (Available online at <u>http://www.fs.fed.us/pnw/pubs/gtr530.pdf</u>)

Ikuma, E.K., D. Sugano, J.K. Mardfin. 2002. Filling the gaps in the fight against invasive species. LRB Report No. 1, (109 pp). Legislative Reference Bureau, Honolulu, HI. (Available online at <a href="http://www.state.hi.us/lrb/rpts02/gaps.pdf">http://www.state.hi.us/lrb/rpts02/gaps.pdf</a>)

Karsky, D., H. Thistle, and J. Anhold. 2001. Demonstration of aerial spray aircraft navigation systems in deep mountain valleys. Forest Health Protection Tech Tips, 0134-2336-MTDC, USDA Forest Service, Missoula, MT.

Nelson, D. 2002. Invaders of the forest: Weeds threaten commercial and native forests. Agriculture Hawaii, Vol. 3, Issue 1, pp. 10-12.

Shaman, J., M. Stieglitz, C. Stark, S. Le Blancq, and M. Cane. 2002. Using a dynamic hydrology model to predict mosquito abundances in flood and swamp water. Emerging Infectious Diseases, Vol. 8, No. 1. (Available online at <a href="http://www.cdc.gov/ncidod/eid/vol8no1/01-0049.htm">http://www.cdc.gov/ncidod/eid/vol8no1/01-0049.htm</a>)

Monath, T.P. 2001. Prospects for development of a vaccine against the West Nile virus. ANNALS of the New York Academy of Sciences 95:1-12. (Available online at <a href="http://www.annalsnyas.org/cgi/content/full/951/1/1">http://www.annalsnyas.org/cgi/content/full/951/1/1</a>)

If you are unable to access the online documents and would like a copy of any of the above publications - contact Pat Skyler, (916) 454-0817, <u>pskyler@fs.fed.us</u>.

Ross, Gibson, and Daterman. 2001. Using mch to protect trees and stands from Douglas-fir beetle infestation. FHTET 2001-09. USDA Forest Service, Forest Health Technology Enterprise Team, Morgantown, WV. For a copy contact Richard Reardon, (304) 285-1566, Email: <a href="mailto:rreardon@fs.fed.us">rreardon@fs.fed.us</a>.

Wagner, Ferguson, McCabe, and Reardon. 2001. Geometroid caterpillars of Northeastern and Appalachian forests. FHTET 2001-10. USDA Forest Service, Forest Health Technology Enterprise Team, Morgantown, WV. For a copy contact Richard Reardon, (304) 285-1566, Email: <a href="mailto:rreardon@fs.fed.us">rreardon@fs.fed.us</a>.

### **VIDEOS**

Riparian Forest Buffers: The Link Between Land and Water. 2001. Describes the use of forest "buffers", or strips of planted trees and other vegetation along stream corridors, to reduce water pollution and erosion. The examples shown are in the watershed of the Chesapeake Bay in the mid-Atlantic region. Forest Service hydrologist Albert Todd is one of the on-camera presenters (21 minutes).

This video is available through the USDA Forest Service WO Library. This is a free-loan lending library system. The only cost to you is the return postage. All videos are available on VHS format. Audience Planners, Inc. distributes the Forest Service free-loan videotape library. Write, call, or fax Audience Planners at the following address, with the name(s) of the videotapes you wish to borrow and the requested play date: Forest Service Video Library, c/o Audience Planners, 5341 Derry Ave. Suite Q, Agoura Hills, CA 91301, Phone: (800) 683-8366, Fax: (818) 865-132, Outside the US: (818) 865-1233

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### **UPCOMING EVENTS**

#### 7-11 April 2002 223rd American Chemical Society National Meeting

Orlando, FL For registration information call toll free 1-800-650-2512 or (480) 443-4058 ext. 243 email: <u>acs.help@matrixreg.com</u> <u>http://www.chemistry.org/portal/Chemistry/orlando2002.html</u>

#### 23-26 April 2002 Noxious Weed Management Short Course (Session 1)

Loveland, CO Contact: Celestine Duncan, Course Coordinator (406) 443-1469 Email: weeds1@ixi.net

http://wsweedscience.org/events/event\_list.php

#### 28 April - 1 May 2002 Noxious Weed Management Short Course (Session 2)

Loveland, CO Contact: Celestine Duncan, Course Coordinator (406) 443-1469 Email: <u>weeds1@ixi.net</u>

http://wsweedscience.org/events/event\_list.php

23-25 April 2002 Western Forest Insect Work Conference

Whitefish, MT Contact: Ken Gibson (406) 329-3278 Email: <u>kgibson@fs.fed.us</u> or contact Sandy Kegley, (208) 765-7355, <u>skegley@fs.fed.us</u>

17-21 June 2002 Fourth International Conference on Forest Vegetation Management: Technical, Environmental and Economic Challenges of Forest Vegetation Management

Nancy, France Contact Henri Frochot Fax: 33-3-83-39-40-34 Email: <u>ifvmc4@nancy.inra.fr</u> http://www.ifvmc.org

#### 29-31 July 2002 Noxious Weed Management Short Course (Session 1)

Loveland, CO Contact: Celestine Duncan, Course Coordinator (406) 443-1469 Email: <u>weeds1@ixi.net</u> <u>http://wsweedscience.org/events/event\_list.php</u>.

#### 28 April - 1 May 2002 American Society of Agricultural Engineers Annual International Meeting

Chicago, IL Contact: Brenda West (616) 428-6327 Email: <u>west@asae.org</u> <u>http://www.asae.org/meetings/am2002/index.html</u>.

#### 29 July - 1 August 2002 Southern Forest Insect Work Conference

Roanoke, VA Contact: Brian Sullivan (318) 473-7206 Email: <u>briansullivan@fs.fed.us</u> http://www.sfiwc.org/2002/index.html

#### 15-16 August 2002 California Conference on Biological Control III

University of California Davis, CA Contact: Brenda Nakamoto (530) 752-1606 http://www.biocontrol.ucr.edu/CCBCIIIa.html

#### 2-5 September 2002 Methodology of Forest Insect and Disease Survey in Central Europe

Krakow, Poland Contact: Brenda West (616) 428-6327 Email: <u>west@asae.org</u> <u>http://www.asae.org/meetings/am2002/index.html</u>.

#### 2-5 September 2002 Methodology of Forest Insect and Disease Survey in Central Europe

Krakow, Poland Contact: Michael McManus file:///Cl/Inetpub/wwwroot/foresthealth/pesticide/news/subjects\_tips/03\_1/03\_1\_web.html (12 of 14) [3/12/2002 5:21:48 PM]

(203) 230-4321 Email: <u>mlmcmanus@fs.fed.us</u> <u>http://iufro.boku.ac.at/iufro/iufronet/d7/wu70310/krakow/</u>

#### 9-13 September 2002 50th Annual Meeting of the Western International Forest Diseases Work Conference

Powell River, B.C. Canada Contact: John Muir Fax: (250) 387-8740 Email: john.muir@gems1.gov.bc.ca http://www.fs.fed.us/foresthealth/technology/wif/index.html.

#### 12-15 September 2002 California Urban Forest Conference - Planning for California's Urban Forests

Visalia, CA Sponsored by California Urban Forests Council and California ReLeaf Contact: Mel Johnson (415) 647-4207 Email: <u>caufc@attbi.com</u> or Martha Ozonoff, (916) 557-1673, ext. 12, Email: <u>martha.ozonoff@tpl.org</u>

#### 11-14 March 2003 Western Society of Weed Science Annual Meeting

Poipu Beach, Koloa, Hawaii Contact: Wanda Graves (510) 790-1252 Email: <u>Wgraves431@aol.com</u>

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### **CALL FOR ARTICLES**

Please forward to me all articles, meeting announcements, publications, reports, or other items of interest that you would like included in the next issue of Short Subjects & Timely Tips for Pesticide Users. Please include the name, State, and telephone number of the individual who can be contacted for further information:

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#### CONTACT: PAT SKYLER (CA) (916) 454-0817/Fax (916) 454-0820 Email: <u>pskyler@fs.fed.us</u>

The Washington Office, Forest Health Protection, Forest Health Technology Enterprise Team sponsors, compiles, edits, and distributes this informal newsletter as a means of providing current information to forestry pesticide users. Comments, questions, and items of input are welcome and may be sent to Pat Skyler, Editor, USDA Forest Service, Remote Sensing Lab, 1920 20th Street, Sacramento, CA 95814, or by E-mail: <u>pskyler@fs.fed.us</u>.

Reference to a commercial product or source in this newsletter does not constitute endorsement by the USDA Forest Service. Information should be verified by contacting the original source of information as neither the editor nor the USDA Forest Service guarantees the accuracy of the information provided in this newsletter. Pesticides can be injurious to humans, domestic animals, desirable plants, and fish or wildlife if they are not handled or applied properly. Use all pesticides in accordance with label precautions.

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