Kentucky Forest Health Task Force Update

Members of the Kentucky Forest Health Task Force have prepared its first annual report on the health of Kentucky's woodlands and threats to maintaining healthy forests. The Kentucky Forest Health Task Force (www.KyForestHealth.org) was established in 2004 to address issues threatening Kentucky's forest resources (see *Kentucky Woodlands Magazine* 1(1) July 2006). To serve our long-term goal to foster sustainable forests, our immediate goal is to enhance awareness and increase communication regarding forest health issues.

This first annual report summarizes the current forest health conditions of Kentucky's forests, describes activities that help maintain the health of these forests, and attempts to predict potential effects of the arrival of several invasive species. In addition, the members of the task force have described Kentucky's pest monitoring and mitigation programs and made recommendations for additional activities to mitigate the effects of these invasive species.

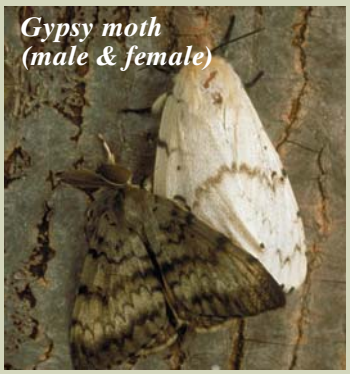
The task force recommends that the following actions be taken to improve the health of Kentucky's forests:

- Improve detection of exotic species before they become widely established in Kentucky.
- Improve detection, monitoring, and management of exotic invasive pests that are present in Kentucky.
- Protect Kentucky's forests by finding ways to reduce the explosive growth of invasive pests.
- Improve the health of Kentucky's private and public forests by implementing management practices that preserve native species diversity and improve the vigor of our forests.

Assessment of forest health activities in 2005/06 and specific recommendations for 2007 can be found in the annual report at www.kyforesthealth.org.

Detection Survey for the Gypsy Moth

The current level of activity focused on the gypsy moth is comprehensive; multiple federal and state agencies place more than 10,000 pheromone traps in Kentucky each year to detect gypsy moth males. Since 1985, three localized infestations of the gypsy moth in Kentucky have been eradicated. Current level of preparedness and eradication: excellent.



USDA APHIS PPQ Archives

Detection Surveys for Sudden Oak Death

Surveys in 2003, 2004, and 2005 have focused on nurseries and limited forested areas. While no sudden oak death (SOD) has been detected in Kentucky, annual surveys for the SOD pathogen are needed in Kentucky because our forests contain highly susceptible hosts and our climactic conditions favor pathogen development. Current level of monitoring and preparedness: inadequate.

Photo by Joseph O'Brien, USDA Forest Service

Hemlock wooly adelgid

Photo by Chris Evans, The University of Georgia, www.insectimages.org

Update

Kentucky Forest Health Task Force

Infestation of Hemlock Woolly Adelgid Found in Kentucky in Spring 2006

The exotic hemlock woolly adelgid was first reported in Kentucky in Harlan County in March and has since been reported in another county. Development of a management plan is under way including systematic surveys of hemlocks for the hemlock woolly adelgid, and the distribution of hemlocks is being mapped. Priority lists of old growth and other hemlock stands that should be protected with insecticide treatments need to be developed. Rearing and release of predatory beetles for biological control of the adelgid in Kentucky should be evaluated. Current level of resources and monitoring and preparedness: inadequate.

Detection Survey for the Emerald Ash Borer

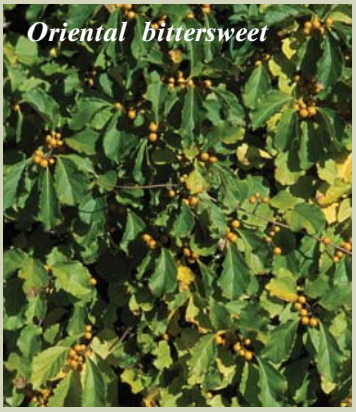
Due to infestations of the emerald ash borer in Indiana, Michigan, and Ohio, surveys in Kentucky need to be expanded. In 2006, selected areas along the Ohio River and state campgrounds along I-65 and I-75 are being surveyed for the emerald ash borer using stressed ash trees. Current level of monitoring and planning: inadequate.

Emerald ash borer

Photo by Howard Russell, Michigan State University www.forestryimages.org

Detection and Management of Invasive Plant Species

More attention on invasive plants is needed on a number of fronts, including information on current and impending threats, distribution of known invasives, effective control methods, and sources for native species alternatives for use in forestry and landscape applications. Additional support is needed to implement an invasive species management plan including updating the state's list of noxious weeds, improving statutory requirements for listing and control, and identifying key personnel to carry out an early detection and rapid response system. Current level of activity: inadequate.



Oriental bittersweet

Photo by James H. Miller, USDA Forest Service

Copies of the report are available from John Obrycki, State Entomologist, Department of Entomology, University of Kentucky, Lexington, KY 40546. E-mail: john.obrycki@uky.edu.

Author(s):
John J. Obrycki, Ph.D.*

Chair of the Department of Entomology and State Entomologist for Kentucky. In his role as State Entomologist, he has been actively involved in the Kentucky Forest Health Task Force. His research program focuses on enhancing biological control of exotic and native insect pests.

Lynne Rieske-Kinney, Ph.D.

Forest entomologist at the University of Kentucky. Her research program examines interactions among forest arthropods and forest regeneration, restoration, and sustainability and includes studies on the effects of invasive species on the health of Kentucky's forests.

**Corresponding Author:*
University of Kentucky, Department of Entomology, Lexington, KY 40546-0091
E-mail: john.obrycki@uky.edu.
Phone: 859-257-7450, Fax: 859-323-1120

(www.KyForestHealth.org)