
Draft Report on
NPS Workshop on Eastern Forest Health:
Invasive Insects and Pathogens

December 7 – 8, 2005

Leesburg, Virginia

Summary and Results

A NPS workshop was held in December 2005 on Eastern Forest Health to examine the risks posed to parks' forest resources by invasive forest insects and pathogens. The workshop was attended by NPS Washington, regional and park staff as well as other Federal agencies and key cooperators.

Workshop participants decided to develop the following four products. These products and actions will allow NPS to more systematically address the devastation being caused by invasive insects and pathogens as well as the future threats they represent.

1. Develop Marketing and Outreach Plan

Scott Schlarbaum (U of Tennessee) will work with Terry Cacek on marketing the need for such a strategy. This will be aimed principally at an NPS internal audience of regions and key parks. Presentations and talks will be scheduled beginning in January 2006.

2. Develop the Strategic Plan

NPS will develop a strategic plan for addressing invasive forest insects and pathogens. Terry Cacek (BRMD) in Fort Collins will take the lead. The plan will be developed by late spring 2006 so that an initial request for funding can be made as part of the NPS 2008 budget proposal.

3. Develop an Action Plan

While a strategic plan is broad in scope, an action plan is required to spell out technical approaches with specific, concrete activities that will accomplish NPS objectives regarding particular forest resources and invasive species. This plan would provide the technical and scientific underpinning to the broad strategic plan. Terry Cacek will be initially responsible for this planning effort.

4. Initiate Projects and Products

Pilot projects built upon existing efforts in the eastern parks should be undertaken to demonstrate early success in actions against invasive forest insects and pathogens. In addition, BRMD will work with the parks, regions, and other organizations to develop BMPs, source information and other products. These actions will demonstrate commitment and progress in support of future budget requests. They can be rolled up into the action plan as that gets underway.

Background

The National Park Service (NPS) held a workshop on Eastern Forest Health in Leesburg, VA. on December 7 – 8, 2005. Some 30 individuals from NPS, other Federal agencies and partner organizations attended. A list of participants is found at the end of this report.

The workshop had three major objectives:

1. Increase NPS understanding of risks to eastern forest health posed by invasive species and diseases.
2. Develop a framework for an NPS strategy for eastern forest health, and
3. Develop an action plan for producing such a strategy.

The first day consisted of a series of presentations and discussions. Two presentations discussed the impact of invasive species (insects and pathogens) upon the eastern forests (Schlarbaum, Campbell). The status of NPS activities regarding these and other invasive species was made by the four eastern regions (Southeast, Northwest, Midwest, and National Capitol). A final set of presentations was made by cooperators, including a number of Federal agencies, who have long experience in dealing with invasive species. These included the US Forest Service (Mangold), University of Tennessee (Schlarbaum), USGS (Geissler), ARS (Garvey) and the National Forest System (Maldonado)¹. The second day consisted of discussions on how to move NPS ahead of the curve of invasive forest insects and pathogens.

The following report organizes the discussions under several topics. These topics are components of the four products noted in the summary.

Need and Process for a Strategic Plan

- NPS has a need for a more complete strategy to address invasive forest insects and pathogens. Such invasive represent an actual and future risk to the parks' forest resources and ecological integrity. While such risks are a subset of forest health, they require a distinct approach.
- Developing a broad NPS strategy as a document can utilize work already done by the US Forest Service, the National Invasive Species Council, and other organizations. These can provide general templates upon which an approach, geared to the NPS mission, can be built².
- An NPS strategy should build upon its highly beneficial relationships with other agencies, such as FS, USGS, and ARS which provide needed expertise, guidance,

¹ Copies of the Power Point presentations are being distributed to participants as part of this report.

² Resources include: The National Invasive Species Management Plan and the FS National Strategy and Implementation Plan for Invasive Species Management,

and support. NPS should develop closer relations with other agencies, such as APHIS, whose regulatory role is critical in prevention and control activities. An NPS strategy should build upon its relations with universities, NGOs, and local communities to address invasive species issues.

- Broad aspects of response planning should be included in the plan. These include: preparedness, prevention, monitoring, early detection, rapid response, control, restoration and recovery.
- Setting the goal and vision for the plan will be key components. How far should we try to stretch NPS? Defining what success would look like is also key.
- The planning processes need to avoid a top-down approach. A lot of park level people need to be involved. The process requires buy-in from upper management and from NPS personnel who do work on the ground.
- An NPS strategy should take a holistic view of its forest resources based upon its mission. This could mean that its priorities would differ from those of other agencies with related, but different, missions. It may also mean that NPS would have to address issues, such as measures for maintaining specific sites through extraordinary means or remediation plans, which other agencies would not require.
- Particular parks may have unique forest resources that may require extraordinary measures to protect. The development of such schemes may be a distinctive aspect of NPS strategy as it is carried out on the ground.
- An NPS strategy should include ways of complying with NEPA and the Historic Preservation Act (section 106) in as effective a manner as possible. For example, NPS could utilize EISs developed with other agencies, tiering them down to EAs, to provide an umbrella for actions to manage invasives. NPS also needs to utilize or modify existing management plans, compliance agreements, and protocols in a consistent manner for dealing with specific pests and diseases.
- Participants felt the strategic planning group should be kept fairly small. The group should include regional specialists, some WASO, regions, park resource managers, and park superintendents. Participants expressed differing opinions on how and when to involve other Federal agencies, conservation groups and other NGOs. Some felt the inclusion of cooperators from the very beginning proved to be very useful in other cases.

Prevention

- Preventing the entry of invasives at a national scale will require closer ties between NPS and APHIS. NPS represents a key set of national biological resources whose protection should be part of the debate on trade policy. The

policy debate is particularly for those goods and products that can directly (fruits, vegetables) or indirectly (wooden pallets) harbor invasive species.

- Preventative measures, such as the banning of firewood from outside the parks and the development of close relations with nearby nurseries, may be significant activities with broad applications to the eastern parks. The coordination of such activities would be a crucial aspect of strategy implementation.
- Preventative measures require broad action rather than those oriented toward one species. It is important to look at pathways (such as the movement of firewood into the parks) and vectors and to think in terms of policies which can slow down spread.

Education and Public Awareness

- Participants generally felt that visitor education and public awareness were of great importance in strategic planning and in all phases of this work. The cooperation of visitors, their volunteer support and their “spreading the word” in their own communities are key components of reducing the risks posed by invasive species.

Restoration

- The plan should address problems of restoration in which the loss of a tree species results in a fundamental change in the ecology of an area. This could be the case, for example, when the loss of a top tree canopy causes changes in the underlying plant and animal complex. Restoration, therefore, may involve much more than simply the repopulation of the lost species.

Setting Priorities

- Setting of priorities between invasives (e.g., hemlock wooly adelgid, emerald ash borer, sudden oak death, etc.) is an ongoing effort. Priorities are often set by the need to respond to the appearance of destruction caused by a new or previously unknown invasive. The strategic plan should use specific invasive species as examples rather than as a list of higher/lower priorities. Projects, budget allocations, species management plans and other investments will to be adjusted as biological and political dynamics change.
- Priorities for projects/products may be quite different within the eastern region. It could be that the NPS may want to set priorities based upon the forest resources themselves, such as the hickory or oak forests, the coastal loblolly pines, or butternut species. Particular invasive species, then, would form a matrix against which relative risk (and allocation of resources) could be calculated.

Budget

- The development of a NPS budget for invasive forest insects and pathogens should be done in consultation with other Federal agencies. The effort should result in expanding overall allocations for dealing with such pests, rather than dividing allocations between competing requests.
- In dealing with budget requests, it would be useful if the FS and NPS approached Congress jointly in the appropriate hearings or informational sessions. This would demonstrate the broad concern within Federal agencies for the risks posed by these invasive species and would reinforce the cooperative, rather than competitive, nature of these issues.

Marketing and Outreach

- An aspect of marketing is to explain the costs of invasive forest insects and pathogens and the potential losses for not controlling them. Losses should have measures in terms of economics and in terms of preserving biological heritage. Economic losses can include factors such as loss of tourism and ecosystem viability. Loss of access to areas within parks could be a major factor. Participants agreed that this information was difficult to come by, though the Nature Conservancy is initiating such a study, utilizing data mainly from urban and suburban locations.
- An additional resource for a marketing effort is the learning center at Indiana Dunes which has expertise in education and communications strategy. Other NPS educational specialists have expertise in developing materials and in developing concise information packets.

Action Planning

- The timing and the content of an action plan or plans should coincide with existing planning cycles and with the creation and measuring of GIPRA goals. Planning could be thought of in terms of a five year cycle with tiered annual plans. Plans could also take the form of technical guides for specific invasive species, possibly along the lines of contingency plans for Foot and Mouth Disease.
- The action plan should include and build on activities that are already underway.
- Participants felt that action planning would require much more technical expertise and cooperator participation than the general plan. Involvement of groups such as American Chestnut Foundation, The Nature Conservancy, and others would be particularly valuable for their support and their expertise.

Initiating Pilot Projects

- Small pilot projects, building upon activities already underway, should be begun this fiscal year. Showing early success is important in order to build support and momentum. Several types of pilot project could be tried. For example, NPS could try to exemplify three stages of work on invasives: one project dealing with monitoring, a second dealing with monitoring and prevention, and a third dealing with control. They should also represent different types of parks and be in different locations within the east.
- Possible sites for pilot projects would be Mammoth Cave and the Statue of Liberty. Projects could deal with a range of issues, such as working with home owners and nurseries on NPS boundaries.

General Advice on Next Steps

On a final go around, participants were asked to provide their parting words of advice to the people who will be heading the planning effort over the coming months. Their comments include the following:

It's bigger than all of us, more than NPS. We have to include the whole family: NGOs, other agencies, etc.

Keep in mind what we are already doing. We are all contributing to this effort, including programs like I&M. The message is that we are building on existing efforts and making it stronger because of the existing threats.

We need to move quickly and get those components in place. Keep in mind our partners.

Marketing and selling are crucial throughout the whole process. We have to get our message out. Make sure everyone is aware.

Consult at length and in depth with potential partners. We can do a lot better as a whole group.

Need to do it fast. There is a lot of information out there. We need to pull it together and get ours out. Developing the plan should not be that difficult.

The scary thing is that we have the potential to lose all the forests. We have not seen things on this scale before. It is scary.

Make sure that tools get to the parks. We need to make sure that the plan turns into things that are useful on the ground: Technical assistance, people, protocols, must be on the ground. We can not go half way.

Partnership can not be stressed enough. There must be collaboration among many people.

Awareness has to be raised. We can use existing mechanisms to ensure that upper management has the understanding to make the funding decisions. We need to go for the funding. Three are things we can do now without funding and we need to get started. But everyone from superintendents to visitors needs to have the information. We should assign responsibility for leading this effort at the Washington office, a key contact person.

We need to draw on existing materials. It is a bit easy to focus on the species that are hot at the moment. But it would be helpful to see a list so that the other things don't get forgotten about.

WASO needs to hire a coordinator as soon as possible.

We need to look at existing resources. We may not be able to get funding in the near future, so we'll have to redirect budget to this problem and show results.

We need to ID the key gaps. There are a lot of things that different agencies can do, but what is it that no one is doing for us right now that we need to begin to do for ourselves.

This has been a very compelling message. Faith and Scott presented compelling insight. We have an excellent chance to go forward.

We need to stay flexible.

My concern is that it will be difficult for the parks. How do you protect yourselves by dealing with what happens outside the parks? How do we influence behavior outside the parks?

We need to move with speed. Don't reinvent. Focus on the holistic approach. We saw how quickly things went in Hawaii. The same can happen on the mainland.

We should be encouraged not to shy away from the long term view and look at the big protection questions

The broader socio economic impact is important. Factors like bird conservation are dependent upon our protection of the forests.

Participant List

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