



File Code: 3410

Date: July 03, 2013

David Manski, Chief
Division of Resource Management
Acadia National Park
P.O. Box 177
Bar Harbor, ME 04609-0177

Dear Mr. Manski:

The US Forest Service, Forest Health Protection (FHP) staff completed the 2013 aerial detection survey for Acadia National Park (ANP) on June 13, 2013. Approximately 52 acres of damage was mapped throughout, and adjacent to, ANP. Overall damage acreage mapped in 2013 was similar to the 58 acres mapped in 2012 and remains significantly lower than the 342 acres mapped in 2009. A total of 5.9 acres were mapped as birch dieback with 35.3 acres of white pine needle damage and 10.3 acres of spruce/fir mortality from flooding. We have also made positive observations of winter moth, *Operophtera brumata*, defoliation along the Maine coast south of ANP that have been confirmed by the Maine Forest Service and FHP staff. More information on the white pine needle damage is available through the following link: [White Pine Pest Alert](#). More information on winter moth is available through the following link: [Winter Moth Pest Alert](#). Overall, there were no other noticeable forest health concerns detected during the 2013 aerial survey.

Attached is a draft map that depicts the areas of damage by damage type (mortality, dieback, discoloration and defoliation), damage causal agent, and forest type. A final 2013 report, including all maps from the region, will be sent at the end of field season. These data, along with the rest of the aerial survey data will be available at: foresthealth.fs.usda.gov. In addition to the annual aerial survey, two satellite driven change detection tools, ForWARN and the Forest Disturbance Mapper (FDM), were used to flag potential areas of current pest activity using 16-day MODIS composites targeting deviations in the Normalized Difference Vegetation Index (NDVI). The NDVI is a moisture index used to detect changes in live green vegetation. An attached image from ForWARN has been attached for the area of interest (Acadia National Park). The warmer colors indicate greater deviations from historic NDVI values and are consistent with the white pine discoloration event. ForWARN can be accessed at [ForWARN](#) and FDM is available at [FDM](#). The hemlock woolly adelgid (HWA), *Adelges tsugae*, has been positively identified on private lands on Mount Desert Island, ME and should be considered a pest of concern for ANP. More information on HWA is available through the following link: [HWA](#). Additionally, the elongate hemlock scale was detected by the Maine Forest Service on the north end of Mt. Desert Island. More information on the elongate hemlock scale is available at the following link: [EHS](#). Finally, the emerald ash borer (EAB), *Agrilus planipennis*, was



discovered in Concord, NH in 2013 and should also be considered a pest of concern for the ash resource on ANP. More information on EAB is available through the following link: [EAB](#). If you have any questions or concerns, or would like further information or a site visit, please contact me at 603-868-775 (rhanavan02@fs.fed.us), or contact Mike Bohne at 603-868-7708 (mbohne@fs.fed.us).

Sincerely,

/s/ Ryan P. Hanavan

Ryan P. Hanavan, Ph.D.
Forest Entomologist, Durham Field Office

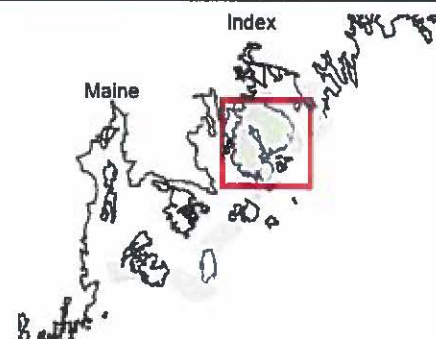
Acadia National Park



Key

- Acadia National Park
- Area Flown
- Aerial Survey 2013: Damage Type, Causal Agent, and Forest Type**
 - Mortality by Flooding on Spruce/Fir (10.3 acres)
 - Discoloration by Needlecast on White Pine (35.3 acres)
 - Birch Dieback (5.9 acres)
 - 0.0 Acreage of the damage area

Date Flown: June 13, 2013



USDA Forest Service
Northeastern Area, State and Private Forestry
Forest Health Protection, Durham, NH.
<http://www.na.fs.fed.us/nhp/index.shtml>

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