



2016 LOWER HUDSON PRISM BLOCKBUSTER SURVEY OVERVIEW

Welcome to the 2016 Lower Hudson PRISM Blockbuster Survey –thank you for your participation in it! This year, the Blockbuster is focusing on two kinds of sites within our PRISM region: **natural areas** and **High Probability Areas (HPAs)**. Whereas natural areas represent what their name implies (sites that largely comprise natural, relatively undisturbed habitat), HPAs represent areas that are particularly likely to host invasives, often although not always because they have been disturbed by human activity.

It is crucial to survey HPAs for invasive plants because they are places where such species are especially likely to appear first within a survey block, and will thus give us a great deal of information about how widely spread the focal species are within our PRISM region. Surveying natural areas is also important, because these are the places that are of higher conservation priority and where incursions of invasive plants would have the greatest impacts on native biodiversity. By comparing results of surveys of natural areas and HPAs from the same blocks, we can assess the degree to which invasive species found in the HPAs have reached and penetrated the natural areas. Also, because the HPA and natural area surveys will not necessarily reveal every focal invasive species occurring with each block, we are supplementing the formal survey with a procedure for collecting opportunistic data recording (see below), which will enable reporting sightings of focal species that would otherwise go overlooked and unreported.

Survey site selection and data collection:

Natural areas. – Please make sure to select a natural area that you have permission to enter. Your formal survey will consist of two parts: 1) a survey of the parking lot/trailhead area; and 2) a survey along a trail within the natural area itself. We are employing this two-part approach because it is likely that some invasive species will have established themselves in the disturbed area comprising the parking lot and trailhead, but these species may have penetrated the interior of the natural area only to a limited extent.

For the parking lot/trailhead survey, you will go along the perimeter of the lot and trailhead area, using your GPS unit or cell phone (with the appropriate app) to record your route, measure your distance as you proceed, and record locations of certain species (those listed as Group 2 Species on the forms), while manually recording other data on the appropriate form. If the perimeter of this area is 400 meters or less, please make sure to survey all of it in 100-meter segments. If it is more than 400 meters, you will need to survey the first 400 meters, and if in the last 100-meter segment you encounter new focal species, you should survey an additional 100 meters. After you are done with the parking lot/trailhead area, you should proceed along the trail itself, surveying for 400 meters in 100 meter segments (using the Natural Area Trail Form to record data). If you find species in the last 100 meters that you had not found along the previous 300 meters of trail, you should survey an additional 100 meters along the trail.

Please note that you do not need to attempt to survey the entirety of a large natural area or even the full extent of its trails. Rather, because your GPS unit or cell phone will be tracking your route, your data will be used just to characterize the area that you actually surveyed. However, if you know of habitat types (especially clearings or wetlands) that occur within the natural area, but that would not be sampled along the trail portion you are formally surveying, we encourage you to go to such sites and use the Opportunistic Observation Data Form to document any occurrences of any focal species found there that were not found during your formal survey of the natural area.

HPAs.- Typically, these are areas that have been disturbed by human activity and that are also not being managed. Weedy edges of shopping center parking lots and roadsides are two types of HPAs that are especially heavily invaded in our area, and tend to have high diversities of invasive species. In urban areas, abandoned lots can be quite productive. In rural areas, abandoned farmland can be heavily invaded. Utility right of ways can, in some settings, also serve as invasion corridors. Other sites that can be HPAs include river frontage and wetland edges, as they are open areas that can be easily colonized by invasive plants. This list is not meant to be exhaustive, but only to provide examples of some types of sites that can be HPAs. Sites that border a range of habitats (such as a roadside bordering residential areas and unmanaged fields or a weedy parking lot edge alongside field and forest remnants) can be especially promising, as can disturbed areas that are connected to multiple possible invasion corridors (e.g., roads, railroad tracks and utility right of ways).

In any case, make sure to survey safely; e.g., do not survey on or immediately adjacent to an active railroad track or on a roadside where you will not be safe from vehicular traffic. As in the case with natural areas, make sure to choose a site for which you would have sufficient access to survey it (this can include, for example, looking at the vegetation in an abandoned lot through a surrounding fence).

As will be described to you in your training session, you should survey the HPA for 400 meters in 100-meter segments (using the HPA Data Form and your GPS unit or cellphone). If you detect species in the last 100 meters that you had not detected along the previous 300 meters, you should survey an additional 100 meters of the HPA.

Species lists:

You will note that each of the data recording forms lists two groups of species. Group 1 consists of species that are known to be widely established throughout our PRISM region. Group 2 comprises species that have only begun to establish themselves in our region or are threatening to invade from adjacent areas. Based on this distinction between the two groups of species, the data-collection and documentation procedures differ between them, with greater requirements for Group 2, as will be described in your training session.

Opportunistic observations :

As noted above, the Opportunistic Observation Forms are to be used to record information on focal species that would otherwise go unreported in your block. You can use these forms not only for such sightings from natural area locations that you are not formally surveying, but also to record those from anywhere in your block where otherwise unreported species appear. For example, if you have completed the HPA and natural area surveys for your block without recording wild parsnip in either of them, and then find this species established along a roadside in your block, you should use the this form to record the relevant information for this occurrence (and a GPS unit or cellphone to obtain the geospatial location data).

Thanks again:

By participating in the 2016 LHPRISM Blockbuster Survey, you'll be making an important contribution to the knowledge and understanding of invasive plants in our region, which is greatly appreciated. We hope that you find this an enjoyable and rewarding experience.