

Project Name: Fort Detrick, US Army, Maryland

Contact: Current: Lyn Hoch Retired: Betty Boyland
Activity: Invasive Plant Management Plan Development, Invasive Plant On the Ground Conferences (8 annual) and On the Ground Invasive Plant Management

Approximate Acreage : 1,200 acres

Progress:

IPC, Inc. has been working on the Fort Detrick project since 1999. In year one, IPC developed an invasive plant management plan. This plan was immediately implemented and in 2008 IPC estimated that 75% of the plan had been implemented. On the ground management includes control of all invasive plant species utilizing an integrated pest management strategy.

Mechanical, chemical and bio-control methods have been used at Fort Detrick. When the project was started, most species were classified as level 5 (high intensity) infestations.



Several species of thistle were treated at Fort Detrick over the past 5 years. This photograph shows an area treated with two types of herbicide. One, Transline cannot be used in close proximity to water and the other, Garlon 3A is labeled for use near aquatic ecosystems. Every project requires a different scheme of events. In this case, because Transline is much more effective in controlling thistle, our crews sprayed up to the required distance from the pond. From that point on they sprayed with Garlon 3A with the understanding that a lower mortality rate would result, requiring a longer management plan on this area of the site.

Invasive Pest Plants Managed at Fort Detrick, Frederick Maryland

<i>Scientific Name</i>	Common name	Cut and Treat	Girdle	Foliar Spray	Grub	Basal Bark
Tree Species						
<i>Ailanthus altissima</i>	Tree of Heaven	X	X	X	X	X
<i>Albizia julibrissin</i>	Silk tree	X	X	X	X	X
<i>Paulownia tomentosa</i>	Princess tree	X	X	X	X	X
<i>Broussonetia papyrifera</i>	Paper mulberry	X	X	X	X	X
Multistemmed Species						
<i>Berberis thunbergii</i>	Japanese barberry	X		X		
<i>Ligustrum sinense</i>	Privet	X		X	X	X
<i>L. maackii</i>	Amur honeysuckle	X		X	X	X
<i>Rosa multiflora</i>	Multiflora rose	X		X		X
<i>Elaeagnus fortunei</i>	Autumn olive	X		X		X
<i>Viburnum dilatatum</i>	Linden viburnum	X		X	X	X
<i>Viburnum plicatum</i>	Double file viburnum	X		X	X	X
<i>Euonymus alatus</i>	Burning bush	X		X	X	X
Herbaceous Species						
<i>Alliaria petiolata</i>	Garlic mustard			X	X	
<i>Polygonum cuspidatum</i>	Japanese knotweed			X	X	
<i>Microstegium vinineum</i>	Japanese stiltgrass			X	X	
<i>Cirsium arvense</i>	Canada thistle			X		
<i>Carduus nutans L.</i>	Musk thistle			X		
Vine Species						
<i>Euonymus fortunei</i>	Climbing Euonymus	X		X	X	F
<i>Celastrus orbiculata</i>	Oriental bittersweet	X		X	X	F
<i>Lonicera japonica</i>	Japanese honeysuckle	X		X	X	F
<i>Vinca minor</i>	Periwinkle			X	X	F
<i>Vinca major</i>	Large-leafed periwinkle			X	X	F
<i>Hedera helix</i>	English ivy	X		X	X	SU
<i>Wisteria spp</i>	Chinese wisteria	X		X		SU
<i>Persicaria perfoliata</i>	Mile a minute vine			X		



Hundreds of new trees were planted on this site without concern for the Chinese privet growing all around the new plantings. IPC utilized a foliar application of a broadleaf specific herbicide to control the privet below 3 feet tall. Remaining privet was mechanically removed and chipped away on this approximately 40-acre site.



In a small patch of phragmites on the base, IPC cut off the seed heads and followed with a chemical application of 2% aquatic labeled glyphosate. Follow up treatments for several years will allow Ms. Boyland to begin the replanting phase this year.



IPC works on several military installations. One of the reasons is that invasive species such as this multiflora rose impede military training. IPC foliar sprayed some patches and cut and treated other patches of the multiflora rose.