



Plant a Tree at Flight 93 National Memorial 2015 At A Glance

Over the course of two days, April 17-18, 2015, the National Park Service, the Friends of Flight 93, and the National Park Foundation will continue a major reforestation effort that will eventually result in large areas of new forest at the memorial.



The two day volunteer event calls for approximately 500 volunteers to plant 22,000 tree seedlings over 32 acres of ground near the future site of the Tower of Voices.

Volunteers will arrive on site to register and from there be divided into teams lead by forestry professionals. The teams are assigned a “plot” in the field and work in pairs to plant the tree seedlings.

Event costs include: tent, tables/chairs, portable toilets, shuttle buses, water stations, lunch and t-shirts for volunteers

Past reforestation sponsors include:

- Alcoa Foundation (2013, 2014)
- Arbor Day Foundation (2013, 2014)
- BMW of North America (2012)
- Enterprise Rent-A-Car (2013, 2014)
- Roy A. Hunt Foundation (2014)
- NASCAR (2013)
- NRG Energy (2012, 2013)
- Pocono Raceway (2013)
- Ed & Lin Snider (2014)
- Somerset Trust Company (2014)
- The UPS Foundation (2013, 2014)



What types of trees are we planting?

- | | |
|---------------------|--------------------------|
| White pine | White Oak |
| Eastern hemlock | Quaking Aspen |
| Pitch pine | Red Maple |
| Red pine | Yellow poplar |
| American Chestnut | Black walnut |
| Red Oak | Hickory |
| Black Cherry | American Hazelnut |
| Sugar Maple | Witch-hazel |
| Black Locust | Sweet American crabapple |
| Choke cherry | Gray dogwood |
| Black chokeberry | Red Osier dogwood |
| Washington hawthorn | Ninebark |
| Flowering dogwood | Elderberry |
| Silky dogwood | |



These trees, which are a mixture of several native species, will form an essential windbreak to protect trees planted in the nearby Memorial Groves. Much of what is now the memorial is a former surface coal mine and this effort will also help re-establish woodland wildlife habitats and to cultivate a living memorial.

Plant a Tree: By the numbers...



2012: 500+ volunteers planted 14,369 seedlings over 20 acres.
2013: 500+ volunteers planted 17,300 seedlings over 23 acres.
2014: 500+ volunteers planted 20,489 seedlings over 30 acres.

To date: Over 1,500 volunteers have planted 52,158 seedlings across 73 acres. (Over 6,000 volunteer hours!)

Who are the volunteer leaders?

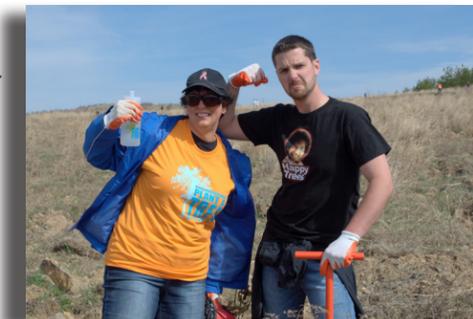
They are forestry and wildlife professionals and students from these agencies and universities:

- American Chestnut Foundation
- Appalachian Regional Reforestation Initiative
- Green Forests Work
- Indiana University of Pennsylvania
- Office of Surface Mining, Reclamation & Enforcement
- PA Department of Conservation & Natural Resources, Bureau of Forestry
- PA Department of Environmental Protection, Bureau of Abandoned Mine Reclamation
- Penn State University, Altoona & Dubois Campuses
- U.S. Fish & Wildlife Service
- U.S. Forest Service



What organizations and businesses sent teams of tree planters in 2014?

- | | | |
|---------------------------------|---|------------------------------|
| American Legion Post 128 | Lowe's | Tau Phi Delta Alumni |
| Appalachian Regional Commission | Nemacolin Woodlands Resort | UPS Foundation |
| Boy Scout Troops 1313, 15, & 20 | Office of Surface Mining | US Airways Flight Attendants |
| Carpenter Technology | REI | |
| Concurrent Technologies Corp. | Rotary Club of Mt. Lebanon | |
| Enterprise Rent-A-Car | September 11th Families Assoc. | |
| First National Bank | The Snider Foundation | |
| Forbes State Forest | Somerset Trust Company | |
| Friends of Flight 93 | Southern Alleghenies Planning and Development Corp. | |
| The Home Depot | Starbucks | |
| Leo Club of Berlin | | |



NEW in 2015: Invasive Species Removal

This year, in addition to planting seedlings, volunteers will be needed to help remove invasive plants that are threatening the trees that have been planted in past years. The Memorial's native plant communities are impacted by construction projects, visitor use, and the invasion of non-native plant species. Volunteers play an integral role in preserving the park's native vegetation by assisting with reforestation and invasive plant removal.

On April 17-18, teams will remove invasive plants near the Memorial Plaza and in the areas where trees have been planted in previous years. These teams will be led by Invasive Species Early Detection, NPS, Eastern Rivers and Mountains Network and Members of the Laurel Highlands Plant Management Partnership.

Monitoring the Trees

Reforestation at Flight 93 National Memorial will help naturalize the area (a former surface mine), provide a much needed windbreak at this high elevation site, and provide a beautiful backdrop for the Memorial.



Indiana University of Pennsylvania (IUP) Biology students, under the direction of Dr. Michael Tyree, will conduct monitoring of the planted trees and shrubs for all phases during the summer of 2015. A Department of Interior grant to encourage youth involvement will be used to fund the monitoring. The proposed monitoring will utilize a 5% random fixed area, permanent plot sampling scheme to yield survival and establishment data of planted trees and shrubs with estimates of competing vegetation to drive future management decisions at this site and other mine land reforestation projects.

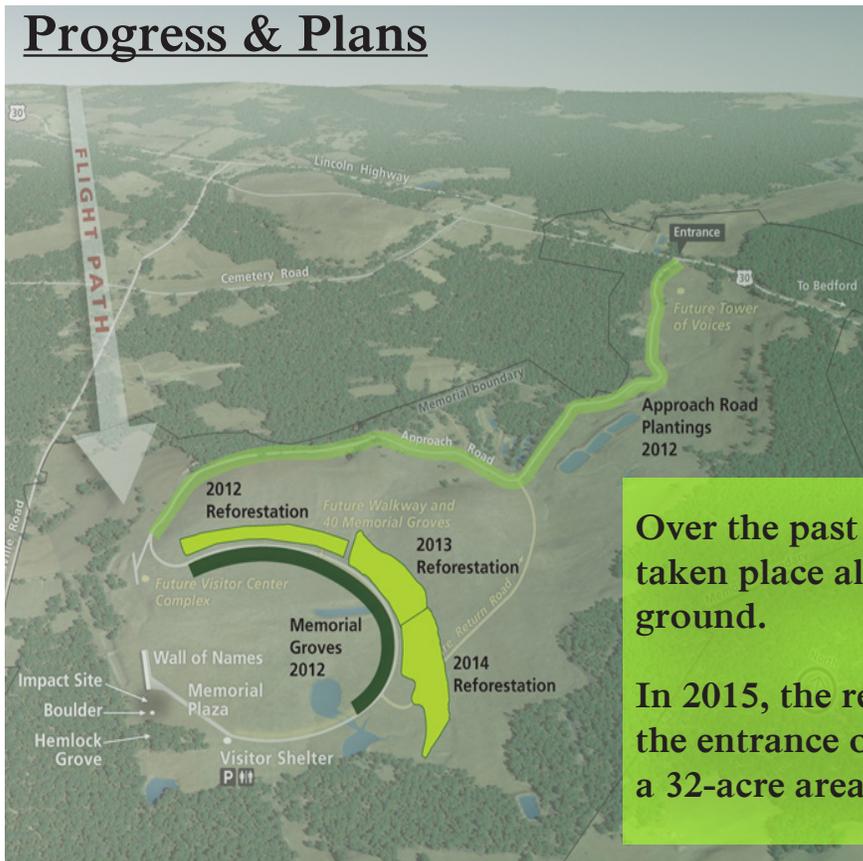
Tree species prescriptions at the Flight 93 National Memorial were based on the white pine-red oak-red maple cover type common to this area. A major associate to this cover type was the American chestnut prior to chestnut blight of the early 1900's.



Thus far 1,938 Advanced Backcross Restoration American chestnuts have been planted at the Memorial. Another 1,500 American chestnuts are proposed for the 2015 planting.

IUP students have documented the locations of all chestnuts planted at the Memorial via GPS. The proposed monitoring will incorporate the American chestnuts planted at this site.

Progress & Plans



Over the past three years, the reforestation effort has taken place along the ring road, covering 73 acres of ground.

In 2015, the reforestation effort will move closer to the entrance off of U.S. Route 30. The focus will be a 32-acre area near the future tower of voices.