

Washington Mountain Marsh

Interpretive Trail



October Mountain State Forest 317 Woodland Road, Lee, MA 01238

Map created by Tierney Rosenstock using Quantum GIS 1.7.0-Wroclaw. Data layers adapted from the Office of Geographic and (413) 243-1778 Environmental Information (MassGIS), Commonwealth of Massachusetts Executive Office of Energy and Environmental Affairs http://www.mass.gov/dcr/parks/western/octm.htm

Points of Interest

Time has brought many natural and human related changes to the Washington Mountain Meadow area. The numbered stops along the 1.9 mile (round trip) trail will help you discover this unique and dynamic environment. The entire Washington Mountain Marsh Trail is 2.7 mi and 3.0 mi including the Knob Loop.

1

Houses Long Ago – This Cellar hole and others in the vicinity are remnants of farm houses, barns and town buildings that were scattered throughout this area in the 1800s. The spruce forest you are in was planted by the Civilian Conservation Corps (CCC) during the depression.

2

Cemetery – The cemetery that you see through the woodlands still retains several nineteenth century family grave stones. The stone fence, which marks the boundary of a much larger plot, anticipated future generations expected to use the cemetery as their resting place. But the farms of many area families were bought up to be part of the Whitney Estate and the cemetery was eventually abandoned.

3

Spruce/Fir Forest — The evergreen forest that surrounds you is typical in northern regions at higher elevations. If you look high to the forest canopy you can see several tall deciduous trees, so this forest is really a mix of Northern hard-woods and evergreens. The evergreen understory provides lots of shading, making this spot delightfully cool on a hot summer day!

4

Marsh View – The vast area in front of you was once a forested wetlands. In the 1980s trees were cut to construct a lake but leaks at the dam prevented the lake from being impounded. The drastic alteration to the landscape has surprisingly resulted in an entirely

new. Wonderfully lush marsh meadow of many diverse species. Before you is a testament of nature's amazing healing ability. On the other hand, the disturbance has introduced invasive species like phragmites and purple Loosestrife, two vigorous growers that often displace native wetland plants. Beavers at the far end of the marsh are active in impeding the flow of Washington Mountain Brook, which helps to maintain the new marsh habitat. At this end of the marsh where it is drier, tree saplings are taking hold and trying to transform the marsh back to – you guessed it! – a forest.

As you venture onto the bridging which crosses the marsh, can you notice a certain springiness to your step? The ground underfoot is peat – accumulations of partially decomposed plant materials in water. Peatlands are ecosystems in which organic matter is produced faster than it is decomposed; the resulting spongy build up can be many feet deep.

5

Marshland – But For How Long? Marshes are characterized by non-woody vegetation like grasses, sedges, and rushes (such as the cattails here) growing with their lower stems in the water. But notice the young larch, birch, and maple trees behind you – these pioneer plants are well adapted to exploit new habitats resulting from disturbances and you can see they are beginning to colonize on drier areas. This process of vegetation development is called ecological succession. Imagine how the area in which you are now standing will look in one year – ten years?

6

Upland Forest – Here at the junction with the Knob Loop Trail (0.4 miles), the woodland is a good example of a Northern Hardwood forest, typical of higher elevations. Tree species present include Sugar and Red Maple, White Ash, American Beech, and Yellow Birch.

7

Mineral Soil Wetlands – This wetland is contrasted with the organic soil wetlands you experienced while crossing the marsh. This area is usually saturated ten months of the year, creating a unique habitat for certain animals and plants. Notice the Sphagnum Moss which carpets the forest floor – do you remember seeing this near the last point of interest? You're right; you didn't. As an indicator species, the moss is only suited to very damp environments.

8

Beaver Habitat – The beaver is the second largest rodent in the world. Besides humans, beavers are the only mammals in North America that can extensively alter landscapes. For this reason, beavers are known as Keystone species. A Keystone species is one that has a proportionally large impact on their environment for their size. Witness ahead the large pool engineered by resident beavers.

9

Overlook – From the vantage of this rock outcropping you can appreciate the vastness of the entire marsh ecosystem. The boundaries of the marsh are clearly defined by their contrast with the surrounding forestland. The darker patches of forest in the distance are spruce plantations established by the CCC in the 1930s. Evidence of the beavers is everywhere – three lodges rise conspicuously out of the large pond and a dam is visible at the far end of the pond. Close by you can see several young birch trees gnawed down to stakes. Beavers are active here and will likely remain active for some time to come. There is plenty of food – various birches and willows are prevalent – and there is so much work to do! The beavers are working hard to maintain the marsh meadow. Their diligence has paid off; notice how this end of the marsh is wetter? So far their labors have prevented pioneer species from colonizing and converting the area to forest.