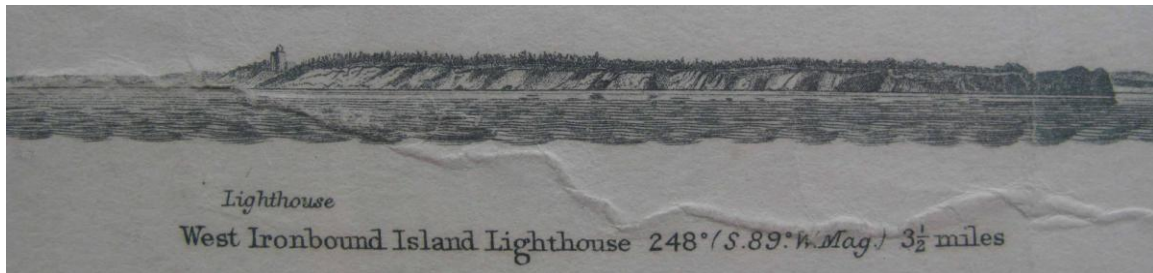


WEST IRONBOUND ISLAND FLORA

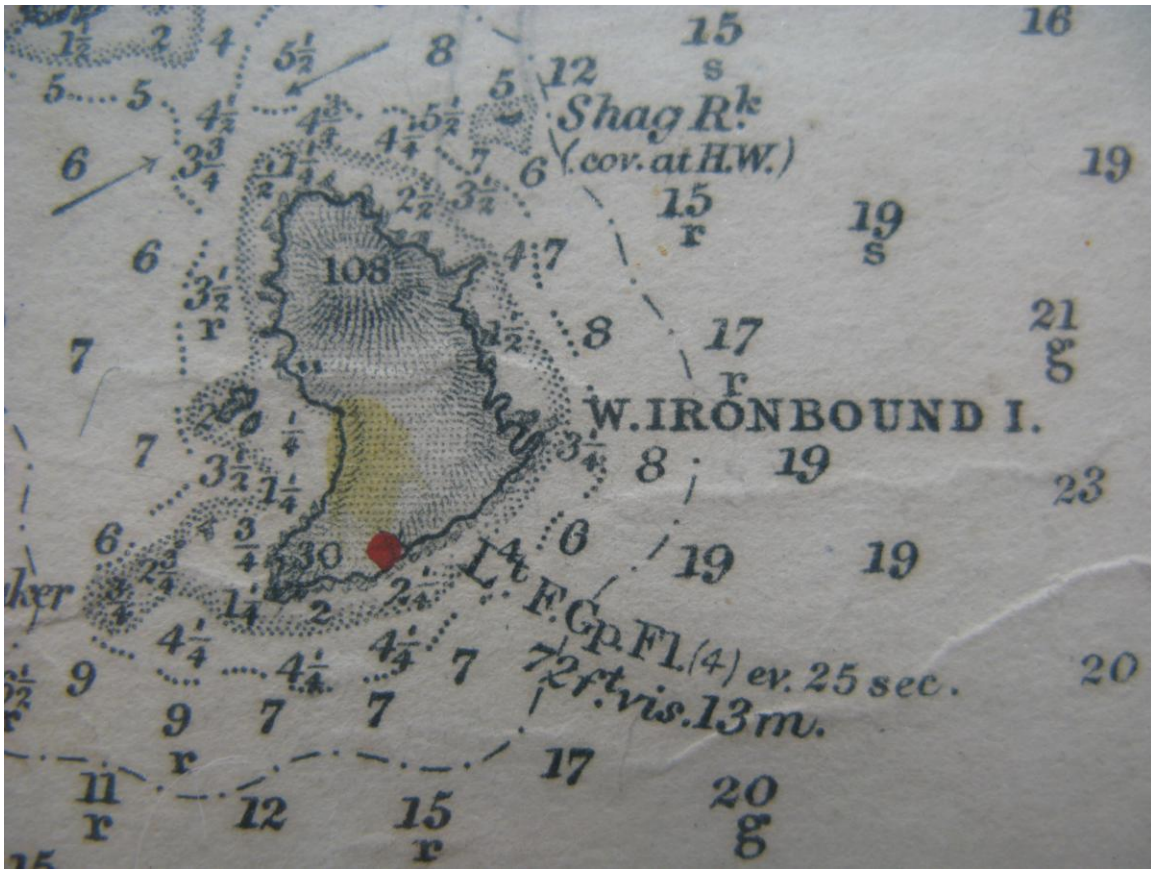
Report by Catherine Pross, September 16, 2009



1862-63 chart

People and plants have interacted on West Ironbound Island for at least one hundred and fifty years. For fishermen in small sailing boats the island lent proximity to the fishing grounds. Navigators required lighthouses. By 1862, there were two households on the island, one at the lighthouse, and one to fish and farm.

West Ironbound lies off Gaff Point on Nova Scotia's south coast, forming part of the eastern boundary of Dublin Bay at the mouth of the LaHave River. With the Labrador Current flowing past, temperatures are cool in summer. The slate bedrock which forms the base of the island is topped by Bridgewater sandy loam, "a light brown sandy loam over yellowish brown or olive brown sandy loam, slatey" (Soil Map of Lunenburg County Nova Scotia, south sheet. Ottawa: Experimental Farm Service, 1958). The slate bedrock is interrupted near the middle of the Island by a narrow strip of sandstone which crosses under the ocean, appears on the Island, and then disappears under the water again to reappear in Shelburne County.



1862-63 chart showing lighthouse

The sections of the Admiralty chart shown above are based on a survey of 1862-63 (Nova Scotia – South East Coast, Port Medway to Lunenburg. London: Admiralty, March 24, 1866). The drawing shows the lighthouse with its attached dwelling on the eastern edge. The chart also indicates a house and probable barn (the second building is behind the first, away from the water) on the spot where the current house now stands on the western side, on the sandstone strip.

A field was created over this strip at least by 1938 (sheet no. 21, national Topographic series, Canada, Dept. of Mines and Resources, 1938) and probably much earlier if the barn on the 1866 chart is a clue.



1938 toographical map; green shaded areas are wooded

Perhaps the soil over the sandstone is more productive. In addition, the field is sheltered by trees on the northern side. On the south side it is edged by wet, peaty soil and woods. There are other grasslands, on the south eastern tip and also on the North Head drumlin. The European-descended settlers brought with them seeds from plants they knew from Europe to plant in fields and garden.

The inhabitants of the house were using island trees for firewood. They were probably also growing what they could to supplement their food supply, milking a cow, and introducing sheep or cattle to roam the island (For an account of earning a living on an offshore island, Evelyn Richardson's book, *We Keep a Light* (Toronto: Ryerson Press, 1945), is hard to beat.) The property belonging to the lighthouse on West Ironbound is small, but the keeper may have had permission to cut firewood on the island.

Since lightkeepers were removed from lighthouses on this coast, a process that started in the early 1970's, there have been no full time human inhabitants, but there have been sheep. A flock of about thirty ewes feeds in the fields, woods, and along the shoreline, and have done for at least the last thirty or forty years.

I visited West Ironbound three times in order to work on the plant survey: June 18, July 5, and September 3 and 4 of 2009. My efforts were concentrated on the fields and their edges, coastal edges, and clearings in the wooded areas.

The island's exposure to the elements, as well as humans and animals, means that only the best adapted native plants take hold, but they can be tenacious.

On the eastern shore on the rocks on the ocean side of the white spruce shelterbelt, crowberry grows, accompanied by some seaside plantain, bayberry and yarrow. Cranberry grows among the sphagnum in a seepage area. The eastern side of West Ironbound has the typical shelterbelt of tough white spruce which can withstand the salt spray and roaring wind. They form thickets, their profile revealing the battering they take.



Inside their shelter, the trees are still mainly white spruce, but some red spruce, fir, and a number of birch have taken hold. This type of birch, *Betula cordifolia*, is found in Nova Scotia mainly along the coasts.

It does well in clearings in West Ironbound, but as it matures and reaches above the height of the surrounding spruce, tops get windblasted. The only other deciduous trees observed on the island were a few mountain ash on the south-east side of the North Head field and a wild pear, alone but full of fruit, south-east of the central field.

White spruce have fallen in several patches, perhaps due to age. Jamie Simpson, in his book *Restoring the Acadian Forest* describes them as “grow[ing] rapidly until age 50 years or so, then quickly deteriorate[ing] leading to the collapse of a stand” (Kentville, NS: Gaspereau Press, 2008, p. 129). Regenerating seedlings of all species look healthy in the understory.

The greatest variety of native plants has found shelter in the open spaces among the trees south of the central field. Flowering plants such as violets white and blue, bayberry, touch-me-not, blue flag, sundews, wild lily-of-the-valley, starflower, bunchberry, goldthread, horsetail, blueberry, snowberry, foxberry, strawberry, wood-sorrel, yellow wood-sorrel, buttercup, potentilla, blue-eyed grass, are all thriving in the peaty soil. Many of these grow next to the North Head field as well, but the soil is drier there. Bigger blueberry patches, more foxberry clumps, some twinflower trailing along the ground, and thick patches of hayscented fern characterize the North Head area. In many grassy areas raspberry bushes have taken hold, which are grazed by the sheep.



Sisyrinchium montanum



Drosera rotundifolia



Viola sororia

A variety of ferns and allies presented themselves, including cinnamon fern, sensitive fern, hay-scented fern, and horsetail.

Introduced flowering plants now inhabiting the fields and their edges include thistles, chickweed, a dandelion, fall dandelion, yarrow, sandwort, mouse-eared hawkweed, *Stellaria media* and *graminea*, Queen Anne’s lace, rock-cress, and common bedstraw.. The sheep don’t touch the thistles or the rhubarb patch.



Arabis cf. hirsuta



Leontodon autumnalis



Stellaria graminea

All the plants named in this survey are common in Nova Scotia.

This is not a complete survey of vascular plants. I could not identify rushes, sedges, grasses, or a number of ferns without sori. .

The open spaces created by the fields enable both sheep and people to move quite freely about the island and provide vistas of the sea from the interior. The human history still evident in the plant life adds a dimension of interest and value, as one considers the lifestyle required to survive.



view across central field and Dublin Bay toward Cape LaHave

APPENDIX

Alphabetical list of plants identified, June 18, July 5 and September 3,4, 2009.

Assistance was given, and much appreciated, regarding some individual plants by Anne Mills, Jake Wentzel and Marian Munro (formerly Marian Zinck). Common names for the plants are taken from Roland's Flora of Nova Scotia rev. by Marian Zinck (Nimbus Publishing and Nova Scotia Museum, 1998).

| | |
|-----------------------------------|------------------------------|
| <i>Abies balsamea</i> | balsam fir |
| <i>Achillea millefolium</i> | yarrow |
| <i>Amelanchier laevis</i> | wild pear |
| <i>Anagallis arvensis</i> | scarlet pimpernel |
| <i>Anaphalis margaritacea</i> | pearly everlasting |
| <i>Arabis cf. hirsute</i> | rock-cress |
| <i>Arenaria lateriflora</i> | sandwort |
| <i>Aster nemoralis</i> | bog aster |
| <i>Aster novi-belgii</i> | New York aster |
| <i>Atriplex sp.</i> | orach |
| <i>Betula cordifolia</i> | canoe birch |
| <i>Bidens sp.</i> | beggar's tick |
| <i>Capsella bursa-pastoris</i> | shepherd's purse |
| <i>Cerastium pumilum</i> | |
| <i>Chrysanthemum leucanthemum</i> | daisy |
| <i>Circaea alpina</i> | small enchanter's nightshade |
| <i>Cirsium arvense</i> | Canada thistle |
| <i>Cirsium vulgare</i> | bull thistle |
| <i>Coptis trifolia</i> | gold-thread |
| <i>Cornus canadensis</i> | bunchberry |
| <i>Coronopus didymus</i> | swine-cress |
| <i>Daucus carota</i> | Queen Anne's lace |
| <i>Dennstadtia punctilobula</i> | hay-scented fern |
| <i>Drosera rotundifolia</i> | sundew |
| <i>Elatine minima</i> | waterwort |
| <i>Empetrum nigrum</i> | black crowberry |
| <i>Epilobium ciliatum</i> | willow-herb |
| <i>Equisetum arvense</i> | horsetail |
| <i>Eriophorum sp.</i> | cotton-grass |
| <i>Euphrasia officinalis</i> | eyebright |
| <i>Fragaria virginiana</i> | wild strawberry |
| <i>Galium palustre</i> | common bedstraw |
| <i>Gaultheria hispidula</i> | snowberry |
| <i>Gaylussacia baccata</i> | huckleberry |
| <i>Gnaphalium uliginosum</i> | low cudweed |

| | |
|----------------------------------|-------------------------|
| <i>Hieracium pilosella</i> | mouse-eared hawkweed |
| <i>Hypericum canadense</i> | |
| <i>Impatiens</i> sp. | touch-me-not |
| <i>Iris versicolor</i> | blue flag |
| <i>Kalmia angustifolia</i> | lambkill |
| <i>Larix laricina</i> | larchl |
| <i>Ledum groenlandicum</i> | Labrador tea |
| <i>Leontodon autumnalis</i> | fall dandelion |
| <i>Linnea borealis</i> | twinflower |
| <i>Lycopus uniflorus</i> | bugle-weed |
| <i>Lysimachia terrestris</i> | yellow loosestrife |
| <i>Maianthemum canadense</i> | wild lily-of-the-valley |
| <i>Matricaria matricarioides</i> | pineapple weed |
| <i>Moneses uniflora</i> | one-flowered shinleaf |
| <i>Myrica gale</i> | sweet gale |
| <i>Myrica pensylvanica</i> | bayberry |
| <i>Osmunda cinnamomea</i> | cinnamon fern |
| <i>Oxalis acetocella</i> | wood-sorrel |
| <i>Oxalis stricta</i> | yellow wood-sorrel |
| <i>Picea glauca</i> | white spruce |
| <i>Picea rubens</i> | red spruce |
| <i>Plantago major</i> | common plantain |
| <i>Plantago maritima</i> | seaside plantain |
| <i>Potentilla anserina</i> | silverweed |
| <i>Potentilla norvegica</i> | rough cinquefoil |
| <i>Potentilla simplex</i> | cinquefoil |
| <i>Prunella vulgaris</i> | heal-all |
| <i>Ranunculus acris</i> | tall buttercup |
| <i>Ranunculus cymbalaria</i> | seaside buttercup |
| <i>Ranunculus repens</i> | creeping buttercup |
| <i>Rheum rhaponticum</i> | rhubarb |
| <i>Rubus hispidus</i> | dewberry |
| <i>Rubus idaeus</i> | raspberry |
| <i>Rumex acetosella</i> | sheep-sorrel |
| <i>Rumex crispus</i> | curled dock |
| <i>Salicornia bigelovii</i> | dwarf glasswort |
| <i>Scutellaria galericulata</i> | marsh-skullcap |
| <i>Senecio vulgaris</i> | common groundsel |
| <i>Sisyrinchium montanum</i> | blue-eyed grass |
| <i>Sorbus americana</i> | mountain ash |
| <i>Stellaria graminea</i> | grass-leaved stitchwort |
| <i>Stellaria media</i> | |
| <i>Taraxacum officinale</i> | dandelion |
| <i>Triadenum fraseri</i> | marsh St. John's-wort. |
| <i>Trientalis borealis</i> | starflower |
| <i>Trifolium repens</i> | white clover |

| | |
|-------------------------------|------------------------|
| <i>Typha latifolia</i> | broad-leaved cat-tail |
| <i>Vaccinium corymbosum</i> | high bush blueberry |
| <i>Vaccinium myrtilloides</i> | blueberry |
| <i>Vaccinium oxycoccus</i> | small cranberry |
| <i>Vaccinium vitis-idaea</i> | loberry |
| <i>Veronica serpyllifolia</i> | thyme-leaved speedwell |
| <i>Viburnum nudum</i> | witherod |
| <i>Viola macloskeyi</i> | small white violet |
| <i>Viola renifolia</i> | white violet |
| <i>Viola sororia</i> | blue violet |

Of these, according to Roland's Flora quoted above, introduced species are:

Achillea millefolium
Anagallis arvensis
Arenaria lateriflora
Capsella bursa-pastoris
Cerastium pumilum
Cirsium arvense
Cirsium vulgare
Coronopus didymus
Daucus carota
Gnaphalium uliginosum
Hieracium pilosella
Leontodon autumnalis
Ranunculus acris
Rheum rhaponticum
Rumex acetosella
Senecio vulgaris
Stellaria graminea
Stellaria media
Taraxacum officinale
Trifolium repens

Note on Qualifications of author:

Because of my lifelong interest in plants, I went back to school about twenty years ago and took basic courses in biology and botany at Dalhousie University. Subsequent involvement in the stewardship of Indian Path Common and Gaff Point has led me to pay close attention to the plants in these areas. This plant survey of West Ironbound Island is an extension of that work. Catherine Pross