

**Barton Brook General Biological Survey #519093:
Tom Shanahan, Region 5 Fisheries**

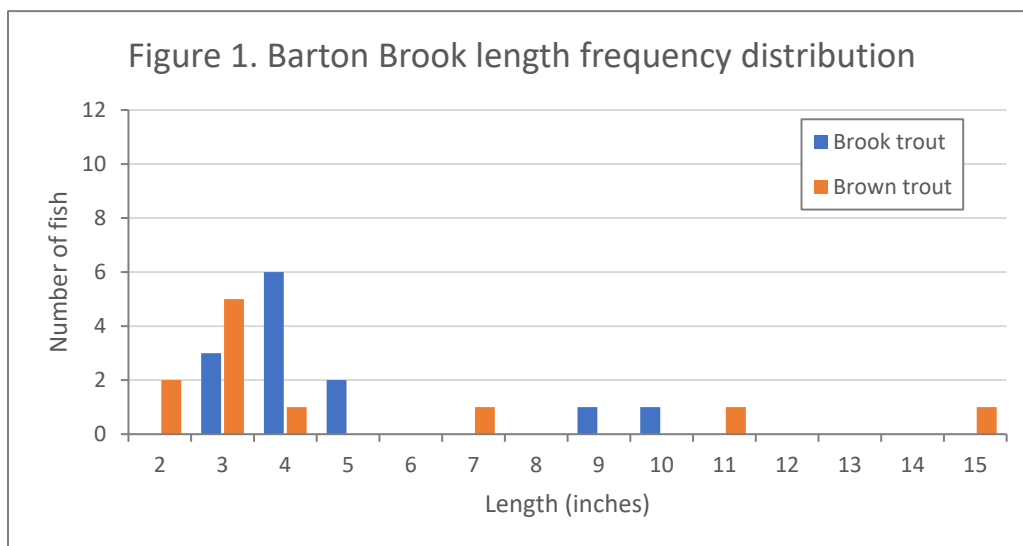
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Barton Brook (C-48-34-1) is located in the Essex County hamlet of Elizabethtown and is within the Champlain drainage. It is a tributary to The Branch which then flows into the nearby Boquet River. The brook is on private lands other than a small portion near its source which is in the Hurricane Mountain Wilderness. It has a starting elevation of 2,000 feet and descends to 550 feet on its nearly five-mile journey to The Branch. The brook is not stocked and had not been surveyed in 55 years. This was a general survey to update the fishery information and is also part of a larger effort to look at the distribution of wild brook trout in the Boquet system.

We sampled a single site, about 3,000 feet above the mouth and along County Route 10, with a backpack electrofishing unit in September 2019. The brook was about 13 feet wide in our 300-foot sampling section and had ample overhead tree coverage. There was good instream cover among the cobble and gravel substrate with one large, well-defined pool at the head of the section. A mixture of brook and brown trout were captured along with four other fish species (Table 1.); all but one brook trout and one brown trout were wild fish. Most of the trout were less than seven inches (Figure 1.), but the pool produced four fish in excess of eight inches.

Table 1. Numbers caught and size ranges of fish from Barton Brook in 2019.

Species	Number caught	Length range (inches)
brook trout	13	3.1 – 9.6
brown trout	11	2.4 – 15.0
blacknose dace	21	1.5 – 2.8
creek chub	3	2.0 – 3.7
longnose sucker	1	5.2
slimy sculpin	1	3.3



Given its relatively low elevation and location in a hamlet, the number of wild brook trout (n=12) found in Barton Brook was a pleasant surprise. Although Barton is not stocked, The Branch is stocked with brook trout and the Boquet River receives brown trout. All three waters are in close proximity in a low gradient area, so it seems plausible that both stocked species could find their way into Barton Brook. Stocking options for Barton are limited due to the lack of guaranteed public access but are not currently needed due to the existing wild brook trout population. We will periodically resurvey the brook to monitor summer water temperatures and species composition.