

**MEREDITH NRI PHASE II
CO-OCCURRENCE AREA SUMMARY**

CA #6 – Blake Brook Map

CO-OCCURRENCE AREA (CA): Blake Brook

CA #: 6

ACRES: 751.8

LOCATION: West central Meredith along Blake Brook on both sides of Rte 104

Elevation: 504 - 825 ft.

General Aspect: East & North

Ave. Slope: 2 – 17%

% Upland Forest: 65.6

% Open Upland: 4.2

% Wetland: 20.8

% Open Water: 9.4

GENERAL LAND USE: **Type:** Forestry-Conservation, Forestry-Rural, Shoreland **Zoning:** FR, FC, S
Blake Brook is bisected by Route 104 and therefore has a number of residential and commercial establishments in its midst. Blake Brook Road, Potting Bench Road, and Upper New Hampton Road also form part of the landscape, as well as the dead-end Arbutus Hill and Mercier Roads. While the zone near Route 104 has a great deal of land use impacts, the forested wetlands and beaver marshes of the Blake Brook CA appear to be mostly intact.

General Ecological Attributes: Blake Brook is comprised of two principal tributaries: one south of Route 104 that originates in two excavated ponds off Upper New Hampton Road, and one north of Route 104 that crosses the highway and joins the southerly branch at the beginning of Blake Brook Road. The northerly branch has two principal forks, both of which descend from low hills in New Hampton. The two second order stream branches join just west and upstream of Lake Wicwas in a large beaver impoundment. Aside from the beaver-mediated main stem of the north branch, the northern part of the CA is largely forested with scattered residences away from Route 104. The south branch has a higher number of roads and residences that fragment the mixed forest there. While the effects of roadways and residences are severe, the immediate riparian corridors away from roads appear valuable for wetland-dependent wildlife.

Prime Wetland Description: The Blake Brook prime wetland consists of the above-described perennial streams as well as a series of small pocket wetlands that are connected by intermittent drainages. Because of access limitations, little fieldwork was completed on the north side of Route 104, whereas a concise wetland delineation was completed for most of the south side. The latter section includes some remarkably pristine seepage and riverine wetlands with high quality wildlife habitat. Flood storage is a principal function of both units as Blake Brook feeds directly into Lake Wicwas. This function is mediated by bridges and culverts that intercept natural drainage pathways. Sediment and toxicant reduction is also a critical part that this prime wetland plays, especially among those wetland units near Route 104 and Lake Wicwas.

Wildlife Habitat Description: Blake Brook had a remarkable diversity of wildlife species being so close to Route 104. Wildlife corridors were mostly found away from the developed areas, except for the sporadic passage of small mammals under bridges and through culverts. The Hamlin Recreation Area forms the southernmost highland of the CA, and has unmitigated forest connections to both Blake Brook and Lake Wicwas. The highest number of game trails and a large deer yard was in this area. The

stream itself is an active fishery, and provides the principal habitat types in the central part of the CA. Otter, beaver, mink, moose, deer, bear, raccoon, and red fox were recorded in the south and north parts, although no significant crossings of Route 104 was observed anywhere within the CA.

Rare & Endangered Species / Exemplary Natural Communities: Osprey (S2B), Canada warbler (S4), purple finch (S5), Tall Graminoid Emergent Marsh (S4), Red Maple-Sensitive Fern Swamp (S3S4), Black Gum-Red Maple Basin Swamp (S1S2)

Wildlife Issues of Concern:

- Fragmentation of habitat by roads, notably Route 104
- Inadequate passage of riparian wildlife through culverts and bridges
- Road salting, nutrient loading, and sedimentation of Blake Brook by roadways
 - A particular problem area exists where Route 104 comes closest to Lake Wicwas
- Localized impacts on wildlife by pets and invasive species



Left: One of several beaver meadows along Blake Brook, with ample habitat for a large number of dragonflies, such as the stream cruiser shown above. Lower left: comparable beaver meadows exist in the northern part of Blake Brook, as inspected by the Meredith Conservation Commission (lower right)

