

**Douglas Pond Water Chemistry Survey #521021**  
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Douglas Pond (SC-P148) is a remote water located in the Saint Regis Canoe Area of Franklin County. It has a surface area of 2 acres, a maximum depth of 40 ft. and a mean depth of 14.4 ft. Dissolved oxygen sufficient for trout was found only to a depth of 10 feet in this “dark water” pond, but the water temperature at that depth was 43 degrees F. Douglas Pond was reclaimed in 1954 as part of a program to eliminate invasive yellow perch from the headwater ponds of the West Branch of the St. Regis River. Douglas Pond was experimentally limed in 1959, 1960 and 1961. It was stocked with salmonids following the reclamation from 1954 to 1964, but stocking was terminated due to poor survival. A 1985 Adirondack Lakes Survey Corporation (ALSC) survey found Douglas Pond to be fishless. The pH 4.69 pH points and associated metrics at 5 feet deep demonstrated that the pond was quite acidic in the epilimnion. Douglas Pond is a very deep, very small, dark water pond that is well protected from prevailing winds. The differences in water quality between the epilimnion and the hypolimnion are dramatic in the 1985, 2005, and 2021 surveys. For instance, in the 1985 survey the pH at 5 feet was 4.69 while the pH at 25 feet was 6.21.

Water samples were drawn from Douglas Pond in May of 2021, and the resulting data shows the recent general improvement of the acid/base chemistry of this water (Table 1).

Table 1. Douglas Pond water chemistry variables from 1952 to 2021.

Year	Depth (feet)	Air Equilibrated pH (pH units)	Acid Neutralizing Capacity (µeq/L)	Silica mg L <sup>-1</sup>	Conductivity (µmhos/cm)
2021	5	5.32	7.4	0.2	8.4
	25	6.42	41.4	0.8	10.3
2005	5	4.89	-0.7		11.3
	25	6.72	52.7		13.9
1985	5	4.69	-18.6		15.0
	23	6.21	70.0		13.5
1952	10	6.40			
	20	6.00			
	30	6.00			

Relatively recent improvements in the acid/base chemistry of some Adirondack waters have already been documented, and some of these waters, such as Brooktrout Lake (B-P874), now contain self-sustaining brook trout populations. While advanced chemical metrics can enhance our ability to assess the waters that are recovering from excessive acidity, it is also still valid to assess these waters using pH and ANC. These metrics suggest that Douglas Pond is now a viable experimental candidate for brook trout stocking, it is a historic brook trout water, and is



mentioned in the UMP as a water in which brook trout restoration should occur. Douglas Pond will be experimentally stocked with 150 fall fingerling brook trout annually for several years. Angler reports and/or a follow-up survey will be used to evaluate the success of the stocking.