North Twin Lake

Deschutes County

Deschutes Basin

Location			
Area	112 acres (45.3 hect)	**Elevation**	4,339 ft (1,322.5 m)
Type	natural lake	**Use**	recreation
Location	25 mi NNE of Crescent Lake in Deschutes National Forest		
Access	on Forest Service road from Cascade Lakes Highway to Wickiup Res.		
USGS Quad	Davis Mountain (24K), La Pine (100K)		
Coordinates	43° 43' 26" N, 121° 45' 55" W		
USPLSS	township 21S, range 08E, section 28		

North and South Twin Lakes are a pair of high country lakes in the headwaters of the Deschutes River Basin. They lie just east of the Deschutes River and immediately north of Wickiup Reservoir. Both lakes are nearly circular in shape, about one-half mile in diameter, and are of volcanic origin. North Twin Lake formed when rising magma within the earth's crust came in contact with groundwater. The resulting explosion left behind a crater that later filled with water. There is no surface inflow to or outflow from the lake; water enters by seepage and direct precipitation, and is lost by seepage and evaporation. The hydrologic retention time, estimated as 19 years, is among the highest for lakes in this survey. Maximum depth of the lake is over 60 feet and there is relatively little shallow water. A large number of dead trees stand in the shallow area near the shoreline, indicating significant fluctuation in water level in past years.

The Twin Lakes have long been known for good fishing and were even visited by former President Hoover for this purpose in 1940. North Twin Lake is heavily stocked each year and the results have been excellent. Rainbow trout are the most plentiful, and there are also kokanee salmon and cutthroat trout. A more rustic recreational experience is available at North Twin Lake in contrast to South Twin Lake, and use is accordingly less. There is a nice Forest Service campground on the north shore, but no other facilities exist. No motorboats are allowed on the lake.

The concentrations of major ions in North Twin Lake are fairly high, and the conductivity is well above average. Sodium, potassium, calcium, and magnesium concentrations are the highest for any of the Cascade lakes included in this survey. The pH of the water is also slightly above average. The concentrations of phosphorus and chlorophyl are moderate, and water transparency is good. There is some tendency for oxygen depletion in the hypolimnion. Although the water transparency indicates that North Twin is oligotrophic, other water quality characteristics identify the lake as mesotrophic.

Source: Oregon National Guard, 1981-82. View looking north.

Drainage Basin Characteristics							
Area	0.5 sq mi (1.3 sq km)	**Relief**	moderate	**Precip**	22 in (56 cm)		
				Agriculture			
Land Use %	**Forest**	**Range**	**Water**	**Irrig**	**Non Irrig**	**Urban**	**Other**
	66.0	-	34.0	-	-	-	-
Notes	-						

Lake Morphometry					
			Maximum	**Average**	
Area	112.0 acres (45.3 hect)	**Depth**	63 ft (19.2 m)	40ft (12.2 M)	
Ave/Max Depth Ratio	0.630	**Volume**	4,480 acre ft (5.53 cu hm)		
Shoal area	12%	**Volume factor**	1.90	**Shape factor**	1.08
Length of Shoreline	1.6 mi (2.6 km)			**Retention time**	19 yr
Notes	-				

Water Quality							
Trophic status	mesotrophic						
Sample date	07/16/82	**Temp**	66.6F (19.2C)	**Diss. Oxygen (mg/l)**	8.5		
Transparency	31.5 ft (9.6 m)	**Phosp (mg/l)**	0.010	**Cholorophyl a (mg/l)**	1.8		
Alkalinity	73	**Conductivity (umhos/cm)**	143	**pH**	8.2		
Major Ions	**Na**	**K**	**Ca**	**Mg**	**Cl**	**SO4**	
	9.8	2.7	9.7	7.7	1.9	0.1	
Notes	-