



Minnesota Pollution Control Agency

520 Lafayette Road
St. Paul, MN 55155-4194

Lake Okamanpeedan, Martin County

National Lake Assessment Project (NLAP)

Sample Date: August 7, 2007

Minnesota Lake ID: 46-0051

Area: 2,195 acres

Watershed Area: 5,870* acres

Ecoregion: Western Cornbelt Plains (WCBP)

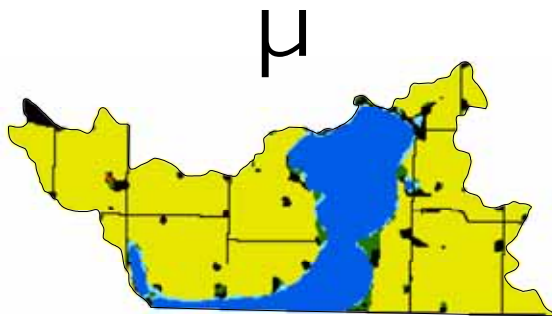
NLAP ID: 0759

Maximum Depth: 6.5 ft

Mean Depth: 4 ft

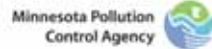


Lake Okamanpeedan Land Use*



Legend

- Developed
- Cultivated (Ag)
- Pasture & Open
- Forest
- Water
- Wetland



Minnesota 2000 Level 1 Landsat Landcover
Classification.img
Minnesota Remote & Geospatial Analysis Lab

Land Use*	Lake Okamanpeedon Land Use %	WCBP Typical Land Use %
Developed	7	0 – 16
Cultivated (Ag)	67	42 – 75
Pasture & Open	<1	0 – 7
Forest	2	0 – 15
Water & Wetland	24	3 - 26
Feedlots (#)	2	

* Info represents Minnesota only and excludes watershed & land use area in Iowa

Lake Okamanpeedon 2007 as compared to typical range for WCBP ecoregion reference lakes. Single NLAP visit based on U.S. Environmental Protection Agency protocol as compared to typical range for summer-means. Data from Minnesota Department of Health (MDH) laboratory.

Parameter	Lake Okamanpeedon (MDH)	WCBP
Number of reference lakes	1	16
Total Phosphorus (µg/L)	383	65 – 150
Chlorophyll-a (µg/L)	313	30 – 80
Secchi Disk (feet)	0.3	1.6 – 3.3
(meters)	0.1	0.5 – 1.0
Total Kjeldahl Nitrogen (mg/L)	04.8	1.3 – 2.7
Alkalinity (mg/L)	140	125 – 165
Color (Pt-Co U)	30	15 – 25
pH (SU)		8.2 – 9.0
Chloride (mg/L)	33	13 – 22
Total Suspended Solids (mg/L)	64	7 – 18
Total Suspended Inorganic Solids (mg/L)	19	3 – 9
Conductivity (umhos/cm)		300 – 650
TN:TP ratio	13:1	17:1 - 27:1
Microcystin(µg/L)	Near Shore	<10 Low Risk
WHO risk Category*	Index Site	10-20 Moderate Risk
	3.2	2.0
		20- 200 High Risk

* Guidelines for safe recreational water environments (World Health Organization, 2003)

µg/L = micrograms per liter

mg/L = milligrams per liter

umhos/cm = micromhos per centimeter

Pt-Co-U = Platinum Cobalt Units

SU = Standard Units

Mixing Status: mixed with no temperature layer (polymictic)

Temperature and Dissolved OXYgen Profile for Okamanpeedon Lake. August 7, 2007. Temp. (C) and DO (mg/L)

