Worcester Cyanobacteria Monitoring Collaborative

WCMC Results August 18, 2025

Lake and Overall Risk	Phycocyanin Concentration (ug/l)	Particle Concentration (#/ml)	Cyanobacteria Density	Cyanobacteria Observed
Bell Pond	ND	132	low	Dolichospermum, Microcystis Debris
Burncoat Pond	568	5347	high	Aphanizomenon, Dolichospermum, Microcystis
Coes Reservoir	13	1716	high	Aphanocapsa, Dolichospermum, Woronichinia
Cooks Pond	8	441	low	Dolichospermum
East Lake Waushacum	ND	332	none	
Ecotarium Pond	10	730	none	
Farm Pond	8	138	low	Dolichospermum
Flint Pond	12	632	some	Dolichospermum, Aphanizomenon, Microcystis
Green Hill Park Pond	39	2757	high	Aphanizomenon, Dolichospermum, Microcystis, Microcystis Debris, Woronichinia
Indian Lake Clason Beach	13	4571	low	Woronichinia, Dolichospermum, Microcystis, Aphanizomenon
Jordan Pond	8	381	low	Dolichospermum
Lake Ellie	49	2510	none	
Lake Lashaway	ND	297	low	Dolichospermum
Lake Quinsigamond Kings Point	10	1525	high	Dolichospermum, Aphanizomenon, Woronichinia
Lake Quinsigamond Lake Park	10	1000	high	Dolichospermum, Aphanizomenon, Woronichinia
Little Indian Lake	432	45887	high	Dolichospermum, Planktolyngbya
Manchaug Pond	ND	9441	low	Microcystis Debris, Dolichospermum
Newton Pond	ND	903	low	Microcystis Debris, Dolichospermum, Oscillatoria
Patch Pond	10	24142	none	
Patch Reservoir	11	1383	some	Dolichospermum, Aphanizomenon, Microcystis, Microcystis Debris
Salisbury Pond	44	593	low	Aphanizomenon, Dolichospermum
Stevens Pond	ND	76	low	Microcystis Debris, Dolichospermum

Previous Results for Lakes Not Tested this Period

Crystal Pond	ND	134	none	8/2/2025
Elm Park Pond	No Data	143931	low	7/21/2025
Lake Quinsigamond Regatta Point	14	2155	some	8/2/2025
Lake Quinsigamond Sunset Beach	10	2701	some	8/2/2025
Leeseville Pond	10	3952	low	8/2/2025
Singletary Lake	ND	287	low	8/2/2025
Southwick Pond	ND	218	low	7/12/2025

Risk of Exposure	Phycocyanin ug/l	Particles/ml	Comparative density of cyanobacteria
Almost none	0-15	0-1000	none
Low	15-20	1000-5000	low
Elevated	20-50	5000-10000	some
Blooming	>50	>10000	high

See reverse side for details

Results are based on methods that are not certified by the Commonwealth of MA but are presented as recommendations so that lake users can make informed choices about their contact. We encourage people to use their best judgement, and "If in doubt, stay out!"

If you or your pet has been exposed to water that may contain cyanotoxins, rinse the areas with tap water immediately. If your pet has ingested scums or water containing cyanobcteria, contact your veterinarian as soon as possible.

Learn more at WorcesterMA.gov/WCMC

Interpreting WCMC Results

If you or your pet has been exposed to water that may contain cyanotoxins, rinse with tap water immediately. Do not let animals lick their fur. If your pet has ingested scums or water containing cyanobacteria, contact your veterinarian as soon as possible and see these CDC guidelines:

[Cyanobacterial Blooms: Information for Veterinarians | Harmful Algal Blooms | CDC](#).

The WCMC is a group of volunteer community scientists that is developing ways to assess risk to cyanotoxin exposure using fast and low cost methods. These results are based on methods that are not certified by the Commonwealth of MA but are presented as recommendations so that lake uses can make informed choices about their contact.

We encourage people to use their best judgement, and "If in doubt, stay out!"

The WCMC does not measure cyanotoxins, instead the group uses four parameters to determine the **risk of cyanotoxin exposure**. These include **phycocyanin concentration**, **particle concentration**, **cyanobacteria density**, and the **cyanobacteria observed**. Each of the results are ranked and given a color to identify severity. The overall risk of exposure at each lake is determined by reviewing all four parameters together.

Risk of Exposure	Phycocyanin ug/l	Particles/ml	Comparative density of cyanobacteria
Almost none	0-15	0-1000	none
Low	15-20	1000-5000	low
Elevated	20-50	5000-10000	some
Blooming	>50	>10000	high

ND = Below detection limits

Risk of Exposure: Overall risk of exposure to cyanotoxins in the waterbody based on a holistic interpretation of the data collected.

Phycocyanin: Cyanobacteria-specific pigment concentration in the water. The more phycocyanin there is in the water, the more cyanobacteria are present. However, because different kinds of cyanobacteria produce different quantities of phycocyanin, the risk of toxin production is different for the same concentration of phycocyanin when there are different cyanobacteria present.

Particle Concentration: Particles include living and non-living materials and can be a proxy for overall turbidity of the water. High concentrations of particles in the water can be indicative of cyanobacteria blooms, but can also be the result of other factors such as non-living debris and sediment. The phycocyanin concentrations and cyanobacteria density help to interpret if particles are due to cyanobacteria or other sources.

Cyanobacteria Density: The ratio of cyanobacteria to other organisms in the sample. Higher densities can indicate elevated risk of exposure to cyanotoxins. Density results do not consider concentration, but in general, systems dominated by cyanobacteria are at higher risk for producing toxins.

Cyanobacteria Observed: Genera of cyanobacteria identified in the sample. Because different cyanobacteria have different levels of phycocyanin, observed cyanobacteria help determine the threshold of phycocyanin that is considered risky.