

RESTORE – a nexus of science and community working toward the restoration of Lake Rotoroa.

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RESTORE - Restorative Ecological Strategies to Optimise Rotoroa's Environment - is an inclusive, multidisciplinary group of citizens, scientists, educators, and activists committed to improving water quality and overall ecological health of Hamilton's Lake Rotoroa. Water clarity declined dramatically after the collapse of its invasive weed beds in 1989, and water quality has remained degraded since that time. The lake was used extensively for swimming in the 1950s but recent monitoring has regularly found potentially toxic cyanobacteria (blue-green) algae at levels above recreational health guidelines. Despite occasional high algal abundance and concerns about pathogenic bacteria, the lake remains very popular for recreation, both aquatic and lakeside.

Rotoroa has been described by Hamilton mayor Julie Hardaker as being Hamilton's 'jewel', but because of cyanobacteria regularly has precautionary signs warning of possible risks of physical contact with the water. These notifications contrast with the popularity and use of a children's playground which opened in late 2014. The playground has fulfilled its purpose as a valuable recreational amenity for Hamilton residents but the recreational use of the lake remains compromised by cyanobacteria blooms.

RESTORE has therefore prioritised the improvement of water quality, and recognising the complexity of the issue, has called for a coalition of inputs from citizens, scientists, and local government.

Since RESTORE's inception in 2014, it has successfully collaborated with Hamilton City Council to research, debate and promote options for restoring the Rotoroa environment and enhancing its value. The collective efforts of RESTORE have resulted in the re-institution of regular water quality testing, and RESTORE's participation on the city's Lake Domain Planning Committee. RESTORE advocates effective lake restoration objectives via submissions, local media and events, and community meetings.

We present a brief history of the lake, examine trends in water quality, and outline our objectives and strategies for restoration.