Greetings Lake Brantley Residents!

Please find the latest bioassessment for your lake below. Key highlights of this update include:

- Submersed Aquatic Vegetation (SAV) - decline in diversity observed
- Hydrilla presence and absence observed
- No water hyacinth found
- FWC permitting and guidelines for aquatic vegetation removal
- Results from the April 13th, 2013 restoration event
- Recommendations for you and your lake

On December 13th, 2013, Seminole County Lake Management personnel Thomas Calhoun and Marie Lackey surveyed the aquatic plants of Lake Brantley.

Submersed aquatic vegetation (SAV) found during the inspection included: lemon bacopa to 3 feet, road grass to 4 feet, hydrilla to 4 feet, eelgrass to 4 feet, and stonewort to 4 feet. Stonewort was the dominant SAV found during this inspection. Stonewort plays an important role in the ecosystem of the lake. It provides habitat for aquatic species, reduces nutrients in the lake, and competes for space with the invasive exotic hydrilla. Hydrilla was observed in one location northwest of the SWOHOA boat ramp. No water hyacinths (a floating exotic plant) were observed during this inspection.

Photo: Isolated hydrilla plant found northwest of the SWOHOA boat ramp.

Photos: Stonewort collected in lake samples.
Exotic emergent aquatic plants observed included: alligator weed, elephant ear, primrose willow, and torpedo grass. Many shorelines were found cleared or treated with herbicides. Remember, state law requires that you apply for a free aquatic plant removal permit through the Florida Fish and Wildlife Conservation Commission (FWC), if you want to alter your shoreline or treat exotic vegetation with aquatic herbicides. For more information please visit [http://www.myfwc.com/license/aquatic-plants](http://www.myfwc.com/license/aquatic-plants).

The secchi reading (measurement for water clarity) was 5.9 feet in a depth of 16.5 feet.

On March 14th, 2013, Seminole County Lake Management personnel Thomas Calhoun and Gloria Eby joined with lake liaison and president of the Lake Brantley Lake Management Association, Fred Streetman, surveyed the aquatic plants in Lake Brantley.

Submersed aquatic vegetation (SAV) found during the inspection included only lemon bacopa to a depth of 3 feet. This is a reduction in SAV presence and diversity of species from prior inspections. SAV play an important role in the ecosystem of the lake. They provide habitat for aquatic species (especially fish), reduce the level of nutrients in the lake, improve water clarity, and help to minimize the growth of the invasive exotic hydrilla by out competing for space. Hydrilla was not observed during this inspection. No water hyacinths (a floating exotic plant) were observed during this inspection either.

**Photo: Decline in SAV presence within Lake Brantley.**
Exotic emergent plants observed during inspection included: alligator weed, elephant ear, primrose willow, and torpedo grass. Many shorelines were found cleared or treated with herbicides. Remember, state law requires that you apply for a free aquatic plant removal permit through the Florida Fish and Wildlife Conservation Commission (FWC), if you want to alter your shoreline or treat exotic vegetation with aquatic herbicides. For more information please visit http://www.myfwc.com/license/aquatic-plants.

Photo: Close-up of torpedo grass and its roots that shoot out like a “torpedo”.

The secchi reading (measurement for water clarity) was 7.2 feet in a depth of 16.5 feet, an increase from prior survey of 5.9 feet. Several grass carp fish were observed within the Lake Rena area.

The Seminole County Lake Management and SERV Programs would like to say THANK YOU LAKE BRANTLEY VOLUNTEERS! You were all a tremendous help on Saturday, April 13th! Thanks also to the Lake Brantley Lake Management Association Inc. for generously contributing to the purchase of plants, providing transportation, photography, and for hosting SERV volunteers in a post-event pizza lunch. Please check out more photos of the day and what
we accomplished by visiting https://www.facebook.com/SERVProgram. To learn more about the lake, please visit the Lake Brantley Lake Management Association Inc. (LBLMA) webpage at http://mylakebrantley.org/ and the Water Atlas webpage at http://www.seminole.wateratlas.usf.edu/lake/?wbodyatlas=lake&wbodyid=7519.

Through the hard work of 40 volunteers at 5 sites, we planted 3,730 native aquatic plants (350 golden canna, 1300 duck potato, 160 fire flag, 220 soft rush, 1700 pickerelweed)! These efforts will help reduce pollution runoff into Lake Brantley, aid in the reduction of algal blooms (caused by the pollution runoff), provide habitat for wildlife, reduce shoreline erosion, and improve the overall water quality of Lake Brantley. You should be extremely proud of your work on this restoration project and KUDOS to the residents of Lake Brantley who participated and Fred Streetman with Lake Brantley Lake Management Association, Inc.
Lake Recommendations:
1. Work together to control and if possible, eliminate invasive plants and increase native aquatic plantings along shoreline (such as pickerelweed, canna and duck potato). Have at least one annual lake association meeting, invite guest speakers (such as county or state biologists) to discuss lake specific issues.

2. Treat invasive torpedo grass, melaleuca, and other invasive aquatic plants along your waterfront. Either do it yourself by hand removal or obtain the necessary aquatic herbicide (we can provide some sources) or hire a contracted aquatic herbicide application company (we can provide a list of vendors from the state). This recommendation could be managed by Seminole County by establishing an MSBU, Municipal Service Benefit Unit, for aquatic weed control services. For additional information contact Carol Watral at (407) 665-7164 or cwatral@seminolecountyfl.gov or http://www.seminolecountyfl.gov/fs/msbu/. Control of aquatic and wetland plants will in most cases requires a free Florida Fish and Wildlife Conservation Commission (FWC) aquatic plant control permit. Contact Alicia Knecht at (321-246-0682) or Alicia.Knecht@myFWC.com for a permit.

3. Increase educational outreach programs, i.e. Shoreline Restoration Workshops, Florida Yards and Neighborhoods (FYN), Lake Management Video mail-outs, and reduction of personal pollution by: decreasing fertilizer usage; using only phosphorous free fertilizers; keeping a functional shoreline with beneficial native aquatic plants; keeping grass clippings out of your lake and the storm drains that lead to the lake. All these activities aid in protecting your lake! Contact Seminole County Lake Management Program (407) 665-2439 for more information regarding the free educational programs available.
Greetings Lake Brantley residents! Please find updates for your lake below.

Below please find the latest lake assessment for your lake. Key highlights of this update will include:

- Submersed Aquatic Vegetation (SAV)
- The benefits of Stonewort
- No hydrilla found
- No water hyacinth found
- FWC Permit for vegetation removal
- Results from May’s restoration event

On **October 25th, 2012**, Seminole County Lake Management personnel Thomas Calhoun and Marie Lackey surveyed the aquatic plants of **Lake Brantley**.

Submersed Aquatic Vegetation (SAV) found during the inspection included: lemon bacopa to 3 feet, road grass to 6 feet and stonewort to 8 feet. Stonewort was the dominant SAV found during the inspection. Stonewort plays an important role in the ecosystem of the lake. It provides habitat for aquatic species, reduces nutrients in the lake and competes for space with the invasive exotic hydrlila. Hydrlila was not observed during this inspection.

**Photo: Stonewort found during inspection.**
Exotic emergent plant present found included; alligator weed, elephant ear, primrose willow and torpedo grass. Many shorelines were found cleared or treated with herbicide. Remember to alter your shoreline or treat exotic vegetation with herbicide you must apply for a free aquatic plant removal permit through the Florida Wildlife Conservation Commission [http://www.myfwc.com/license/aquatic-plants](http://www.myfwc.com/license/aquatic-plants). No water hyacinths were seen during the inspection.

**Photo:** Treated torpedo grass.
Many of the plants from the April 28th restoration event are healthy and expanding around the lake. The efforts will help reduce pollution runoff into Lake Brantley (the number one source of water pollution into our water bodies!), aid in the reduction of algal blooms (caused by the pollution runoff), provide habitat for wildlife, reduce shoreline erosion, and improve the overall water quality of Lake Brantley.

**Photo:** Duck potato, pickerelweed and canna planted during the event.
The lake elevation was 44.08 feet above sea level. Secchi (water clarity) was 5.6 feet at a depth of 7.7 feet.