

Volume 8, Issue 7

The Lily Pad The Topeka Area Water Garden Society

Published Monthly – February to November The objective of the society is to encourage a greater appreciation and interest in water gardening and aquatic plants, to disseminate information about those interests and to help our members stimulate the study and culture of water gardens.

Everything you wanted to know about algae AKA: Understanding water quality

Water garden specialist Deb Spencer told TAWGS members everything we wanted to know (and some things we didn't want to know, as well as some things we didn't understand) at our August meeting. She said that good water quality is the cheapest and most effective way to control algae.

Deb said there are several things we need to know about our pond.

It is very important to know:

- the size of the pond (in feet- the length, the width, the average depth)
- the surface area of the pond
- how many gallons in the top inch

A water meter is the best way to determine the number of gallons in the pond or how much the last inch takes. She said a hose end water meter costs between \$85 - \$125.

Another important factor is the water source of the pond: tap, well, lake, etc. Most city tap water is treated with chlorine or chloramines (a chlorine and ammonia compound). Cities will vary their treatments with weather, maintenance, etc. Both chlorine and chloramines are toxic to fish, but chlorine evaporates from the water after a period of time, whereas chloramines remain in the water for sometimes as long as 90 days! Be sure to add declorinator to neutralize chlorine, chloramines and ammonia every time you add water. You can not overdose on dechlorinator.

Many factors influence the water chemistry of a water garden. Though it can be very complex, there are a few simple things you can do to help establish a healthy balance. Carbonate Hardness (KH) and Acidity (pH) are two very important water quality factors.

When treating water chemistry in a pond, first address the KH (buffering capacity), which most of us don't know much about. Carbonates and bicarbonates buffer or moderate pH so that it does swing too much from morning to evening. It has been found that when carbonate hardness is 125 - 230 parts per million, the pH does not swing as much or get as high. Tap water in this region tends to have a very low KH and typically needs additional buffering before the pH will stabilize in a

September 1, 2005

Monthly Meeting 7:00 p.m., Wed., Sept. 21, 2005 Historic Ward Meade Park Safety in and around the Pond

Eric Wood, Puddles-N- Pads

healthy range.

When pH and KH are in the ideal range, everything does better but algae. To test carbonate hardness you need a KH test kit and a sample of pond water. Contact Water's Edge or another water garden specialist for more information concerning the amount of buffering compound that should be added to get your KH in line.

Test pH in the early morning and in the late afternoon, using a pH test kit and a fresh sample of pond water. If the pH is between 6.8 – 8.3 and swings less than .8 during the day, all is good. Always make sure KH is in a healthy range before adjusting pH.

Well aerated ponds can support more fish and be clearer because bacteria can work better with good aeration, Deb said. Oxygen levels vary with temperature: warm water contains less oxygen than cold water. Although plants provide oxygen during the day during photosynthesis, at night they use oxygen during respiration. Therefore, oxygen levels will be lower in the morning. There are kits available to check oxygen and hardness levels as well.

A proven product on the market is Algaefix, which is EPA approved to clear green water and kill hair algae in garden ponds. According to Deb, it kills the good algae (the stuff we see on pots and rocks) as well as the bad algae. She called it a temporary fix – a bandaid, because it gets the nutrients out of balance. Barley, which has been on the market for a few years, inhibits algae growth and some people have good results with it.

There are other things that we can do to help control the growth of bad algae in our ponds.

- 1. Fish the more fish you have, the more important good filtration is
- 2. Food feed fish twice a week, NOT three times a day
- 3. Shade provide 60 70% plant coverage or use dyes
- 4. Mesh baskets Plant any plant with lots of

roots (iris, rush, umbrella, papyrus) in a mesh basket and put it where water moves through it to absorb the excess nutrients

- 5. Water changes pump or siphon water from the bottom of the pond
- 6. Harvest excess plant material like hyacinth, anacharis, and hair algae it removes excess nutrients from the system.
- 7. Test and adjust your pond's KH and pH monthly throughout the growing season to improve the water quality in your pond, and use sludgedigesting bacteria to keep organic buildup in your pond at a minimum.

Deb is co-owner of Waters Edge in Lawrence and is a member of TAWGS. We thank her for her support of TAWGS.

Pond Tour Photos



The pond of new members Carl and Konnie Myers was enjoyed by all on the pond tour. (Photo provided by Dean Demoss)



New members Allen & Connie Ellis shared their beautiful pond on the 2005 Pond Tour. (Photo provided by Dean Demoss)

TAWGS Minutes August 17, 2005

President Tom Platis welcomed everyone to the

August meeting and opened the meeting with self introductions. He welcomed three new members, Tom & Pat Routh and Linda Reynolds. VP Floyd Gruver introduced our guest speaker, Deb Spencer, who gave a very interesting talk on algae.

Following the program the group enjoyed refreshments provided by Helen Platis and Connie Ellis. Donnis Hodges and Diane Gruver volunteered to bring refreshments in September.

Treasurer Jim Green reported that there is \$2,382.83 in the checking account and \$1,143.87 in the savings account for a grand total of \$3,526.70. He reported that the final cost for the pond at the Wildlife and Parks office was \$3,425.11. Income from the pond tour will be in the neighborhood of \$2,777.33. We still need to pay for the printing of the maps and there are a couple ads in the map that we haven't received payment for yet.

Newsletter editor Diane Gruver apologized to members who had paid their dues but still received a yellow highlight on their August newsletter that their dues were due. She had not received the information from the treasurer so did not know who had paid. Sorry about that.

Doug Peterman said the he had left a Carhart jacket at Wildlife and Parks when he was working on the pond and wondered if anyone had picked it up. Wildlife and Parks tell him they did not find one.

Tom Platis asked for volunteers for the Ward Meade Apple Fest which will be held October 2^{nd} from 9-5. He passed around a signup sheet and said the he would sure appreciate volunteers. Diane Gruver explained that TAWGS has agreed to provide volunteers for the festival and to maintain the fountain in exchange for the use of the Preston Hale meeting room at Ward Meade.

Dean Demoss said that Duane and Mary Eberhardt had helped him clean the fountain and thanked them for their assistance. He said that he would appreciate a few volunteers at 4:30 p.m. on Monday, August 29th to help fertilize the plants. Thanks to Deb Spencer from Water's Edge who donated a jar of Highland Rim fertilizer tabs for that project.

Floyd Gruver reported that Brad Cheney has asked for a few helpers to build a pondless waterfall at the Women's Birthing Center. Dean Demoss, Don Taliaferro and Floyd & Diane Gruver volunteered to help.

Joe Breitenstein reported that the Garden Council has donated \$1,000 to Ward Meade Park to help in their projects. He also reported there has been some vandalism in the park again. The Garden Council will not meet on the first Monday of Sept. because of Labor Day but will meet the second Monday, Sept. 12th. He took orders from members who are interested in buying a hellebores when he orders some from Arnolds for the plant sale next spring.

Tom Platis asked for volunteers for the nominating committee. Tom agreed to chair the committee of Duane Eberhardt, Don Taliaferro and Floyd Gruver.

Bob Saathoff told the group that he has been working with Gerald Ensley at the Ensley gardens at

Lake Shawnee and he recommended that TAWGS consider helping with that project next year instead of building a pond. Hi Stockwell moved and Don Taliaferro seconded that our club have a presence in the Lake Shawnee/Ensley Garden project and use our money toward that next year instead of building a pond. Motion carried. Pat and Dick Rokey have graciously agreed to chair the committee that will work directly with Gerald and the parks personnel.

Duane Eberhardt moved and Don Taliaferro seconded that the meeting adjourn. Motion carried.



Floyd Gruver, Dean Demoss and Duane Eberhardt trim and fertilize lilies at the fountain at Old Prairie Town (Ward Meade Park).



Carol Gnagy and Floyd Gruver work in Anna's Pond at Old Prairie Town.

Group meets to fertilize lilies at WMP

Carol and Barrie Gnagy, Dale Jirik, Duane Eberhardt and Floyd and Diane Gruver answered Dean Demoss' request for help fertilizing lilies in the fountain at Ward Meade Park recently. After trying to cram the fertilizer tabs into very overcrowded lilies it was very apparent that the lilies will have to be repotted next spring. The nasty job can't be put off another year. Even though they need to be repotted they are still blooming very pretty though.

After finishing the maintenance work on the

fountain. Dean, Carol and Floyd climbed into Anna's Pond to do some much needed maintenance. Actually, the pond needs to be completely drained and cleaned as it thick with muck, leaves, sticks and boulders on the bottom. Hopefully that can be done this fall or next spring.

The Eberhardt's and Dale Jirik have been regular helpers for Dean with his monthly job, but this was a first time experience for the Gnagy's and Gruver's. Thanks to any and all who have helped Dean with the project and an especially big thanks goes to Dean for taking charge of the maintenance of the fountain. We really appreciate all his help.

Educational opportunities

The following seminars are being offered by Puddles-N-Pads and Waters Edge who both provide great information to their customers as well as TAWGS members.

Puddles-N-Pads, Topeka

October 7, Friday, 7:00 p.m. <u>Closing your pond</u> – sign up now October 8, Saturday, 8:30 a.m. Closing your pond – sign up now

Waters Edge, Lawrence

September 17, Saturday, 10:30 a.m. <u>Getting Ready for Fall & Leaf Netting</u> - Free - No reservation required October 8, Saturday. 10:30 a.m. <u>Bubbling Bird Baths and Fountains</u> - Free - No reservation required October 22, Saturday, 10:30 a.m. <u>Winterizing Your Garden Pond</u> - Free - No reservation required

Thin out oxygenators

Reprinted from 9-4-01 Splash

Many ponds have nice, thick growth of oxygenators, Parrots Feather, etc. by now. Some of that needs to be thinned out as the days and nights start getting cooler because it will partially die down and the decomposing organic matter will put too much of a load on the bacterial culture in the pond as the bacteria start to go dormant when the temperatures fall.

When it is time to thin out (not eliminate!) depends on the part of the country where the pond is located and how deep the pond is. Warmer layers of water in the bottom of the pond will support these plants longer than the colder layers near the top. As the temperatures start to get lower and the days get shorter these minor chores can be done a little at a time.

Don't forget to use a sturdy net to fish out leaves that have blown into the pond and soon it will be time to cover it completely with a net to prevent too many leaves falling into it.



Topeka Area Water Garden Society 9900 SW K-4 Highway Topeka, KS 66614

Calendar of Events

TAWGS monthly meeting
Apple Fest
TAWGS monthly meeting
TAWGS Pot Luck Supper

Water Garden Tips

The end of summer means plant leaves began to die back more quickly. Remember to remove this dying foliage from plants before it has a chance to fall into the water and decay.

Your Dues are Due if your label reads 9-05 or anything in 05 prior to September

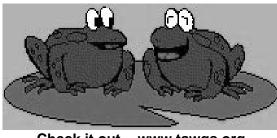
Please renew as soon as possible to continue receiving the newsletter. Send dues to Jim Green, 5701 SW Arrowhead CT, Topeka, KS 66614

THE TOPEKA AREA WATER GARDEN SOCIETY OFFICERS:

Tom Platis
Topeka
Floyd Gruver
Holton
Diane Gruver
Holton
Jim Green
Topeka

President 785-478-9514 Vice President 785-364-3046 Secretary 785-364-3046 Treasurer 785-272-7139

Meetings are held the third Wednesday of each month at Ward Meade Park unless otherwise publicized. Dues are \$15 per single or \$20 per family and can be sent to Jim Green, 5701 SW Arrowhead CT, Topeka, KS 66614.



Check it out - www.tawgs.org

The Lily Pad

Published Monthly, February to November by the Topeka Area Water Garden Society (TAWGS), a non-profit organization. TAWGS does not warrant the information in this newsletter. The opinions expressed are solely those of the authors and do not necessarily represent those of the Topeka Area Water Garden Society.

The Lily Pad encourages submission of articles pertaining to water gardening from the membership and other interested parties. Deadline is the third weekend of each month. Address input and/or questions to:

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We reserve the right to edit input to meet publishing requirements. Copy cannot be returned.