

The Lily Pad

The Topeka Area Water Garden Society

Published Monthly – February to November

Volume 7, Issue 7

August 1, 2004



A pet bridge spans the pond in Janet Nyfeler's back yard.

# 2004 Topeka Pond Tour held

By Diane Gruver

The 13<sup>th</sup> Annual Topeka Pond Tour is history and I think everything went pretty well. Saturday was a perfect day! Not hot and just beautiful. Sunday was another story with a downpour most of the morning and Topeka receiving upward to two inches in some places. I was surprised that hardy tour goers with umbrellas didn't let the weather faze them and enjoyed the ponds in spite of the weather.

We want to thank the pond tour hosts, who allowed around 400 people to tramp through their yard and gardens. Those hosts were: Brad Chaney, Rick & Jan Stallbaumer, Steve & Peggy Rippe, Bill Anderson, Jim & Margaret Ballantytne, and TAWGS members Duane & Mary Eberhardt, Larry & Barb Shipman, Janet Nyfeler, Tom & Mary Blubaugh, and Don and Ruth Taliaferro.

Next, we need to thank all the pond sitters and the person that lined them all up. Michael Bradley. Those willing helpers were: Lynn Pelton, Joe Britenstein, Mary Ann Bechtold, Carol & Barrie Gnagy, Jim Green, Dean & Randy Demoss, Betty Karnes, Larry & Caryn Sheets, Colleen & Kent Hampton, Tom & Helen Platis, Earlene & Dale Jirik, Gerald & Donnis Hodges, Becky Coffman, Martha Killian, Pat & Dick Rokey, Marikay & Doug Peterman, Walt & Jeanine Miller and of course my hubby Floyd, who spent all day Sunday at the Chaney pond, and me, who sat with him after my shift at the Eberhardt's

## Monthly Meeting 7:00 p.m., Wed., Aug. 18, 2004 Bring birds into your backyard

Paul Willis, Master Gardener/Audubon Society

Sunday morning.

In conclusion, this all couldn't have happened without the dedicated help of committee chairman Mary Ann Bechtold, and her committee consisting of Becky Coffman, Michael Bradley, Jim Green, Pat Rokey, Jeanine Miller, Gerald & Donnis Hodges, Jon Fischer (who did the map) and me.

If I have left anyone out, it was purely unintentional and I'm truly sorry. If you haven't taken the time to help pond sit you are really missing out on a great chance to get better acquainted with the pond hosts and to enjoy visiting with others about water gardening. It really is a fun, rewarding and educational experience.

# Bogs are like sponges

By Diane Gruver

When I think "centipede" I think of a long wiggly ugly bug crawling on its many legs. Kip Walker from Lilypads in Landscapes Inc., (the wholesale side of Puddles-N-Pads) showed TAWGS members another kind of centipede at our July meeting. It comes in sections and connects to a snorkel that looks like a smoke stack. It is the new wetland filter system that is being used not only for bogs and pondless waterfalls but is used commercially as a filtration system for parking lots, golf courses, large public water features, etc.

Actually, the Centipede is the lateral system base and the smoke stack is a Snorkel, or cleanout, which allows cleaning the system without disturbing the plants.

Kip told the group that the Centipede will probably filter out as much as a grande bio falls. He explained how the one at Puddles & Pads has helped clear up their ponds which are over stocked with large koi which are over fed by customers. © (They aren't complaining.)

"Wetlands (bogs) are giant sponges," Kip said. "The plants break down toxins naturally; you don't have to use chemical treatments."

In addition, Kip said that bogs provide a great wildlife habitat and help with a heavy fish load. A bog with a Centipede and Snorkel filtration system, which works better than just gravel alone, can be built beside the pond at the same level, connected to the pond by a stream or used as a waterfall. Large rocks, small rocks and gravel are placed on top of the Centipede and the plants grow in the gravel. Plants that do well in bogs include: sedge, cattails, grasses, rushes, iris, bean bog, marsh marigold and hibiscus. It is beneficial to have plants with different root lengths. Kip said a bog is great for people who want lots of plant material.

Some projects that Kip is involved with are the koi pond at the Howard Doorly zoo in Omaha and drainage system at Westridge Mall. Kip is the outside sales manager for Lilypads in Landscapes Inc. and travels four states talking to contractors and garden center managers about wetland filters.



Massive limestone outcroppings make a natural looking pond on the Kansas City Pond Tour.

### Lewis & Clark tour KC Ponds

By Diane Gruver

You've probably heard a lot recently about Lewis and Clark, with various celebrations taking place to celebrate their expedition over 100 years ago. Well, the Hodges and Gruvers had our own expedition recently, and Lewis (aka Gerald) and Clark (aka Floyd) had a hot time July 10-11, touring 28 ponds in the Kansas City area during the first heat wave of the summer. Unlike the pioneers, we had a compass and map, and an AC and comfortable car to search out the beautiful ponds, but we still got lost and plenty hot! Don't ever let it be said that there is a straight street in Kansas City, because if there is, we sure didn't find it! Talk about curves, hills, woods and confusing streets! We probably traveled at least another twenty miles just because we got off track! It didn't help that that Clark, the navigator, kept telling Lewis, the driver, to turn right instead of left or to go east, instead of west. Gosh, we probably could have seen another ten ponds if we had known where we were going. <sup>(2)</sup> Donnis and I (in the back seat offering suggestions) concluded that it was good that the four of us were together, because had we gone as lone couples, we probably would have killed our spouses (or they killed us!)

Probably our favorite pond was in Kansas City, Missouri where they had natural stone cliffs in their wooded vard and they scooped the dirt out between the massive moss covered limestone outcropping and attached liners at the bottom. Twenty waterfalls spring from various locations in the limestone. It looked very natural and was quite impressive. Most of the ponds in that area were very wooded and secluded and it was hard to believe that you were still in a big city. Another favorite, in Belton, was a yard with four large ponds that were linked by 5 waterfalls. Spring fed by springs that flow as much as 7,200 gallons of water per day, the falls cascaded down a natural slope. The yard was beautifully landscaped. In Olathe we saw a peaceful oasis under an old white birch tree where a 30' stream split and flowed around a huge blue spruce into a large pond. An impressive water feature at a pond in Leawood was an independent fountain consisting of a 600 pound granite ball floating on a jet of water. Two small lotuses that we saw in Lee's Summit that we really liked were Baby Dolls and Temple Dancer - a nice change from the Momo Baton that we are accustomed to seeing here at home. We saw some shade ground cover, pachysandra, in Overland Park that caught my eye for future groundcover in my shaded area. A pond in Leawood was surrounded by natural looking fake rocks (much easier to handle.) In Olathe, we saw a hardy banana tree that will survive our Kansas winters. Also, we saw several public landscape areas all over KC with massive plantings of red begonias that seemed to flourish very well in full sun. Of the 28 ponds we saw, we were not disappointed in any of them and we wonder just what we missed in the other thirty some ponds that we didn't see. Alas, there is always next year. Oops, not for us, as we plan to drive to Alaska next June. Guess we'll have to catch them in 2006!

## Minutes July 21, 2004

TAWGS members met at Ward Meade Park July 21 for their regular monthly meeting. Vice President Becky Coffman called the meeting to order in the absence of President Tom Platis. Self introductions preceded an interesting program on building bogs by Kip Walker. Don Taliaferro and Bob & Cheryl Saathoff served delicious refreshments following the program. When the meeting resumed Mary Ann Bechtold moved and Carol Gnagy seconded that the minutes be approved at mailed in the Lily Pad. Motion carried.

Jim Green reported that TAWGS has \$2,046.76 in the checking account. There is about \$2,100 in the savings account. He also reported that we had received \$1,125.00 for the sale of ads in the pond tour map; expenses paid so far have been \$1,503.28 and tickets sold amounted to \$2,105. We still should have some income from ads that haven't been paid for and there are still a few small expenses to be paid. Income from the pond tour should be in the neighborhood of \$1,800.00. Jim also reported that the total expenses so far for the VA pond are \$3,695. We still have a few more things to pay for but the total should remain well below the budgeted \$4,200.

VP/program chairman Becky Coffman reported that the program for next month will be Paul Willis, who will talk about bringing birds into your back yard. She also reported that Sonya from Valley Falls has called to say that she has a dirt pond in Valley Falls that is over stocked with koi and she would like to get rid of them. The catch is, you have to catch them yourself. Call Sonya at 945-6769 if you want some koi.

Congratulations were given to Bob and Cheryl Saathoff who won first place in the TBA contest in the Shade Garden division. Also congratulations to Lynn and Keith Pelton who won first place in the Water Garden division.

Mary Ann Bechtold, chairman of the pond tour, reported that some pond tour hosts reported around 450 tour goers visited their pond. She thanked the pond hosts, the volunteers and everyone who worked to help make the pond tour a success. She suggested that people be thinking about if they want to hold the tour in June and have lots of competition or have it in July when it is so hot. Please give her your input.

Diane Gruver reported that the Member Pond Tour is August 15<sup>th</sup> beginning at 1:30 at the home of Janet Nyfeler. She passed out a map with driving directions and asked everyone to bring a pot luck dish, table service, and chairs to the last stop at Barrie and Carol Gnagy's home for the pot luck dinner.

Jim Green read a thank you note from the Director of the Eastern Division of the VA Health Care system. He said that the pond that TAWGS built created a welcome retreat for patients and employees. Jim said that a lot more has been done on the landscape around the pond by the VA staff and patients and invited people to drive by to look at it. From the 21<sup>st</sup> street entrance go south to road H and turn west. The pond is located north of the greenhouse. Matt Uhlik from Greenleaf donated several nice large koi for the pond. The dedication was discussed and it was the general feeling that the VA should set a time when the media can attend and TAWGS members will try to attend. It is hoped that it will not be set during working hours. Jim will work with the VA on the plaque.

Dean Demoss said that he has been cleaning the fountain and that he will contact some of the people who have been helped him in the past. Club members agreed that TAWGS should buy some bacteria for the fountain since we are to maintain it. Duane Eberhardt volunteered to store the pond, etc. for the lawn and garden booth in his hanger. We appreciate Duane's help and thank him as well as Caryn and Larry Sheets who have been storing it the last few years. Becky announced that she will not be chairing the booth for the lawn and garden show next year so people need to be thinking about a new chairman. She also said that it won't be long until it's time to elect officers for next year and we need to find some new leaders since the same officers have all served the last two years.

Colleen Hampton and Mary Blubaugh volunteered to bring refreshments for the August meeting. Doug Peterman moved and Dale Jirik seconded that the meeting adjourn. Motion carried.

## Understanding pond filtration

by RANDALL TATE, Chief Manager, The Water Garden Reprinted from July 04 Water Garden News

Pond filtration is one of the most misunderstood functions that we undertake to maintain our pond environment. We write about this aspect of water gardening often but I feel that it deserves frequent discussion to help you keep the main points in mind as well as keeping you up to date on new information and products as they come along.

When talking about filtration with most new pond owners they assume that the only type of filtration they need to do is mechanical filtration. They see debris in suspension in the pond water and see the need to remove this to improve the clarity of the water. This is just one type of pond filtration and the one that requires the most time for maintenance. Mechanical filtration can take several forms.

For a small pond of one to two hundred gallons this is most often a small in pond filter that contains a sponge or similar material. While this will work well in trapping small particles because of the small pore size it soon stops up. You may find that you need to clean this filter every few days to keep your water flowing and your pump from burning up. Larger ponds of a few hundred gallons may use a larger type of in pond filter. These often use a more open cell sponge or a fiber type of filter media. This type of filter media is a good material for this size pond as it does a good job of trapping larger particulate while also allowing good water flow giving you more time between cleaning.

For many ponds a skimmer is the best method of providing mechanical filtration. Some skimmers will only catch debris larger than 1/4 inch or so. The better skimmers will also provide fiber media to also catch smaller debris while making it convenient to clean. A skimmer will not only filter out debris that is suspended in the water, it will also catch a large portion of floating debris that has blown into the pond and has fallen from nearby trees.

For very large koi ponds settling tanks function as mechanical filtration swirling and slowing down the water to allow particles to fall to the bottom by gravity. This debris can then be removed by opening a valve at the bottom of the tank. These tanks can be quite large, usually several hundred gallons. Most often a bottom drain is piped to one or more of these tanks. The tanks are round and sit in the ground at the same level as the pond with the water flowing in by gravity. Water is pumped from the tank and flows on to a biological filter.

Since mechanical filters will require the most cleaning they should be as easy to clean as possible otherwise they tend to get ignored leading to inadequate water movement and or pump failure.

While mechanical filtration reduces the solids in the pond water, biological filtration is the most important when it comes to having a healthy pond. Biological filtration simply means using bacteria to clean our pond. The action of beneficial bacteria not only improves the water quality for the fish but also improves the clarity decreasing the amount of algae in the pond. There are several types of bacteria that work to our benefit in the pond. These bacteria will attach themselves to any surface that is in the water, the pond liner, stone, plants, and anything else that is underwater as long as it has a source of nutrients and oxygen. If we depend only on the bacteria that is living only on the liner, plants, etc. that is in the pond then we will not be able to keep many fish and our water quality may suffer. What we need to do is add more surface area to the pond. A lot more surface area that the bacteria can live on is needed. There is nothing magical about biological filter media. As we stated previously, bacteria will live on most any surface in the water. What we need to look for is a type of media that will provide as much surface area as possible and still keep the filter small enough to conceal in the landscape. We also want a media that is not too dense (unlike a sponge) that will allow the water to flow around and through it without clogging up. While gravel and lava rock have been used for years this material not only requires a very large filter (10% of the pond size or larger) it is heavy and difficult to clean. The best materials today that provide a high surface area in a small space with sufficient void space to allow the water to flow through easily are synthetic material. Small plastic shapes with textured surfaces, fiber media, and ribbon are considered the most efficient materials to use. As long as the material provides the bacteria with contact with the water then little or no cleaning is needed.

Sometimes (usually ponds of a few hundred gallons and less) the biological filter and the mechanical filter are the same. This could be a skimmer containing filter media or an in pond filter. This means that we need to clean the filter to remove most of the accumulated debris without over-cleaning it, which would destroy some of the beneficial bacteria. Larger ponds will use one of the methods of mechanical filtration already discussed in combination with a biological filter. The mechanical filter will be cleaned on a regular basis and the biological filter should require little attention.

While all biological filters perform the same function of housing a large colony of beneficial bacteria they can vary a lot in design and efficiency. In addition to the differences in the media there are also differences in the overall design meaning some are

better than others. Most filters are simple up flow or down flow designs. This means that the water enters the bottom of the container and flows up through the media then out to the pond or the water enters the top of the container and flows down through the media leaving the bottom of the filter. You will also see designs that use different types of media with the water flowing in one end and traveling across the filter container and existing at the other end. One design is about as good as the other as far as directional flow is concerned. One improvement that will help with any filter design is a device to aerate the water in the filter. Bacteria need lots of oxygen to break down their food source to improve the water quality and help eliminate the algae. One design is an aeration tower. Basically the water enters a pipe under some pressure just above the water level and mixes with the air before entering the filter media chamber. This provides more oxygen in the water allowing the bacteria to do a better job for us. Make sure that you have good aeration in the pond as well. A waterfall usually does a good job of this.

Another filter type is a pressurized filter. Basically this is a canister (some look like swimming pool filters but are vastly different) containing a small plastic media that functions as a mechanical as well as a biological filter. While this type of filter works well it comes at a much higher price. The advantage of this filter is that it can be installed remotely from the pond, which is a benefit when you don't have extra space around the pond to install a filter. This type of filter is closed and under the same pressure that is inside the pipe going from the pump back to the pond. Another advantage is that it is very easy to clean, just open a valve. The disadvantage, other than the higher cost, is that it should be cleaned weekly in most cases. If this filter is not cleaned regularly then the media can clog meaning you must dismantle the filter and manually clean the filter, which is a chore.

Ultraviolet Sterilization is considered a type of filtration although it should be considered an adjunct to filtration to help with algae control. We have discussed UVs in the past and will do so again in the future.

#### 2004 Programs

- Aug 18 Bring birds into your backyard Paul Willis, Master Gardener/Audubon Society
- Sept. 15 Closing your pond Eric Wood, Puddles-N-Pads
- Oct. 20 Different types of plants for your yard Pat Rokey, Master Gardener

Nov. 17 – Pot Luck Supper – no speaker



#### Member Pond Tour Map – 1:30 p.m., Sunday, August 15, 2004

Pond 1 - Janet Nyfeler – 3228 SW Arnold Ave., 271-9460

Directions: From Gage Blvd - go east on SW 29<sup>th</sup> (DQ) to Arnold Ave. Turn south on Arnold to SW 33<sup>rd</sup> and turn east (left). It is on the corner of 33<sup>rd</sup> and Arnold.

Pond 2 – Doug & Marikay Peterman – 7225 SW Marian RD, 478-1988

Directions from Pond One -1: Go back to SW 29<sup>th</sup> and travel west on 29<sup>th</sup> on past Urish (roundabout) to Ancaster and turn north (right). Ancaster becomes Marian RD.

Pond 3 – Jon & Mary Pat Fischer – 2740 SW Staffordshire RD, 272-1274

From Petermans, continue around curve to SW 29<sup>th</sup> and go east to Urish Road. Travel north on Urish Road to 28<sup>th</sup>, turn east (right). Travel east to Staffordshire RD and turn north (left).

Pond 4 – Mary & Tom Blubaugh – 2518 SW Arrowhead RD, 228-1003

Leaving Pond 3 go north on Staffordshire (it jogs east on 27<sup>th</sup>) to SW 25<sup>th</sup>. Go east on 25<sup>th</sup> across Wanemaker to Arrowhead Road. Turn south on Arrowhead Road. It's the 3<sup>rd</sup> house on the left after turning onto Arrowhead.

**Pond 5** – Donnis and Gerald Hodges – 4600 NE Kendall Wood DR, 246-0496

Leaving Pond 4, continue south on Arrowhead to 29th. Turn east (left) on 29<sup>th</sup> and then north on 470 to I-70 to Hwy 75. Cross the river and continue north to NE 46<sup>th</sup> Street. Turn east (right) at the roundabout and continue across Topeka Blvd. to Kendall Wood DRIVE (not Lane). Turn left - House on the east side of Kendall Wood Drive and NE 46<sup>th</sup>.

Pond 6 – Duane & Mary Eberhardt – 6023 NE Meriden, 246-0240

From Hodges, return to 46<sup>th</sup> and go east to Meriden Rd and go north.

Pond 7 – Stan & Mary Ann Bechtold – 3417 SE Shorewood DR, 267-1611

From Eberhardts, go back south to 46<sup>th</sup> and go east (left) to Highway 4. Go south across the Oakland Expressway bridge and get on I-70 West to California St. Take California south to 37<sup>th</sup> and turn east (left). Turn north onto Lakeshore Blvd. Turn left (west) on Shorewood Drive.

Pond 8 – Larry & Barb Shipman – 3030 SE Paulen RD, 379-9526

From Bechtolds, Continue north on Shorewood Drive to Crest Water Drive – turn right and go to Lake Shore Blvd and turn left. Go north on West Edge Road to 29<sup>th</sup> St. Turn east (right) on 29<sup>th</sup> to Paulen Road (big church). Turn south (right) on Paulen road – it is about one block south.

Pond 9 – Barrie & Carol Gnagy – 6644 SE 53<sup>rd</sup>, Tecumseh, 379-9437

Continue south on Paulen Road to 53<sup>rd</sup> and turn east (left) on 53<sup>rd</sup> about 3 miles. **Bring a pot luck dish, your table service and chairs or blankets to sit on. Hope to see you there.** 

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

#### **Calendar of Events**

Aug. 15 –	Member Pond Tour
Aug. 18	TAWGS Monthly Meeting
Sept. 15	TAWGS Monthly Meeting
Oct. 20	TAWGS Monthly Meeting
Nov.17	TAWGS Pot Luck Supper

#### **Pond Tour Survey**

# Please give Mary Bechtold or Diane Gruver your comments about the Pond Tour.

Do you think the tour should be held the last of June when there are several conflicts or in July when it is so hot – remember the pond hosts and volunteers have to stand out in it all day long.

Where did you see/hear any pond tour ads?

Topeka Capitol Journal

WIBW TV Channel 13 \_\_\_\_\_

Channel 27 \_\_\_\_\_

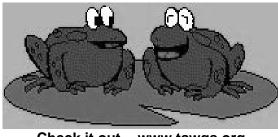
Radio \_\_\_\_\_

Your Dues are Due if your label reads 7-04 or 8-04 (or anything prior to 7-04)

Please renew as soon as possible to continue receiving the newsletter.

#### THE TOPEKA AREA WATER GARDEN SOCIETY OFFICERS:

Tom Platis Topeka Becky Coffman Topeka Diane Gruver Holton Jim Green Topeka President 785-478-9514 Vice President 785-272-6568 Secretary 785-364-3046 Treasurer 785-272-7139



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:

Diane Gruver, The Lily Pad Editor 408 Emerald, Holton, KS 66436 785 364-3046 fdgruver@earthlink.net

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