

LOWER ST. JOHNS RIVER TECHNICAL ADVISORY COMMITTEE MEETING
Jacksonville University – Marine Science Research Institute
2800 University Boulevard North, Jacksonville, FL 32211
June 26, 2014

Participants

Katie Bizub, JEA	Don Jacobovitz, Putnam County
Steve Bratos, USACE	Xiaohai Lin, Taylor Engineering
Russ Brodie, FWC	Pam Livingston Way, SJRWMD
Robert Burks, SJRWMD	Andrew LoSchiavo, USACE
Tiffany Busby, Wildwood Consulting	Mark Middlebrook, St. Johns River Alliance
Ed Cordova, JEA	Anita Nash, FDEP
Barry Cotter, COJ	Megan Nicholson, FDEP
Alexis Crouch, Woods Hole Group	Marcy Policastro, Wildwood Consulting
Betsy Deuerling, COJ	Tom Rauth, COJ
Anthony DiGirolamo, FWC	James Richardson, COJ
Mike Getchell, JMTX	Lisa Rinaman, St. Johns Riverkeeper
Clinton Hare, Woods Hole Group	Scott Schultz, Green Cove Springs
Collin Hayes, SJRWMD	Charles Sohm, Clay County Utility Authority
John Hendrickson, SJRWMD	Lucy Sonnenberg, JU
Mike Hollingsworth, USACE	Paul Stodola, USACE

Welcome and Introductions

Lucy Sonnenberg welcomed everyone to the Lower St. Johns River (LSJR) Technical Advisory Committee (TAC), and thanked them for coming to the Jacksonville University (JU) Marine Science Research Institute. The participants introduced themselves and the entity they represent. Tiffany Busby noted that the theme of the meeting is monitoring, and the speakers will discuss new monitoring efforts for the LSJR Basin.

The New LSJR National Oceanic and Atmospheric Administration (NOAA) Physical Oceanographic Real-Time System (PORTS) Monitoring System

Mike Getchell stated that the Jacksonville Marine Transportation Exchange has been trying to obtain PORTS for Jacksonville for several years, but they were unable to fund the system until they received a port security grant. They received the grant by explaining how the data could be used after a natural or manmade disaster. Mike introduced Clint Hare who is with the Woods Hole Group, which is the firm that won the bid to design, install, and maintain the system. The Jacksonville PORTS is the second largest system in the nation after the Chesapeake.

PORTS got its start in 1980 after the ship *Summit Venture* hit the Sunshine Skyway Bridge in Tampa, and 35 people died. This accident was the impetus to create PORTS, and Tampa was the first place to have this system. All captains want real-time data, especially now with larger vessels having to navigate in channels with much less clearance. PORTS is a NOAA program that provides active real-time data for safety, efficiency of maritime commerce, and environmental protection and planning assistance. PORTS is used for recreational planning assistance, improved forecasts, and scientific and educational information since it is free to the general public. PORTS is a partnership between NOAA and the local maritime community. NOAA provides program management, data collection infrastructure, data

dissemination, and quality assurance/quality control (QA/QC). The partner selects the sites for the sensors and provides the funding for the equipment and annual operations and maintenance. In the Jacksonville area, the Jacksonville Marine Transportation Exchange is the owner of the equipment, not NOAA.

PORTS provides real time information on predicted and observed water levels, meteorological information (wind speed and direction, barometric pressure, and air temperature), currents, water density, salinity, and temperature. There was previously a geographic gap in the system between Tampa and the Chesapeake that the Jacksonville PORTS filled. The Jacksonville PORTS instruments include water levels, currents, conductivity, air gap, wind, and barometer/air temperature. The data from the system can be provided in either text or graphical form.

A current meter is typically bottom-mounted; however, this would not work in Jacksonville with the big ships coming into the channel. There would also be issues with keeping the sensor clean given the tannic water and silt in the river. Instead, aton-mounted meters on channel markers, which extend ten feet down into the water, are used to track currents. There are also side-looking current meters on the Acosta and Dames Point bridges, which measure water currents across the channel. They are mounted on a sled so they can be pulled out of the water to be maintained. As part of the system, there are several salinity sensors, including one on a dock near JU. There is an air gap sensor on the Dames Point Bridge to assess the clearance between the bridge and the top of the ships travelling under the bridge. There are also three visibility sensors mounted in areas that have the most fog.

Information from the system gets to NOAA through several pathways including the Geostationary Operational Environmental Satellite (GOES), line-of-site radios, and Internet Protocol (IP) modems. NOAA has a 24/7 operational center to QA/QC the data. Mike noted that NOAA wanted to put together information on the cost benefits to having PORTS. They used information for the Tampa Bay and Houston/Galveston systems for this evaluation. Tampa reported a maritime benefit of \$3.3-\$5.7 million, and Houston/Galveston reported a maritime benefit of \$11.9-\$13.9 million. The total benefit, including improved weather forecasts and recreational use, was \$6.8-\$9.2 million in Tampa and \$14.8-\$18.3 million in Houston/Galveston. Clint stated that Tampa also said that the system helped to prevent nine out of ten accidents.

Mike stated that the Jacksonville PORTS webpage was launched on April 7, 2014 (<http://tidesandcurrents.noaa.gov/ports/index.html?port=jx>). The data will also be available through the PORTS voice system, which is currently being renovated. It will be ready in July 2014, and Jacksonville will receive a phone number at that point. Data can be accessed using PORTS graphics, which outputs the data in graphs through the webpage. There is also an automated, real-time narrative summary that provides the data as text. The data can also be accessed using a smart phone. PORTS data are available through the Coast Guard's Automatic Identification System (AIS), which puts the data in front of captains. In addition, the data are available through the electronic charts system.

The Jacksonville PORTS covers 67 miles of the river from the mouth. The heart of the system is on Blount Island. There is a sensor on the Buckman Bridge. Mike noted that they had a difficult time finding a spot south of the bridge to add to the system until Clay County provided access to their pier to add a sensor. The system ends upstream with a sensor at Racy Point.

Katie Bizub asked how far back data are available. Clint responded that data probably cannot be accessed before the April webpage release. NOAA takes several months to evaluate the data. The system has been installed since November 2013. Mike added that they had to spend the grant money to install the system by November 2013, which gave the Woods Hole Group about 2.5 months to install the system, and they were able to get it in. Paul Stodola asked how many salinity gages are included in the system. Clint responded that there are six salinity sensors that are all within the main stem of the river, and they extend to Racy Point. The sensors collect data and provide an average over six minutes. Paul asked what the experience was with obtaining permission to place the gages in different locations. Mike responded that it was sometimes difficult. When they wanted to add a sensor in Palatka, they learned that the Florida Department of Environmental Protection (FDEP) previously had a gage at the Quality Inn. When they asked if they could use this same location, the new owner wanted to be paid, and also wanted help with negotiating with FDEP on their submerged lands lease, so that location was not pursued further.

John Hendrickson asked if an agency wants to partner and provide funding, if another sensor could be added to one of the locations. It would be helpful to have a dissolved oxygen (DO) sensor in downtown Jacksonville. Clint responded that NOAA is considering adding DO sensors, but it is tricky because of the maintenance that will be needed. NOAA is responsible for the QA/QC of the data so they would have to approve adding the DO sensor. If there is a need and funding is available, the system could be expanded. Anita Nash asked if the data are available over ship-to-shore radio. Mike responded that the maritime industry has moved away from voice, especially for navigation into a channel. The data are provided through AIS.

Jacksonville Harbor Deepening Study: Effects Assessment Overview, Monitoring and Correction Action Plan

Paul noted that a few weeks ago, President Obama signed the Water Resources Reform Development Act (WRRDA), which was almost unanimously approved by both the House and Senate. The Jacksonville Harbor deepening was included in this WRRDA bill. The deepening will be from the mouth of the river to river mile 13. The project also includes two areas that will be widened, and two new turning basins. All the dredged material will be placed in the ocean disposal site. The U.S. Army Corps of Engineers (USACE) is currently testing the material to ensure it can be disposed of at the ocean site. If there is any contaminated material, it will be disposed of on an uplands site.

Paul stated that USACE has run several environmental models. The Environmental Fluid Dynamics Code (EFDC) model was used to assess salinity in the main stem of the river, and there was also ecological modeling for the main stem. The MIKE21 model was used to assess salinity in the tributaries. There was also modeling to determine the water level effect on the salt marsh, and water quality monitoring. USACE spent a lot of time determining how the deepening would affect salinity, and they found very minor impacts. At the Dames Point Bridge, the modeling predicts a decrease in salinity of 0.1 parts per thousand (ppt). At the Acosta Bridge, salinity is estimated to increase by 0.2 ppt. There were not as many salinity data for the tributaries, so only one simulation year was used in MIKE21. This was a dry year so the results represent an unfavorable scenario; however, the changes are still very small. USACE also looked at the change in salinity from sea level changes. At the Buckman Bridge, the median salinity is 2 ppt with an estimated salinity of 2.05 ppt with the project. The salinity under the low sea level rise scenario is 2.9 ppt, and it would be 3.0 ppt with the project. Therefore, most of the salinity changes in the river will be from sea level rise with only minor impacts from the project.

USACE used the ecological models to determine how these small changes in salinity from the project would affect biology. For eelgrass, there was only up to a 3% increase in stress, which is a minor effect, and no beds would be lost. USACE also evaluated the impacts on wetlands, especially related to the high tide salinity. They set a threshold of pushing any of the model cells beyond 1 ppt during high tide, and the model did not show any times that the salinity would be beyond this threshold. They also looked at fisheries and salinity based habitat in conjunction with the Florida Fish and Wildlife Conservation Commission (FWC). They found that there would only be a small loss of habitat.

The project will include environmental monitoring. USACE will collect information for five to ten years prior to construction to establish a baseline. They will continue to monitor during construction (four to six years), and also monitor for five to ten years post construction. The monitoring network includes the existing U.S. Geological Survey (USGS) and PORTS stations, and USACE is proposing to add a few river and tributaries stations. Paul noted that there is a lot of overlap in the proposed monitoring at the Dames Point and Buckman bridges. However, if the PORTS and USGS gages at these locations are still functioning, USACE would consider moving their gage locations. The USACE stations would be used to augment the existing stations and would collect surface and bottom salinity and DO. The tributaries stations would include tidal water level and flow gages. They are also proposing to monitor eelgrass starting at the Bolles School south to Scratch Ankle. USACE is planning to set up these stations in locations where the St. Johns River Water Management District (SJRWMD) had stations in the past to compare the new data to the historical data. There are also several proposed wetland monitoring stations that will be sampled bi-annually. USACE is also proposing fisheries monitoring to gather more data about fisheries in the tributaries.

Paul noted that USACE has a corrective action plan (CAP) in case the monitoring results show effects above and beyond what was predicted by the modeling. The CAP will set thresholds for different parameters, and if those thresholds are surpassed, USACE will take corrective actions and determine mitigation. USACE will also conduct post-construction modeling to try and determine what is causing the observed changes to evaluate the cumulative effects of different aspects in the river. The primary trigger for CAP action would be based on the salinity threshold. Field data collected on submerged aquatic vegetation, wetlands, fish, and shrimp would be used to supplement salinity data.

The final project report is available online at <http://www.saj.usace.army.mil/Missions/CivilWorks/Navigation/NavigationProjects/JacksonvilleHarborChannelDeepeningStudy.aspx>. The Chief of Engineers Report for the project was signed in April 2014, and WRRDA was signed in June 2014. The Office of Management and Budget is reviewing the proposed budget, and should be done in August 2014. The Assistant Secretary of the Army is also reviewing the report, and will transmit it to Congress in September 2014. The project is just entering the Preconstruction Engineering and Design (PED) phase, and USACE received funds from JAXPORT for this phase. PED will continue through September 2015. The kickoff meeting for the PED phase is next week. The construction phase of the project is subject to appropriations, but it should occur sometime between 2016 and 2022. During the PED phase, detailed plans and specifications will be prepared. Concurrently with the PED phase is the permitting phase for water quality certification. Mike Hollingsworth is the lead on the permitting phase, and he has scheduled the application scoping meeting in July. The current estimate is that the application will be submitted in spring 2015. The CAP also overlaps with the PED phase, and USACE will coordinate with the agencies on appropriate thresholds.

The goal was to complete the final thresholds in September 2014; however, it is more probable that the final thresholds will be established in 2015.

Mike Getchell noted that the project widener at St. Johns Bluff will bring the channel back to its original alignment. Paul responded that this is correct. He noted that the Mile Point project was also included in WRRDA, which will remove the training wall in that area to make the confluence more like it was before the wall was added. Anita stated that there have been major local efforts related to the basin management action plans (BMAPs) in the main stem of the river and the tributaries. She asked if USACE conducted any modeling on the potential impact for suspension of materials into the water column. Mike Hollingsworth responded that the modeling did look at this, and they do not anticipate any impacts on the tributaries or main stem. This will be further addressed as part of the permitting phase. Anita noted that after a large rainfall event, they have found an increase in bacteria in the tributaries from sediment stirring. There are monitoring stations at the mouths of the tributaries so these stations may indicate a change from the dredging. Mike responded that this was included in the modeling.

Charles Sohm asked why 47 feet was selected as the project depth. Paul responded that USACE found that 45 feet was the most cost effective depth; however, JAXPORT was willing to pay for the additional depth. Mike Getchell added that JAXPORT wanted 47 feet because the larger vessels have about 45-46 feet of draft when they are fully loaded. John asked if the 47 foot depth is at mean sea level. Steve Bratos responded that the 47 foot project depth is referenced to the Mean Lower-Low Water (MLLW) datum.

Lisa Rinaman stated that in the original draft report, there was a monitoring plan but no triggers for corrective action. She was told that the triggers would be established during the pre-construction, engineering and design (PED) phase. She asked if the modeling will help to determine the cause of the change. Steve responded that the post-construction model will be built on the existing model; however, USACE has not started this yet. The goal is to include the tributaries and main stem of the river in the model. They would like to include a ten-year baseline period, and use a three-dimensional hydrodynamic model. Depending on the model results, USACE will be able to evaluate the impact. Lisa asked if the public will have an opportunity to review and discuss the model during development. Paul responded that the CAP meetings are interagency meetings that will be open to the public to listen to the discussions and provide comments. It has recently been decided that the USACE would continue to hold project meetings that will include public participation. The project will also go through the permitting phase, and the public will have the opportunity to provide comments at that time, as well. Lisa asked once the triggers are developed, if action will be taken if the thresholds are exceeded. Paul responded that USACE will take action if the monitoring shows that there are exceedances of the predicted impacts.

LSJR Tributaries 2014 Intensive Bacteria Assessment

Anita stated that FDEP does an assessment of all the waters in the state over a five-year cycle. Many of the tributaries in Jacksonville are impaired for fecal coliforms, and once a waterbody is identified as impaired, FDEP sets a total maximum daily load (TMDL) to show the maximum capacity of the waterbody for that parameter to meet its classification. FDEP can then adopt a BMAP as a restoration plan to meet the TMDL. FDEP tries to create a BMAP that suits the needs of each area. In the LSJR

Basin, there are two tributary BMAPs that have been adopted. The first BMAP covers ten tributaries and the second covers 15 tributaries. These BMAPs were developed for a period of five years, and then they will be reassessed for what needs to be done in the next five years. This December is the end of the period for BMAP I; therefore, FDEP and the stakeholders are trying to figure out what needs to be done for the next five years. The stakeholders in this area have already developed better programs for maintenance and inspections to help address bacteria in these tributaries.

Anita presented a table of the progress made to date in each of the BMAP tributaries using the last five years of data, which include four years of data collected with the BMAP in place. Most of the tributaries in BMAP I have been improving. However, the state standard is a very low fecal coliform count, which has not been achieved in any of the BMAP I tributaries. In BMAP II, there have been some large reductions in fecal coliforms, and some of the tributaries might be meeting standards. FDEP's assessment group will be providing information this year on whether any of the tributaries are meeting the fecal coliform standard.

Betsy Deuerling stated that when the stakeholders are in the field looking for fecal coliform sources, they look for old sewage treatment plants (there are only a few left), neighborhoods with old sewer lines, lift station leaks, septic tanks, animal waste, stormwater runoff that can carry bacteria off the land, and ideal breeding grounds for bacteria (slow water with shady conditions). Anita noted that they are trying to explain the impairment. Although not all of these sources can be addressed, they try to document everything that is happening within the watershed that could be contributing to the impairment. Betsy stated that they try to eliminate all of the human sources. If the numbers are still high, it helps to have information on the natural sources.

Anita stated that the stakeholders have recently been going through the "Walk the Waterbody" process, which includes a maps on the table evaluation and field investigations. They are also collecting samples for source identification. The results of these efforts will be used to determine how to move forward in these tributaries. Betsy added that the stakeholders have been recently working on the first ten tributaries. All the applicable agencies are involved in this process including FDEP, JEA (for sewers), Florida Department of Health (for septic tanks), Florida Department of Agriculture and Consumer Services (if there are any farms), and the City of Jacksonville (COJ) (for monitoring, stormwater, and illicit discharges).

Anita noted that the people who attend the maps on the table and field investigations are a mix of supervisors and staff who are out in the field and have a lot of local knowledge. Walk the Waterbody is a collaborative effort among all entities with jurisdictional authority in the watershed. For the maps on the table evaluation, large format maps are printed out and the entities come together to look at the maps and brainstorm about what is happening in each watershed. The entities mark up the maps and take notes on potential sources, and this information is used to determine a plan for going into the field. Once in the field, they try to drive all streets in the watershed, and stop to look at places based on the notes. They also try to look at the streams but access to the streams in Jacksonville is somewhat limited. To help with this issue, COJ staff have gone out and inspected the ditches in the watersheds before the field investigations.

Anita stated that some of the recent observations of potential sources include dog waste, geese and Muscovy ducks, rotting material behind dumpsters, and grease at restaurants. Betsy presented pictures

of some of the potential sources they found during the investigations. There are a lot of ducks and geese in ponds, and this information helps to explain where the high fecal coliform numbers might be coming from in a watershed. They walk the ditches in each watershed to look for anything suspect. It is important to have the right people in the field to take action, as needed. In addition to looking for common sources, they also look for homeless camps or used diapers behind a daycare center. They also look for grease at restaurants because it can clog sewer lines causing overflow, and JEA has a great program to help address this problem. Grease itself can also be a breeding ground for bacteria if it gets into the stormwater system. Trash can also create a breeding ground for bacteria. They also check to make sure that stormwater structures are functioning, and evaluate underground sources.

Anita noted that they also use source identification sampling. The FDEP laboratory has several new tools to help with this. They have quantitative polymerase chain reaction (qPCR) that uses deoxyribonucleic acid (DNA) for human Bacteriodales to determine if a human source is present. The laboratory also uses propidium monoazite, which separates live cell DNA from dead cell DNA to help determine what the current sources of the bacteria might be in that area. FDEP also uses sucralose, which is mainly excreted by humans and can be found in raw or treated sewage. If sucralose is present, then it is known that there is a human source, but it does not provide information on whether the sucralose is from reclaimed water or raw sewage. Therefore, FDEP added a test for acetaminophen to make this distinction because this compound does not persist through the wastewater treatment process. There are other parameters available for bacteria that are not currently being used. In the future, FDEP will be adding markers for other sources such as canines, cattle, and waterfowl.

Anita stated that the monitoring strategy for the tributaries is based on a waterbody identification (WBID) number-wide sampling. A WBID is a segment of a waterbody, as delineated by FDEP. Each of the WBIDs in BMAP I were divided into subbasins, and samples are collected during different conditions including high water table, low water table, and transition from dry to wet. Anita presented an example of the sampling results from Hogan Creek. The sampling occurred in December, January, and May. The first two sampling events were WBID-wide, and used qPCR and sucralose. The downstream sample sites had a presence of sucralose, as well as high fecal coliform counts and positive human qPCR results. The sampling results for the upstream sites were even higher, with the highest results at the headwaters. The sampling point at the headwaters has a culvert that comes from underground and ditches from two different directions. To determine the potential source, they conducted more targeted sampling in May to evaluate the culvert and ditches. One ditch was dry during the sample event, but the other ditch and culvert had high sample results. They will go out and collect more samples to try and find a source.

Tiffany asked how many of these assessments have been conducted. Betsy responded that they have completed the field investigations for eight of the ten tributaries. Charles asked if this evaluation will be done for the tributaries in Clay County. Anita responded that if Charles has a specific tributary in mind, he can contact her about conducting this investigation. Ed Cordova asked if there are other BMAPs that have reached the five-year mark. Anita responded that there are a few fecal coliform BMAPs that have reached this mark. The Orange Creek BMAP is currently being updated, and the Hillsborough River BMAP update will be done this year. The Hillsborough River WBIDs are close to meeting the criteria but they are not sure if there are enough data to delist the impairment. Long Branch in the Middle St. Johns River Basin is meeting the criteria. Lucy asked what would occur in the next five years if the assessment reaches a point where all the potential sources have been evaluated and there is no “smoking

gun” that is the source of the problem. Anita responded that this is where improvements in the maintenance programs can be identified based on what is found during the walks. John asked if these tools could be used to identify human sources to determine if a waterbody should be listed as impaired. Anita responded that they are focusing on addressing human sources but the waters have to meet state standards. The current standard is for fecal coliforms but FDEP has a process underway to change the standard.

Technical Updates and Announcements

SJRWMD

John stated that SJRWMD is working on developing alternative best management practices (BMPs) for agricultural areas, and modifying the existing regional stormwater treatment (RST) facilities. Pam Livingston Way added that St. Johns County is working on the RST facility redesign to make improvements to increase the volume of water going into the project, provide more storage, and reconfigure the wetland to stop the current short-circuiting of the wetland. These modifications were just started and will take about a year to complete. The monitoring at the RST has been suspended until the changes have been made, and then it will be set up again. Pam noted that they also have a lot of projects going on with the agricultural farms. SJRWMD will review applications in July for new projects, and they hope to have these projects in the ground this fall. Pam offered to present on these projects at a future TAC meeting.

John noted that SJRWMD also received funding for some additional monitoring. Robert Burks stated that they added a new sensor on the Shands Pier with probes for chlorophyll-*a*, nitrates, and cyanobacteria. The data are available online. SJRWMD is also planning to add sampling to evaluate orthophosphate in that area. SJRWMD plans to add similar monitoring stations throughout the river. John stated that they have seen some algal bloom activity near Crescent Lake, but it is not bad especially considering the recent level of rainfall. SJRWMD is working with NOAA on a manuscript for the Medium Resolution Imaging Spectrometer (MERIS) sensor, which is on the ENVISAT satellite, for use in tracking algal blooms. The data from the satellite will be available soon.

John noted that SJRWMD is finishing their budget for the upcoming fiscal year, and there are sufficient funds to keep the budget as is. Part of the funding is for TAC facilitation, and the current contract ends in September. SJRWMD will be releasing a solicitation for a new contract so there may be a gap in the meetings after the next meeting in September.

USACE

Mike Hollingsworth stated that the CAP modeling and monitoring builds on what the TAC members have been doing in the LSJR Basin. This project has the largest modeling effort for any USACE navigational project because of all the efforts that have already been done here. Mike stated that USACE appreciates all of the TAC members’ input, advice, and data. They will be setting up interagency work groups for the CAP and will need the TAC’s help. The Mile Point project was authorized in WRDA, and USACE has funding from the State of Florida to go to construction. USACE is starting the pre-construction process now, and construction will begin in late 2015.

COJ

Betsy stated that the new Chief for COJ’s Environmental Quality Division is Melissa Long who came from FDEP. COJ is continuing with their monitoring and has been participating in the Walk the

Waterbody efforts. They also started the shellfish area monitoring, which will be completed in about six months. Betsy offered to provide a report on the results at a future meeting. James Richardson stated that the Environmental Protection Board is soliciting nominations for their annual awards, and Tiffany sent that information to the TAC distribution list. The deadline for nominations is July 3rd. The details on registration for the annual symposium will be sent out soon. The symposium will be held on August 15th at the University of North Florida. One of the presentations will include more details about the qPCR results.

Fisheries Independent Monitoring

Russ Brodie stated that FWC's monthly monitoring is continuing. He sent Tiffany the Fisheries Independent Monitoring annual report for 2013, which includes data throughout the state, and the report is on the TAC website. FWC will complete the cooperative research grant for spawning of grouper and red snapper in about a month. They will have another offshore grant that will then start to evaluate juvenile red snapper through trawling operations. FWC is also working with Steve Miller (SJRWMD) to update the report on the impacts of minimum flows on different species under different flow regimes. The latest data will be added to the report, and the update will be complete in September.

St. Johns River Alliance

Mark Middlebrook stated that the St. Johns River Alliance announced last week that they will hold three water academies next year, which are designed mainly for elected officials to educate them about water issues. The timing of each of the academies is set after various elections. One academy will be held in north Florida and the other two will be in central Florida. Once the venues have been determined, the Alliance will start soliciting ideas for faculty to get the program going. The academies will have a St. Johns River focus, but if this works, the idea will likely go statewide in the near future. The goal is to get the best information to decision makers who have to make tough decisions about water. The next legislative session is when most of the issues on water will be coming up.

The Alliance will also be asking the 13 counties along the river to set target per capita water consumption rates. It is not easy to set these targets, so the Alliance will be putting out a call for utility directors and managers to help work through these issues. In addition, the St. Johns River is now the longest state designated blueway. The Alliance has a small grant to gather information on access points to the river for the entire 310-mile stretch. This information will be published in a guidebook, online, and eventually in a smart phone application.

Next Meeting Date

Tiffany stated that the next meeting will be towards the end of September. Ideas for future meetings can be sent to Tiffany. Members can also send Tiffany information they want emailed to the distribution list.

Lucy thanked everyone for their review of the St. Johns River Report. The proofs of the report have been prepared, and the final report will be completed soon.

Adjourn

The meeting was adjourned at 11:56 AM.