



The BFA July 2016 NEWSLETTER

Hope Everyone is Enjoying their Summer; Staying Cool & Hydrated!

Please mark your calendar for the next General Membership Meeting

Wednesday, 3 August 2016

This will be an Eating Meeting with a Guest Speaker! Doors open at 5:30 PM. Dinner will be served at 6:00 PM. Dinner will consist of a fish fry, baked beans, coleslaw and hushpuppies. Vegan options for our vegan friends will also be available.

Cost \$10.00*/person (*Please note the slight price increase)
1615 East LaRua Street, Pensacola

Please join us in welcoming Matthew Deitch, PhD, the new Assistant Professor in Watershed Management at the UF Campus in Milton, FL.

After completing a PhD and post-doc at the University of California, Berkeley in 2008, Matthew directed a hydrology program for a nonprofit environmental science firm where he partnered with regulatory agencies and agricultural producers to create water management practices to meet agricultural needs and maintain environmental habitats and ecosystem services. His research interests include water management at reach- and catchment-scales and cumulative effects of small spatially distributed water projects on stream flow, as well as how science can inform policy to advance sustainable water resource management. His research has been used to develop new policies and practices to improve aquatic ecosystem sustainability in California.

A Message from the Bream Fishermen Association President....

What do you suppose will be the straw that breaks the camel's back? I'm not talking about international terrorism or the home grown variety of terrorism, nor racial issues, sports scandals, the non-stop antagonism between the very non-presidential candidates, the believers/non-believers of climate change or car companies who earned our trust and led us to believe that their products had lower mileage and emissions than their competitors just to sell more product; Nope, I'm talking about our total disregard for our natural resources – with an emphasis on water quality. Didn't we learn anything from the 2010 oil spill? Our economy is 100% connected to the state of our environment. A healthy environment = healthy community = healthy economy. I can't think of anyone who chooses to live in an unhealthy environment. Some very bad decisions are being made by some elected officials, decision makers, and even some state and federal agencies (many of which are charged with guardianship of our landscape and natural resources) without any understanding or knowledge of the complexity of the natural ecosystems or the potential impacts these decisions will have on an already stressed system.

Here are some examples:

- Flint River- Flint, Michigan, lies about 70 miles from the shores of the largest group of fresh water bodies in the world: the Great Lakes. Nearly two years ago, the state decided to save money by switching Flint's water supply from Lake Huron (which they were paying the city of Detroit for), to the Flint River, a notorious tributary that runs through town known to locals for its filth. The switch was made during a financial state of emergency for the ever-struggling industrial town. It was supposed to be temporary while a new state-run supply line to Lake Huron was ready for connection. The project was estimated to take about two years. (<http://www.cnn.com/2016/01/11/health/toxic-tap-water-flint-michigan/>)
The corrosive Flint River water caused lead from aging pipes to leach into the water supply, causing extremely elevated levels of the heavy metal. In Flint, between 6,000 and 12,000 children have been exposed to drinking water with high levels of lead and they may experience a range of serious health problems. Due to the change in water source, the percentage of Flint children with elevated blood-lead levels may have risen from about 2.5% in 2013 to as much as 5% in 2015. (https://en.wikipedia.org/wiki/Flint_water_crisis)
Lead exposure across the U.S. has fallen dramatically since the 1980s; however, no blood-lead level is considered completely safe. Children under age five, and especially infants and unborn children, bear the greatest risk of deleterious and irreversible health outcomes.
- Florida Bay - Years of flood control on top of a prolonged drought wilted the bay over the summer, making already hot water twice as salty as it should be. When scientists hustled out to investigate last month, they found miles of dead seagrass: up to six square miles in Rankin Bight and seven square miles in meadows around Johnson Key, a flat once famed for redfish and snook. A cloud of sulfur had spread in water just off the Flamingo Visitor Center, leaving behind a stinky stain scientists call "yellow fog." It may cover 25 square miles already. Seagrass scientists who began monitoring the bay in 1995 after the unprecedented bloom threatened to derail the region's \$723 million fishing industry are just as worried. (<http://www.miamiherald.com/news/local/environment/article37583577.html#storylink=cpy>)
Since this newsletter was begun, last week, a recent update suggests upwards of 62 square miles of seagrasses have died and more are expected. As feared by biologists, the breakdown of the basis of the food web may have begun. Can this cascade be slowed or stopped? We'll see... (<http://www.miamiherald.com/news/local/environment/article84368737.html>)

To put this into perspective, multi federal and state agencies have been trying for years to decide which approach to addressing years of impacts, assaults, and pollution would garner the most 'Bang for the Buck' – using the BP Clean Water Act Penalty Money. No decisions have yet been made despite a process sold to the public as transparent and inclusive.

Unlike Florida's other troubled South Florida Waters — the St. Lucie and Caloosahatchee estuaries muddied by water releases from Lake Okeechobee over the winter and spring— Florida Bay and its network of two dozen basins present a far more intractable problem. Once conditions worsen, it can take decades for things to get right again.

What will be the wake-up call that moves us into action? In Melbourne, FL, eight manatees have died in the past six weeks. Veterinarians have confirmed the deaths are due to polluted waters and algal blooms due to nutrient loading. Autopsies revealed that the manatee's main diet of seagrasses wasn't found in their stomach content; rather it was mats of algae. Scientists speculate that when the algal blooms occurred the seagrasses began to die off due to turbidity (water cloudiness), impairing sunlight to penetrate the seagrasses. The hungry manatees switched their diet to supply their hunger.

News of toxic blue-green algae fouling waterways on the Treasure Coast has gained more widespread attention. Specifically, the news of nutrient laden water entering our eastern and western coastal estuaries has gained NATIONAL ATTENTION. As this ecological tragedy continues, the burning questions remain: What caused the algae to form? What can prevent it from happening again? Blooms appear to be growing, but how much? Is it safe to hold more water in Lake Okeechobee? By now, many people have seen the startling satellite image of the algae blooms on Lake Okeechobee. How did a world class fishery and Important Bird Area turn so green that the color can be seen from space? (<https://mail.google.com/mail/u/0/#inbox/155ccddc3316a8b0>)

Since early 2016, a massive bloom of blue-green algae has hit four southern Florida counties, blanketing beaches in foul-smelling muck and raising health and environmental concerns. The green goo along Florida's "Treasure Coast" prompted Gov. Rick Scott to declare a state of emergency in Martin and St. Lucie counties earlier this week, and he later added Lee and Palm Beach counties. Scott "blamed the federal government for neglecting repairs to the lake's aging dike that's considered one of the country's most at-risk for imminent failure," as The Associated Press reported. (<http://www.npr.org/sections/thetwo-way/2016/07/02/484477038/thick-putrid-algae-bloom-overwhelms-miles-of-florida-coastline>)

While Gov. Rick Scott may want to blame the federal agencies, the Gov of Florida take a good long look in the mirror to see whom he should be blaming for this catastrophe. On 4 Nov 2014, 75% of the FL Citizens who bothered to vote - voted to approve the **Florida Water and Land Conservation Initiative, also known as Amendment 1**. The measure was designed to dedicate 33 percent of net revenue from the existing excise tax on documents to the Land Acquisition Trust Fund.

The [Land Acquisition Trust Fund](#) was developed to acquire and improve conservation easements, wildlife management areas, wetlands, forests, fish and wildlife habitats, beaches and shores, recreational trails and parks, urban open space, rural landscapes, working farms and ranches, historical and geological sites, lands protecting water and drinking water resources and lands in the Everglades Agricultural Areas and the Everglades Protection Area. The fund was designed to manage and restore

natural systems and to enhance public access and recreational use of conservation lands.
([https://ballotpedia.org/Florida Water and Land Conservation Initiative, Amendment 1 \(2014\)](https://ballotpedia.org/Florida_Water_and_Land_Conservation_Initiative,_Amendment_1_(2014)))

For years, the people of the state have heard how there is never enough money to pay for the environmental restoration of our past mistakes. **Amendment 1**, like Florida Forever and Preservation 2000 before it, provides dedicated funding for the maintenance, management and purchase of these systems. In the case of the Everglades, private land owners (Sugar) were willing to sell within a set timeframe and the money was there, dedicated and allocated.

Gov. Scott has failed to listen to the citizens of FL by not utilizing the Amendment 1 monies as intended. Instead he has gutted the state agencies, demoralized many state workers, and has held back and/or misused the funds under his direction. Many distinguished environmental groups such as the Everglades Foundation (<http://www.evergladesfoundation.org/>), 1000 Friends of Florida (<http://www.1000friendsofflorida.org>), Florida Wildlife Federation (<http://www.fwfonline.org/>), and the Florida Audubon Society (<http://fl.audubon.org/>) have their organizations working to salvage the situation, before it is too late.

As if this newsletter isn't salty enough, Alan Farago writes: It is the zenith of hypocrisy for Gov. Scott to plead for federal assistance on the algae bloom catastrophe when his entire record is hacking, whittling and chopping federal authority into little, little pieces. And not just *any* federal authority — specifically federal rules to regulate fertilizers and specifically federal actions to hold Florida accountable.

Many decades ago, the U.S. EPA “delegated” full responsibility to Florida to manage the state's water pollution regulations while preserving the federal right to protect all Americans' air and water quality. To read more, and see our own homegrown Andy Marlette interpretation of the situation, visit this link, http://www.huffingtonpost.com/alan-farago/obama-to-florida-gov-rick_b_11052260.html

The results of these continuous chronic impacts (sedimentation, stormwater runoff, eutrophication, residual pharmaceutical discharge into surface waters, etc.) are stressing the biological systems and our local ecology. Just like our human body shows stress in various health debilitating ways; the natural ecosystem reacts to stressors by slowly breaking down. One trophic level can and will affect the next trophic level and an unstoppable cascade, like an avalanche, can begin.

The problems with Florida Bay are affecting a host of other species, many may be off your radar – but they have an important story to tell. A team at Florida Atlantic University installed cameras at four bald eagle nests in Florida Bay, between the southern mainland and the Florida Keys, to figure out why the population has been declining.

They found that eagle parents were feeding their young less than twice a day – nearly half what eagle chicks get to eat in other regions. The team also observed that the biomass of the food deliveries declined throughout the breeding season even as the chicks grew larger, suggesting that the parents weren't finding enough food. The same fingers are pointing to food stress related to an ecosystem-wide change. Bryan Watts points out that one of the benefits of monitoring ospreys and eagles is that they're an indicator of what's happening underneath the surface.

<https://www.newscientist.com/article/2097850-starving-bald-eagle-chicks-hint-at-ecosystem-collapse-in-florida/>

“If you aren't outraged, then you just aren't paying attention!”

In our own backyard, we are slowly smothering our remaining waterways. What will it take to finally wake up?

- Residents living along Trout Bayou have noted the decline in fiddler crabs, blue crabs and shrimp in the past decade. Since March of this year they've also been highly aware of recent sediment deposits and plumes into a feeder creek that enters the bayou. The source may be two fold; agencies that know better are blaming each other. No one wants to be accountable...all the while rain events continue to wash sediment downstream – thus entering the waters in a pulse; smothering seagrasses and the home they provide for the shrimp, crabs, and fish (ecosystem).
- Residents living along Williams Creek are beside themselves in learning that treated wastewater will be rerouted to their backyard from the spray fields next to Hidden Creek. Rapid Infiltration Basin Systems (RIBS) will be built in a low-lying area to intercept wastewater before it enters Santa Rosa Sound via the creek. Why, because the current disposal method is under capacity. Do you think any of the decision makers have taken the initiative to see what kind of environmental impacts their decisions could make? Do you think they know there are healthy grassbeds in the vicinity of the area that would be impacted? Treated effluent still has nutrients which will increase algal growth; treated effluent still contains pharmaceuticals which have been shown to exist in all creeks sampled by the USGS as reported in a recent study. (<http://pubs.acs.org/doi/pdf/10.1021/acs.estlett.6b00170>)
- Permits are being requested and granted to remove deadhead logs from area rivers. Removal of woody material in these systems destroys the bank stability (since our coastal plain is all sand, silt, and clay) and the aquatic insects that are known to support the fishery.
- Hardening of our shorelines. Doesn't matter if you live on a creek, river, bayou or bay, this archaic method of protecting uplands is over utilized, super easy and cheap to permit, and environmentally a death nail in the coffin. And yet, this practice is selected, chosen, and preferred by developers and has been shown to be environmentally hazardous, short lived, and a maintenance nightmare. Kudos to the many organizations (including USFWS!!) who have finally gotten the Army Corps of Engineers to rethink this antiquated method and are now considering issuing blanket permits for a more natural approach. Namely a Living Shoreline. Once upon a time, it took less than 10 days to receive a permit from the state (FDEP) to install a bulk head or a rock seawall. It could take upwards of 1-2 years to receive a permit for a living shoreline (LSL). A LSL has the unique ability to attenuate waves, trap sediments and nutrients entering the surface waters from the upland area, and has the distinctive ability to 'self-heal'. That's right, just like a cut on your arm can heal, so can a living shoreline. <http://www.scientificamerican.com/article/living-shorelines-will-get-fast-track-to-combat-sea-level-rise/>
- Homeowners along parts of impaired Carpenter Creek & Ten Mile Creek won't receive the benefit of a self healing watershed – instead, they have received a state of the art hardened cement infused blanket – which now sits in 100 degree FL sunshine, and aids in warming the local waters they are to protect. Biologists can tell you that warm water holds less oxygen, and certainly less of any sensitive species. These hardened engineering approaches make access to the water impossible for humans and do not allow for any trees or plants to grow there. With shade unavailable, what can really grow in such a harsh environment?

So, what caused this situation and what can be done to ameliorate it? I can crystallize it down to a few pertinent points. Our community, city, county and state have allowed development without any

thought to the natural environment. We do not have a comprehensive watershed wide plan in place that identifies which areas we can and absolutely cannot develop further. Much like the oath 'Do not cause further harm' that doctors take before they treat their patients; it would behoove our elected officials and decision makers to sit down and reflect on the current approaches and methods applied and rethink how those decisions could be made without inflicting additional harm on the environment; the patient in this case. The entire watersheds that feed the bay system.

In 2016, we have the tools and technology to plan a better approach. Our state's valuable natural resources need to be wisely managed by decision makers and elected officials with full recognition that the health of our uplands are directly connected to the health of our waters, and the health of our waters support the diverse ecological community that in turn supports our economy, and all the various cultures that depend on it.

Let's learn from the past, and raise the bar for all of our community, elected officials and decision makers to take better care of the environment.

The conditions of our environment speak volumes about our community and what we value.

NOW HEAR THIS.....

Dear BFA Membership,

Some of you are new to the organization and others have been around for a few decades. Some of you have: held positions on the board; been or lead committees; been active with the water quality sampling program; been active recruiting new members; been active in hosting the quarterly fish fries; been able to attend meetings that touch on environmental issues and concerns (city, county, water management, dept of environmental protection, RESTORE, ECUA, etc.); been editors for newsletters; been speakers for our quarterly meetings; been able to present to other groups - who our organization is and what it does (and why that's important for the community); helped to walk in impaired creeks and identify solutions for issues causing the impairment; and been the eyes and ears on the ground when a water quality concern or problem occurs.

And some of you have not actively participated but believe that what our organization does is important. Through this manner, you have supported this organization through continuing membership dues and generous donations. And for all of you we are thankful! But we also need help, your help.

Likely the most impressive accomplishment by the BFA is the long term water quality monitoring program which has been assembled over 50 years and affords our portion of the state the largest, oldest database on water quality conditions in the southeast. This invaluable data has been used by many agencies to develop new criteria. Today, the BFA still samples 48 stations across four watersheds quarterly for nutrients, and because the BFA does not currently have a contract with the state - many of the water quality monitors supply their own personal vehicles, gas and ice. Disappointing to the organization was when the NW District FDEP closed its laboratory in 2008 thus removing the important bacteriological parameter from the suite of parameters sampled; this parameter alerts for health concerns.

The UWF has a fully accredited lab and is teaching students how to conduct the same analyses; Escambia County has also filled this niche by developing their own lab with the same capabilities. Both of these organizations serve the community and are developing internship programs to include citizens.

The BFA has bumped into the same issues facing many other area nonprofit organizations (lack of funding, recruitment of new members, etc.) While we are creatively seeking any level of funding to expand our WQ sampling program to include areas slated for development, we are also facing new issues with increased population density, sprawl and development which have now tripled the time it takes to complete our sampling runs.

In order to continue to accomplish this important mission set out by our founding organizers in today's world - while recognizing the many layers of bureaucracy and litigious issues today's society faces which were literally non-existent five decades ago – we are building up efforts and relationships with other groups to afford a sustainable future for our organization.

Environmental education is the key to protecting and maintaining our resources. As the BFA President since 2011, I personally have invested many hours with our membership, area high schools, interested citizens, garden clubs, home school groups and university students in protecting and understanding the unique vestiges that remain from one of the most biologically diverse locations in the southeastern US. To that end, I am delighted to share that UWF and BFA are in the process of establishing a partnership to develop a Water Quality Sampling Academy (2016), which will hopefully reconnect area citizens and students with nature through long term monitoring – such that students may note the changes that occur to area aquatic resources and ecosystems as areas around the area become more intensively developed.

While the BFA Board is actively working with the university to develop a Memorandum of Understanding; UWF wishes to mine the vast BFA data collection and begin developing easy to read and understand report cards for area creeks, bayous, and rivers. In addition, as has been a goal of the BFA Board for many years, an expansion of WQ sampling parameters to include bacteriological samples (a sign of human health issues) and chlorophyll a (a sign of nutrient loading).

We hope to bridge similar partnerships with the interested cities, counties, and citizen groups, private and public organizations which share similar interests in preserving our natural resources for future generations. Our organization is also interested in recruiting fresh and enthusiastic individuals for a number of Board positions, expansion of social media, maintenance of the website and including the role of President.

Right now, our south Florida waters and environment are in trouble....we may be right behind them in NW Florida. Long time residents and citizens are frustrated, disappointed and dissatisfied by the lack of coordination by state agencies to address the issues, and by the finger pointing and the passing of the buck. John Moran wrote an excellent Viewpoint (A Watershed Moment?) in the Pensacola News Journal on Saturday, 16 July 2016. In the article, he points out that, 'A long time ago our political leaders clearly saw that Florida was headed an unsustainable path. "Ecological destruction in Florida is nothing less than economic suicide", declared Gov. Reubin Askew in 1971.'

Reubin Askew was from our area and likely saw firsthand what fish kills in the form of square miles looked like on his Pensacola Bay System. He was a remarkable man, politician, and home grown from our area. He did much for our area and the environment. We do not need to repeat the lessons of the past to start over; we have the data and can build off of it to better ourselves and the environment.

<http://uwf.org/post/carl-wernicke-remembering-reubin-askew#stream/0>

We hope you can make the August Meeting, but if not – as Charles Lowery would say; ‘If the Good Lord’s a willing and the creeks don’t rise...’ we will have our annual family picnic on the first Saturday in November. **BFA puts out a quarterly newsletter and hosts 4 general membership meetings a year.**

The Bream Fishermen Association is a not-for-profit organization dedicated to the promotion of the conservation responsibilities as well as the recreational enjoyment of fishermen, hunters, campers and related outdoorsmen.

It is the objective of the BFA to support, develop, and implement programs that will:

- 1) Improve the quality of our environment;
- 2) Protect and maintain our present wilderness type lakes, rivers, swamps, marshes, bays, forests, and beaches in their natural undeveloped state; and
- 3) Advance the causes of plant, marine, and wildlife preservation.

Membership is open to all individuals who support these objectives. Please join the BFA by sending us your contact information (name, mailing address, phone, and email) be sure to notify us if you prefer to receive notices and announcements by mail or email, and \$10 annual dues to our mailing address:

Bream Fishermen Association

1203 N. 16th Ave, Pensacola, FL 32503
