

BMAP Update

- Review of Process
- Suwannee River BMAP



Terry Hansen, P.G.



What's Your Favorite
Greek Yogurt Flavor?
*Visit the Dairy
Princess booth to
enter to win a*

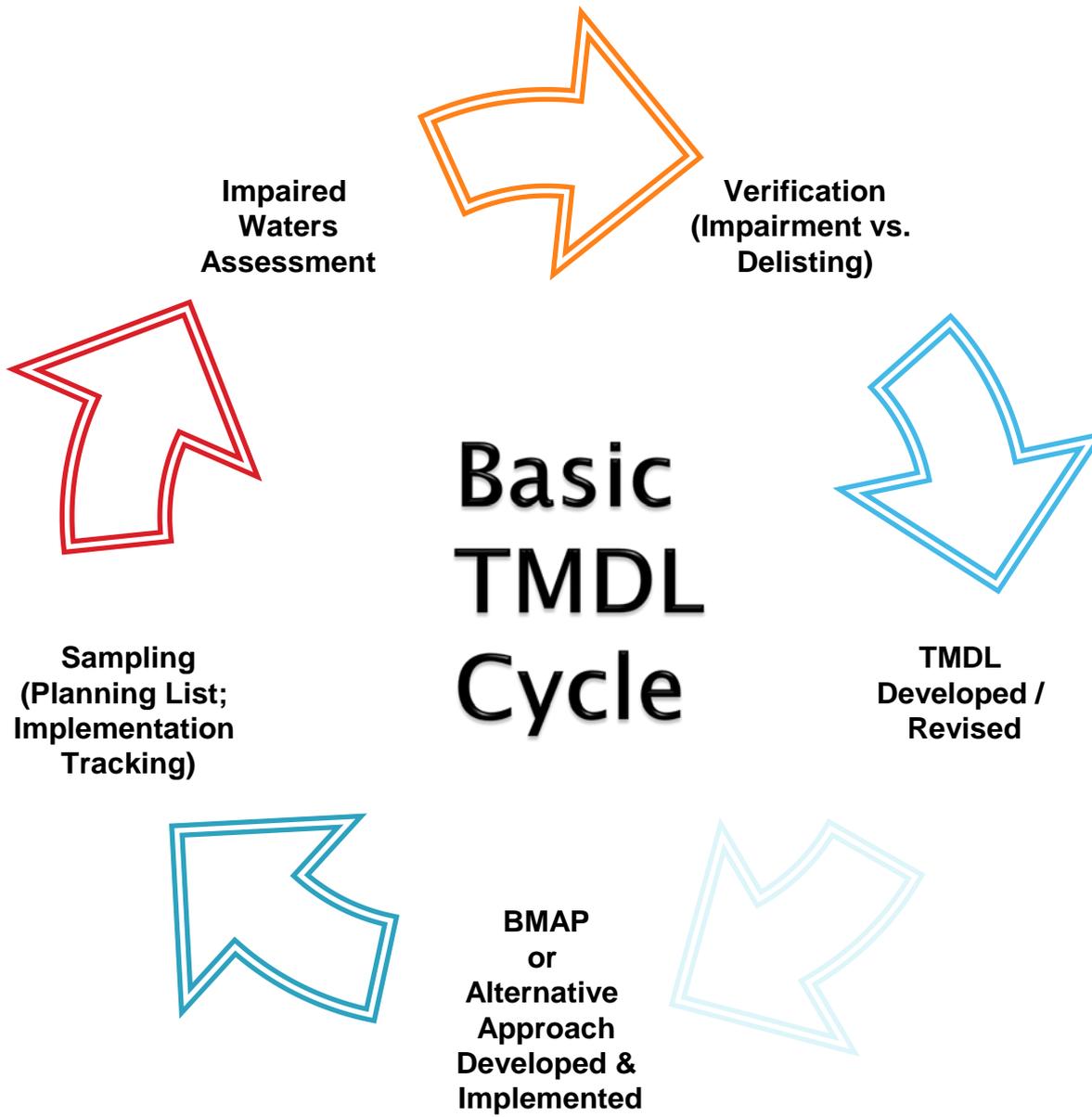
TMDL Program

- ▶ Program result of
 - 1972 Clean Water Act Section 303(d)
 - 1999 Florida Watershed Restoration Act
- ▶ Process
 - Data Collection and verification of waterbody as impaired
 - Listing process for impaired waterbodies
 - Development of TMDL
 - Implementation of TMDL through BMAP

What is a TMDL?

The maximum amount of a pollutant that a waterbody can receive and still meet water quality standards.





Purpose of the TMDL program...

To identify scientifically-based quantitative goals for restoration of waterbodies that do not meet State water quality standards, and implement a plan to achieve those goals.



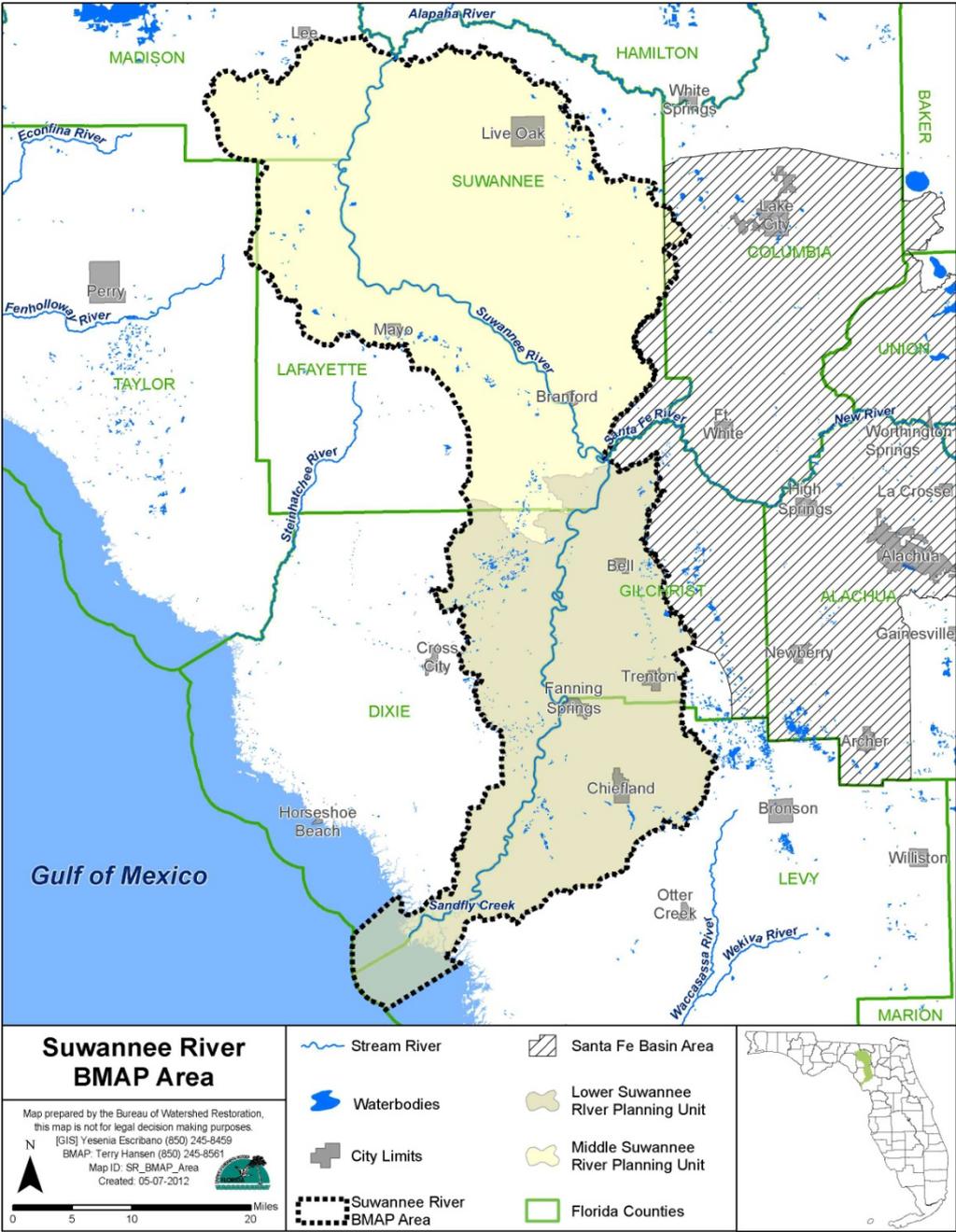
Basin Management Action Plan

A Basin Management Action Plan (BMAP) is the primary tool available to implement Total Maximum Daily Loads (TMDLs)



Suwannee River BMAP Area

- Over 1 million acres
Land Use
- 26% Agricultural
 - 48% Forest
 - 7% Urban & built up



BMAP

▶ Phased Approach

- Phase 1 – 3 to 5 years
 - RFA selection and BMP implementation
 - Monitoring of results
 - Evaluate what works and adjust accordingly
 - Determine if additional BMPs need to be developed
 - Annual reports on progress
- Phase 2
 - Review progress and adjust as needed



Suwannee River Basin TMDL

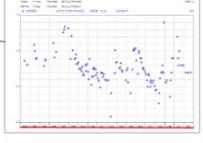
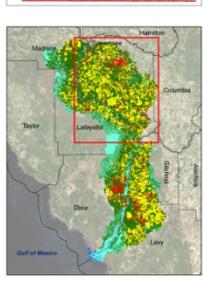
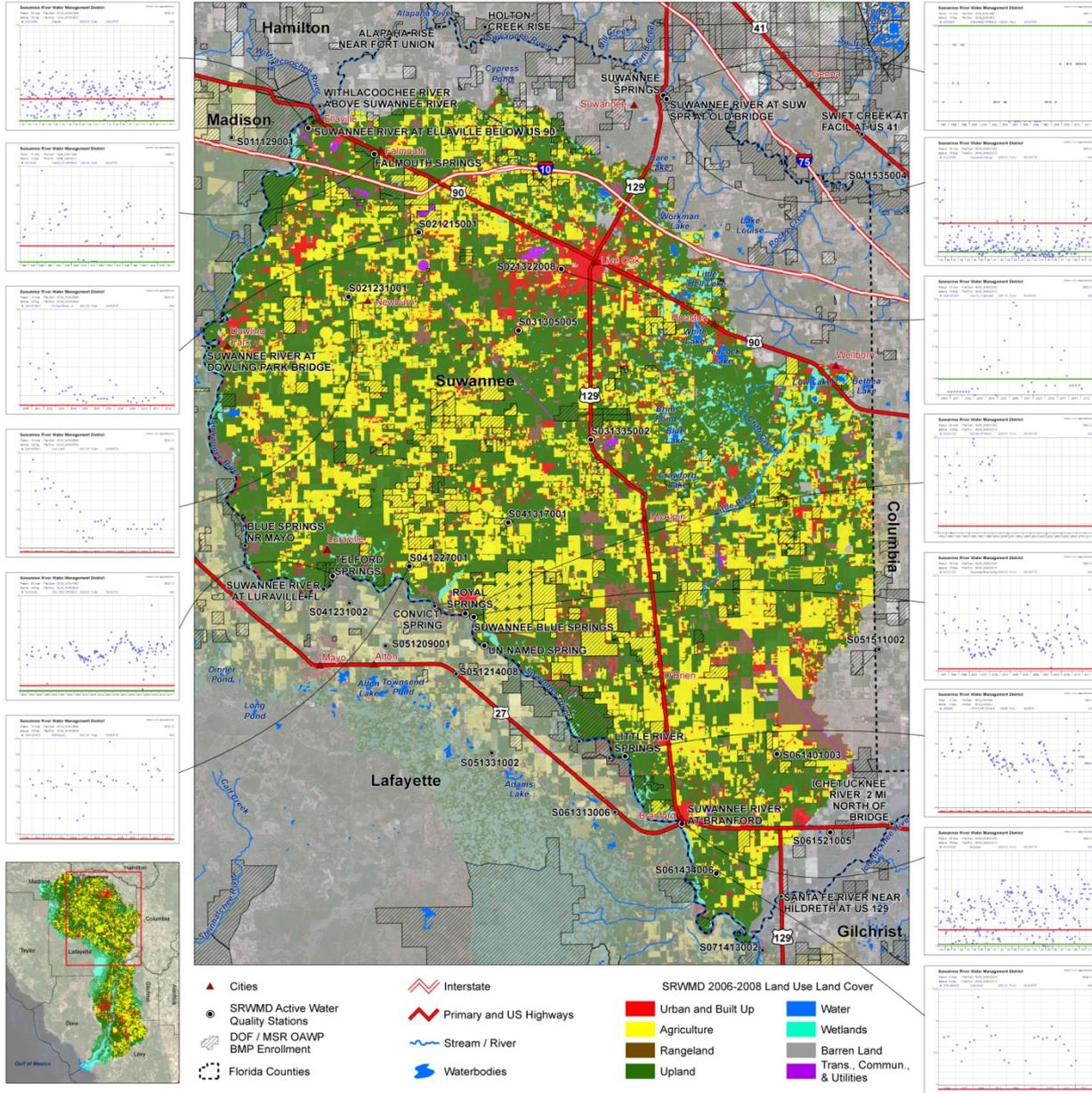
- ▶ Verified Period
 - June 1, 2000 thru June 30, 2007
- ▶ Total Maximum Daily Load (TMDL) Study Results
 - Nitrate shown to be primary factor in causing algal blooms
- ▶ Suwannee River Basin (TMDL)
 - 0.35mg/l nitrate monthly average concentration (or lower) will not cause an imbalance in the flora or fauna



Suwannee River BMAP - Suwannee



Map prepared by the Bureau of Watershed Restoration, this map is not for legal decision making purposes.
 (GIS) Yessena Escobar (850) 245-8459 BMAP-Tony Hansen (850) 245-8561
 Map ID: SU_Suwannee_Created: 09-26-2012

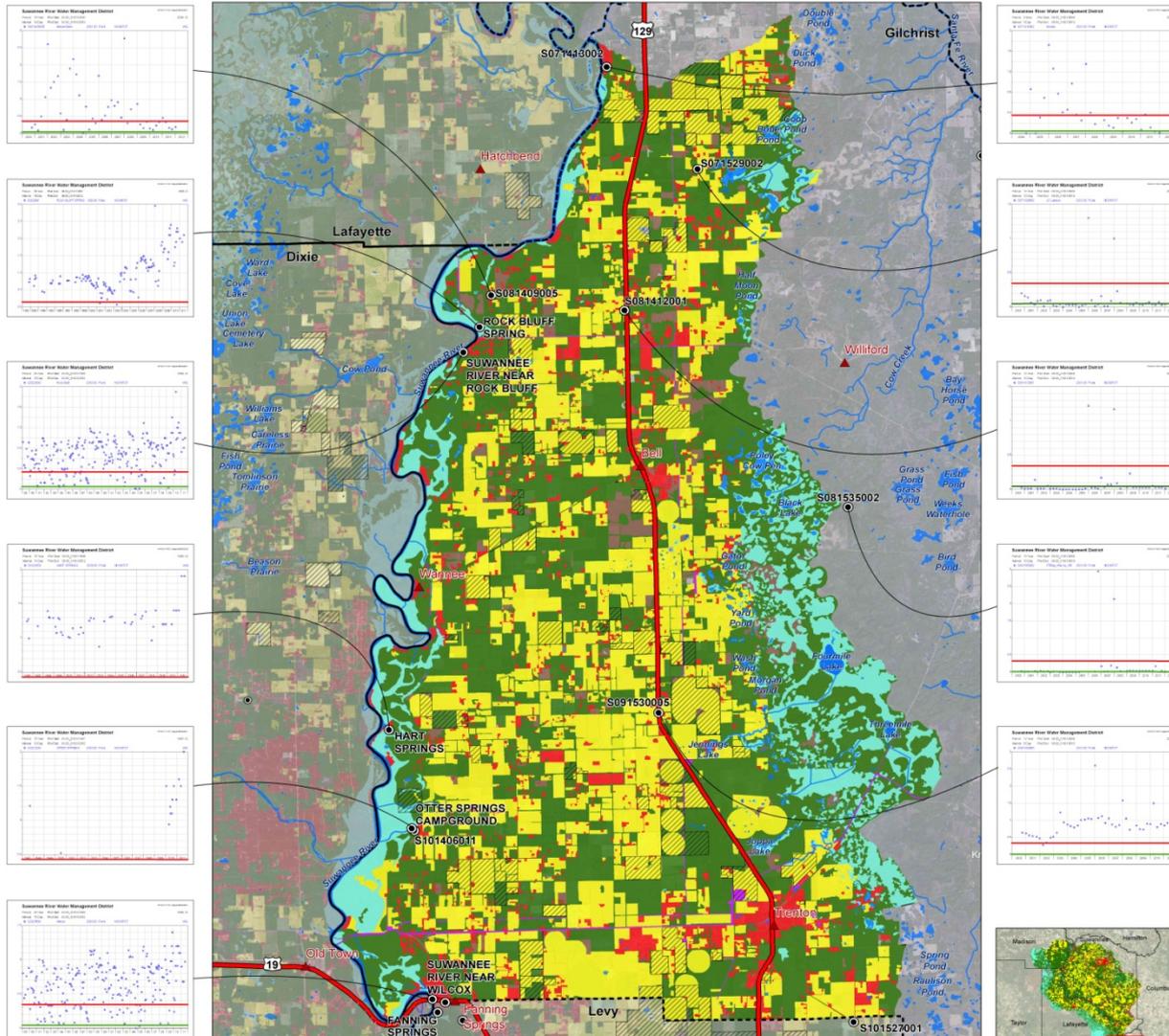
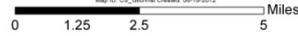


- ▲ Cities
- SRWMD Active Water Quality Stations
- ▨ DOF / MSR OAWP BMP Enrollment
- ▭ Florida Counties
- ↔ Interstate
- ↔ Primary and US Highways
- ~ Stream / River
- ☪ Waterbodies
- SRWMD 2006-2008 Land Use Land Cover
- Urban and Built Up
- Agriculture
- Rangeland
- Upland
- Water
- Wetlands
- Barren Land
- Trans., Commun., & Utilities

Suwannee River BMAP - Gilchrist County



Map prepared by the Bureau of Watershed Restoration, this map is not for legal decision making purposes.
 (2012) Version: 04/2012 (SRWMD) 04/2012 BMAP - Tom Hagan (850) 245-4591
 Map ID: CS_Gilchrist Created: 05-18-2012



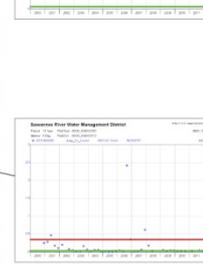
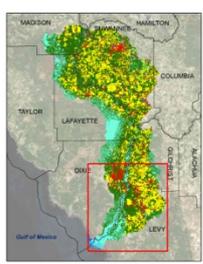
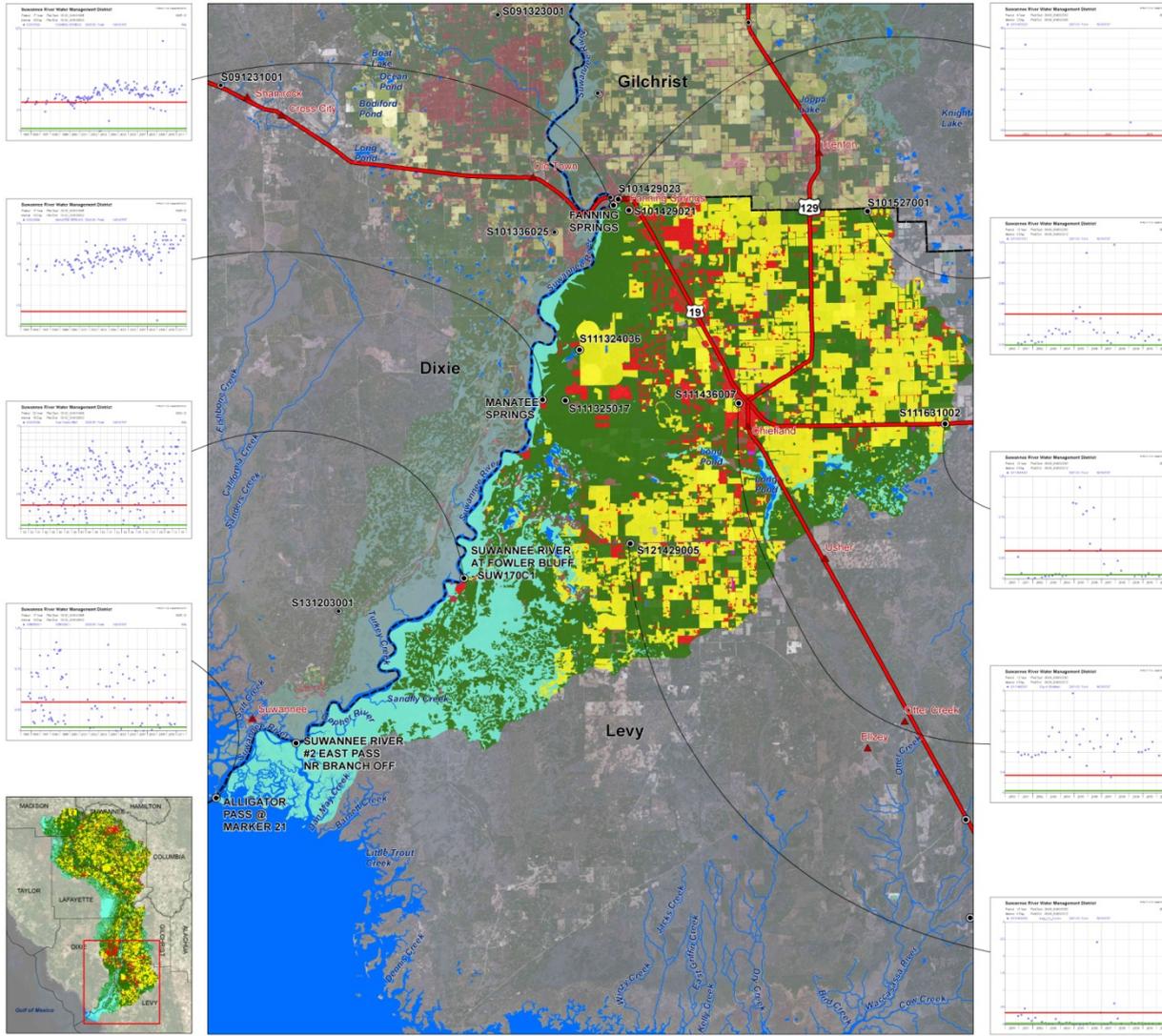
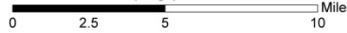
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| ▲ Cities | ⚡ Interstate | SRWMD 2006-2008 Land Use Land Cover |
| ● SRWMD Active Water Quality Stations | 🛣️ Primary and US Highways | 🔴 Urban and Built Up |
| 🏠 DOF / MSR OAWP BMP Enrollment | 🌊 Stream / River | 🟡 Agriculture |
| 🗺️ Florida Counties | 🌊 Waterbodies | 🟤 Rangeland |
| | | 🟢 Upland |
| | | 🔵 Water |
| | | 🟦 Wetlands |
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Suwannee River BMAP - Levy County



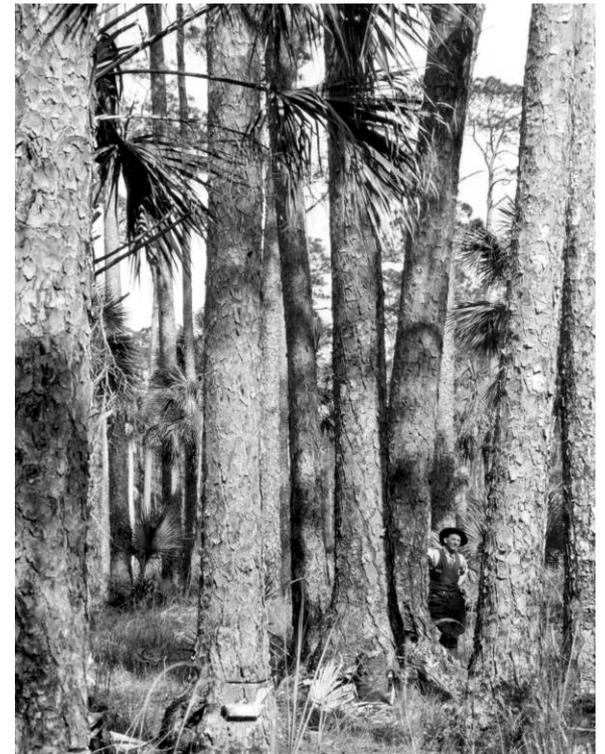
Map prepared by the Bureau of Watershed Restoration. This map is not for legal decision making purposes.
 (912) 755-6100 (800) 245-8470, BMAP, Tony Houson (912) 245-8561
 Map ID: 05, Levy County, 06/21/2012



- ▲ Cities
- SRVMD Active Water Quality Stations
- ⊕ DOF / MSR OAVP BMP Enrollment
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- ⚡ Interstate
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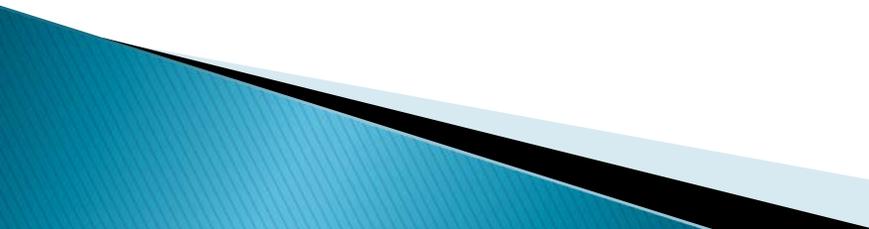
Nutrient Reduction Options

- ▶ Best Management Practices (BMPs)
 - Agricultural BMPs implemented by SRP & FDACS
 - Restoration Focus Areas (RFAs)
 - Urban BMPs implemented by county ordinances
 - Fertilizer / Septic Tanks /
- ▶ County Urban Development
 - Springshed Protection
 - Aquifer Vulnerability Areas



Suwannee River BMAP

▶ Schedule

- Meetings with County Administrators completed
 - Briefing to SRP Executive Committee September 14, 2012
 - Briefing to SRWMD Governing Board September 25, 2012
 - Public meeting Late October 2012
 - County Commission workshops planned for January & February 2013
 - Grower Association meetings TBD January/February 2013?
- 

Achieving Success

- ▶ FDEP relies on cooperation with
 - SRWMD
 - SRP
 - FFB
 - Growers associations
 - Environmental Groups
 - Counties and municipalities



Contact Information

- Basin Coordinator terry.hansen@dep.state.fl.us
- DACS contact terry.pride@freshfromflorida.com
- Presentations & other Information

<http://publicfiles.dep.state.fl.us/DEAR/BMAP/Suwannee/>

- TMDL wayne.magley@dep.state.fl.us
- Link

<http://www.dep.state.fl.us/water/tmdl/index.htm>

