Update on the Development of the North Central Florida Water Initiative Prevention/Recovery Strategy Agenda Item 7

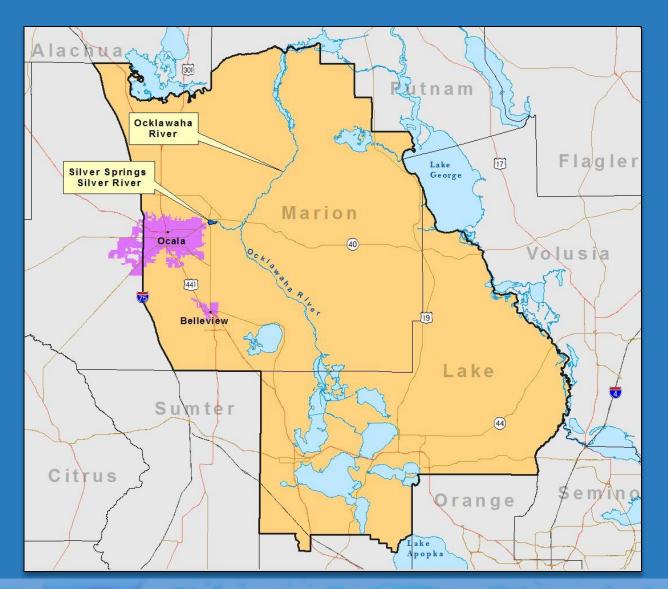
Mike Register, P.E.

Division of Regulatory,

Engineering and Environmental Services



North Central Florida Water Initiative Area





When Must MFLs Be Adopted?

- § 373.042(2) requires that each district, by November 15 of each year, submit to the Florida Department of Environmental Protection (DEP) for review and approval a "priority list and schedule for the establishment" of minimum flows and levels (MFLs).
- The priority list and schedule "shall be based upon the importance of the waters to the state or region and the existence of potential for significant harm to the water resources or ecology of the state or region and shall include those waters which are experiencing or may reasonably be expected to experience adverse impacts."



When Must MFLs Be Adopted?

- By law, the District has an affirmative duty to establish MFLs for the first-magnitude springs located within its boundaries. See Section 373.042(2), Florida Statutes (F.S.).
- The statute requires that the District's priority list include the first-magnitude springs located within the District (Silver, Silver Glen, Alexander and Volusia Blue springs).
- The specific schedule for establishment of spring minimum flows and levels shall be commensurate with the existing or potential threat to spring flow from consumptive uses.



When Must MFLs Be Adopted?

- Volusia Blue Spring Rule became effective in 2006.
- Silver Springs is on the District's priority list and schedule for adoption in 2015.
- Alexander Springs and Silver Glen are on the District's priority list and schedule for adoption in 2017.



Withdrawals Within SJRWMD Portion of Marion County

2013 Estimated Use

Permitted and DSS

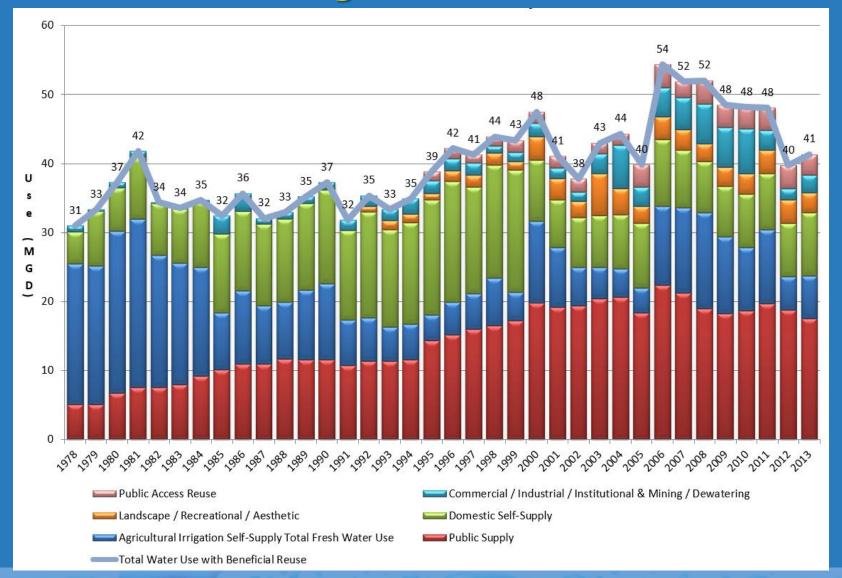
38.34 mgd

66.24 mgd

mgd = million gallons per day

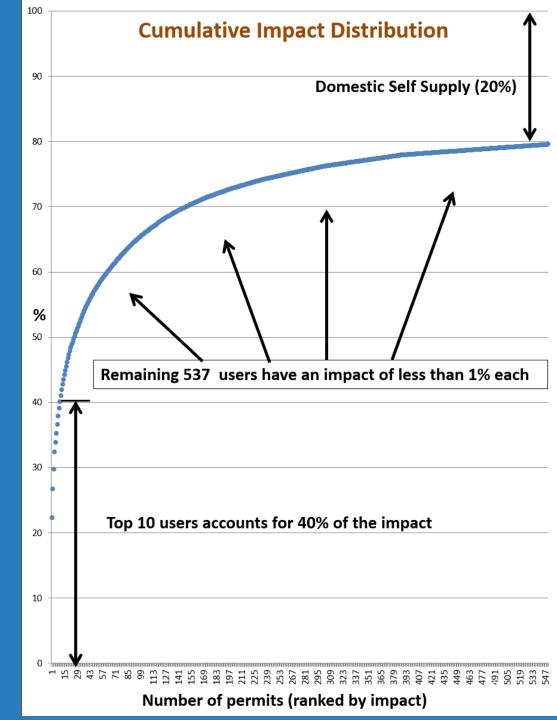


Marion County Historic Water Use





Distribution of Effects Due to Pumping in Marion County on Silver **Springs**



When is a Prevention/Recovery Strategy Needed?

- District must "expeditiously implement a recovery or prevention strategy" when a water body is not meeting or is projected (within the next 20 years) not to meet a minimum flow or level, to
 - Achieve recovery to the established minimum flow or level as soon as practicable, or
 - Prevent the existing flow or level from falling below the established minimum flow or level



When is a Prevention/Recovery Strategy Needed?

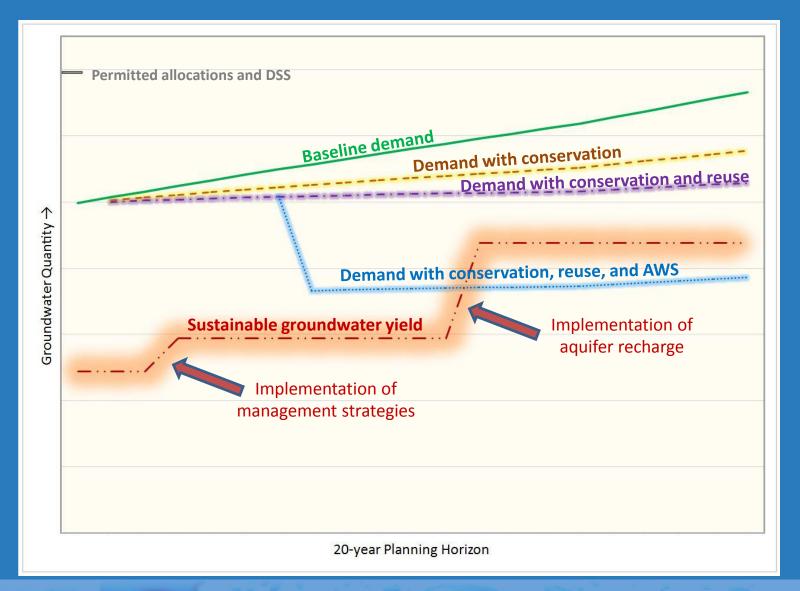
When an MFL is proposed for adoption that requires a prevention/recovery strategy, 62-40 *Florida Administrative Code* (F.A.C.) requires that the MFL and Prevention/Recovery Strategy be adopted concurrently.

Strategy Objectives

- Develop and implement projects and measures to achieve MFLs.
- Identify funding to facilitate implementation projects and measures.
- Explore rulemaking options to assist in implementation of strategy goals.
- Monitor flows and water levels to evaluate success.
- Implement strategy in phases with 5-year comprehensive reviews.



Benefits of Strategy Measures



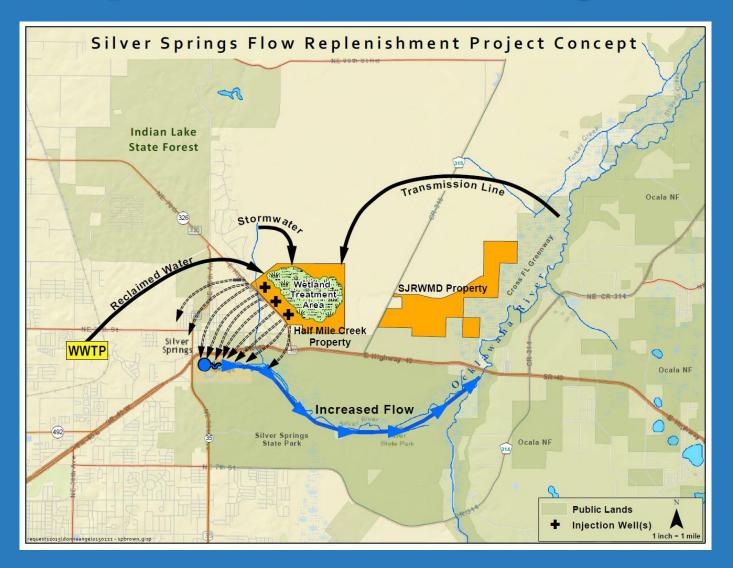


Proposed Projects and Measures

Project Type	Project Title	Estimated Volume (mgd)
Management Strategies	Wellfield optimization, LFA conversion	2–8
Conservation	Agriculture	0.1–0.4
	Commercial/Industrial/Institutional	0.1–0.2
	Domestic Self-Supply	2.7–4.4
	Public Supply	3.9–5.9
Reuse	Additional Reclaimed water	4.4–5.3
Water Supply Dev.	AWS for potable use	15–20
Water Resource Dev.	UFA recharge near Silver Springs	15–20
Total		43–64 mgd



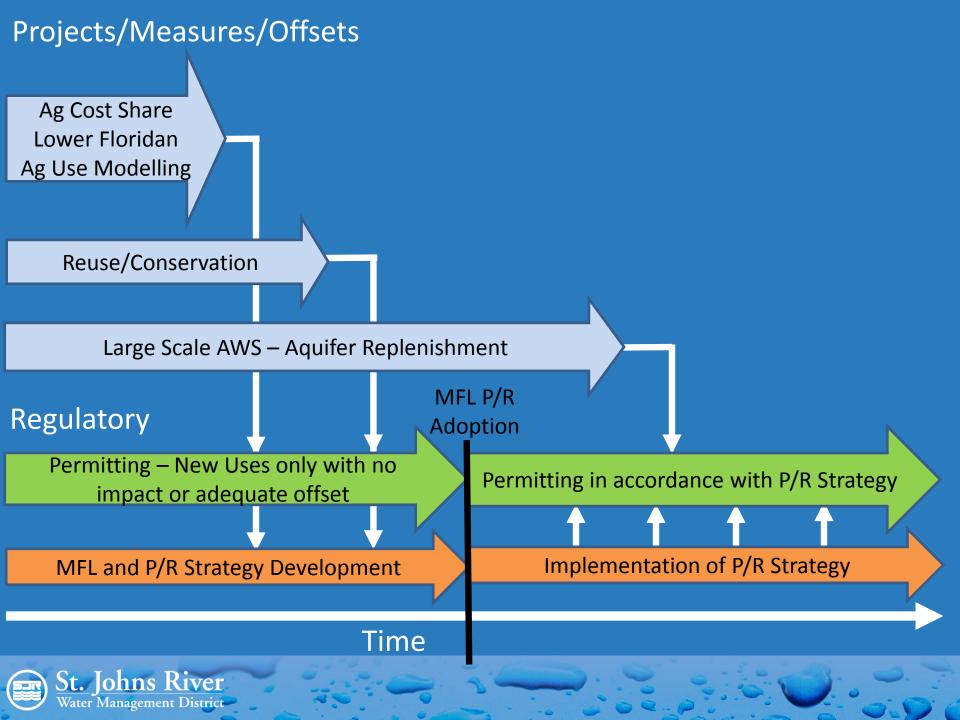
Silver Springs and Aquifer Replenishment Project



SWFWMD and SRWMD's Existing Rule Programs for Recovery Areas

- Renewal of permits with no change in quantities
 - Suwannee District (SRWMD) allows renewals with 5-year duration.
 - Southwest Florida District (SWFWMD) allows renewals with no special limit on duration.
- Renewals, modifications and new permits with request for new quantities
 - SRWMD allows new quantities if there is elimination or offset of potential impacts from the new quantities.
 - SWFWMD allows new quantities if the applicant proposes to implement a net benefit. The applicant must offset the predicted impact of the proposed withdrawal and also provide an additional positive effect on the water body equal to or exceeding 10% of the predicted impact.





Current Efforts

- Quantify benefit of converting withdrawals from Upper Floridan to the Lower Floridan for expeditious implementation
- Increase funding for agricultural conservation cost share projects
- Refined modeling approach for agricultural irrigation
- Aquifer Recharge Preliminary Design Report



Next Steps

- Meet with stakeholders to obtain feedback.
- Develop/initiate projects to provide impact offsets for potential new uses
- Finalize MFL and strategy.
- Complete peer review process.
- Adopt MFL and P/R strategy.
- Implement MFL and P/R strategy.



Questions?