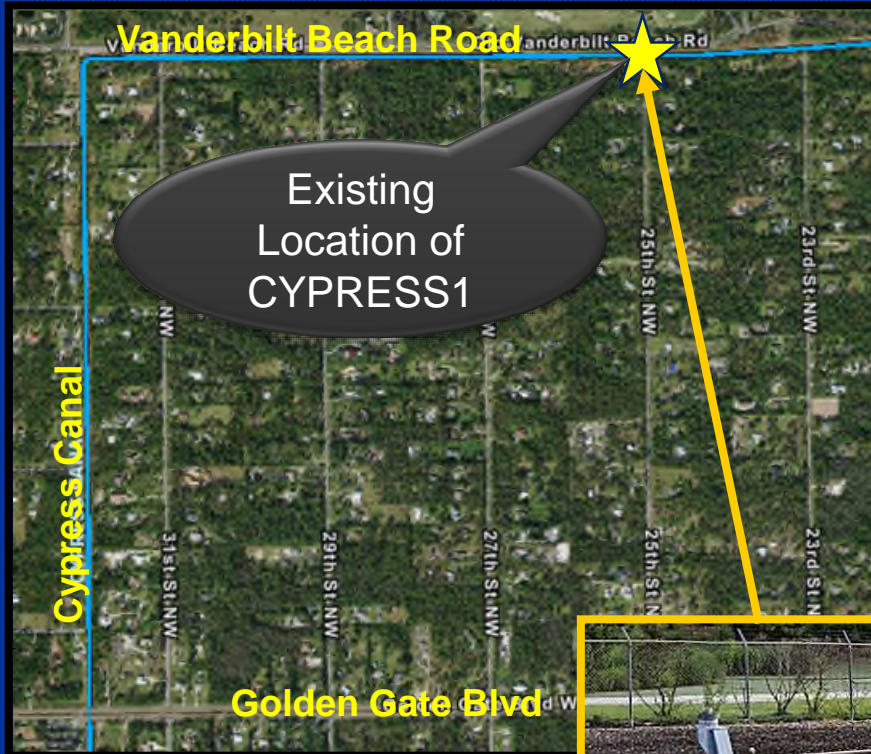




Preliminary Fiscal Year 2021-2022 Big Cypress Basin Capital Plan

Kevin Yue, PE, CEP
Lead Engineer
Big Cypress Basin
November 18, 2020

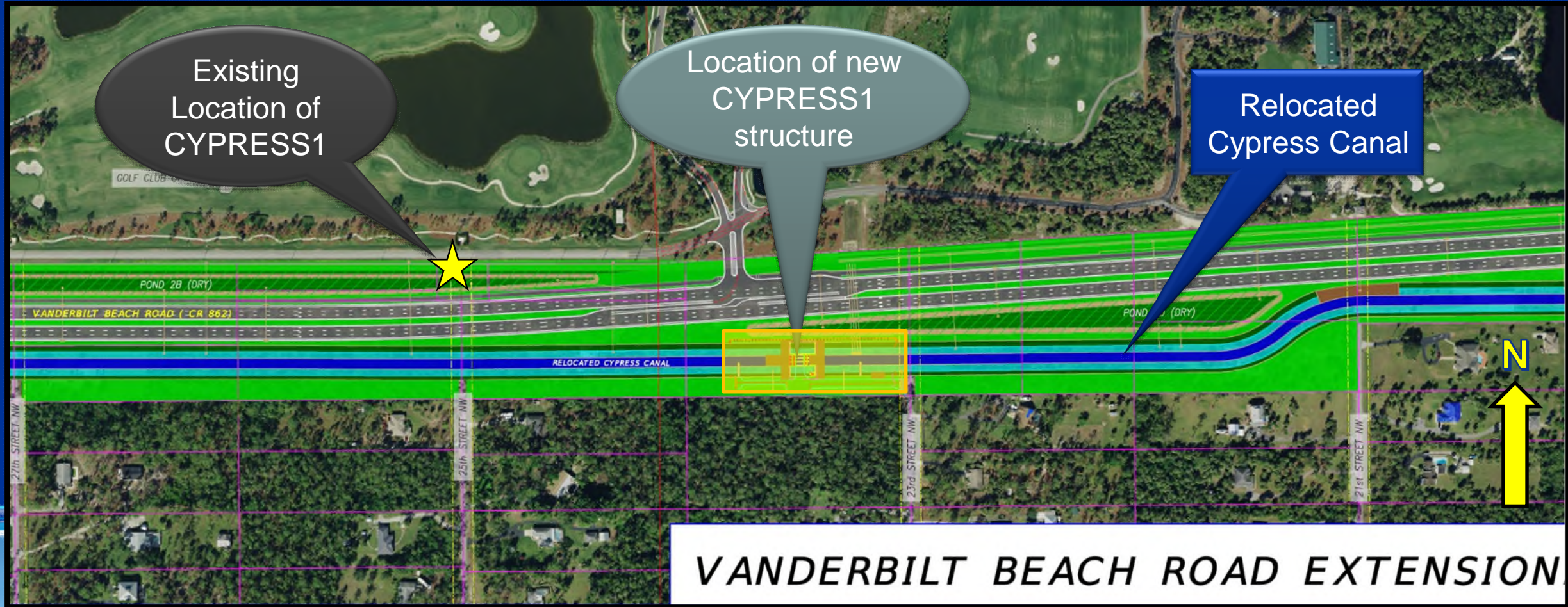
Cypress Canal Weir Replacement



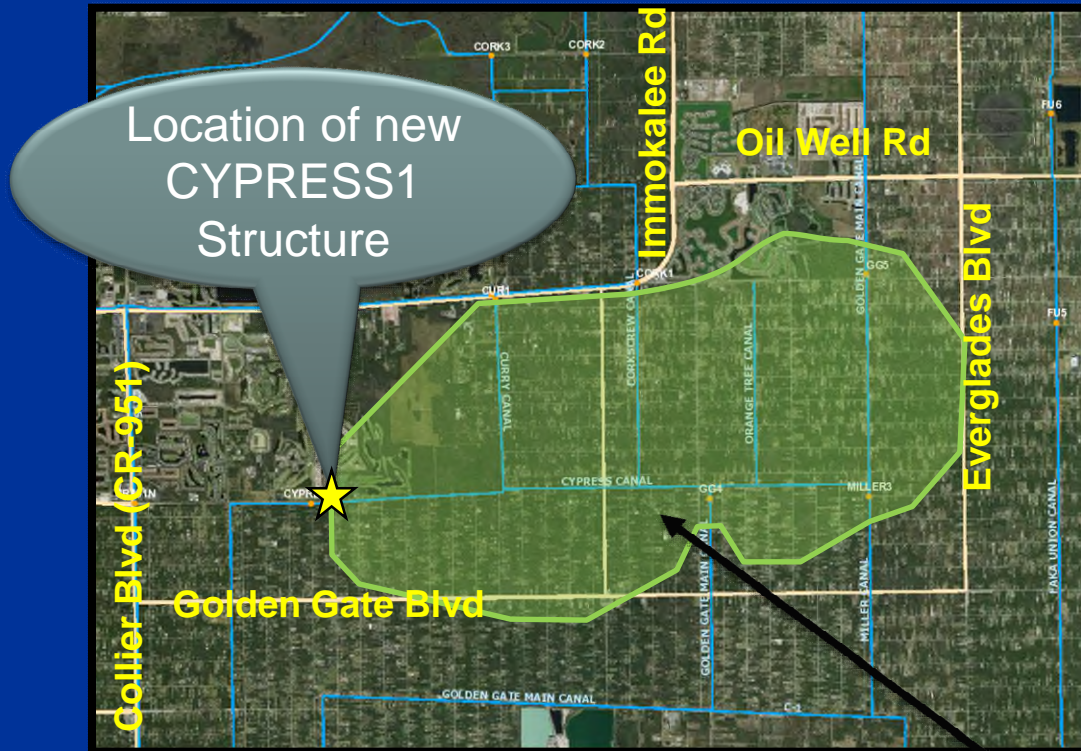
- Next phase for new water control structure
- Aligns with Collier County's Vanderbilt Beach Road (VBR) Extension Project
- Remote control will provide better response time
- Will protect groundwater supply
- Total cost of multi-year project = \$3,950,000
- FY2021-2022 funding (\$2,000,000) for construction



Cypress Canal Weir Replacement

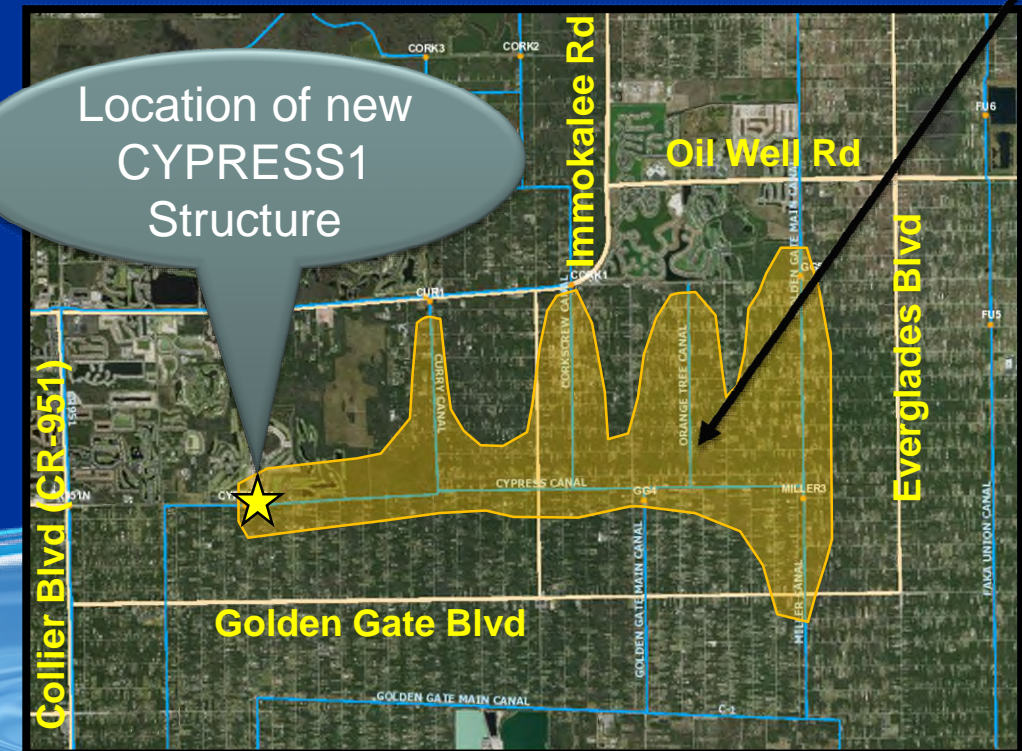


Cypress Canal Weir Replacement Benefits

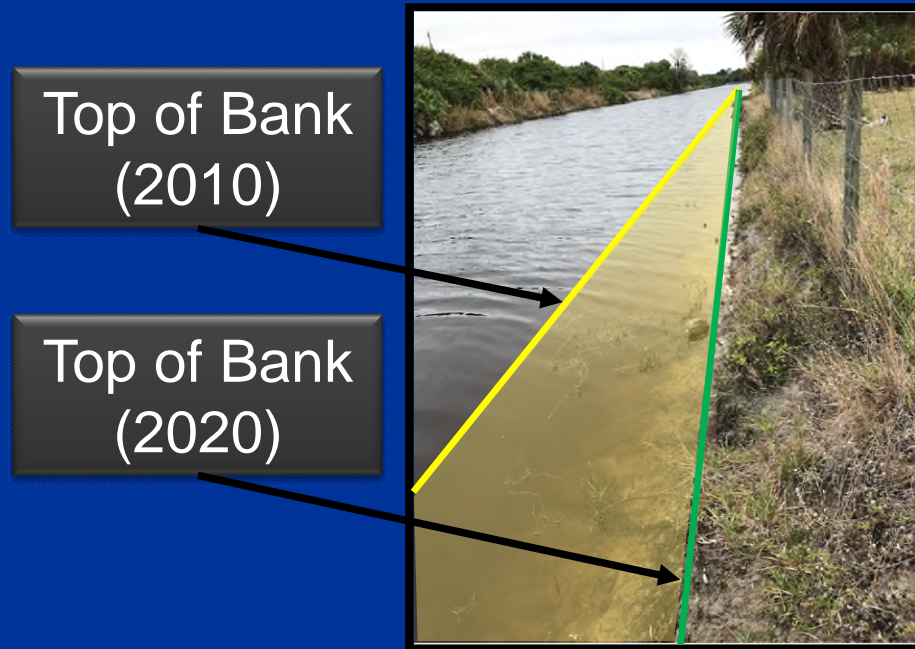


Dry Season Groundwater Benefit

Wet Season Groundwater Benefit

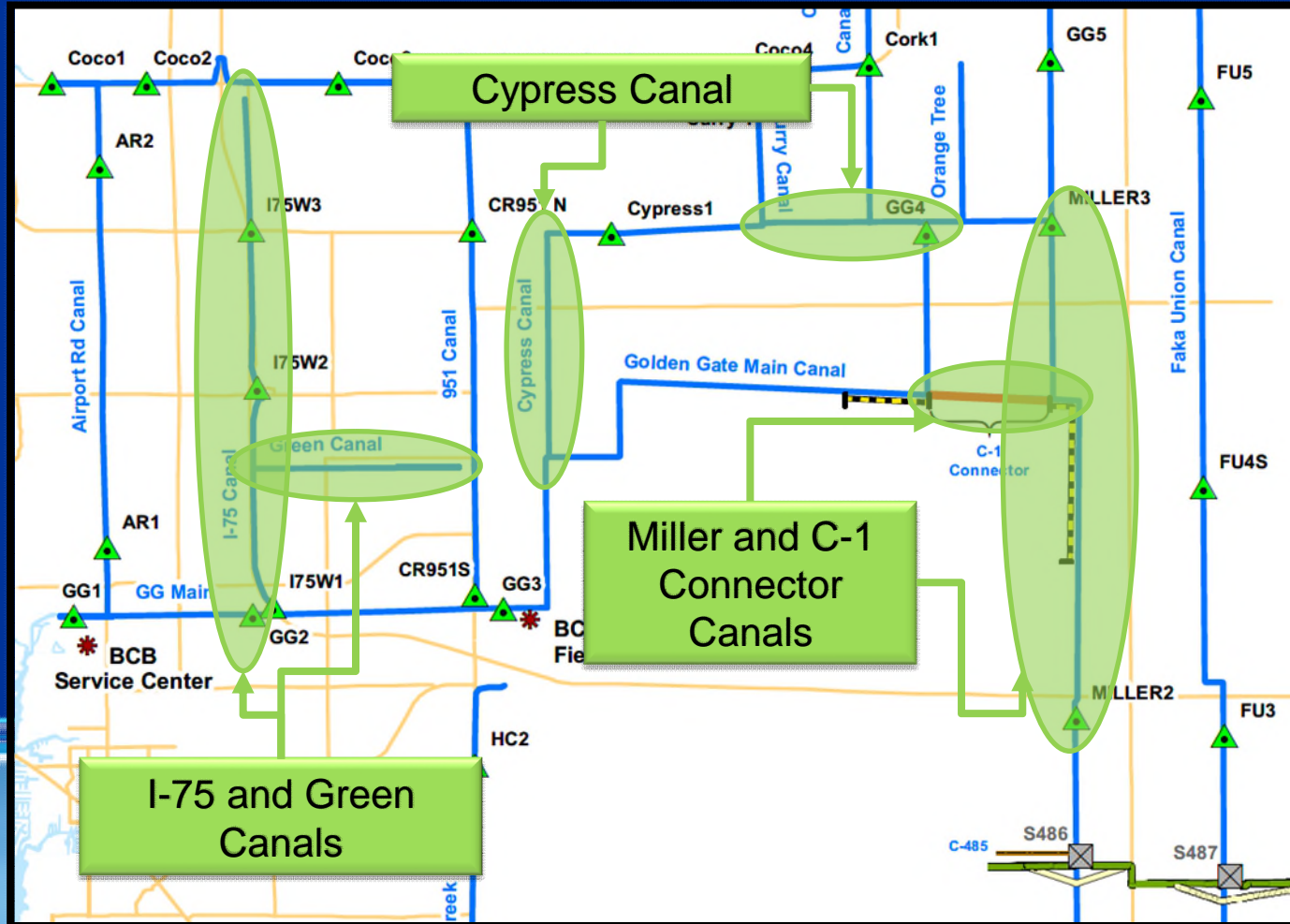


Canal Improvements - Canal Bank Stabilization



- Protect canal rights of way and public/private infrastructure
- Keep sediments from entering canals
- Assess, prioritize, and repair known areas of erosion
- Continue ongoing program of canal bank stabilization in priority areas

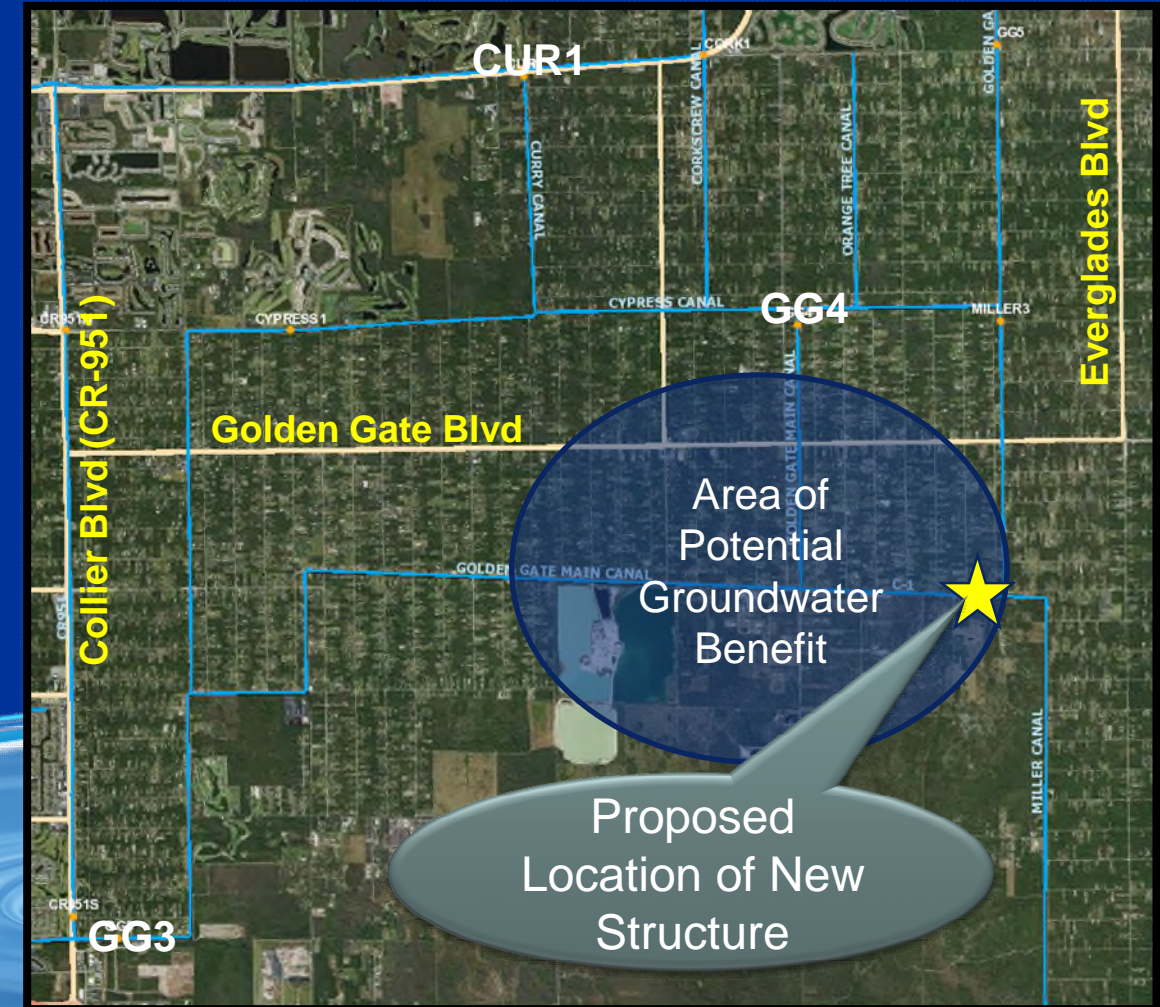
Canal Improvements – Improved Flood Control



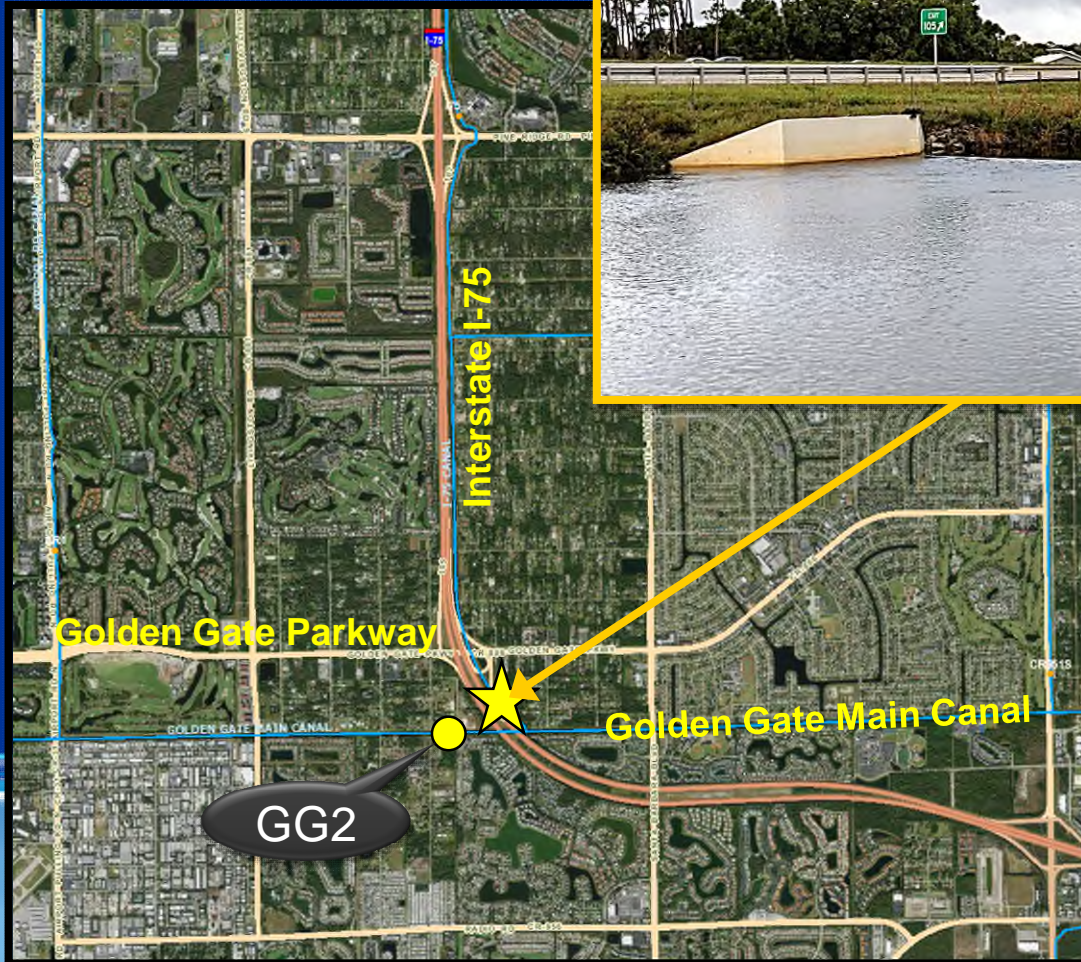
- Multi-year program to evaluate/improve flood management
- Areas selected based on the 2017 Level of Service (LOS) study findings
- Modeling and canal cross-section improvement design currently underway for 3 groups of canal segments
- FY2021-2022 funding (\$795,000) to complete design and start construction

C-1 Connector Canal Control Structure

- New water control structure near C-1 & Miller Canal intersection
- Complements C-1 Canal Improvements project (pending modeling results)
- Projected to improve dry season water management
- Protects surrounding area from over-drainage
- FY2021-2022 funding (\$250,000) to start design



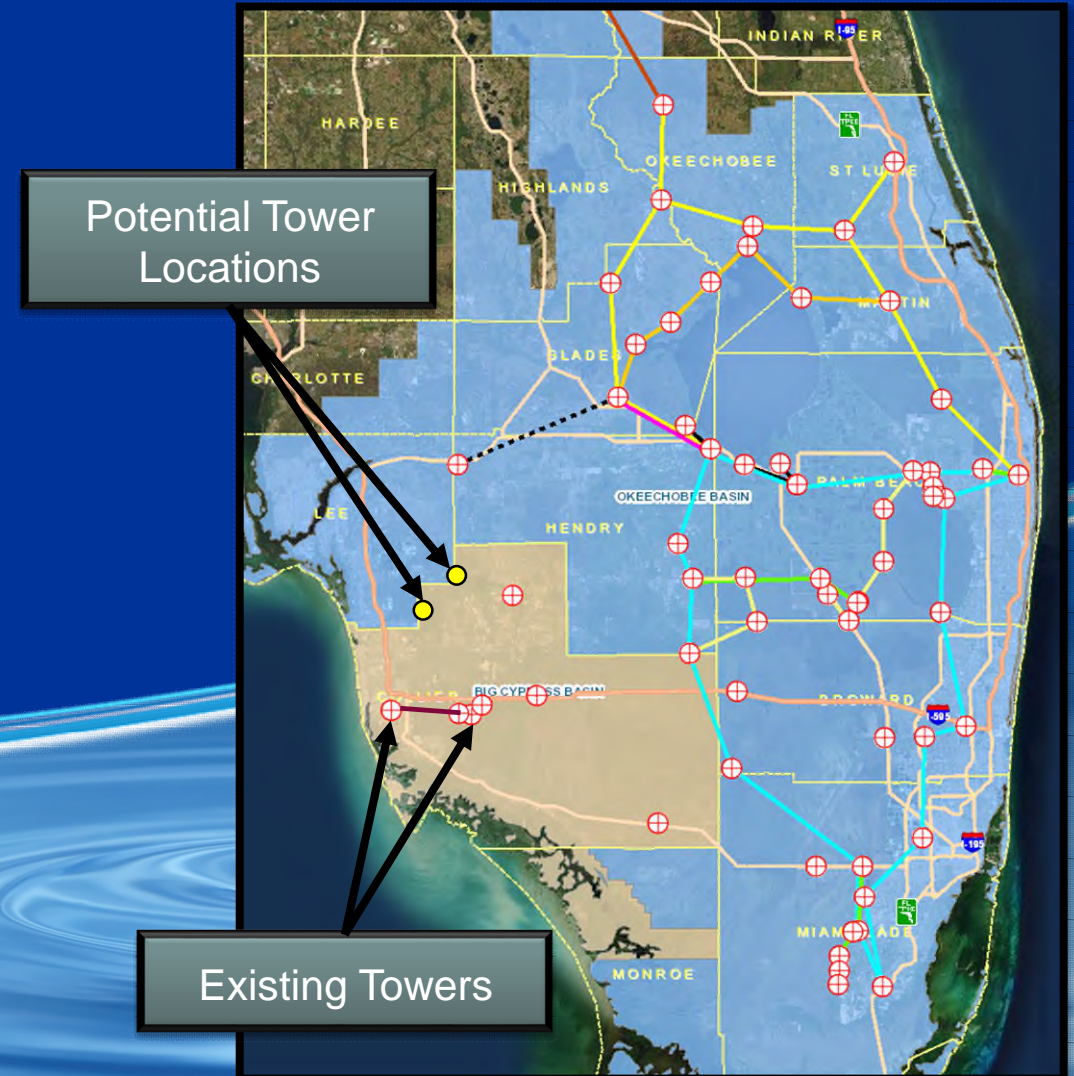
I-75 Canal Weir #1 Removal



- Structure nearing end of useful life
- Assessment underway to evaluate improvements to water resources by removal of structure
- FY2021-2022 funding (\$250,000) to develop removal plan

Remote Monitoring and Communications Enhancement – Phase 4 (Tower)

- Extension of communication backbone into Collier County
- Provides primary communications path and redundancy for Basin monitoring sites
- Provides more reliable and resilient connection for daily structure operations
- FY2021-2022 funding (\$250,000) to start design
- Anticipated completion summer 2024



Preliminary FY 2021-2022 Capital Plan Budget

Project Description	Project Phase	Preliminary Budget
Cypress Canal Weir Replacement	Construction	\$2,000,000
Canal Improvements	Design/Const.	\$795,000
C-1 Connector Canal Control Structure	Design	\$250,000
I-75 Canal Weir #1 Removal	Design	\$250,000
Remote Monitoring and Communications Enhancement – Phase 4 (Tower)	Design	\$250,000
Total		\$3,545,000

Questions?

