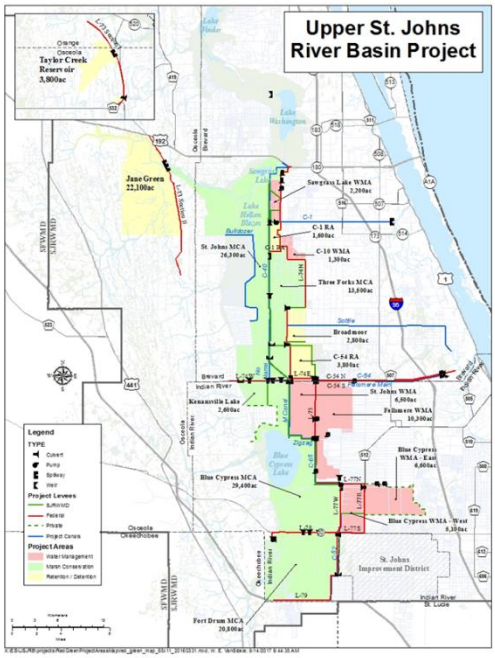
Upper St. John's River

Initiative/Project Title:

Upper St. John's River Basin Project



Watershed Location:

East-Central Florida

Watershed Size:

160,000 acres

Start-End Dates:

- Planning: 1977-1988
- Implementation: 1988-2016
- Monitoring: On-going

Project Highlights:

Once, the Upper St. John's River Basin's headwaters comprised of nearly 400,00 acres of herbaceous marshes and other wetland habitats, but by the mid 70s approximately 62% of the 100-year floodplain had been converted to agricultural land. This development led to ecological degradation, loss of water storage, diminished water quality as a result of nutrient enrichment, decrease in fish and wildlife populations, and exotic/invasive species encroachment.

Techniques Used: The St. John's River Water Management District (District) and US Army Corps of Engineers (ACOE) utilized a "semi-structural" approach in the USJRB project area, and as a result they were able to reclaim and restore over 29,000 hectares of wetlands through floodplain acquisition and the construction of levees, canals, and water control structures.

Expected Benefits: The USJRBP identifies flood protection as the primary goal of the project along with four major environmental objectives: water quality improvement, re-establishment of natural hydrologic patterns, reduction of freshwater discharge to the Indian River Lagoon estuary, and restoration of wetland habitat.

Lessons Learned:

- Detailed and up-to-date elevation data is critical to ensure proper hydrologic functioning.
- Budget money and time into restoration projects to complete contamination assessments and monitoring.
- Engage stakeholders early and often during the process of restoration and come up with creative solutions to allow multiple uses of wetland areas.