SFWMD Lake Okeechobee Projects Update
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Host of restoration work in Lake Okeechobee Watershed moved forward in 2015

- Stormwater Treatment Area (STAs) Operations
- Construction commencement of Lakeside Ranch Phase II
- Kissimmee River Restoration
- Rolling Meadows Wetland Restoration
- Dispersed Water Management Projects
- Other Restoration Initiatives
Northern Everglades STAs

Picture: Taylor Creek STA
Lakeside Ranch STA

- **Purpose:** Total phosphorus (TP) removal from S-191 Basin

- **Phase I – Northern STA & Inflow Pump Station**
  - ~1,200 acres
  - Began operating in 2012
  - STA removed 23 metric tons (MT) of TP in two years (Jul. 2013 – Jun. 2015)
  - During BMAP reporting period (Jan. – Dec. 2015), STA removed 12.5 MT of TP (70% of the total load received)
Lakeside Ranch STA (cont.)

- Phase II – Southern STA & Pump Station (S-191A)
  - ~1,500 acres
- STA under construction
  - USACE permit obtained in July 2015
  - Completion planned by early 2018
  - Planned design removal efficiency – est. 10 MT/yr
- Pump Station is designed
Taylor Creek STA

- Purpose: TP removal from Taylor Creek drainage basin (118-ac treatment area)
  - Operations began in 2008
- As of Dec. 2015, STA retained ~7 MT of TP over its 68 months of flow-through operations (35% of total load received)
- During BMAP reporting period (Jan. – Dec. 2015), STA removed 1.5 MT of TP (60% of the total load received)
- **Purpose:** TP removal from Nubbin Slough drainage basin (773-ac treatment area)

- **2015 Status**
  - Modifications and repairs were recently completed
  - In March 2015, U.S. Army Corps of Engineers transferred this STA to the District.
  - Start-up monitoring under way
Kissimmee River Restoration Project (KRRP)

**Purpose**
- Restore ecological integrity to ~1/3 of river and its floodplain that existed before river channelized (pre-1960s)

**50/50 Cost-Share**
- USACE: Engineering & Construction
- SFWMD/State: Land Acquisition (>102,000 acres) & Restoration Evaluation

**Key Components**
- Backfill 22 miles of C-38 canal
- Reconnect remnant section of original river channel (45 miles)
- Remove 2 water control structures
- Implement Headwaters Regulation Schedule to meet KRRP goals
Kissimmee River Restoration Project (cont.)

- 2015 Status
  - Construction: Last major portions of construction anticipated to be complete in 2020
  - Headwaters planned for implementation after construction is completed (2020)

- Post-construction Activities
  - Mimic historical flows – 2020
  - Restoration Evaluation Program through 2025
    - Evaluate restoration success
Kissimmee River Restoration Project (cont.)

Kissimmee River & Floodplain
Pre/Post Phase I Restoration Area

1954
Looking south in the Phase I restoration area from the Oak Creek floodplain. This photo of the natural historic Kissimmee River and floodplain was taken in 1954 before the river was channelized.

2013
August 15, 2013
Looking south in the Phase I restoration area from the Oak Creek floodplain from the same exact view as the previous historical slide.
Purpose

- Restore historical Lake Hatchineha floodplain wetlands on Rolling Meadows property
  - Storage & Water Quality benefits

2015 Status

Phase I: ~1,900-ac impacted area
- Design and permitting finalized
- Construction began in late 2015, completion by end of 2016

Phase II: ~580-ac wetland area
- Pending future funding
Purpose

• Shallow water storage, retention and detention to enhance lake/estuary health
  • Minimize runoff/discharge
  • Reduce nutrient loads
  • Expand groundwater recharge opportunities

DWM Project Types in BMAP

• Northern Everglades Payment for Environmental Services (NE-PES)
• Florida Ranchlands Environmental Services Projects (FRESP)
• Retention on Private Lands
Nicodemus Slough

- South of Fisheating Creek and West of the Lake
- Operational in 2015
- Largest estimated annual storage benefit (33,860 acre-feet/yr) of any DWM project in BMAP
Lykes West Waterhole Marsh

- Located on the C-41A Canal in the Indian Prairie Sub-watershed
- Operational since 2006
- Estimated BMAP annual TP reduction - 4.17 MT/yr
  - 38% of TP reductions estimated from DWM projects in BMAP
Other Restoration Initiatives

- CERP Lake Okeechobee Watershed Project (LOWP)
  - Focus on regional projects to improve the quantity, quality, timing and distribution of water
  - LOW Project Implementation Report (PIR) identified as one of next CERP studies to be conducted (USACE Integrated Delivery Schedule)
  - USACE’s SMART Planning Feasibility Process expected to begin in 2016

- Lake Low Water Level Habitat Enhancement Plan
  - Drafted a plan that serves as guide for future preparation of event-specific (i.e., drought conditions) habitat enhancement project plans (e.g., prescribed burns)

Moonshine Bay,
Prescribed Cattail Burn
Thank You

Eagle Bay Marsh, Lake Okeechobee Watershed