

The background of the slide is a light blue gradient with several realistic water droplets of various sizes scattered across it. The droplets have highlights and shadows, giving them a three-dimensional appearance.

# **CITY OF CAPE CORAL UTILITIES- IRRIGATION SYSTEM WATER SHORTAGE 2016-2017**

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**2018 SFWMD CONSERVATION EXPO**

**MARCH 2, 2018**

# IRRIGATION SYSTEM OVERVIEW

- ONE OF THE LARGEST IRRIGATION REUSE SYSTEMS IN THE UNITED STATES
- SERVING OVER 49,000 CUSTOMERS
- SEASONAL IRRIGATION DEMAND OF UP TO 42 MGD AND INCREASING





# IRRIGATION SYSTEM OVERVIEW

- 100% WASTEWATER RECLAMATION USED FOR IRRIGATION AND FIRE SUPPRESSION
- STORMWATER BLENDED WITH RECLAIMED WATER FOR IRRIGATION SUPPLY
- 300 MILES OF FRESHWATER CANALS



# STORMWATER (CANAL SYSTEM)

CANAL SYSTEM IMPROVEMENTS WERE  
NEEDED TO CREATE STORAGE:

- RAISED FIXED CREST WEIRS AND ADDED CONTROLS
- INFLATABLE WEIRS PROVIDE ADDED STORAGE AND FLOOD CONTROL
- PUMPING INTERCONNECTS CONVEYS WATER FROM OTHER BASINS





# STORMWATER (CANAL SYSTEM)

- OVER 1 BILLION GALLONS OF STORAGE ADDED
- EXCESS STORMWATER DISCHARGES TO ESTUARINE ENVIRONMENT REDUCED



# RECLAMATION FACILITIES

## SOUTHWEST WATER RECLAMATION FACILITY

### SOUTHWEST WRF

- 15 MGD – UPDATED 2010
- 6.5 MGD AVERAGE
- 100% RECLAIMED WATER
- 15 MG RECLAIMED STORAGE





# RECLAMATION FACILITIES

## SOUTHWEST WATER RECLAMATION FACILITY

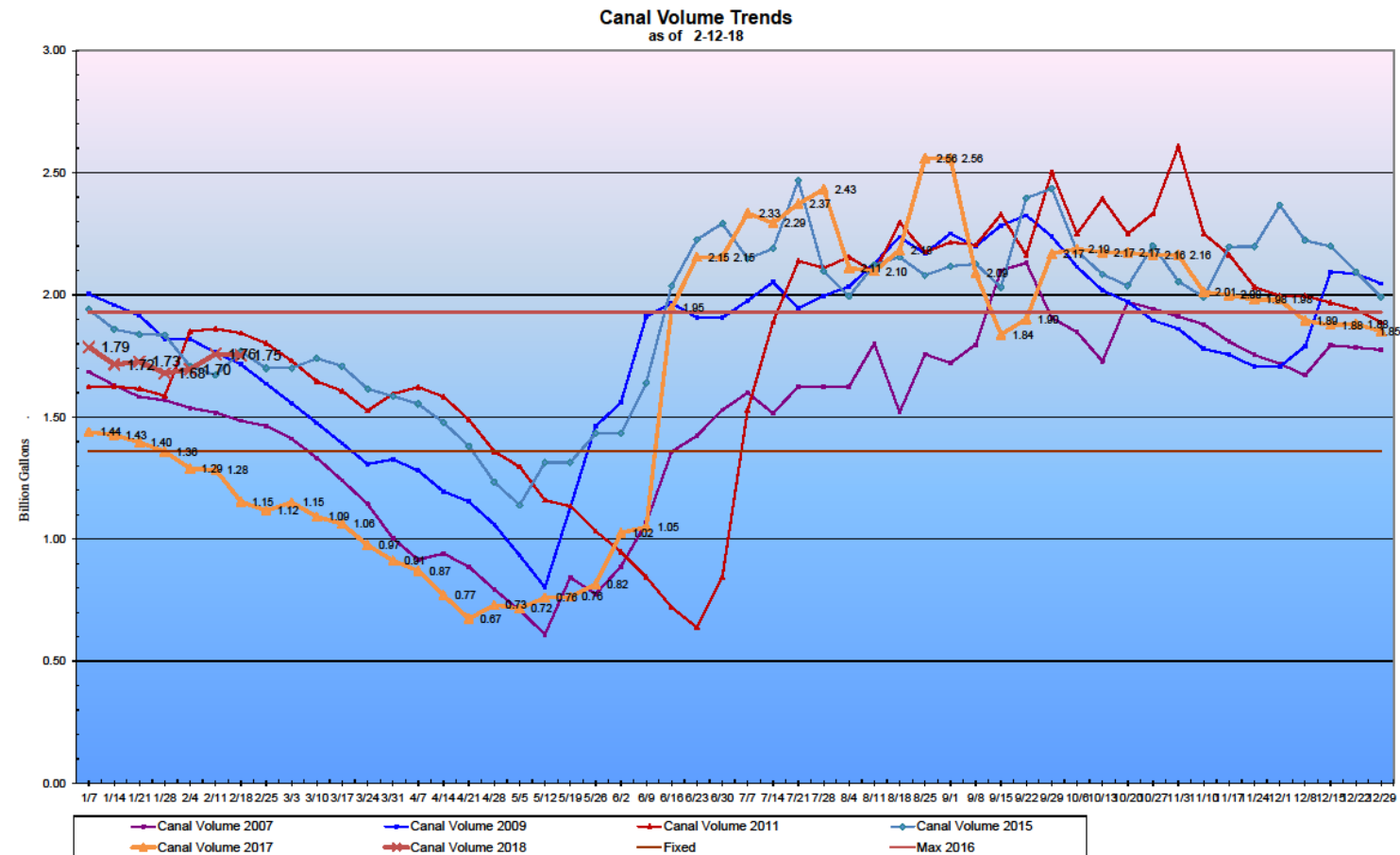
### EVEREST WRF

- 13.4 MGD – UPDATED 2008
- 6.7 MGD AVERAGE
- 100% RECLAIMED WATER
- 10 MG RECLAIMED STORAGE



# 2016-2017 WATER SHORTAGE OBSERVATIONS

- November 2016-Driest month on record since recordkeeping began in 1932
- We observed canal volume trends decreasing
- Complaints from residents increasing
- Rainfall was well below historical monthly average of 2 inches for Southwest Florida





# 2016-2017 WATER SHORTAGE OBSERVATIONS

- Governor Scott declared State of Emergency as a result of large number of wildfires due to extreme dry conditions
- Irrigation system demands increased due to lack of rainfall



# IRRIGATION RESTRICTIONS

## Cape Coral Year-Round Watering Schedule

All residents in Cape Coral can water two days each week regardless of the source for the irrigation water. If you use the City's dual-water system or a private well, you must follow the two-day watering schedule. See the schedule below for your days and times.

The "address" is the last number of your "house" address. For example, if your address is 1926 SW 15th Avenue, the "6" in 1926 is the guiding number.

Here is the two-day schedule that is in effect for all of Cape Coral:

Monday and Friday: Midnight to 4 a.m. for addresses ending in 0

Monday and Friday: 4 a.m. to 8 a.m. for addresses ending in 1

Wednesday and Saturday: Midnight to 4 a.m. for addresses ending in 3 and 5

Wednesday and Saturday: 4 a.m. to 8 a.m. for addresses ending in 7 and 9

Thursday and Sunday: Midnight to 4 a.m. for addresses ending in 2 and 4

Thursday and Sunday: 4 a.m. to 8 a.m. for addresses ending in 6 and 8

TWO DAY PER  
WEEK WATERING



# § 19-94 WATERING VIOLATION PENALTIES

VIOLATION OF ANY PROVISION OF THIS ARTICLE WITHIN A CONSECUTIVE 12-MONTH PERIOD SHALL RESULT IN THE FOLLOWING PENALTIES:

- |  |                    |
|--|--------------------|
| (A) FIRST VIOLATION:                   | <u>NO FINE</u>     |
| (B) SECOND VIOLATION:                  | <u>\$100 FINE</u>  |
| (C) THIRD VIOLATION:                   | <u>\$200 FINE</u>  |
| *(D) FOURTH AND SUBSEQUENT VIOLATIONS: | <u>\$400 FINE.</u> |



\*A DUAL WATER CUSTOMER MAY ALSO BE DISCONNECTED

# ACTIONS TAKEN & LESSONS LEARNED

- BEGAN CONSERVATION RELATED PRESS RELEASES-DECEMBER 2016
- CITY WATER/WASTEWATER OPERATORS ASSISTED CODE ENFORCEMENT W/CUSTOMER EDUCATION AND CITATION ISSUANCE
- NOV. 2016-JUNE 2017 RESULTED IN 12,806 TOTAL CITATIONS





# ACTIONS TAKEN & LESSONS LEARNED

- 11,962-1<sup>ST</sup> OFFENSE (ACTIVE WATERING OR WET SURFACE OBSERVED)
- 809-2<sup>ND</sup> OFFENSE (ACTIVE WATERING OR WET SURFACES OBSERVED)
- 34-3<sup>RD</sup> OFFENSE (ACTIVE WATERING OR WET SURFACES OBSERVED)
- 1-4<sup>TH</sup> OFFENSE (ACTIVE WATERING)



# ACTIONS TAKEN & LESSONS LEARNED

- MAJORITY OF OFFENSES WERE CORRECTED AFTER FIRST CONTACT W/CUSTOMER
- CITY'S PUBLIC EDUCATION/ COMBINED W/ENFORCEMENT DECREASED CITY'S PEAK DRY SEASON IRR. DEMANDS BETWEEN 7MGD TO 8MGD





The background is a light blue gradient. In the top-left and bottom-right corners, there are several realistic water droplets of various sizes, some overlapping. A faint, large, light-colored circular pattern, resembling a ripple or a stylized sunburst, is centered in the upper half of the image.

**QUESTIONS?**