

Proposed Amended Pumpage Fees

Groundwater Reduction Plan



Groundwater Reduction Plan Overview

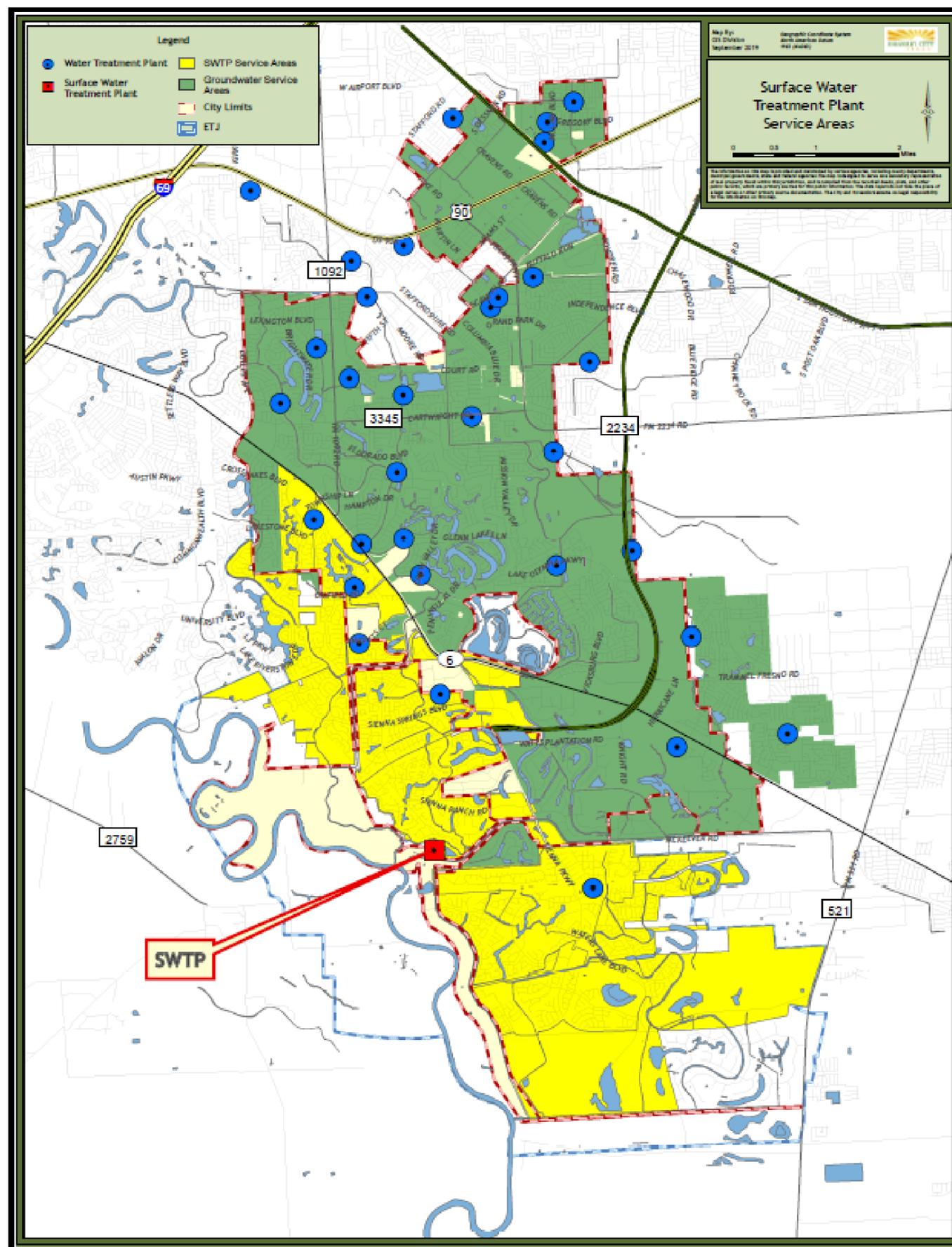
- ❖ Fort Bend Subsidence District (FBSD) created by the Texas State Legislature in 1989
- ❖ FBSD prepared Groundwater Management Plan in 1998
 - The Plan sets forth the following five goals:
 - Provide for the efficient use of groundwater
 - Control and prevent subsidence
 - Address surface water management
 - Address groundwater natural resource issues



Groundwater Reduction Plan Overview

- ❖ Permittee required to submit a Groundwater Reduction Plan (GRP) to FBSD in 2008
- ❖ City is the Administrator of the Missouri City GRP
- ❖ City formed a GRP Oversight Committee to address matters
- ❖ City GRP includes Missouri City and all MUDs in Extra Territorial Jurisdiction
- ❖ Fort Bend Subsidence District Mandates Groundwater Reduction
 - 30% Reduction of Groundwater by 2013
 - 60% Reduction of Groundwater by 2025





Regional Surface Water Treatment Plant



- ❖ Built in 2012 with a plant capacity at 10 Million Gallons/Day (MGD)
- ❖ Current expansion project to 20 MGD (Phase II)
- ❖ Next expansion ~ 33 MGD (Phase III) ?



Groundwater Reduction Plan Costs

- ❖ Daily Surface Water Treatment Plant Costs
 - Purchase of raw water
 - Operations
 - Maintenance
- ❖ Annual Capital Improvement Projects Costs
 - Engineering & Design
 - Construction
- ❖ Fort Bend Subsidence District Mandate Costs
 - Plant Expansions (Phases I, II, III, etc.)



FY2021 Pumpage Fee (Proposed) Overview

- ❖ GRP FY2021 Proposed Fee Analysis Criteria
 - Evaluated actual data from FY2018 and FY2019
 - Projected data for FY2020 thru FY2021
 - Used FY2021 proposed budget with some adjustments



FY2021 Data vs FY2018 Data

- ❖ Total expenses have increased by \$1,848,652 (17%)
 - FY2021 projected expenses are \$12,482,930
- ❖ Total projected revenue has increased by \$1,385,049 (13%)
 - FY2021 projected revenue required is \$10,469,164

Bases for proposed rate increase



FY2021 Data vs FY2018 Data

- ❖ Surface Water operational expenses have increased by \$1,191,304
 - FY2021 projected expenses are \$10,496,164
- ❖ Groundwater production cost has increased by \$463,602
 - FY2021 projected expenses are \$1,793,021

Bases for proposed rate increase



Groundwater User's Fee Analysis

2019 Average Cost per 1,000 Gallons (Jan. to Dec.)						
Entity	Cost/1,000 Gals	Active Wells	Gallons Produced	Chemical Costs	Electrical Costs	Maintenance Costs
QVUD	\$0.57	3	451,194,000	\$5,934.55	\$98,467.81	\$131,936.78
Palmer MUD 2	\$0.67	1	116,460,000	\$1,531.78	\$25,416.04	\$47,373.25
Palmer MUD 1	\$0.64	1	127,171,000	\$1,672.66	\$27,753.58	\$47,438.16
COMC Mustang Bayou	\$0.52	2	367,001,000	\$4,827.16	\$71,414.68	\$95,559.07
Fort Bend MUD 42	\$0.52	2	175,773,000	\$2,319.08	\$38,478.90	\$45,738.36
Fort Bend MUD 26	\$0.63	1	121,686,000	\$1,600.55	\$26,556.55	\$47,404.92
Blue Ridge West MUD	\$0.63	1	245,962,000	\$3,235.14	\$53,678.34	\$94,825.58
First Colony MUD 9	\$0.54	2	333,222,000	\$4,382.86	\$72,721.81	\$100,571.78
Fort Bend MUD 23	\$0.62	4	497,858,000	\$6,548.32	\$108,651.68	\$189,687.11
Totals	\$5.34	17	2,436,327,000	\$32,052.10	\$523,139.39	\$800,535.01
Average Cost per 1,000 Gals	\$0.59					

This calculation was reached by evaluating twelve months (Jan. to Dec.) of monthly production operating statements data from 2019. The attached data was taken from fourteen (14) GRP Participants groundwater well groupings. Five (5) of the well groupings were then omitted from the final calculations because of data anomalies. The final data set included nine (9) groundwater well groupings.



Pumpage Fee Calculation (Current Rate)

$$\text{Pumpage Fee} = \frac{\text{Cost of Surface Water} + \text{Cost of Groundwater}}{\text{Volume (1,000 gallons) of Surface} + \text{Groundwater}}$$

Less the groundwater users fee (\$**0.47**/1,000 gallons) for non-converting MUDs

Current Wholesale (Groundwater) pumpage fee is \$**1.72**/1,000 Gallons

Current Surface Water pumpage fee is \$**2.19**/1,000 Gallons

FBSD disincentive fee is \$6.50/1,000 Gallons



Pumpage Fee Calculation (Proposed Rate)

$$\text{Pumpage Fee} = \frac{\text{Cost of Surface Water} + \text{Cost of Groundwater}}{\text{Volume (1,000 gallons) of Surface} + \text{Groundwater}}$$

Less the groundwater users fee (\$**0.59**/1,000 gallons) for non-converting MUDs

Current Wholesale (Groundwater) pumpage fee is \$**1.79**/1,000 Gallons

Current Surface Water pumpage fee is \$**2.31**/1,000 Gallons

FBSD disincentive fee is \$6.50/1,000 Gallons



GRP Pumpage Fees Comparison (\$ per 1,000 gallons)

	Current	Proposed
City of Missouri City	2.19	2.38
North Fort Bend Water Authority	4.30	
City of Richmond	2.42	
City of Rosenberg	2.60	



GRP Proposed Pumpage Fees (\$ per 1,000 gallons)

	Current	Proposed	\$ Change	% Change
Surface Water Pumpage Fee	2.19	2.38	0.19	8.68
Groundwater User's Fee	0.47	0.59	0.12	25.53
Groundwater Pumpage Fee	1.72	1.79	0.07	4.07



Questions

