I hereby certify that the following agenda was posted at least 72 hours prior to the time of the meeting so noticed below at 24251 Los Alisos Boulevard, Lake Forest, California.

Robert R. Hill, Secretary
of the El Toro Water District and
of the Board of Directors thereof

A G E N D A

EL TORO WATER DISTRICT
BUDGET COMMITTEE #2 MEETING
April 1, 2019
3:30 p.m.

1. **CALL MEETING TO ORDER** – Director Freshley

2. **ORAL COMMENT AND PUBLIC COMMUNICATIONS**

   Members of the public may address the Committee at this time or they may reserve this opportunity with regard to an item on the agenda, until the Committee discusses said item later in the meeting.

3. **REVIEW MINUTES OF THE MARCH 20, 2019 BUDGET COMMITTEE #1 MEETING**

   The Committee will consider approving the March 20, 2019 Budget Committee minutes.

4. **EL TORO WATER DISTRICT DRAFT 2019/20 BUDGET, COST OF SERVICE IMPLICATIONS AND THE PROPOSITION 218**

   The Committee will review and discuss the Draft 2019/20 Budget, Cost of Service implications and the Proposition 218.

5. **ADJOURNMENT TO THE THURSDAY, APRIL 18, 2019 BOARD BUDGET WORKSHOP at 7:30 a.m.**

The agenda material for this meeting is available to the public at the District's Administrative Office, which is located at 24251 Los Alisos Blvd., Lake Forest, Ca. 92630. If any additional material related to an open session

agenda item is distributed to all or a majority of the board of directors after this agenda is posted, such material will be made available for immediate public inspection at the same location.

Request for Disability-Related Modifications or Accommodations

If you require any disability-related accommodation, including auxiliary aids or services, in order to participate in this public meeting, please telephone the District's Recording Secretary, Polly Welsch at (949) 837-7050, extension 225 at least forty-eight (48) hours prior to said meeting. If you prefer, your request may be submitted in writing to El Toro Water District, P.O. Box 4000, Laguna Hills, California 92654, Attention: Polly Welsch

MEMO

TO: BOARD OF DIRECTORS

FROM: *STAFF & BOARD BUDGET COMMITTEE*

DATE: April 11, 2019

SUBJECT: 2019/20 FINAL BUDGET, WATER, SEWER AND RECYCLED WATER COST OF SERVICE STUDY FINAL REPORT, FINAL PROPOSITION 218 NOTICE

The 2019/20 Budget (Revenue, Expense and Rate Schedule) proposal is the result of:

- Considerable departmental and management review and scrutiny of current and projected expenses and revenue requirements, the 2019/20 Budget and Cost of Service Study Report (COS); and
- Two in depth Budget Meetings with the Board Designated Budget Committee

Expenses and revenues are based upon historical budget to projected actual experience, projected resource/asset investment requirements and certain underlying assumptions regarding internal and external factors. Internal factors include our operating strategy, implementation/operation of existing and new resources and planned capital replacement and refurbishment projects/programs. External factors include our best estimate of expenses that are generally out of our control, i.e. purchased water, energy, insurance, interest rates, SOCWA, regulatory mandates/fees and inflation.

The Operating Budget and Ten-Year Cash Flow incorporates the spirit of the Board established revenue, rate and reserve Financial Objectives and Strategic Financial Planning Principles.

Financial Objectives:

- Establishing a revenue cash flow plan sufficient to fund the Operating Budget inclusive of the Capital R&R Program
- Establishing a reliable, stable and predictable rate adjustment strategy that minimizes impacts to customers
- Maintaining minimum reserve levels sufficient to fund legally restricted, board restricted and board designated requirements
- Employing cost containment and reduction strategies and practices as appropriate to cost effectively maintain reliable service levels

Strategic Financial Planning Principles:

- Annual MWDOC/Met pass-thru as necessary
- Annual Cost of Service evaluation and adjustments as necessary
- An overall annual revenue increase for the three enterprises (Water, Sewer and Recycled Water) capped at 5%
- Individual enterprise rate or charge increases capped at 10%
- Maintenance of a minimum Board Designated Reserve level of $8.5 million
- Prudent use of reserves to minimize customer impact while maintaining required minimum debt coverage ratios

Customer Sensitivity Analysis:

As part of the annual Budget process each year staff performs a sensitivity analysis to quantify the implications of assumptions and proposed fiscal results on certain customer classes. Based upon the below 2019/20 assumptions and fiscal results, the sensitivity analysis produces the following "Total" Monthly and/or Annual Bill increases:

Single Family Residential (SFR)
SRF "Total" Monthly Bill, assuming 15 CCF usage per month within their calculated water budget, would increase $2.52 per month or 2.8%.

Laguna Woods Village Associations
Annual "Total" Bill increase to Associations within Laguna Woods Village would range from 1.4% to 2.2%.

Laguna Village Association
Annual "Total" Bill increase would be 2.8%.

Cities
Annual "Total" Bill increase to Cities would range from 2.7% to 3.6%.

Note: *Increases are influenced by the number and size of meters, water usage within tiers and whether the customer has any sewer service accounts.*

2019/20 Budget Assumptions:

- Potable Water Sales 7,050 AF/Potable Water Purchases 7,350 AF
- Potable Water Purchase Sources (Met/MWDOC & Baker WTP)
    - 3,992 AF Met (54.3% of total purchases)
    - 3,358 AF Baker WTP (45.7% of total purchases)
- Recycled Water Sales 1,450 AF
    - Assumes 150 AF deliveries from Phase II Recycled Water Distribution System Expansion Project
- Inclusion of a Performance Based Merit Pool consistent with established policy
    - 2019/20 budget at 6.9% of total salaries
    - 3% merit and 3.9% CPI adjustment to total 2019/20 salaries and ranges
- Potable and Recycled Water Commodity (usage) rate increase based on MWDOC/MET/Baker pass-thru
- Potable and Recycled Water Fixed O&M Meter and Fire Service charge increase
- No Sewer rate increase
- No increase to the existing Water, Sewer and Recycled Water Capital R&R charges
- Prudent use of reserves to achieve a total revenue increase below 5%
- Projected 5% - 7% increase to medical premiums for PPO, HMO and Kaiser
- Property Tax Revenue based upon projected 2018/19 Collection Experience
- No budgeted ACWA JPIA or SOCWA refunds

2019/20 Fiscal Results (Proposed Rate/Charge increases based upon the independently prepared Cost of Service Study Report):

- Total Cost of Service Revenue Increase $345,740 or 2.4%
    - $317,000 Water enterprise
    - $0 Sewer enterprise
    - $28,740 Recycled Water enterprise
- Total labor increase inclusive of base salaries, the performance based merit pool, benefits and workers compensation premiums is $258,245 or 3.1%
- Fixed O&M meter charge increases for Water and Recycled Water capped at 9.9%
- MWDOC/Met Pass-Thru Water Supply component of each Tier increases by $0.06/CCF representing an average of 2.3%
- Flat Recycled Water Commodity rate increases by $.05/CCF or 1.9%
- No Sewer rate increase
- No increase in the Water, Sewer or Recycled Water Capital Replacement and Refurbishment Charges.
- AV Tax Revenue increased from $875,000 to $925,000

- Restricted Reserve Revenue for Conservation and RW $944,000
- Unrestricted Reserve Draw-down at $455,185
    - Ensures total revenue increase is below 5%
- Ending Reserve balance, less Legally Restricted Reserves, $13,637,053 well above the Board established $8.5 million minimum
- Debt Coverage Ratio 143% (SRF requirement 120%)

In addition to a power point presentation, the following Reference Material/Worksheets are provided to facilitate discussion at the meeting:

1) Budget Committee #2 Minutes
2) Purchased Water Cost Analysis with Rate Impact Breakdown
3) Labor Cost Analysis
    - Labor Financial Summary
    - Organizational Chart
    - Organization Position Table
4) Medical Insurance Premium Analysis
5) O&M Cost Center Budget Comparison and Analysis
6) Ten-Year Cash Flow
7) Multi-Year P/L Budget to Actual Comparison
8) Five-Year Capital Project and Equipment Program Budget
9) Proposed Water, Sewer and Recycled Water Rates and Charges
10) Customer Sensitivity Analysis
11) Water, Sewer and Recycled Water Cost of Service Study Report
12) Draft Proposition 218 Notice
13) Budget Book
14) Approved Budget/218/Hearing Schedule

Recommended Action: Subject to Board input, Staff and the Committee recommend that the Board of Directors approve the El Toro Water District:

a. 2019/20 Operating Budget
b. 2019/20 Water, Recycled Water, and Wastewater Rate Study dated April 9, 2019
c. 2019/20 Proposition 218 Notice and authorize distribution of same in accordance with applicable public noticing requirements
d. Authorize noticing of a Rate Public Hearing to be scheduled for June 27, 2019

BUDGET COMMITTEE #2

MINUTES

MINUTES OF THE BUDGET COMMITTEE MEETING #2
OF THE
EL TORO WATER DISTRICT

April 1, 2019

Chairperson Freshley called the meeting of the Budget Committee of the Board of Directors of the ELTORO WATER DISTRICT to order at 3:30 p.m. on April 1, 2019 at the El Toro Water District Administrative Offices, 24251 Los Alisos Boulevard, Lake Forest, California.

Directors KATHRYN FRESHLEY and MARK MONIN were present.

Also present were ROBERT R. HILL, General Manager, DENNIS P. CAFFERTY, Assistant General Manager/District Engineer, JUDY CIMORELL, Human Resources Manager, and NEELY SHAHBAKHTI, Finance Manager/Controller.

ORAL COMMUNICATIONS - PUBLIC COMMENT

Chairperson Freshley stated that at this time members of the public may address the Board or they may reserve this opportunity with regard to an item on the agenda, until said item is discussed by the Board later in the meeting.

There were no comments received.

APPROVAL OF MINUTES

The Committee reviewed and approved the minutes of the March 20, 2019 Budget Committee #1 meeting.

ETWD DRAFT 2019/20 BUDGET

Staff noted the various Worksheets presented in Committee #1 are included in the agenda material. Staff identified a minor change in the Cash Flow Work Sheet to reflect the revenue increase cap at 5%. Staff noted this change involved spreading

the proposed capital charge increase in the later years over three years instead of two in order to comply with the revenue increase cap.

Staff and the Committee also reviewed and discussed the:

- Draft Five-Year Capital; R&R Plan
- Draft Proposition 218 Notice
- Draft Board Workshop Power Point Presentation
- Approved Budget and Public Hearing Schedule

The Committee directed staff to address the following questions at the Board Budget Workshop:

- Provide further detail on proposed Motor Control Center capital projects
- Evaluate the number of vehicles in the District's fleet
- Provide further detail on the large SOCWA Capital Cost in the 23/24 fiscal year
- Explain the Sewer Capital Charge for the Public Authority Class
- Provide a comparison of the 18/19 rate increase to the proposed 19/20 rate increase in the Power Point presentation

Staff and Committee consensus was reached on the proposed Budget assumptions and fiscal implications of same. Staff was directed by the Committee to finalize the Draft Budget, Draft Cost of Study Report, Draft Proposition 218 Notice, Board Budget Workshop Power Point Presentation for review and discussion at the April 18, 2019 Board Budget Workshop. Further, Staff and Committee confirmed dates for distribution of the Proposition 218 Notice and the Public Hearing to consider proposed increases to certain fees, rates and charges. Staff and Committee agreed

that at the Board Budget Workshop the following 2019/20 approval actions would be considered for the:

- Draft Budget
- Draft Cost of Study Report
- Draft Proposition 218 Notice
- Authorization to notice a Proposition 218 Public Hearing for June 27, 2019.

ADJOURNMENT

There being no further business to come before the Board the following motion was duly made and passed:

MOTION: Chairperson Freshley moved, seconded by Director Monin that today's meeting be hereby adjourned at 4:30 p.m.

Respectfully submitted,

_____
Dennis P. Cafferty, Assistant Secretary

APPROVED:

_____
KATHRYN FRESLEY, Chairperson of
the Budget Committee of El Toro Water
District Board of Directors

_____
DENNIS P. CAFFERTY, Assistant Secretary
of the El Toro Water District and
the Board of Directors thereof

PURCHASED WATER

COST ANALYSIS

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RATE IMPACT BREAKDOWN

EL TORO WATER DISTRICT
2019/20 PURCHASED WATER BUDGET

		2018/19 Budget		2018/19 Projected Actual		2019/20 Budget	
		Jul 2018	Jan 2019	Jul 2018	Jan 2019	Jul 2019	Jan 2020
1	Total Period Demand (AF)	4,000	3,500	4,060	3,483	3,925	3,425
2	Total Annual Demand (AF)		7,500		7,543		7,350
3	MWD Period Demand (AF)	2,321	1,821	2,333	1,688	2,246	1,746
4	MWD Annual Demand (AF)		4,142		4,021		3,992
5	**MWD Untreated Commodity Rates**						
6	System Access Rate	299.00	326.00	299.00	326.00	326.00	346.00
7	System Power Rate	132.00	127.00	132.00	127.00	127.00	136.00
8	Water Stewardship Rate	55.00	69.00	55.00	69.00	69.00	65.00
9	MWD Tier 1 Rate	209.00	209.00	209.00	209.00	209.00	208.00
10	**Subtotal Untreated Full Service**	**695.00**	**731.00**	**695.00**	**731.00**	**731.00**	**755.00**
11	Treatment Surcharge	320.00	319.00	320.00	319.00	319.00	323.00
12	**Total Treated Full Service Rate**	**1,015.00**	**1,050.00**	**1,015.00**	**1,050.00**	**1,050.00**	**1,078.00**
13	**Total Treated Full Service Annual Cost**	**2,355,815**	**1,912,050**	**2,367,792**	**1,772,280**	**2,358,300**	**1,882,188**
14	**MWD Fixed Charges**						
15	Capacity Reservation Charge	72,126	71,297	71,569	56,610	56,610	58,200
16	Readiness To Serve Charge	228,318	216,902	212,924	197,838	197,838	202,200
17	**Total MWD Fixed Charges**		**588,643**		**538,941**		**514,848**
18	**Total MWD Cost**		**4,856,508**		**4,679,013**		**4,755,336**
19	**Total MWD Unit Cost ($/AF)**		**1,173**		**1,164**		**1,191**
20	**MWDOC Connection Rate ($/meter)**	**12.25**		**12.25**		**12.50**	
21	ETWD Meters	9,562		9,568		9,568	
22	**MWDOC Connection Charge ($)**		**117,135**		**117,208**		**119,600**
23	**Baker Water Treatment Plant**						
24	Period Demand (AF)	1,679	1,679	1,728	1,795	1,679	1,679
25	Annual Demand (AF)		3,358		3,522		3,358
26	**Baker Raw Water Cost**	**1,166,905**	**1,227,349**	**1,200,613**	**1,312,086**	**1,227,349**	**1,267,645**
27	Baker O&M Unit Cost (per AF)	182	182	172	182	187	187
28	SCP Surcharge	8.38	8.38	8.14	8.14	8.38	8.38
29	SAC Surcharge	1.12	1.12	1.12	1.12	1.15	1.15
30	**Baker O&M Annual Cost**	**321,536**	**321,536**	**313,127**	**343,296**	**330,759**	**330,759**
31	Baker Capital Cost (Debt Service)	342,131	342,131	342,131	342,131	342,131	342,131
32	**Total Period Baker Water Treatment Plant Cost**	**1,830,572**	**1,891,016**	**1,855,870**	**1,997,513**	**1,900,239**	**1,940,535**
33	**Total Annual Baker Water Treatment Plant Cost**		**3,721,587**		**3,853,383**		**3,840,775**
34	**Baker Water Treatment Plant Unit Cost($/AF)**		**1,108**		**1,094**		**1,144**
35	**Capital Charge Revenue Funding**		**(600,000)**		**(600,000)**		**(600,000)**
36	**Total Baker Water Treatment Plant Cost**		**3,121,587**		**3,253,383**		**3,240,775**
37	**Total Purchased Water Cost**						
38	MWD		4,856,508		4,679,013		4,755,336
39	MWDOC		117,135		117,208		119,600
40	Baker		3,121,587		3,253,383		3,240,775
41	**Total Purchased Water Cost**		**8,095,230**		**8,049,604**		**8,115,711**
42	**Total Expense (Less Baker Debt Service)**		**8,010,968**		**7,965,342**		**8,031,449**
43	Percent Increase Budget to Budget per Unit		**0.26%**				2.30%
44	**Overall Imported Water Effective Rate**						
45	Fiscal Year Cost per Acre Foot Purchased		**1,079**		**1,067**		**1,104**
46	Fiscal Year Cost per CCF Purchased		**2.48**		**2.45**		**2.53**
47	Fiscal Year Rate per CCF Sold		**2.58**		**2.55**		**2.64**

EL TORO WATER DISTRICT
2019/20 PURCHASED WATER BUDGET

BUDGET CHANGE & RATE IMPACT BREAKDOWN

Description	Budget	Budget Impact	Rate Impact
1819 Purchased Water Budget - Total Cost	$8,095,230		
Decrease Budget Volume from 7,500 af to 7,350 af		($154,875)	$0.01
MWD Pass Through Rate Increase		$154,443	$0.05
Baker O&M Cost Increase		$18,448	$0.00
MWDOC Rate Increase / Meter Count Increase		$2,466	$0.00
Total	**$8,115,711**	**$20,481**	**$0.06**

LABOR COST ANALYSIS

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ORGANIZATION CHART

2019/20 LABOR BUDGET

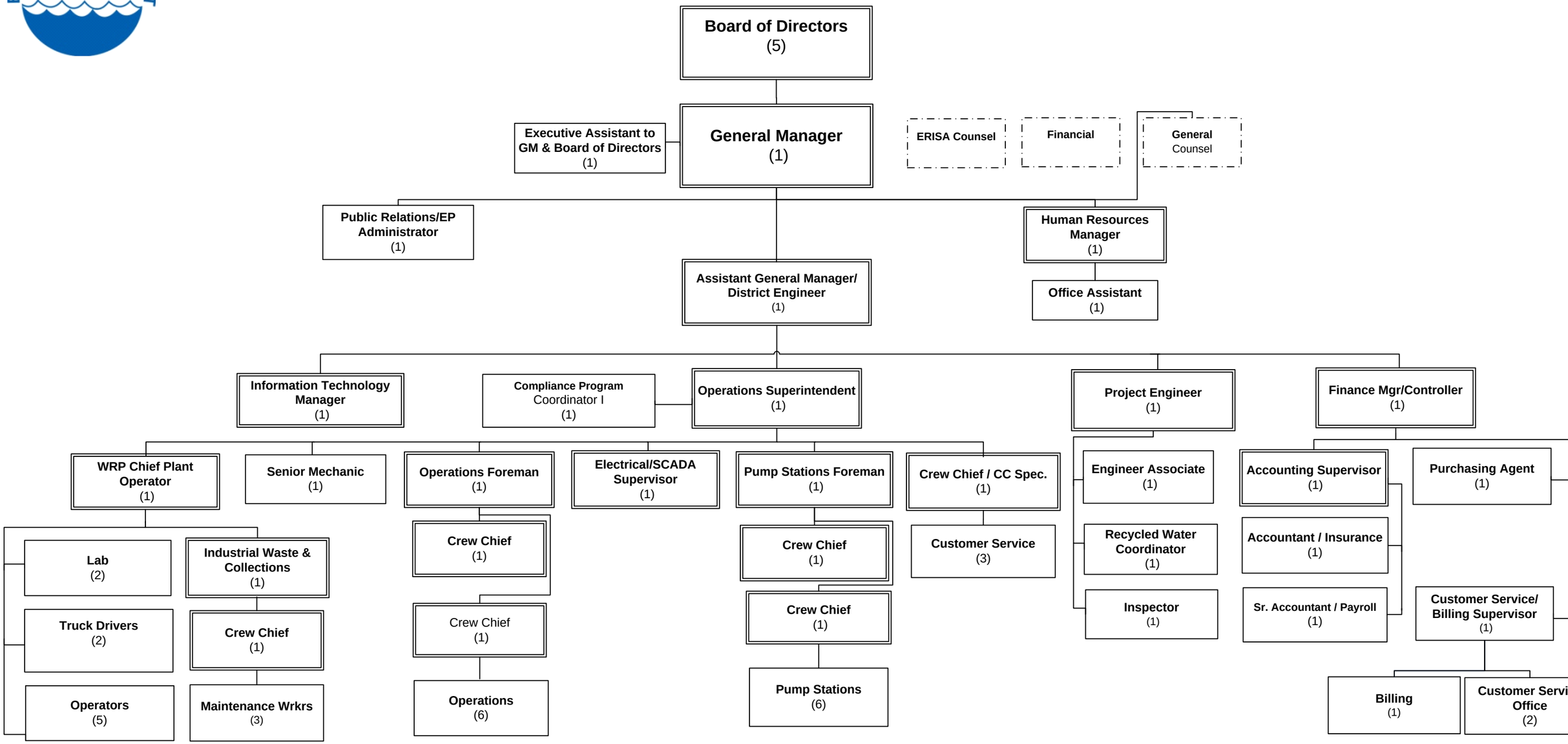
	2018/2019 Budget	2018/2019 Projected	2019/2020 Budget	Delta Budget to Budget	% Change Budget to Budget
Salaries	5,893,903	5,957,082	6,171,106	277,203	4.7%
Benefits (Less Employee Paid)	2,233,934	2,111,892	2,239,977	6,043	0.3%
Workers Compensation	160,000	109,500	135,000	(25,000)	-15.6%
Total Labor Cost	**8,287,837**	**8,178,474**	**8,546,083**	**258,245**	**3.1%**

LABOR BUDGET BREAKDOWN

	2018/2019 Budget	2019/2020 Budget	Delta Budget to Budget	% Change Budget to Budget	Portion of Budget Increase
Salary					
2018/19 Merit		122,656	122,656		1.5%
2019/20 Merit		155,380	155,380		1.9%
2019/20 Top of Range	55,833	74,182	18,349		0.2%
Overtime	175,000	190,000	15,000		0.2%
Cell Phone Allowances			6,300		0.1%
Personnel Changes		(40,662)	(40,662)		-0.5%
Total			**277,023**		**3.3%**
Benefits					
Employee Contribution	(98,049)	(90,707)	7,341		0.1%
Medical	1,162,364	1,115,186	(47,178)		-0.6%
401(k)	953,878	993,983	40,104		0.5%
Other Benefits	215,740	221,515	5,775		0.1%
Total			**6,043**		**0.1%**
Workers Compensation	160,000	135,000	(25,000)		-0.3%
Total Labor			**258,065**		**3.1%**

Assumed Merit Pool	
Merit	3.0%
CPI	3.9%
Total	**6.9%**

EL TORO WATER DISTRICT
2019 / 2020 ORGANIZATIONAL CHART



EL TORO WATER DISTRICT
ORGANIZATION CHART 2019 - 2020

Department	Positions
Administrative Services	
General Manager	1
Asst GM / District Engineer	1
Human Resources Manager	1
Public Relations / EP Admin	1
Exec.Assistant to BOD & GM	1
Administrative Assistant	0
Office Assistant	1
Total	6
Information Systems	
Information Technology Manager	1
Total	1
Accounting	
Manager Finance / Controller	1
Accountant / Sr Accountant	2
Supervisor Accounting	1
Total	4
Purchasing/Receiving	
Purchasing Agent	1
Total	1
Customer Service - Office	
C.S / Billing Supervisor	1
C.S. Office Rep. II / Senior	2
Billing Clerk	1
Total	4
Customer Service - Field	
Crew Chief	1
C.S. Field Rep. III	1
C.S. Field Rep. I	2
Total	4
Engineering	
Project Engineer	1
Engineer Associate	1
Inspector	1
Recycled Water Coordinator	1
Total	4
Electrical	
Electrical Sys/SCADA Supv	1
Total	1

Department	Positions
Operations	
Operations Superintendent	1
Compliance Program Coordinator	1
Total	2
Transmission & Distribution Crew	
Foreman	1
Crew Chief	2
Maintenance Worker III	0
Maintenance Worker ll	2
Maintenance Worker I	4
Total	9
Pumping Crew	
Foreman	1
Crew Chief	2
Maintenance Worker III	4
Maintenance Worker II	1
Maintenance Worker I	1
Total	9
Treatment Plant	
Chief Plant Operator	1
Truck Driver	2
Waste Water Operator III	2
Waste Water Operator II	2
Waste Water Operator I	1
Lab Supervisor	1
Lab Technician I	1
Total	10
Collections & Transmissions	
Industrial Waste Inspector	1
Crew Chief	1
Coll. Maintenance Worker III	1
Coll. Maintenance Worker II	1
Coll. Maintenance Worker I	1
Total	5
Automotive	
Senior Mechanic	1
Total	1
Total Positions	**61**

MEDICAL PREMIUM ANALYSIS

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BUDGET IMPACT BREAKDOWN

2019 / 20 MEDICAL INSURANCE PREMIUM ANALYSIS

Plan	Description	Participants	Employee Share	2019 Medical Insurance Premium (per month)	2019 Employee Cost (per month)	2020 Medical Insurance Premium (per month)	2020 Employee Cost (per month)
HMO	Single (Employee Only)	1	10.0%	$758.68	$76	$811.79	$81
HMO	Couple	4	10.0%	$1,507.46	$151	$1,612.98	$161
HMO	Family	15	10.0%	$2,021.80	$202	$2,163.33	$216
PPO	Single (Employee Only)	4	10.0%	$859.93	$86	$911.53	$91
PPO	Couple	5	10.0%	$1,752.48	$175	$1,857.63	$186
PPO	Family	4	10.0%	$2,262.51	$226	$2,398.26	$240
Kaiser	Single (Employee Only)	10	5.0%	$623.16	$0	$654.32	$0
Kaiser	Couple	8	5.0%	$1,236.43	$62	$1,298.25	$65
Kaiser	Family	9	5.0%	$1,745.45	$87	$1,832.72	$92

Assumes Premium Increases for Each Plan in January 2020

HMO	7%
PPO	6%
Kaiser	5%

2019 / 20 MEDICAL INSURANCE BUDGET ANALYSIS

2018/19 BUDGET	**$1,162,364**
2018/19 BUDGET TO ACTUAL RATE RECONCILIATION	($27,515)
2019 RATE IMPACT FOR 2019/20 FISCAL YEAR	$3,141
2020 BUDGETED RATE IMPACT FOR 2019/20 FISCAL YEAR	$30,917
PERSONNEL CHANGES	($53,720)
SUBTOTAL	**($47,178)**
2019/20 BUDGET	**$1,115,186**

O&M COST CENTER

BUDGET TO BUDGET

COMPARISON & ANALYSIS

2019/20 O&M BUDGET
COST CENTER SUMMARY

	2015/16 Actual	2016/17 Actual	2017/18 Actual	Projected 2018/19	2018/19 Budget	Proposed 2019/20 Budget	Delta Budget to Budget	%	Comments
Source of Supply	7,497,885	7,358,509	8,200,224	8,093,641	8,148,467	8,174,298	25,831	0.3%	Purchased Water (24,000), SAC (6,000), Consultants (5,000), Contractors (7,000), Permits (6,500), Landscape Maint. (4,000), Temp Help (2,500)
Pumping Water	234,959	239,544	261,321	232,464	247,971	256,281	8,310	3.4%	Power (9,600), Repair Parts (5,500), Motor Maint (3,000), Elect Maint (5,700), Meter Maint (1,400), Structure Repairs (3,400), Landscpaing (2,000), Safety Equip (3,300)
Treatment Water	31,909	45,335	49,577	36,603	49,641	40,851	(8,790)	-17.7%	Repair Parts (9,500), Pump Maint (5,000), Meter Maint (1,200), Elect. Maint. (5,500),
Transmission & Distribution Water	391,828	516,443	611,578	571,302	515,692	554,807	39,115	7.6%	Repair Parts (40,000), Elect. Maint. (2,200), Chemicals (1,700), Asphalt (13,100), Contractors (3,400), Permits (12,000), Landscaping (4,300), Small Tools (3,700)
Customer Accounts	3	437	51	0	0	0	0		
Outside Treatment Sewer	884,822	967,590	924,472	956,478	919,750	913,500	(6,250)	-0.7%	SOCWA
Pumping Sewer	364,839	302,746	299,012	348,858	369,848	335,724	(34,124)	-9.2%	Power (3,400), Repair Parts (5,400), Pump Maint. (16,400), Motor Maint. (5,000), Chemicals (5,000), Asphalt Maint (6,000), Contractors (1,000), Permits (2,200), Safety Equipment (15,000)
Treatment Sewer	787,877	724,486	871,379	835,294	762,678	834,349	71,671	9.4%	Power (45,300), Motor Maint. (6,000), Electrical Maint. (3,500), Meter Maint. (2,000), Structure Maint. (5,200), Permits (3,000), Landscape Maint. (24,600)
Transmission & Distribution Sewer	232,481	232,161	198,819	211,565	284,250	279,450	(4,800)	-1.7%	Repair Parts (5,000), Chemicals (7,500), Asphalt (2,000), Small Tools (5,000),
Operations Support	250,641	257,792	741,298	241,867	232,911	256,466	23,555	10.1%	Elect Maint. (2,000), Landscape Maint. (8,500), Educ & Training (14,000)
Tertiary Treatment Plant	140,615	183,434	244,086	267,329	256,950	296,400	39,450	15.4%	Power (17,500), Motor Maint. (8,500), Elect Maint. (5,000), Chemicals (7,500)
Transmission & Distribution Recycled	112	1,309	4,850	0	0	6,000	6,000		Repair Parts
Fleet	216,090	271,781	238,906	255,231	237,885	271,337	33,452	14.1%	Equip Repairs (23,000), Fuel (5,000), Equip Rental (3,000)
Operations Indirect Costs	0	7,491	30,237	32,092	27,900	33,755	5,855	21.0%	Dam Insurance (4,800), WRP Utilities (1,000)
Information Technology	157,580	185,561	267,006	283,307	262,500	299,000	36,500	13.9%	Data Processing Supplies (13,500), Data Processing Equipment (4,000), Data Processing Consultants (50,000), Software Maint. (4,000)
Administration Direct Costs	295,916	311,517	203,547	192,122	259,850	207,900	(51,950)	-20.0%	Constultants (55,000)
Administration Indirect Costs	4,973,944	6,032,429	6,340,260	6,453,937	6,544,011	6,598,427	54,416	0.8%	Depreciation (170,000), Insurance (66,000), Directors Fees (5,000), Dues & Memberships (11,400), Election Expense (30,000), Interest Expense (37,500), Legal (50,000), Office Supplies (3,200), Printing & Repro (3,000), Public Outreach (73,000), Communication (3,500), Utilities (3,300)
Total	**16,461,500**	**17,638,564**	**19,486,625**	**19,012,088**	**19,120,304**	**19,358,545**	**238,241**	**1.2%**	
Labor	7,927,163	8,355,845	8,400,881	8,178,474	8,287,837	8,546,083	258,246	3.1%	
Total O&M Budget	**24,388,663**	**25,994,409**	**27,887,506**	**27,190,562**	**27,408,141**	**27,904,628**	**496,487**	**1.8%**	
O & M Categories									
Purchased Water (MWD/MWDOC)	7,340,323	6,936,449	7,637,072	7,965,342	8,010,968	8,031,449	20,481	0.3%	
Power	984,350	970,827	1,039,080	1,083,900	1,077,450	1,125,400	47,950	4.5%	
Fuel	83,626	83,083	89,597	101,594	90,000	95,000	5,000	5.6%	
SOCWA	868,213	955,792	911,678	942,978	906,250	900,000	(6,250)	-0.7%	
General & Administration (Direct)	256,133	274,913	166,400	153,522	219,950	167,700	(52,250)	-23.8%	
Indirect Costs	1,355,435	1,450,054	1,496,697	1,595,789	1,758,500	1,722,775	(35,725)	-2.0%	
Interest Expense	397,680	706,683	790,753	769,061	769,061	731,557	(37,504)	-4.9%	
Other O & M	1,797,330	2,192,019	3,005,295	1,995,416	1,981,275	2,107,814	126,539	6.4%	
Labor	7,927,163	8,355,845	8,400,881	8,178,474	8,287,837	8,546,083	258,246	3.1%	
Subtotal	**21,010,254**	**21,925,666**	**23,537,453**	**22,786,076**	**23,101,291**	**23,427,778**	**326,487**	**1.4%**	
Depreciation & Amortization	3,378,409	4,068,743	4,350,053	4,404,486	4,306,850	4,476,850	170,000	3.9%	
Total	**24,388,663**	**25,994,409**	**27,887,506**	**27,190,562**	**27,408,141**	**27,904,628**	**496,487**	**1.8%**	

Total O&M Budget Excluding Purchased Water, Interest, Depreciation & Labor	**5,742,768**	**6,633,371**	**7,499,500**	**6,642,260**	**6,802,486**	**6,850,246**	**47,760**	**0.7%**

Total O&M Budget Excluding Interest, Depreciation & Amortization	**20,612,575**	**21,218,983**	**22,746,700**	**22,017,015**	**22,332,230**	**22,696,221**	**363,991**	**1.6%**

10 – YEAR

CASH FLOW

TEN YEAR REVENUE PLAN AND RESERVE ANALYSIS

		Projected 2018-19	Budget 2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
1	**BEGINNING RESERVE BALANCE**	**14,017,392**	**14,092,237**	**13,637,053**	**13,246,147**	**13,013,385**	**12,985,170**	**12,988,461**	**12,997,297**	**12,999,685**	**13,006,409**	**13,012,222**
	OPERATIONS & MAINTENANCE CASH FLOW											
	O&M REVENUES											
2	Revenue from 18/19 Commodity Rate	8,421,659	8,228,476	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810
3	Revenue from 18/19 Fixed Meter Rate	3,250,123	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504
4	Revenue from 18/19 Fire / Flooding Meters	116,000	128,000	140,600	154,300	169,500	179,000	187,600	196,400	206,700	216,600	227,600
5	Revenue from 18/19 Sewer Service Rate	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000
6	Revenue from Recycled Water 1819 Commodity Rate	1,484,000	1,686,425	1,868,724	1,929,882	1,997,836	2,065,789	2,160,924	2,235,673	2,303,627	2,385,171	2,466,716
7	Revenue from Recycled Water Fixed Meter Rate	227,000	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967
	Additional Service Revenue Required											
	Year / **Rate Action**											
8	2019/20 MWD Pass Through		184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259
9	2019/20 COS Rate Increase		333,740	333,740	333,740	333,740	333,740	333,740	333,740	333,740	333,740	333,740
10	2020/21 MWD Pass Through			272,500	272,500	272,500	272,500	272,500	272,500	272,500	272,500	272,500
11	2020/21 COS Rate Increase			706,000	706,000	706,000	706,000	706,000	706,000	706,000	706,000	706,000
12	2021/22 MWD Pass Through				302,700	302,700	302,700	302,700	302,700	302,700	302,700	302,700
13	2021/22 COS Rate Increase				749,000	749,000	749,000	749,000	749,000	749,000	749,000	749,000
14	2022/23 MWD Pass Through					333,000	333,000	333,000	333,000	333,000	333,000	333,000
15	2022/23 COS Rate Increase					808,000	808,000	808,000	808,000	808,000	808,000	808,000
16	2023/24 MWD Pass Through						333,000	333,000	333,000	333,000	333,000	333,000
17	2023/24 COS Rate Increase						659,000	659,000	659,000	659,000	659,000	659,000
18	2024/25 MWD Pass Through							454,100	454,100	454,100	454,100	454,100
19	2024/25 COS Rate Increase							646,000	646,000	646,000	646,000	646,000
20	2025/26 MWD Pass Through								363,300	363,300	363,300	363,300
21	2025/26 COS Rate Increase								667,000	667,000	667,000	667,000
22	2026/27 MWD Pass Through									363,300	363,300	363,300
23	2026/27 COS Rate Increase									731,000	728,000	730,000
24	2027/28 MWD Pass Through										393,600	393,600
25	2027/28 COS Rate Increase										738,000	780,000
26	2028/29 MWD Pass Through											393,600
27	2028/29 COS Rate Increase											750,000
28	**Total Unrestricted Rate Revenue**	**21,273,782**	**21,814,371**	**22,846,104**	**23,972,662**	**25,196,816**	**26,266,269**	**27,470,104**	**28,583,953**	**29,756,507**	**30,976,551**	**32,256,696**
	Other Sources of Cash											
29	Restricted Reserves Funding of Conservation Program	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000
30	Capital Charge Funding of Baker Debt Service	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000
31	Restricted Reserve Funding of Baker Debt Service	100,000	100,000	100,000	100,000	100,000	100,000					
32	MWD LRP Rebate	250,000	310,000	362,250	362,250	362,250	362,250	362,250	362,250	362,250	362,250	362,250
33	Restricted Reserves Funding of RW Debt Service	557,365	659,853	443,533	399,891	347,854	312,334	255,271	220,361	191,149	157,390	117,824
34	Recycled Water Meter Capital Charge Funding of Debt	115,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000
35	Property Taxes	715,309	750,309	771,084	792,274	813,889	835,937	858,430	881,376	904,787	928,672	953,043
36	Property Taxes (Funds Tier 1 Offset)	209,691	174,691	167,791	160,684	153,364	145,824	138,058	130,059	121,820	113,334	104,593
37	Miscellaneous Revenue	163,080	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000
38	Cellular Site Lease Revenue (Funds Tier 1 Offset)	195,000	230,000	236,900	244,007	251,327	258,867	266,633	274,632	282,871	291,357	300,098
39	Other Income (R-6 Partners)	122,000	124,440	126,929	129,467	132,057	134,698	137,392	140,140	142,942	145,801	148,717
40	MNWD Payment for RW Service to Golf Course	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000
41	Investment Income	325,000	200,000	136,371	132,461	130,134	129,852	129,885	129,973	129,997	130,064	130,122
42	**Subtotal Other Sources of Cash**	**3,363,445**	**3,382,293**	**3,177,857**	**3,154,035**	**3,123,875**	**3,112,762**	**2,980,918**	**2,971,791**	**2,968,815**	**2,961,868**	**2,949,647**
43	**TOTAL O&M REVENUES**	**24,637,228**	**25,196,664**	**26,023,961**	**27,126,698**	**28,320,691**	**29,379,031**	**30,451,022**	**31,555,744**	**32,725,322**	**33,938,419**	**35,206,343**
44	**O&M REVENUE REQUIREMENTS**											
45	Total O & M Expense Budget	22,017,015	22,696,220	23,459,238	24,403,830	25,393,277	26,420,111	27,486,558	28,597,727	29,762,969	30,976,977	32,248,967
	Debt Service											
46	Baker Water Treatment Plant	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263
47	Northline Lift Station	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146
48	Recycled Water SRF Loan - Phase I	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958
49	Recycled Water SRF Loan - Phase II		410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262
50	**Subtotal Debt Service**	**2,545,367**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**	**2,955,629**
51	**TOTAL O&M REVENUE REQUIREMENTS**	**24,562,382**	**25,651,849**	**26,414,867**	**27,359,459**	**28,348,906**	**29,375,740**	**30,442,187**	**31,553,356**	**32,718,598**	**33,932,606**	**35,204,596**
52	**ANNUAL O&M SURPLUS (DEFICIT)**	**74,845**	**(455,185)**	**(390,906)**	**(232,762)**	**(28,215)**	**3,292**	**8,836**	**2,388**	**6,725**	**5,813**	**1,746**
	CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM											
	CAPITAL EXPENDITURES											
53	Capital Replacement & Refurbishment Program	2,367,656	2,367,656	2,367,656	2,367,656	2,467,656	2,767,656	2,767,656	2,767,656	2,767,656	2,767,656	2,767,656
54	**TOTAL CAPITAL EXPENDITURES**	**2,367,656**	**2,367,656**	**2,367,656**	**2,367,656**	**2,467,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**
	CAPITAL PROGRAM REVENUE											
55	Revenue from Current Capital Charge	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656	2,367,656
56	Capital Charge Revenue Increase	0	0	0	0	100,000	100,000	100,000	100,000	100,000	100,000	100,000
57	Capital Charge Revenue Increase	0	0	0	0	0	300,000	300,000	300,000	300,000	300,000	300,000
58								100,000	100,000	100,000	100,000	40,000
59	**Subtotal Capital Charge Revenue**	**2,367,656**	**2,367,656**	**2,367,656**	**2,367,656**	**2,467,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**
60	**TOTAL CAPITAL REVENUE**	**2,367,656**	**2,367,656**	**2,367,656**	**2,367,656**	**2,467,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**	**2,767,656**
61	**ANNUAL CAPITAL SURPLUS (DEFICIT)**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
62	**TOTAL ANNUAL RESERVE IMPACT**	**74,845**	**(455,185)**	**(390,906)**	**(232,762)**	**(28,215)**	**3,292**	**8,836**	**2,388**	**6,725**	**5,813**	**1,746**
63	**ENDING RESERVE BALANCE**	**14,092,237**	**13,637,053**	**13,246,147**	**13,013,385**	**12,985,170**	**12,988,461**	**12,997,297**	**12,999,685**	**13,006,409**	**13,012,222**	**13,013,969**
64	**ANNUAL REVENUE INCREASE**		2.4%	4.2%	4.4%	4.9%	4.8%	4.1%	3.6%	3.7%	3.7%	3.7%
65	**DEBT COVERAGE RATIO**	129%	143%	144%	152%	162%	166%	173%	176%	179%	182%	185%
66	**SIX MONTH OPERATING EXPENSE RESERVE TEST**	11,393,038	11,713,889	12,110,935	12,560,714	13,032,421	13,522,311	14,031,484	14,562,482	15,119,966	15,701,272	16,310,993

67 **ASSUMPTIONS**

O&M Expense Inflated at 3% per Year
Power Expense Inflated at 5% per Year
Admin Expense Inflated at 2.5% per Year
Indirect Expense Inflated at 2% per Year
Labor Expense (including Benefits & Workers Comp) Inflated at 5% per Year
Purchased Water Expense Based on MWDOC/MWD Projections
Capital Charge Revenue from Recycled Meters Used to Fund Recycled Debt Service
Debt Coverage Ration Calculated per SRF Methodology (No Reserves)

Revised 03/29/19

MULTI-YEAR P/L BUDGET

TO

ACTUAL COMPARISON

El Toro Water District
Income Statement

	2015 - 2016		2016 - 2017		2017 - 2018		2018 - 2019							
	Actual	Budget	Actual	Budget	Actual	Budget	Jul - Nov Actual	Jul -Nov Budget	Projected Dec - Jun	Projected 2018-19 Actual	2018 - 2019 Annual Budget	Proposed 2019 - 2020 Budget	Delta Budget	%
Income														
4850 · Allocation Penalty	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
4500 · Contibution in Aid	577,471.28	0.00	85,820.87	0.00	45,853.41	0.00	18,660.89	0.00	0.00	18,660.89	0.00	0.00	0.00	0%
4750 · Capital Facilities Charge	3,002,558.40	3,000,000.00	3,012,474.97	3,000,000.00	3,004,287.78	3,015,000.00	1,252,340.61	1,256,250.00	1,752,727.70	3,005,068.31	3,015,000.00	3,014,656.00	(344.00)	0%
4800 · Commodity Charge	8,535,824.52	9,209,505.00	8,718,545.65	9,209,505.00	9,459,453.09	8,908,451.00	4,444,628.95	4,511,597.26	4,971,649.05	9,416,278.00	9,416,278.00	9,356,441.00	(59,837.00)	-1%
4600 · Water Service Charge	2,591,969.77	2,750,000.00	2,802,962.41	2,865,000.00	3,040,449.04	3,073,290.00	1,373,505.13	1,401,706.25	1,937,494.87	3,311,000.00	3,364,095.00	3,621,504.00	257,409.00	8%
4700 · Sanitary Service	7,011,325.48	7,275,000.00	7,359,924.20	7,450,000.00	7,547,171.14	7,565,000.00	3,273,802.96	3,250,000.00	4,500,000.00	7,773,802.96	7,800,000.00	7,775,000.00	(25,000.00)	0%
4720 · Recycled Water Sales	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
4722 · Recycled Tertiary Sales	940,417.34	1,171,873.00	1,492,518.88	1,444,014.00	1,614,242.25	1,450,000.00	846,686.27	812,121.02	636,867.73	1,483,554.00	1,695,000.00	1,686,426.00	(8,574.00)	-1%
4724 · Recycled Water Service Charge	140,356.89	0.00	186,521.50	194,000.00	205,013.74	208,000.00	93,071.20	93,750.00	133,928.80	227,000.00	225,000.00	318,707.00	93,707.00	42%
4950 · Other Operating Income	56,988.00	37,300.00	125,859.84	55,000.00	137,912.63	55,000.00	20,080.00	22,916.69	143,000.00	163,080.00	55,000.00	55,000.00	0.00	0%
4960 · Other Income	475,890.65	350,000.00	549,450.89	417,500.00	548,319.47	427,500.00	287,201.40	229,062.43	84,850.00	869,618.25	549,750.00	560,000.00	10,250.00	2%
4967 · SMWD	97,056.11	120,000.00	94,528.85	100,000.00	111,601.91	100,000.00	0.00	45,833.31	110,000.00	110,000.00	110,000.00	112,000.00	2,000.00	2%
4970 · MNWD	21,418.68	23,000.00	21,399.90	21,000.00	22,843.29	21,000.00	11,000.00	9,583.31	12,000.00	23,000.00	23,000.00	23,440.00	440.00	2%
4974 · Contract Services - Other	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
4975 · Standby Charge	3,291.71	0.00	1,525.08	0.00	417.93	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
4980 · Interest Income	147,448.01	50,000.00	137,911.87	50,000.00	189,698.37	100,000.00	131,984.18	56,250.00	0.00	325,000.00	135,000.00	200,000.00	65,000.00	48%
4985 · Changes FMV CAMP	0.00	0.00	-49,969.42	0.00	-64,565.50	0.00	37,646.53	0.00	0.00	37,646.53	0.00	0.00	0.00	0%
4986 · Changes FMV LAIF	0.00	0.00	-12,829.29	0.00	-1,132.17	0.00	-9,602.20	0.00	0.00	-9,602.20	0.00	0.00	0.00	0%
4990 · Property Taxes	843,300.63	740,000.00	888,972.64	800,000.00	927,672.30	835,000.00	373,221.07	364,583.31	0.00	925,000.00	875,000.00	925,000.00	50,000.00	6%
4997 · Purchase Discount Taken	1,049.28	0.00	1,362.40	0.00	1,384.80	0.00	782.71	0.00	0.00	782.71	0.00	0.00	0.00	0%
4999 · Uncategorized Income	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
Total Income	24,446,366.75	24,726,678.00	25,416,981.24	25,606,019.00	26,790,623.48	25,758,241.00	12,155,009.70	12,053,653.58	14,282,518.15	27,679,889.45	27,263,123.00	27,648,174.00	385,051.00	1%
Gross Profit														
Expense														
5100 · Personnel Cost	7,927,163.34	7,077,652.00	8,355,845.28	7,495,905.00	8,400,881.02	7,902,953.00	3,243,897.82	3,453,265.55	4,725,208.81	8,178,474.36	8,287,837.25	8,546,083.00	258,245.75	3%
5405 · Water Purchases	7,350,016.28	7,997,953.00	7,244,462.74	7,760,674.00	8,049,609.98	7,691,757.00	3,519,904.69	3,845,357.98	4,669.00	7,973,293.98	8,027,968.00	8,041,949.00	13,981.00	0%
5410 · Electrical Power	984,350.00	1,198,000.00	970,827.26	1,013,100.00	1,039,079.59	964,100.00	486,808.81	448,937.64	0.00	1,083,900.00	1,077,450.00	1,125,400.00	47,950.00	4%
5415 · Repair Parts & Materials	320,797.01	382,350.00	374,060.72	360,285.00	376,377.06	412,470.00	135,357.98	160,668.75	251,649.11	386,507.09	385,605.00	430,332.00	44,727.00	12%
5420 · Equipment Maintenance & Repair	124,662.90	137,600.00	131,383.23	122,720.00	107,002.38	132,550.00	35,214.46	40,862.36	63,214.72	98,429.18	98,070.00	123,125.00	25,055.00	26%
5425 · Pump Maintenance & Repair	130,795.58	112,500.00	155,270.88	130,500.00	128,901.58	152,900.00	44,835.44	52,624.93	85,336.00	130,171.44	126,300.00	113,800.00	(12,500.00)	-10%
5430 · Motor Maintenance & Repair	41,952.60	53,200.00	21,016.64	39,500.00	26,915.18	37,700.00	0.00	10,749.93	24,700.00	24,700.00	25,800.00	26,300.00	500.00	2%
5435 · Generator Maintenance & Repair	0.00	0.00	133.53	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
5440 · Electrical/Contl Maint & Repair	43,289.82	28,000.00	32,013.80	46,000.00	59,061.21	66,000.00	11,543.92	28,958.31	47,553.99	59,097.91	69,500.00	71,650.00	2,150.00	3%
5445 · Meter Maintenance & Repair	2,006.90	1,800.00	2,189.76	5,200.00	3,097.58	2,200.00	0.00	1,458.38	5,259.75	5,259.75	3,500.00	8,000.00	4,500.00	129%
5455 · Chemicals	182,856.77	164,344.00	192,963.81	183,950.00	202,361.27	207,300.00	87,159.46	90,041.69	121,250.00	208,409.46	216,100.00	209,400.00	(6,700.00)	-3%
5460 · Structure Maint & Repair	58,995.59	38,000.00	63,872.02	34,360.00	43,605.15	32,660.00	15,714.08	8,900.00	9,127.00	24,841.08	21,360.00	30,284.00	8,924.00	42%
5465 · Asphalt Maintenance & Repair	77,073.00	71,800.00	112,076.00	107,500.00	109,805.18	73,500.00	41,360.00	40,708.38	70,050.00	111,410.00	97,700.00	92,600.00	(5,100.00)	-5%
5470 · Consultants	67,111.58	76,950.00	169,120.51	126,950.00	606,693.05	137,200.00	8,591.70	47,583.31	49,376.00	57,967.70	114,200.00	63,800.00	(50,400.00)	-44%
5475 · Contractors	1,216,737.77	1,198,279.00	1,252,598.54	1,238,391.00	1,216,861.63	1,314,429.00	451,564.12	512,995.95	748,025.50	1,234,306.18	1,231,190.00	1,219,900.00	(11,290.00)	-1%
5480 · Engineers	94,639.97	157,000.00	60,913.05	87,500.00	126,468.37	85,700.00	8,941.47	31,666.69	74,890.54	83,832.01	76,000.00	76,000.00	0.00	0%
5482 · Dump Fees	16,918.33	25,000.00	18,624.99	20,000.00	19,057.33	16,000.00	4,279.33	6,666.62	8,860.00	13,139.33	16,000.00	16,000.00	0.00	0%
5485 · Laboratory	13,018.90	30,700.00	16,834.48	20,700.00	33,408.14	18,700.00	8,964.78	14,750.00	54,757.00	63,721.78	35,400.00	35,900.00	500.00	1%
5490 · License & Permits	98,275.69	107,825.00	124,904.51	130,675.00	135,422.25	127,680.00	24,449.47	53,680.90	113,923.00	138,372.47	128,835.00	150,393.00	21,558.00	17%
5495 · Gas & Oil	83,626.27	130,000.00	83,083.00	100,000.00	89,597.16	90,000.00	42,330.83	37,500.00	59,263.00	101,593.83	90,000.00	95,000.00	5,000.00	6%
5500 · Equipment Rental	17,611.96	21,000.00	18,539.39	13,200.00	19,871.01	16,400.00	8,484.29	6,833.31	8,464.94	16,949.23	16,400.00	20,100.00	3,700.00	23%
5505 · Landscaping	87,871.05	86,991.00	71,529.12	94,660.00	95,770.97	82,660.00	55,597.96	43,358.31	89,664.00	145,261.96	104,060.00	147,275.00	43,215.00	42%
5510 · Small Tools & Equipment	32,797.00	48,000.00	42,299.93	40,900.00	57,192.07	56,500.00	16,551.07	25,645.81	43,056.98	60,608.05	61,550.00	70,000.00	8,450.00	14%
5515 · Security	17,465.91	22,470.00	16,409.20	19,055.00	25,414.76	19,055.00	10,942.66	7,939.42	9,709.90	20,652.56	19,055.00	19,055.00	0.00	0%
5520 · Operating Supplies	61,893.01	45,000.00	47,418.60	49,500.00	56,989.38	47,500.00	17,416.61	21,666.69	19,875.14	37,291.75	52,000.00	52,000.00	0.00	0%
5525 · Safety Equipment	16,192.54	16,000.00	23,600.05	14,500.00	42,352.30	23,500.00	2,005.64	16,083.31	10,486.00	12,541.64	38,600.00	20,300.00	(18,300.00)	-47%
5530 · Temporary Help	42,358.02	71,000.00	13,283.47	86,500.00	17,210.44	55,000.00	0.00	14,166.62	6,500.00	6,500.00	34,000.00	36,500.00	2,500.00	7%
5535 · Other Employee Cost	110,342.38	85,000.00	129,682.80	88,000.00	125,564.51	79,000.00	52,904.48	37,500.00	59,113.63	112,018.11	90,000.00	89,300.00	(700.00)	-1%
5540 · Depreciation	3,371,563.00	2,900,000.00	4,061,897.60	2,900,000.00	4,343,207.07	4,000,000.00	1,832,350.00	1,791,666.69	2,565,290.00	4,397,640.00	4,300,000.00	4,470,000.00	170,000.00	4%
5545 · Insurance	360,725.99	400,000.00	416,094.35	400,000.00	461,006.45	422,300.00	214,773.14	203,562.57	306,630.21	521,403.35	488,550.00	557,755.00	69,205.00	14%
5555 · Advertising & Publicity	5,390.00	2,500.00	2,952.00	2,500.00	6,760.00	2,500.00	200.00	1,041.69	0.00	200.00	2,500.00	2,000.00	(500.00)	-20%
5560 · Amortization	6,845.88	6,845.00	6,845.88	6,850.00	6,845.88	6,850.00	2,852.45	2,854.19	3,993.55	6,846.00	6,850.00	6,850.00	0.00	0%
5570 · Annual Event	5,083.02	3,200.00	4,991.54	5,200.00	5,045.92	5,350.00	240.84	2,229.19	5,344.23	5,585.07	5,350.00	6,000.00	650.00	12%
5575 · Audit	27,000.00	30,000.00	28,500.00	30,000.00	15,000.00	30,000.00	19,500.00	12,500.00	3,000.00	22,500.00	30,000.00	30,000.00	0.00	0%
5580 · Bad Debts	15,037.06	30,000.00	26,757.99	25,000.00	10,645.55	20,000.00	399.16	8,333.31	11,000.84	11,400.00	20,000.00	20,000.00	0.00	0%
5585 · Bank Charges	48,816.64	48,000.00	53,181.35	48,000.00	58,396.01	54,000.00	27,068.27	23,541.69	36,523.73	63,592.00	56,500.00	57,000.00	500.00	1%
5590 · Data Processing Supply & Access	86,887.69	75,000.00	10,701.72	80,000.00	24,727.20	20,000.00	12,220.15	15,208.38	17,000.00	29,220.15	36,500.00	23,000.00	(13,500.00)	-37%
5595 · Data Processing Equipment	0.00	0.00	35,183.78	0.00	32,653.36	40,000.00	6,164.68	16,666.62	25,000.00	31,164.68	40,000.00	36,000.00	(4,000.00)	-10%
5600 · Data Processing Consultants	5,870.80	40,000.00	34,331.56	75,000.00	64,378.19	50,000.00	29,288.00	10,416.69	35,000.00	64,288.00	25,000.00	75,000.00	50,000.00	200%
5605 · Directors Fees	93,432.00	100,000.00	97,392.00	90,000.00	93,437.00	93,000.00	46,485.00	43,750.00	73,331.00	119,816.00	105,000.00	110,000.00	5,000.00	5%
5610 · Dues & Memberships	67,728.51	80,000.00	70,941.26	80,000.00	92,287.70	35,858.85	34,166.69	51,791.15	87,650.00	87,650.00	82,000.00	93,390.00	11,390.00	14%
5615 · Education & Training	36,319.30	27,500.00	23,971.63	29,500.00	35,432.08	31,500.00	12,390.61	12,187.50	19,584.95	31,975.56	29,250.00	43,000.00	13,750.00	47%
5620 · Election Expense	0.00	0.00	27,709.12	30,000.00	0.00	0.00	0.00	12,500.00	0.00	0.00	30,000.00	0.00	(30,000.00)	-100%
5625 · Employee Service Awards	2,469.67	4,000.00	255.96	4,000.00	2,077.52	4,000.00	1,995.19	2,416.69	3,354.81	5,350.00	5,800.00	3,800.00	(2,000.00)	-34%
5630 · Software Maintenance & Licenses	64,821.16	90,000.00	105,343.46	55,000.00	145,247.66	79,400.00	58,634.23	67,083.31	100,000.00	158,634.23	161,000.00	165,000.00	4,000.00	2%
5640 · Interest Expense	397,679.61	1,138,577.00	706,682.82	1,017,000.00	790,753.14	805,729.00	320,441.90	320,442.06	448,619.10	769,061.00	769,061.00	731,557.00	(37,504.00)	-5%
5645 · Janitorial	33,673.00	38,000.00	34,564.00	33,300.00	33,699.95	34,500.00	14,001.00	14,083.31	20,499.00	34,500.00	33,800.00	33,800.00	0.00	0%
5650 · Legal	145,312.39	150,000.00	140,936.95	150,000.00	85,433.71	150,000.00	42,522.33	62,500.00	50,527.67	93,050.00	150,000.00	100,000.00	(50,000.00)	-33%
5655 · Meets, Conventions & Travel	60,454.64	55,000.00	33,064.47	50,000.00	44,006.56	35,000.00	14,780.97	16,250.00	17,429.03	32,210.00	39,000.00	39,000.00	0.00	0%
5657 · Meets, Conventions & Travel - Directors	0.00	0.00	29,768.19	0.00	24,678.27	26,000.00	16,163.64	11,666.69	11,371.36	27,535.00	28,000.00	29,690.00	1,690.00	6%
5660 · Office Supplies	25,686.24	18,000.00	24,540.20	18,000.00	16,616.48	23,000.00	4,416.54	9,583.31	9,583.46	14,691.70	23,000.00	19,800.00	(3,200.00)	-14%
5665 · Office Support	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0%
5670 · Postage	34,557.25	10,500.00	15,822.59	31,500.00	19,003.63	20,500.00	3,660.25	8,541.69	9,539.75	13,200.00	20,500.00	20,500.00	0.00	0%
5675 · Printing & Reproduction	23,780.93	25,000.00	15,476.22	21,000.00	15,203.04	21,000.00	6,880.20	8,750.00	10,544.80	17,425.00	21,000.00	18,000.00	(3,000.00)	-14%
5680 · Property Tax	4,510.33	6,000.00	4,581.18	5,500.00	4,667.34	5,500.00	2,945.94	2,291.69	1,779.06	4,725.00	5,500.00	5,500.00	0.00	0%
5685 · Public Education & Outreach	133,743.10	200,000.00	111,317.99	287,500.00	118,913.93	240,200.00	35,672.13	93,000.00	72,221.87	107,894.00	223,200.00	150,000.00	(73,200.00)	-33%
5690 · Publications & Subscriptions	7,344.92	3,000.00	2,223.55	3,000.00	2,666.10	3,000.00	1,561.83	1,250.00	-361.83	1,200.00	3,000.00	3,000.00	0.00	0%
5695 · Communications	80,672.57	70,000.00	104,415.36	80,000.00	97,503.99	83,000.00	46,005.70	42,500.00	63,999.30	110,005.00	102,000.00	105,540.00	3,540.00	3%
5700 · Utilities	22,437.40	18,000.00	19,007.27	18,000.00	22,641.68	18,500.00	5,849.86	8,875.00	12,700.00	18,549.86	21,300.00	19,000.00	(2,300.00)	-11%
Total Expense	24,388,663.27	24,953,536.00	25,994,409.30	25,006,075.00	27,887,505.96	26,206,101.85	11,148,451.77	11,938,054.26	10,785,139.90	27,190,562.45	27,408,141.25	27,904,628.00	496,486.75	2%
Net Income	$57,703.48	($226,858.00)	($577,428.06)	$599,944.00	($1,096,882.48)	($447,860.85)	$1,006,557.93	$115,599.32	$3,497,378.25	$489,327.00	($145,018.25)	($256,454.00)	(111,435.75)	77%

FIVE-YEAR

CAPITAL PROJECT AND EQUIPMENT PROGRAM BUDGET

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Source of Supply / Storage Projects								
1	R-2 Reservoir Interior Recoating (E/C)			262,500			262,500	262,500	
2	R-2 Reservoir Exterior Recoating (E/C)			80,000			80,000	80,000	
3	JRWSS Capital Budget	41,309	4,740	975	1,110	66,390	114,524	114,524	
4	Baker WTP Replacement Fund	52,795	52,795	52,795	52,795	52,795	263,975	263,975	
5	R-6 Chlorine & Ammonia Chemical Feed Pump Replacement					110,000	110,000	110,000	
	Total Source of Supply / Storage Projects	94,104	57,535	396,270	53,905	229,185	830,999	830,999	0
	Pumping (Water) Projects								
1	P-3 New MCC w/ TS, Nema 3R Main & Generator and Pump Replacements	480,000					480,000	480,000	
2	Water Stations PLC Upgrade to Control Logix	25,000	25,000				50,000	50,000	
	Total Pumping (Water) Projects	505,000	25,000	0	0	0	530,000	530,000	0
	Pumping (Water) Equipment								
1	Spare Rectifier for Chlorine Generators	15,000					15,000	15,000	
2	Cherry Booster Station Pump Replacement		100,000				100,000	100,000	
3	Shenandoah Booster Station Pump Replacement		100,000				100,000	100,000	
	Total Pumping (Water) Equipment	15,000	200,000	0	0	0	215,000	215,000	0
	Pumping (Sanitation) Projects								
1	Sewer Stations PLC Upgrade to Control Logix	25,000	25,000				50,000		50,000
2	4920 Siphon Stabilization	20,000	150,000				170,000		170,000
	Total Pumping (Sanitation) Projects	45,000	175,000	0	0	0	220,000	0	220,000
	Pumping (Sanitation) Equipment								
1	Aliso Creek Emergency Generator 350 KW (Unit 215)			200,000			200,000		200,000
2	La Paz MCC and PLC Upgrade	20,000	140,000				160,000		160,000
	Total Pumping (Sanitation) Equipment	20,000	140,000	200,000	0	0	360,000	0	360,000
	Treatment (Sanitation) Projects								
1	WRP Main Electrical Power Breaker Upgrade		35,000				35,000		35,000
2	Grit Chamber Rehab/Re-Coating	85,000					85,000		85,000
3	Secondary Clarifier # 1 Component Replacement			150,000			150,000		150,000
4	Secondary Clarifier # 4 Component Replacement					150,000	150,000		150,000
5	New MCC S-D Elecrical Cabinet & Breakers (DAF Unit #1)		30,000				30,000		30,000
6	HACH (WIMS) Maint. Job Cal Database Management Software System		10,500				10,500		10,500
	Total Treatment (Sanitation) Projects	85,000	75,500	150,000	0	150,000	460,500	0	460,500

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Treatment (Sanitation) Equipment								
1	Aeration Basin Diffusers		10,000				10,000		10,000
2	Rotostrainer Drum Replacement		30,000				30,000		30,000
3	Effluent Pump Station Pump Replacements		100,000				100,000		100,000
4	OOPS Emergency Generator Replacement	220,000					220,000		220,000
5	Aqua-Aerobic CMD Filter Sock Replacements for Filters #1 & #2	25,000					25,000		25,000
6	Main Emergency Generator Control Panel & Auxiliary Power Up-Grade	28,000					28,000		28,000
	Total Treatment (Sanitation) Equipment	273,000	140,000	0	0	0	413,000	0	413,000
	Laboratory Equipment								
1	Ion Chromatography		45,000				45,000		45,000
2	Undercounter Glassware Washer	8,000					8,000		8,000
	Total Laboratory Equipment	8,000	45,000	0	0	0	53,000	0	53,000
	Outside Treatment (SOCWA)								
1	SOCWA Capital Budget	592,512	989,484	917,000	409,000	1,200,000	4,107,996		4,107,996
	Total Treatment (SOCWA)	592,512	989,484	917,000	409,000	1,200,000	4,107,996	0	4,107,996
	Transmission & Distribution Projects								
1	AMI Implementation	200,000	200,000	200,000	200,000	200,000	1,000,000	1,000,000	
2	Moulton/El Toro Cathodic Protection Repairs	50,000					50,000	50,000	
3	21" PCCP Valve Replacements and Pipeline Repair					150,000	150,000	150,000	
	Total Transmission & Distribution (Water) Projects	250,000	200,000	200,000	200,000	350,000	1,200,000	1,200,000	
	Collection Equipment								
1	P332 Flexiprobe (Push Camera) Inspection System - PearPoint			20,000			20,000		20,000
2	P350 Flexiprobe (Mobile-Portable Camera) Inspection System - PearPoint				40,000		40,000		40,000
	Total Collection Equipment	0	0	20,000	40,000	0	60,000	0	60,000
	Vehicles/Vehicle Equipment								
1	Vehicle Replacement	80,000	100,000	100,000	75,000	75,000	430,000	215,000	215,000
2	Dump Truck/Traffic Control Truck (Unit 4)	80,000					80,000	40,000	40,000
3	Hydro Excavator				480,000		480,000	240,000	240,000
4	Warehouse Forklift			50,000			50,000	25,000	25,000
5	F-550 w/ Valve Maintenance Skid				150,000		150,000	150,000	
6	Vactor 2100 Combo Machine (Replace Unit 80)				500,000		500,000		500,000
7	Boom Truck (Diesel - Regulatory Compliance)				200,000		200,000	100,000	100,000
8	Forklift WRP (Diesel - Regulatory Compliance)			85,000			85,000		85,000
9	10-Wheel Dump Truck (Unit #50, Regulatory Compliance)				175,000		175,000	87,500	87,500
	Total Vehicles / Vehicle Equipment	160,000	100,000	235,000	1,580,000	75,000	2,150,000	857,500	1,292,500

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Construction/Mechanical/Electical Equipment								
1	Backhoe			150,000			150,000	75,000	75,000
	Total Consruction Equipment	0	0	150,000	0		150,000	75,000	75,000
	General Building Projects								
1	HVAC Replacement, Field Office Multi-Purpose Room	33,000					33,000	16,500	16,500
2	HVAC Replacement, Main Office (Bob Hill)	17,000					17,000	8,500	8,500
	Total General Building Projects	50,000	0	0	0	0	50,000	25,000	25,000
	Office Equipment/Furniture								
1	Firewall Replacement	30,000					30,000	15,000	15,000
2	Nimble Storage Array Replacement	75,000					75,000	37,500	37,500
3	SCADA Server Upgrade Water/Sewer	32,500					32,500	16,250	16,250
4	SCADA Server Upgrade WRP		32,500				32,500		32,500
5	Exchange Server Replacement	20,000					20,000	10,000	10,000
6	Replace Servers		50,000				50,000	25,000	25,000
	Total Office Equipment / Furniture	157,500	82,500	0	0	0	240,000	103,750	136,250
	Contingency								
1	Contingency	112,540	78,637	31,386	84,751	723,471	1,030,785	515,393	515,393
2	Inflation @ 5%	0	59,000	68,000	100,000	40,000	267,000	133,500	133,500
	Total Contingency	112,540	137,637	99,386	184,751	763,471	1,297,785	648,893	648,893
	Total Capital Budget	2,367,656	2,367,656	2,367,656	2,467,656	2,767,656	12,338,280	4,486,142	7,852,139
	Total Capital Projects	1,677,886	1,591,338	1,712,963	755,281	2,310,921	8,048,388	2,910,445	5,137,942
	WATER	902,239	316,944	621,117	300,093	770,053	2,910,445		
	SEWER	775,647	1,274,393	1,091,847	455,188	1,540,868	5,137,942		
	Total Capital Equipment	689,770	776,319	654,693	1,712,376	456,736	4,289,893	1,575,696	2,714,196
	WATER	201,885	309,409	174,847	661,188	228,368	1,575,696		
	SEWER	487,885	466,909	479,847	1,051,188	228,368	2,714,196		
	Total Capital Budget	2,367,656	2,367,656	2,367,656	2,467,656	2,767,656	12,338,280	4,486,142	7,852,139
	WATER	1,104,124	626,354	795,963	961,281	998,421	4,486,142		
	SEWER	1,263,532	1,741,303	1,571,693	1,506,376	1,769,236	7,852,139		

PROPOSED

WATER / RECYCLED WATER COMMODITY RATES

+

FIXED WATER METER

&

SEWER

RATES/CHARGES

PROPOSED 19/20 COMMODITY RATES

Water Usage Rates	Existing 2018-19 Rates	Water Supply	Peak Delivery	RW	Conservation	Revenue Offset
Tier 1 - Essential Use	$2.52	$2.58	$0.15	$0.00	$0.00	($0.21)
Tier 2 - Efficient Use	$2.91	$2.58	$0.33	$0.00	$0.00	$0.00
Tier 3 - Inefficient Use	$6.08	$2.58	$0.46	$2.55	$0.49	$0.00
Tier 4 - Excessive Use	$7.82	$2.58	$0.67	$4.08	$0.49	$0.00
Uniform - Commercial Use	$2.89	$2.58	$0.17	$0.26	$0.05	($0.17)
RW	$2.62					

Water Usage Rates	2018-19 Rates	Proposed 2019-20 Rates	Water Supply	Peak Delivery	RW	Conservation	Revenue Offset	Budgeted Water Sales	$ Change	% Change
Tier 1 - Essential Use	$2.52	**$2.58**	$2.64	$0.15	$0.00	$0.00	($0.21)	1,585,270 ccf	$0.06	2.4%
Tier 2 - Efficient Use	$2.91	**$2.97**	$2.64	$0.33	$0.00	$0.00	$0.00	847,489 ccf	$0.06	2.1%
Tier 3 - Inefficient Use	$6.08	**$6.14**	$2.64	$0.46	$2.55	$0.49	$0.00	113,809 ccf	$0.06	1.0%
Tier 4 - Excessive Use	$7.82	**$7.88**	$2.64	$0.67	$4.08	$0.49	$0.00	102,149 ccf	$0.06	0.8%
Uniform - Commercial Use	$2.89	**$2.95**	$2.64	$0.17	$0.26	$0.05	($0.17)	422,262 ccf	$0.06	2.1%
RW	$2.62	**$2.67**						631,260 ccf	$0.05	1.9%
Total Projected Water	**$9,172,174**	**$9,356,433**	**$8,107,385**	**$710,038**	**$816,769**	**$126,933**	**-$404,691**	**3,070,979 ccf**		
Total Projected RW	**$1,653,901**	**$1,685,464**								

PROPOSED 19/20 FIXED METER RATES

Meter Size	Existing 2018-19 Rates	Proposed 2019-20 Rates	Billing & CS	Meters & Capacity	Rate Increase	# of Accounts	Water	RW
5/8-in	$12.96	**$14.14**	$4.43	$9.71	**9.1%**	2,388	2,388	0
3/4-in	$17.37	**$18.99**	$4.43	$14.56	**9.3%**	4,856	4,856	0
1-in	$26.20	**$28.70**	$4.43	$24.27	**9.5%**	447	447	0
1 1/2-in	$48.25	**$52.98**	$4.43	$48.55	**9.8%**	730	702	28
2-in	$92.36	**$101.52**	$4.43	$97.09	**9.9%**	1,382	1,135	247
Total Projected	**$3,478,471**	**$3,813,440**	**$521,127**	**$3,292,313**		**9,803**	**9,528**	**275**
Water	**$3,188,504**	**$3,494,734**	**$506,508**	**$2,988,225**				
Recycled Water	**$289,967**	**$318,707**	**$14,619**	**$304,088**				

PROPOSED 19/20 SEWER RATES

Current WW Rates for	Existing 2018-19 Sewer Rates	Proposed 2019-20 Sewer Rates	Rate Increase
Residential Unrestricted	$24.30 / EDU	$24.30 / EDU	0.00%
Multi-Family Restricted	$19.28 / EDU	$19.28 / EDU	0.00%
Multi-Family Unrestricted	$22.92 / EDU	$22.92 / EDU	0.00%
Current Commercial Classes			
Animal Kennel	$3.99 /ccf	$3.99 /ccf	0.00%
Auto Service Station(repair)	$3.98 /ccf	$3.98 /ccf	0.00%
Basic Commercial	$3.50 /ccf	$3.50 /ccf	0.00%
Car Wash	$3.97 /ccf	$3.97 /ccf	0.00%
Dept. - Retail Store	$3.99 /ccf	$3.99 /ccf	0.00%
Dry Cleaner	$3.50 /ccf	$3.50 /ccf	0.00%
Health Spa	$3.98 /ccf	$3.98 /ccf	0.00%
Hospital	$3.50 /ccf	$3.50 /ccf	0.00%
Hotel	$6.04 /ccf	$6.04 /ccf	0.00%
Market	$7.92 /ccf	$7.92 /ccf	0.00%
Mortuaries	$7.89 /ccf	$7.89 /ccf	0.00%
Nursery	$3.54 /ccf	$3.54 /ccf	0.00%
Parks Golf Courses	$3.49 /ccf	$3.49 /ccf	0.00%
Prof/Financial Office	$3.99 /ccf	$3.99 /ccf	0.00%
Public Institution	$3.93 /ccf	$3.93 /ccf	0.00%
Restaurants	$3.77 /ccf	$3.77 /ccf	0.00%
Schools	$4.13 /ccf	$4.13 /ccf	0.00%
Theater	$3.99 /ccf	$3.99 /ccf	0.00%
Warehouse/Storage	$3.16 /ccf	$3.16 /ccf	0.00%

CUSTOMER SENSITIVITY ANALYSIS

SINGLE FAMILY RESIDENTIAL SENSITIVITY ANALYSIS

Billing Item	Current Rate	Proposed Rate	% Increase
Tier I (10 ccf)	$ 25.20	$ 25.80	2.4%
Tier II (5 ccf)	$ 14.55	$ 14.85	2.1%
Water Fixed Meter	$ 17.37	$ 18.99	9.3%
Water Capital R & R	$ 4.66	$ 4.66	0.0%
Total Water	**$61.78**	**$64.30**	**4.1%**
Sewer Fixed Meter	$ 24.30	$ 24.30	0.0%
Sewer Capital R & R	$ 4.93	$ 4.93	0.0%
Total Sewer	**$29.23**	**$29.23**	**0.0%**
Total Bill	**$91.01**	**$93.53**	
	Increase	**$2.52**	**2.8%**

LAGUNA WOODS VILLAGE
SENSITIVITY ANALYSIS

Mutual	2018/19 Annual Charges	2019/20 Annual Charges	Increase Amount	Increase %
Third Mutual	$4,441,397	$4,540,664	$99,267	2.2%
United Mutual	$3,612,143	$3,673,718	$61,575	1.7%
Golden Rain Foundation	$765,357	$782,430	$17,072	2.2%
Mutual 50	$157,375	$159,578	$2,203	1.4%
Total Community	$8,976,272	$9,156,389	$180,117	2.0%

CITIES
SENSITIVITY ANALYSIS

Mutual	2018/19 Annual Charges	2019/20 Annual Charges	Increase Amount	Increase %
Laguna Woods	$45,085	$46,693	$1,608	3.6%
Lake Forest	$303,476	$311,742	$8,267	2.7%
Mission Viejo	$96,646	$99,634	$2,988	3.1%
Laguna Hills	$139,647	$144,672	$5,025	3.6%
Average Cities	$146,213	$150,686	$4,472	3.1%

WATER, SEWER AND RECYCLED WATER

COST OF SERVICE STUDY

REPORT

EL TORO WATER DISTRICT

Water, Recycled Water, and Wastewater Rate Update Study

Final Report / April 9, 2019

RAFTELIS

RAFTELIS

April 9, 2019

Dennis P. Cafferty, P.E.
Assistant General Manager / District Engineer
El Toro Water District
24251 Los Alisos Blvd.
Lake Forest, CA 92630

Subject: Water, Recycled Water and Wastewater Rate Update Study Report 2019

Dear Mr. Cafferty:

As part of the annual cost of service and rate update process, El Toro Water District (ETWD or District) engaged Raftelis Consultants, Inc. (Raftelis) to conduct a cost of service study for the development of its water, wastewater, and recycled water rates that comply with Proposition 218 and other legal requirements. As part of the Study, we reviewed the latest operating budget, including purchased water costs, referenced previously conducted cost of service analyses, and calculated the water, wastewater and recycled water rates for the District in fiscal year (FY) 2019-20. The updated rates, scheduled to be effective on July 1, 2019, reflect projected changes in net revenue requirements for each enterprise and projected water sales for FY 2019-20.

This *Water, Recycled Water and Wastewater Rate Update Study Report* summarizes the key findings and recommendations related to the development of the respective rates.

It has been a pleasure working with the District. We would like to thank you for your assistance during the Study. If we can be of further assistance, please call me at 626-233-6762.

Sincerely,

Khanh Phan
Project Manager

445 S. Figueroa Street, Suite 2270 Los Angeles, CA 90071
213-262-9304 www.raftelis.com

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GLOSSARY

AF	Acre foot / acre feet
AWWA	American Water Works Association
CCF	100 cubic feet = 748 gallons
CII	Commercial / Industrial / Institutional (i.e. Commercial and Public Authority)
COS	Cost of Service
DF	Drought Factor (see Section 4 for details)
EDU	Equivalent dwelling unit
ET_0	reference Evapotranspiration (see Section 4 for details)
ETAF	ET Adjustment Factors (see Section 4 for details)
FY	Fiscal year
GPCD	Gallons per capita per day
IRR	Irrigation
IWB	Indoor Water Budget (see Section 4 for details)
M1 Manual	M1 Manual, Principles of Water Rates, Fees and Charges, Sixth Edition published by AWWA
MFR	Multi-Family Residential
MWD	Metropolitan Water District of Southern California
MWDOC	Municipal Water District of Orange County
O&M	Operations & Maintenance
OWB	Outdoor Water Budget (see Section 4 for details)
R&R	Replacement and Refurbishment
RW	Recycled Water
SFR	Single Family Residential
SQ FT	Square feet
TWB	Total Water Budget = Indoor Water Budget + Outdoor Water Budget
V_{indoor} / $V_{outdoor}$	Indoor Variance / Outdoor Variance (see Section 4 for details)

WB	Water Budget
WRP	Water Recycling Plant

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1. EXECUTIVE SUMMARY

1.1 BACKGROUND OF THE STUDY

The District engaged Raftelis Consultants, Inc. (Raftelis) to conduct the Water, Recycled Water (RW) and Wastewater Rate Update Study (Study) to develop rates for all three enterprises that are equitable and in compliance with Proposition 218. This *Water, Recycled Water and Wastewater Rate Update Study Report* (Report) summarizes the key findings and recommendations related to the development of the respective rates.

The District's current water and wastewater rate structure consists of the following components to ensure that rates are charged equitably to all customers, provide adequate revenues to fund operating and capital costs, and are simple to administer and implement while continuing to promote water efficiency and conservation.

- Water
    - Monthly Service Charges by meter size to recover a portion of operating costs
    - Variable Rates: Tiered Residential Rates, and Uniform Commercial Rates, comprised of the following rate components:
        - Water Supply Rate to pay for purchased water supply costs
        - Delivery Rate to recover the remaining operating costs
        - Revenue Offset to provide a rate incentive and affordability for essential water use in Tier 1
        - Conservation and Recycled Water Program costs applied to inefficient and excessive water use to fund the District's conservation and supplemental water supply (i.e., Recycled Water expansion) programs
    - Capital Replacement and Refurbishment (R&R) Charges by meter size to pay for capital replacement and refurbishment of the existing water system
- Wastewater (WW)
    - O&M Charges (by dwelling units for residential customers and by usage for non-residential customers) by customer classes
    - Capital R&R Charges by meter size to pay for capital R&R of the existing wastewater system

1.2 PROPOSED WATER RATES

1.2.1 Monthly Service Charges

Table 1-1 shows the proposed monthly service charges for FY 2020, effective July 1, 2019.

Table 1-1: FY 2020 Proposed Monthly Service Charges

Meter Size	FY 2019 Current	FY 2020 Proposed	$ Change	% Change
5/8-in	$12.96	$14.14	$1.18	9.1%
3/4-in	$17.37	$18.99	$1.62	9.3%
1-in	$26.20	$28.70	$2.50	9.5%
1 1/2-in	$48.25	$52.98	$4.73	9.8%
2-in	$92.36	$101.52	$9.16	9.9%

1.2.2 Capital R&R Charges

The District will maintain the current Capital R&R Charges.

Table 1-2: FY 2020 Proposed Capital R&R Charges

Meter Size	FY 2019 Current	FY 2020 Proposed	$ Increase	% Increase
5/8-in	$4.66	$4.66	$0.00	0%
3/4-in	$4.66	$4.66	$0.00	0%
1-in	$7.78	$7.78	$0.00	0%
1 1/2-in	$18.91	$18.91	$0.00	0%
2-in	$47.47	$47.47	$0.00	0%

1.2.3 Commodity Rates

The proposed water commodity rates for FY 2020, effective July 1, 2019, reflect the projected increases in purchased water supply costs from Municipal Water District of Orange County (MWDOC).

Table 1-3: FY 2020 Proposed Water Commodity Rates

Tier	FY 2019 Current	FY 2020 Proposed	$ Increase	% Increase
Tier 1 - Essential Use	$2.52	$2.58	$0.06	2.4%
Tier 2 - Efficient Use	$2.91	$2.97	$0.06	2.1%
Tier 3 - Inefficient Use	$6.08	$6.14	$0.06	1.0%
Tier 4 - Excessive Use	$7.82	$7.88	$0.06	0.8%
Uniform - Commercial Use	$2.89	$2.95	$0.06	2.1%

1.3 PROPOSED WASTEWATER RATES

1.3.1 Service Charges

Based on careful review of financial requirements of Wastewater Enterprise performed by the District, the current rates are projected to generate sufficient revenues for FY 2020 budgeted expenditures and obligations. Thus, the District decided to keep the wastewater rates unchanged.

Table 1-4: FY 2020 Proposed Wastewater Service Charges

Customer Class	FY 2019 Current	FY 2020 Proposed	$ Increase	% Increase
Residential Unrestricted	$24.30 / EDU	$24.30 / EDU	$0.00	0.0%
Multi-Family Restricted	$19.28 / EDU	$19.28 / EDU	$0.00	0.0%
Multi-Family Unrestricted	$22.92 / EDU	$22.92 / EDU	$0.00	0.0%
Animal Kennel/Hospital	$3.99 / ccf	$3.99 / ccf	$0.00	0.0%
Car Wash	$3.97 / ccf	$3.97 / ccf	$0.00	0.0%
Department/Retail Store	$3.99 / ccf	$3.99 / ccf	$0.00	0.0%
Dry Cleaners	$3.50 / ccf	$3.50 / ccf	$0.00	0.0%
Golf Course/Camp/Park	$3.49 / ccf	$3.49 / ccf	$0.00	0.0%
Health Spa	$3.98 / ccf	$3.98 / ccf	$0.00	0.0%
Hospital/Convalescent Home	$3.50 / ccf	$3.50 / ccf	$0.00	0.0%
Hotel	$6.04 / ccf	$6.04 / ccf	$0.00	0.0%
Market	$7.92 / ccf	$7.92 / ccf	$0.00	0.0%
Mortuary	$7.89 / ccf	$7.89 / ccf	$0.00	0.0%
Nursery/Greenhouse	$3.54 / ccf	$3.54 / ccf	$0.00	0.0%
Professional/Financial Office	$3.99 / ccf	$3.99 / ccf	$0.00	0.0%
Public Institution	$3.93 / ccf	$3.93 / ccf	$0.00	0.0%
Repair/Service Station	$3.98 / ccf	$3.98 / ccf	$0.00	0.0%
Restaurant	$3.77 / ccf	$3.77 / ccf	$0.00	0.0%
Schools	$4.13 / ccf	$4.13 / ccf	$0.00	0.0%
Theater	$3.99 / ccf	$3.99 / ccf	$0.00	0.0%
Warehouse/Storage	$3.16 / ccf	$3.16 / ccf	$0.00	0.0%
Basic Commercial	$3.50 / ccf	$3.50 / ccf	$0.00	0.0%

1.3.2 Capital R&R Charges

The Wastewater Enterprise will also maintain its Capital R&R Charges with no proposed increase.

Table 1-5: FY 2020 Proposed Wastewater Capital R&R Charges

Customer Classes	Current FY 2019 Capital R&R Charges	Proposed FY 2020 Capital R&R Charges	$ Increase	% Increase
Residential				
Residential Unrestricted	$4.93 / EDU	$4.93 / EDU	$0.00	0.0%
Multi-Family Restricted	$3.91 / EDU	$3.91 / EDU	$0.00	0.0%
Multi-Family Unrestricted	$4.65 / EDU	$4.65 / EDU	$0.00	0.0%
Non-Residential				
5/8"	$4.34 / month	$4.34 / month	$0.00	0.0%
3/4"	$7.34 / month	$7.34 / month	$0.00	0.0%
1"	$13.55 / month	$13.55 / month	$0.00	0.0%
1 1/2"	$24.07 / month	$24.07 / month	$0.00	0.0%
2"	$70.96 / month	$70.96 / month	$0.00	0.0%
Public Authority				
1"	$4.93 / month	$4.93 / month	$0.00	0.0%
1 1/2"	$24.65 / month	$24.65 / month	$0.00	0.0%
2"	$39.71 / month	$39.71 / month	$0.00	0.0%

1.4 PROPOSED RECYCLED WATER RATES

With the completion of the Recycled Water Expansion Project, all RW customers (existing and converted customers) are now supplied with higher quality tertiary RW and are subject to the corresponding rates that support the annual cost of providing tertiary RW. The proposed RW rate for FY 2020 is $2.67/ccf , which is approximately 90 percent of the Tier 2 potable water rate. All RW customers connected to the new recycled water distribution system will be assessed Monthly Service Charges (Table 1-6) and Capital R&R Charges (Table 1-7), the same as potable meters to recover the customer service, meter service, a portion of capacity and other RW related fixed costs and to pay for capital R&R of the expanded RW system.

Table 1-6: FY 2020 Proposed Monthly Service Charges

Meter Size	FY 2019 Current	FY 2020 Proposed	$ Change	% Change
5/8-in	$12.96	$14.14	$1.18	9.1%
3/4-in	$17.37	$18.99	$1.62	9.3%
1-in	$26.20	$28.70	$2.50	9.5%
1 1/2-in	$48.25	$52.98	$4.73	9.8%
2-in	$92.36	$101.52	$9.16	9.9%

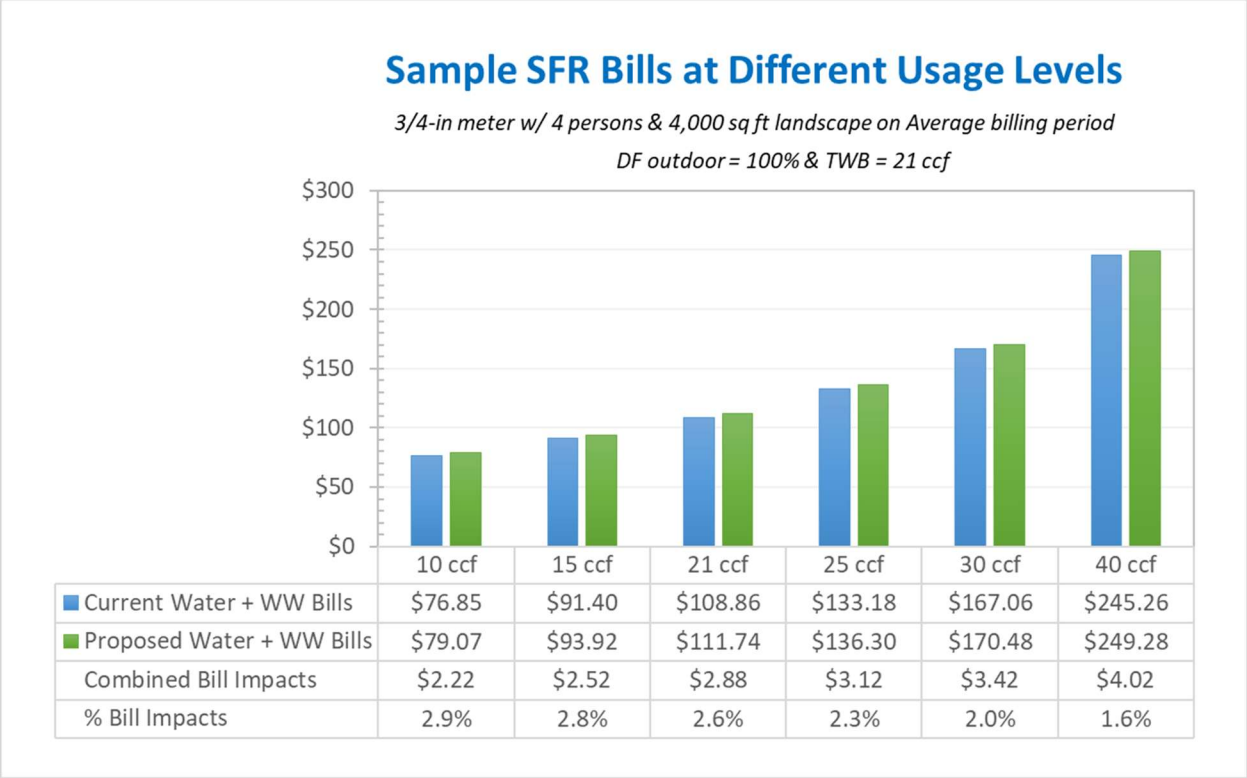
Table 1-7: FY 2020 Proposed Capital R&R Charges

Meter Size	FY 2019 Current	FY 2020 Proposed	$ Increase	% Increase
5/8-in	$4.66	$4.66	$0.00	0%
3/4-in	$4.66	$4.66	$0.00	0%
1-in	$7.78	$7.78	$0.00	0%
1 1/2-in	$18.91	$18.91	$0.00	0%
2-in	$47.47	$47.47	$0.00	0%

1.5 CUSTOMER IMPACT ANALYSIS

Figure 1-1 shows a breakdown of water and wastewater bills at various water usage levels for a single-family residential user with 4 occupants and 4,000 sq. ft. landscape area serviced by a ¾-in meter. The combined water and wastewater bill increase would be ranging from $2.22 to $4.02 per month depending on the monthly billed water usage. The bill impacts result from increases in water monthly fixed service charges and water supply costs. Note that the impacts for recycled water are not shown because residential users do not purchase recycled water.

Figure 1-1: SFR Total Monthly Bill at Different Usage Levels



	10 ccf	15 ccf	21 ccf	25 ccf	30 ccf	40 ccf
Current Water + WW Bills	$76.85	$91.40	$108.86	$133.18	$167.06	$245.26
Proposed Water + WW Bills	$79.07	$93.92	$111.74	$136.30	$170.48	$249.28
Combined Bill Impacts	$2.22	$2.52	$2.88	$3.12	$3.42	$4.02
% Bill Impacts	2.9%	2.8%	2.6%	2.3%	2.0%	1.6%

2. INTRODUCTION

2.1 DISTRICT BACKGROUND

The El Toro Water District (District), located within the southern portion of Orange County, was formed in 1960 under provisions of California Water District Law, Division 13 of the Water Code of the State of California, commencing with Section 34,000, for the purposes of providing water and wastewater services to the service area. The District is governed by a publicly elected Board of Directors. The District is nearly built out and encompasses the entirety of the City of Laguna Woods and portions of four other cities: Lake Forest, Aliso Viejo, Laguna Hills, and Mission Viejo.

The District provides water, wastewater, and recycled water services to a population of approximately 48,500 in a service area of approximately 8.5 square miles. Constructed in phases since 1960, the District's water system is relatively modern. It contains 6 reservoirs with a combined capacity of 287 million gallons, in which the District owns 136 million gallons, over 170 miles of water lines, and 8 booster pump stations with 12 pressure zones to deliver water to approximately 10,000 metered water accounts. The District also participated in a five-agency collaboration to fund and construct a local water treatment plant (Baker Water Treatment Plant) located in the City of Lake Forest to improve water treatment and water supply reliability for ETWD's customers and South Orange County. The Baker Water Treatment Plant (Baker WTP) allows the participating agencies to purchase untreated water from MWDOC at a lower cost than the treated water, reducing the financial burden on the District's customers.

The District's wastewater system is comprised of 142 miles of collection system pipeline, 3,400 manholes, and 11 pump stations which pump to the District's treatment plant with a rated capacity of 6 million gallons per day. Much of the District's effluent is reused through RW sales. The District completed its Water Recycling Plant (WRP) upgrades to produce higher quality tertiary RW in FY 2015. To make RW available to more customers, the District increased its RW distribution by adding 19 miles of RW distribution pipeline. In FY 2019, the District completed further expansion of the RW Distribution System that increased the total amount of RW distribution pipelines to nearly 25 miles. In FY 2020, the District projects to convert 47 water accounts to RW and add 18 new RW accounts, which in turn increase RW sales from 1,300AF in FY 2019 to 1,449 AF in FY 2020.

2.2 STUDY BACKGROUND AND OBJECTIVES

As part the annual cost of service and rate update process, the District engaged Raftelis to conduct the Water, Recycled Water (RW) and Wastewater Rate Study (Study) to develop rates for all three enterprises that are equitable and in compliance with Proposition 218.

The major objectives of the Study include the following:

1. Determine the revenue requirements from water, wastewater, and recycled water rates for FY 2020
2. Update the water rates to meet the District's goals and objectives, including defensibility, affordability for essential use and promoting efficiency and conservation
3. Update the recycled water rates
4. Update the wastewater rates
5. Conduct customer impact analyses for the proposed water and wastewater rates.

This *Water, Recycled Water and Wastewater Rate Update Study Report* (Report) summarizes the key findings and recommendations related to the development of the respective rates.

2.3 LEGAL FRAMEWORK AND RATE SETTING METHODOLOGY

This section of the report describes the legal framework that was considered in the development of the rates to ensure that the calculated cost of service rates provided a fair and equitable allocation of costs to the different customer classes.

2.3.1 Constitutional Mandates and Statutory Authority

Article XIII D, Section 6 (Proposition 218) and Article X, Section 2 of the California Constitution govern the principles applicable to this Rate Study. This Rate Study equitably implements and harmonizes these constitutional mandates in concert with the authority and principles set forth in Water Code Section 370 et seq. which governs Allocation-Based Conservation Water Pricing (commonly referred to as "Water Budget Rate Structure").

This Rate Study provides for a water budget four tier Rate Structure designed to implement, in a reasonable manner, the constitutional mandates and statutory authority and principles referenced above.

2.3.2 California Constitution – Article X, Section 2

Article X, Section 2 of the California Constitution (established in 1976) provides as follows:

> *It is hereby declared that because of the conditions prevailing in this State the general welfare requires that the water resources of the State be put to beneficial use to the fullest extent of which they are capable, and that the waste or unreasonable use or unreasonable method of use of water be prevented, and that the conservation of such waters is to be exercised with a view to the reasonable and beneficial use thereof in the interest of the people and for the public welfare.*

As such, public agencies are constitutionally mandated to maximize the beneficial use of water, prevent waste, and encourage conservation which this Rate Study achieves.

2.3.3 California Constitution – Article XIII D, Section 6 (Proposition 218)

Proposition 218 reflected in the California Constitution as Article XIII D, was enacted in 1996 to ensure that rates and fees were reasonable and proportional to the cost of providing service. The principal requirements for fairness of the fees, as they relate to public water and wastewater service are as follows:

1. Water and wastewater rates shall not exceed the funds required to provide the service.
2. Revenues derived by the charge shall not be used for any other purpose other than that for which the charge was imposed.
3. The amount of the charge imposed upon any parcel shall not exceed the proportional cost of service attributable to the parcel.

4. No charge may be imposed for a service unless that service is actually used or immediately available to the owner of property.

The rates developed in this Rate Study use a methodology to establish an equitable system of fixed and variable charges that recover the cost of providing service and fairly apportion costs to each customer as required by Proposition 218.

2.3.4 Statutory Authority – Government Code Section 370 et seq. (Allocation-Based Conservation Water Pricing)

In 2000, the California Legislature (AB 2882), consistent with the above-referenced constitutional provisions, adopted a body of law entitled "Allocation-Based Conservation Water Pricing" (Water Code Section 370 et seq.)

Water Code Section 370 provides in part as follows:

> *The Legislature hereby finds and declares all of the following:*
>
> *(a) The use of allocation-based conservation water pricing by public entities that sell and distribute water is one effective means by which waste or unreasonable use of water can be prevented and water can be saved in the interest of the people and for the public welfare, within the contemplation of Section 2 of Article X of the California Constitution.*
>
> *(b) It is in the best interest of the people of California to encourage public entities to voluntarily use allocation-based conservation water pricing, tailored to local needs and conditions, as a means of increasing efficient uses of water, and further discouraging wasteful or unreasonable use of water under both normal and dry-year hydrologic conditions.*

Water Code Section 372 provides as follows:

> *(a) A public entity may employ allocation-based conservation water pricing that meets all of the following criteria.*
>
> *(1) Billing is based on metered water use.*
>
> *(2) A basic use allocation is established for each customer account that provides a reasonable amount of water for the customer's needs and property characteristics. Factors used to determine the basic use allocation may include, but are not limited to the number of occupants, the type or classification of use, the size of lot or irrigated area, and the local climate data for the billing period. Nothing in this chapter prohibits a customer of the public entity from challenging whether the basic use allocation established for that customer's account is reasonable under the circumstances. Nothing in this chapter is intended to permit public entities to limit the use of property through the establishment of a basic use allocation.*
>
> *(3) A basic charge is imposed for all water used within the customer's basic use allocation, except that at the option of the public entity, a lower rate may be*

applied to any portion of the basic use allocation that the public entity has determined to represent superior or more than reasonable conservation efforts.

(4) A conservation charge shall be imposed on all increments of water use in excess of the basic use allocation. The increments may be fixed or may be determined on a percentage or any other basis, without limitation on the number of increments, or any requirement that the increments or conservation charges be sized, or ascend uniformly, or in a specified relationship. The volumetric prices for the lowest through the highest priced increments shall be established in an ascending relationship that is economically structured to encourage conservation and reduce the inefficient use of water, consistent with Section 2 of Article X of the California Constitution.

(b) ---

(1) Except as specified in subdivision (a), the design of an allocation-based conservation pricing rate structure shall be determined in the discretion of the public entity.

(2) The public entity may impose meter charges or other fixed charges to recover fixed costs of water service in addition to the allocation-based conservation pricing rate structure.

(c) A public entity may use one or more allocation-based conservation water pricing structures for any class of municipal or other service that the public entity provides.

As noted in the referenced statutes, "Allocation-Based Conservation Water Pricing Rate Structure" is a form of increasing block rates where the amount of water within the first block or blocks is based on the estimated, efficient water needs of the individual customer. Water-budget rates differ from other metered water rate designs in two key ways. First, the blocks are established based on water budgets that represent varying levels of each customer's efficient water use. Second, water-budget rates require the public agency to set specific standards for what is, and what is not, considered efficient water use for an individual customer.

This Rate Study in conjunction with ETWD's findings and determinations for individual customers establishes a standard for efficient usage and then establishes a budget for each individual customer. That defines how much water is considered efficient. Customers with usage above this efficient usage budget pay a higher rate for their "inefficient" or "wasteful" usage in accordance with Section 372 of the Water Code.

This Rate Study conforms to the principles set forth in the enabling statutes for Water Budget Rate Structures.

2.3.5 Tiered Rates

"Inclining" Block-Rate Structures, (which are synonymous with "Increasing Block-Rate Structures") when properly designed and differentiated by customer class as this Rate Study does, allow a water agency to send consistent price incentives for conservation to customers. For this reason, the heightened interest in water conservation, "Increasing Block-Rates" have been increasingly favored, especially in relatively water-scarce regions, such as Southern California.

2.3.6 Proportionality – Proposition 218's Requirement That Fees Be Proportionate to the Cost of Service for Each Parcel

There is a fair amount of ambiguity in the way that Proposition 218 was drafted – none more so than the issue of "proportionality." It has taken a succession of court rulings over several years to clarify the substantive requirement of Proposition 218.

The recent Appellate case of Griffith v. Pajaro Valley Water Management Agency (2013) California Court of Appeal, Sixth District has provided much guidance on several important Proposition 218 issues, including the issue of proportionality. In Pajaro, the Appellate Court held in part as follows:

1. That Pajaro's costs of using supplemental water along the coast to prevent salt water intrusion benefited all of Pajaro's customers, including inland customers, using the groundwater basins.
2. That proportionality is not measured on an individual parcel basis, but instead is measured collectively, considering all customer classes. As such, the Appellate Court in Pajaro confirmed the common practice of grouping customers into classes with comparable service costs and setting rates by class rather than parcel by parcel met the Prop 218 requirement that fees be proportionate to the cost of providing service to each parcel.

Under Item 1 noted above, water utilities can reasonably justify that the addition of recycled water to the water resource mix, frees up water for potable uses and therefore all customers should share in the costs of recycled water so that recycled water can be put to beneficial use as required by Article X, Section 2. This clarification by the appellate court allows agencies to harmonize the mandates of Proposition 218 and Article X, Section 2.

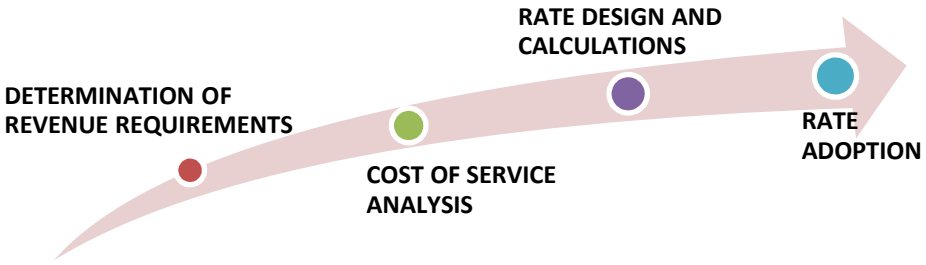
Under Item 2 noted above, utilities can develop rates by customer class and meet the requirements of Proposition 218, as opposed to the strict interpretation which would require cost proportionality for each parcel receiving service. This was another major clarification of Proposition 218 since cost proportionality for individual parcels is almost impossible to achieve in the strict sense.

The Pajaro case rulings provided for the harmonizing of the proportionality requirements of Prop 218 with the efficient use and conservation requirements of Article X, Section 2 by accepting that the supplemental costs of water used by one group of customers should be shared by all users, based on the concept that all users receive benefit from the overall water resources. In the District's case, recycled water adds a water resource that provides benefit to all users by freeing up potable water and therefore the costs of recycled water can be shared by all inefficient potable water users. Due to non-essential usage's demand on the system, the District allocates the cost of funding recycled water system development to Tiers 3 and 4 residential/irrigation usage as well as to commercial use at a smaller rate based on the assumption that 10 percent of CII water use is non-essential.

2.4 COST-BASED RATE SETTING METHODOLOGY

As stated in the Manual M1, the methodology put forth by the AWWA Rates and Charges Subcommittee is consistent with the Proposition 218 requirement that "the costs of water rates and charges should be recovered from classes of customers in proportion to the cost of serving those customers." To develop utility rates that comply with Proposition 218 and industry standards while meeting other emerging goals and objectives of the utility, there are four major steps:

Figure 2-1: Cost-Based Rate Setting Methodology



1. **DETERMINATION OF REVENUE REQUIREMENT:** The rate-making process starts with the determination of future revenue requirements to sufficiently fund the utility's operation and maintenance (O&M), capital replacement and refurbishment (R&R), capital improvement and perpetuation of the system and to ensure preservation of the utility's financial integrity. The basic revenue requirements of a utility include O&M expenses, debt service payments, contributions to specified reserves and the cost of capital expenditures that are not debt financed.
2. **COST OF SERVICE ANALYSIS:** The annual costs of providing water services (cost of service), determined in the financial plan development, should be allocated among the customers commensurate with their service requirements. In this step, costs are identified and allocated to cost causation components and distributed to respective customer classes according to the industry standards provided in the Manual M1 published by AWWA.
3. **RATE DESIGN and CALCULATIONS:** Rates do more than simply recover costs. Within the legal framework and industry standards, properly designed rates should support and optimize a blend of various utility objectives, such as conservation, affordability for essential needs, revenue stability, etc. and should work as a public information tool in communicating these objectives to customers.
4. **RATE ADOPTION:** In the last step of the rate-making process, to comply with the Proposition 218 requirements, the results of the analyses are documented in a Study Report that clearly identifies the nexus between costs and rates to help educate the public about the proposed changes, the rationale and justifications behind the changes and their anticipated financial impacts in layman's terms. At least 45 days after sending out the public notices, at a public hearing, the agency shall consider all written protests against the proposed rates. If there is no majority protest, the agency can officially adopt the new rates.

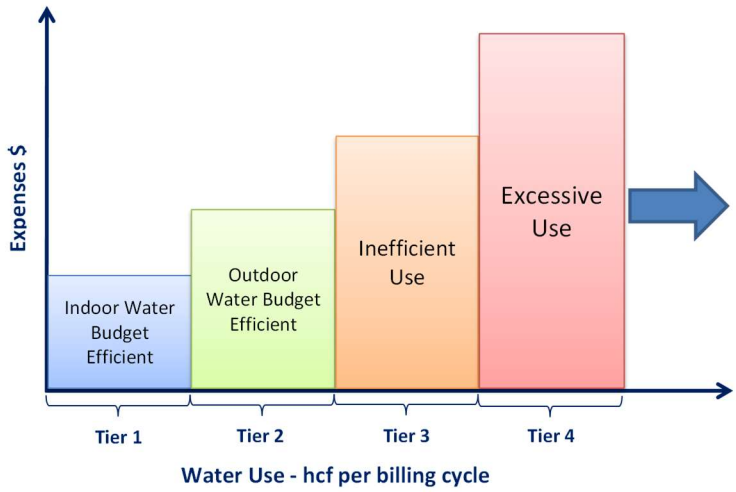
3. WATER BUDGET AND TIER DEFINITIONS

Since July 1, 2010, the District has implemented a water budget rate structure to incentivize conservation and efficient water use. The description of the allocations to individual customers and the development of water budgets is described here for completeness of this report.

3.1 WATER BUDGET DEFINITIONS

The American Water Works Association Journal defines water budget as "the quantity of water required for an efficient level of water use by that customer" *(Source: American Water Works Association Journal, May 2008, Volume 100, Number 5).* Therefore, each customer has their own allocation or water budget as shown in the following figures. Figure 3-1 illustrates how the tier breaks are set for water budget customers. Tier 1 is defined by the allotment for indoor use and Tier 2 is defined by the allotment for outdoor use. Tier 3 is set to a percentage of the total water budget (or Tiers 1 and 2) combined. Any use beyond Tier 3 is considered excessive and falls into Tier 4.

Figure 3-1: Water Budget Tiers



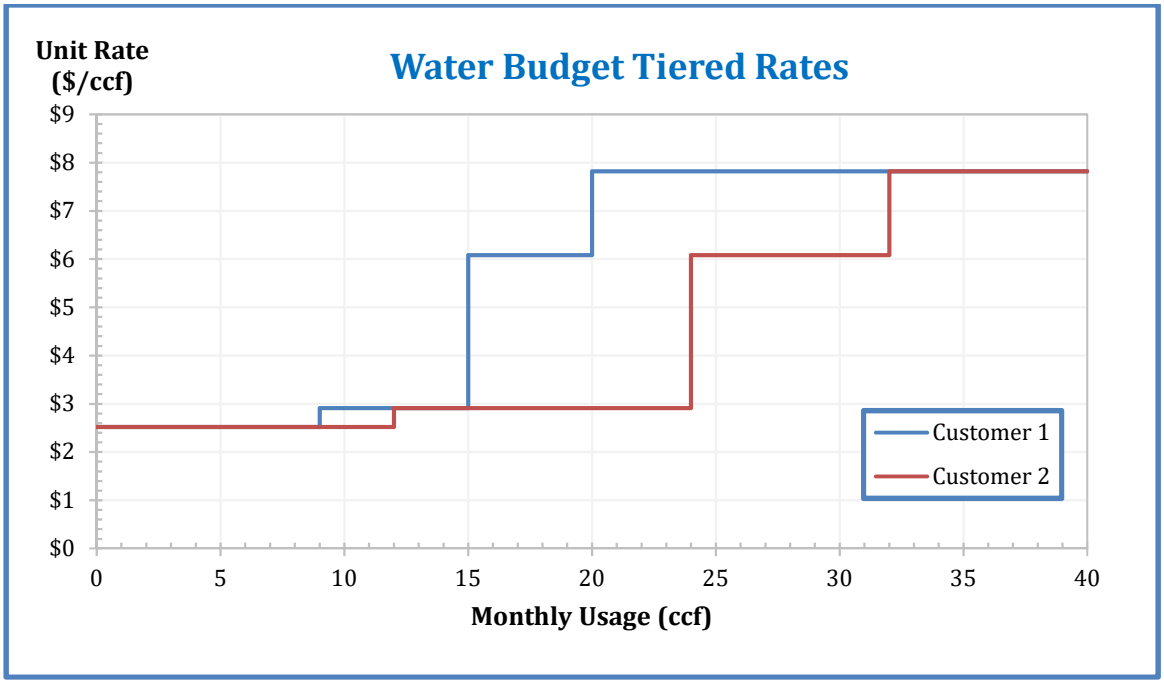
It is worth noting that water budget rate structures are customized for each customer, which results in different tier breaks for different customers. For example, as illustrated by Figure 3-2,[1] which examines the usage of two customers of a *hypothetical* water utility. The first 9 units consumed by Customer 1 is charged at Tier 1 rate, whereas Customer 2 has 12 units at Tier 1 rate ($2.58/ccf) for indoor use. The next 6 units (10 – 15 units) consumed by Customer 1 is reserved for outdoor use, which is charged at Tier 2 rate ($2.97/ccf), and any usage exceeding 20 units[2] will be deemed excessive and charged at the Tier 4 Rate ($7.88/ccf). Similarly, for Customer 2, Tier 2 spans from 13-24 units, and usage exceeding 32 units will be charged at Tier 4 Rate

[1] This is for illustrative purposes only and is not based on actual rates of the District.

[2] Tier 3 = 30% of Total Water Budget (TWB) whereas TWB = Indoor WB + Outdoor WB

($7.88/ccf). Customer 2, with larger indoor and outdoor water budget (or allotment), represents a residential customer with larger family and bigger irrigated landscape area than Customer 1.

Figure 3-2: Customized Water Budget Tiers[3]



Similar to the Water Budget Rate Study in 2010, the District's water budget allocations and tiered rate structure are designed for residential and irrigation accounts only; all other customer types will retain the current uniform rate structure.

3.2 INDOOR WATER BUDGET

The indoor water budget (IWB) is determined by a customer's household size and a standard consumption per person. The proposed IWB formula is as follows:

$$IWB = \frac{GPCD * Household\ \ Size * Dwelling\ \ Units * Days\ \ of\ Service * DF_{indoor}}{748} + V_{indoor}$$

where

- GPCD – Gallons per capita per day.
  - SB x7-7,[4] Section 10608 of the Water Code, established the provisional standard for indoor residential water use at 55 gallons per capita per day.

[3] For illustrative purposes only, not actual rates of the District

[4] The language from SB x7-7 setting the 55 GPCD performance standard: (2) The per capita daily water use that is estimated using the sum of the following performance standards: (A) For indoor residential water use, 55 gallons per capita daily water use as a provisional standard.

- Household Size – Number of residents per dwelling unit. The 2010 census lists the average household size at 2.91 persons, which includes single and multi-family housing. Typically, single family household size is greater than 3 persons and multi-family household size is less than 3.0 persons. The District policy is to provide adequate water for the health and sanitation needs and minimize customer complaints and requests for variances. The default values for household size are set as follows based on customer characteristics.
    - Single Family: Household Size = 4 persons
    - Apartment: Household Size = 2 persons
    - Multi-Family:
        - Restricted: Household Size = 2 persons (senior citizen housing typically 1 to 2 residents per dwelling unit)
        - Unrestricted: Household Size = 3 persons
- Dwelling units – Number of dwelling units served by the meter / account
- Days of Service. The number of days of service varies with each billing cycle for each customer. The actual number of days of service will be applied to calculate the indoor water budget for each billing cycle.
- DF_{indoor} – Indoor drought factor. The percentage of indoor water budget allotted during drought conditions. The drought factor is subject to the approval of the District's Board of Directors. The indoor drought factor is currently set at 100 percent.
- V_{indoor} – Indoor variance. The additional water allotment to be granted for extenuating circumstances is subject to District's approval or verification as outlined in the District's variance program. Variances can be requested by submitting a "Variance/Adjustment Request Form" found on the District's website.
- 748 is the conversion unit from gallons to billing unit of hundred cubic feet (ccf).

3.3 OUTDOOR WATER BUDGET

The outdoor water budget (OWB) is determined by three main variables: irrigable landscape area, weather data and evapotranspiration (ET) Adjustment Factor. The irrigable landscape area, measured as square footage of landscape surface on a customer's property, is in some cases established through on-site direct physical measurement and in others is estimated using the Orange County Assessors' parcel data - lot size, building size and number of floors - where the actual irrigable landscape area data is not available. The weather data is based on the reference Evapotranspiration (ET_0), which is the amount of water loss to the atmosphere over a given time period under local atmospheric conditions. ET_0 is the amount of water (in inches of water) needed for a hypothetical reference crop to maintain its health and appearance. The ET Adjustment Factor (ETAF) is a coefficient that adjusts ET_0 values based on plant factor and irrigation system efficiency. The updated California Department of Water Resources' Model Water Efficient Landscape Ordinance (Landscape Ordinance) provides the following ETAF for different landscapes:

- Existing landscape (Functional): $ETAF_{Existing} = 80\%$
- New development / redevelopment landscape (Functional): $ETAF_{New} = 70\%$
- Special landscape (Recreational): $ETAF_{Recreational} = 100\%$

The formula to calculate outdoor water budget is as follows:

$$OWB = \left(\frac{\text{Landscape Area} * ET_0 * ETAF}{1200} + V_{outdoor} \right) * DF_{outdoor}$$

where

- ET_0 is measured in inches of water during the billing period based on daily data acquired from the California Irrigation Management Information System (CIMIS) Station 75, which is the closest station to the District's service area.
- ETAF (% of ET_0) is defined using the updated Landscape Ordinance as shown above.
- Landscape Area (or Irrigable Landscape Area) (in square feet) is the measured irrigable landscape area served by a customer's meter.
    - Where the measured irrigable landscape area is not available, the landscape area will be estimated by the following formula using the Orange County Assessors' parcel data.
        - $\text{Landscape Area (sq ft)} = 70\% * \left(\text{Lot Size} - \frac{\text{Building Size}}{\text{Number of Floors}} \right)$
    - For accounts dedicated for domestic use only, such as multi-family units, 25 square feet of irrigable landscape area is provided for each dwelling unit for patio plants.
- $DF_{outdoor}$ – Outdoor drought factor. The percentage of outdoor water budget allotted during drought conditions. The drought factor is subject to the approval of the District's Board of Directors.
- $V_{outdoor}$ – Outdoor variance. The additional water allotment to be granted for extenuating circumstances is subject to District's approval or verification as outlined in the variance program. Outdoor variance is subject to outdoor drought factor.
- 1,200 is the conversion unit from inch*ft^2 to billing unit of hundred cubic feet (ccf).

3.4 WATER BUDGET ALLOCATIONS BY CUSTOMER TYPE

Table 3-1 summarizes the water budget allocation by customer type. Both SingleFamily and Multi-Family (restricted and unrestricted) customers will receive an indoor and outdoor water budget. Irrigation accounts will only receive an outdoor budget. Commercial and Public Authority (CII) customers will continue with the current uniform water rate structure.

Table 3-1: Water Budget Allocations by Customer Type

Customer Type	Water Budget Allocations	Default Values
Single Family	IWB + OWB	Household Size = 4 persons; GPCD = 55 $ETAF_{New}$ = 70%; $ETAF_{Existing}$ = 80%; $DF_{outdoor}$ = 100%
Multi-Family – Restricted	IWB + OWB	Household Size = 2 persons; GPCD = 55 $ETAF_{New}$ = 70%; $ETAF_{Existing}$ = 80%; $DF_{outdoor}$ = 100%
Multi- Family – Unrestricted	IWB + OWB	Household Size = 3 persons; GPCD = 55 $ETAF_{New}$ = 70%; $ETAF_{Existing}$ = 80%; $DF_{outdoor}$ = 100%
Irrigation – Functional*	OWB	$ETAF_{New}$ = 70%; $ETAF_{Existing}$ = 80%; $DF_{outdoor}$ = 100%
Irrigation – Recreational**	OWB	$ETAF_{Recreational}$ = 100%; $DF_{outdoor}$ = 100%

Irrigation – Functional: landscape that is ornamental in nature
****Irrigation – Recreational: landscape that is used mostly for recreational purposes (schools, parks, golf courses, etc…)***

3.5 TIER DEFINITIONS

Based on the information in Table 3-1, the tier definitions are developed as shown in Table 3-2. The main difference between Single-Family/Multi-Family and Irrigation accounts is that Irrigation accounts do not have

a Tier 1 allotment which is reserved for indoor use. All three customer types have their Tier 3 allotment defined as 30 percent of their respective total water budget (TWB) and usage exceeding 130% TWB falls in Tier 4.

Table 3-2: Tier Definitions by Customer Types

Tiers	Single Family	Multi-Family	Irrigation
Tier 1 – Indoor Use	100% IWB	100% IWB	N/A
Tier 2 – Outdoor Use	100% OWB	100% OWB	100% OWB
Tier 3 – Inefficient Use	100% to 130% TWB	100% to 130% TWB	100% to 130% OWB
Tier 4 – Excessive Use	Above Tier 3	Above Tier 3	Above Tier 3
TWB = Total Water Budget = IWB + OWB			

The tier definitions are tailored to the unique consumption patterns of the District's customers and subject to the District's policy decisions. The tier definitions are based on Raftelis' usage and impact analysis and numerous policy discussions with the Board. The first priority for water use is essential indoor water use for health, safety, and sanitary purposes. Based on the Board's direction, indoor water use is eligible for revenue offsets from site leases and property tax revenues. Maintaining a healthy landscape at efficient water use is non-essential, yet important; thus, efficient outdoor water use is required to pay the Tier 2 rate. The total water budget is the sum of the indoor and outdoor water budgets.

Tier 3 was designed to account for inefficient use and/or customers with non-climate appropriate landscapes. Tier 3 is set to thirty percent (30%) of the total water budget and was determined based on the 2009 analysis which indicated that a customer with high water use plants would require 30% more water than an identical customer with climate-appropriate plants. Any use beyond Tier 3 is considered excessive and falls into Tier 4. Tiers 3 and 4 allow individuals to use additional water above their total water budget while providing a signal to each customer on their inefficient and excessive water usage. Tier 3 provides usage up to 30 percent of the total water budget and usage exceeding 130% TWB is considered to be excessive.

Any usage above an efficient level is subject to higher charges to fund conservation programs and any other supplemental water supply program. The current water supply is reserved for efficient water use within the District for indoor, outdoor, and commercial use. The higher Tier 3 rate serves as a signal for conservation and efficient use, whereas excessive use in Tier 4 incurs the highest marginal costs of providing service.

The Commercial class will continue to be billed at a uniform rate; however, this rate will encompass domestic use and inefficient use. Based on SB x7-7 (i.e. Water Conservation Act of 2009), which requires commercial users to cut back by 10 percent, indoor and efficient outdoor (or process) use are defined at 90 percent of total use and the remaining 10 percent use as inefficient. Additionally, indoor use is defined as 90 percent of the efficient use (90% x 90% = 81%) and the remainder is defined as efficient outdoor use (10% x 90% = 9%). The uniform rate charged to commercial customers will then be a blend of the usage defined here.

4. PASS-THROUGH WATER SUPPLY COSTS

The District purchases water from the Municipal Water District of Orange County (MWDOC), a member agency of Metropolitan Water District of Southern California (MWD). MWD rates are scheduled to increase in January 2020. The MWD rate increases, along with MWDOC's other costs, will be included in the blended rates charged to the District. As shown in Table 4-1, total combined water supply costs from the MWDOC purchased water and the Baker Treatment Plan costs are partially offset by capital charge revenue funding shown in Line 6. Dividing the total costs by the projected water sales (Line 8) results in the unit rate shown in Line 9. See Appendix 1 for detailed breakdown of water supply costs. Table 4-2 and Table 4-3 show that projected water supply rates will be increased by $0.06 across all tiers.

Table 4-1: Water Supply Revenue Requirements

Line #	Revenue Requirements	Budget FY 2020	Notes
1	MWDOC Fixed Costs	$0.634M	Appendix 1
2	MWDOC Variable Costs	$4.240M	Appendix 1
3	Baker Raw Water Cost	$2.495M	Appendix 1
4	Baker O&M Annual Cost	$0.662M	Appendix 1
5	Plus Baker Capital Cost (Debt Service)	$0.684M	Appendix 1
6	Less Capital Charge Revenue Funding of Baker Debt Service	-$0.500M	Appendix 1
7	Less Restricted Reserve Funding of Baker Debt Service	-$0.100M	Appendix 1
8	**Total Water Supply Costs**	**$8.116M**	**Sum of [1] to [7]**
9	Projected Water Sales	3,070,979 ccf	
10	**Water Supply Unit Rate**	**$2.64 /ccf**	**[7] / [8]**

Table 4-2: Current and Projected Water Supply Unit Rate

Fiscal Year (FY)	Water Supply Unit Rate $ / hundred cubic feet (ccf)
FY 2019	$2.58 / ccf
FY 2020	$2.64 / ccf
Increase / Change	**$0.06 / ccf**

Table 4-3: Water Supply Cost Component of the Water Rates ($/ccf)

Tiers	Descriptions	Current FY 2019	Proposed FY 2020
Tier 1 – Indoor Use	MWDOC + Baker Blended	$2.58	$2.64
Tier 2 – Outdoor Use	MWDOC + Baker Blended	$2.58	$2.64
Tier 3 – Inefficient Use	MWDOC + Baker Blended	$2.58	$2.64
Tier 4 – Excessive Use	MWDOC + Baker Blended	$2.58	$2.64
Uniform – CII Use	MWDOC + Baker Blended	$2.58	$2.64

5. WATER REVENUE REQUIREMENTS AND PROPOSED RATES

5.1 REVENUE REQUIREMENTS

Table 5-1 shows the derivation of the revenue requirement of the water rates. Total expenses for the water enterprise are shown in Line 1. Next, other supplementary revenues are subtracted from the expenses, serving as an offset of these costs. For the District, this is encompassed in the Non-Operating Revenues totaled in Line 2. These revenues include cell-site leases, property taxes, investment revenues, and others. The District began making annual debt payments totaling $0.684M annually for its contribution to the Baker Treatment Plant's construction. This Debt Service (Line 3) is added to the O&M expenses. Next, the District will use reserves to offset some of the operating expenses and reduce the revenue required from rates for FY 2020 (Line 4). The total revenue required from rates, excluding Fire Service, is shown in Line 5.

Details of the figures presented in Table 5-1can be found in Appendix 3, in the Cash Flow Analysis for the Water Funds. The Cash Flow Analysis is part of the Financial Plan developed by District staff to determine the long-term financial needs of the District. Raftelis based its determination of the revenue requirements and cost of service for FY 2020 on the Financial Plan developed by District Staff.

Table 5-1: Water Operating Revenue Requirements from Rates[5]

Line #	Water Operating Revenue Requirements	FY 2020 Budgeted	Notes
1	Total Water O&M Expenses	$13.428M	
2	Less (-) Non-Operating Revenues	-$1.727M	Appendix 3
3	Plus (+) Debt Service	$0.684M	Appendix 3
4	Plus (+) Operating Reserve Funding	-$0.479M	Appendix 3
5	**Total Rev Req from Rates, excluding Fire SC**	**$11.906M**	

The District separately charges customers for the cost of capital repair and replacement (R&R) for the water and recycled water systems via a fixed charge. Table 5-2 provides the calculation of the Capital R&R revenue requirement from capital R&R charges.

[5] May include some rounding errors

Table 5-2: Water Capital Revenue Requirements

Line #	Water Capital Revenue Requirements	Water
1	Water Capital Expenditures	$752,656
2	Plus (+) Baker Capital Funding	$500,000
3	Less (-) Restricted Reserve Funding	$0
4	**Total Water Capital R&R Revenue Requirement**	**$1,252,656**
5	Current Water Capital R&R Revenues	$1,252,656
6	**% Rate Increase**	**0%**

5.2 COST OF SERVICE ANALYSIS

To allocate costs appropriately to the different usage classes and determine the cost of service rates, revenue requirements are allocated to the following cost causation categories[6] consistent with the Base Extra Capacity methodology of the American Water Works Association (AWWA) *M1 Manual*, *Principles of Water Rates, Fees, and Charges* (M1 Manual):

1. Water supply costs: Imported water supply costs, allocated to all users in proportion to their usage.
2. Base fixed costs: fixed costs associated with operating and maintaining water system to deliver water to meet average demand, including customer service, meter service, administration, and other base fixed costs.
3. Peaking costs: fixed costs associated with operating and maintaining water system to deliver water to meet peak demand.
4. RW Funding: The use of RW for non-potable needs releases potable supply for inefficient and excessive use. RW is the least expensive supplemental source of water available to the District and creates supply for potable needs. The revenues collected under this category will be collected in restricted reserves to assist the RW fund to pay for debt services used to finance the RW expansion project completed in FY 2015 and expanded in FY 2019.
5. Conservation: Conservation program cost, allocated to inefficient and excessive use to help conserve water.
6. Revenue Offsets: Property taxes and cell tower lease revenues to provide incentive for indoor/domestic use.

The cost causation categories above are then assigned to each rate component:

[6] See Appendix 6 for details about cost allocations

Fixed Rate Components (i.e. Monthly Service Charges)

- To recover customer service, meter service, administration and other base fixed costs and a portion of the peaking costs.

Commodity Rate Components

- Water supply: to recover imported water supply costs.
- Delivery / Peaking: to recover remaining peaking costs associated with operating and maintaining water system to deliver water to meet peak demand. These costs are allocated based on the peaking characteristics of each class of use.
- Recycled Water (RW): to generate supplemental funding sources to pay for RW expansion projects.
- Conservation: to recover the conservation program cost, allocated to inefficient and excessive users, to help encourage water conservation.
- Revenue offsets: A portion of the property taxes and cell tower lease revenues to provide incentive for indoor/domestic use.

Capital R&R Charges:

- Funds for the capital replacement and refurbishment of the existing water and RW system.

Table 5-3 below summarizes the unrestricted revenue requirement for each cost category. The Total Cost of Service (Line 8) is divided among the various cost components (Lines 1-5 & 7). The District Board directs District staff to provide a revenue offset for essential use provided by non-rate revenues (Line 5). The revenue requirements for water supply, base fixed, and peaking were determined using COS allocation methods recommended by AWWA. Details of how the revenue requirements for these three cost causation categories were determined can be found in Appendix 6.

Table 5-3: Unrestricted Revenue Requirements by Cost Categories

Line #	Revenue Requirements	FY 2020	Water Rate Components		
			Monthly Service Charges	Unrestricted Water Commodity Rates	Water Capital R&R
1	Water Supply	$8,115,712		$8,115,712	
2	Billing & CS	$506,327	$506,327		
3	Base Fixed	$2,185,911	$2,185,911		
4	Peaking	$1,503,566	$802,566	$701,000	
5	Rev Offset	($405,277)		($405,277)	
6	**Subtotal Water Rev from Rates, excl. Fire SC**	**$11,906,239**	**$3,494,805**	**$8,411,435**	
7	Capital R&R	$1,252,656			$1,252,656
8	**Net Revenue Requirement**	**$13,158,895**	**$3,494,805**	**$8,411,435**	**$1,252,656**

The total revenue requirement for each cost causation category is then assigned to a rate component. For example, it is appropriate that the entirety of the water supply revenue requirement is assigned to the water supply rate component. The Revenue Offset is all assigned entirely to their respective rate components.

The AWWA M1 Manual describes a cost of service approach to setting water rates which results in the distribution of costs to each customer or customer class based on the costs that each incurs. A dual set of fees—fixed and variable—is an extension of this cost causation theory. For example, a utility incurs some costs associated with serving customers irrespective of the amount or rate of water they use, such as billing and customer service costs. These types of costs are referred to as customer-related costs and typically are costs that would be recovered through a fixed monthly service charge. These costs are usually recovered on a per-customer basis or some other non-consumptive basis. Regardless of the level of a customer's consumption, a customer will be charged this minimum amount on each bill.

Utilities invest in and continue to maintain facilities to provide capacity to meet all levels of desired consumption including the peak demand plus fire protection, and these costs also must be recovered regardless of the amount of water used during a given period. Thus, capacity or peaking costs along with base costs are generally considered as fixed water system costs. Ideally an agency could recover 100% of the fixed costs in the fixed charges, therefore providing revenue stability; however, this approach foregoes affordability for essential use and heavily impacts small users. To balance between affordability and revenue stability, a portion of the base costs and peaking costs are recovered in the fixed charges along with the customer-related costs and meter-related costs. Revenue requirements for the District's fixed monthly service charges include 100 percent of base fixed costs, inclusive of billing and customer service costs and other fixed costs to meet average demand, and a portion of the peaking costs. The remaining peaking costs are recovered in the delivery rate component of the commodity rates.

The rate structure remains unchanged and consists of the monthly fixed service and the volumetric commodity rates which are determined as follows (Table 5-4):

- The monthly service charge includes customer service, fixed base costs and a portion of the peaking costs (shown in Table 5-3).
- The volumetric water commodity rates include water supply (to recover total purchased water costs from MWDOC and Baker Water Treatment Plant water costs), delivery/peaking (to recover the District's remaining peaking costs), RW funding, conservation, and revenue offsets components.

Table 5-4: Cost Categories and Water Rate Structure

Cost Components	Service Charges	Tier 1 Essential Use	Tier 2 Efficient Use	Tier 3 Inefficient Use	Tier 4 Excessive Use	Commercial Use
Billing & Customer Service	x					
Meters	x					
Fixed Base Costs	x					
Delivery Peaking Costs	x	x	xx	xxx	xxx	x
Water Supply		x	x	x	x	x
RW Program Funding				xx	xxx	x
Conservation				x	x	x
Rev Offset		x				x

Extra capacity costs representing the demand placed on the system are related to the capacity of the meters. The capacity of the meters is determined by comparing the hydraulic capacity of the meters to the smallest meter in the system which is assigned a capacity of one. Thus, a 1-inch meter that can continuously deliver 50 gallons per minute ("gpm") is considered to have a capacity of 2.5 when compared to the 5/8-inch meter which can deliver 20 gpm. Because of the unique characteristics of the District's service area, the maximum of the hydraulic capacity or the actual usage characteristics were used to determine the capacity of the meters. For example, a 2-inch meter, on the average, used 10 times the water of the 5/8-inch meter. The meter capacity ratios representing the maximum of the hydraulic ratio or the actual usage is used to calculate the equivalent meter units to recover the meters & capacity costs (based on ETWD Cost of Service Study Report for Water, Wastewater and Recycled Water prepared in April 2009).

Table 5-5: Units of Service for Monthly Service Charges

Meter Size	Water Accounts A	Bills / year B = A x 12	Meter Capacity Ratios C	EMUs[7] D = B x C
5/8"	2,388	28,656	1.00	28,656
¾"	4,856	58,272	1.50	87,408
1"	447	5,364	2.50	13,410
1 ½"	702	8,424	5.00	42,120
2"	1,135	13,620	10.00	136,200
Total	**9,528**	**114,336 Bills**		**307,794 EMUs**

Table 5-6: Calculated Unit Cost of Service for Monthly Service Charges

	Billing & Customer Service	Meters & Capacity
Revenue Requirements *(Table 5-3)*	$506,327	$2,988,477
Units of Service *(Table 5-5)*	114,336 bills / yr	307,794 EMUs / yr
Unit Cost of Service	**$4.43**	**$9.71**

[7] EMUs = equivalent meter units

Table 5-7: Proposed Monthly Service Charges Calculations

Meter Size	Billing & CS A	Meters & Capacity B[8]	Proposed FY 2020 C = A + B	Current FY 2019 D	$ Change E = C – D	% Change F = E / D
5/8"	$4.43	$9.71	**$14.14**	$12.96	$1.18	9.1%
¾"	$4.43	$14.56	**$18.99**	$17.37	$1.62	9.3%
1"	$4.43	$24.27	**$28.70**	$26.20	$2.50	9.5%
1 ½"	$4.43	$48.55	**$52.98**	$48.25	$4.73	9.8%
2"	$4.43	$97.09	**$101.52**	$92.36	$9.16	9.9%

5.3 PROPOSED RATES

As discussed above, the District has determined that it will not increase its Capital R&R charges in FY 2020. In addition, the District will pass-through the increase in water supply costs in the water commodity rates.

5.3.1 Monthly Service Charges

Based on the revenue requirements shown in Table 5-3 and the Monthly Service Charge calculations in Tables 5-5 to 5-7, the proposed Monthly Service Charges for FY 2020 are shown below.

Table 5-8: Monthly Service Charges

Meter Size	Proposed FY 2020 A	Current FY 2019 B	$ Change C = A – B	% Change D = C/B	Water Accounts E
5/8"	$14.14	$12.96	$1.18	9.1%	2,388
¾"	$18.99	$17.37	$1.62	9.3%	4,856
1"	$28.70	$26.20	$2.50	9.5%	447
1 ½"	$52.98	$48.25	$4.73	9.8%	702
2"	$101.52	$92.36	$9.16	9.9%	1,135
Projected Revenues[9]	**$3,494,734**	**$3,188,504**	**$306,229**	**9.6%**	**9,528**

[8] $9.71 (from Table 5-6) x Meter Capacity Ratio for each meter size (from Table 5-5, column C)

[9] Projected Revenues = Σ (Service Charges x # of Accounts for each meter size) x 12 bills/year

5.3.2 Capital R&R Charges

As discussed above, the District will not adjust the Capital R&R Charges.

Table 5-9: Water Capital R&R Charges

Meter Size	Current FY 2019	Proposed FY 2020	Water Accounts	RW Accts	Water + RW Accounts
5/8"	$4.66	**$4.66**	2,388	0	2,388
¾"	$4.66	**$4.66**	4,856	0	4,856
1"	$7.78	**$7.78**	447	0	447
1 ½"	$18.91	**$18.91**	702	28	730
2"	$47.47	**$47.47**	1,135	247	1,382
Projected Revenues			**$1,252,656**	**$147,055**	**$1,399,710**

5.3.3 Commodity Rates

The District will pass-through increases in water supply costs in the Water Commodity Rates. See Section 4 for projected water supply costs and unit cost change.

Table 5-10: FY 2020 Proposed Water Commodity Rates

Tier	FY 2019 Current	FY 2020 Proposed	$ Change	% Change	Projected Water Sales
Tier 1 - Essential Use	$2.52	**$2.58**	$0.06	2.4%	1,585,270 ccf
Tier 2 - Efficient Use	$2.91	**$2.97**	$0.06	2.1%	847,489 ccf
Tier 3 - Inefficient Use	$6.08	**$6.14**	$0.06	1.0%	113,809 ccf
Tier 4 - Excessive Use	$7.82	**$7.88**	$0.06	0.8%	102,149 ccf
Uniform - Commercial Use	$2.89	**$2.95**	$0.06	2.1%	422,262 ccf
Total Projected Revenues	**$9,172,174**	**$9,356,433**	**$184,259**	**2.0%**	**3,070,979 ccf**

6. WASTEWATER REVENUE REQUIREMENTS AND PROPOSED RATES

6.1 MONTHLY SERVICE CHARGES

As with the Water Enterprise, the Wastewater Enterprise will maintain its cost of service allocations. Therefore, the rates will be updated to account for any necessary adjustments to meet the revenue requirements projected for FY 2020. Table 6-1 shows the calculation of the Wastewater O&M revenue requirement from rates. The Wastewater O&M expenses (Line 1) will be partially offset by non-operating revenues (Line 2). The District also continues to have a debt obligation (Line 3) due entirely to the Northline Lift Station. The resulting revenue requirement for FY 2020 is shown in Line 5 and compared to the projected FY 2020 revenues from current rates in Line 6. The projected revenue from current rates was provided in the Wastewater Enterprise's cash flow statement. Based on the projected revenue requirement, the current Wastewater rates are sufficient for FY 2020, thus the District will not adopt any change for FY 2020.

Table 6-1: Wastewater O&M Revenue Requirements from Rates

Line #	Wastewater Operating Revenue Requirements	Budget FY 2020	Notes
1	Total WW O&M Expenses	**$8,085,394**	Appendix 2
2	Less (-) Non-Operating Revenues	($592,000)	Appendix 5
3	Plus (+) Debt Service	$258,146	Appendix 5
4	Plus (+) Operating Reserve Funding	$23,460	Appendix 5
5	**Total Revenue Requirement from WW Rates**	**$7,775,000**	
6	Current WW Service Revenues	$7,775,000	Appendix 5
7	Required Revenue Increase	$0	Appendix 5
8	**Overall WW Rate Increase**	**0.0%**	

Table 6-2 provides the proposed rates for FY 2020, which is the same as the FY 2019 rates.

Table 6-2: FY 2020 Proposed Wastewater Service Charges

Customer Class	FY 2019 Current	FY 2020 Proposed	$ Increase	% Increase
Residential Unrestricted	$24.30 / EDU	$24.30 / EDU	$0.0	0.0%
Multi-Family Restricted	$19.28 / EDU	$19.28 / EDU	$0.0	0.0%
Multi-Family Unrestricted	$22.92 / EDU	$22.92 / EDU	$0.0	0.0%
Animal Kennel/Hospital	$3.99 / ccf	$3.99 / ccf	$0.0	0.0%
Car Wash	$3.97 / ccf	$3.97 / ccf	$0.0	0.0%
Department/Retail Store	$3.99 / ccf	$3.99 / ccf	$0.0	0.0%
Dry Cleaners	$3.50 / ccf	$3.50 / ccf	$0.0	0.0%
Golf Course/Camp/Park	$3.49 / ccf	$3.49 / ccf	$0.0	0.0%
Health Spa	$3.98 / ccf	$3.98 / ccf	$0.0	0.0%
Hospital/Convalescent Home	$3.50 / ccf	$3.50 / ccf	$0.0	0.0%
Hotel	$6.04 / ccf	$6.04 / ccf	$0.0	0.0%
Market	$7.92 / ccf	$7.92 / ccf	$0.0	0.0%
Mortuary	$7.89 / ccf	$7.89 / ccf	$0.0	0.0%
Nursery/Greenhouse	$3.54 / ccf	$3.54 / ccf	$0.0	0.0%
Professional/Financial Office	$3.99 / ccf	$3.99 / ccf	$0.0	0.0%
Public Institution	$3.93 / ccf	$3.93 / ccf	$0.0	0.0%
Repair/Service Station	$3.98 / ccf	$3.98 / ccf	$0.0	0.0%
Restaurant	$3.77 / ccf	$3.77 / ccf	$0.0	0.0%
Schools	$4.13 / ccf	$4.13 / ccf	$0.0	0.0%
Theater	$3.99 / ccf	$3.99 / ccf	$0.0	0.0%
Warehouse/Storage	$3.16 / ccf	$3.16 / ccf	$0.0	0.0%
Basic Commercial	$3.50 / ccf	$3.50 / ccf	$0.0	0.0%

6.2 CAPITAL R&R CHARGES

The Wastewater Enterprise also charges a separate Capital R&R Charge. As shown in Table 6-3, there is no increase in revenue requirements for WW Capital R&R charges. The proposed Capital R&R Charges are shown in Table 6-4.

Table 6-3: Wastewater Capital R&R Revenue Requirements

Wastewater Revenue Requirement from Rates	Budget FY 2020 *(Appendix 5)*
Total Capital Expenditures	$1,615,000
Current Wastewater Capital R&R Revenues	$1,615,000
Overall Capital R&R Rate Increase	**0%**

Table 6-4: FY 2020 Proposed Wastewater Capital R&R Charges

Customer Classes	Current Capital R&R Charges	FY 2020 Capital R&R Charges	$ Increase	% Increase
Residential				
Residential Unrestricted	$4.93 / EDU	$4.93 / EDU	$0.00	0.0%
Multi-Family Restricted	$3.91 / EDU	$3.91 / EDU	$0.00	0.0%
Multi-Family Unrestricted	$4.65 / EDU	$4.65 / EDU	$0.00	0.0%
Non-Residential				
5/8"	$4.34 / month	$4.34 / month	$0.00	0.0%
3/4"	$7.34 / month	$7.34 / month	$0.00	0.0%
1"	$13.55 / month	$13.55 / month	$0.00	0.0%
1 1/2"	$24.07 / month	$24.07 / month	$0.00	0.0%
2"	$70.96 / month	$70.96 / month	$0.00	0.0%
Public Authority				
1"	$4.93 / month	$4.93 / month	$0.00	0.0%
1 1/2"	$24.65 / month	$24.65 / month	$0.00	0.0%
2"	$39.71 / month	$39.71 / month	$0.00	0.0%

7. RECYCLED WATER REVENUE REQUIREMENTS AND PROPOSED RATES

7.1 RECYLED WATER SYSTEM

Prior to the completion of the Recycled Water Expansion Project, the District had only one recycled water (RW) customer who purchased secondary treated disinfected recycled water - Laguna Woods Village Golf Course, operated by the Golden Rain Foundation (GRF). There was neither a monthly service charge nor a capital R&R charge for this RW customer since all services were provided based on the terms of the service contract. With the completion of the RW expansion project, all RW customers (existing and converted customers) are now supplied with higher quality tertiary RW and all RW customers are subject to the corresponding rates that support the annual cost of providing tertiary RW.

In FY 2015, the District completed the expansion of its recycled water system, including water recycling plant (WRP) upgrades to tertiary treatment and RW distribution system pipeline expansion. In FY 2019, the District completed the Phase II expansion of the RW Distribution System. The RW expansion capital cost for both phases, was financed by the following sources: State Revolving Fund (SRF) Loan, grants, and from the restricted reserve (revenues from Tier 3 and Tier 4 potable usage dedicated to recycled water expansion).

7.2 PROJECTED RECYCLED WATER SALES

The District currently serves 210 Recycled Water accounts and projects to increase to 275 accounts in FY 2020. The projected RW sales for FY 2020 are estimated at 1,449AF. The District projects an increase of 149 AF or 11.47% in consumption for FY 2020.

Table 7-1: Recycled Water Sales

	RW Sales	
	ccf	AF
FY 2019 Estimated Actual Sales	566,280	1,300
FY 2020 Budgeted Sales	631,260	1,449
Increase	64,980	149
% Increase	11.47%	

7.3 REVENUE REQUIREMENT AND PROPOSED RATES

In FY 2015, the District began separating Recycled Water costs into an independent RW Enterprise Fund. Table 7-2 summarizes the RW revenue requirements from rates for FY 2020. RW O&M expenses and supply (Line 3) will be partially offset by non-operating revenues (Line 4). The RW Fund's debt service payment (Line 6) will be partially covered by Restricted Reserve Funding (Line 5) and RW Capital Charge Funding of Debt (Line 6). The remaining revenue requirement to be recovered from rates is shown in Line 8. The line items shown below are further detailed in Appendix 4 – Cash Flow Analysis for RW Funds, developed by District Staff and provided to Raftelis as basis for the cost of service analysis.

Table 7-2: Recycled Water Revenue Requirement from Rates

Line #	Revenue Requirement	FY 2020	Notes
1	Treatment Tertiary Recycled Water	$296,400	Appendix 2
2	Other RW O&M	$886,365	Appendix 2
3	**Revenue Requirement for RW**	**$1,182,765**	
4	Less (-) Non-Operating Revenues	($384,000)	Appendix 4
5	Less (-) Restricted Reserve Funding	($659,853)	Appendix 4
6	Less (-) RW Capital Charge Funding of Debt	(-$147,000)	Appendix 4
7	Plus (+) Debt Service	$2,013,220	Appendix 4
8	**Total Revenue Requirement from Rates**	**$2,005,132**	

All RW customers connected to the recycled water distribution system will be assessed the same Monthly Service Charges (Table 7-3) and Capital R&R Charges (Table 7-4) as potable customers to recover the customer service, meter service, a portion of capacity and other RW related fixed costs and to pay for capital R&R of expanded RW system. After the completion of the RW expansion in FY 2015, all RW customers (existing and converting customers) are now supplied with higher quality tertiary RW and will be subject to the corresponding rates that support the annual projected cost of providing tertiary RW.

Table 7-3: FY 2020 Proposed Monthly Service Charges

Meter Size	FY 2019 Current A	FY 2020 Proposed B	# of RW Accounts C
5/8-in	$12.96	$14.14	0
3/4-in	$17.37	$18.99	0
1-in	$26.20	$28.70	0
1 1/2-in	$48.25	$52.98	28
2-in	$92.36	$101.52	247
Projected RW Revenues *(Column A or B x Column C x 12)*	**$289,967**	**$318,707**	**275 Accounts**

Table 7-4: FY 2020 Proposed Capital R&R Charges

Meter Size	FY 2019 Rates	FY 2020 Rates	$ Increase	% Increase
5/8-in	$4.66	$4.66	$0.00	0%
3/4-in	$4.66	$4.66	$0.00	0%
1-in	$7.78	$7.78	$0.00	0%
1 1/2-in	$18.91	$18.91	$0.00	0%
2-in	$47.47	$47.47	$0.00	0%
Projected Capital R&R RW Revenues	**$147,055**	**$147,055**		

Table 7-5 derives the revenue required from the Recycled Water Commodity Rate (Line 3) by subtracting the Monthly Service Charge Revenue (Line 2) from the Total Revenue Requirements (Line 1). The unit RW commodity rate is calculated using the net revenue requirements from RW commodity rates (Line 3) divided by projected RW sales (Line 4). The RW commodity rate for FY 2020 is $2.67 / ccf or $1,163 / AF, which is approximately 90% of Tier 2 Potable Water Commodity Rate for FY 2020 and provides an economic incentive for irrigation customers to convert to RW.

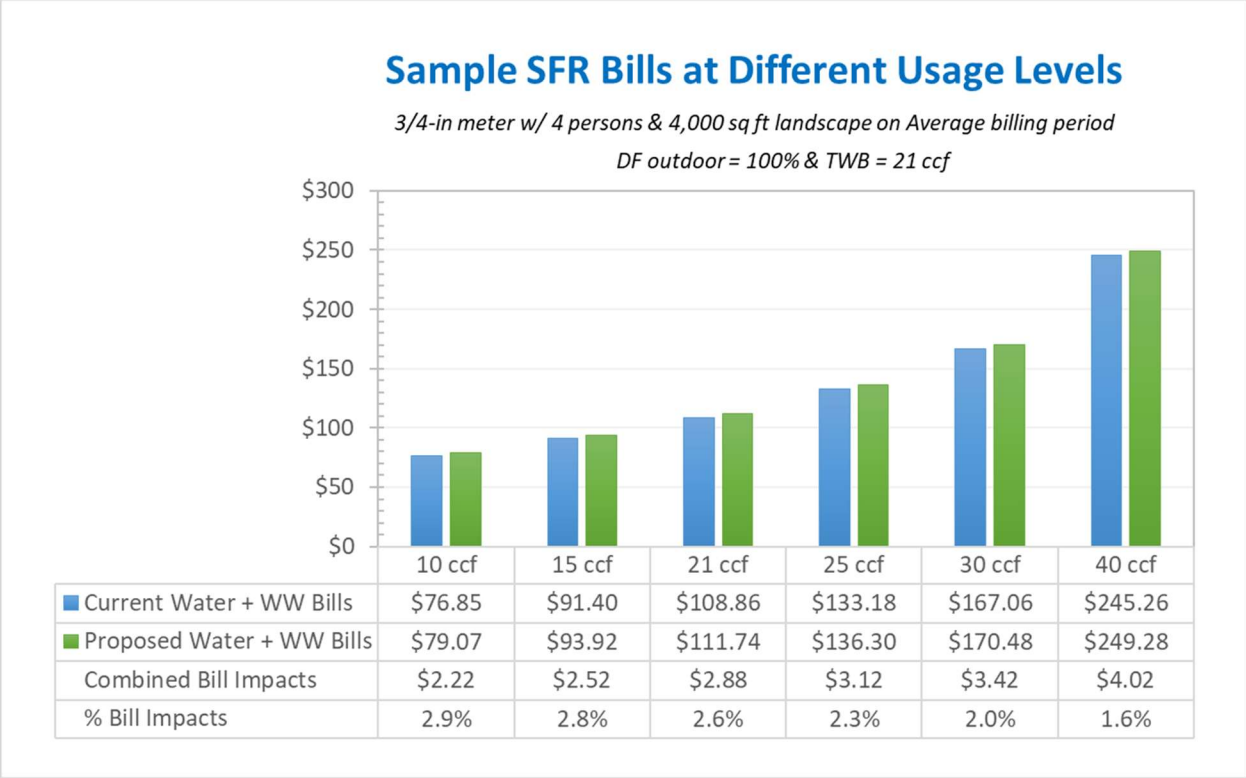
Table 7-5: Recycled Water Commodity Rate Calculation

Line #		FY 2020
1	Total Revenue Requirement from RW Rates	$2,005,132
2	Less (-) Monthly Service Charge	($318,707)
3	**Net Commodity Rate Revenue Requirements**	**$1,686,425**
4	Projected RW Sales	631,260 ccf
5	**Unit RW Commodity Rate ($/ccf)**	**$2.67 /ccf**
6	Unit RW Commodity Rate ($/AF)	$1,163/AF
7	Percent of Tier 2 Potable Water Rate	90%

8. CUSTOMER IMPACT ANALYSIS

Figure 8-1 shows a breakdown of water and wastewater bills at various water usage levels for a single-family residential user with 4 occupants and 4,000 sq. ft. landscape area serviced by a ¾-in meter. The combined water and wastewater bill increase would be ranging from $2.22 to $4.02 per month depending on the monthly billed water usage. The bill impacts are resulting from increases in water monthly fixed service charges and water supply costs. Note that the impacts for recycled water are not shown because residential users do not purchase recycled water.

Figure 8-1: SFR Total Monthly Bill at Different Usage Levels



	10 ccf	15 ccf	21 ccf	25 ccf	30 ccf	40 ccf
Current Water + WW Bills	$76.85	$91.40	$108.86	$133.18	$167.06	$245.26
Proposed Water + WW Bills	$79.07	$93.92	$111.74	$136.30	$170.48	$249.28
Combined Bill Impacts	$2.22	$2.52	$2.88	$3.12	$3.42	$4.02
% Bill Impacts	2.9%	2.8%	2.6%	2.3%	2.0%	1.6%

9. APPENDICES

9.1 APPENDIX 1 – PASS-THROUGH WATER SUPPLY COST

Source: 10YearCashFlow.1920.Revision 3.KP.xlsx sent by Dennis 3/12/19

EL TORO WATER DISTRICT
2019/20 PURCHASED WATER BUDGET

		2018/19 Budget		2018/19 Projected Actual		2019/20 Budget	
		Jul 2018	Jan 2019	Jul 2018	Jan 2019	Jul 2019	Jan 2020
1	Total Period Demand (AF)	4,000	3,500	4,060	3,483	3,925	3,425
2	Total Annual Demand (AF)		7,500		7,543		7,350
3	Total Water Sales (AF)		7,200		7,243		7,050
4	MWD Period Demand (AF)	2,321	1,821	2,333	1,688	2,246	1,746
5	MWD Annual Demand (AF)		4,142		4,021		3,992
6	**MWD Untreated Commodity Rates**						
7	System Access Rate	299.00	326.00	299.00	326.00	326.00	346.00
8	System Power Rate	132.00	127.00	132.00	127.00	127.00	136.00
9	Water Stewardship Rate	55.00	69.00	55.00	69.00	69.00	65.00
10	MWD Tier 1 Rate	209.00	209.00	209.00	209.00	209.00	208.00
11	**Subtotal Untreated Full Service**	**695.00**	**731.00**	**695.00**	**731.00**	**731.00**	**755.00**
12	Treatment Surcharge	320.00	319.00	320.00	319.00	319.00	323.00
13	**Total Treated Full Service Rate**	**1,015.00**	**1,050.00**	**1,015.00**	**1,050.00**	**1,050.00**	**1,078.00**
14	**Total Treated Full Service Annual Cost**	**2,355,815**	**1,912,050**	**2,367,792**	**1,772,280**	**2,358,300**	**1,882,188**
15	**MWD Fixed Charges**						
16	Capacity Reservation Charge	72,126	71,297	71,569	56,610	56,610	58,200
17	Readiness To Serve Charge	228,318	216,902	212,924	197,838	197,838	202,200
18	**Total MWD Fixed Charges**		**588,643**		**538,941**		**514,848**
19	**Total MWD Cost**		**4,856,508**		**4,679,013**		**4,755,336**
20	**Total MWD Unit Cost ($/AF)**		**1,173**		**1,164**		**1,191**
21	**MWDOC Connection Rate ($/meter)**	**12.25**		**12.25**		**12.50**	
22	ETWD Meters	9,562		9,568		9,568	
23	**MWDOC Connection Charge ($)**		**117,135**		**117,208**		**119,600**
24	**Baker Water Treatment Plant**						
25	Period Demand (AF)	1,679	1,679	1,728	1,795	1,679	1,679
26	Annual Demand (AF)		3,258		3,258		3,358
27	**Baker Raw Water Cost ($)**	**1,166,905**	**1,227,349**	**1,200,613**	**1,312,086**	**1,227,349**	**1,267,645**
28	Baker O&M Unit Cost ($ per AF)	182	182	172	182	187	187
29	SAC Surcharge ($ per AF)	8	8	8	8	8.38	8.38
30	SCP Surcharge ($ per AF)	1	1	1	1	1.15	1.15
31	**Baker O&M Annual Cost ($)**	**321,536**	**321,536**	**313,127**	**343,296**	**330,759**	**330,759**
32	Baker Capital Cost (Debt Service)	342,131	342,131	342,131	342,131	342,131	342,131
33	**Total Period Baker Water Treatment Plant Cost**	**1,830,572**	**1,891,016**	**1,855,870**	**1,997,513**	**1,900,239**	**1,940,535**
34	**Total Annual Baker Water Treatment Plant Cost**		**3,721,587**		**3,853,383**		**3,840,775**
35	**Baker Water Treatment Plant Unit Cost($/AF)**		**1,142**		**1,183**		**1,144**
36	**Capital Charge Revenue Funding**		**(600,000)**		**(600,000)**		**(600,000)**
37	**Total Baker Water Treatment Plant Cost**		**3,121,587**		**3,253,383**		**3,240,775**
38	**Total Purchased Water Cost**						
39	MWD		4,856,508		4,679,013		4,755,336
40	MWDOC		117,135		117,208		119,600
41	Baker		3,121,587		3,253,383		3,240,775
42	**Total Purchased Water Cost**		**8,095,230**		**8,049,604**		**8,115,711**
43	**Total Expense (Less Baker Debt Service)**		**8,010,968**		**7,965,342**		**8,031,449**
44	Percent Increase Budget to Budget per Unit						2.30%
45	**Overall Imported Water Effective Rate**						
46	Fiscal Year Cost per Acre Foot Purchased		**1,079**		**1,067**		**1,104**
47	Fiscal Year Cost per CCF Purchased		**2.48**		**2.45**		**2.53**
48	Fiscal Year Rate per CCF Sold		**2.58**		**2.55**		**2.64**

9.2 APPENDIX 2 – O&M EXPENSES ALLOCATIONS TO WATER, RECYCLED WATER AND WASTEWATER FUNDS

Source: 10YearCashFlow.1920.Revision 3.KP.xlsx sent by Dennis 3/14/19

	Projected 2018/19 Actual	Water	Sewer	Recycled Water	Total		2019/20 Budget	Water	Sewer	Recycled Water	Total
Source of Supply	8,093,641	8,093,641			8,093,641		8,174,298	8,174,298			8,174,298
Pumping Water	232,464	232,464			232,464		256,281	256,281			256,281
Treatment Water	36,603	36,603			36,603		40,851	40,851			40,851
Transmission & Distribution Water	571,302	571,302			571,302		554,807	554,807			554,807
Customer Accounts	0	0			0		0	0			0
Outside Treatment Sewer	956,478		956,478		956,478		913,500		913,500		913,500
Pumping Sewer	348,858		348,858		348,858		335,724		335,724		335,724
Treatment Sewer	835,294		835,294		835,294		834,349		834,349		834,349
Treatment Tertiary Recycled Water	267,329			267,329	267,329		296,400			296,400	296,400
Transmission & Distribution Sewer	211,565		211,565		211,565		279,450		279,450		279,450
T&D Recycled Water	0			0	0		6,000			6,000	6,000
Operations Support	232,467	92,987	120,883	18,597	232,467		246,666	98,666	128,266	19,733	246,666
Operations Support Power	9,400	3,760	4,888	752	9,400		9,800	3,920	5,096	784	9,800
Fleet	255,231	102,092	132,720	20,418	255,231		271,337	108,535	141,095	21,707	271,337
Operations Indirect Costs	32,092	12,837	16,688	2,567	32,092		33,755	13,502	17,553	2,700	33,755
Information Technology	283,307	113,323	147,320	22,665	283,307		299,000	119,600	155,480	23,920	299,000
Administration	153,522	61,409	79,831	12,282	153,522		167,700	67,080	87,204	13,416	167,700
Admin Power	38,600	15,440	20,072	3,088	38,600		40,200	16,080	20,904	3,216	40,200
Administration Indirect Costs	1,280,390	512,156	665,803	102,431	1,280,390		1,390,020	556,008	722,810	111,202	1,390,020
Depreciation & Amortization	4,404,486	1,761,794	2,290,333	352,359	4,404,486		4,476,850	1,790,740	2,327,962	358,148	4,476,850
Interest Expense	769,061	289,290	80,367	399,403	769,061		731,557	277,046	75,567	378,944	731,557
Total	**19,012,088**	**11,899,097**	**5,911,099**	**1,201,891**	**19,012,088**		**19,358,545**	**12,077,415**	**6,044,961**	**1,236,169**	**19,358,545**
Other O&M											
Purchased Water	$7,965,342	$7,965,342			7,965,342		8,031,449	8,031,449			8,031,449
SOCWA	942,978		$942,978		942,978		900,000		900,000		900,000
Fuel & Power	1,083,900	192,360	753,880	137,650	1,083,890		1,125,400	200,700	760,700	$164,000	1,125,400
Operations Indirect Costs	32,092	12,837	16,688	2,567	32,092		33,755	13,502	17,553	2,700	33,755
Information Technology	283,307	113,323	147,320	22,665	283,307		299,000	119,600	155,480	23,920	299,000
Administration	153,522	61,409	79,831	12,282	153,522		167,700	67,080	87,204	13,416	167,700
Administration Indirect Costs	1,280,390	512,156	665,803	102,431	1,280,390		1,390,020	556,008	722,810	111,202	1,390,020
Depreciation & Amortization	4,404,486	1,761,794	2,290,333	352,359	4,404,486		4,476,850	1,790,740	2,327,962	358,148	4,476,850
Interest Expense	769,061	289,290	80,367	399,403	769,061		731,557	277,046	75,567	378,944	731,557
Total Other O&M	**2,097,010**	**990,586**	**933,899**	**172,535**	**2,097,020**		**2,202,814**	**1,021,289**	**997,685**	**183,840**	**2,202,814**
Labor	8,178,474	3,271,390	4,252,807	654,278	8,178,474		8,546,083	3,418,433	4,443,963	683,687	8,546,083
Total Expense	**27,190,562**	**15,170,487**	**10,163,906**	**1,856,169**	**27,190,562**		**27,904,628**	**15,495,848**	**10,488,924**	**1,919,856**	**27,904,628**
Less Depreciation & Interest	**22,017,015**	**13,119,403**	**7,793,205**	**1,104,407**	**22,017,015**		**22,696,221**	**13,428,061**	**8,085,394**	**1,182,765**	**22,696,221**
Enterprise Allocations		**40%**	**52%**	**8%**							
Per 1920 Labor Budget Dept Salary Analysis											

9.3 APPENDIX 3 – CASH FLOW ANALYSIS FOR WATER FUND

Source: 10YearCashFlow.1920.Revision 3.KP.xlsx sent by Dennis 3/14/19

WATER CASH FLOW		2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
BEGINNING RESERVE BALANCE		**7,008,696**	**6,685,893**	**6,207,248**	**5,814,384**	**5,580,190**	**5,551,523**	**5,551,539**	**5,556,207**	**5,556,295**	**5,561,233**	**5,565,295**
OPERATIONS & MAINTENANCE CASH FLOW												
O&M REVENUES												
Revenue from 18/19 Commodity Rates (Unrestricted)		8,421,659	8,228,476	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810	8,086,810
Revenue from 18/19 Fixed Meter Rates		3,250,123	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504	3,188,504
Revenue from 18/19 Fire / Flooding Meters		116,000	128,000	140,600	154,300	169,500	179,000	187,600	196,400	206,700	216,600	227,600
Additional Service Revenue Required												
Year	**Rate Action**											
2019-20	MWD Pass Through		184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259	184,259
2019-20	Tier 1 Offset Increase		0	0	0	0	0	0	0	0	0	0
2019-20	COS Rate Increase		305,000	305,000	305,000	305,000	305,000	305,000	305,000	305,000	305,000	305,000
2020-21	MWD Pass Through			272,500	272,500	272,500	272,500	272,500	272,500	272,500	272,500	272,500
2020-21	COS Rate Increase			345,000	345,000	345,000	345,000	345,000	345,000	345,000	345,000	345,000
2021-22	MWD Pass Through				302,700	302,700	302,700	302,700	302,700	302,700	302,700	302,700
2021-22	COS Rate Increase				375,000	375,000	375,000	375,000	375,000	375,000	375,000	375,000
2022-23	MWD Pass Through					333,000	333,000	333,000	333,000	333,000	333,000	333,000
2022-23	COS Rate Increase					415,000	415,000	415,000	415,000	415,000	415,000	415,000
2023-24	MWD Pass Through						333,000	333,000	333,000	333,000	333,000	333,000
2023-24	COS Rate Increase						260,000	260,000	260,000	260,000	260,000	260,000
2024-25	MWD Pass Through							454,100	454,100	454,100	454,100	454,100
2024-25	COS Rate Increase							235,000	235,000	235,000	235,000	235,000
2025-26	MWD Pass Through								363,300	363,300	363,300	363,300
2025-26	COS Rate Increase								240,000	240,000	240,000	240,000
2026-27	MWD Pass Through									363,300	363,300	363,300
2026-27	COS Rate Increase									280,000	280,000	280,000
2027-28	MWD Pass Through										393,600	393,600
2027-28	COS Rate Increase										270,000	270,000
2028-29	MWD Pass Through											393,600
2028-29	COS Rate Increase											300,000
Total Unrestricted Water Service Rate Revenue		**11,787,782**	**12,034,239**	**12,522,673**	**13,214,073**	**13,977,273**	**14,579,773**	**15,277,473**	**15,889,573**	**16,543,173**	**17,216,673**	**17,921,273**
Other Sources of Cash												
Restricted Reserves Funding of Conservation Program		100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000	100,000
Capital Charge Funding of Baker Debt Service		500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000
Restricted Reserve Funding of Baker Debt Service		100,000	100,000	100,000	100,000	100,000	100,000					
Property Taxes - General Fund Revenue		160,309	195,309	207,759	220,499	233,537	246,881	260,537	274,515	288,823	303,468	318,461
Property Taxes (Funds Tier 1 Offset)		209,691	174,691	167,791	160,684	153,364	145,824	138,058	130,059	121,820	113,334	104,593
Miscellaneous Revenue		163,080	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000	75,000
Other Income (Site Leases)		195,000	230,000	236,900	244,007	251,327	258,867	266,633	274,632	282,871	291,357	300,098
Other Income (R-6 Partners)		122,000	124,440	126,929	129,467	132,057	134,698	137,392	140,140	142,942	145,801	148,717
Investment Income		143,000	100,000	62,072	58,144	55,802	55,515	55,515	55,562	55,563	55,612	55,653
Subtotal Other Sources of Cash		**1,693,080**	**1,599,440**	**1,576,451**	**1,587,801**	**1,601,087**	**1,616,785**	**1,533,135**	**1,549,908**	**1,567,019**	**1,584,573**	**1,602,522**
TOTAL O&M REVENUES (Unrestricted)		**13,480,862**	**13,633,679**	**14,099,125**	**14,801,875**	**15,578,360**	**16,196,558**	**16,810,609**	**17,439,481**	**18,110,192**	**18,801,246**	**19,523,796**
O&M REVENUE REQUIREMENTS												
Total O & M Expense		13,119,403	13,428,061	13,807,726	14,351,805	14,922,764	15,512,279	16,121,679	16,755,130	17,420,992	18,112,921	18,839,041
Debt Service												
Baker Water Treatment Plant		684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263	684,263
Subtotal Debt Service		**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**	**684,263**
TOTAL O&M REVENUE REQUIREMENTS		**13,803,666**	**14,112,324**	**14,491,989**	**15,036,068**	**15,607,027**	**16,196,542**	**16,805,941**	**17,439,393**	**18,105,255**	**18,797,184**	**19,523,304**
ANNUAL O&M SURPLUS (DEFICIT)		**(322,803)**	**(478,645)**	**(392,864)**	**(234,194)**	**(28,667)**	**16**	**4,667**	**89**	**4,938**	**4,062**	**492**

WATER CASH FLOW	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM											
CAPITAL EXPENDITURES											
Capital Replacement & Refurbishment Program	785,598	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656
Baker Pipeline Capacity Purchase					110,000	110,000	110,000	110,000	110,000	110,000	110,000
Baker Water Treatment Plant						110,000	110,000	110,000	110,000	110,000	110,000
Baker Water Treatment Plant Construction Period Interest											
Capital Charge Funding of Baker Debt Service	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000
TOTALCAPITAL EXPENDITURES	**1,285,598**	**1,252,656**	**1,252,656**	**1,252,656**	**1,362,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**
CAPITAL PROGRAM REVENUE											
Revenue from Existing Capital Charge	785,598	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656	752,656
Capital Charge Funding of Baker Debt Service	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000	500,000
Restricted Reserve Funding		0	0	0	0	0	0	0	0	0	0
Capital Charge Revenue Increase					110,000	110,000	110,000	110,000	110,000	110,000	110,000
Capital Charge Revenue Increase						110,000	110,000	110,000	110,000	110,000	110,000
Subtotal Capital Charge Revenue	**1,285,598**	**1,252,656**	**1,252,656**	**1,252,656**	**1,362,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**
Loan Proceeds - Baker											
Loan Proceeds - Recycled Water Project- SRF											
Capital Reserves											
TOTAL CAPITAL REVENUE	**1,285,598**	**1,252,656**	**1,252,656**	**1,252,656**	**1,362,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**	**1,472,656**
ANNUAL CAPITAL SURPLUS (DEFICIT)	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
TOTAL CASH FLOW											
TRANSFER FROM RECYCLED WATER	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
TOTAL ANNUAL RESERVE IMPACT	**(322,803)**	**(478,645)**	**(392,864)**	**(234,194)**	**(28,667)**	**16**	**4,667**	**89**	**4,938**	**4,062**	**492**
ENDING RESERVE BALANCE	**6,685,893**	**6,207,248**	**5,814,384**	**5,580,190**	**5,551,523**	**5,551,539**	**5,556,207**	**5,556,295**	**5,561,233**	**5,565,295**	**5,565,787**

9.4 APPENDIX 4 – CASH FLOW ANALYSIS FOR RECYCLED WATER FUND

Source: 10YearCashFlow.1920.Revision 3.KP.xlsx sent by Dennis 3/14/19

RECYCLED WATER CASH FLOW		2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
BEGINNING RESERVE BALANCE		**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
OPERATIONS & MAINTENANCE CASH FLOW												
O&M REVENUES												
Revenue from 1819 Commodity Rates		1,484,000	1,686,425	1,868,724	1,929,882	1,997,836	2,065,789	2,160,924	2,235,673	2,303,627	2,385,171	2,466,716
Revenue from 1819 Fixed Meter Rates		227,000	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967	289,967
Additional Service Revenue Required												
Year	**Rate Action**											
2019-20	COS Rate Increase		28,740	28,740	28,740	28,740	28,740	28,740	28,740	28,740	28,740	28,740
2020-21	COS Rate Increase			31,000	31,000	31,000	31,000	31,000	31,000	31,000	31,000	31,000
2021-22	COS Rate Increase				34,000	34,000	34,000	34,000	34,000	34,000	34,000	34,000
2022-23	COS Rate Increase					38,000	38,000	38,000	38,000	38,000	38,000	38,000
2023-24	COS Rate Increase						24,000	24,000	24,000	24,000	24,000	24,000
2024-25	COS Rate Increase							21,000	21,000	21,000	21,000	21,000
2025-26	COS Rate Increase								22,000	22,000	22,000	22,000
2026-27	COS Rate Increase									26,000	23,000	25,000
2027-28	COS Rate Increase										23,000	25,000
2028-29	COS Rate Increase											25,000
Total Recycled Water Service Rate Revenue		**1,711,000**	**2,005,132**	**2,218,431**	**2,313,589**	**2,419,542**	**2,511,496**	**2,627,631**	**2,724,380**	**2,818,334**	**2,919,878**	**3,030,422**
Other Sources of Cash												
Restricted Reserves Funding of Debt Service		557,365	659,853	443,533	399,891	347,854	312,334	255,271	220,361	191,149	157,390	117,824
Recycled Water Meter Capital Charge Funding of Debt		115,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000
MWD LRP Rebate		250,000	310,000	362,250	362,250	362,250	362,250	362,250	362,250	362,250	362,250	362,250
Property Taxes		74,000	74,000	75,110	76,237	77,380	78,541	79,719	80,915	82,129	83,360	84,611
Subtotal Other Sources of Cash		**996,365**	**1,190,853**	**1,027,893**	**985,378**	**934,485**	**900,125**	**844,240**	**810,526**	**782,527**	**750,000**	**711,685**
TOTAL O&M REVENUES		**2,707,365**	**3,195,985**	**3,246,323**	**3,298,967**	**3,354,027**	**3,411,621**	**3,471,871**	**3,534,906**	**3,600,861**	**3,669,878**	**3,742,107**
O&M REVENUE REQUIREMENTS												
Total O & M Expense		1,104,407	1,182,765	1,233,103	1,285,747	1,340,807	1,398,401	1,458,651	1,521,685	1,587,641	1,656,658	1,728,887
Debt Service												
Recycled Water SRF Loan - Phase 1		1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958	1,602,958
Recycled Water SRF Loan - Phase II			410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262	410,262
Subtotal Debt Service		**1,602,958**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**	**2,013,220**
TOTAL O&M REVENUE REQUIREMENTS		**2,707,365**	**3,195,985**	**3,246,323**	**3,298,967**	**3,354,027**	**3,411,621**	**3,471,871**	**3,534,906**	**3,600,861**	**3,669,878**	**3,742,107**
ANNUAL O&M SURPLUS (DEFICIT)		**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM												
CAPITAL EXPENDITURES												
Capital Replacement & Refurbishment Program												
Recycled Water Expansion Project												
Recycled Water Meter Capital Charge Funding of Debt		115,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000
TOTALCAPITAL EXPENDITURES		**115,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**
CAPITAL PROGRAM REVENUE												
Revenue from Existing Capital Charge		115,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000	147,000
Subtotal Capital Charge Revenue		**115,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**
TOTAL CAPITAL REVENUE		**115,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**	**147,000**
ANNUAL CAPITAL SURPLUS (DEFICIT)		**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
TOTAL ANNUAL RESERVE IMPACT		**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
ENDING RESERVE BALANCE		**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**

9.5 APPENDIX 5 – CASH FLOW ANALYSIS FOR WASTEWATER FUND

Source: 10YearCashFlow.1920.Revision 3.KP.xlsx sent by Dennis 3/14/19

WW CASH FLOW		2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
BEGINNING RESERVE BALANCE		**7,008,696**	**7,406,345**	**7,429,804**	**7,431,763**	**7,433,194**	**7,433,646**	**7,436,921**	**7,441,090**	**7,443,389**	**7,445,176**	**7,446,927**
OPERATIONS & MAINTENANCE CASH FLOW												
O&M REVENUES												
Revenue from 18/19 Service Rates		7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000	7,775,000
Additional Service Revenue Required												
Year	**Rate Action**											
2019-20	COS Rate Increase		0	0	0	0	0	0	0	0	0	0
2020-21	COS Rate Increase			330,000	330,000	330,000	330,000	330,000	330,000	330,000	330,000	330,000
2021-22	COS Rate Increase				340,000	340,000	340,000	340,000	340,000	340,000	340,000	340,000
2022-23	COS Rate Increase					355,000	355,000	355,000	355,000	355,000	355,000	355,000
2023-24	COS Rate Increase						375,000	375,000	375,000	375,000	375,000	375,000
2024-25	COS Rate Increase							390,000	390,000	390,000	390,000	390,000
2025-26	COS Rate Increase								405,000	405,000	405,000	405,000
2026-27	COS Rate Increase									425,000	425,000	425,000
2027-28	COS Rate Increase										445,000	485,000
2028-29	COS Rate Increase											425,000
Total Wastewater Service Rate Revenue		**7,775,000**	**7,775,000**	**8,105,000**	**8,445,000**	**8,800,000**	**9,175,000**	**9,565,000**	**9,970,000**	**10,395,000**	**10,840,000**	**11,305,000**
Other Sources of Cash												
Property Taxes		481,000	481,000	488,215	495,538	502,971	510,516	518,174	525,946	533,835	541,843	549,971
MNWD Payment for RW Service to Golf Course		11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000	11,000
Capital Facilities Fee		0	0	0	0	0	0	0	0	0	0	0
Investment Income		182,000	100,000	74,298	74,318	74,332	74,336	74,369	74,411	74,434	74,452	74,469
Subtotal Other Sources of Cash		**674,000**	**592,000**	**573,513**	**580,856**	**588,303**	**595,852**	**603,543**	**611,357**	**619,269**	**627,295**	**635,440**
TOTAL O&M REVENUES		**8,449,000**	**8,367,000**	**8,678,513**	**9,025,856**	**9,388,303**	**9,770,852**	**10,168,543**	**10,581,357**	**11,014,269**	**11,467,295**	**11,940,440**
O&M REVENUE REQUIREMENTS												
Total O & M Expense		7,793,205	8,085,394	8,418,409	8,766,278	9,129,706	9,509,431	9,906,228	10,320,912	10,754,336	11,207,398	11,681,040
Debt Service												
State Revolving Fund Loan												
Northline Lift Station		258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146	258,146
Subtotal Debt Service		**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**	**258,146**
TOTAL O&M REVENUE REQUIREMENTS		**8,051,351**	**8,343,540**	**8,676,555**	**9,024,424**	**9,387,852**	**9,767,577**	**10,164,374**	**10,579,058**	**11,012,482**	**11,465,544**	**11,939,185**
ANNUAL O&M SURPLUS (DEFICIT)		**397,649**	**23,460**	**1,958**	**1,432**	**451**	**3,275**	**4,169**	**2,299**	**1,787**	**1,751**	**1,255**

WW CASH FLOW	2018-19	2019-20	2020-21	2021-22	2022-23	2023-24	2024-25	2025-26	2026-27	2027-28	2028-29
CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM											
CAPITAL EXPENDITURES											
Capital Replacement & Refurbishment Program	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000
					140,000	140,000	140,000	140,000	140,000	140,000	140,000
						140,000	140,000	140,000	140,000	140,000	140,000
TOTAL CAPITAL EXPENDITURES	**1,615,000**	**1,615,000**	**1,615,000**	**1,615,000**	**1,755,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**
CAPITAL PROGRAM REVENUE											
Revenue from Existing Capital Charge	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000	1,615,000
Capital Charge Revenue Increase					140,000	140,000	140,000	140,000	140,000	140,000	140,000
Capital Charge Revenue Increase						140,000	140,000	140,000	140,000	140,000	140,000
Subtotal Capital Charge Revenue	**1,615,000**	**1,615,000**	**1,615,000**	**1,615,000**	**1,755,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**
Loan Proceeds - Northline											
Capital Reserves											
TOTAL CAPITAL REVENUE	**1,615,000**	**1,615,000**	**1,615,000**	**1,615,000**	**1,755,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**	**1,895,000**
ANNUAL CAPITAL SURPLUS (DEFICIT)	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**
TOTAL ANNUAL RESERVE IMPACT	**397,649**	**23,460**	**1,958**	**1,432**	**451**	**3,275**	**4,169**	**2,299**	**1,787**	**1,751**	**1,255**
ENDING RESERVE ANALYSIS	**7,406,345**	**7,429,804**	**7,431,763**	**7,433,194**	**7,433,646**	**7,436,921**	**7,441,090**	**7,443,389**	**7,445,176**	**7,446,927**	**7,448,181**

9.6 APPENDIX 6 – DETAILED WATER COST OF SERVICE ANALYSIS

	Peaking Factors	Base Cost Allocation	Peaking Cost Allocation
Max Day	2.00 x Average Demand	50.0%	50.0%
Max Hour	3.00 x Average Demand	33.3%	66.7%
Average Demand		41.7%	58.3%

The appropriate allocation factors between base and extra capacity vary with system design. The water utility is comprised of various facilities, each designed and operated to fulfill a given function. To provide adequate service to its customers at all times, the utility must be capable of providing the total water demand as well as peak demand.

Different facilities are designed to meet different peaking demands. These characteristics are used to allocate costs to functional cost components. Since all customers do not exert their maximum demand for water at the same time, water facilities are designed to meet coincidental demands for all customers.

Comparison of historical system coincidental maximum day and maximum hour demands to average day demands results in appropriate ratios for allocation of capital costs and operating expenses to base and extra capacity cost components. A maximum day to average day ratio of 2.0 is used based on demands experienced in the District's system. This indicates that 50 percent of the capacity of the facilities designed and operated for maximum day demand is needed for average or base use and 50 percent is used for maximum day extra capacity requirements.

Cost of service is allocated to functional cost components using either water system demand ratios developed above or direct assignment, such as billing costs. The separation of costs into functional components provides a means for distributing such costs to customers based on their respective responsibilities for each type of service.

O&M expenses are generally allocated to the functional cost components that best reflect the design parameter associated with that expense. For example, source of supply meets the average day requirements of the system; thus, related expenses are allocated to the base cost component. The treatment plant and transmission mains are designed to meet maximum day demands of the system and so related expenses are allocated to the base and maximum day cost components. In a similar manner, pump stations and distribution mains are designed to meet the maximum hour demands of the system so related expenses are allocated to the base, maximum day and maximum hour cost components.

Other supporting costs such as Fleet, Information Technology and General & Admin are allocated using staff levels as provided by District Staff.

Cost Categories	Billing & Customer Service	Base Fixed	Peaking	Notes
Operations Support	18%	82%		Based on staffing levels for field office
Operations Support Power	18%	82%		Based on staffing levels for field office
Fleet	18%	82%		Based on staffing levels for field office
Operations Indirect Costs	18%	82%		Based on staffing levels for field office
Information Technology	30%	70%		Based on staffing level for main office
Administration	30%	70%		Based on staffing level for main office
Admin Power	30%	70%		Based on staffing level for main office
Administration Indirect Costs	30%	70%		Based on staffing level for main office
Labor	6.97%	62.76%	30.27%	Based on staffing levels

Using the allocation factors discussed above, the Table below summarizes the allocation of Water Revenue Requirements to different cost causation categories.

Water Revenue Requirements	2019-20	Water Supply	Billing & CS	Meters	Water Revenue Requirement Components Base Fixed	Peaking	RW	Conservation	Rev Offset	Capital R&R
O&M Expenses (excl. Interest & Depreciation)										
Source of Supply	$8,174,298	98.3%			1.7%					
Pumping Water	$256,281				33.3%	66.7%				
Treatment Water	$40,851				50.0%	50.0%				
Transmission & Distribution Water	$554,807				50.0%	50.0%				
Customer Accounts	$0				41.7%	58.3%				
Outside Treatment Sewer	$0				100.0%					
Operations Support	$98,666		18%		82.0%					
Operations Support Power	$3,920		18%		82.0%					
Fleet	$108,535		18%		82.0%					
Operations Indirect Costs	$13,502		18%		82.0%					
Information Technology	$119,600		30%		70.0%					
Administration	$67,080		30%		70.0%					
Admin Power	$16,080		30%		70.0%					
Administration Indirect Costs	$556,008		30%		70.0%					
Labor	$3,418,433		7.0%		62.76%	30.27%				
Subtotal O&M Expenses (excl. Interest & Depreciation)	**$13,428,061**	**$8,031,449**	**$506,327**	**$0**	**$3,386,719**	**$1,503,566**	**$0**	**$0**	**$0**	**$0**
Other Revenue Requirements										
Debt Service	$684,263	100.0%								
Unrestricted Capital R&R Funding	$752,656									100.0%
Restricted Capital R&R Funding (Baker WTP)	$500,000									100.0%
Subtotal Other Revenue Requirements	**$1,936,919**	**$684,263**	**$0**	**$0**	**$0**	**$0**	**$0**	**$0**	**$0**	**$1,252,656**
***Less* Other Revenues**										
Fire Service Charges	($128,000)				100.0%	0.0%				
Restricted Reserves Funding of Conservation Program	($100,000)				100.0%	0.0%				
Capital Charge Funding of Baker Debt Service	($500,000)	100.0%				0.0%				
Restricted Reserve Funding of Baker Debt Service	($100,000)	100.0%				0.0%				
Restricted Reserve Funding	$0									100.0%
Property Taxes - General Fund Revenue	($195,309)				99.7%	0.0%			0.3%	
Property Taxes (Funds Tier 1 Offset)	($174,691)								100.0%	
Miscellaneous Revenue	($75,000)				100.0%	0.0%				
Other Income (Site Leases)	($230,000)					0.0%			100.0%	
Other Income (R-6 Partners)	($124,440)				100.0%	0.0%				
Investment Income	($100,000)				100.0%	0.0%				
Subtotal Other Revenues	**($1,727,440)**	**($600,000)**	**$0**	**$0**	**($722,163)**	**$0**	**$0**	**$0**	**($405,277)**	**$0**
***Plus* Operating Reserve Funding**	($478,645)				100%					
***Plus* Capital Reserve Funding**	$0									100%
NET REV REQUIREMENTS FROM RATES, EXC. FIRE SC	**$13,158,895**	**$8,115,712**	**$506,327**	**$0**	**$2,185,911**	**$1,503,566**	**$0**	**$0**	**($405,277)**	**$1,252,656**

Revenues requirements by categories are then collected through different rate components. Peaking costs are recovered using both fixed charges via meters & capacity rates and water commodity rates via peaking delivery rate component, as shown in the Table below.

Water Revenue Requirements	2019-20	Water Rate Components: Billing & CS	Meters & Capacity	Water Supply	Peak Delivery	RW	Conservation	Rev Offset	Capital R&R
Water Supply	$8,115,712			$8,115,712					
Billing & CS	$506,327	$506,327							
Meters	$0								
Base Fixed	$2,185,911		$2,185,911						
Peaking	$1,503,566		$802,566		$701,000				
RW	$0					$0			
Conservation	$0						$0		
Rev Offset	($405,277)							($405,277)	
Capital R&R	$1,252,656								$1,252,656
NET REVENUE REQUIREMENTS	**$13,158,895**	**$506,327**	**$2,988,477**	**$8,115,712**	**$701,000**	**$0**	**$0**	**($405,277)**	**$1,252,656**

DRAFT PROPOSITION 218 NOTICE

El Toro Water District

NOTICE OF PUBLIC HEARING ON PROPOSED WATER, SEWER AND RECYCLED WATER RATE/CHARGE INCREASE

Notice is hereby given that the Board of Directors of the El Toro Water District (the "District") will conduct a public hearing on June 27, 2019 at 7:30 a.m. in the Boardroom of the District Headquarters at 24251 Los Alisos Blvd., Lake Forest, CA 92630 to consider adopting increases to certain rates and charges. The proposed increases are the result of detailed budget analysis and an independent professional Water, Sewer and Recycled Water Enterprise Cost of Service Study Report prepared to determine appropriateness of the amounts, and fair and equitable cost allocation among customer categories. The proposed increases impact the potable water usage rates, uniform recycled water usage rate, and the water and recycled water operations and maintenance charges.

The net impact of the proposed changes in the rates for residential and commercial/public authority customers will vary based upon the actual water consumption and, where applicable, property specific water budgets. (See "**Potable Water Budget Calculation**" section).

BACKGROUND

While the District continually strives for cost reductions and efficient utilization of the public's assets entrusted to us, we still must align rates and charges with the costs to deliver services. These costs include 1) electricity for operations, 2) the cost to purchase and treat water, 3) compliance with regulations governing the distribution, collection and treatment of water, wastewater and recycled water, 4) the disposal of treated wastewater & bio-solids, 5) construction of capital infrastructure improvements needed to repair, replace and update aging water, sewer and recycled water systems and 6) ongoing maintenance of vital infrastructure. Each year the District's Board of Directors adopts an annual operating budget that goes into effect on July 1. Part of the budgeting process is to assess the adequacy of the District's rates and charges. Of utmost importance is the effort to minimize costs (and therefore rates and charges), while maintaining the integrity of the District's infrastructure and its financial stability. To assist the District in this endeavor, the District retains an independent outside Financial Consultant who specializes in Cost of Service analysis and rate setting.

POTABLE WATER USAGE RATES

The District, given the lack of available groundwater supply, purchases 100% of its potable water (drinking water) supply to meet residential, potable irrigation, commercial/public authority and fire protection demands from its wholesale water provider, the Municipal Water District of Orange County (MWDOC). Wholesale imported water (Northern California and the Colorado River) costs from MWDOC are driven by continued investment in regional water treatment and delivery system infrastructure, increased water importation costs, securing higher cost water supplies and water storage arrangements due to Northern California Bay-Delta (Bay-Delta) regulatory exportation restrictions and increased funding to aggressively pursue near term and long term Bay-Delta solutions (The CA Water Fix and Eco Restoration Project) that will ensure a greater degree of future water supply reliability to Southern California and Orange County.

Customers may obtain a copy of the proposed 2019/20 fiscal year budget and the Cost of Service Rate Study at the District's Administrative Office and the District's website at www.etwd.com. For assistance in determining the impact of the proposed rate increase on your monthly bill you may access a Water Budget Calculator on the District's website or call our Customer Service Representatives at (949) 837-0660.

South Orange County receives the majority of its potable water from MWDOC via the Metropolitan Water District of Southern California's (MWD) Diemer Water Filtration Plant located in Yorba Linda. To diversify and improve water treatment reliability for South Orange County residences and businesses, the District and four other water agencies partnered to fund and construct the Baker Water Treatment Plant located in the City of Lake Forest. The plant provides increased water reliability by increasing local water treatment capability from multiple water supply sources, including imported untreated water from MWD and local surface water from Irvine Lake.

The cost of purchased water includes the amount paid by the District to MWDOC for wholesale imported water treated by Metropolitan Water District, the amount paid by the District to MWDOC for untreated imported water supplied to the Baker Water Treatment Plant and the amount paid to Irvine Ranch Water District for O&M costs associated with the treatment and delivery of water from the Baker Water Treatment Plant. The amount paid by the District for purchased water is the exact amount "passed through" to the District's customers in the form of a Potable Water Usage Charge. The indoor Tier I and Uniform Commercial Usage rates include an offsetting credit (funded by non-rate revenue) based on the 2019/20 Cost of Service Study, to recognize that the highest and best use of potable water is for indoor health, safety and sanitation purposes. Tiers III and IV rates are applied to usage exceeding the combined calculated Tier I indoor and Tier II outdoor efficient water budgets. Tiers III and IV rates include the actual costs to purchase and deliver water from the District's wholesale water provider plus charges to fund the District's Conservation and Recycled Water Development Program. The Potable Water Usage Rate Increase will become effective with the first full billing period after July 1, 2019.

PROPOSED MONTHLY TIERED WATER USAGE RATES

Water Usage Charges	Current Rate $/ccf*	Proposed Rate $/ccf*
Tier I - Indoor Efficient	$2.52	$2.58
Tier II - Outdoor Efficient	$2.91	$2.97
Tier III - Inefficient	$6.08	$6.14
Tier IV - Excessive	$7.82	$7.88
Commercial, Institutional and Industrial ("CII")	$2.89	$2.95

* 1 Billing Unit or "ccf" = 748 gallons

RECYCLED WATER USAGE RATES

The uniform Recycled Water Usage Rate ($2.62/ccf) is proposed to increase by $0.05/ccf to $2.67/ccf to recover the cost of producing and delivering recycled water for irrigation purposes. The Recycled Water Usage Rate will become effective with the first full billing period after July 1, 2019.

WATER AND SEWER OPERATIONS AND MAINTENANCE CHARGE

To responsibly maintain and preserve its water, sewer and recycled water infrastructure investment, meet stringent regulatory requirements and ensure a continuous high level of service to its customers, the District administers an ongoing operations and maintenance program. To minimize financial impacts to customers and, fairly and equitably allocate that cost, the District commissioned an independent Cost of Service Study Report. Coupled with prudent utilization of reserves the District proposes to increase the water, and recycled water operations and maintenance charges to meet costs associated with operating and maintenance of the water, and recycled water systems. The Water, and Recycled Water Enterprise Operations and Maintenance (O&M) Charges increase will become effective with the first full billing period after July 1, 2019. No change in the Sewer O&M Charge is proposed in the 2019/20 fiscal year.

WATER / RECYCLED WATER

Meter Size	Current Charge	Proposed Charge
5/8"	$12.96	$14.14
3/4"	$17.37	$18.99
1"	$26.20	$28.70
1-1/2"	$48.25	$52.98
2"	$92.36	$101.52

SEWER

Residential

Meter Size	Current Charge	Proposed Charge
Single Family (1)	$24.30	No Change
Multi-family Restricted (2)	$19.28	No Change
Multi-family Unrestricted (2)	$22.92	No Change

(1) charged per month

(2) charged per Equivalent Dwelling Unit per month

(3) per ccf of water used

SEWER

Commercial(3)

	Current Charge	Proposed Charge
Animal Kennel/Hospital	$3.99	No Change
Car Wash	$3.97	No Change
Department/Retail Store	$3.99	No Change
Dry Cleaner	$3.50	No Change
Golf Course/Camp/Park	$3.49	No Change
Health Spa	$3.98	No Change
Hospital/Convalescence Home	$3.50	No Change
Hotel	$6.04	No Change
Market	$7.92	No Change
Mortuary	$7.89	No Change
Nursery/Greenhouse	$3.54	No Change
Professional/Financial Office	$3.99	No Change
Public Institution	$3.93	No Change
Repair/Service Station	$3.98	No Change
Restaurant	$3.77	No Change
School	$4.13	No Change
Theater	$3.99	No Change
Warehouse/Storage	$3.16	No Change
Basic Commercial	$3.50	No Change

CAPITAL REPLACEMENT AND REFURBISHMENT CHARGE

The District maintains over $162 million worth of water, sewer and recycled water infrastructure. The District's capital program, which reinvests, replaces and refurbishes the assets that are essential to the provision of water, sewer and recycled water services to the District's customers is funded by the Capital Replacement and Refurbishment Charge. No change in the Capital Replacement and Refurbishment Charge is proposed in the 2019/20 fiscal year.

POTABLE AND RECYCLED WATER CAPITAL REPLACEMENT AND REFURBISHMENT CHARGE

Meter Size	Current Charge ($/Month)	Proposed Charge ($/Month)
5/8"	$4.66	No Change
3/4"	$4.66	No Change
1"	$7.78	No Change
1-1/2"	$18.91	No Change
2"	$47.47	No Change

SEWER CAPITAL REPLACEMENT AND REFURBISHMENT CHARGE

User Category	Current Charge ($/Month)	Proposed Charge ($/Month)
Single Family Residential	$4.93	No Change
Multi-Family Restricted	$3.91	No Change
Multi-Family Unrestricted	$4.65	No Change
Commercial		
5/8" Meter	$4.34	No Change
3/4" Meter	$7.34	No Change
1" Meter	$13.55	No Change
1-1/2" Meter	$24.07	No Change
2"Meter	$70.96	No Change
Public Authority		
1" Meter	$4.93	No Change
1-1/2" Meter	$24.65	No Change
2" Meter	$39.71	No Change

POTABLE WATER BUDGET CALCULATION

RESIDENTIAL CUSTOMERS

A per meter, customer specific water budget is calculated to meet the efficient demands of indoor domestic use as well as outdoor irrigation under normal operating and water supply conditions. Under Emergencies and Water Supply Shortage conditions indoor and/or outdoor water budgets maybe adjusted using the Drought Factor ("DF") to reduce water budgets to further encourage conservation. A water budget is the sum of the indoor and outdoor water budgets.

The **indoor water budget** in hundred cubic feet (ccf[1]) is:

55 gallons/person/day * Number of people per household* Days/billing cycle * DF_{indoor}/748

- The indoor Drought Factor DF_{indoor} which is set by the Board of Directors is currently set to 100% and the number of people per household is as follows:
  - Detached home (single family home): 4 people
  - Apartment: 2 people
  - Attached home - unrestricted (i.e. condominium or townhouse): 3 people
  - Attached home - restricted (i.e. condominium or townhouse with age restrictions): 2 people

Customers may request a variance/adjustment to provide an equitable water budget for special circumstances such as, more people living in the home than the formula provides, medical needs, etc.

The **outdoor water budget allocation** in ccf is: **(Weather data * Landscape area * ETAF/1200) * $DF_{outdoor}$**

- Where the weather data is measured by the reference EvapoTranspiration (ET_0) data in inches of water per billing cycle. ET is the amount of water that is lost by plants through evaporation and transpiration, and needs to be replaced for the plants to remain healthy. ET_0 data is obtained from California Irrigation Management Information System (CIMIS) Station 75 established by State of California Department of Water Resources, Office of Water Use Efficiency;
- The landscape area for multi-family accounts including apartments, condominiums and mobile homes is 25 square feet of landscape per dwelling unit plus any dedicated landscape area associated with the account;
- The landscape area for single-family detached homes is calculated by taking the building area and dividing it by the number of floors and subtracting that from the parcel area. The result is then multiplied by 70 percent to obtain the landscape area as follows:
  Landscape area = (lot size - (building area /number of floors)) * 70%
- ET Adjustment Factor (ETAF) is a coefficient that adjusts the EvapoTranspiration (ET_0) values based on type of plants and irrigation system efficiency. Based on the updated Model Water Efficient Landscape Ordinance[2] developed by the California Department of Water Resources, any landscape installed prior to January 1, 2010 has an ETAF of 0.8 and new landscape is an ETAF of 0.7. New landscape is defined as new or re-developments.
- $DF_{outdoor}$ is the outdoor drought factor (set by the Board of Directors) currently set at 100%.
  This factor is not necessarily the same as the DF for indoor;
- 1200 is the conversion factor from inches-water (weather data)*square feet (landscape area) to ccf (outdoor water budget).

Under normal water supply conditions and circumstances Customers may request a variance/adjustment to provide an equitable water budget for special circumstances such as, establishing new landscaping and changes in irrigation landscape area. Under Emergencies and Water Supply Shortage conditions, variances/adjustments <u>may be limited.</u>

The indoor water budget, as determined above, will be billed at Tier I ("Indoor - Efficient") rates. The outdoor water budget, as determined above, will be billed at Tier II ("Outdoor - Efficient") rates. Water use in excess of the Tier I and II water budget would be deemed inefficient and/or excessive. Tier III ("Inefficient") water use would be usage between 100% and 130% of the Tier I and II water budget (or Total Water Budget) and Tier IV ("Excessive") usage would be consumption over 130% of Total Water Budget.

POTABLE IRRIGATION CUSTOMERS

Potable Irrigation customers fall into one of two categories: Recreational or Functional. Recreational irrigation customers are those whose landscape is used mostly for recreational purposes (i.e. parks, soccer fields, etc.) while Functional irrigation customers will be those whose landscape is ornamental in nature (greenbelts, medians, etc.).

The irrigation water budget for dedicated irrigation customers in ccf is calculated as follows:

(Weather data * Landscape area * ETAF/1200) * $DF_{outdoor}$, where

- Weather data (ET_0) as described in the section above,
- Landscape area is assumed to be the lesser of 100% of total parcel area or 100% of the measured landscape area served by each meter,
- ET adjustment factor (ETAF) is equal to 0.8 for Functional irrigation and 1 for Recreational irrigation customers based on the updated Model Water Efficient Landscape Ordinance, and
- $DF_{outdoor}$ is the outdoor drought factor (set by the Board of Directors) will be set at 100%. This factor is not necessarily the same as the DF for indoor;

Under normal circumstances Customers may request a variance/adjustment to provide an equitable water budget for special circumstances such as, establishing new landscaping and changes in irrigation landscape area. Under Emergencies and Water Supply Shortage conditions, variances/adjustments <u>may be limited</u>.

All of an irrigation customer's Water Budget will be at Tier II ("Outdoor - Efficient"). Water use in excess of the Tier II water budget would be deemed inefficient and/or excessive. Tier III ("Inefficient") water usage would be between 100% and 130% of the Tier II budget and Tier IV

1. ccf (100 cubic feet) = 748 gallons 2. Also in *State of California Code of Regulations, Title 23, Section 490-495*

WHY AM I RECEIVING THIS NOTICE?

You are receiving this notice because you are the owner of record of one or more parcels of property located within the service area of El Toro Water District.

PUBLIC HEARING AND PROTEST PROCEEDING

The Governing Board of the El Toro Water District will conduct a **public hearing on June 27, 2019 at 7:30 a.m.** in the Board Room of its Administrative Office located at 24251 Los Alisos Blvd., Lake Forest, CA 92630. The purpose of the hearing will be to consider adoption of the proposed Potable Water Usage Rate Increase, the Recycled Water Usage Rate Increase and a Water and Recycled Water Operations and Maintenance Charge increase. Property (parcel) owners may comment and file a written protest (one vote per parcel owned) on the proposed increases. California law prohibits the District from increasing charges if a majority of the affected property (parcel) owners file a written protest opposing the proposed increases before the end of the public hearing. Written protests must be submitted to the District at P.O. Box 4000, Laguna Hills, CA 92654 or personally submitted on or before the end of the public hearing, which is scheduled for 7:30 a.m. on June 27, 2019. Each protest must identify the affected property and include the signature of a record property owner. Email protests will not be accepted. Oral protests at the public hearing will not qualify as a protest, unless accompanied by a written protest. The District's Board of Directors welcomes input from the public during the

El Toro Water District
24251 Los Alisos Blvd.
Lake Forest, CA 92630

BUDGET

April 11, 2019

COVER PAGE

BUDGET 2019 - 2020

EL TORO WATER DISTRICT
BOARD OF DIRECTORS
2019-2020

JOSE F. VERGARA, PRESIDENT
MARK MONIN, VICE-PRESIDENT
KATHRYN FRESHLEY, DIRECTOR
MIKE GASKINS, DIRECTOR

OFFICERS

ROBERT R. HILL, GENERAL MANAGER
DENNIS P. CAFFERTY, ASSISTANT GENERAL MANAGER/DISTRICT ENGINEER

EL TORO WATER DISTRICT
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ANNUAL BUDGET
2019-20

OVERVIEW

MISSION STATEMENT

The mission of the El Toro Water District is to plan and invest appropriately to provide its customers a safe, adequate and reliable supply of water, wastewater and recycled water service in an environmentally and economically responsible way.

FINANCIAL OBJECTIVES

Fiscal 2019-20

- Establish a revenue cash flow plan that is sufficient to fund the operating budget including the capital replacement & refurbishment program.
- Establish a reliable, stable and predictable rate adjustment strategy that minimizes impact to customers
- Maintain a minimum reserve level sufficient to fund legal, board mandated and working capital requirements.
- Employ cost containment and reduction strategies and practices as appropriate to cost effectively maintain reliable service levels.

BUDGET ASSUMPTIONS

FISCAL YEAR 2019-20

Revenue:

- POTABLE WATER SALES is based on the purchase of 7,350 acre-feet (af) of water and delivery of 7,050 af to customers.
- POTABLE WATER USAGE CHARGE to cover purchasing water from Metropolitan Water District through Municipal Water District of Orange County and from the Baker Water Treatment Plant will be increased effective July 1, 2019 and is supported by an independently prepared Cost of Service Study Report.
- POTABLE WATER SERVICE CHARGE (Water System Operations & Maintenance "O&M") will increase effective July 1, 2019 and is supported by an independently prepared Cost of Service Study Report.
- RECYCLED WATER SERVICE CHARGE (Recycled Water System Operations & Maintenance "O&M") will increase effective July 1, 2019 and is supported by an independently prepared Cost of Service Study Report.
- RECYCLED WATER USAGE CHARGE will be increased effective July 1, 2019 and is supported by an independently prepared Cost of Service Study Report.
- NON-RATE REVENUE reflects shared maintenance of joint facilities with neighboring agencies, communication site leases and other miscellaneous revenues.
- PROPERTY TAX REVENUE represents the District's share of the 1% general property taxes paid to the State.
- SEWER USAGE AND FIXED RATE the Sewer Usage and Fixed Rate will not be increased.
- INTEREST INCOME is expected to increase as a result of increase in the interest rate.
- CAPITAL REPLACEMENT & REFURBISHMENT WATER, SEWER & RECYCLED WATER CHARGES are designed to assist in covering the cost of water, sewer and recycled water capital R&R expenditures during the fiscal year. No changes to these charges for the 2019/20 fiscal year are contemplated.
- Rate increases will comply with all applicable state constitutional and statutory mandates.

BUDGET ASSUMPTIONS

FISCAL YEAR 2019-20

Expenses:

- PURCHASED WATER costs are affected by the anticipated increase in potable water sales along with increased rates charged by Metropolitan Water District of Southern California and Municipal Water District of Orange County and increased O&M costs associated with the District's capacity in the Baker Water Treatment Plant.

- ENERGY (electrical power) costs have been increased based on expected system operations, capital improvements and rate information provided by Southern California Edison.

- SOCWA OPERATIONS costs for regional bio-solids and effluent treatment and disposal have decreased.

- LABOR/BENEFITS COST are projected to increase. The increase is driven by continued implementation of the District's Succession Plan, increases in medical premiums, the District's contributions to the employees 401(k) Retirement Savings Plan and administration of a Performance Based Merit Program. The proposed increases are partially offset by employee contributions to medical benefits.

- OPERATING COSTS exclusive of purchased water, interest, labor and depreciation remain relatively flat compared to 2018/19.

BUDGET ASSUMPTIONS

FISCAL YEAR 2019-20

CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM:

Five-Year Capital Replacement & Refurbishment Program

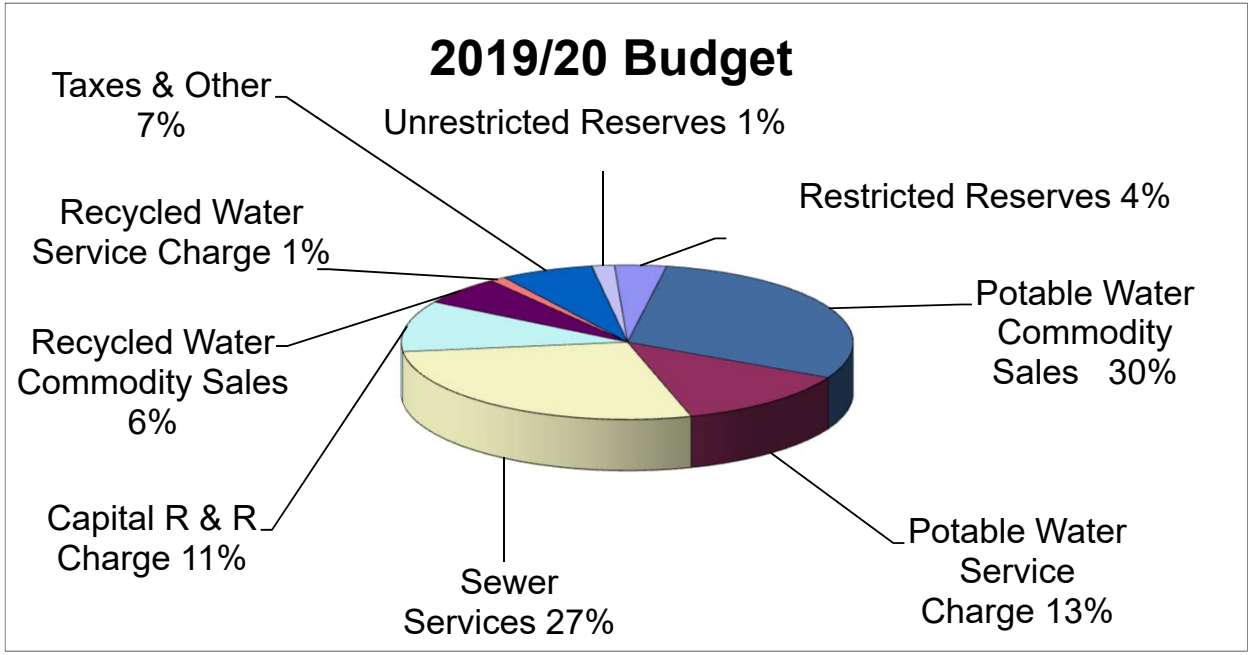
Staff continues to evaluate and update the on-going five-year Water, Sewer and Recycled Capital Replacement & Refurbishment Plan (CR&R) to preserve its water and sewer infrastructure investment, meet regulatory requirements and ensure a continuous high level of service. Water and Sewer CR&R expenditures for fiscal year 2019/20 total $2,367,656. The 2019/20 CR&R costs will be funded by revenue generated by the CR&R charge. Revenue generated from the Recycled Water CR&R charge amounts to $147,000. This revenue will be used to offset the cost of the Recycled Water program debt service.

RESERVES:

The District maintains three categories of reserves: (1) those legally required to be held as the result of contractual agreement (2) Board Mandated reserves (3) Board Restricted. Board Mandated reserves include (1) Capital Replacement & Refurbishment Program reserves for projects approved by the Board of Directors, (2) rate stabilization reserves, (3) operating reserves and (4) working capital. The current minimum reserve level for Board Mandated reserves, established by Board policy, is $8.5 million. The District's fiscal year 2019-20 Budget includes a provision to utilize reserves to fund a portion of the five-year Capital Replacement & Refurbishment Plan.

EL TORO WATER DISTRICT

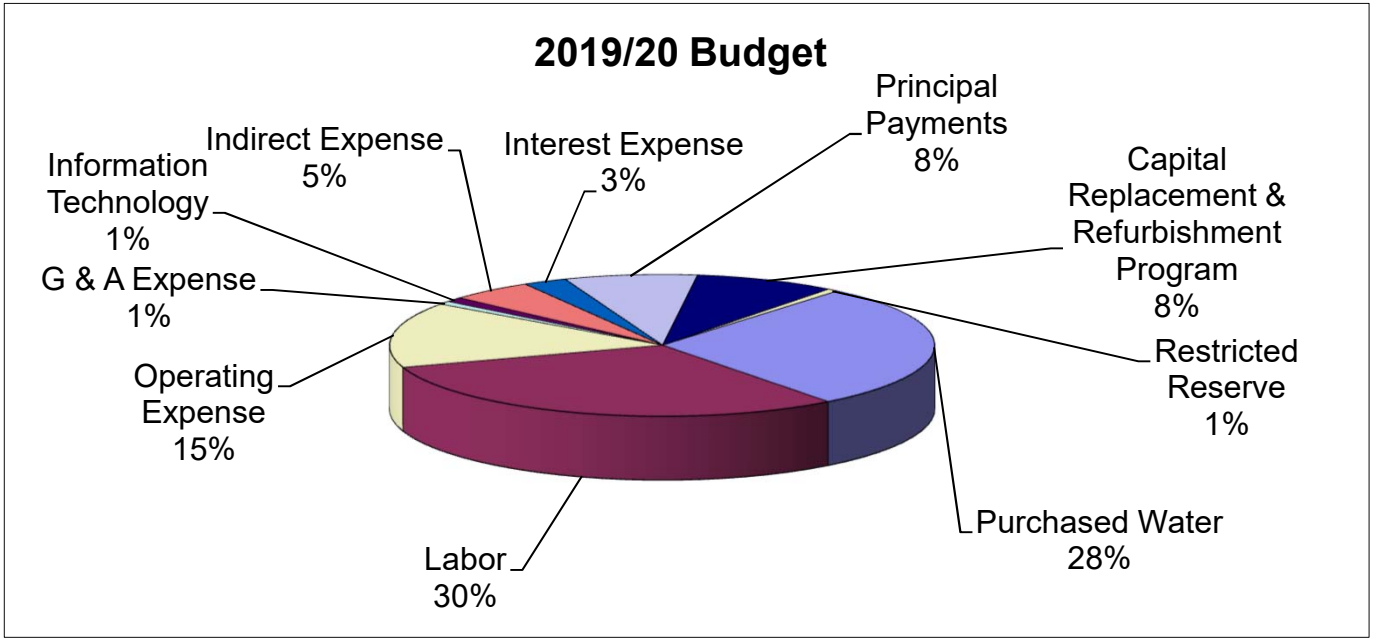
Where The Money Comes From



Potable Water Commodity Sales	$8,412,735
Potable Water Service Charge	3,621,504
Other Operating Revenue	55,000
Sewer Services	7,775,000
Capital R & R Charge	3,014,656
Recycled Water Commodity Sales	1,686,426
Recycled Water Service Charge	318,707
Taxes & Other	1,820,440
Unrestricted Reserves	455,185
Restricted Reserves Recycled Water / Conservation	759,853
Restricted Reserves Baker Debt Service	100,000
Restricted Reserves	183,853
	$28,203,359

EL TORO WATER DISTRICT

Where The Money Goes



Purchased Water	$8,041,949
Labor	8,546,083
Operating Expense	4,211,269
G & A Expense	207,900
Information Technology	299,000
Indirect Expense	1,390,020
Interest Expense	731,557
Principal Payments	2,224,072
Capital Replacement & Refurbishment Program	2,367,656
Restricted Reserve	183,853
	$28,203,359

OPERATIONS

EL TORO WATER DISTRICT
ORGANIZATION CHART 2019 - 2020

Department	Positions
Administrative Services	
General Manager	1
Asst GM / District Engineer	1
Human Resources Manager	1
Public Relations / EP Admin	1
Exec.Assistant to BOD & GM	1
Administrative Assistant	0
Office Assistant	1
Total	6
Information Systems	
Information Technology Manager	1
Total	1
Accounting	
Manager Finance / Controller	1
Accountant / Sr Accountant	2
Supervisor Accounting	1
Total	4
Purchasing/Receiving	
Purchasing Agent	1
Total	1
Customer Service - Office	
C.S / Billing Supervisor	1
C.S. Office Rep. II / Senior	2
Billing Clerk	1
Total	4
Customer Service - Field	
Crew Chief	1
C.S. Field Rep. III	1
C.S. Field Rep. I	2
Total	4
Engineering	
Project Engineer	1
Engineer Associate	1
Inspector	1
Recycled Water Coordinator	1
Total	4
Electrical	
Electrical Sys/SCADA Supv	1
Total	1

Department	Positions
Operations	
Operations Superintendent	1
Compliance Program Coordinator	1
Total	2
Transmission & Distribution Crew	
Foreman	1
Crew Chief	2
Maintenance Worker III	0
Maintenance Worker II	2
Maintenance Worker I	4
Total	9
Pumping Crew	
Foreman	1
Crew Chief	2
Maintenance Worker III	4
Maintenance Worker II	1
Maintenance Worker I	1
Total	9
Treatment Plant	
Chief Plant Operator	1
Truck Driver	2
Waste Water Operator III	2
Waste Water Operator II	2
Waste Water Operator I	1
Lab Supervisor	1
Lab Technician I	1
Total	10
Collections & Transmissions	
Industrial Waste Inspector	1
Crew Chief	1
Coll. Maintenance Worker III	1
Coll. Maintenance Worker II	1
Coll. Maintenance Worker I	1
Total	5
Automotive	
Senior Mechanic	1
Total	1
Total Positions	**61**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Income Statement

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20
Operating Revenue			
Water	$12,036,741	$12,835,373	$13,032,945
Sewer	7,565,000	7,800,000	7,775,000
Capital Facilities Charge	3,015,000	3,015,000	3,014,656
Tertiary	1,658,000	1,920,000	2,005,133
Total Operating Revenue	**24,274,741**	**25,570,373**	**25,827,734**
Operating Expense			
General Operating Expense	8,674,939	9,018,483	9,281,786
Water Enterprise Operating Expense	8,680,085	8,976,271	9,045,392
Sewer Enterprise Operating Expense	2,348,690	2,349,926	2,377,623
Recycled Water Operating Expense	190,300	256,950	302,400
Total Operating Expense	**19,894,014**	**20,601,630**	**21,007,201**
Operating Income	**4,380,727**	**4,968,743**	**4,820,533**
Non Operating Revenue	1,483,500	1,692,750	1,820,440
Interest Expense	(805,729)	(769,061)	(731,557)
Information Technology	(189,400)	(262,500)	(299,000)
Indirect Expense	(1,349,250)	(1,468,100)	(1,390,020)
Depreciation & Amortization	(4,006,850)	(4,306,850)	(4,476,850)
Total Non Operating	**(4,867,729)**	**(5,113,761)**	**(5,076,987)**
Excess of Operating Revenues and Cash Flows Over Expense	**$ (487,002)**	**$ (145,018)**	**$ (256,454)**
Capital Improvement Program Expenditures	(2,400,000)	(2,384,000)	(2,367,656)
Depreciation & Amortization (Non-Cash)	4,006,850	4,306,850	4,476,850
Debt Service Principle Payments	(1,737,631)	(1,776,305)	(2,224,072)
Restricted Reserves used for Baker Debt Service		100,000	100,000
Restricted Reserves	(93,596)	(582,151)	(183,853)
Total Deficit	**(711,379)**	**(480,624)**	**(455,185)**

EL TORO WATER DISTRICT

BUDGET COMPARISON - General Operations Expenses

Fiscal Years Ending June 30

General Operations Expense	Budget 2017/18	Budget 2018/19	Budget 2019/20
Labor	$7,902,953	$8,287,837	$8,546,083
Operations Support	240,111	232,911	256,466
Vehicle Maintenance	250,175	237,885	271,337
General & Administrative	281,700	259,850	207,900
Total General Operations Expense	**$8,674,939**	**$9,018,483**	**$9,281,786**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Information Technology Expenses

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20
General Operations Expense			
Data Processing Supply & Accessories	$20,000	$36,500	$23,000
Data Processing Equipment	40,000	40,000	36,000
Data Processing Consultants	50,000	25,000	75,000
Software Maintenance & Licenses	79,400	161,000	165,000
Total General Operations Expense	**$189,400**	**$262,500**	**$299,000**

EL TORO WATER DISTRICT

LABOR / BENEFITS COMPARISON

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20	Change
Labor	$5,663,492	$5,893,903	$6,171,106	$277,203
Benefits	2,063,738	2,233,934	2,239,977	6,043
Workers Compensation and Unemployment Ins.	175,723	160,000	135,000	-25,000
Total Labor	**$7,902,953**	**$8,287,837**	**$8,546,083**	**$258,246**
Benefits as % of Labor	26.11%	26.95%	26.21%	

EL TORO WATER DISTRICT

BUDGET COMPARISON - Adminstration

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20
Electricity	38,700	39,900	40,200
Repair Parts and Materials	1,000	1,000	1,000
Equipment Maintenance and Repair	500	500	2,500
Structure Maintenance and Repair	15,000	10,000	10,000
Consultants	125,000	100,000	45,000
Contractors	56,000	56,200	56,200
Equipment Rental	12,000	12,000	12,700
Operating Supplies	3,500	3,500	3,500
Temporary Help	7,500	7,500	7,500
Other Employee Costs	15,000	22,000	22,300
Employee and Training	7,500	7,250	7,000
Total General & Administrative	**$281,700**	**$259,850**	**$207,900**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Indirect Expenses

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20
Insurance and Damages	$405,200	$470,650	$535,000
Advertising and Publicity	2,500	2,500	2,000
Annual Events	5,350	5,350	6,000
Auditing Fee	30,000	30,000	30,000
Bad Debts	20,000	20,000	20,000
Bank and Paycheck Services	54,000	56,500	57,000
Director's Fees	93,000	105,000	110,000
Dues and Memberships	75,000	82,000	93,390
Elections/Other	0	30,000	0
Employee Service Awards	4,000	5,800	3,800
Janitorial	34,500	33,800	33,800
Legal Fees	150,000	150,000	100,000
Meetings and Conventions - Administration	35,000	39,000	39,000
Meetings and Conventions - Directors	26,000	28,000	29,690
Office Supplies	23,000	23,000	19,800
Postage	20,500	20,500	20,500
Printing and Reproduction	21,000	21,000	18,000
Property Taxes	5,500	5,500	5,500
Public Relations	240,200	223,200	150,000
Publications and Subscriptions	3,000	3,000	3,000
Voice and Data Communications	83,000	102,000	105,540
Utilities	18,500	11,300	8,000
Total Indirect Expenses	**$1,349,250**	**$1,468,100**	**$1,390,020**
Depreciation and Amortization	**$4,006,850**	**$4,306,850**	**$4,476,850**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Water Enterprise Operating Expenses

Fiscal Years Ending June 30

Water Enterprise Operations Expense	Budget 2017/18	Budget 2018/19	Budget 2019/20
Source of Supply	$132,349	$134,999	$151,504
Purchased Water	7,691,757	8,027,968	8,041,949
Pumping Expense	290,971	247,971	256,281
Treatment Expense	41,866	49,641	40,851
Trans. & Dist. Expense	523,142	515,692	554,807
Customer Accounts Expense	0	0	0
Total Water Enterprise Operations Expense	**$8,680,085**	**$8,976,271**	**$9,045,392**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Sewer Enterprise Operating Expenses

Fiscal Years Ending June 30

Sewer Enterprise Operations Expense	Budget 2017/18	Budget 2018/19	Budget 2019/20
SOCWA	$974,100	$906,250	$900,000
Pumping Expense	377,832	369,848	335,724
Treatment Expense	699,658	789,578	862,449
Trans. & Dist. Expense	297,100	284,250	279,450
Total Sewer Enterprise Operations Expense	**$2,348,690**	**$2,349,926**	**$2,377,623**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Recycled Water Operating Expenses

Fiscal Years Ending June 30

Recycled Water Operations Expense	Budget 2017/18	Budget 2018/19	Budget 2019/20
Tertiary Treatment Expense	190,300	256,950	296,400
Trans. & Dist. Expense	0	0	6,000
Total Recycled Water Operations Expense	**$190,300**	**$256,950**	**$302,400**

EL TORO WATER DISTRICT

BUDGET COMPARISON - Non-Operating Income & Expense

Fiscal Years Ending June 30

	Budget 2017/18	Budget 2018/19	Budget 2019/20
Tax Revenue	$835,000	$875,000	$925,000
Interest Income	100,000	135,000	200,000
Other Revenue	548,500	682,750	695,440
Total Non-Operating Revenue	**$1,483,500**	**$1,692,750**	**$1,820,440**
Interest Expense	$805,729	$769,061	$731,557
Total Non-Operating Expense	**$805,729**	**$769,061**	**$731,557**

5-YEAR CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Source of Supply / Storage Projects								
1	R-2 Reservoir Interior Recoating (E/C)			262,500			262,500	262,500	
2	R-2 Reservoir Exterior Recoating (E/C)			80,000			80,000	80,000	
3	JRWSS Capital Budget	41,309	4,740	975	1,110	66,390	114,524	114,524	
4	Baker WTP Replacement Fund	52,795	52,795	52,795	52,795	52,795	263,975	263,975	
5	R-6 Chlorine & Ammonia Chemical Feed Pump Replacement					110,000	110,000	110,000	
	Total Source of Supply / Storage Projects	94,104	57,535	396,270	53,905	229,185	830,999	830,999	0
	Pumping (Water) Projects								
1	P-3 New MCC w/ TS, Nema 3R Main & Generator and Pump Replacements	480,000					480,000	480,000	
2	Water Stations PLC Upgrade to Control Logix	25,000	25,000				50,000	50,000	
	Total Pumping (Water) Projects	505,000	25,000	0	0	0	530,000	530,000	0
	Pumping (Water) Equipment								
1	Spare Rectifier for Chlorine Generators	15,000					15,000	15,000	
2	Cherry Booster Station Pump Replacement		100,000				100,000	100,000	
3	Shenandoah Booster Station Pump Replacement		100,000				100,000	100,000	
	Total Pumping (Water) Equipment	15,000	200,000	0	0	0	215,000	215,000	0
	Pumping (Sanitation) Projects								
1	Sewer Stations PLC Upgrade to Control Logix	25,000	25,000				50,000		50,000
2	4920 Siphon Stabilization	20,000	150,000				170,000		170,000
	Total Pumping (Sanitation) Projects	45,000	175,000	0	0	0	220,000	0	220,000
	Pumping (Sanitation) Equipment								
1	Aliso Creek Emergency Generator 350 KW (Unit 215)			200,000			200,000		200,000
2	La Paz MCC and PLC Upgrade	20,000	140,000				160,000		160,000
	Total Pumping (Sanitation) Equipment	20,000	140,000	200,000	0	0	360,000	0	360,000
	Treatment (Sanitation) Projects								
1	WRP Main Electrical Power Breaker Upgrade		35,000				35,000		35,000
2	Grit Chamber Rehab/Re-Coating	85,000					85,000		85,000
3	Secondary Clarifier # 1 Component Replacement			150,000			150,000		150,000
4	Secondary Clarifier # 4 Component Replacement					150,000	150,000		150,000
5	New MCC S-D Elecrical Cabinet & Breakers (DAF Unit #1)		30,000				30,000		30,000
6	HACH (WIMS) Maint. Job Cal Database Management Software System		10,500				10,500		10,500
	Total Treatment (Sanitation) Projects	85,000	75,500	150,000	0	150,000	460,500	0	460,500

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Treatment (Sanitation) Equipment								
1	Aeration Basin Diffusers		10,000				10,000		10,000
2	Rotostrainer Drum Replacement		30,000				30,000		30,000
3	Effluent Pump Station Pump Replacements		100,000				100,000		100,000
4	OOPS Emergency Generator Replacement	220,000					220,000		220,000
5	Aqua-Aerobic CMD Filter Sock Replacements for Filters #1 & #2	25,000					25,000		25,000
6	Main Emergency Generator Control Panel & Auxiliary Power Up-Grade	28,000					28,000		28,000
	Total Treatment (Sanitation) Equipment	273,000	140,000	0	0	0	413,000	0	413,000
	Laboratory Equipment								
1	Ion Chromatography		45,000				45,000		45,000
2	Undercounter Glassware Washer	8,000					8,000		8,000
	Total Laboratory Equipment	8,000	45,000	0	0	0	53,000	0	53,000
	Outside Treatment (SOCWA)								
1	SOCWA Capital Budget	592,512	989,484	917,000	409,000	1,200,000	4,107,996		4,107,996
	Total Treatment (SOCWA)	592,512	989,484	917,000	409,000	1,200,000	4,107,996	0	4,107,996
	Transmission & Distribution Projects								
1	AMI Implementation	200,000	200,000	200,000	200,000	200,000	1,000,000	1,000,000	
2	Moulton/El Toro Cathodic Protection Repairs	50,000					50,000	50,000	
3	21" PCCP Valve Replacements and Pipeline Repair					150,000	150,000	150,000	
	Total Transmission & Distribution (Water) Projects	250,000	200,000	200,000	200,000	350,000	1,200,000	1,200,000	
	Collection Equipment								
1	P332 Flexiprobe (Push Camera) Inspection System - PearPoint			20,000			20,000		20,000
2	P350 Flexiprobe (Mobile-Portable Camera) Inspection System - PearPoint				40,000		40,000		40,000
	Total Collection Equipment	0	0	20,000	40,000	0	60,000	0	60,000
	Vehicles/Vehicle Equipment								
1	Vehicle Replacement	80,000	100,000	100,000	75,000	75,000	430,000	215,000	215,000
2	Dump Truck/Traffic Control Truck (Unit 4)	80,000					80,000	40,000	40,000
3	Hydro Excavator				480,000		480,000	240,000	240,000
4	Warehouse Forklift			50,000			50,000	25,000	25,000
5	F-550 w/ Valve Maintenance Skid				150,000		150,000	150,000	
6	Vactor 2100 Combo Machine (Replace Unit 80)				500,000		500,000		500,000
7	Boom Truck (Diesel - Regulatory Compliance)				200,000		200,000	100,000	100,000
8	Forklift WRP (Diesel - Regulatory Compliance)			85,000			85,000		85,000
9	10-Wheel Dump Truck (Unit #50, Regulatory Compliance)				175,000		175,000	87,500	87,500
	Total Vehicles / Vehicle Equipment	160,000	100,000	235,000	1,580,000	75,000	2,150,000	857,500	1,292,500

EL TORO WATER DISTRICT
FIVE YEAR CAPITAL IMPROVEMENT PLAN
F.Y. 2019/20 - 2023/24

ITEM #	DESCRIPTION	2019/20	2020/21	2021/22	2022/23	2023/24	TOTAL	WATER	SEWER
	Construction/Mechanical/Electical Equipment								
1	Backhoe			150,000			150,000	75,000	75,000
	Total Consruction Equipment	0	0	150,000	0		150,000	75,000	75,000
	General Building Projects								
1	HVAC Replacement, Field Office Multi-Purpose Room	33,000					33,000	16,500	16,500
2	HVAC Replacement, Main Office (Bob Hill)	17,000					17,000	8,500	8,500
	Total General Building Projects	50,000	0	0	0	0	50,000	25,000	25,000
	Office Equipment/Furniture								
1	Firewall Replacement	30,000					30,000	15,000	15,000
2	Nimble Storage Array Replacement	75,000					75,000	37,500	37,500
3	SCADA Server Upgrade Water/Sewer	32,500					32,500	16,250	16,250
4	SCADA Server Upgrade WRP		32,500				32,500		32,500
5	Exchange Server Replacement	20,000					20,000	10,000	10,000
6	Replace Servers		50,000				50,000	25,000	25,000
	Total Office Equipment / Furniture	157,500	82,500	0	0	0	240,000	103,750	136,250
	Contingency								
1	Contingency	112,540	78,637	31,386	84,751	723,471	1,030,785	515,393	515,393
2	Inflation @ 5%	0	59,000	68,000	100,000	40,000	267,000	133,500	133,500
	Total Contingency	112,540	137,637	99,386	184,751	763,471	1,297,785	648,893	648,893
	Total Capital Budget	2,367,656	2,367,656	2,367,656	2,467,656	2,767,656	12,338,280	4,486,142	7,852,139
	Total Capital Projects	1,677,886	1,591,338	1,712,963	755,281	2,310,921	8,048,388	2,910,445	5,137,942
	WATER	902,239	316,944	621,117	300,093	770,053	2,910,445		
	SEWER	775,647	1,274,393	1,091,847	455,188	1,540,868	5,137,942		
	Total Capital Equipment	689,770	776,319	654,693	1,712,376	456,736	4,289,893	1,575,696	2,714,196
	WATER	201,885	309,409	174,847	661,188	228,368	1,575,696		
	SEWER	487,885	466,909	479,847	1,051,188	228,368	2,714,196		
	Total Capital Budget	2,367,656	2,367,656	2,367,656	2,467,656	2,767,656	12,338,280	4,486,142	7,852,139
	WATER	1,104,124	626,354	795,963	961,281	998,421	4,486,142		
	SEWER	1,263,532	1,741,303	1,571,693	1,506,376	1,769,236	7,852,139		

CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM (Current Year)

2019/20 CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM

Projects

	Source of Supply / Storage Projects	
1	JRWSS Capital Budget	41,309
2	Baker WTP Replacement Fund	52,795
	Total Source of Supply	94,104
	Pumping (Water) Projects	
3	P-3 New MCC w/ TS, Nema 3R Main & Generator and Pump Replacements	480,000
4	Water Stations PLC Upgrade to Control Logix	25,000
	Total Pumping (Water)	505,000
	Pumping (Sanitation) Projects	
5	Sewer Stations PLC Upgrade to Control Logix	25,000
6	4920 Siphon Stabilization	20,000
	Total Pumping (Sanitation)	45,000
	Treatment (Sanitation) Projects	
7	Grit Chamber Rehab/Re-Coating	85,000
	Total Treatment (Sanitation)	85,000
	Outside Treatment (SOCWA)	
8	SOCWA Capital Budget	592,512
	Total Treatment (SOCWA)	592,512
	Transmission & Distribution Projects	
9	AMR / AMI Implementation	200,000
10	Moulton/El Toro Cathodic Protection Repairs	50,000
	Total Mainline	250,000
	General Building Projects	
11	HVAC Replacement, Field Office Multi-Purpose Room	33,000
12	HVAC Replacement, Main Office (Bob Hill)	17,000
	Total General Building	50,000
	Contingency	
13	Contingency	56,270
	Total Contingency	56,270
	Total Capital Projects	$1,677,886

Equipment

	Pumping (Water) Equipment	
1	Spare Rectifier for Chlorine Generators	15,000
	Total Pumping (Water)	15,000
	Pumping (Sanitation) Equipment	
2	La Paz MCC and PLC Upgrade - Engineering	20,000
	Total Pumping (Sanitation)	20,000
	Treatment (Sanitation) Equipment	
3	OOPS Emergency Generator Replacement	220,000
4	Aqua-Aerobic CMD Filter Sock Replacements for Filters #1 & #2	25,000
5	Main Emergency Generator Control Panel & Auxiliary Power Up	28,000
	Total Treatment (Sanitation)	273,000
	Laboratory Equipment	
6	Undercounter Glassware Washer	8,000
	Total Laboratory Equipment	8,000
	Vehicles/Vehicle Equipment	
7	Vehicle Replacement	80,000
8	Dump Truck/Traffic Control Truck (Unit 4)	80,000
	Total Vehicles / Vehicle Equipment	160,000
	Office Equipment/Furniture	
9	Firewall Replacement	30,000
10	Nimble Storage Array Replacement	75,000
11	SCADA Server Upgrade Water/Sewer	32,500
12	Exchange Server Replacement	20,000
	Total Consruction Equipment	157,500
	Contingency	
13	Contingency	56,270
	Total Contingency	56,270
	Total Capital Equipment	$689,770

Total Capital Projects	1,677,886
Total Capital Equipment	689,770
Total Capital Budget	2,367,656

LEGEND

WATER
SEWER
BOTH

CAPITAL REPLACEMENT & REFURBISHMENT PROGRAM

PROJECT DESCRIPTIONS > $50,000

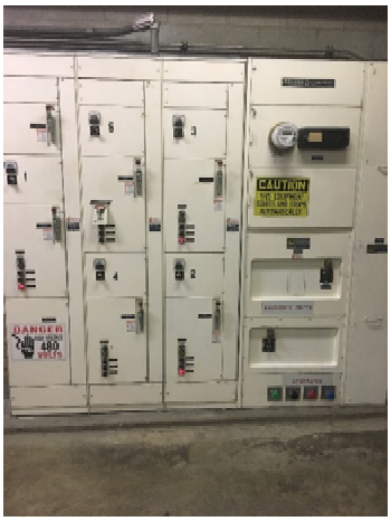
PROJECT TITLE: JOINT REGIONAL WATER SUPPLY SYSTEM

CAPITAL PLAN CLASSIFICATION:	SOURCE OF SUPPLY / STORAGE PROJECTS (PROJECT #1)
PROJECT BASIS:	Reliability
DESCRIPTION:	The Baker WTP Project Agreement established a Replacement Fund to provide for ongoing capital replacements of the Baker WTP equipment. The District pays a proportionate share of the Replacement Fund based on its owned capacity in the Baker Water Treatment Plant.
PROJECT BUDGET:	$41,309
BASIS OF COST ESTIMATE:	JRWSS Budget provided by South Coast Water District.

PROJECT TITLE: BAKER WTP REPLACEMENT FUND

CAPITAL PLAN CLASSIFICATION:	SOURCE OF SUPPLY / STORAGE PROJECTS (PROJECT #2)
PROJECT BASIS:	Reliability
DESCRIPTION:	The Baker WTP Project Agreement established a Replacement Fund to provide for ongoing capital replacements of the Baker WTP equipment. The District pays a proportionate share of the Replacement Fund based on its owned capacity in the Baker Water Treatment Plant.
PROJECT BUDGET:	$52,795
BASIS OF COST ESTIMATE:	Baker Treatment Plant Budget provided by Irvine Ranch Water District.

PROJECT TITLE: P-3 NEW MCC W/ TS, NEMA 3R MAIN & GENERATOR AND PUMP REPLACEMENT PROJECT

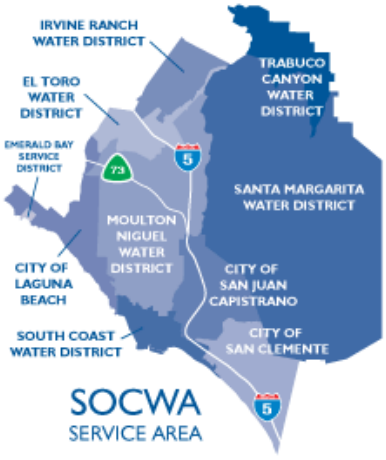


CAPITAL PLAN CLASSIFICATION:	PUMPING (WATER) PROJECTS (PROJECT #3)
LOCATION:	PUMP STATION NO. 3
PROJECT BASIS:	Water Supply Reliability; End of Useful Life; Safety
DESCRIPTION:	The existing pumping facility was installed in 1977. The MCC was manufactured in 1968, and is no longer supported. Internal components, such as motor starters, breakers and fuses are no longer readily available. The facility is also supported by a propane powered, 454 Oldsmobile driven, emergency back-up booster pump. Both the booster pump and Oldsmobile engine are in poor condition, and replacement parts are not readily available. The proposed project will install a new MCC for pump/motor controls, as well as the facility lighting circuits that are currently in a separate wall panel. A new 500KW diesel powered emergency generator is also being proposed, to provide backup power during electrical service outages.
PROJECT BUDGET:	$480,000
BASIS OF COST ESTIMATE:	Staff estimate based on components pricing and estimated installation costs.

PROJECT TITLE: GRIT CHAMBER REHAB / RE-COATING PROJECT

CAPITAL PLAN CLASSIFICATION:	TREATMENT (SANITATION) PROJECTS (PROJECT #7)
LOCATION:	WATER RECYCLING PLANT
PROJECT BASIS:	Preservation of Infrastructure, Reliability, Environmental Protection
DESCRIPTION:	The Grit Chamber, located at the Water Recycling Plant Headworks, was last lined over 15-years ago. The existing liner has deteriorated, exposing concrete surfaces in several areas. The concrete structure walls have deteriorated due to exposure to hydrogen sulfide gases. The inlet channels isolation valve has significant bleed-by, and needs to be replaced. The proposed project will remove the existing liner and repair all damaged concrete. A new urethane liner will be installed throughout the chamber and overlap approximately 6-inches onto the chambers deck surface. A new stainless steel, channel framed, rising stem isolation gate valve will be installed in the inlet channel leading into the main chamber.
PROJECT BUDGET:	$85,000
BASIS OF COST ESTIMATE:	Staff estimate based on vendor and contractor quotes.

PROJECT TITLE: SOCWA



CAPITAL PLAN CLASSIFICATION:	OUTSIDE TREATMENT - SOCWA (PROJECT #8)
LOCATION:	SOCWA
PROJECT BASIS:	End of Useful Life; Reliability; Environmental Protection; Regulatory Compliance
DESCRIPTION:	The District's share of the South Orange County Wastewater Authority capital budget is based on capacity ownership in the various Project Committees. SOCWA collects funding to support the capital improvements on a cash flow basis. The funds collected are intended to support actual costs rather than project budgets.
PROJECT BUDGET:	$ 592,512
BASIS OF COST ESTIMATE:	SOCWA Budget

PROJECT TITLE: AMR / AMI IMPLEMENTATION

CAPITAL PLAN CLASSIFICATION:	TRANSMISSION & DISTRIBUTION PROJECTS (PROJECT #9)
LOCATION:	SYSTEM WIDE
PROJECT BASIS:	Efficiency, Revenue Stability, Customer Service, Planning

DESCRIPTION:

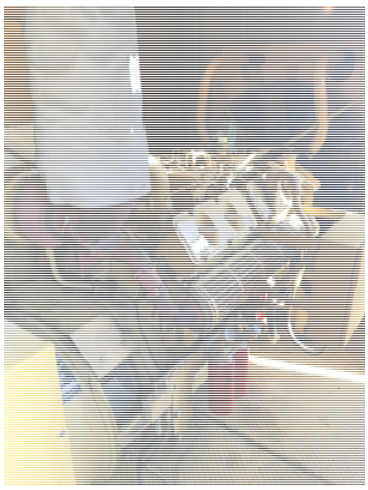
Advanced Metering Infrastructure (AMI) systems consist of small, low-power radio transmitters connected to individual water meters that send readings to a network of receivers throughout the system on a daily basis. AMI systems allow remote monitoring of billing meters and have the potential to reduce operating costs for meter reading and billing, and improve customer service. The direct benefits to the District and its customers could include:

- Highly accurate data collection which decreases the possibility of incorrect meter readings.
- Timely information on water usage and cost that allows staff to provide better customer service and plan necessary improvements in efficiency and performance.
- Timely identification of water leaks which reduces water waste and increased water bills due to leaks.
- Multiple meter reads daily, instead of once every month.
- Quicker and more efficient customer service.
- Online access to the Water Customer Portal so customers can monitor and manage their water usage.

The current project budget assumes a phased implementation of an AMI system over multiple years.

PROJECT BUDGET:	$200,000
BASIS OF COST ESTIMATE:	Annual Budget Assuming Phased Implementation

PROJECT TITLE: OOPS EMERGENCY GENERATOR REPLACEMENT



CAPITAL PLAN CLASSIFICATION:	TREATMENT (SANITATION) EQUIPMENT (EQUIPMENT #3)
LOCATION:	WATER RECYCLING PLANT
PROJECT BASIS:	Reliability; End of Useful Life; Environmental Protection
DESCRIPTION:	The existing emergency generator is 24-years old and has come to the end of its useful life. Repair parts for this generator have been difficult to locate, with many parts being obsolete. The radiator is weeping in numerous locations, and would need to be replaced. The estimates to replace the radiator, including backup generator rental, is $33,000. The generator remains functional, but needs to be replaced to assure reliability. The proposed project includes removing the existing generator, purchasing and installing a new SCAQMD compliant Tier 4 Final generator.
PROJECT BUDGET:	$220,000
BASIS OF COST ESTIMATE:	Estimates from generator manufacturers and an electrical contractor for the removal and installation.

PROJECT TITLE: VEHICLE REPLACEMENTS

CAPITAL PLAN CLASSIFICATION:	VEHICLES / VEHICLE EQUIPMENT (EQUIPMENT #7)
PROJECT BASIS:	End of Useful Life
DESCRIPTION:	The El Toro Water District fleet includes over 50 vehicles ranging from small pickup trucks to large crew trucks and dump trucks. The District's Senior Mechanic does an excellent job preserving and extending the useful life of each vehicle to the maximum extent possible. .As vehicles age and accumulate significant mileage, they are replaced or rotated to less intensive duty to further extend their usefulness. The proposed budget contemplates the purchase of two new Ford F-150 pick-up trucks.
PROJECT BUDGET:	$80,000
BASIS OF COST ESTIMATE:	The cost estimate was developed by the District's Senior Mechanic and is inclusive of vehicle purchase costs, tax and license fees, as well as associated costs to outfit the vehicles for District Service.

PROJECT TITLE: DUMP TRUCK / TRAFFIC CONTROL TRUCK

CAPITAL PLAN CLASSIFICATION: VEHICLES / VEHICLE EQUIPMENT (EQUIPMENT #8)

PROJECT BASIS: Efficiency, Safety, End of Useful Life

DESCRIPTION: The existing vehicle is a 1990 Ford Dump Truck. It is a small dump truck, in comparison to the District's other dump trucks. The vehicle is used for a variety of duties, including transporting smaller loads of materials, such as sand, rock, base and temporary asphalt, as well as steel trench plates to and from job sites. It is also used to transport and set, traffic control devices, for larger jobs, or jobs on the major arterial streets. The bed lift is electrically driven and is no longer capable of raising the bed with any significant amount of material.

The proposed replacement vehicle will be a Ford F-550 chassis, with a Specialty Equipment 8' x 12' dump body bed, with standing wells designed for the safe installation of traffic control devices. These standing wells (one on each side) have hinged steel covers that are set in place when only using the dump body function. It will have a hydraulic hoist and significantly more capacity than the existing truck.

PROJECT BUDGET: $80,000

BASIS OF COST ESTIMATE: The cost estimate was developed by the District's Senior Mechanic and is inclusive of vehicle purchase costs, tax and license fees, as well as associated costs to outfit the vehicle for District Service.

PROJECT TITLE: NIMBLE STORAGE ARRAY REPLACEMENT PROJECT

CAPITAL PLAN CLASSIFICATION:	OFFICE EQUIPMENT / FURNITURE (EQUIPMENT #10)
PROJECT BASIS:	End of Life
DESCRIPTION:	Nimble will "End of Life" the District's current CS240 storage array in December 2019, no longer providing updates or support for the device. This device will need to be replaced to provide network storage for the District's production network.
PROJECT BUDGET:	$75,000
BASIS OF COST ESTIMATE:	The cost estimate was based on a previous quote.

APPROVED 2019/20

BUDGET / 218 NOTICE / PUBLIC HEARING

SCHEDULE

BUDGET SCHEDULE
FY 2019/2020

DESCRIPTION	DATE	DAY
Board Budget Committee #1	3/20/2019	Wed
Board Budget Committee #2	4/1/2019	Mon
Board Budget Workshop	4/11/2019	Thurs
E, F & I Budget Update	4/23/2019	Tues
Distribute Prop 218 Notice	5/6/2019	Mon
CAG	5/16/2019	Thurs
Publish Public Hearning Notice - Newspaper	6/3/2019	Mon
E, F & I Budget Update	6/25/2019	Tues
Conduct Public Hearing - Regular Board Meeting	6/27/2019	Thurs
Implement Board Action	7/1/2019	Mon

Note: Board Budget Committee #1 is at 8:00 am
Board Budget Committee #2 is at 3:30 pm
Board Budget Workshop is at 7:30 am