

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**RESOLUTIONS/PRESENTATIONS**  
**ITEM 1**

**Employee Service Recognition**

---

The Authority's employees are its most valuable resources. Employee service recognition provides the Board with the opportunity to personally recognize and thank our dedicated employees who have achieved significant milestones in longevity with the Authority.

The Authority is pleased to recognize the following employees for their service.

<b>Milestone</b>	<b>Employee</b>	<b>Position</b>
10 Years	Ford Ritz	Project Engineer III

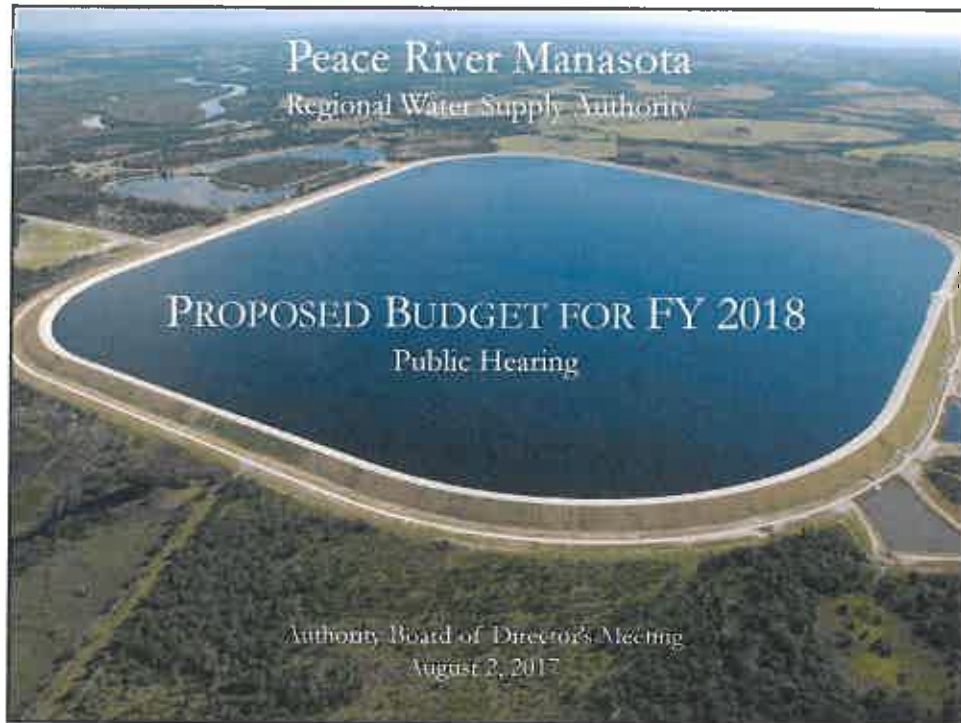
**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**PUBLIC HEARING**

Budget for FY 2018

---

1. Open Public Hearing
2. Presentation of Budget for FY 2018
3. Public Comment
4. Close Public Hearing



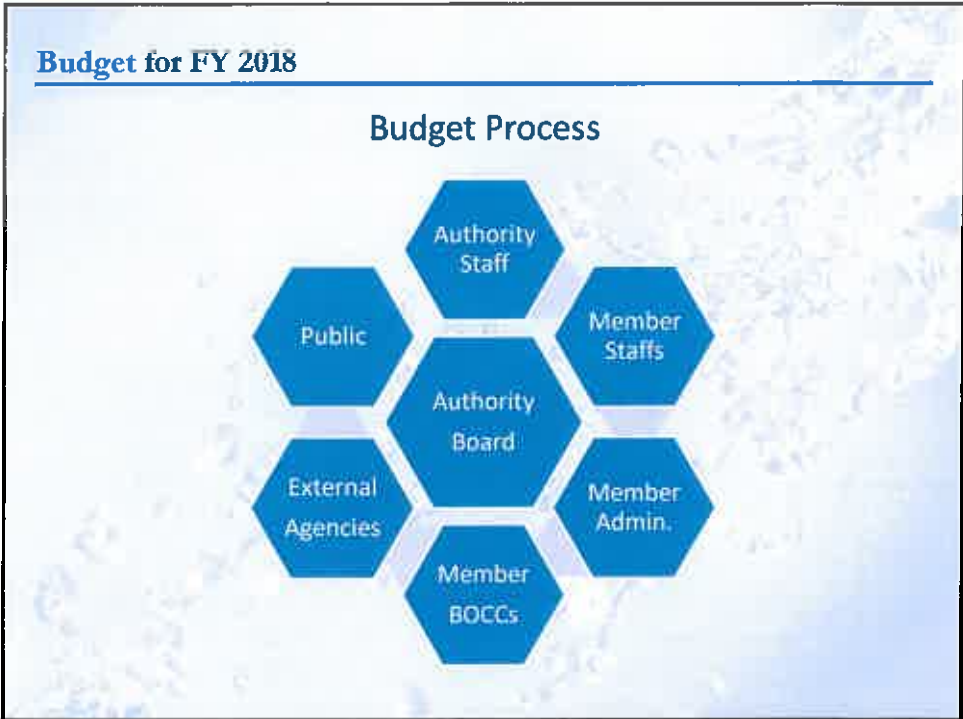
## Budget for FY 2018

### **Mission of the Authority is:**

*"To provide the region with a sufficient, high quality, safe drinking water supply that is reliable, sustainable and protective of our natural resources now and into the future"*

### **Vision of the Authority is:**

*"Through cooperation and collaboration the Authority and its members shall create, maintain and expand a sustainable, interconnected regional water supply system."*



**Budget for FY 2018**

**Budget Schedule:**

Feb. 1	- Authority Board meeting – Budget Process
Mar. 3	- Draft Budget for FY 2018 distributed to members’ staffs
Mar. 8	- Customer staff meeting
Apr. 12	- Authority Board meeting – Adopted Tentative Budget for FY 2018
May 3	- Customer staff meeting
June 7	- Authority Board meeting
July 12	- Customer staff meeting
July/Aug	- Member County BOCC and North Port Commission meetings
Aug. 2	- Authority Board meeting and Public Hearing to adopt Final Budget for FY 2018

A vertical double-headed arrow on the right side of the table spans from the April 12 meeting to the August 2 meeting, labeled "4+ Month Review Period".

**Budget for FY 2018**

Revision to FY 2018  
Tentative Budget CIP

Peace River Minnesota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

CAPITAL IMPROVEMENT PROGRAM										
Revised CIP Projects										
Item	CIP Project	Public Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023	FY 2024	Total
1.	Regional Integrated Loop - Phase 1 (S.A. 17/Small Creek)	1,400,000	4,500,000	5,700,000	300,000					12,900,000
2.	Regional Integrated Loop - Phase 2B (S.A. 641 to Clark Road)	2,200,000	2,500,000	8,600,000	11,100,000	2,200,000				26,600,000
3.	Raw Water ADA (Final Design, Procuring, Implementation)	20,000	200,000	250,000	8,200,000					9,470,000
4.	Facility Improvements (Distribution Warehouse)	400,000	300,000	300,000						1,000,000
5.	Regional Integrated Loop - Phase 2B (Exchange Piped to Mitchell)			4,200,000						4,200,000
6.	Regional Integrated Loop - Phase 4 (South State Intersections)			840,000	2,200,000	8,100,000	16,800,000			27,940,000
7.	Regional Integrated Loop - Phase 2C (Aurora Road to Purcell Road)			2,000,000	7,000,000	8,800,000				17,800,000
8.	Water Treatment Plant #2 Capacity Increase (4.5MGD)	3,000,000	6,500,000	20,000,000	23,000,000	8,000,000	7,000,000	8,000,000		71,000,000
<b>Total CIP Project Costs</b>			<b>13,020,000</b>	<b>51,500,000</b>	<b>56,800,000</b>	<b>48,200,000</b>	<b>33,000,000</b>	<b>8,800,000</b>	<b>8,800,000</b>	<b>211,320,000</b>
Item	CIP Project	Public Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023	FY 2024	Total
1.	Regional Integrated Loop - Phase 1 (S.A. 17/Small Creek)									
	State Grant Fund	600,000	1,400,000		500,000					2,500,000
	County Grant Fund	300,000	700,000		200,000					1,200,000
	County General Fund	300,000	700,000		200,000					1,200,000
2.	Regional Integrated Loop - Phase 2B (S.A. 641 to Clark Road)									
	State Grant Fund	60,000	300,000	80,000						440,000
	State Water Grant Fund	500,000	300,000	4,100,000	1,300,000	1,100,000				7,300,000
	CIP Funds (Sustainable County)	500,000	700,000	2,000,000	1,100,000	1,100,000				6,400,000
3.	Raw Water ADA									
	State Water Grant Fund	225,000	100,000	300,000	1,100,000					1,725,000
	CIP Funds		100,000	300,000	1,100,000					1,500,000
4.	Facility Improvements (Distribution Warehouse)									
	CIP Funds	400,000	300,000	300,000						1,000,000
5.	Regional Integrated Loop - Phase 2B (Exchange Piped to Mitchell)									
	State Water Grant Fund			2,400,000						2,400,000
	CIP Funds (Sustainable County)			2,400,000						4,800,000
6.	Regional Integrated Loop - Phase 4 (South State Intersections)									
	CIP Funds (Sustainable County)			2,400,000						2,400,000
7.	Regional Integrated Loop - Phase 2C (Aurora Road to Purcell Road)									
	State Water Grant Fund			2,000,000	7,000,000	8,800,000				17,800,000
	CIP Funds (Sustainable County)			2,000,000	7,000,000	8,800,000				17,800,000
8.	Water Treatment Plant #2 Capacity Increase (4.5MGD)									
	State Water Grant Fund			1,500,000	4,000,000	1,000,000	1,000,000			7,500,000
	CIP Funds			1,500,000	4,000,000	1,000,000	1,000,000			7,500,000
<b>Total CIP Project Funding Sources</b>			<b>2,625,000</b>	<b>9,200,000</b>	<b>26,300,000</b>	<b>21,870,000</b>	<b>9,900,000</b>	<b>7,800,000</b>	<b>9,800,000</b>	<b>71,495,000</b>
Item	CIP Project	Public Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023	FY 2024	Total
1.	CIP Fund		1,900,000	3,900,000	7,400,000	11,900,000	1,900,000	8,800,000	1,800,000	38,200,000
2.	State Grant Fund		800,000	7,000,000	10,000					17,800,000
3.	State Water Grant Fund		550,000	1,200,000	11,400,000	7,400,000	3,000,000	1,800,000		25,350,000
4.	County Grant Fund		600,000	700,000	700,000					2,700,000
<b>Total CIP Funding Sources by Source</b>			<b>3,450,000</b>	<b>12,600,000</b>	<b>29,500,000</b>	<b>19,300,000</b>	<b>4,700,000</b>	<b>10,600,000</b>	<b>1,800,000</b>	<b>72,950,000</b>

**Budget for FY 2018**

	FY 2017 Budget	FY 2018 Budget	Increase/ (Decrease)
<b>Total Enterprise Fund</b>	<b>\$ 43,931,504</b>	<b>\$ 49,411,364</b>	<b>\$ 5,479,860</b>
<b>Administrative Office</b>	<b>\$ 686,500</b>	<b>\$ 705,300</b>	<b>\$ 18,800</b>
<b>Facilities</b>	<b>\$ 43,245,004</b>	<b>\$ 48,706,064</b>	<b>\$ 5,461,060</b>

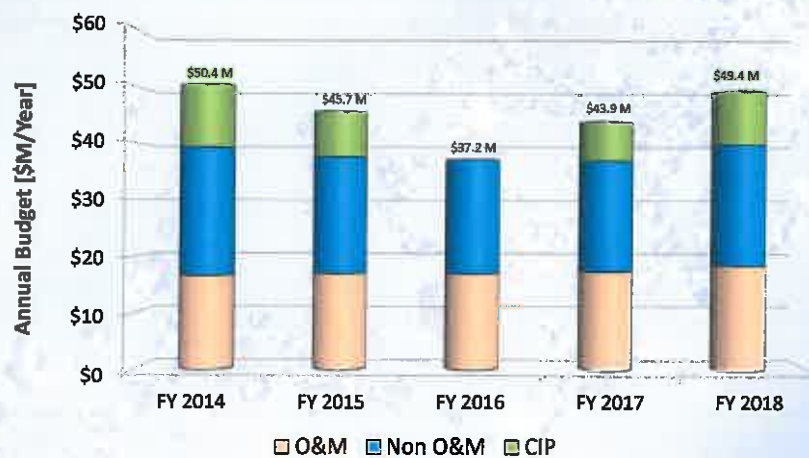
## Budget for FY 2018

### Budget Analysis:

- Costs consistent with increased water demand
- Staffing
  - Personnel compensation increase budgeted at 4%
  - Health Insurance increase budgeted at 5%
  - One new staff position [increase from 47 to 48 FTE]
    - > Project engineer/manager position
- Increase in FPL electric rates (13%)
- Prioritize R&R funding to maintain infrastructure
- Reflects grant funds for CIP projects for Customers savings

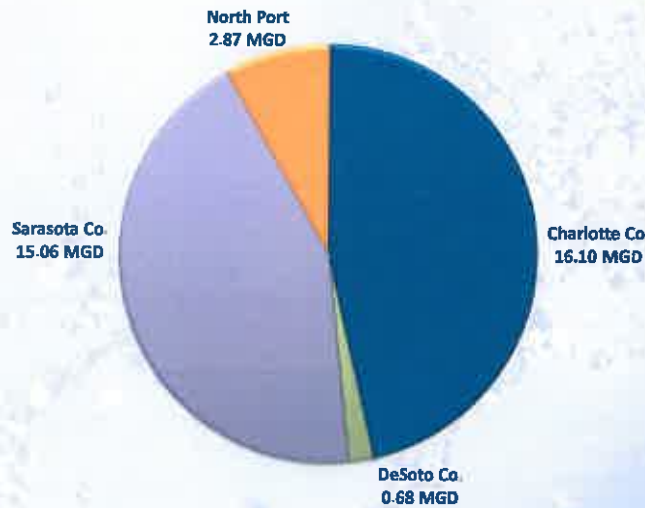
## Budget for FY 2018

### Historical Budgets



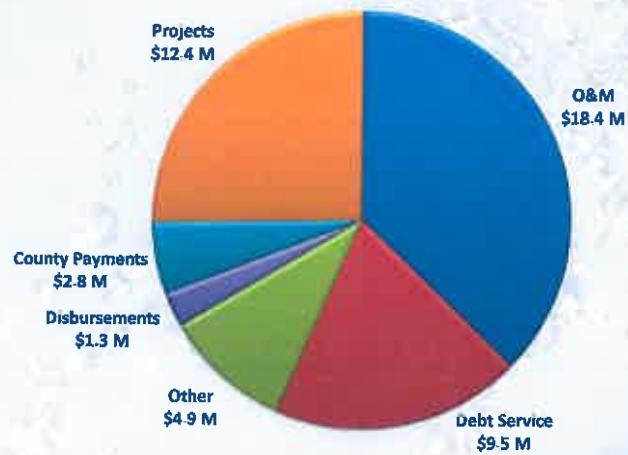
**Budget for FY 2018**

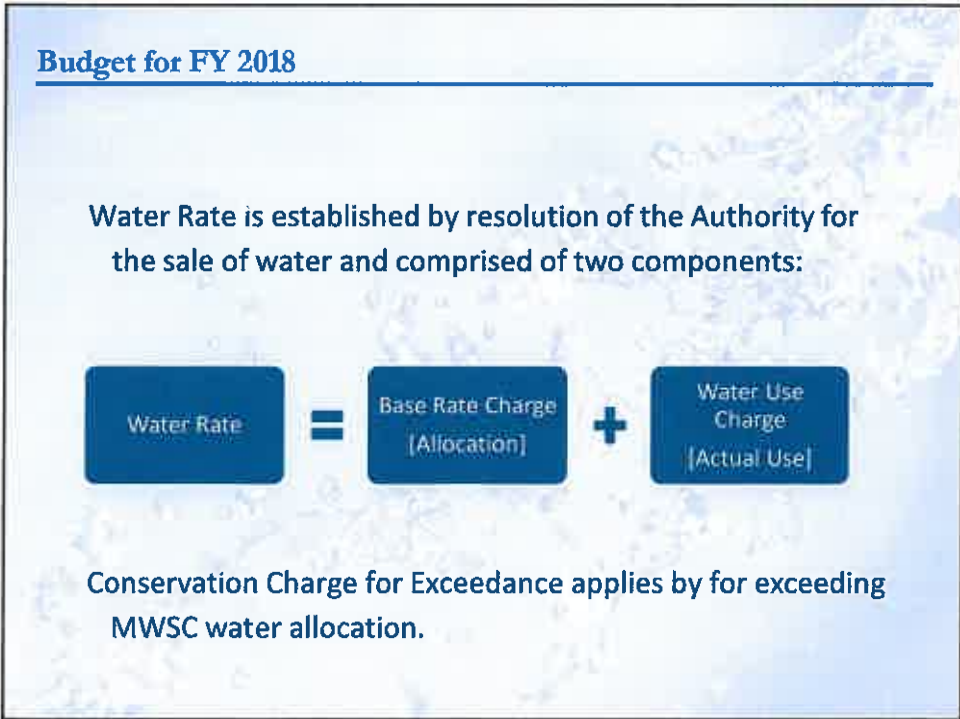
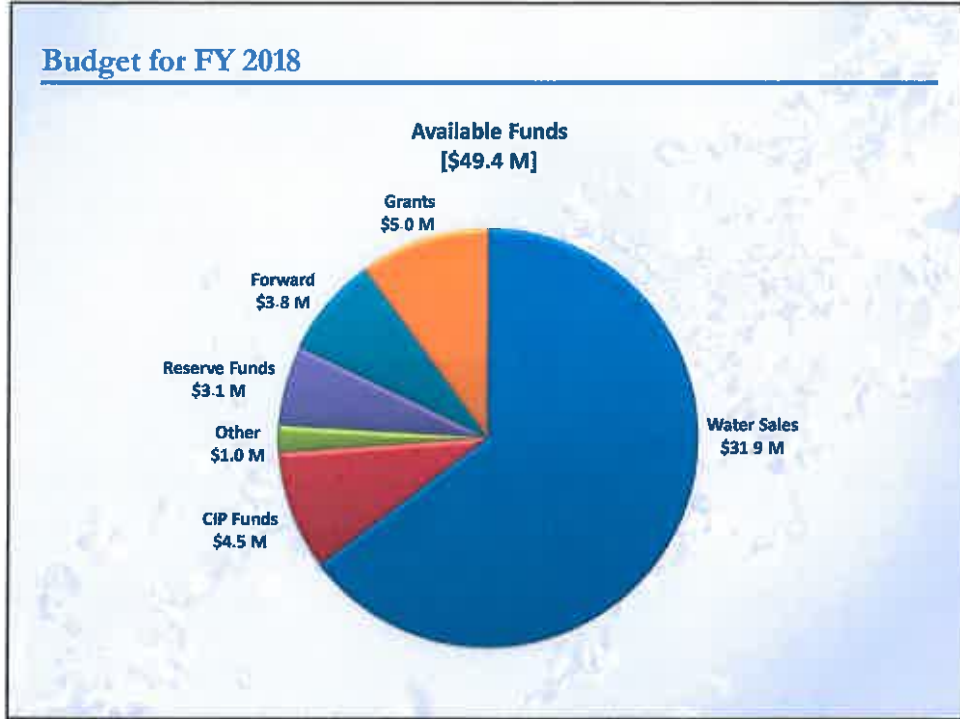
**Water Allocations  
[34.7 MGD]**



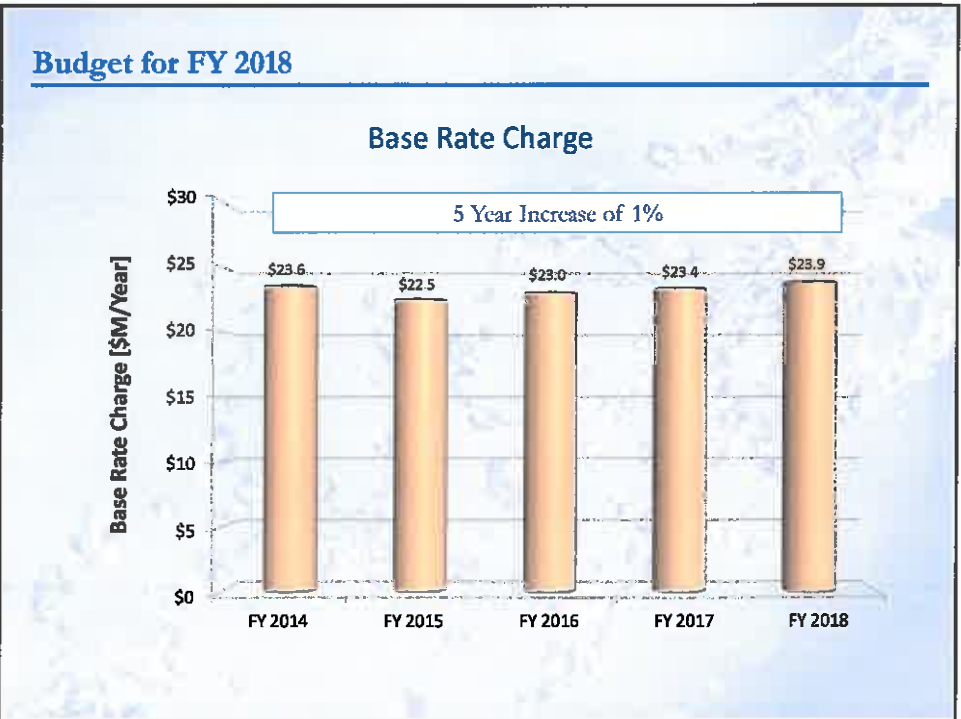
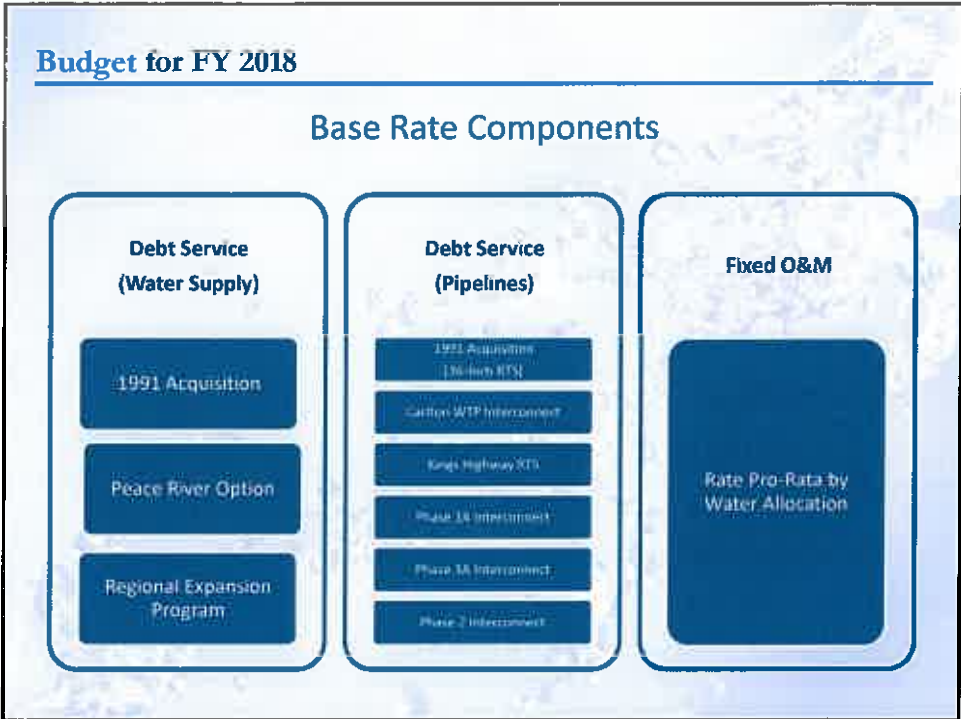
**Budget for FY 2018**

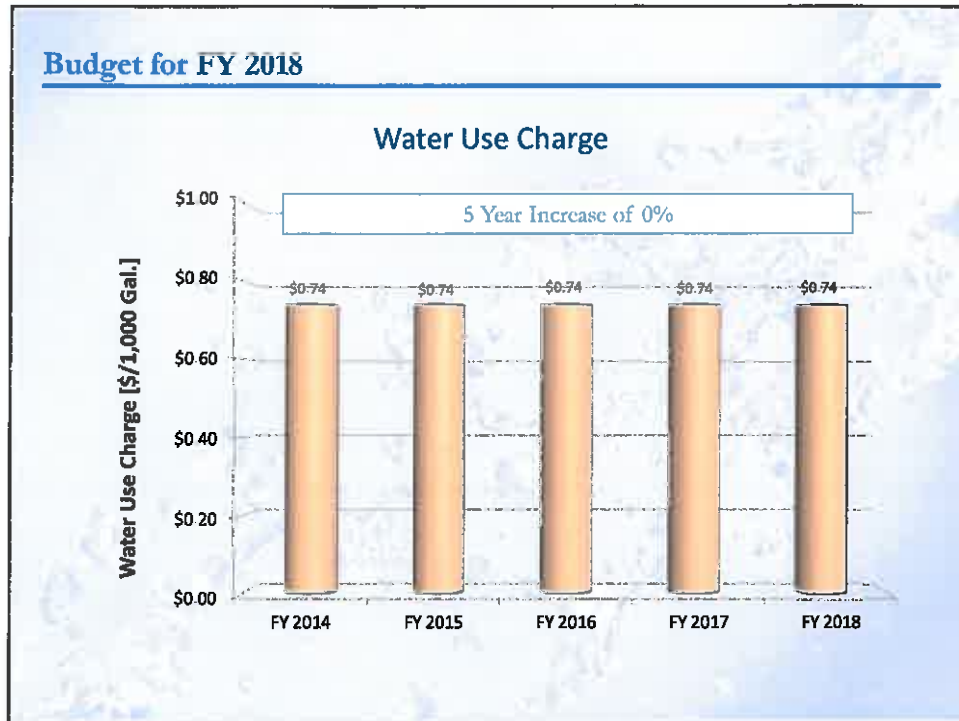
**Expenditures  
[\$49.4 M]**











**Budget for FY 2018**

Customer Water Rate	FY 2017 Budget	FY 2018 Budget	Increase/ (Decrease)
<u>Base Rate Charge</u> (\$ for FY)			
• Charlotte Co.	\$ 8,969,668	\$ 9,193,215	\$ 223,547
• DeSoto Co	\$ 482,715	\$ 492,429	\$ 9,714
• Manatee Co	\$ 0	\$ 0	\$ 0
• Sarasota Co.	\$ 11,627,623	\$ 11,838,212	\$ 210,589
• North Port	\$ 2,291,923	\$ 2,331,317	\$ 39,394
	\$ 23,371,928	\$ 23,855,173	\$ 483,245
<u>Water Use Charge</u> (\$/1,000 Gal)	\$ 0.74	\$ 0.74	No Change

**Budget for FY 2018**

Member Fee	FY 2017 Budget	FY 2018 Budget	Increase/ (Decrease)
<u>Member Fee</u> (\$ for FY)			
• Charlotte Co	\$ 71,772	\$ 75,755	\$ 3,983
• DeSoto Co	\$ 47,845	\$ 50,467	\$ 2,622
• Manatee Co.	\$ 104,596	\$ 110,636	\$ 6,040
• Sarasota Co	<u>\$ 112,286</u>	<u>\$ 118,442</u>	<u>\$ 6,156</u>
	\$ 336,500	\$ 355,300	\$ 18,800

**Budget for FY 2018**

Member/Customer Planning Assessment	FY 2017 Budget	FY 2018 Budget	Increase/ (Decrease)
<u>Assessment</u> (\$ for FY)			
• Charlotte Co	\$ 10,595	\$ 10,586	(\$ 9)
• DeSoto Co	\$ 2,062	\$ 2,045	(\$ 17)
• Manatee Co.	\$ 22,300	\$ 22,367	\$ 67
• Sarasota Co	\$ 24,401	\$ 24,330	(\$ 71)
• North Port	<u>\$ 642</u>	<u>\$ 672</u>	<u>\$ 30</u>
	\$ 60,000	\$ 60,000	\$ 0

**Budget for FY 2018**

---

	FY 2018 Proposed Budget
Total Enterprise Fund	\$ 49,411,364

**Budget for FY 2018**

---

Public Comment

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**BUDGET FOR FY 2018**  
**ITEM 1**

Adoption of Budget for FY 2018

---

**Presenter -** Patrick Lehman, Executive Director

**Recommended Action -** **Motion** to approve the Budget for FY 2018 in the amount of \$49,411,364.

The proposed final Budget for FY 2018 is presented in accordance with the ‘Second Amended Interlocal Agreement Creating the Peace River Manasota Regional Water Supply Authority’ and the ‘Master Water Supply Contract’. The final budget includes all anticipated expenditures of the Authority for its projects and activities for the ensuing fiscal year, including, but not limited to, operating and maintenance costs, management and planning costs, and debt service.

The Tentative Budget for FY 2018 was approved by the Board on April 12, 2017. Revision to the FY 2018 Tentative Budget was to the 5-Year CIP (page 14) to defer Regional Integrated Loop – Phase 3C to the future. This change did not affect the FY 2018 revenues or expenditures. There have been no other changes to the proposed final budget. The final proposed Budget for FY 2018 is \$49,411,364.

**Attachments**

- Tab A FY 2018 Tentative Budget CIP Revision
- Tab B FY 2018 Budget Cost Analysis
- Tab C FY 2018 Budget Water Rates and Charges Analysis
- Tab D FY 2018 Proposed Budget

**TAB A**  
**FY 2018 Tentative Budget CIP Revision**

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

CAPITAL IMPROVEMENT PROGRAM  
Funded CIP Projects

Item	CIP Project	Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
1	Regional Integrated Loop - Phase 1 [U.S. 17/Shell Creek]	1,100,000	4,900,000	5,700,000	300,000				12,000,000
2	Regional Integrated Loop - Phase 3B [S.R. 681 to Clark Road]	1,200,000	3,500,000	8,800,000	11,100,000	2,368,000			26,968,000
3	Raw Water ASR - [Pilot testing, Permitting, Implementation]	225,000	230,000	750,000	6,550,000				7,755,000
4	Facilities Improvements - [Maintenance Warehouse]	400,000	900,000	200,000					1,500,000
5	Regional Integrated Loop - Phase 3D [Fruitville Road to Manatee]			4,915,000					4,915,000
6	Regional Integrated Loop - Phase 4 [Burnt Store Interconnect]				4,925,000				4,925,000
7	Regional Integrated Loop - Phase 3C [Clark Road to Fruitville Road]				540,000	2,250,000	3,250,000	29,860,000	36,000,000
8	Peace River Facility Phase 2 Capacity Increase [4 MGD]					3,000,000	7,000,000	3,800,000	13,800,000
<b>Total CIP Project Costs</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>
Item	CIP Project Funding Sources	Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
1	Regional Integrated Loop - Phase 1 [U.S. 17/Shell Creek]								
	State Grant Funds	600,000	3,400,000						4,000,000
	SWFWMD Grant Fund		750,000	4,950,000	300,000				6,000,000
	Punta Gorda Payment	500,000	750,000	750,000					2,000,000
2	Regional Integrated Loop - Phase 3B [S.R. 681 to Clark Road]								
	State Grant Funds	90,000	360,000	50,000					500,000
	SWFWMD Grant Fund	555,000	360,000	4,375,000	5,550,000	1,184,000			12,024,000
	CIP Funds [Sarasota County]	555,000	2,780,000	4,375,000	5,550,000	1,184,000			14,444,000
3	Raw Water ASR								
	SWFWMD Grant Fund		115,000	375,000	3,275,000				3,765,000
	CIP Funds	225,000	115,000	375,000	3,275,000				3,990,000
4	Facilities Improvements - [Maintenance Warehouse]								
	CIP Funds	400,000	900,000	200,000					1,500,000
5	Regional Integrated Loop - Phase 3D [Fruitville Road to Manatee]								
	SWFWMD Grant Fund			2,457,500					2,457,500
	CIP Funds [Sarasota County]			2,457,500					2,457,500
6	Regional Integrated Loop - Phase 4 [Burnt Store Interconnect]								
	SWFWMD Grant Fund				2,462,500				2,462,500
	CIP Funds [Charlotte County]				2,462,500				2,462,500
7	Regional Integrated Loop - Phase 3C [Clark Road to Fruitville Road]								
	SWFWMD Grant Fund				270,000	1,175,000	1,625,000	14,930,000	18,000,000
	CIP Funds [TBD]				270,000	1,175,000	1,625,000	14,930,000	18,000,000
8	Peace River Facility Phase 2 Capacity Increase [4 MGD]								
	SWFWMD Grant Fund					1,500,000	3,500,000	1,900,000	6,900,000
	CIP Funds					1,500,000	3,500,000	1,900,000	6,900,000
<b>Total CIP Project Funding Sources</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>
CIP Funding Revenue by Source		Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
CIP Fund		1,180,000	3,795,000	7,407,500	11,287,500	2,684,000	3,500,000	1,900,000	31,754,000
State Grant Funds		690,000	3,760,000	50,000					4,500,000
SWFWMD Grant Fund		555,000	1,225,000	12,157,500	11,587,500	2,684,000	3,500,000	1,900,000	33,609,000
Punta Gorda Payment		500,000	750,000	750,000					2,000,000
<b>Total CIP Funding Revenue by Source</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>

**TAB B**  
**FY 2018 Budget Cost Analysis**



Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

BUDGET COST ANALYSIS			
Enterprise Fund	FY 2017 Approved	FY 2018 Proposed	Variance +/-
<b>AVAILABLE FUNDS</b>			
Water Sales	\$31,156,528	\$31,943,473	\$786,945
Member Fee	\$336,500	\$355,300	\$18,800
Customer Planning Assessment	\$60,000	\$60,000	\$0
<b>Subtotal</b>	<b>\$31,553,028</b>	<b>\$32,358,773</b>	<b>\$805,745</b>
Estimated Unencumbered Funds from Prior Year	\$2,836,176	\$3,835,291	\$999,115
Federal Direct Payment	\$578,300	\$578,300	\$0
Interest Income	\$40,000	\$40,000	\$0
Reserve Accounts	\$1,943,000	\$3,069,000	\$1,126,000
CIP Fund	\$3,691,000	\$4,545,000	\$854,000
Grants	\$3,290,000	\$4,985,000	\$1,695,000
<b>Total Sources</b>	<b>\$43,931,504</b>	<b>\$49,411,364</b>	<b>\$5,479,860</b>
<b>EXPENDITURES</b>			
Insurances	\$503,000	\$476,000	(\$27,000)
Personnel	\$4,522,000	\$4,840,600	\$318,600
Utilities	\$2,156,000	\$2,444,000	\$288,000
Operating Supplies	\$128,500	\$125,000	(\$3,500)
Water Treatment Chemicals	\$5,509,600	\$5,751,500	\$241,900
Repairs & Maintenance	\$1,635,200	\$1,817,000	\$181,800
Machinery & Equipment	\$298,500	\$277,500	(\$21,000)
Contract Services	\$2,183,500	\$2,252,300	\$68,800
General Administration	\$420,500	\$426,000	\$5,500
<b>Subtotal</b>	<b>\$17,356,800</b>	<b>\$18,409,900</b>	<b>\$1,053,100</b>
Debt Service	\$10,892,190	\$10,894,835	\$2,645
County Payments	\$2,772,338	\$2,772,338	\$0
Contingencies	\$520,000	\$520,000	\$0
Transfer out to R&R Account	\$2,000,000	\$2,000,000	\$0
Transfer out to CIP	\$0	\$1,000,000	\$1,000,000
Water Purchase	\$20,000	\$20,000	\$0
Projects	\$9,024,000	\$12,449,000	\$3,425,000
Fund Disbursements	\$1,346,176	\$1,345,291	(\$885)
<b>Total Uses</b>	<b>\$43,931,504</b>	<b>\$49,411,364</b>	<b>\$5,479,860</b>

**TAB C**  
**FY 2018 Budget Water Rate and Charges Analysis**

Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

<b>WATER RATE AND CHARGES ANALYSIS</b>			
<b>Fixed Charges</b>	<b>FY 2017 Approved</b>	<b>FY 2018 Proposed</b>	<b>Variance +/-</b>
<b>Charlotte County</b>			
Base Charge	\$8,969,668	\$9,193,215	\$223,547
Member Contribution	\$71,772	\$75,755	\$3,983
Customer Planning Assessment	\$10,595	\$10,586	(\$9)
<b>Subtotal</b>	<b>\$9,052,035</b>	<b>\$9,279,555</b>	<b>\$227,520</b>
<b>DeSoto County</b>			
Base Charge	\$482,715	\$492,429	\$9,714
Member Contribution	\$47,845	\$50,467	\$2,622
Customer Planning Assessment	\$2,062	\$2,045	(\$17)
<b>Subtotal</b>	<b>\$532,622</b>	<b>\$544,941</b>	<b>\$12,319</b>
<b>Manatee County</b>			
Base Charge	\$0	\$0	\$0
Member Contribution	\$104,596	\$110,636	\$6,040
Customer Planning Assessment	\$22,300	\$22,367	\$67
<b>Subtotal</b>	<b>\$126,896</b>	<b>\$133,003</b>	<b>\$6,107</b>
<b>Sarasota County</b>			
Base Charge	\$11,627,623	\$11,838,212	\$210,589
Member Contribution	\$112,286	\$118,442	\$6,156
Customer Planning Assessment	\$24,401	\$24,330	(\$71)
<b>Subtotal</b>	<b>\$11,764,310</b>	<b>\$11,980,985</b>	<b>\$216,675</b>
<b>City of North Port</b>			
Base Charge	\$2,291,923	\$2,331,317	\$39,394
Member Contribution	\$0	\$0	\$0
Customer Planning Assessment	\$642	\$672	\$30
<b>Subtotal</b>	<b>\$2,292,565</b>	<b>\$2,331,990</b>	<b>\$39,425</b>
<b>Enterprise Fund</b>			
Base Charge	\$23,371,929	\$23,855,173	\$483,244
Member Contribution	\$336,499	\$355,300	\$18,801
Customer Planning Assessment	\$60,000	\$60,000	\$0
<b>Total</b>	<b>\$23,768,428</b>	<b>\$24,270,473</b>	<b>\$502,045</b>
<b>Variable Charges</b>	<b>FY 2017 Approved</b>	<b>FY 2018 Proposed</b>	<b>Variance +/-</b>
<b>Water Use Rate Charge</b>			
\$/1,000 gallons	\$0.74	\$0.74	\$0.00

**TAB D**  
**FY 2018 Proposed Budget**

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017



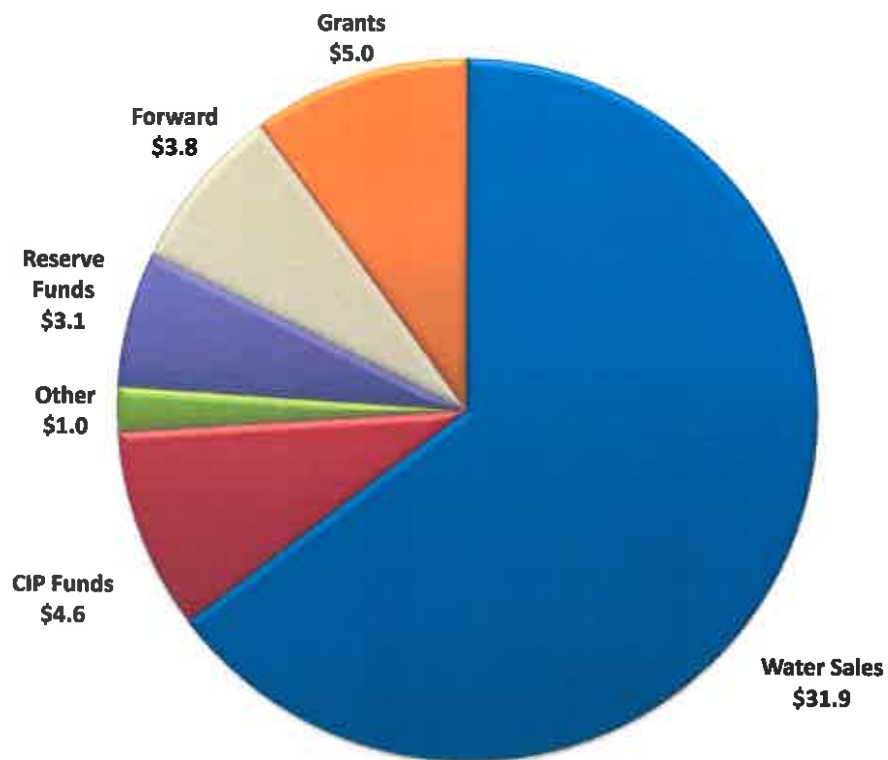
# Peace River Manasota

Regional Water Supply Authority

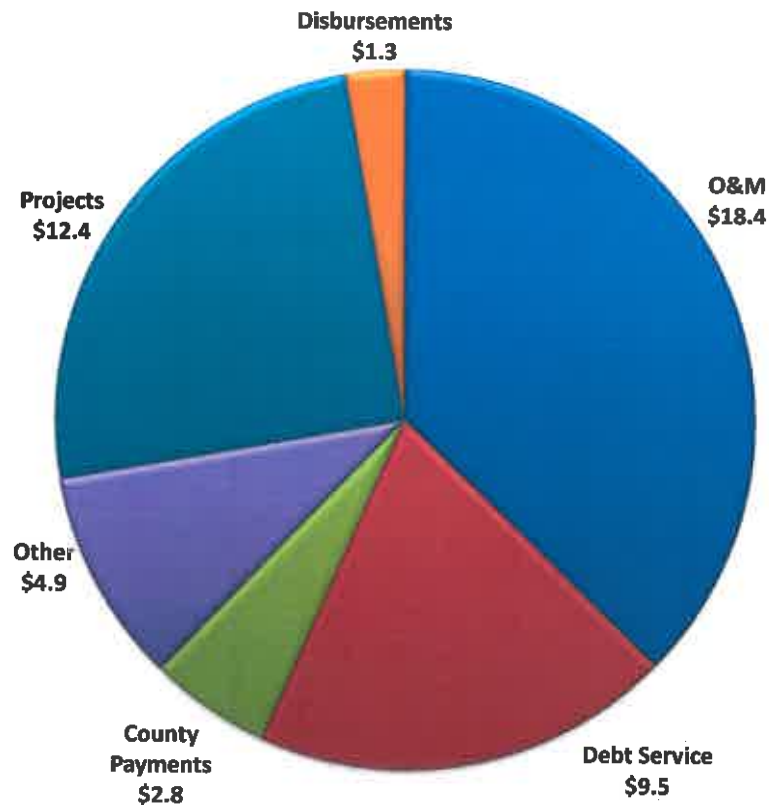
## PROPOSED BUDGET for FY 2018

[July 12, 2017]

**AVAILABLE FUNDS**  
**\$49.4 M**



**EXPENDITURES**  
**\$49.4 M**



**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

<b>AVAILABLE FUNDS</b>	<b>Administrative Office</b>	<b>Facilities</b>	<b>Total Enterprise Fund</b>
<b>Revenue</b>			
Water Sales		31,943,473	31,943,473
Member Fee	355,300		355,300
Planning Assessment		60,000	60,000
Anticipated interest		40,000	40,000
Federal Direct Payment [2010B Bond Series]		578,300	578,300
Subtotal	355,300	32,621,773	32,977,073
<b>Grants</b>			
State Grant Funds		3,760,000	3,760,000
SWFWMD Grant Funds		1,225,000	1,225,000
Subtotal		4,985,000	4,985,000
<b>Reserve Accounts</b>			
Transfer from R&R Reserve Account		2,819,000	2,819,000
Transfer from Rate Stabilization		250,000	250,000
Subtotal		3,069,000	3,069,000
<b>CIP Fund</b>			
CIP Project Funds		3,795,000	3,795,000
Punta Gorda Payment		750,000	750,000
Subtotal		4,545,000	4,545,000
<b>Funds Brought Forward</b>			
Carry Forward from FY2017	350,000	2,140,000	2,490,000
Funds Brought Forward for Disbursement		1,345,291	1,345,291
Subtotal	350,000	3,485,291	3,835,291
<b>Total Funds Available</b>	<b>705,300</b>	<b>48,706,064</b>	<b>49,411,364</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

EXPENDITURES	Administrative Office	Facilities	Total Enterprise Fund
<b>OPERATION &amp; MAINTENANCE</b>			
<b>Insurances</b>			
Property/Liability/Workmen's Compensation		445,000	445,000
Auto		25,000	25,000
Public Officials Liability	6,000		6,000
Subtotal	6,000	470,000	476,000
<b>Personnel</b>			
Administration	312,000	450,000	762,000
Facility Operations/Maintenance		2,454,000	2,454,000
Subtotal	312,000	2,904,000	3,216,000
<b>Benefits</b>			
FICA Taxes	24,000	218,000	242,000
Fla. Retirement System	50,000	272,000	322,000
Health Insurance	68,300	992,300	1,060,600
Subtotal	142,300	1,482,300	1,624,600
<b>Utilities</b>			
Electric Power	5,000	2,337,000	2,342,000
Diesel Fuel		20,000	20,000
Vehicle Fuel	5,000	40,000	45,000
Telephone	2,000	35,000	37,000
Subtotal	12,000	2,432,000	2,444,000
<b>Operating Supplies</b>			
General Operations		50,000	50,000
Laboratory Supplies		75,000	75,000
Subtotal	0	125,000	125,000
<b>Water Treatment Chemicals</b>			
Aluminum Sulfate		1,650,100	1,650,100
Sodium Hydroxide		1,107,500	1,107,500
Carbon		1,820,000	1,820,000
Coagulant Aid		328,600	328,600
Sodium Hypochlorite		652,100	652,100
Aqua Ammonia		90,700	90,700
Copper Sulfate		102,500	102,500
Subtotal		5,751,500	5,751,500



Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

<b>EXPENDITURES</b>	<b>Administrative Office</b>	<b>Facilities</b>	<b>Total Enterprise Fund</b>
<b>Repairs &amp; Maintenance</b>			
Water Treatment Facilities		697,500	697,500
Water Resources		538,000	538,000
Land Management		461,000	461,000
Regional Transmission System		76,000	76,000
Vehicle Fleet Maintenance	3,000	41,500	44,500
Subtotal	3,000	1,814,000	1,817,000
<b>Machinery &amp; Equipment</b>			
Machinery & Equipment		277,500	277,500
<b>Contract Services</b>			
Annual Audit	4,000	40,000	44,000
Engineering Services - General		265,000	265,000
Hydrogeological Services		200,000	200,000
Environmental Services		85,000	85,000
Rate Consulting Services	0	30,000	30,000
Information/Technology Services	12,000	80,000	92,000
Reservoir Permit Monitoring		306,000	306,000
Equipment Rental	7,000	50,000	57,000
Legal Services	24,000	250,000	274,000
Legislative Monitoring Services		50,000	50,000
Off-Site Treatment Residual Hauling and Disposal		249,800	249,800
Outside Lab Services - Drinking Water/ASR/EPA		100,000	100,000
Watershed Programs/Monitoring/Protection [HBMP, MFL, Stewardship]		467,000	467,000
Charlotte Harbor NEP		3,500	3,500
Uniforms		15,000	15,000
Contract Labor	6,000	8,000	14,000
Subtotal	53,000	2,199,300	2,252,300

Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

<b>EXPENDITURES</b>	<b>Administrative Office</b>	<b>Facilities</b>	<b>Total Enterprise Fund</b>
<b>General Administration</b>			
Office Rental	75,000	75,000	150,000
Office Maintenance	6,500	2,000	8,500
Advertising	3,500	6,000	9,500
Software	2,500	25,000	27,500
Office Supplies	5,000	25,000	30,000
Postage/Shipping	1,000	8,000	9,000
Books, Dues, Subs & Memberships	4,500	15,000	19,500
Training	4,000	4,000	8,000
Professional Development/Cont. Education	4,500	14,000	18,500
Mileage/Travel Reimbursement	10,000	20,000	30,000
Public Outreach/Education Programs/Website	40,000	40,000	80,000
Misc. Fees [permits, registrations, licenses, certifications, bank charges]	500	35,000	35,500
Subtotal	157,000	269,000	426,000
<b>Total - Operations &amp; Maintenance</b>	<b>685,300</b>	<b>17,724,600</b>	<b>18,409,900</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

EXPENDITURES	Administrative Office	Facilities	Total Enterprise Fund
<b>NON-OPERATION &amp; MAINTENANCE</b>			
<b>Annual Debt Service</b>			
2010A Bond Series		591,300	591,300
2010B Bond Series		1,892,100	1,892,100
2014 Bond Series		4,536,300	4,536,300
2015 Bond Series		2,529,500	2,529,500
Subtotal		9,549,200	9,549,200
<b>County Payments</b>			
Capital Component Charge		1,971,557	1,971,557
DeSoto Payment		796,000	796,000
North Port Payment to Charlotte		4,781	4,781
Subtotal		2,772,338	2,772,338
<b>Other Rate Related Expenditures</b>			
Contribution to R&R Reserve		2,000,000	2,000,000
Transfer to CIP		1,000,000	1,000,000
Contingencies	20,000	500,000	520,000
Water Purchase		20,000	20,000
Debt Service Coverage Fund		1,345,635	1,345,635
Subtotal	20,000	4,865,635	4,885,635
<b>Total Rate Related Expenditures</b>	<b>705,300</b>	<b>34,911,773</b>	<b>35,617,073</b>

Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

<b>EXPENDITURES</b>	<b>Administrative Office</b>	<b>Facilities</b>	<b>Total Enterprise Fund</b>
<b><u>NON-RATE RELATED EXPENDITURES</u></b>			
<b>Projects</b>			
CIP Projects		9,530,000	9,530,000
Renewal & Replacement Projects		2,819,000	2,819,000
Resource/Supply Development Projects		100,000	100,000
Subtotal		12,449,000	12,449,000
<b>Fund Disbursements</b>			
Charlotte County		268,771	268,771
DeSoto County		33,766	33,766
Sarasota County		889,308	889,308
North Port		153,446	153,446
Subtotal		1,345,291	1,345,291
<b>Total Non-Rate Related Expenditures</b>		<b>13,794,291</b>	<b>13,794,291</b>
<b>Total Expenditures</b>	<b>705,300</b>	<b>48,706,064</b>	<b>49,411,364</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

**DEBT SERVICE**

Bond Series	Cost Allocation	Percent Allocation
<b>2010A Bond Series</b>		
REP Facility	\$591,300	
<b>2010B Bond Series</b>		
RTS - Phase 2 Pipeline	\$675,669	35.71%
RTS - Phase 3A Pipeline	\$1,216,431	64.29%
Subtotal	\$1,892,100	100.00%
Total	\$2,483,400	
<b>2014A Bond Series</b>		
REP Facility (includes 20-Inch RTS)	\$1,514,061	86.99%
REP Oversized Payment	\$60,569	3.48%
Bank of America Loan	\$165,870	9.53%
Subtotal	\$1,740,500	100.00%
<b>2014B Bond Series</b>		
REP Facility (includes 20-Inch RTS)	\$2,432,066	86.99%
REP Oversized Payment	\$97,294	3.48%
Bank of America Loan	\$266,440	9.53%
Subtotal	\$2,795,800	100.00%
Total	\$4,536,300	
<b>2015 Bond Series</b>		
PRO Facility	\$1,802,931	71.28%
PRO Oversized Payment	\$154,649	6.11%
42-inch RTS Pipeline	\$559,778	22.13%
24-inch RTS Pipeline	\$12,142	0.48%
Total	\$2,529,500	100.00%
<b>Total Debt Service</b>	<b>\$9,549,200</b>	

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

**2010A BOND SERIES  
Customer Allocation**

<b>Customer Debt Service Percentages</b>		
<b>Customer</b>	<b>2010A Bond Series REP Facility</b>	
Charlotte County	0.00%	
DeSoto County	1.11%	
Sarasota County	84.79%	
City of North Port	14.10%	
<b>Total</b>	<b>100.00%</b>	
<b>Customer Debt Service Cost</b>		
<b>Customer</b>	<b>Debt Service Cost</b>	<b>2010A Bond Series REP Facility</b>
Charlotte County	\$0	\$0
DeSoto County	\$6,563	\$6,563
Sarasota County	\$501,363	\$501,363
City of North Port	\$83,373	\$83,373
<b>Total</b>	<b>\$591,300</b>	<b>\$591,300</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

2010B BOND SERIES  
Customer Allocation

Customer Debt Service Percentages			
Customer	2010B Bond Series RTS Phase 2 Pipeline	2010B Bond Series RTS Phase 3A Pipeline	
Charlotte County	0.00%	0.00%	
DeSoto County	0.00%	0.00%	
Sarasota County	0.00%	100.00%	
City of North Port	100.00%	0.00%	
Total	100.00%	100.00%	
Customer Debt Service Cost			
Customer	Debt Service Cost	2010B Bond Series RTS Phase 2 Pipeline	2010B Bond Series RTS Phase 3A Pipeline
Charlotte County	\$0	\$0	\$0
DeSoto County	\$0	\$0	\$0
Sarasota County	\$1,216,431	\$0	\$1,216,431
City of North Port	\$675,669	\$675,669	\$0
Total	\$1,892,100	\$675,669	\$1,216,431
Federal Direct Payment [2010B Bond Series]			
Customer	Federal Subsidy	2010B Bond Series RILS Phase 2	2010B Bond Series RILS Phase 3A
Charlotte County	\$0	\$0	\$0
DeSoto County	\$0	\$0	\$0
Sarasota County	(\$371,789)	\$0	(\$371,789)
City of North Port	(\$206,511)	(\$206,511)	\$0
Total	(\$578,300)	(\$206,511)	(\$371,789)

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

2014 BOND SERIES  
Customer Allocation

<b>Customer Debt Service Percentages</b>				
Customer	REP Facility	REP Oversized Payment	Bank of America Loan	
Charlotte County	27.21%	0.00%	27.21%	
DeSoto County	0.81%	1.10%	0.81%	
Sarasota County	61.72%	85.62%	61.72%	
City of North Port	10.26%	13.28%	10.26%	
Total	100.00%	100.00%	100.00%	
<b>Customer Debt Service Cost</b>				
Customer	Debt Service Cost	REP Facility	REP Oversized Payment	Bank of America Loan
Charlotte County	\$1,191,373	\$1,073,741	\$0	\$117,631
DeSoto County	\$37,202	\$31,964	\$1,736	\$3,502
Sarasota County	\$2,837,534	\$2,435,550	\$135,163	\$266,821
City of North Port	\$470,192	\$404,873	\$20,964	\$44,355
Total	\$4,536,300	\$3,946,127	\$157,863	\$432,309



Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

2015 BOND SERIES  
 Customer Allocation

<b>Customer Debt Service Percentages</b>					
Customer	PRO Facility	PRO Oversized Payment	42-inch RTS Pipeline	24-inch RTS Pipeline	
Charlotte County	33.33%	0.00%	0.00%	0.00%	
DeSoto County	8.33%	12.50%	0.00%	100.00%	
Sarasota County	58.34%	87.50%	100.00%	0.00%	
City of North Port	0.00%	0.00%	0.00%	0.00%	
<b>Total</b>	<b>100.00%</b>	<b>100.00%</b>	<b>100.00%</b>	<b>100.00%</b>	
<b>Customer Debt Service Cost</b>					
Customer	Debt Service Cost	PRO Facility	PRO Oversized Payment	42-inch RTS Pipeline	24-inch RTS Pipeline
Charlotte County	\$600,917	\$600,917	\$0	\$0	\$0
DeSoto County	\$181,657	\$150,184	\$19,331	\$0	\$12,142
Sarasota County	\$1,746,926	\$1,051,830	\$135,318	\$559,778	\$0
City of North Port	\$0	\$0	\$0	\$0	\$0
<b>Total</b>	<b>\$2,529,500</b>	<b>\$1,802,931</b>	<b>\$154,649</b>	<b>\$559,778</b>	<b>\$12,142</b>

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

**CAPITAL COMPONENT CHARGE  
Customer Allocation**

<b>Capital Component Charge</b>			
	<b>Capital Component Charge</b>	<b>Percent Allocation</b>	
<b>Debt to Charlotte County</b>			
1991 Facility	\$1,664,191	84.41%	
36-inch RTS	\$307,366	15.59%	
<b>Total</b>	<b>\$1,971,557</b>	<b>100.00%</b>	
<b>Cost Allocation Percentages</b>			
		<b>1991 Facility</b>	<b>36-inch RTS Pipeline</b>
Charlotte County		89.65%	89.65%
DeSoto County		0.42%	0.42%
Sarasota County		0.00%	0.00%
City of North Port		9.93%	9.93%
<b>Total</b>		<b>100.00%</b>	<b>100.00%</b>
<b>Capital Component Charge Cost</b>			
	<b>Capital Component Chare</b>	<b>1991 Facility</b>	<b>36-inch RTS Pipeline</b>
Charlotte County	\$1,767,501	\$1,491,947	\$275,553
DeSoto County	\$8,281	\$6,990	\$1,291
Sarasota County	\$0	\$0	\$0
City of North Port	\$195,776	\$165,254	\$30,521
<b>Total</b>	<b>\$1,971,557</b>	<b>\$1,664,191</b>	<b>\$307,366</b>

Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

RENEWAL AND REPLACEMENT RESERVE ACCOUNT EXPENDITURES

ITEM NO.	RENEWAL & REPLACEMENT PROJECTS	FY 2018
1	Treatment Processes	706,000
2	Reservoirs & Raw Water Pumping	317,000
3	ASR Wells & Monitoring Systems	98,000
4	Roads & Grounds	360,000
5	General Buildings	448,000
6	Transmission Systems and Remote Sites	515,000
7	SCADA, IT & Communications	75,000
8	Security	300,000
	<b>TOTAL R &amp; R PROJECTS</b>	<b>2,819,000</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

CAPITAL IMPROVEMENT PROGRAM  
Funded CIP Projects

Item	CIP Project	Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
1	Regional Integrated Loop - Phase 1 [U.S. 17/Shell Creek]	1,100,000	4,900,000	5,700,000	300,000				12,000,000
2	Regional Integrated Loop - Phase 3B [S.R. 681 to Clark Road]	1,200,000	3,500,000	8,800,000	11,100,000	2,368,000			26,968,000
3	Raw Water ASR - [Pilot testing, Permitting, Implementation]	225,000	230,000	750,000	6,550,000				7,755,000
4	Facilities Improvements - [Maintenance Warehouse]	400,000	900,000	200,000					1,500,000
5	Regional Integrated Loop - Phase 3D [Fruitville Road to Manatee]			4,915,000					4,915,000
6	Regional Integrated Loop - Phase 4 [Burnt Store Interconnect]				4,925,000				4,925,000
7	Peace River Facility Phase 2 Capacity Increase [4 MGD]					3,000,000	7,000,000	3,800,000	13,800,000
<b>Total CIP Project Costs</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>

Item	CIP Project Funding Sources	Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
1	Regional Integrated Loop - Phase 1 [U.S. 17/Shell Creek]								
	State Grant Funds	600,000	3,400,000						4,000,000
	SWFWMD Grant Fund		750,000	4,950,000	300,000				6,000,000
	Punta Gorda Payment	500,000	750,000	750,000					2,000,000
2	Regional Integrated Loop - Phase 3B [S.R. 681 to Clark Road]								
	State Grant Funds	90,000	360,000	50,000					500,000
	SWFWMD Grant Fund	555,000	360,000	4,375,000	5,550,000	1,184,000			12,024,000
	CIP Funds [Sarasota County]	555,000	2,780,000	4,375,000	5,550,000	1,184,000			14,444,000
3	Raw Water ASR								
	SWFWMD Grant Fund		115,000	375,000	3,275,000				3,765,000
	CIP Funds	225,000	115,000	375,000	3,275,000				3,990,000
4	Facilities Improvements - [Maintenance Warehouse]								
	CIP Funds	400,000	900,000	200,000					1,500,000
5	Regional Integrated Loop - Phase 3D [Fruitville Road to Manatee]								
	SWFWMD Grant Fund			2,457,500					2,457,500
	CIP Funds [Sarasota County]			2,457,500					2,457,500
6	Regional Integrated Loop - Phase 4 [Burnt Store Interconnect]								
	SWFWMD Grant Fund				2,462,500				2,462,500
	CIP Funds [Charlotte County]				2,462,500				2,462,500
7	Peace River Facility Phase 2 Capacity Increase [4 MGD]								
	SWFWMD Grant Fund					1,500,000	3,500,000	1,900,000	6,900,000
	CIP Funds					1,500,000	3,500,000	1,900,000	6,900,000
<b>Total CIP Project Funding Sources</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>

CIP Funding Revenue by Source		Prior Years	FY 2018	FY 2019	FY 2020	FY 2021	FY 2022	Future	Total
	CIP Fund	1,180,000	3,795,000	7,407,500	11,287,500	2,684,000	3,500,000	1,900,000	31,754,000
	State Grant Funds	690,000	3,760,000	50,000					4,500,000
	SWFWMD Grant Fund	555,000	1,225,000	12,157,500	11,587,500	2,684,000	3,500,000	1,900,000	33,609,000
	Punta Gorda Payment	500,000	750,000	750,000					2,000,000
<b>Total CIP Funding Revenue by Source</b>		<b>2,925,000</b>	<b>9,530,000</b>	<b>20,365,000</b>	<b>22,875,000</b>	<b>5,368,000</b>	<b>7,000,000</b>	<b>3,800,000</b>	<b>71,863,000</b>

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

**PLANNING PROJECTS**

ITEM NO.	Planning Projects	FY 2018 Expenditure	Funds Brought Forward	Other Funding	FY 2018 Assessment
1	Water Advocacy/One Water Initiative	40,000	20,000		20,000
2	Strategic Plan Implementation	50,000	20,000		30,000
3	Peace River Basin Issues	10,000			10,000
	<b>TOTAL R/S DEVELOPMENT PROJECTS</b>	<b>100,000</b>	<b>40,000</b>		<b>60,000</b>

Peace River Manasota Regional Water Supply Authority  
 FY 2018 Budget

FINAL BUDGET  
 PUBLIC HEARING  
 AUGUST 2, 2017

**WATER RATE [Authority Customers]**  
 10/01/2017 to 09/30/2018

<b>Total Monthly Water Charge to Customers</b> [Charge per Month]	<b>Monthly Charge = Base Rate Charge + (Water Use Charge x Actual Water Delivered)</b>
--	--

<b>Base Rate Charge</b> [Annual costs to be allocated]	Totals
<b>Non-Capital Cost Component</b>	
Fixed O & M Cost Component	9,386,300
Contribution to R & R Reserve	2,000,000
Transfer to CIP	1,000,000
Contingencies	500,000
Projected Interest Earned	(40,000)
Funds Brought Forward	(2,100,000)
<b>Sub-Total Non-Capital Cost Component</b>	<b>10,746,300</b>
Water Purchase	20,000
<b>Total Non-Capital Cost Component</b>	<b>\$10,766,300</b>
<b>Debt Service Cost</b>	
2010A Bonds	591,300
2010B Bonds	1,892,100
2014 Bonds	4,536,300
2015 Bonds	2,529,500
<b>Total Debt Service</b>	<b>\$9,549,200</b>
<b>Debt Service Coverage Payments</b>	<b>\$1,345,635</b>
<b>Debt Service Contributions</b>	
Federal Direct Payment [2010B Bonds]	(\$578,300)
<b>County Payments</b>	
Capital Component Charge	1,971,557
DeSoto Payment	796,000
North Port Payment to Charlotte	4,781
<b>Total County Payments</b>	<b>\$2,772,338</b>
<b>Total Base Rate Charge</b>	<b>\$23,855,173</b>

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

<b>Annual Base Rate Charge By Customer</b>											
	Total	Non-Capital Cost Component	2010A Bonds	2010B Bonds	2014 Bonds	2015 Bonds	Debt Service Coverage Payment	Federal Subsidy 2010B Bonds	Capital Component Charge	DeSoto Payment	North Port Payment to Charlotte
Charlotte County	9,193,215	4,995,315	0	0	1,191,373	600,917	268,843	0	1,767,501	369,266	0
DeSoto County	492,429	209,431	6,563	0	37,202	181,657	33,813	0	8,281	15,482	0
Sarasota County	11,838,212	4,672,636	501,363	1,216,431	2,837,534	1,746,926	889,570	(371,789)	0	345,541	0
City of North Port	2,331,317	888,918	83,373	675,669	470,192	0	153,408	(206,511)	195,776	65,711	4,781
<b>Total</b>	<b>\$23,855,173</b>	<b>\$10,766,300</b>	<b>\$591,300</b>	<b>\$1,892,100</b>	<b>\$4,536,300</b>	<b>\$2,529,500</b>	<b>\$1,345,635</b>	<b>(\$578,300)</b>	<b>\$1,971,557</b>	<b>\$796,000</b>	<b>\$4,781</b>

<b>Monthly Base Rate Charge By Customer</b>	
Charlotte County	766,101
DeSoto County	41,036
Sarasota County	986,518
City of North Port	194,276
<b>Total</b>	<b>\$1,987,931</b>

<b>Master Water Supply Contract Water Allocation</b>	
Million Gallons Per Day [MGD]	Annual Average Daily [MGD]
Charlotte County	16.100
DeSoto County	0.675
Sarasota County	15.060
City of North Port	2.865
<b>Total</b>	<b>34.700</b>

<b>Water Use Charge</b>	
[Charge per 1,000 gallons]	Total
Water Use Rate Charge	\$0.74

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

**REDISTRIBUTION POOL  
10/01/2017 to 09/30/2018**

<b>Redistribution Pool Water Quantities</b>							
	(1) Water Allocation [MGD]	(2) New Water Supply [MGD]	Total Contracted Allocation [MGD]	(3) Available for Pool [MGD]	Requested from Pool [MGD]	(4) Budget Allocation [MGD]	
Charlotte County	16.100	0.000	16.100	2.500	0.000	16.100	
DeSoto County	0.675	0.000	0.675	0.000	0.000	0.675	
Sarasota County	15.060	0.000	15.060	4.900	0.000	15.060	
City of North Port	2.865	0.000	2.865	0.500	0.000	2.865	
<b>Total</b>	<b>34.700</b>	<b>0.000</b>	<b>34.700</b>	<b>7.900</b>	<b>0.000</b>	<b>34.700</b>	

<b>Redistribution Pool Water Base Rate Charge Adjustment</b>			
	Annual Cost [\$ /Year]	Annual Unit Cost [\$ /MGD]	
Peace River Facility REP Debt Service	5,127,600	348,816	
Non-Capital Component	10,766,300	310,268	
DeSoto Payment	796,000	22,939	
<b>Redistribution Pool Water Base Rate</b>		<b>\$682,024</b>	

- (1) Peace River/Manasota Regional Water Supply Authority Master Water Supply Contract - Exhibit B 'Water Allocations' (Peace River Facility water allocations).
- (2) Peace River/Manasota Regional Water Supply Authority Master Water Supply Contract - Exhibit C 'New Water Supply Demands'.
- (3) Pool water based on Customer submittals (January 2017).
- (4) Total annual average water allocated for FY 2018 budget.

<b>Redistribution Pool Base Rate Charge Adjustment by Customer</b>				
	Annual Base Rate Adjustment		Monthly Base Rate Adjustment	
	To Pool	From Pool	To Pool	From Pool
Charlotte County	0	0	0	0
DeSoto County	0	0	0	0
Sarasota County	0	0	0	0
City of North Port	0	0	0	0
<b>Total</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>



**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

**INTERCONNECT WATER CHARGE [GOVERNMENT RATE]**

10/01/2017 to 09/30/2018

<b>Water Charge to Municipalities Interconnected to Regional Transmission System</b>		
<b>[Charge per 1,000 Gallons]</b>		
<b>Water Rate</b>		
<b>[Charge per 1,000 Gallons]</b>		
	\$3.30	Water Rate Charge in \$/1,000 gallons metered water delivery for cumulative delivery to all interconnects up to quantity identified as 'Available from Pool' in the Redistribution Pool for the current fiscal year.
	\$6.60	Water Rate Charge in \$/1,000 gallons metered water delivery for cumulative delivery to all interconnects in excess of the quantity identified as 'Available from Pool' in the Redistribution Pool for the current fiscal year.

Revenue received from these water sales will, at the discretion of the Authority Board, be applied as a credit toward the obligations of the Authority Customers apportioned to each of their allocations to the 'Available from Pool' in the Redistribution Pool for the current fiscal year. Water rate for emergency use unless Interlocal Agreement provides alternative water rate.

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017

**CUSTOMER PLANNING ASSESSMENT**  
10/01/2017 to 09/30/2018

<b>Planning Assessments</b>					
[Annual costs to be allocated]					
		Distribution (1)			
		Water Advocacy/One Water Initiative	Strategic Plan Implementation	Peace River Basin Issues	
Total					
Charlotte County	10,586	3,529	5,293	1,764	
DeSoto County	2,045	682	1,022	341	
Manatee County	22,367	7,456	11,183	3,728	
Sarasota County	24,330	8,334	12,501	3,495	
City of North Port	672	0	0	672	
<b>Total</b>	<b>\$60,000</b>	<b>\$20,000</b>	<b>\$30,000</b>	<b>\$10,000</b>	

(1) Reserve Fund Assessments will be invoiced on October 1, 2016.

<b>Water Allocation</b>			
[Million Gallons Per Year]			
		Water Allocation [MGD]	Water Allocation [Percentage]
Charlotte County		16.100	46.4%
DeSoto County		0.675	1.9%
Manatee County		0.000	0.0%
Sarasota County		15.060	43.4%
City of North Port		2.865	8.3%
<b>Total</b>		<b>34.700</b>	<b>100.0%</b>

<b>Population</b>			
		Population	Population [Percentage]
Charlotte County		169,152	17.64%
DeSoto County		32,676	3.41%
Manatee County		357,404	37.28%
Sarasota County		335,060	34.95%
City of North Port		64,472	6.72%
<b>Total</b>		<b>958,764</b>	<b>100.00%</b>

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**FINAL BUDGET  
PUBLIC HEARING  
AUGUST 2, 2017**

**MEMBER FEE**

10/01/2017 to 09/30/2018

<b>Contribution Amount to be Derived</b>			
	<b>Totals</b>		
Administrative Office Authority Support	\$705,300		
Projected Interest Earned	\$0		
Estimated Brought Forward - Undesignated	(\$350,000)		
<b>Amount to be Derived</b>	<b>\$355,300</b>		
<b>Population Basis</b>			
	<b>*Population 4/1/2016</b>	<b>% of Total Population</b>	
Charlotte County	169,152	17.64%	
DeSoto County	32,676	3.41%	
Manatee County	357,404	37.28%	
Sarasota County	399,532	41.67%	
<b>Total</b>	<b>958,764</b>	<b>100.00%</b>	
<b>Weighted Contribution</b>			
	<b>Base Contribution</b>	<b>Pro Rated Share</b>	
Charlotte County	\$44,413	\$31,342	\$75,755
DeSoto County	\$44,413	\$6,055	\$50,467
Manatee County	\$44,413	\$66,224	\$110,636
Sarasota County	\$44,413	\$74,030	\$118,442
<b>Total Weighted Contribution</b>			<b>\$355,300</b>

**Member Contribution Formula:**

*Base Contribution = 1/2 amount to be derived divided by 4*

*Pro rated share = 1/2 amount to be derived times % of Population*

\* Source: 'Estimates o Population by County and City in Florida [Bureau of Economic and Business Research; University of Florida, April 1, 2016]

***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**BUDGET FOR FY 2018  
ITEM 2**

Resolution 2017-04  
'Resolution Setting Forth Rates, Fees and Charges for FY 2018'

---

**Presenter -** Patrick Lehman, Executive Director

**Recommended Action -** **Motion** to approve Resolution 2017-04 'Resolution Setting Forth Rates, Fees and Charges for FY 2018'.

Resolution 2017-04 formalizes the Board adoption of the Budget for FY 2018 and establishes the rates, fees and charges by the Authority for FY 2018 in accordance with the 'Second Amended Interlocal Agreement Creating the Peace River Manasota Regional Water Supply Authority' and the 'Master Water Supply Contract'.

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**Resolution 2017-04**

**RESOLUTION SETTING FORTH  
RATES, FEES, AND CHARGES FOR FY 2018**

The Peace River Manasota Regional Water Supply Authority, created pursuant to Chapter 373.1962, Florida Statutes, now found in Section 373.713, Florida Statutes, and Interlocal agreement pursuant to Chapter 163.01, Florida Statutes, in lawful session and in regular order of business properly presented, finds that:

**WHEREAS**, the Second Amended Interlocal Agreement Creating the Peace River Manasota Regional Water Supply Authority entered into on October 5, 2005 provides that:

*'The Authority shall establish a tentative budget no later than May 15, for the ensuing Contract Year. The tentative budget shall include all anticipated expenditures of the Authority for its projects and activities for the ensuing Contract Year, including Operating and Maintenance Cost, Management and Planning Costs, and Debt Service Cost. As part of the budget process, the Authority shall adopt rates, fees, and charges to generate sufficient revenue to pay all budgeted expenditures on a water user basis for Authority Water Supply Facilities. Membership fees and rates shall be established annually and adopted by resolution at the time of budget adoption.'* and

**WHEREAS**, the Authority has entered into the Peace River Manasota Regional Water Supply Authority Master Water Supply Contract with Charlotte County, DeSoto County, Manatee County, Sarasota County, and with the City of North Port on October 5, 2005 (as amended August 5, 2015) for the purpose of supplying water produced by the Authority from the Peace River Facility and new water supply sources; and

**WHEREAS**, the Master Water Supply Contract supersedes and replaces all prior supply contracts and provides new terms and conditions for the sale of water produced by the Authority; and

**WHEREAS**, the Master Water Supply Contract provides that:

*"In conjunction with the Authority's annual budget development and adoption process, the Authority shall fix a Water Rate consisting of the Base Rate Charge (adjusted as necessary for customer financing), DeSoto Payment, and Water Use Charge to be paid on a monthly basis by the Customers for water furnished by the Authority. The rates are not subject to the supervision or regulation by any other commission, board, bureau, agency or other political subdivision or agency of the county or state."*; and

**WHEREAS**, the Authority Board of Directors adopted the Tentative Budget for FY 2018 at their regularly scheduled meeting on April 12, 2017; and

**WHEREAS**, the Authority Board of Directors conducted a public hearing on the Budget for FY 2018 on August 2, 2017 setting forth the schedules of rates, fees and charges in compliance with Section 153.11(3) Florida Statutes; and

**WHEREAS**, the Authority Board of Directors adopted the Budget for FY 2018 at their regularly scheduled meeting on August 2, 2017.

**NOW, THEREFORE, BE IT RESOLVED:**

Section 1. The Peace River Manasota Regional Water Supply Authority does hereby set forth preliminary schedules establishing rates, fees, and charges for the period beginning October 1, 2017 through September 30, 2018 attached hereto as Exhibit A.

Section 2. Conservation Charge for Exceedance - In the event a customer should receive delivery of water in excess of their respective water allocation (as adjusted by New Water Supply Demand and/or Redistribution Pool) provided in the Master Water Supply Contract for the period beginning October 1, 2017 through September 30, 2018, the exceeding customer shall pay an additional charge, Conservation Charge for Exceedance, derived as follows unless the exceedance is the result of an emergency transfer as determined by the Authority Board, in which case no additional charge shall be placed upon the excess water usage occasioned by the emergency.

Conservation Charge for Exceedance = [Conservation Base Rate Charge] + [Conservation Water Use Rate Charge]

Conservation Base Rate Charge = 2.0 x [Exceeding customer's base rate charge] x [the percent of water delivered in excess of their water allocation]

Conservation Water Use Rate Charge = 2.0 x [Water Use Rate charge per 1,000 gallons] x [times actual water delivered in excess of exceeding customer's water allocation]

The additional revenue received from such exceedance will, at the discretion of the Authority Board, be applied as a credit toward the obligations of the other Customers apportioned according to each of their annual water allocations. Delivery of water shall be as recorded by the Authority's meters at the points of connection between the Authority transmission system and the distribution system of the customer.

**DONE** at Sarasota, Florida, this Second day of August 2017.

Attest:

**Peace River Manasota**  
Regional Water Supply Authority

\_\_\_\_\_  
Patrick J. Lehman  
Executive Director

\_\_\_\_\_  
Commissioner Alan Maio  
Chairman

Approved as to Form:

\_\_\_\_\_  
Douglas Manson  
General Counsel for Peace River Manasota  
Regional Water Supply Authority

Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget

**WATER RATE [Authority Customers]**  
10/01/2017 to 09/30/2018

<b>Total Monthly Water Charge to Customers</b> [Charge per Month]	<b>Monthly Charge = Base Rate Charge + (Water Use Charge x Actual Water Delivered)</b>
--	--

Base Rate Charge [Annual costs to be allocated]	Totals	
<b>Non-Capital Cost Component</b>		
Fixed O & M Cost Component	9,386,300	
Contribution to R & R Reserve	2,000,000	
Transfer to CIP	1,000,000	
Contingencies	500,000	
Projected Interest Earned	(40,000)	
Funds Brought Forward	(2,100,000)	
<b>Sub-Total Non-Capital Cost Component</b>	<b>10,746,300</b>	
Water Purchase	20,000	
<b>Total Non-Capital Cost Component</b>	<b>\$10,766,300</b>	
<b>Debt Service Cost</b>		
2010A Bonds	591,300	
2010B Bonds	1,892,100	
2014 Bonds	4,536,300	
2015 Bonds	2,529,500	
<b>Total Debt Service</b>	<b>\$9,549,200</b>	
<b>Debt Service Coverage Payments</b>	<b>\$1,345,635</b>	
<b>Debt Service Contributions</b>		
Federal Direct Payment [2010B Bonds]	(\$578,300)	
<b>County Payments</b>		
Capital Component Charge	1,971,557	
DeSoto Payment	796,000	
North Port Payment to Charlotte	4,781	
<b>Total County Payments</b>	<b>\$2,772,338</b>	
<b>Total Base Rate Charge</b>	<b>\$23,855,173</b>	

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

<b>Annual Base Rate Charge By Customer</b>											
	Total	Non-Capital Cost Component	2010A Bonds	2010B Bonds	2014 Bonds	2015 Bonds	Debt Service Coverage Payment	Federal Subsidy 2010B Bonds	Capital Component Charge	DeSoto Payment	North Port Payment to Charlotte
Charlotte County	9,193,215	4,995,315	0	0	1,191,373	600,917	268,843	0	1,767,501	369,266	0
DeSoto County	492,429	209,431	6,563	0	37,202	181,657	33,813	0	8,281	15,482	0
Sarasota County	11,838,212	4,672,636	501,363	1,216,431	2,837,534	1,746,926	889,570	(371,789)	0	345,541	0
City of North Port	2,331,317	888,918	83,373	675,669	470,192	0	153,408	(206,511)	195,776	65,711	4,781
<b>Total</b>	<b>\$23,855,173</b>	<b>\$10,766,300</b>	<b>\$591,300</b>	<b>\$1,892,100</b>	<b>\$4,536,300</b>	<b>\$2,529,500</b>	<b>\$1,345,635</b>	<b>(\$578,300)</b>	<b>\$1,971,557</b>	<b>\$796,000</b>	<b>\$4,781</b>

<b>Monthly Base Rate Charge By Customer</b>	
Charlotte County	766,101
DeSoto County	41,036
Sarasota County	986,518
City of North Port	194,276
<b>Total</b>	<b>\$1,987,931</b>

<b>Master Water Supply Contract Water Allocation</b>	
Million Gallons Per Day [MGD]	Annual Average Daily [MGD]
Charlotte County	16.100
DeSoto County	0.675
Sarasota County	15.060
City of North Port	2.865
<b>Total</b>	<b>34.700</b>

<b>Water Use Charge</b>	
[Charge per 1,000 gallons]	Total
Water Use Rate Charge	\$0.74



**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**REDISTRIBUTION POOL**

10/01/2017 to 09/30/2018

<b>Redistribution Pool Water Quantities</b>						
	(1) Water Allocation [MGD]	(2) New Water Supply [MGD]	Total Contracted Allocation [MGD]	(3) Available for Pool [MGD]	Requested from Pool [MGD]	(4) Budget Allocation [MGD]
Charlotte County	16.100	0.000	16.100	2.500	0.000	16.100
DeSoto County	0.675	0.000	0.675	0.000	0.000	0.675
Sarasota County	15.060	0.000	15.060	4.900	0.000	15.060
City of North Port	2.865	0.000	2.865	0.500	0.000	2.865
<b>Total</b>	<b>34.700</b>	<b>0.000</b>	<b>34.700</b>	<b>7.900</b>	<b>0.000</b>	<b>34.700</b>

<b>Redistribution Pool Water Base Rate Charge Adjustment</b>		
	Annual Cost [\$ /Year]	Annual Unit Cost [\$ /MGD]
Peace River Facility REP Debt Service	5,127,600	348,816
Non-Capital Component	10,766,300	310,268
DeSoto Payment	796,000	22,939
<b>Redistribution Pool Water Base Rate</b>		<b>\$682,024</b>

- (1) Peace River/Manasota Regional Water Supply Authority Master Water Supply Contract - Exhibit B 'Water Allocations' (Peace River Facility water allocations).
- (2) Peace River/Manasota Regional Water Supply Authority Master Water Supply Contract - Exhibit C 'New Water Supply Demands'.
- (3) Pool water based on Customer submittals (January 2017).
- (4) Total annual average water allocated for FY 2018 budget.

<b>Redistribution Pool Base Rate Charge Adjustment by Customer</b>				
	Annual Base Rate Adjustment		Monthly Base Rate Adjustment	
	To Pool	From Pool	To Pool	From Pool
Charlotte County	0	0	0	0
DeSoto County	0	0	0	0
Sarasota County	0	0	0	0
City of North Port	0	0	0	0
<b>Total</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>	<b>\$0</b>

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**INTERCONNECT WATER CHARGE [GOVERNMENT RATE]**

10/01/2017 to 09/30/2018

<b>Water Charge to Municipalities Interconnected to Regional Transmission System</b>		
<b>[Charge per 1,000 Gallons]</b>		
<b>Water Rate</b>		
<b>[Charge per 1,000 Gallons]</b>		
	\$3.30	Water Rate Charge in \$/1,000 gallons metered water delivery for cumulative delivery to all interconnects up to quantity identified as 'Available from Pool' in the Redistribution Pool for the current fiscal year.
	\$6.60	Water Rate Charge in \$/1,000 gallons metered water delivery for cumulative delivery to all interconnects in excess of the quantity identified as 'Available from Pool' in the Redistribution Pool for the current fiscal year.

Revenue received from these water sales will, at the discretion of the Authority Board, be applied as a credit toward the obligations of the Authority Customers apportioned to each of their allocations to the 'Available from Pool' in the Redistribution Pool for the current fiscal year. Water rate for emergency use unless Interlocal Agreement provides alternative water rate.

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**CUSTOMER PLANNING ASSESSMENT**

10/01/2017 to 09/30/2018

<b>Planning Assessments</b>						
[Annual costs to be allocated]						
		Distribution (1)				
		Total	Water Advocacy/One Water Initiative	Strategic Plan Implementation	Peace River Basin Issues	
	Charlotte County	10,586	3,529	5,293	1,764	
	DeSoto County	2,045	682	1,022	341	
	Manatee County	22,367	7,456	11,183	3,728	
	Sarasota County	24,330	8,334	12,501	3,495	
	City of North Port	672	0	0	672	
	<b>Total</b>	<b>\$60,000</b>	<b>\$20,000</b>	<b>\$30,000</b>	<b>\$10,000</b>	

(1) Reserve Fund Assessments will be invoiced on October 1, 2016.

<b>Water Allocation</b>			
[Million Gallons Per Year]			
		Water Allocation [MGD]	Water Allocation [Percentage]
	Charlotte County	16.100	46.4%
	DeSoto County	0.675	1.9%
	Manatee County	0.000	0.0%
	Sarasota County	15.060	43.4%
	City of North Port	2.865	8.3%
	<b>Total</b>	<b>34.700</b>	<b>100.0%</b>

<b>Population</b>			
		Population	Population [Percentage]
	Charlotte County	169,152	17.64%
	DeSoto County	32,676	3.41%
	Manatee County	357,404	37.28%
	Sarasota County	335,060	34.95%
	City of North Port	64,472	6.72%
	<b>Total</b>	<b>958,764</b>	<b>100.00%</b>

**Peace River Manasota Regional Water Supply Authority  
FY 2018 Budget**

**MEMBER FEE**

10/01/2017 to 09/30/2018

<b>Contribution Amount to be Derived</b>			
		Totals	
Administrative Office Authority Support		\$705,300	
Projected Interest Earned		\$0	
Estimated Brought Forward - Undesignated		(\$350,000)	
<b>Amount to be Derived</b>		<b>\$355,300</b>	
<b>Population Basis</b>			
		*Population 4/1/2016	% of Total Population
Charlotte County		169,152	17.64%
DeSoto County		32,676	3.41%
Manatee County		357,404	37.28%
Sarasota County		399,532	41.67%
<b>Total</b>		<b>958,764</b>	<b>100.00%</b>
<b>Weighted Contribution</b>			
		Base Contribution	Pro Rated Share
Charlotte County		\$44,413	\$31,342
DeSoto County		\$44,413	\$6,055
Manatee County		\$44,413	\$66,224
Sarasota County		\$44,413	\$74,030
<b>Total Weighted Contribution</b>			<b>\$355,300</b>

Member Contribution Formula:

*Base Contribution = 1/2 amount to be derived divided by 4*

*Pro rated share = 1/2 amount to be derived times % of Population*

\* Source: 'Estimates of Population by County and City in Florida [Bureau of Economic and Business Research; University of Florida, April 1, 2016]

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017**

**CONSENT AGENDA  
ITEM 1**

**Minutes of June 7, 2017 Board of Directors Meeting**

---

**Recommended Action -**

**Motion** to approve minutes of June 7, 2017 Board of Directors meeting.

Draft minutes of the June 7, 2017 Board of Directors meeting are provided for Board approval.

**Attachments:**

Draft Minutes of June 7, 2017 Board of Directors Meeting

Minutes of Board of Directors Meeting  
**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
Charlotte County Administration Center  
Commission Chambers, Room 119  
18500 Murdock Circle, Port Charlotte, Florida

June 7, 2017

***Board Members Present:***

Commissioner Elton A. Langford, DeSoto County, Vice Chairman  
Commissioner Betsy Benac, Manatee County  
Commissioner Christopher G. Constance, Charlotte County  
Assistant County Administrator Jonathan Lewis, Sarasota County [Alternate]

***Staff Present:***

Patrick Lehman, Executive Director  
Doug Manson, General Counsel  
Mike Coates, Deputy Director  
Ann Lee, Finance Manager  
Kevin Morris, Science and Technology Officer  
Richard Anderson, System Operations Manager  
Ford Ritz, Project Engineer  
Jessica Benson, Agency Clerk

***Others Present:***

A list of others present who signed the attendance roster for this meeting is filed with the permanent records of the Authority. Commissioner Langford recognized Charlotte County Commissioner Ken Doherty and North Port Commissioner Debbie McDowell in the audience.

**CALL TO ORDER**

Commissioner Langford called meeting to order.

**INVOCATION**

Commissioner Langford offered the invocation.

**PLEDGE OF ALLEGIANCE**

The Board led the Pledge of Allegiance of the Flag of the United States.

**PUBLIC COMMENTS**

Commissioner Langford asked if there was anyone wishing to address the Board on any agenda item or non-agenda issue. There were no public comments.

Commissioner Langford acknowledged Jonathon Lewis sitting in for Commissioner Maio due to a conflict with Sarasota County BOCC meeting.

**RESOLUTIONS/PRESENTATIONS**

1. **Outstanding Water Treatment Plant Class A presented by the Florida American Water Works Association.**

The Florida Section American Water Works Association recently recognized the Peace River Facility with their 'Outstanding Water Treatment Plant Class A Award' for 2016. Grace Johns, chair of the FSAWWA, presented the award to Authority staff Doug Leath, Maintenance Supervisor, and Chris Roger, Project Manager, on behalf of the Authority.

Commissioner Constance expressed his appreciation to all that worked earned this award.

**CONSENT AGENDA**

1. **Minutes of April 12, 2017 Board of Directors Meeting**
2. **Set a Public Hearing for FY 2018 Budget for August 2, 2017**
3. **Receive and File Authority Financial Reports:**
  - a. **Mid-Year Financial Report for FY 2017**
  - b. **Semi-Annual Investment Report for March 31, 2017**
4. **Approve One Year Extension to Agreement for Financial Advisory Services with First Southwest Company, a Division of Hilltop Securities Inc.**
5. **Approve One Year Extension to Agreement for Investment Banking Services with Citigroup Global Markets, Inc.**
6. **Professional Auditing Service – Approve Firm Selection [REMOVED FOR DISCUSSION]**
7. **Approve Work Order to TKW Engineering for Final Design Services on covers for all filter units at the Peace River Facility [REMOVED FOR DISCUSSION]**
8. **Finished Water Transfer Pump 35-P-9 Installation:**
  - a. **Approve Owner Direct Purchase of Major Equipment from Carter VerPlanck**
  - b. **Approve Work Order to Garney Construction for Installation of Major Equipment for Transfer Pump 35-P-9 Project**
9. **Letter of Appreciation to George Mann for service on the SWFWMD Governing Board**

Commissioner Constance requested Items 6 and 7 be removed from the Consent Agenda for discussion.

**Motion was made by Commissioner Constance, seconded by Commissioner Benac, to approve the Consent Agenda, with the exception of Items 6 and 7. Motion was approved unanimously.**

Regarding Item 6 for Professional Auditing Services, Commissioner Constance said he thought each Authority member was going to send a representative to sit on the selection committee.

Mr. Lehman said the Authority's Procurement Policy specifies the selection process for professional auditing services and handed out the paragraph regarding the process which is compliant with state statute. Mr. Lehman stated that the revised procurement procedures adopted by the Board last year was with regards to professional engineering services.

Commissioner Constance read the policy and stated that he was unaware of specific policy regarding auditing services. Commissioner Constance said the counties needed to be involved in the selection process for all contracts and given the ability to opt out at their discretion.

Commissioner Benac asked if this was a deviation from standard procedure. She also added if the assumption was to send a representative, she needed to know so she could appoint someone.

Commissioner Constance stated the work has been done and he is ok with this item and ready to make a motion, but he wanted the policy brought back to the Board to adopt a selection process same as the engineering selection process.

**Motion was made by Commissioner Constance, seconded by Commissioner Benac, to approve Consent Agenda Item 6 for Professional Auditing Service Firm Selection. Motion was approved unanimously.**

Commissioner Constance said Item 7 is to build covers for the filters, but only the design. Commissioner Constance asked in what period of time construction funds would be needed for the project which is estimated at \$1 M dollars.

Mr. Morris provided background information of the project and its benefits. He said the construction cost was estimated at about \$1M dollars and the design was \$180,000. The project is funded by R&R funds and that the project would be brought back to the Board following the bid process for approval prior to construction.

Commissioner Constance asked if the Authority was still pumping finished water into ASR system and about the use of lesser treated water.

Mr. Morris said the Authority began a pilot program on two wells to recharge them with raw water from the reservoir. The pilot program includes up to three recharge, storage and recovery cycles which are not yet finished because of the drought. Mr. Morris said the feasibility of using raw or partially treated water rather than fully treated drinking water for ASR storage will be better understood once the three cycles in the pilot testing program are completed and if successful will request regulatory approval to recharge with partially treated raw water.

Commissioner Constance expressed his appreciation of Mr. Morris' presentation. He asked if new regulations are adopted by the EPA in the future would the Authority be grandfathered in.

Mr. Morris explained that federal regulations apply to all utilities in every state for compliance.

Commissioner Constance said his only issue this this item was it shouldn't be in the consent agenda. It is a big ticket item and would like to see presentation for transparency purposes and have a discussion ahead of time.

**Motion was made by Commissioner Constance seconded by Assistant County Administrator Jonathan Lewis, to approve Consent Agenda Item 7. Motion was approved unanimously.**



**REGULAR AGENDA**

**1. Water Supply Conditions – Staff Presentation**

Mr. Anderson presented Water Supply Conditions at the Peace River Facility as of May 23, 2017.

- Water Supply Quantity: Good
- Treated Water Quality: Excellent

Water Demand	29.43 MGD
River Withdrawals	0.00 MGD
<u>Storage Volume:</u>	
Reservoirs	2.91 BG
ASR	<u>5.68 BG</u>
Total	8.59 BG

The region continues to be very dry with below average rainfall since September. There were no withdrawals from the Peace River in the month of May. Reservoir storage is at 2.91 BG and there is 5.68 BG in the ASR system.

Commissioner Constance asked about the quality of the ASR system.

Mr. Anderson said the water quality from the ASR system is still good, however it degrades as more water is removed from storage and it blends with native groundwater.

Commissioner Benac asked if the reason the Authority was taking water from the ASR system was water quality - or is it the reduced quantity of water in the reservoir.

Mr. Anderson said it was mainly for the reduced quantity, and it was a way of managing the resources.

Commissioner Langford asked if the ASR water was blended.

Mr. Anderson said yes, the ASR water was discharged into the reservoir to blend in the reservoir water.

Mr. Anderson said the Authority and its customers maintain 105 MGD of finished water supply capacity. For the month of April the Authority produced about 29.0 MGD and the member utilities produced 53.5 MGD for a total regional use of 82.5 MGD which is about 78.7% of the region's capacity.

Commissioner Constance asked for clarification that this was for member counties and did not include nonmember system.

Mr. Anderson confirmed.

Mr. Anderson reviewed the current demand and supply conditions for each of the members/customers for

the month of April including their twelve-month rolling average and historical annual average usage. Authority members continue to account for about 79% of the region's demand.

Mr. Anderson explained the regional demand and water usage.

## 2. Regional Integrated Loop System Phase 3B Interconnect Project [SR 681 to Clark Road]

- a. Project Update
- b. Final Basis of Design Report

Mr. Morris presented a location map showing the pipeline routing and potential pump station, stating that staff is asking for the Board to receive and file the final Basis of Design Reports (BODR). The draft BODR for the pipeline was presented at a previous Board meeting.

Commissioner Benac asked if Sarasota County approved the location of the pump station.

Jonathan Lewis said this project has been in discussion for a while, and said yes.

Mr. Morris said he in talking with Mr. Cash from Sarasota County Utilities, they agreed on a general location for the pump station and the value on having the pump station in that area

Commissioner Constance asked about not knowing the specific time and location for the pump station.

Mr. Morris responded that the BODR executive summary discusses the dynamic nature of this aspect of the project.

**Motion was made by Commissioner Constance, seconded by, Assistant County Administrator Jonathan Lewis to receive and file final 'Regional Integrated Loop System Phase 3B Pipeline Basis of the Design Report' and the 'Regional Integrated Loop System Phase 3 B Pump Station Basis of the Design Report'. Motion was approved unanimously.**

## 3. Legislative Session Wrap-Up

Ms. Diane Salz said while not securing funding for its projects, the Authority achieved some goals. The Authority was able to build relationships with new delegation members, become familiar with new rules, learn the new leadership dynamics, and raise the profile of the Authority. Ms. Salts said the most important goal the Authority achieved was to engage in advocacy.

Ms. Salz said the plan for the next legislature year was to develop a regional advocacy plan. This plan consists of forming a coalition, get project sponsor(s), and work with SWFWMD for education and advocacy programs.

Ms. Salz said 2018 legislative session was starting in January and she was getting ready for that.

Commissioner Constance stated it was a difficult year and the importance of 'staying in the game' as this is not a one year issue but long term. He acknowledged all the hard work Mrs. Salz is doing for the Authority.

#### **4. Wildfire on RV Griffin Reserve – Staff Presentation**

On May 13, 2017 a wildfire started near Raintree Boulevard in North Port. The fire was driven east by high winds, jumping I-75 and continued east, all the way to the Reservoir 2 embankment, eventually burning approximately 30% of the 6,000 acre RV Griffin Reserve. There was no damage to critical water supply infrastructure from the blaze as it was contained well north of Kings Highway thanks to the efforts of the Florida Forest Service, DeSoto and Charlotte County Fire Departments and many other fire departments from west central Florida - including fire fighters from as far away as South Carolina.

Mr. Morris provided a presentation that can be found on the Authority's web page with pictures and videos of the wild fire.

Commissioner Constance asked if the Authority has a routine prescribed burn program.

Mr. Coates said the Authority has a controlled burning program on the RV Griffin property which helps avoid wild fires.

#### **GENERAL COUNSEL'S REPORT**

#### **EXECUTIVE DIRECTOR'S REPORT**

##### **1. Tentative Budget for FY 2018 – Update**

Mr. Lehman said the approved Tentative Budget for FY 2018 at the April meeting and all documents have been posted on the Authority's web site. To-date the only comment has been concerning the potential CIP schedule. Mr. Lehman stated that staff can provide any information or presentation for each county as may be requested.

##### **2. Rules Review and Certification**

Mr. Lehman stated that the Authority does not make rules but needs to file the acknowledgment for rules review and certification anyway because it is a state Special District statutory requirement.

Commissioner Constance stated the Authority does not promulgate rules but instead has the Master Water Supply Contract.

Commissioner Constance said if he could get an update on the WUP in increase withdrawal from the river and extend the term of the permit.

Mr. Coates responded that the Authority's project team met with SWFWMD staff in early May and had good discussion about the permit modifications. The Authority staff and consultants are preparing the draft permit application and expect to be ready for submittal in September. Mr. Coates also estimated that it would take four to six months for SWFWMD action on the permit changes.

Commissioner Constance said modifying the WUP was critical and top priority and requested continuing feedback on status.

**ROUTINE STATUS REPORTS**

1. Hydrologic Conditions Report
2. Check Registers for March and April 2017
3. Regional Integrated Loop System Phase 1 Interconnect Project [U.S. 17 to Punta Gorda]
4. Partially Treated Water Aquifer Storage & Recovery Pilot Testing
5. Peace River Facility Water Use Permit Modification/Renewal
6. Peace River Basin Report

**BOARD MEMBER COMMENTS**

Commissioner expressed his gratitude for having served on the Board and wished all well in the future.

Commissioner Langford expressed the Board's appreciation to Commissioner Constance and presented a plaque to him for his service on the Board of Directors.

**PUBLIC COMMENTS**

Commissioner Langford asked if there was anyone wishing to address the Board. There were no public comments.

**ANNOUNCEMENTS**

Next Authority Board Meeting and Public Hearing for FY 2018 Budget

August 2, 2017 @ 9:30 a.m.

Sarasota County Administration Center  
Commission Chambers, First Floor  
1661 Ringling Boulevard, Sarasota, Florida

Future Authority Board Meetings

October 4, 2017 @ 9:30 a.m. – Manatee County Administrative Center, Bradenton, Florida

December 6, 2017 @ 9:30 a.m. – DeSoto County Administration Building, Arcadia, Florida

**ADJOURNMENT**

There being no further business to come before the Board, the meeting adjourned at 11:01 a.m.

---

Commissioner Alan Maio  
Chairman

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**CONSENT AGENDA**  
**ITEM 2**

**U.S. Geological Survey Joint Funding Agreement #18ESFL000000101**

---

**Recommended Action -**

**Motion** to approve and authorize Executive Director to execute U.S. Geological Survey Joint Funding Agreement #18ESFL000000101.

The USGS and the Authority have participated in joint funding agreements for monitoring in the Lower Peace River/Upper Charlotte Harbor since 1998 as part of the enhanced Hydrobiological Monitoring Program (HBMP). The existing agreement with the USGS, which covers a data collection program for three tide-stage and specific conductance gage stations in the Peace River will expire at the end of FY 2017 (September 30, 2017).

The new USGS agreement covers FY 2018 (October 1, 2017 through September 30, 2018). The funding distribution is as follows. The FY 2018 cost is approximately 4% higher than FY 2017 cost.

	<u>FY 2018 Cost</u>
• Authority	\$29,120
• USGS	<u>\$24,700</u>
	\$53,820

**Budget Action** – No action needed, funds are provided in the FY 2018 budget.

**Attachments:**

Joint Funding Agreement #18ESFL000000101



## United States Department of the Interior

U.S. GEOLOGICAL SURVEY  
Caribbean-Florida Water Science Center  
DAVIE OFFICE located at NSU's  
Center for Collaborative Research (CCR)  
3321 College Avenue  
Davie, FL 33314  
Phone: (954) 377-5900  
Fax: (954) 377-5901  
June 26, 2017

Customer #: 6000001084

Mr. Samuel S. Stone  
Peace River Manasota Regional  
c/o Peace River Regional Water Supply Facility  
8998 SW Country Road 769  
Arcadia, FL 34269

Dear Mr. Stone:

Enclosed are two signed originals of the FY18 Joint Funding Agreement (JFA#: 18ESFL000000101), between the U. S. Geological Survey (USGS) and Peace River Manasota Regional Water Supply Authority (PRMRWSA) for the period of October 01, 2017 to September 30, 2018. Funding is in the amount of \$24,700.00 from USGS and \$29,120.00 from PRMRWSA.

Please arrange for both to be signed by the appropriate official(s) and return one fully executed original to the attention of Ms. Sandye Cole at this office. If you have any questions regarding these documents, I can be reached at [scole@usgs.gov](mailto:scole@usgs.gov) or 954.377.5904 (desk) or 954.999.8552 (cell).

The results of all work under this agreement will be available for publication by the U. S. Geological Survey. During the course of this jointly planned activity and partnership, USGS may provide unpublished USGS data or information to your office for scientific peer and (or) courtesy review. Guidance concerning USGS's non-disclosure policy will be provided with any review material and is further explained in USGS Fundamental Science Practices.

We appreciate the continued cooperation received from you and your staff and look forward to maintaining this beneficial partnership during Federal fiscal year 2018.

Sincerely,

Sandye Cole,  
Administrative Operations Specialist

Enclosures  
Copy to: Sara Hammermeister  
Agreement Folder

Form 9-1366  
(April 2015)

U.S. DEPARTMENT OF THE INTERIOR  
GEOLOGICAL SURVEY

Customer #: 6000001084  
Agreement #: 18ESFLO00000101  
Project #: MC00E2A  
TIN #: 59-2417483  
Fixed Cost Agreement YES



JOINT FUNDING AGREEMENT

FOR

CARRIBEAN-FLORIDA WATER SCIENCE CENTER

THIS AGREEMENT is entered into as of the, 1st day of October, 2017 by the U.S. GEOLOGICAL SURVEY, UNITED STATES DEPARTMENT OF THE INTERIOR, party of the first part, and the PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY, party of the second part.

1. The parties hereto agree that subject to availability of appropriations and in accordance with their respective authorities there shall be maintained in cooperation AN INVESTIGATION OF WATER RESOURCES herein called the program. The USGS legal authority is 43 USC 36C; 43 USC 50; and 43 USC 50b.
2. The following amounts shall be contributed to cover all of the cost of the necessary field and analytical work directly related to this program. 2(b) includes In-Kind Services in the amount of \$0.00
  - (a) by the party of the first part during the period
 

Amount	Date	to	Date
\$24,700.00	October 01, 2017		September 30, 2018
  - (b) by the party of the second part during the period
 

Amount	Date	to	Date
\$29,120.00	October 01, 2017		September 30, 2018
  - (c) Contributions are provided by the party of the first part through other USGS regional or national programs, in the amount of:  
  
Description of the USGS regional/national program:
  - (d) Additional or reduced amounts by each party during the above period or succeeding periods as may be determined by mutual agreement and set forth in an exchange of letters between the parties.
  - (e) The performance period may be changed by mutual agreement and set forth in an exchange of letters between the parties.
3. The costs of this program may be paid by either party in conformity with the laws and regulations respectively governing each party.
4. The field and analytical work pertaining to this program shall be under the direction of or subject to periodic review by an authorized representative of the party of the first part.
5. The areas to be included in the program shall be determined by mutual agreement between the parties hereto or their authorized representatives. The methods employed in the field and office shall be those adopted by the party of the first part to insure the required standards of accuracy subject to modification by mutual agreement.
6. During the course of this program, all field and analytical work of either party pertaining to this program shall be open to the inspection of the other party, and if the work is not being carried on in a mutually satisfactory manner, either party may terminate this agreement upon 60 days written notice to the other party.

9-1366 (Continuation)

Customer #:

6000001084

Agreement #:

18ESFL000000101

- 7. The original records resulting from this program will be deposited in the office of origin of those records. Upon request, copies of the original records will be provided to the office of the other party.
- 8. The maps, records, or reports resulting from this program shall be made available to the public as promptly as possible. The maps, records, or reports normally will be published by the party of the first part. However, the party of the second part reserves the right to publish the results of this program and, if already published by the party of the first part shall, upon request, be furnished by the party of the first part, at costs, impressions suitable for purposes of reproduction similar to that for which the original copy was prepared. The maps, records, or reports published by either party shall contain a statement of the cooperative relations between the parties.
- 9. USGS will issue billings utilizing Department of the Interior Bill for Collection (form DI-1040). Billing documents are to be rendered QUARTERLY. Payments of bills are due within 60 days after the billing date. If not paid by the due date, interest will be charged at the current Treasury rate for each 30 day period, or portion thereof, that the payment is delayed beyond the due date. (31 USC 3717; Comptroller General File B-212222, August 23, 1983).

U.S. Geological Survey  
 United States  
 Department of the Interior

PEACE RIVER MANASOTA REGIONAL WATER  
 SUPPLY AUTHORITY

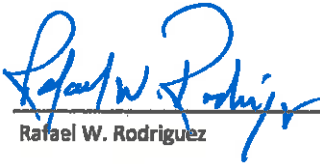
USGS Point of Contact

Customer Point of Contact

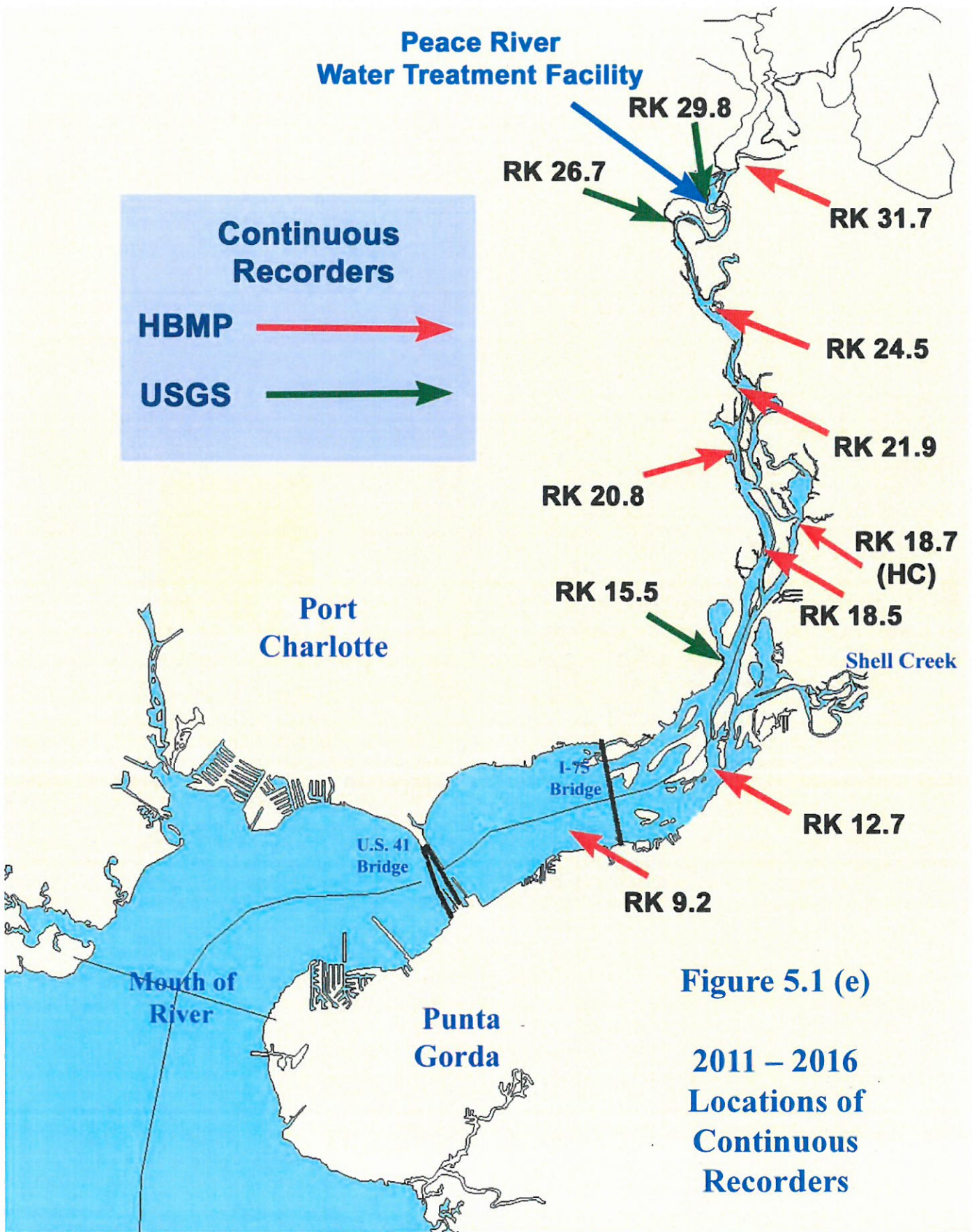
Name: Mrs. Susan Jones  
 Address: 4446 Pet Lane, Suite 108  
 Lutz, FL 33559  
 DUNS #: 137783937 TAS: 148/90804  
 Telephone: 813.498.5009  
 Email: swjones@usgs.gov

Name: Mr. Samuel S. Stone  
 Address: c/o Peace River Regional Water Supply Facility  
 8998 SW Country Road 769  
 Arcadia, FL 34269  
 Telephone: 863.491.7567  
 Email: SStone@regionalwater.org

Signatures and Date

Signature:		Date:	6/26/2017	Signature:		Date:	
Name:	Rafael W. Rodriguez	Name:		Name:		Name:	
Title:	Director, CFWSC	Title:		Title:		Title:	





**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**CONSENT AGENDA**  
**ITEM 3**

**Resolution 2017-05 'Florida Water Professionals Month'**

---

**Recommended Action -**

**Motion** to approve Resolution 2017-05 'Florida Water Professionals Month'.

Safe drinking water is the lifeblood of our communities. The Florida Water and Pollution Control Operators Association is a statewide organization of dedicated operators that maintain water quality in Florida and assure safe drinking water to the public. The Authority is pleased to join in the observance of August as 'Florida Water Professionals Month'.

**Attachments:**

Resolution 2017-05 'Florida Water Professionals Month'

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**Resolution 2017-05**

**FLORIDA WATER PROFESSIONALS MONTH**

The Peace River Manasota Regional Water Supply Authority, created pursuant to Chapter 373.1962, Florida Statutes, now found in Section 373.713, Florida Statutes, and Interlocal agreement pursuant to Chapter 163.01, Florida Statutes, in lawful session and in regular order of business properly presented, finds that:

**WHEREAS**, water professionals are trained, dedicated, and knowledgeable personnel who are responsible for designing, operating and maintaining water and wastewater treatment plants; water distribution, wastewater collection and storm water drainage systems; and perform laboratory analysis; and,

**WHEREAS**, water professionals provide a critical public service to citizens throughout Florida; and,

**WHEREAS**, the Florida Water and Pollution Control Operators Association (FW&PCOA) organized in 1941 is a non-profit trade organization that promotes the sustainability of Florida's water utility industry through workforce development to protect the health of Florida's citizens and to preserve the state's water resources; and,

**WHEREAS**, the FW&PCOA offers water and wastewater treatment plant operator and water distribution system operator training courses required for the state of Florida's operator licenses, eight voluntary certification programs and continuing education programs for operator license renewal; and,

**WHEREAS**, the FW&PCOA in recognizing the importance of the Florida Statutes and Administrative Code that regulate the water industry, acts as liaison between the Department of Environmental Protection and industry personnel; and,

**WHEREAS**, the FW&PCOA recognizes all those who have played a significant part in operating and maintaining drinking water, wastewater, and stormwater systems in Florida by celebrating *Florida Water Professional Month* which applauds their constant efforts to protect our health and environment.

**NOW, THEREFORE, BE IT RESOLVED**, by the Authority Board of the Peace River Manasota Regional Water Supply Authority does hereby extend greetings and best wishes to all observing August 2017 as '*Florida Water Professionals Month*'.

**DONE** at Sarasota Florida, this Second day of August 2017.

Attest:

**Peace River Manasota**  
Regional Water Supply Authority

\_\_\_\_\_  
Patrick J. Lehman  
Executive Director

\_\_\_\_\_  
Commissioner Alan Maio  
Chairman

Approved as to Form:

\_\_\_\_\_  
Douglas Manson  
General Counsel for Peace River Manasota  
Regional Water Supply Authority

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**CONSENT AGENDA**  
**ITEM 4**

**SWFWMD Funding Agreements**

---

**Recommended Action -**

**Motion** to ratify: (1) First Amendment to Cooperative Funding Agreement No. 15C00000052 for Phase 1 Regional Interconnect and (2) Cooperative Funding Agreement No. 17CF0000379 for Phase 3B Regional Interconnect.

**a. Phase 1 Regional Interconnect ‘First Amendment’ to Agreement No. 15C00000052**

SWFWMD and the Authority entered into an agreement effective February 25, 2016 for funding the Phase 1 Regional Interconnect [US 17 to Punta Gorda]. The ‘First Amendment’ to the co-funding agreement extends the contract end period from December 31, 2019 until April 30, 2021, and modifies other project milestones to be consistent with the project schedule in the Basis of Design Report. SWFWMD funding (up to \$6,000,000) is unchanged.

**b. Regional Integrated Loop System Phase 3B, Agreement No. 17CF0000379**

In accordance with prior Board discussions this co-funding agreement is effective February 16, 2016, and includes up to \$760,000 in matching SWFWMD funds for pipeline design services and third-party-review of the estimated project costs for the Phase 3B Interconnect. Upon completion of 3<sup>rd</sup> party review, the SWFWMD Board will be asked to approve amending the Agreement to include additional funding to complete the Regional Integrated Loop System Phase 3B project.

**Budget Action:** - None, funds available in CIP account.

**Attachments:**

- Tab A First Amendment to Cooperative Funding Agreement No. 15C00000052 for Phase 1 Regional Interconnect (N416)
- Tab B Cooperative Funding Agreement No. 17CF0000379 for Regional Integrated Loop System Phase 3B Interconnect (N823)

**TAB A**  
**First Amendment to Cooperative Funding Agreement**  
**for Phase I Regional Interconnect**



An Equal Opportunity Employer

# Southwest Florida Water Management District

2379 Broad Street, Brooksville, Florida 34604-6899

(352) 796-7211 or 1-800-423-1476 (FL only)

WaterMatters.org

**Bartow Office**  
170 Century Boulevard  
Bartow, Florida 33830-7700  
(863) 534-1448 or  
1-800-482-7862 (FL only)

**Sarasota Office**  
6750 Fruitville Road  
Sarasota, Florida 34240-9711  
(941) 377-3722 or  
1-800-320-3503 (FL only)

**Tampa Office**  
7801 U.S. 301 North (Fort King Highway)  
Tampa, Florida 33637-6759  
(813) 985-7481 or  
1-800-838-0797 (FL only)

Peace River Manasota  
Regional Water Supply Authority

JUN 15 2017

RECEIVED

**Randall S. Maggard**  
Chair, Pasco

**Jeffrey M. Adams**  
Vice Chair, Pinellas

**Bryan K. Beswick**  
Secretary, DeSoto, Hardee,  
Highlands

**Ed Armstrong**  
Treasurer, Pinellas

**H. Paul Swift, Jr.**  
Former Chair, Polk

**Michael A. Babb**  
Former Chair, Hillsborough

**John Henalick**  
Manatee

**Kelly S. Rice**  
Citrus, Lake, Levy, Sumter

**Joel Schleicher**  
Charlotte, Sarasota

**Rebecca Smith**  
Hillsborough, Pinellas

**Mark Taylor**  
Hernando, Marion

**Michelle Williamson**  
Hillsborough

**Vacant**  
Polk

**Brian J. Armstrong, P.G.**  
Executive Director

June 13, 2017

**Mike Coates, Deputy Director**  
Peace River Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, Florida 34202

**Subject: Phase 1 Regional Interconnect (N416); Agreement No. 15C00000052**

Dear Mr. Coates:

Enclosed are two originals of first amendment to the agreement between the Southwest Florida Water Management District (District) and the Peace River Manasota Regional Water Supply Authority for the subject project. Please have both originals signed and dated, and return them to my attention. One fully executed original will be sent to you for your files after the District's designee has signed the agreements.

If you have any questions, please contact me at extension 4871 at the Brooksville office.

Sincerely,

**John F. Ferguson, PG**  
Staff Hydrogeologist  
Water Supply Section  
Water Resources Bureau

JFF

Enclosures (2)

cc: Records (Contract File)  
Project File

**FIRST AMENDMENT  
TO AGREEMENT BETWEEN THE  
SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT  
AND  
PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
FOR  
PHASE 1 REGIONAL INTERCONNECT (N416)**

This **FIRST AMENDMENT** effective upon execution by both parties, by and between the **SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT**, a public corporation of the State of Florida, whose address is 2379 Broad Street, Brooksville, Florida 34604-6899, hereinafter referred to as the "**DISTRICT**," and the **PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**, an independent special district created and existing pursuant to Section 373.1962, Florida Statutes, now found in Section 373.713, Florida Statutes, and Section 163.01, Florida Statutes, whose address is 9415 Town Center Parkway, Lakewood Ranch, Florida, 34202, hereinafter referred to as the "**AUTHORITY**."

**WITNESSETH:**

**WHEREAS**, the **DISTRICT** and the **AUTHORITY** entered into an agreement effective February 25, 2016, (Agreement No. 15C00000052) hereinafter referred to as the "**Existing Agreement**" for a new transmission pipeline that is approximately six and three tenths (6.3) miles of potable water pipeline from the southern terminus of the **AUTHORITY'S** DeSoto Regional Transmission Main near the Walmart Distribution Center at Enterprise Boulevard on U.S. 17 in DeSoto County south to connect with the City of Punta Gorda's Shell Creek Water Treatment Plant on Washington Loop Road which will be constructed, owned and operated by the **AUTHORITY**, hereinafter referred to as the "**PROJECT**"; and

**WHEREAS**, the parties hereto wish to amend the Existing Agreement to extend the contract period and modify the Project Schedule.

**NOW THEREFORE**, in consideration of the mutual terms, covenants and conditions contained herein, the parties hereby mutually agree to amend the Existing Agreement as follows:

1. The Contract Period Paragraph is hereby amended to extend the expiration date of December 31, 2019 to April 30, 2021.
2. The Schedule section set forth in Exhibit "A" is hereby replaced in its entirety with the following:

<b>Description</b>	<b>Commence</b>	<b>Complete</b>
Design and Development of Bid Documents	March 1, 2016	January 30, 2018
Permitting	March 1, 2017	May 31, 2018
Construction Bidding and Contract Award	February 1, 2018	August 31, 2018
Construction NTP to Substantial Completion	September 1, 2018	December 31, 2019
Project to Final Completion	March 1, 2016	February 29, 2020

3. The terms, covenants and conditions set forth in the Existing Agreement that have not been specifically amended herein, will continue in existence, are hereby ratified, approved and confirmed, and will remain binding upon the parties hereto.

IN WITNESS WHEREOF, the parties hereto, or their lawful representatives, have executed this FIRST AMENDMENT on the day and year set forth next to their signatures below.

**SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT**

By: \_\_\_\_\_  
 Mark A. Hammond, P.E. Date  
 Director, Resource Management Division

**PEACE RIVER MANASOTA REIONAL WATER SUPPLY AUTHORITY**

By:  \_\_\_\_\_  
 Patrick J. Lehman, P.E. 6/19/2017 Date  
 Executive Director

**FIRST AMENDMENT  
 TO AGREEMENT BETWEEN THE  
 SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT  
 AND  
 PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
 FOR  
 PHASE 1 REGIONAL INTERCONNECT (N416)**

DISTRICT APPROVAL	INITIALS	DATE
LEGAL	<i>Ed</i>	5/26/17
RISK MGMT	<i>M-A</i>	
CONTRACTS	<i>RS</i>	5-31-17
BUREAU CHIEF	<i>Jim</i>	6-6-17
DIRECTOR	<i>MAH</i>	6/12/17
GOVERNING BOARD		



TAB B  
Cooperative Funding Agreement for Phase I Regional Interconnect (N823)



An Equal Opportunity Employer

# Southwest Florida Water Management District

2379 Broad Street, Brooksville, Florida 34604-6899  
(352) 796-7211 or 1-800-423-1476 (FL only)  
WaterMatters.org

**Bartow Office**  
170 Century Boulevard  
Bartow, Florida 33830-7700  
(863) 534-1448 or  
1-800-492-7862 (FL only)

**Sarasota Office**  
6750 Fruitville Road  
Sarasota, Florida 34240-6711  
(941) 377-3722 or  
1-800-320-3503 (FL only)

**Tampa Office**  
7801 U.S. 301 North (Fort King Highway)  
Tampa, Florida 33637-6759  
(813) 985-7481 or  
1-800-836-0797 (FL only)

**Peace River Manasota  
Regional Water Supply Authority**

**JUN 19 2017**

**RECEIVED**

**Randall S. Megard**  
Chair, Pasco

**Jeffrey M. Adams**  
Vice Chair, Pinellas

**Bryan K. Beewick**  
Secretary, DeSoto, Hardee,  
Highlands

**Ed Armstrong**  
Treasurer, Pinellas

**H. Paul Sault, Jr.**  
Former Chair, Polk

**Michael A. Babb**  
Former Chair, Hillsborough

**John Hanzlik**  
Manatee

**Kelly S. Rice**  
Citrus, Lake, Levy, Sumter

**Joel Schleichner**  
Charlotte, Sarasota

**Rebecca Smith**  
Hillsborough, Pinellas

**Mark Taylor**  
Hernando, Marion

**Michelle Williamson**  
Hillsborough

**Vacant**  
Polk

**Brian J. Armstrong, P.E.**  
Executive Director

June 14, 2017

**Mike Coates**  
Peace River/Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, Florida 34202

**Subject: PRMRWSA Regional Integrated Loop System Phase 3B  
Project No. (N823)  
Agreement No. 17CF0000379**

Dear Mike Coates:

Enclosed are two originals of the agreement between the Southwest Florida Water Management District (District) and Peace River/Manasota Regional Water Supply Authority, for the subject project. Please have all originals signed and dated, then return them to my attention. One fully executed original will be sent to you for your files after the District's executive director or designee has signed the agreements.

If you have any questions, please contact me at the Brooksville office, extension 4106.

Sincerely,

*Rachelle Jones*

**Rachelle Jones, CPPB, FCPA, FCPM**  
Senior Procurement Specialist  
Procurement/Finance Bureau

Enclosures (2)

cc: **John Ferguson**  
**S. Tarokh, PAB**  
**Records (Contract File)**

COOPERATIVE FUNDING AGREEMENT (TYPE 2)  
BETWEEN THE  
SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT  
AND  
PEACE RIVER/MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
FOR  
PRMRWSA REGIONAL INTEGRATED LOOP SYSTEM PHASE 3B (N823)

This COOPERATIVE FUNDING AGREEMENT (Agreement) is made and entered into by and between the SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT, a public corporation of the State of Florida, whose address is 2379 Broad Street, Brooksville, Florida 34604-6899, hereinafter referred to as the "DISTRICT," and the PEACE RIVER/MANASOTA REGIONAL WATER SUPPLY AUTHORITY, a regional governmental agency of the State of Florida, whose address is 9415 Town Center Parkway, 9415 Town Center Parkway, Lakewood Ranch, Florida 34202, hereinafter referred to as the "COOPERATOR."

WITNESSETH:

WHEREAS, the COOPERATOR proposed a project to the DISTRICT for funding consideration under the DISTRICT'S cooperative funding program; and

WHEREAS, the project consists of the partial design and permitting of the extension of the Phase 3 Interconnect from its current terminus along Cow Pen Slough to Clark Road in Sarasota County, hereinafter referred to as the "PROJECT"; and

WHEREAS, the DISTRICT considers the resource benefits to be achieved by the PROJECT worthwhile and desires to assist the COOPERATOR in funding the PROJECT, and

WHEREAS, the parties desire to share in the cost of a third party review performed on the 30% Design Level Package.

NOW THEREFORE, the DISTRICT and the COOPERATOR, in consideration of the mutual terms, covenants and conditions set forth herein, agree as follows:

1. PROJECT CONTACTS AND NOTICES.

Each party hereby designates the individual set forth below as its prime contact for matters relating to this Agreement. Notices and reports shall be sent to the attention of each party's prime contact as set forth herein by U.S. mail, postage paid, by nationally recognized overnight courier, or personally to the parties' addresses as set forth below. Notice is effective upon receipt.

Contract Manager for the DISTRICT:  
John Ferguson  
Southwest Florida Water Management District  
2379 Broad Street  
Brooksville, Florida 34604

Project Manager for the COOPERATOR:  
Mike Coates  
Peace River/Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, Florida 34202

Any changes to the above representatives or addresses must be provided to the other party in writing.

- 1.1 The Contract and Project Managers are authorized to approve requests to extend a PROJECT task deadline set forth in this Agreement. Such approval must be in writing, explain the reason for the extension and be signed in accordance with each party's signature authority. The Contract and Project Managers are not authorized to approve any time extension which will result in an increased cost or which will exceed the expiration date set forth in this Agreement.
- 1.2 The Contract and Project Managers are authorized to adjust a line item amount of the Project Budget contained in the Project Plan, or, if applicable, the refined budget as set forth in Subparagraph 4 of the Funding Paragraph. The authorization must be in writing, explain the reason for the adjustment, and be signed in accordance with each party's signature authority. The Contract and Project Managers are not authorized to make changes to the Scope of Work and are not authorized to approve any increase in the amounts set forth in the funding section of this Agreement.

## 2. SCOPE OF WORK.

Upon receipt of written notice to proceed from the DISTRICT, the COOPERATOR shall perform the services necessary to complete the PROJECT in accordance with the COOPERATOR'S Project Plan. Any changes to this Agreement, except as provided herein, must be mutually agreed to in a formal written amendment approved by the DISTRICT and the COOPERATOR prior to being performed by the COOPERATOR. The COOPERATOR shall be solely responsible for managing and controlling the PROJECT, including the hiring and supervising of any consultants or contractors it engages.

The parties agree that time is of the essence in the performance of each obligation under this Agreement.

## 3. FUNDING.

The parties anticipate that the total cost of the PROJECT, including third party review costs, will be One Million Five Hundred Twenty Thousand Dollars (\$1,520,000). The DISTRICT agrees to fund PROJECT costs up to Seven Hundred Sixty Thousand Dollars (\$760,000), and shall have no obligation to pay any costs beyond this maximum amount. The COOPERATOR agrees to provide all remaining funds necessary for the satisfactory completion of the PROJECT.

- 3.1 The DISTRICT'S performance and payment pursuant to this Agreement are contingent upon the DISTRICT'S Governing Board appropriating funds in its approved budget for the PROJECT in each fiscal year of this Agreement. The COOPERATOR'S payment of any financial obligation under this Agreement is subject to appropriation by the COOPERATOR'S Board of legally available funds.
- 3.2 The COOPERATOR shall pay PROJECT costs prior to requesting reimbursement from the DISTRICT. The DISTRICT shall reimburse the COOPERATOR for the DISTRICT'S share of allowable PROJECT costs in accordance with the Project Budget contained in the Project Plan. Reimbursement for expenditures of contingency funds is contingent upon approval by the DISTRICT. If a reimbursement request includes the expenditure of contingency funds, the COOPERATOR shall provide sufficient documentation to the DISTRICT to explain the basis of the expense. The DISTRICT shall not reimburse the COOPERATOR for any contingency funds that the DISTRICT determines, in its sole discretion, to be in excess of what was reasonably necessary to complete the PROJECT. The DISTRICT shall reimburse the COOPERATOR for fifty percent (50%) of all allowable costs in each DISTRICT approved invoice received from the COOPERATOR, but at no point in time shall the DISTRICT'S expenditure amounts under this Agreement exceed expenditures made by the COOPERATOR.
- 3.3 Unless otherwise stated in this Agreement, any federal, state, local or grant monies received by the COOPERATOR for this PROJECT shall be applied to equally reduce each party's share of PROJECT costs. The COOPERATOR shall provide the DISTRICT with written documentation detailing its allocation of any such funds appropriated for this PROJECT. This Subparagraph shall survive the expiration or termination of this Agreement.
- 3.4 The COOPERATOR may contract with consultant(s), contractor(s) or both to accomplish the PROJECT. The COOPERATOR must obtain the DISTRICT'S written approval prior to posting solicitations for consultants or contractors and prior to entering into agreements with consultants or contractors to ensure that costs to be reimbursed by the DISTRICT under those agreements are reasonable and allowable under this Agreement. The DISTRICT shall provide a written response to the COOPERATOR within fifteen (15) business days of receipt of the solicitation or agreement. Upon written DISTRICT approval, the budget amounts for the work set forth in such contract(s) shall refine the amounts set forth in the Project Budget and be incorporated herein by reference. The DISTRICT shall not reimburse the COOPERATOR for costs incurred under consultant and contractor agreements until the DISTRICT approvals required under this provision have been obtained.
- 3.5 Payment shall be made to the COOPERATOR within forty-five (45) days of receipt of an invoice with adequate supporting documentation to satisfy auditing purposes. Invoices shall be submitted to the DISTRICT every two (2) months electronically at [invoices@WaterMatters.org](mailto:invoices@WaterMatters.org), or at the following address:

**Accounts Payable Section  
Southwest Florida Water Management District  
Post Office Box 15436  
Brooksville, Florida 34604-5436**

The above-referenced payment due date shall not apply to that portion of an invoice that includes contingency expenses. The DISTRICT agrees to reimburse the COOPERATOR for contingency expenses within a reasonable time to accommodate the process provided for in Subparagraph 2 of this Funding Paragraph.

In addition to sending an original invoice to the DISTRICT'S Accounts Payable Section as required above, copies of invoices may also be submitted to the DISTRICT'S Contract Manager in order to expedite the review process. Failure of the COOPERATOR to submit invoices to the DISTRICT in the manner provided herein shall relieve the DISTRICT of its obligation to pay within the aforementioned timeframe.

The DISTRICT makes payments electronically through the Automated Clearing House (ACH) process. The COOPERATOR agrees to complete the DISTRICT'S *Vendor Registration Form and Vendor Electronic Payment Authorization Form* to enable payments to be sent to COOPERATOR electronically. The forms may be downloaded from the DISTRICT'S website at [www.watermatters.org](http://www.watermatters.org) under Business & Finance – Contracts and Procurement. Any questions regarding electronic payments may be directed to the DISTRICT'S Accounts Payable Lead at 352-796-7211, extension 4108.

- 3.6 The parties acknowledge that the PROJECT was approved for funding by the DISTRICT based upon the resource benefits expected to be achieved by the PROJECT (the "Measurable Benefit"). The parties also acknowledge that the COOPERATOR is solely responsible for implementing the PROJECT in such a manner that the expected resource benefits are achieved. If at any point during the progression of the PROJECT the DISTRICT determines that it is likely that the Measurable Benefit as set forth in the Project Plan will not be achieved, the DISTRICT shall provide the COOPERATOR with fifteen (15) days advance written notice that the DISTRICT shall withhold payments to the COOPERATOR until such time as the COOPERATOR demonstrates that the PROJECT shall achieve the required resource benefits, to provide the COOPERATOR with an opportunity to cure the deficiencies.
- 3.7 Notwithstanding the DISTRICT'S reimbursement obligation set forth in Subparagraph 2 of this Funding Paragraph, the DISTRICT shall withhold reimbursement of the costs associated with the Basis of Design Report and 30% Design Level Package in an amount equivalent to half the cost for the third party design that will be performed by the DISTRICT'S consultant.
- 3.8 Any travel expenses which may be authorized under this Agreement shall be paid in accordance with Section 112.061, Florida Statutes (F.S.), as may be amended from time to time. The DISTRICT shall not reimburse the COOPERATOR for any

purpose not specifically identified in the Scope of Work Paragraph. Surcharges added to third party invoices are not considered an allowable cost under this Agreement. Costs associated with in-kind services provided by the COOPERATOR are not reimbursable by the DISTRICT and may not be included in the COOPERATOR'S share of funding contributions under this Agreement.

3.9 The DISTRICT shall not be obligated to reimburse the COOPERATOR for any design or other work performed by the COOPERATOR'S consultant(s) that takes place other than the completion of the Basis of Design Report and 30% Design Level Package as described in the Project Plan until the DISTRICT'S Governing Board is presented with the third party review and DISTRICT staff's recommendation and decides to continue funding the PROJECT. The DISTRICT'S Contract Manager shall provide written notice to the COOPERATOR advising of the DISTRICT'S Governing Board's determination within ten (10) days of the Board's determination, and the COOPERATOR shall continue with design and permitting activities up to the funding amount of this Agreement. Except for costs associated with the Basis of Design Report, 30% Design Level Package and the third party review, the DISTRICT has no obligation and shall not reimburse the COOPERATOR for any costs under this Agreement until the Notice to Proceed with construction has been issued to the COOPERATOR'S contractor.

3.10 Each COOPERATOR invoice must include the following certification, and the COOPERATOR hereby delegates authority by virtue of this Agreement to its Project Manager to affirm said certification:

"I hereby certify that the costs requested for reimbursement and the COOPERATOR'S matching funds, as represented in this invoice, are directly related to the performance under the PRMRWSA Regional Integrated Loop System Phase 3B (N823) agreement between the Southwest Florida Water Management District and the Peace River/Manasota Regional Water Supply Authority (Agreement No. 17CF0000379), are allowable, allocable, properly documented, and are in accordance with the approved Project Budget. This invoice includes \$\_\_ of contingency expenses. The COOPERATOR has been allocated a total of \$\_\_ in federal, state, local or grant monies for this PROJECT (not including DISTRICT funds) and \$\_\_ has been allocated to this invoice, reducing the DISTRICT'S and COOPERATOR'S share to \$\_\_ / \$\_\_ respectively."

3.11 In the event any dispute or disagreement arises during the course of the PROJECT, including whether expenses are reimbursable under this Agreement, the COOPERATOR will continue to perform the PROJECT work in accordance with the Project Plan. The COOPERATOR is under a duty to seek clarification and resolution of any issue, discrepancy, or dispute by providing the details and basis of the dispute to the DISTRICT'S Contract Manager no later than ten (10) days after the precipitating event. If not resolved by the Contract Manager, in consultation with his or her Bureau Chief, within ten (10) days of receipt of notice, the dispute will be forwarded to the DISTRICT'S Assistant Executive Director. The DISTRICT'S Assistant Executive Director in consultation with the DISTRICT'S Office of General Counsel will issue the DISTRICT'S final determination. The COOPERATOR'S continuation of the PROJECT work as required under this

provision shall not constitute a waiver of any legal remedy available to the COOPERATOR concerning the dispute.

4. COMPLETION DATES.

The COOPERATOR shall commence and complete the PROJECT and meet the task deadlines in accordance with the Project Schedule set forth in the Project Plan, including any extensions of time provided by the DISTRICT in accordance with Subparagraph 1 of the Project Contacts and Notices Paragraph. The DISTRICT shall commence and complete the third party review in accordance with the Project Schedule set forth in the Project Plan, including any extensions of time provided by the COOPERATOR in accordance with Subparagraph 1 of the Project Contacts and Notices Paragraph. In the event of hurricanes, tornados, floods, acts of God, acts of war, or other such catastrophes, or other man-made emergencies such as labor strikes or riots, which are beyond the control of either party, the performing party's obligations to meet the time frames provided in this Agreement shall be suspended for the period of time the condition continues to exist. During such suspension, this Agreement shall remain in effect. When the performing party is able to resume performance of its obligations under this Agreement, in whole or in part, it shall immediately give the other party written notice to that effect and shall resume performance no later than two (2) working days after the notice is delivered. The suspension of the parties' obligations provided for in this provision shall be the performing party's sole remedy for the delays set forth herein.

5. REPAYMENT.

5.1 The COOPERATOR shall repay the DISTRICT all funds the DISTRICT paid to the COOPERATOR under this Agreement, if: a) the COOPERATOR fails to complete the PROJECT in accordance with the terms and conditions of this Agreement, including failing to meet the Measurable Benefit; b) the DISTRICT determines, in its sole discretion and judgment, that the COOPERATOR has failed to maintain scheduled progress of the PROJECT thereby endangering the timely performance of this Agreement; c) the COOPERATOR fails to appropriate sufficient funds to meet the task deadlines, unless extended in accordance with Subparagraph 1 of the Project Contacts and Notices Paragraph; or d) a provision or provisions of this Agreement setting forth the requirements or expectations of a Measurable Benefit resulting from the PROJECT is held to be invalid, illegal or unenforceable during the term of this Agreement. Should any of the above conditions exist that require the COOPERATOR to repay the DISTRICT, this Agreement shall terminate in accordance with the procedure set forth in the Default Paragraph.

5.2 Notwithstanding the above, the parties acknowledge that if the PROJECT fails to meet the Measurable Benefit specified in this Agreement, the COOPERATOR may request the DISTRICT Governing Board to waive the repayment obligation, in whole or in part.

5.3 In the event the COOPERATOR is obligated to repay the DISTRICT under any provision of this Agreement, the COOPERATOR shall repay the DISTRICT within a reasonable time, as determined by the DISTRICT in its sole discretion.



5.4 The COOPERATOR shall pay attorneys' fees and costs incurred by the DISTRICT, including appeals, as a result of the COOPERATOR'S failure to repay the DISTRICT as required by this Agreement.

5.5 This Repayment Paragraph, including all subparagraphs, shall survive the expiration or termination of this Agreement.

## 6. CONTRACT PERIOD.

This Agreement shall be effective February 1, 2016 and shall remain in effect through August 31, 2019, or upon satisfactory completion of the PROJECT and subsequent reimbursement to the COOPERATOR, whichever occurs first, unless amended in writing by the parties. The COOPERATOR shall not be eligible for reimbursement for any work that is commenced, or costs that are incurred, prior to the effective date of this Agreement.

## 7. PROJECT RECORDS AND DOCUMENTS.

Upon request by the DISTRICT, the COOPERATOR shall permit the DISTRICT to examine or audit all PROJECT related records and documents during or following completion of the PROJECT at no cost to the DISTRICT. Payments made to the COOPERATOR under this Agreement shall be reduced for amounts found to be not allowable under this Agreement by an audit. If an audit is undertaken by either party, all required records shall be maintained until the audit has been completed and all questions arising from it are resolved. Each party shall maintain all such records and documents for at least three (3) years following completion of the PROJECT. Each party shall allow public access to PROJECT documents and materials made or received by either party in accordance with the Public Records Act, Chapter 119, F.S. Should either party assert any exemption to the requirements of Chapter 119, F.S., the burden of establishing such exemption, by way of injunctive or other relief as provided by law, shall be upon the asserting party. This Paragraph shall survive the expiration or termination of this Agreement.

## 8. REPORTS.

8.1 The COOPERATOR shall provide the DISTRICT with a quarterly report describing the progress of the PROJECT tasks, adherence to the performance schedule and any developments affecting the PROJECT. The COOPERATOR shall promptly advise the DISTRICT of issues that arise that may impact the successful and timely completion of the PROJECT. Quarterly reports shall be submitted to the DISTRICT'S Contract Manager no later than forty-five (45) days following the completion of the quarterly reporting period. It is hereby understood and agreed by the parties that the term "quarterly" shall reflect the calendar quarters ending March 31, June 30, September 30 and December 31.

8.2 Upon request by the DISTRICT, the COOPERATOR shall provide the DISTRICT with copies of all data, reports, models, studies, maps or other documents resulting from the PROJECT. Additionally, one (1) set, electronic and hardcopy, of any final

reports must be submitted to the DISTRICT as Record and Library copies. This Subparagraph shall survive the expiration or termination of this Agreement.

8.3 The COOPERATOR shall provide the DISTRICT with the Basis of Design Report and 30% Design Level Package in accordance with the requirements set forth in the Project Plan.

8.4 The COOPERATOR shall provide the data, reports and documents referenced in this provision at no cost to the DISTRICT.

## 9. RISK, LIABILITY, AND INDEMNITY.

9.1 To the extent permitted by Florida law, the COOPERATOR assumes all risks relating to the PROJECT and agrees to be solely liable for, and to indemnify and hold the DISTRICT harmless from all claims, loss, damage and other expenses, including attorneys' fees and costs and attorneys' fees and costs on appeal, arising from the design, construction, operation, maintenance or implementation of the PROJECT; provided, however, that the COOPERATOR shall not indemnify for that portion of any loss or damages proximately caused by the negligent act or omission of the DISTRICT'S officers, employees, contractors and agents. The acceptance of the DISTRICT'S funding by the COOPERATOR does not in any way constitute an agency relationship between the DISTRICT and the COOPERATOR.

9.2 The COOPERATOR agrees to indemnify and hold the DISTRICT harmless, to the extent allowed under Section 768.28, F.S., from all claims, loss, damage and other expenses, including attorneys' fees and costs and attorneys' fees and costs on appeal, arising from the negligent acts or omissions of the COOPERATOR'S officers, employees, contractors and agents related to its performance under this Agreement.

9.3 This Risk, Liability, and Indemnity Paragraph, including all subparagraphs, shall not be construed as a waiver of the COOPERATOR'S sovereign immunity or an extension of COOPERATOR'S liability beyond the limits established in Section 768.28, F.S. Additionally, this Risk, Liability, and Indemnity Paragraph, including all subparagraphs, will not be construed to impose contractual liability on the COOPERATOR for underlying tort claims as described above beyond the limits specified in Section 768.28, F.S., nor be construed as consent by the COOPERATOR to be sued by third parties in any manner arising out of this Agreement.

9.4 Nothing in this Agreement shall be interpreted as a waiver of the DISTRICT'S sovereign immunity or an extension of its liability beyond the limits established in Section 768.28, F.S., nor be construed as consent by the DISTRICT to be sued by third parties in any manner arising out of this Agreement.

9.5 This Risk, Liability, and Indemnity Paragraph, including all subparagraphs, shall survive the expiration or termination of this Agreement.

10. DEFAULT.

Either party may terminate this Agreement upon the other party's failure to comply with any term or condition of this Agreement, including the failure to meet task deadlines established in this Agreement, as long as the terminating party is not in default of any term or condition of this Agreement at the time of termination. To effect termination, the terminating party shall provide the defaulting party with a written "Notice of Termination" stating its intent to terminate and describing all terms and conditions with which the defaulting party has failed to comply. If the defaulting party has not remedied its default within thirty (30) days after receiving the Notice of Termination, this Agreement shall automatically terminate. If a default cannot reasonably be cured in thirty (30) days, then the thirty (30) days may be extended at the non-defaulting party's discretion, if the defaulting party is pursuing a cure of the default with reasonable diligence. The rights and remedies in this Paragraph are in addition to any other rights and remedies provided by law or this Agreement.

11. RELEASE OF INFORMATION.

The parties agree not to initiate any oral or written media interviews or issue press releases on or about the PROJECT without providing notices or copies to the other party no later than three (3) business days prior to the interview or press release. This Paragraph shall not be construed as preventing the parties from complying with the public records disclosure laws set forth in Chapter 119, F.S.

12. DISTRICT RECOGNITION.

The COOPERATOR shall recognize DISTRICT funding in any reports, models, studies, maps or other documents resulting from this Agreement, and the form of said recognition shall be subject to DISTRICT approval. If construction is involved, the COOPERATOR shall provide signage at the PROJECT site that recognizes funding for this PROJECT provided by the DISTRICT. All signage must meet with DISTRICT written approval as to form, content and location, and must be in accordance with local sign ordinances.

13. LAW COMPLIANCE.

The COOPERATOR shall comply with all applicable federal, state and local laws, rules, regulations and guidelines, including those of the DISTRICT, related to performance under this Agreement. If the PROJECT involves design services, the COOPERATOR'S professional designers and the DISTRICT'S regulation and projects staff shall meet regularly during the PROJECT design to discuss ways of ensuring that the final design for the proposed PROJECT technically complies with all applicable DISTRICT rules and regulations. However, the DISTRICT undertakes no duty to ensure compliance with such rules and regulations.

14. DIVERSITY IN CONTRACTING AND SUBCONTRACTING.

The DISTRICT is committed to supplier diversity in the performance of all contracts associated with DISTRICT cooperative funding projects. The DISTRICT requires the COOPERATOR to make good faith efforts to encourage the participation of minority

owned and woman owned and small business enterprises, both as prime contractors and subcontractors, in the performance of this Agreement, in accordance with applicable laws.

14.1 If requested, the DISTRICT shall assist the COOPERATOR by sharing information to help the COOPERATOR in ensuring that minority owned and woman owned and small businesses are afforded an opportunity to participate in the performance of this Agreement.

14.2 The COOPERATOR agrees to provide the DISTRICT with a report indicating all contractors and subcontractors who performed work in association with the PROJECT, the amount spent with each contractor or subcontractor, and to the extent such information is known, whether each contractor or subcontractor was a minority owned or woman owned or small business enterprise. If no minority owned or woman owned or small business enterprises were used in the performance of this Agreement, then the report shall so indicate. The Minority/Women Owned and Small Business Utilization Report form is attached as an exhibit. The report is required upon final completion of the PROJECT prior to final payment, or within thirty (30) days of the execution of any amendment that increases PROJECT funding, for information up to the date of the amendment and prior to the disbursement of any additional funds by the DISTRICT.

15. ASSIGNMENT.

Except as otherwise provided in this Agreement, no party may assign any of its rights or delegate any of its obligations under this Agreement, including any operation or maintenance duties related to the PROJECT, without the prior written consent of the other party. Any attempted assignment in violation of this provision is void. This Paragraph shall survive the expiration or termination of this Agreement.

16. CONTRACTORS.

Nothing in this Agreement shall be construed to create, or be implied to create, any relationship between the DISTRICT and any consultant or contractor of the COOPERATOR.

17. THIRD PARTY BENEFICIARIES.

Nothing in this Agreement shall be construed to benefit any person or entity not a party to this Agreement.

18. LOBBYING PROHIBITION.

Pursuant to Section 216.347, F.S., the COOPERATOR is prohibited from using funds provided by this Agreement for the purpose of lobbying the Legislature, the judicial branch or a state agency.

19. PUBLIC ENTITY CRIMES.

Pursuant to Subsections 287.133(2) and (3), F.S., a person or affiliate who has been placed on the convicted vendor list following a conviction for a public entity crime may not submit a bid, proposal, or reply on a contract to provide any goods or services to a public entity; may not submit a bid, proposal, or reply on a contract with a public entity for the construction or repair of a public building or public work; may not submit bids, proposals, or replies on leases of real property to a public entity; may not be awarded or perform work as a contractor, supplier, subcontractor, or consultant under a contract with any public entity; and may not transact business with any public entity in excess of the threshold amount provided in Section 287.017, F.S., for Category Two, for a period of 36 months following the date of being placed on the convicted vendor list. The COOPERATOR agrees to include this provision in all contracts issued as a result of this Agreement.

20. SCRUTINIZED COMPANIES.

Pursuant to Section 287.135, F.S., a company that, at the time of bidding or submitting a proposal for a new contract or renewal of an existing contract, is on the Scrutinized Companies that Boycott Israel List, created pursuant to Section 215.4725, F.S., or is engaged in a boycott of Israel; is on the Scrutinized Companies with Activities in Sudan List or the Scrutinized Companies with Activities in the Iran Petroleum Energy Sector List, created pursuant to Section 215.473, F.S.; or is engaged in business operations in Cuba or Syria, is ineligible to, and may not bid on, submit a proposal for, or enter into or renew a contract with an agency or local governmental entity for goods or services of \$1 million or more. By signing this Agreement, COOPERATOR certifies that it is not participating in a boycott of Israel, is not on any of the aforementioned lists, and it does not have business operations in Cuba or Syria. The COOPERATOR agrees to notify the DISTRICT if placement on any of the aforementioned lists occurs or if COOPERATOR is engaged in a boycott of Israel or has business operations in Cuba or Syria. The DISTRICT may terminate this Agreement if the COOPERATOR is found to have submitted a false certification; has been placed on the Scrutinized Companies that Boycott Israel List, or is engaged in a boycott of Israel; has been placed on the Scrutinized Companies with Activities in Sudan List or the Scrutinized Companies with Activities in the Iran Petroleum Energy Sector List; or has been engaged in business operations in Cuba or Syria. If the DISTRICT determines COOPERATOR submitted a false certification, the DISTRICT may bring a civil action against the COOPERATOR which may result in a penalty equal to the greater of \$2 million or twice the amount of this Agreement and all reasonable attorneys' fees and costs.

21. GOVERNING LAW.

This Agreement is governed by Florida law and venue for resolving disputes under this Agreement shall be exclusively in Hernando County, Florida. This Paragraph shall survive the expiration or termination of this Agreement.

22. SEVERABILITY.

If any provision or provisions of this Agreement shall be held to be invalid, illegal, or unenforceable, the validity, legality and enforceability of the remaining provisions shall not in any way be affected or impaired thereby. Notwithstanding the above, if a provision or provisions of this Agreement setting forth the requirements or expectations of a Measurable Benefit resulting from the PROJECT is held to be invalid, illegal or unenforceable during the term of this Agreement, this Agreement shall terminate in accordance with Subparagraph 1 of the Repayment Paragraph. This Paragraph shall survive the expiration or termination of this Agreement.

23. ENTIRE AGREEMENT.

This Agreement and the attached exhibit(s) listed below constitute the entire agreement between the parties and, unless otherwise provided herein, may be amended only in writing, signed by all parties to this Agreement.

24. DOCUMENTS.

The following document(s) is/are attached and made a part of this Agreement. In the event of a conflict of contract terminology, priority shall first be given to the language in the body of this Agreement, then to Exhibit "A", then to Exhibit "B".

Exhibit "A" Project Plan

Exhibit "B" Minority/Women Owned and Small Business Utilization Report Form


The remainder of this page intentionally left blank.

IN WITNESS WHEREOF, the parties hereto, or their lawful representatives, have executed this Agreement on the day and year set forth next to their signatures below.

SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT

By: \_\_\_\_\_ Date  
Amanda Rice, P.E.  
Assistant Executive Director

PEACE RIVER/MANASOTA REGIONAL WATER SUPPLY AUTHORITY

By:  \_\_\_\_\_ Date  
Patrick J. Lehman  
Executive Director

COOPERATIVE FUNDING AGREEMENT (TYPE 2)  
BETWEEN THE  
SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT  
AND  
PEACE RIVER/MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
FOR  
PRMRWSA REGIONAL INTEGRATED LOOP SYSTEM PHASE 3B (N823)

**EXHIBIT "A"**  
**PROJECT PLAN**

**Project Description**

The PROJECT is for the Basis of Design Report, 30% Design Level Package as defined under Task 2 below, third party review, and, if the DISTRICT Governing Board decides to continue funding following review of the third party review as provided in Subparagraph 3.9 of this Agreement, the PROJECT will also include continuing design and permitting services, for the Phase 3B Interconnect up to the funding amount of this Agreement. This interconnect is part of the COOPERATOR'S Regional Integrated Loop System to extend the system from the current northern terminus of the Phase 3A Interconnect along Cow Pen Slough, northward approximately 5.2 miles to Clark Road (SR-72) in central Sarasota County. The PROJECT may include 7 mgd of pumping, chemical trim, metering, and 5 mg storage facilities as determined by Basis of Design Report. If constructed, the PROJECT will supply an estimated 7 mgd of alternative water supplies to promote regional resource management efforts and support water supply goals within the Southern Water Use Caution Area (SWUCA). The general pipeline location for the PROJECT is shown on the attached map (Figure 1).

**Implementation**

The COOPERATOR will use the Design-Bid-Build delivery method for the PROJECT. The COOPERATOR has procured professional services of an engineering design consulting team for the PROJECT pursuant to section 287.055, Florida Statutes. The consulting team will evaluate and confirm a preferred pipeline route and design all facilities required for the PROJECT. If the DISTRICT'S Governing Board approves the continued funding of this PROJECT after it is presented with the results of the third party review and the COOPERATOR continues design and permitting activities up to the funding amount of this Agreement, the parties may agree to amend this Agreement to include final design, permitting, bidding, construction, and inspection services.

**Project Tasks**

The COOPERATOR will complete the Basis of Design Report and 30% Design Level Package for an extension of the Regional Integrated Loop System. The DISTRICT will be responsible for contracting with a consultant to perform a third party review of the 30% Design Level Package.

***Task 1. Basis of Design Report***

The COOPERATOR shall provide PROJECT design concepts as part of the Basis of Design Report. Pipeline routes will be identified, evaluated and a preferred route recommended. Design criteria including pipeline diameter, design flows, survey and water delivery points will be identified. Permits necessary for construction of all PROJECT facilities will be identified. An engineer's opinion of cost and implementation timetable will be provided.

***Task 2. 30 Percent Design and Engineering Package***

The COOPERATOR shall provide supplemental reports to the Basis of Design Report consistent with 30% design level as needed to facilitate the third party review. The reports will include measurable benefits calculations and methodology, estimate of construction cost and performance schedule, and include sufficient information to conduct the review such as:



- Project scope and objective
- Project site assessment (analysis of engineering and environmental issues and constraints). Required property acquisitions shall be identified and illustrated on a separate site plan
- Geotechnical investigation report
- Groundwater conditions
- Existing utilities assessment and coordination
- Design alternatives feasibility analysis
- Preliminary hydrologic and hydraulic analysis for design basis and support
- Earthwork analysis (balanced project or need for fill or haul of excess material)
- Design recommendations, construction cost estimates, assessment of project budget adequacy
- Permitting requirements (agencies listed and type of permit(s) required); key permitting issues
- Preliminary project hydraulic profile and hydraulic design criteria
- Properties, streets or channels in which project structures will be placed
- Identify major construction methodology and cross-sectional features
- Rights-of way and permits approvals/acquisitions schedule
- Project benefit/cost analysis

The final report that includes the information described above constitutes the 30% Design Level Package that will be provided to the DISTRICT'S consultant to perform the third party review. The COOPERATOR will hold a design review meeting of the 30% design level and will provide a formal evaluation. Minutes of any meetings will be prepared and circulated to attendees.

***Task 3. Third Party Review of the 30 Percent Design, Costs, and Schedule***

A third party review of 30% Design Level Package including cost estimates, and timeline shall be implemented by the DISTRICT. The DISTRICT will select and contract with an independent consultant that is not a member of the COOPERATOR'S Consultant's team. The COOPERATOR will ensure that its Consultant fully cooperates in making all pertinent and appropriate PROJECT documents available to the DISTRICT'S third party review consultant in a timely manner.

***Task 4. Continuing Design and Permitting Services***

If the DISTRICT Governing Board approves the continued funding of the PROJECT following review of the third party review in accordance with subparagraph 3.9 of this Agreement, the COOPERATOR will continue the design and permitting up to the funding amount of this Agreement. The COOPERATOR will prepare, support, and submit permit applications for all applicable federal, state, county and city laws.

**Measurable Benefit**

The completion of the Basis of Design Report and 30% Design Level Package for the Phase 3B Interconnect in accordance with this Project Plan.

**COOPERATOR Deliverables**

All draft documents may be provided in electronic format. All final reports will be provided to the DISTRICT as described below. All final documents will also be provided in electronic format (PDF and Microsoft Word for final deliverables and Microsoft Office format for templates, worksheets, etc.).

- Quarterly design status reports
- Copy of draft contract(s) and work orders with consultant, for approval prior to execution

- Copy of executed contract(s) and work orders with consultant
- Minutes of kick-off, pre-application and progress meetings
- Draft Basis of Design Report
- Final Basis of Design Report, including Engineer's Opinion of Cost
- Supplemental reports as necessary to facilitate a 30% design level review.
- Copy of all required federal, state and local environmental permit application packages, requests for additional information, and final permit approvals
- Minority/Women Owned and Small Business Utilization Report Form (Exhibit "B")

**DISTRICT Deliverables**

- Third party peer review report

**Project Budget**

DESCRIPTION	COOPERATOR	DISTRICT	TOTAL
1. Basis of Design Services	\$202,500	\$202,500	\$405,000
2. 30% Design Level Services	\$250,000	\$250,000	\$500,000
3. Third Party Review	\$15,000	\$15,000	\$30,000
4. Continuing Design and Permitting Services*	\$292,500	\$292,500	\$585,000
<b>Total</b>	<b>\$760,000</b>	<b>\$760,000</b>	<b>\$1,520,000</b>

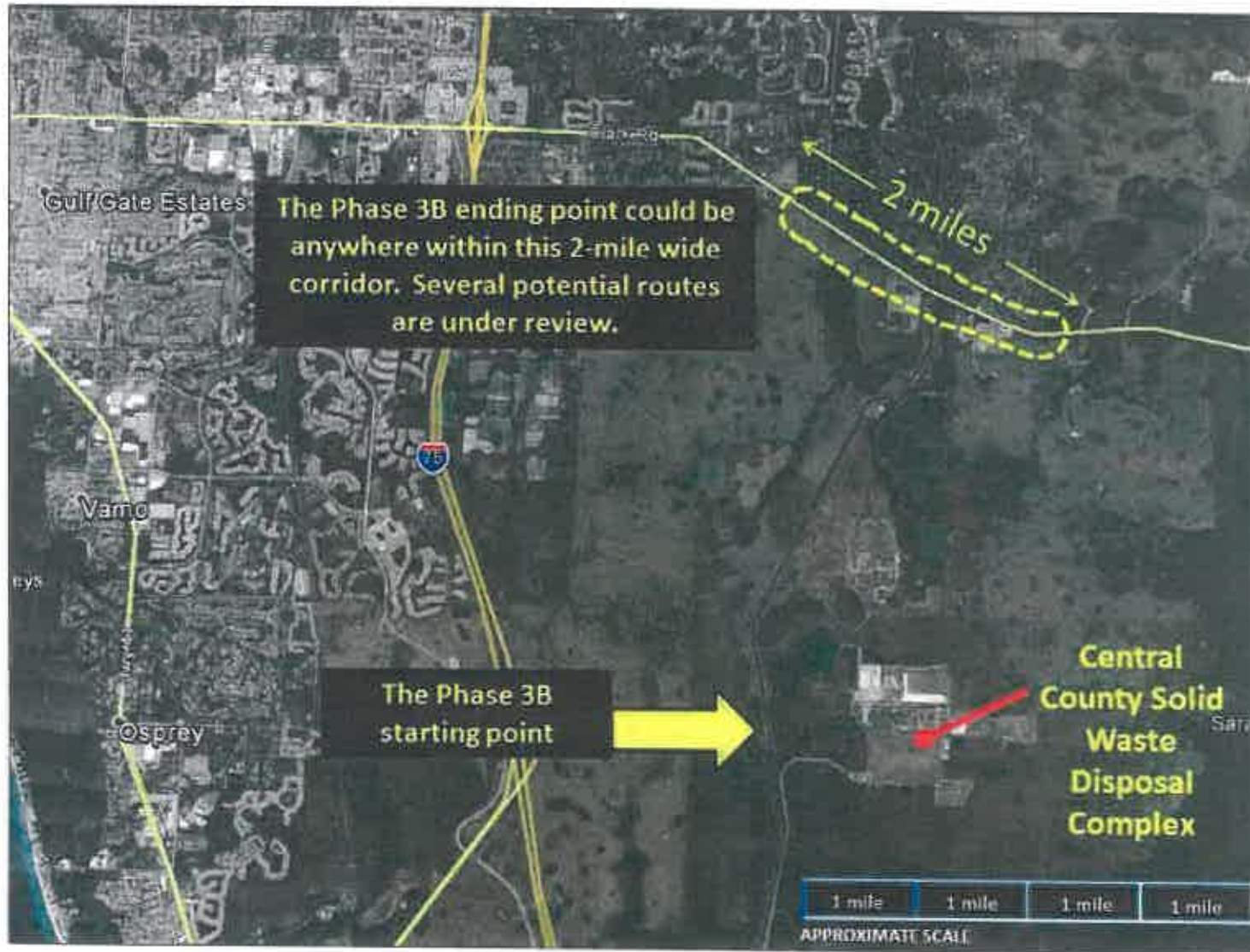
\* Task 4 budget is based on the DISTRICT'S FY2017 budget allocation for continuing work on the PROJECT if the DISTRICT'S Governing Board's determines to continue funding the PROJECT after review of the results of the third party review. Final design and permitting services will exceed the amount shown.

**Project Schedule**

DESCRIPTION	COMMENCE	COMPLETE
1. Basis of Design Services	2/1/2016	2/2/2017
2. 30% Design Level Services	2/3/2017	6/7/2017
3. Third Party Review	6/8/2017	8/29/2017
4. Continuing Design and Permitting Services	8/30/2017	7/20/2018

**Project Map**

**Phase 3B Interconnect Conceptual Pipeline Route**



**EXHIBIT "B"  
MINORITY/WOMEN OWNED AND SMALL BUSINESS UTILIZATION REPORT**

Projects receiving \$100,000 or more in cooperative funding from the Southwest Florida Water Management District require the submission of the following information within 30 days of any amendment increasing project funding and with the final invoice. Questions regarding use of this form should be directed to Contracts Administration, Phone (352) 796-7211 ext. 4132.

COOPERATOR: _____  AGREEMENT NO.: _____  PROJECT NAME: _____  TOTAL PROJECT COST: _____		INDICATE THE ONE CATEGORY THAT BEST DESCRIBES EACH ORGANIZATION LISTED*												
		BUSINESS CLASSIFICATION		CERTIFIED MBE					NON-CERTIFIED MBE					UNKNOWN
		NON-MINORITY	SMALL BUSINESS Section 288.703(1) F.S.	AFRICAN AMERICAN	HISPANIC AMERICAN	ASIAN/HAWAIIAN AMERICAN	NATIVE AMERICAN	AMERICAN WOMAN	AFRICAN AMERICAN	HISPANIC AMERICAN	ASIAN/HAWAIIAN AMERICAN	NATIVE AMERICAN	AMERICAN WOMAN	
NAMES OF CONTRACTORS AND SUBCONTRACTORS UTILIZED	TOTAL AMOUNT PAID													

\*  Our organization does not collect minority status data.

\_\_\_\_\_  
Signature

\_\_\_\_\_  
Date

\_\_\_\_\_  
Print Name and Title

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 02, 2017*

**CONSENT AGENDA**  
**ITEM 5**

**Work Order to Automated Integration for Fiber Optic Loop Installation**

---

**Recommended Action -**

**Motion** to approve and authorize the Executive Director to execute a Work Order not-to-exceed \$86,500 to Automated Integration for installation of fiber optic communications line at the Peace River Facility.

The Peace River Water Treatment Plant is a highly automated facility that relies on the use of computerized control systems to continuously operate various chemical and treatment processes throughout the plant. These control systems are located remotely at multiple locations around the facility and connected via a communications network that utilizes a combination of older copper wiring and fiber optic technology at newer locations.

This project includes all labor, materials and equipment to install approximately 1,700 feet of new fiber optic cable at the Peace River Facility. Work includes replacing aging copper communication lines and extending existing fiber optic communication lines to complete a fiber optic loop at the facility. This communications "loop" will provide increased reliability at the facility by creating redundant communication paths to the process control equipment and auxiliary generators. Total cost for this project is \$86,500 which includes a \$20,000 Owner's Allowance.

Authority staff, in coordination with Hazen and Sawyer, developed a Scope of Work package for the installation of the fiber optic lines and all associated equipment. Bids were solicited for this work from the Authority's list of firms providing continuing services in Instrumentation and Control and Low/Medium Duty Electrical Systems. Three (3) bids were received and ranged from \$86,500 to \$175,639 with the lowest responsive, responsible bidder being Automated Integration. Staff recommendation is to approve a Work Order with Automated Integration for this installation.

**Budget Action:** - None, funds available in R&R account.

**Attachments:**

Tab A Staff Memorandum

Tab B Work Order with Automated Integration for Fiber Optic Loop Installation

TAB A  
Work Order to Automated Integration for Fiber Optic Loop Installation  
Staff Memorandum

## MEMORANDUM

**DATE:** 7/17/17  
**TO:** Patrick Lehman, Executive Director  
**THROUGH:** Mike Coates, Deputy Director  
**FROM:** Richard Anderson, System Operations Manager  
**RE:** Fiber Optic Loop Installation

---

### Recommendation –

Execute a Work Order not-to-exceed \$86,500 to Automated Integration to furnish and install approximately 1,700 feet of fiber optic communications lines at the Peace River Facility.

### Background –

The Peace River Water Treatment Plant is a highly automated facility that relies on the use of computerized control systems to continuously operate various chemical and treatment processes throughout the plant. These control systems are located remotely at multiple locations around the facility and connected via a communications network that utilizes a combination of older copper wiring and fiber optic technology at newer locations. As the treatment facility has been expanded over the years, this communications network has been extended incrementally to meet system needs on a project by project basis.

In June 2016 the Board approved WO 16-01 to Hazen and Sawyer to assess the current SCADA system and develop a SCADA Master Plan. This fiber optic project was identified through that work effort to improve our communications reliability by completing the segments installed during previous projects and creating a true fiber optic loop at the facility while at the same time removing some existing older copper wire communications equipment. This communications “loop” will provide increased reliability at the facility by creating redundant communication paths to the process control equipment and auxiliary generators.

This project includes all labor, materials and equipment to install approximately 1,700 feet of new fiber optic cable at the Peace River Facility. Work includes replacing aging copper communication lines and extending existing fiber optic communication lines to complete a fiber optic loop at the facility. Total cost for this project is \$86,500 which includes a \$20,000 Owner’s Allowance.

A Scope of Work package for the installation of the fiber optic lines and all associated equipment was developed and bids were solicited from the Authority’s list of firms providing continuing services in Instrumentation and Control and Low/Medium Duty Electrical Systems. Bids were received from 3 firms with the lowest responsive, responsible bidder being Automated Integration.

Automated Integration	\$86,500
JH Ham Engineering	\$93,697
Revere Control Systems	\$175,639

Submittals were reviewed for completeness by both Hazen and Sawyer and Authority staff. Staff recommendation is to approve a WO to Automated Integration for this work.

**TAB B**  
**Work Order with Automated Integration for Fiber Optic Loop Installation**



**GENERAL PROFESSIONAL SERVICES**

**AUTOMATED INTEGRATION**

**WORK ORDER No. \_\_\_\_\_**

**Fiber Optic Loop Installation**

**INTRODUCTION**

This Work Order No. \_\_\_\_\_ 'Fiber Optic Loop Installation' at the Peace River facility is approved this second day of August, 2017, and is incorporated by reference to the Agreement for General Professional Services (Water Facility Instrumentation & Controls and Low/Medium Duty Electrical) entered into on December 7, 2016, between the Peace River Manasota Regional Water Supply Authority (Authority) and AUTOMATED INTEGRATION for General Professional Services.

**BACKGROUND**

Work Order No. \_\_\_\_\_ provides for the installation of a fiber optic loop at the Peace River Facility as described in the PRMRWSA Instrumentation System Improvements Scope of Work (attached) and the Automated Integration Proposal #Q1882 dated June 27, 2017 (attached).

**COMPENSATION**

The Authority agrees to compensate Automated Integration on a Lump Sum Basis not-to-exceed a total value of \$86,500 as defined in the attached Automated Integration Proposal #Q1882 dated June 27, 2017. Total compensation includes an Owner's Allowance of \$20,000. Any use of Owner's Allowance must approved in writing by Authority Executive Director prior to work commencing.

General Professional Services

Work Order No. \_\_\_\_\_

**Fiber Optic Loop Installation**

IN WITNESS WHEREOF, the parties hereto have executed this Work Order as of the day and year first written above.

PEACE RIVER MANASOTA  
REGIONAL WATER SUPPLY AUTHORITY

---

Patrick J. Lehman, P.E.      Date  
Executive Director

AUTOMATED INTEGRATION

---

Steve Van Kley      Date  
President



P.O. Box 777  
Brandon, FL 33509  
Office: (813) 413-7025  
Fax: (813) 413-7022

June 27, 2017

**Q1882**

**Proposal - Peace River PRMRWSA Instrumentation System Improvements WO #1**

To: Rich Anderson  
Peace River PRWTF

Rich ;

Automated Integration (Ai) is pleased to submit the following proposal:

**Materials & Services:**

Including all the Specification Sections below:

1. Spec section 1.02-A.1
2. Spec section 1.03
3. Spec section 1.04
4. Spec section 1.05 (both)
5. Spec section 1.06
6. Spec section 1.07
7. Spec section 1.08
8. Spec section 1.09
9. Spec section 2.01-A.8-9
10. Spec section 2.01-E
11. Spec section 2.01-F
12. Spec section 2.01-G
13. Spec section 2.01-H
14. Spec section 2.01-I
15. Spec section 2.02-A

The cost for all the above is only: \$ 86,500 (tax not included)

**Limitations**

- All hardware other than that specifically listed above is either existing or by others.
- Customer to provide all design documentation associated with this proposal for equipment not supplied by Ai. This is to include, but not limited to, specifications, drawings, database(s) and PLC & SCADA code.
- Ai is not implying any warranties of any kind for any existing programs or equipment, or any warranties other than the original manufacturers' warranty.

**Terms**

- Terms are net 30 from date of invoice. Late payments will incur a 1.5% per month late fee.
- All incurred expenses will be billed at cost plus 5% for administrative costs.
- This quote is valid for 30 days from date above.

**If you have any questions please feel free to call me.**

**Sincerely,**



**Steve Van Kley  
Automated Integration  
Direct: 813.267.4776**



## PRMRWSA WATER PRWTF

### INSTRUMENTATION SYSTEM IMPROVEMENTS SCOPE OF WORK

#### 1.01 BACKGROUND

- A. PRMRWSA's Peace River Water Treatment Facility (PRWTF) includes an existing Supervisory Control and Data Acquisition (SCADA) system that allows PRMRWSA staff to monitor and control the treatment processes at the PRWTF along with remote monitoring of two off-site pump stations and eleven remote metering sites (connections to member utilities for billing purposes).
- B. The PRWTF SCADA system consists of two main programmable logic controller (PLC) network systems that have been installed in phases over the past 20 years. Both PLC networks interface with the facility's human machine interface (HMI) system, which utilizes GE iFix software. The operators use the system to monitor and control four treatment plants, each with two process trains, along with the remote stations. The four treatment plants were constructed at different times as follows
- The initial system, referred to as Phase 1 for the first treatment plant, was installed in 1994 and utilizes a GE 90-70 series PLC system as a central processor. The central processor, housed in control panel 60-CP-1, was programmed with the majority of the system control logic with interface to several remote GE PLCs acting essentially as dumb terminals.
  - The PRWTF was expanded in 2000, adding a second treatment plant referred to as Peace River Option (PRO). The PLC in control panel 60-CP-1 was expanded to include additional logic for the second treatment unit along with communications to additional remote PLCs.
  - The PRWTF was again expanded in 2009 adding third and fourth treatment plants referred to as Regional Expansion Project (REP). In this project, the remote PLCs were programmed to contain specific programming logic to provide a more distributed control approach. The new PLCs were installed to communicate with the iFix HMI through the PLC in control panel 60-CP-1.
  - The PRWTF original facility's treatment plant 1 was rebuilt and its capacity increased in 2016, referred to as the 1991 Rebuild Project (91RP). In this project, the second main PLC network was added. This main PLC is based on GE RX3i PLC components. New remote PLCs associated with 91RP are all distributed controls with individual control logic contained within the remote PLCs. The 91RP main PLC was originally intended to replace the Phase 1 main GE 90-70 PLC, but problems during construction led to this work be incomplete. As a result, this GE RX3i is installed in place of the original GE 90-70 remote I/O rack in control panel 60-CP-2 with the original GE 90-70 remote I/O rack and the GE 90-70 PLC in 60-CP-1 still in service controlling a portion of the PRWTF processes. Some of the PRWTF's PLCs communicate with both main the GE 90-70 and Rx3i PLCs to interface with the iFix HMI.
  - The PLCs on the plant network communicate through a number of main PLCs acting as data concentrators. The PLCs throughout the plant, across Kings Highway, and in the distribution system communicate over a network consisting of both fiber optic communications and copper Ethernet using SRTP, EGD, and Genius Loop communication protocols.

- C. As a result of the various expansion and improvement projects, the PRWTF's SCADA network consists of a combination of one GE 90-70 PLC, several GE 90-30 PLCs, GE Genius Modules, and GE RX3i PLCs, along with one Modicon PLC, each on separate communication networks using various network media types. Drawings have been developed to depict the existing and revised system including the following:
- Drawing I-1: Overall PRWTF site plan showing the relative location of the PLCs around the facility site southeast of Kings Highway along with approximate physical route of the fiber and metal communications cabling between PLCs.
  - Drawing I-2: Revised overall PRWTF site plan showing the new components to be added to or in replacement of existing PLCs and media runs.
  - Drawing I-3: Existing system network media paths showing the interconnection of the PLCs throughout the facility including devices southwest and east of the plant site and across Kings Highway that are not shown on the PRWTF site plan.
  - Drawing I-4: Existing system network logic diagram showing the separate communications protocols used by the various systems installed.
  - Drawing I-5: Revised network diagram showing the new configuration of network devices and PLCs using all EGD communications and eliminating the SRTP and Genius Loop protocols.
  - Drawing I-6: Existing interconnect cabling diagram for panels 60-CP-1 and 60-CP-2 housing the existing main PLCs.
  - Drawing I-7: Revised interconnect cabling diagram for panels 60-CP-1 and 60-CP-2 for configuration to be constructed under this project.
- D. Under this project, it is PRMRWSA's intent to contract with the pre-qualified INTEGRATOR(s) already under contract with PRMRWSA to make the following improvements to the SCADA system to provide a long term, reliable, sustainable system that eliminates obsolete components and simplifies operation and maintenance:
- Replace all functions of, and remove, the original GE 90-70 main PLC in 60-CP-1. Existing logic within the GE 90-70 PLC is to be re-developed and programmed into the various remote PLCs that control specific processes to create a distributed control network of PLCs.
  - Modify the existing fiber optic PLC network communications to eliminate some select single points of failure.
  - Upgrade select critical plant PLCs to convert from GE 90-30s to GE Rx3i PLCs.
  - Add PLC logic within select critical plant PLCs to provide peer-to-peer heart beat verification for alerting operations staff of possible trouble within the system's control logic that impacts process efficiency and ability to maintain permit conditions.
  - Expand the capabilities of the existing iFix HMI system.
  - Begin migration to EGD communications protocol for select PLCs off of the SRTP communications protocol and a select number of Genius Loop devices.

## 1.02 DIVISION OF SCOPE BY WORK ORDERS

- A. The work will be implemented in five separate work orders issued by PRMRWSA as listed below. Each Integrator invited to bid on this work is to offer a quote for the work divided into these five work orders. Decision on who will be awarded each work order will be a PRMRWSA's sole discretion and distribution of the work among the invited bidders could be any, all, or none of the work orders based on what best suits PRMRWSA's needs and is not necessarily limited to the lowest quote for the work.
1. **Work Order 1:** Complete fiber optic loop changes including the initial base line fiber test of the existing cable. The quote for this work order shall include an allowance of \$20,000 for replacing cable. The use of this allowance shall be as authorized by PRMRWSA and any unused portion of this allowance shall be returned to PRMRWSA as part of a final change order to the work.
  2. **Work Order 2:** Hardware and programming required to entirely replace the GE9070 in 60-CP-1 and its associated I/O in 60-CP-2 as described herein. This work will include a temporary Genius loop module added to the Rx3i lineup in 60-CP-2 until WO3 is complete. This work will include temporary programming of existing GE9030s in panels 60-CP-2, 60-CP-3, 35-CP-2, 35-CP-5, 100-CP-6, and 190-CP-2. This will also include more permanent programming in panels 100-CP-1 thru 4, 110-CP-1, 125-CP-3 and 4, 145-CP-1 thru 3, 155-CP-1 and 2, and 130-CP-1 thru 5. This programming is intended to move programs related to the high service pumps, chemical feed, and emergency power out of the GE9070 into the associated panels for each process.
  3. **Work Order 3:** Hardware and programming required to replace Genius hardware/software with GERx3i's and remote I/O as described herein (at locations noted herein not already being replaced under previous contract) with EGD communications to the plant network.
  4. **Work Order 4:** Purchase of all hardware components required to replace a select number of GE9030's with GERx3i's as noted herein.
  5. **Work Order 5:** Using the hardware purchased under WO4, installation of the hardware and programming required for replacing the noted GE9030's and to convert all communications on the plant network to EGD.

## 1.03 GENERAL REQUIREMENTS (as applicable to all work orders)

- A. INTEGRATOR's invited to provide quotes for the five work orders shall have visited the site of the work prior to submission of the bid in order to become familiar with the existing systems in order to include all necessary work effort required to meet the stated objectives. This site visit is mandatory to be fully responsive to the bids and visitation shall be recorded in writing on the day of the visit. Call 863-993-4565 to make an appointment for each visit.
- B. A thumb drive with the applicable PLC and HMI programs will be provided to each bidder upon request.
- C. Provide all components, cabling, conduit, programming, and labor necessary to achieve the intent of the specified improvements under this project as defined above. This includes all programming required at various plant PLCs as generally described herein as well as programming required at the iFIX level and for network communications to restore and/or upgrade all control and monitoring functions impacted by changes made.

- D. Perform the work in a manner that allows operations staff to continue to deliver potable water to PRMRWSA customers without interruption in pressure and demand, with water quality that meets or exceeds permit conditions.
- E. Implement and document all new or upgraded programming following the standards set by PRMRWSA for programming approach and techniques, full and complete internal commenting, address and registry numbering, backup protocols, database management, and communications.
- F. Demonstrate completed work to verify to PRMRWSA staff that all functions of a given system have been restored and are reliably controlling and allowing monitoring of the systems involved.
- G. Provide record documentation of, and training to PRMRWSA staff for, completed work as each individual work item is complete in order for PRMRWSA to comfortably resume control and monitoring of the process modified.

1.04 PROJECT MEETINGS (all work orders)

- A. Schedule and attend an initial coordination meeting with the PRMRWSA staff and/or representatives prior to beginning any other work. At a minimum, the INTEGRATOR's project manager and lead programmer shall attend this meeting. This meeting shall be held within 10 days of the written Notice to Proceed being issued by PRMRWSA. Provide the following at this meeting:
  - Base line Project Schedule
  - Proposed Schedule of Values to be used for payment applications
  - Resumes of proposed personnel to be used on the project showing a minimum of five years for experience on projects performing similar work using the same hardware and software systems used on this project
  - Proposed sequence of construction
  - List of anticipated submittals
  - Examples of proposed programming methods and formats

See "SUBMITTALS" for requirements for the above documents to be submitted at this meeting.

- B. Attend weekly coordination meetings with PRWTF staff to review completed work, provide a two week look ahead on proposed upcoming work, and plan the work to coordinate with PRMRWSA staff needs.
- C. Attend monthly progress meetings with PRMRWSA staff and/or representatives to review an updated Project Schedule, review the Pay Application, and discuss the general progress of the project and any problems that impact time or cost.
- D. Attend submittal review meetings for the hardware, wiring diagram and software submittals (written GE 90 70 subroutine transfer plan, example new/redeveloped subroutines programming, and written control strategy for chemical feeds and high service pump programs). These meetings can be held concurrent with one of the weekly coordination meetings.



1.05 SUBMITTALS (as applicable to all work orders)

- A. Base line Project Schedule and updates: The developed schedule shall employ computerized Critical Path Method (CPM) scheduling. Method employed to depict the schedule shall be bar graph style showing sequence ties between tasks, the critical path high-lighted, and columns for listing task numbers, task description, start and stop dates, float, and other information as noted herein. Constraints for the content and handling of the schedule include:
1. Activity durations shall be in whole working days. The workday calendar date correlation shall include an allowance for standard holidays and weekends.
  2. Requested changes to the construction progress schedule impacting plant operations shall require notification to PRMRWSA in writing stating what changes are proposed and the reason for the change. If changes are accepted, revise and submit, without additional cost to the Owner, a complete updated construction progress schedule showing the changes made.
  3. Schedule dates which show completion of all work prior to the contract completion date shall, in no event, be the basis for claim for delay against PRMRWSA.
  4. Construction progress schedules and related items which contain activities showing negative float or which extend beyond the contract completion date will not be accepted.
  5. Whenever it becomes apparent from an updated construction progress schedule that delays to the critical path have resulted and the contract completion date will not be met, take some or all of the following actions at no additional cost to PRMRWSA once approved or so directed by PRMRWSA:
    - a. Increase manpower in such quantities and crafts as will substantially eliminate the backlog of work.
    - b. Increase the number of working hours per shift, shifts per day, working days per week, or any combination of the foregoing, sufficiently to substantially eliminate the backlog of work.
    - c. Reschedule activities to achieve maximum practical concurrency of activities to comply with the revised schedule.
  6. The contract time will be adjusted only in accordance with PRMRWSA's general conditions. If PRMRWSA finds that an extension of the contract completion date is justified, PRMRWSA's determination as to the total number of day's extension shall be based upon the current construction progress schedule and on all data relevant to the extension. Such data shall be included in the next updating of the schedule and related items. Actual delays in activities which, according to the construction progress schedule, do not affect any contract completion date will not be the basis for a change therein.
  7. Float or slack time within the construction schedule is not for the exclusive use or benefit of either the PRMRWSA or the Contractor, but is jointly owned, as an expiring

project resource available to both parties as needed to meet contract milestones and completion dates. PRMRWSA controls the float time and, therefore, without obligation to extend either the overall completion date or any intermediate completion dates PRMRWSA may initiate changes that absorb float time only. INTEGRATOR-initiated changes that encroach on the float time may be accomplished only with PRMRWSA's concurrence. Such changes, however, shall give way to PRMRWSA-initiated changes competing for the same float time.

8. Monthly progress payment amounts shall be determined from the monthly progress updates of the CPM schedule activities correlated with the Schedule of Values.
  9. INTEGRATOR is responsible for determining the sequence of activities, the time estimates of the detailed activities and the means, methods, techniques and procedures to be employed.
  10. Task activities shall include: work activities, submittals, procurement of materials and equipment (fabrication and delivery), installation, and testing, start-up and training.
  11. Schedule shall reflect consultations with any subcontractors and/or suppliers relating to construction progress and subcontractors/suppliers shall receive copies of the Contractor's Construction Schedule and shall be continually advised of any updates or revisions to the Construction Schedule as the work progresses. INTEGRATOR shall be solely responsible for ensuring that all subcontractors comply with the requirements of the schedule for their portions of the work.
  12. Schedule submittals including revisions and updates shall be hard copies when submitted at meetings follow up with electronic versions in searchable PDF format.
  13. Monthly schedule updates shall be submitted with the Application for Payment.
  14. Two week look ahead schedule shall be provided for each weekly meeting showing the items worked the previous week and those scheduled to be in progress during the next two (2) weeks.
- B. Schedule of Values: A detailed schedule of values shall be submitted that is sufficient to determine appropriate monthly progress payment amounts based on line items listed in the approved Project Schedule such that percent completes for a particular task will assist in establishing the amount due each month. If, in the opinion of the PRMRWSA, a greater number of Schedule of Value items than initially proposed by the INTEGRATOR is necessary, the INTEGRATOR shall add the additional items so identified by the Owner.
- C. Submit names of proposed personnel to execute the work. If proposed personnel differs from that staff already presented to PRMRWSA as part of the existing contract with PRMRWSA, submit resumes of such additional personnel with lists of project applicable network, GE, and/or iFIX experience with references and contact names, along with software and hardware utilized in the project.
- D. Sequence of Construction Plan: A written plan for the sequencing of the work, correlated with tasks listed in the Project Schedule shall be submitted. The Sequence of Construction Plan shall incorporate the following constraints:

1. Begin activities with a simple task to gage ability of integrator personnel to perform and communicate adequately.
  2. Restrict activities to one chemical skid, one plant, one process section, all as pre-approved by PRMRWSA, one at a time so that implemented changes can be adequately proven before applying toward other similar systems.
  3. Include, at a minimum, a 2-day test of the first of any program change before moving on to next similar area (to avoid copying program with bugs in it for the same processes). PRMRWSA may reduce the test period duration at their discretion.
  4. Provide a recovery plan to recover control if problems occur (such as preserving the original program for reload if needed) and perform a daily check with PRMRWSA staff of revised work before leaving the site. Develop instructions for night and weekend PRMRWSA staff for changes in operating procedures along with providing a 24-hr on-call contact number in case of any difficulties.
  5. Uploads of new programming must be done before 12 noon with testing in the afternoon complete by 4 pm.
  6. No Friday uploads – reserve this day for pre-planning of next week (weekly progress meetings).
  7. Daily upload of updated and accepted programs are required so night crew has the proper backup download if something requires complete reboot.
  8. PRMRWSA staff must be present during any software upload and at any time hardware or cabling in the field is modified.
- E. Hardware: Submit information for all new hardware components including, but not necessarily limited to, the following:
1. Product (item) name and tag number.
  2. Catalog cuts.
  3. Manufacturer's complete model number with complete identification of standard, user's choice (settings, parameters, ratings, materials, etc.), and optional features being provided.
  4. Location of the device and wiring interface diagrams.
  5. Physical size with dimensions, weight, heat output, power consumption, and mounting details.
  6. Installation, handling, and storage requirements.

- F. **Wiring Diagrams:** Submit proposed wiring and cabling diagrams for all revised PLC panels and network enclosures / pull boxes. Diagrams shall be in sufficient detail to function as form record documentation for future maintenance and troubleshooting purposes. Diagrams shall indicate proposed type of cable, color coding of cable, labeling at both ends of each cable, termination type used, and routing of all cables identifying connection port / terminal on each hardware component or field wiring terminal within an enclosure.
  - G. **Software:** Submit information on proposed software programming including, but not necessarily limited to, the following:
    1. Prior to any programming, submit a written plan identifying which existing GE 90-70 subroutines will be transferred to other PLCs and which subroutines will be eliminated. For transferred subroutines, identify the PLC the logic will be transferred to along with indication of whether the subroutine will be modified in some manner. For subroutines to be eliminated, provide written explanation of why the logic is no longer needed.
    2. Prior to programming transfer or redevelopment of a subroutine within another PLC, submit an example for each typical type of subroutine showing the intended level of commenting, handling and conditioning of real and internally generated I/O, use of programming blocks and ladder logic, and format for external communication of data over the network.
    3. Prior to programming, submit a written control strategy to describe the proposed control logic functionality for any subroutine being modified (particularly for all chemical feeds and high service pump programs). Supplement these written control strategies with examples of the HMI interface display related to the proposed changes in PLC logic.
    4. Submit a modified PLC input/output schedule for any existing PLC panel where field I/O was modified and where additional or modifications to internal data registers were made. List complete addresses and tagnames for each point following PRMRWSA standards.
    5. Submit an updated record of the modified HMI database including HMI tagname with corresponding PLC register cross reference, scales, functions, etc.
    6. Upon successful testing and acceptance of hardware / software modifications for any particular area, submit complete electronic files for the fully commented PLC programming, along with a searchable pdf electronic copy and an 8.5x11 hard copy of the completed software.
  - H. All submittals are to be made electronically via email attachments or through an accessible file sharing site for larger files. Electronic files shall be in searchable pdf format. Send submittals to both the Engineer and PRMRWSA designated staff for simultaneous review. Engineer will combine all comments from reviewers in the returned submittal response.
- 1.05 **OPERATION AND MAINTENANCE MANUALS AND RECORD DRAWINGS (as applicable to all work orders)**
- A. Provide manufacturer's equipment operation and maintenance manuals for all new components used. The manuals shall contain all illustrations, detailed drawings, wiring

diagrams, and instructions necessary for installing, operating, and maintaining the equipment. The illustrated parts shall be numbered for identification. All modifications to manufacturer standard equipment and/or components shall be clearly identified and shown on the drawings and schematics. All information contained therein shall apply specifically to the equipment furnished and shall only include instructions that are applicable. All such illustrations shall be incorporated within the printing of the page to form a durable permanent reference. Submit two hard copies of the information and one electronic copy in pdf format.

- B. Provide list of all configuration tables for hardware settings with references to excerpts from the submitted manufacturer's literature to back up the reasoning for configuration settings made. Highlight any settings that are different from the factory default settings.
  - C. Provide written standard operating procedures (SOPs) for all new software programming to explain why and how programming ladder logic and iFIX operator interface software works. Submit the proposed SOP prior to making any software changes to utilize the proposed SOP as a pre-programming guide. Update the SOP upon successful implementation of the programming for any steps that might have changed during installation and testing of the programming. Write these instructions in step by step format with reference to embedded figures to illustrate the steps taken. SOPs shall be submitted in MSWord doc format that will allow for on-going future updates as well as in a searchable pdf file format.
  - D. Provide a list of all software versions supplied with expiration dates on licenses.
  - E. Submit 11x17 hard copies, the dwg files used to create the drawings, and electronic searchable pdf files for the as-built conditions. Drawings shall be created for all cabling modifications made within any control panel, updated network diagram for all copper and fiber network cabling installed or modified, and an updated network cabling route site location map drawing for the installed work.
- 1.06 SHIPPING, HANDLING, AND STORAGE (as applicable to all work orders)
- A. Follow all manufacturer's shipping, handling and storage requirements for all new components and ancillary devices. For hardware purchased under Work Order 4, ship and properly store the components at a secure location until ready for installation under Work Order 5 then reship the components at a time and to a location as requested by PRMRWSA or their representative.
- 1.07 INSTALLATION (as applicable to all work orders)
- A. All work shall conform to all applicable codes and standards and be in accordance with manufacturer's recommendations.
  - B. All work shall be performed by qualified craftsmen in accordance with the standards of workmanship in their profession and shall have had a minimum of five years of documented experience on similar projects.
  - D. All equipment and materials shall fit properly in their installations. Any required work to correct improperly fit installations shall be performed at no additional expense to the Owner.
  - E. Provide all required cutting, drilling, inserts, supports, bolts, and anchors as needed and securely attach all equipment and materials to supports.

1.08 STAFF TRAINING (as applicable to all work orders)

- A. Provide operator training in sufficient duration and content to allow PRMRWSA staff to accept the modified systems and resume normal control and monitoring operations. Operator training shall be conducted at the site utilizing existing operator work stations for operators to have hands on training on each modified system. Operator training shall be conducted upon completion of each individual area of work prior to turning over the modified system to PRMRWSA staff for taking over control. As a minimum, provide training for:
- **Work Order 5**: operator training for each chemical system subroutine migration (ammonia, hypochlorite, polymer, PAC, NaOH, and Alum) – 1 hour per system to be conducted prior to turning over to operations staff.
  - **Work Order 2**: operator training for the modified high service pump control sequence – 2 hours of training conducted prior to turning over to operations staff.
- B. **Work Orders 2, 3, and 5**: Provide maintenance staff training/updates to modify network changes (routing and communication protocols used) and on the maintenance requirements for any new equipment or programming installed. Provide services to make minor changes to software as requested by PRMRWSA's staff (to be documented on the final as-built documents at final completion). This training/update work shall be conducted on an as needed basis as determined by PRMRWSA staff. For each work order indicated, include an allowance of \$10,000 for this work. Any unused portion of these allowances shall be returned to PRMRWSA as part of a final change order to the work.

1.09 WARRANTY (all work orders)

- A. The INTEGRATOR shall provide a 1 year warrantee starting at the date of substantial completion (acceptance by PRMRWSA staff for the work under each particular Work Order). The warrantee shall cover all workmanship and defects associated with the work. In addition, the INTEGRATOR shall transfer all standard warrantees for any hardware purchased and installed by the INTEGRATOR under each work order.

PART 2 -- PRODUCTS

2.01 NEW AND MODIFIED HARDWARE

A. Existing Panel Modifications:

1. Work Order 2 - 60-CP-1:

- a. Migrate existing I/O for GE 90-70 PLC modules as follows:

<u>Existing I/O Point</u>	<u>Migration Requirements</u>
<b>Rack 0, Slot 6 Digital Inputs</b>	
Input 1 – spare	---
Input 2 – 60-CP-1 Running	Move to 60-CP-3, new Rx3i
Input 3 – 60-CP-1 In Hand	Move to 60-CP-3, new Rx3i
Input 4 – 60-CP-1 In Auto	Move to 60-CP-3, new Rx3i
Inputs 5 through 16 - spares	---
<b>Rack 0, Slot 7 Digital Inputs</b>	
Input 17 – 45-2G In Hand	No longer required
Input 18 – spare	---
Input 19 – 45-2G Opened	No longer required
Input 20 – 45 2G Closed	No longer required
Input 21 – 45 3B In Auto	No longer required
Input 22 – 45 3B In Hand	No longer required
Input 23 – 45 3B Opened	No longer required
Input 24 – 45 3B Closed	No longer required
Inputs 25 through 28 - spares	---
Input 29 – 45 3G In Auto	No longer required
Input 30 – 45 3G In Hand	No longer required
Input 31 – 45 3G Opened	No longer required
Input 32 – 45 3G Closed	No longer required
<b>Rack 0, Slot 8 Digital Outputs</b>	
Output 17 – 60-CP-1 Start	Move to 60-CP-3, new Rx3i
Outputs 18 through 20 - spares	---
Output 21 – Open 45-2G	No longer required
Output 22 – Close 45-2G	No longer required
Output 23 – Open 45-3B	No longer required
Output 24 – Close 45-3B	No longer required
Outputs 25 through 28 – spares	---
<b>Rack 0, Slot 9 Analog Inputs</b>	
Input 1 – DeSoto Flow	Move to 60-CP-2, existing Rx3i
Input 2 – KTM Flow	Move to 60-CP-2, existing Rx3i
Input 3 – 60 Pressure	Move to 60-CP-3, new Rx3i
Inputs 4 and 5 – spares	---
Input 6 – 60-CP-1 Current	Move to 60-CP-3, new Rx3i
Inputs 7 and 8 - spares	---

- b. For I/O to extend to existing Rx3i in 60-CP-2, provide terminal blocks within 60-CP-1 to land existing I/O wires then extend signals to I/O in 60-CP-2 with new cable and conduit installed between 60-CP-1 and 60-CP-2.
- c. For I/O to extend to new Rx3i in 60-CP-3, either provide terminal blocks within 60-CP-1 to land existing I/O wires then extend signals to I/O in 60-CP-3 with new cable and conduit (or in existing cable tray) installed between 60-CP-1 and 60-

CP-3 OR provide new cable and conduit (or in existing cable tray) between the field device and 60-CP-3.

- d. Remove GE 90-70 PLC after successful migration of all necessary logic as noted herein.
- e. Complete network modifications as noted herein and on the Drawings including a new managed network switch and new UPS for backup uninterrupted power for the new switch.

2. **Work Order 2 - 60-CP-2:**

- a. Migrate existing I/O for GE 90-70 Remote I/O modules as follows:

<b><u>Existing I/O Point</u></b>	<b><u>Migration Requirements</u></b>
<b>Rack 1, Slot 4 Digital Inputs</b>	
Input 33 – Power Input	---
Input 34 – 60-CP-5 Running	Move to 60-CP-3, new Rx3i
Input 35 – 60-CP-5 OL	Move to 60-CP-3, new Rx3i
Input 36 – 60-CP-5 Fault	Move to 60-CP-3, new Rx3i
Inputs 37 and 38 – spares	---
Input 39 – 60-CP-5 In Hand	Move to 60-CP-3, new Rx3i
Input 40 – 60-CP-1 In Auto	Move to 60-CP-3, new Rx3i
Inputs 41 through 48 - spares	---
<b>Rack 1, Slot 5 Digital Outputs</b>	
Output 1 – 60-CP-5 Start	Move to 60-CP-3, new Rx3i
Outputs 2 and 3 - spares	---
Output 4 – Open 45-3G	No longer required
Output 5 – Close 45-3G	No longer required
Output 6 – Alarm Horn	Move to 60-CP-2, existing Rx3i
Output 7 – Alarm Light	Move to 60-CP-2, existing Rx3i
Output 8 – Alarm Speaker	Move to 60-CP-2, existing Rx3i
Outputs 9 through 16 – spares	---
<b>Rack 1, Slot 6 Analog Inputs</b>	
Input 9 – 60-CP-5 Current	Move to 60-CP-3, new Rx3i
Inputs 10 through 12 – spares	Move to 60-CP-2, existing Rx3i
Input 13 – GST 3 Level	Move to 60-CP-2, existing Rx3i
Inputs 14 and 15 – spares	---
Input 16 – N Reg Flow	Move to 60-CP-2, existing Rx3i
<b>Rack 1, Slot 7 Analog Inputs</b>	
Input 17 – spare	---
Input 18 – 60 CL2	Move to 60-CP-2, existing Rx3i
Input 19 – 2A Pressure	Move to 60-CP-3, new Rx3i
Input 20 – 2A High Flow	Move to 60-CP-2, existing Rx3i
Input 21 – 2A Low Flow	Move to 60-CP-2, existing Rx3i
Input 22 – Combined Turbidity	Move to 60-CP-2, existing Rx3i
Inputs 23 and 24 – spares	---
<b>Rack 1, Slot 8 Analog Outputs</b>	
Output 1 – spare	---
Output 2 – 2A Flow Total	Move to 60-CP-2, existing Rx3i
Outputs 3 and 4 – spares	---
<b>Rack 1, Slot 8 Analog Outputs</b>	
Outputs 5 through 8 - spares	---



- b. Re-install or replace wiring harnesses for the existing Rx3i PLC I/O modules.
  - c. For I/O to extend to existing Rx3i in 60-CP-2, move existing wire from I/O on the GE 90-70 remote I/O module to I/O on the Rx3i lineup.
  - d. For I/O to extend to new Rx3i in 60-CP-3, either provide terminal blocks within 60-CP-2 to land existing I/O wires then extend signals to I/O in 60-CP-3 with new cable and conduit (or in existing cable tray) installed between 60-CP-2 and 60-CP-3 OR provide new cable and conduit (or in existing cable tray) between the field device and 60-CP-3.
  - e. Provide new radio communications module and programming for the Rx3i suitable for managing existing radio communications with the remote RTU sites for interface with iFIX (replaces functions in the GE 90-70).
  - f. Remove GE 90-70 Remote I/O and all support hardware (to allow door to properly close and secure) after successful migration of all necessary logic as noted herein.
  - g. Complete network modifications as noted herein and on the Drawings.
3. **Work Order 2 - 60-CP-3:** Replace the existing GE 90-30 PLC with a new GE Rx3i PLC matching existing I/O and programming in addition to migrated I/O from the GE 90-70 PLC as noted above. Provide a new managed network switch and fiber converter. Add programming as noted herein for the high service pumps. All GE 90-30 modules for power supply, CPU, network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in 60-CP-3 includes:
- a. Four, 16 point, 24Vdc inputs, IC693MDL241 – total of 64 DI's
  - b. One, 16 point output relays, 2A IC693MDL940 – total of 16 DO's
  - c. Two, 4 channel, 4-20mA inputs, IC693ALG221 – total of 8 AI's
  - d. One, 16 channel, 4-20mA inputs, IC693ALG223 – total of 16 AI's
  - e. One, 8 channel, 4-20mA outputs, IC693ALG392 – total of 8 AO's
4. **Work Order 4 and 5 - 35-CP-2:** Replace the existing GE 90-30 PLC with a new GE Rx3i PLC matching existing I/O and programming. Provide a new managed network switch and fiber converter. All GE 90-30 modules for power supply, CPU, network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in 35-CP-2 includes:
- a. Nine, 16 point, 24Vdc inputs, IC693MDL241 – total of 144 DI's
  - b. Four, 16 point output relays, 2A IC693MDL940 – total of 64 DO's
  - c. Seven, 4 channel, 4-20mA inputs, IC693ALG221 – total of 28 AI's
  - d. Two, 8 channel, 4-20mA outputs, IC693ALG392 – total of 16 AO's
5. **Work Order 4 and 5 - 35-CP-5:** Replace the existing GE 90-30 PLC with a new GE Rx3i PLC matching existing I/O and programming. Provide a new managed network switch and fiber converter. Add connections to the patch panel and network equipment for the new fiber cable between 35-CP-5 and 100-CP-6. All GE 90-30 modules for power supply, CPU, network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in 35-CP-5 includes:

- a. Fifteen, 16 point, 24Vdc inputs, IC693MDL241 – total of 240 DI's
  - b. Five, 16 point output relays, 2A IC693MDL940 – total of 80 DO's
  - c. Seven, 4 channel, 4-20mA inputs, IC693ALG221 – total of 28 AI's
  - d. Two, 16 channel, 4-20mA inputs, IC693ALG223 – total of 32 AI's
  - e. Two, 8 channel, 4-20mA outputs, IC693ALG392 – total of 16 AO's
6. **Work Order 4 and 5 - 100-CP-6:** Replace the existing GE 90-30 PLC with a new GE Rx3i PLC matching existing I/O and programming. Provide a new managed network switch and fiber converter. Add connections to the patch panel and network equipment for the new fiber cable between 35-CP-5 and 100-CP-6. All GE 90-30 modules for power supply, CPU, network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in 100-CP-6 includes:
- a. Six, 16 point, 24Vdc inputs, IC693MDL241 – total of 96 DI's
  - b. Three, 16 point output relays, 2A IC693MDL940 – total of 48 DO's
  - c. Four, 4 channel, 4-20mA inputs, IC693ALG221 – total of 16 AI's
  - d. One, 16 channel, 4-20mA inputs, IC693ALG223 – total of 16 AI's
7. **Work Order 4 and 5 - 190-CP-2:** Replace the existing GE 90-30 PLC with a new GE Rx3i PLC matching existing I/O and programming. Provide a new managed network switch. Add programming as noted herein for the generator breakers. All GE 90-30 modules for power supply, CPUs (this PLC has a coprocessor), network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in 190-CP-2 includes:
- a. Three, 16 point, 24Vdc inputs, IC693MDL241 – total of 48 DI's
  - b. One, 16 point output relays, 2A IC693MDL940 – total of 16 DO's
  - c. Four, 4 channel, 4-20mA inputs, IC693ALG221 – total of 16 AI's
  - d. One, 16 channel, 4-20mA inputs, IC693ALG223 – total of 16 AI's
8. **Work Order 1 - 190-CP-3:** Add connections to the patch panel and network equipment for the new fiber cable between 190-CP-3 and 90-CP-1.
9. **Work Order 1 - 90-CP-1:** Add connections to the patch panel and network equipment for the new fiber cable between 190-CP-3 and 90-CP-1.
10. **Work Order 3 - 51-CP-S1, 51-CP-S2, and 51-CP-T1:** Replace the existing GE 90-30s and genius loop modules with new GE Rx3i's matching existing I/O and programming that use EGD direct communications through the plant network to the iFIX database and Profinet protocol to the associated slave remote I/O as noted on the drawings. Work shall match that being installed under separate contract with JH Ham for similar ASR well arrangements as noted on the Drawings. All Genius modules for power supply, CPU, network communications, and I/O (including spares) shall be replaced with equivalent modules for the new GE Rx3i. Existing I/O in the panels includes:
- a. 51-CP-S1 (remote I/O)
    - 1) Two, 16 point, Genius IC660BBD020 – total of 32 DI/DO's
    - 2) One, 6 channel, 4-20mA inputs, Genius IC660BBA026 – total of 6 AI's
    - 3) One, 4 in, 2 out, 4-20mA, Genius IC6660BBA024 – 4 AI's / 2 AO's
  - b. 51-CP-S2 (remote I/O)
    - 1) Two, 16 point, Genius IC660BBD020 – total of 32 DI/DO's

- 2) One, 6 channel, 4-20mA inputs, Genius IC660BBA026 – total of 6 AI's
  - 3) One, 4 in, 2 out, 4-20mA, Genius IC6660BBA024 – 4 AI's / 2 AO's
- c. 51-CP-T1 (CPU for local I/O and remote I/O listed above)
- 1) Two, 16 point, 24Vdc inputs, IC693MDL241 – total of 32 DI's
  - 2) One, 8 point output relays, 2A IC693MDL930 – total of 8 DO's
  - 3) Two, 4 channel, 4-20mA inputs, IC693ALG221 – total of 8 AI's
  - 4) One, 2 channel, 4-20mA outputs, IC693ALG391 – total of 2 AO's
11. **Work Order 3 - 51-CP-6, 51-CP-7, 51-CP-8, and 51-CP-5:** Replace GE 90-30s and genius loop modules with new remote I/O for the associated GE Rx3i master PLC, matching I/O and programming using Profinet communications to the master PLC. Work shall match that being installed under separate contract with JH Ham for similar ASR well arrangements as noted on the Drawings.
- a. 51-CP-S6 (remote I/O)
- 1) Two, 16 point, Genius IC660BBD020 – total of 32 DI/DO's
  - 2) One, 6 channel, 4-20mA inputs, Genius IC660BBA026 – total of 6 AI's
  - 3) One, 4 in, 2 out, 4-20mA, Genius IC6660BBA024 – 4 AI's / 2 AO's
- b. 51-CP-S7 (remote I/O)
- 1) Two, 16 point, Genius IC660BBD020 – total of 32 DI/DO's
  - 2) One, 6 channel, 4-20mA inputs, Genius IC660BBA026 – total of 6 AI's
  - 3) One, 4 in, 2 out, 4-20mA, Genius IC6660BBA024 – 4 AI's / 2 AO's
- c. 51-CP-S8 (remote I/O)
- 1) Two, 16 point, Genius IC660BBD020 – total of 32 DI/DO's
  - 2) One, 6 channel, 4-20mA inputs, Genius IC660BBA026 – total of 6 AI's
  - 3) One, 4 in, 2 out, 4-20mA, Genius IC6660BBA024 – 4 AI's / 2 AO's
- d. 51-CP-S5 (CPU for local I/O and remote I/O listed above)
- 1) One, 16 point, 24Vdc inputs, IC693MDL241 – total of 16 DI's
  - 2) Two, 8 point output relays, 2A IC693MDL930 – total of 16 DO's
  - 3) Two, 4 channel, 4-20mA inputs, IC693ALG221 – total of 8 AI's
  - 4) One, 2 channel, 4-20mA outputs, IC693ALG391 – total of 2 AO's
12. **Work Order 3 - 51-CP-3 and 51-CP-9:** Replace GE 90-30s and genius loop modules with new remote I/O for the associated GE Rx3i master PLC, matching I/O and programming using Profinet communications to the master PLC. Work shall match that being installed under separate contract with JH Ham for similar ASR well arrangements as noted on the Drawings
- a. 51-CP-S3 (CPU for local I/O)
- 1) One, 16 point, 24Vdc inputs, IC693MDL241 – total of 16 DI's
  - 2) One, 8 point output relays, 2A IC693MDL930 – total of 8 DO's
  - 3) Two, 4 channel, 4-20mA inputs, IC693ALG221 – total of 8 AI's
  - 4) One, 2 channel, 4-20mA outputs, IC693ALG391 – total of 2 AO's
- b. 51-CP-S9 (CPU for local I/O)
- 1) One, 16 point, 24Vdc inputs, IC693MDL241 – total of 16 DI's
  - 2) One, 8 point output relays, 2A IC693MDL930 – total of 8 DO's

- 3) Two, 4 channel, 4-20mA inputs, IC693ALG221 – total of 8 AI's
- 4) One, 2 channel, 4-20mA outputs, IC693ALG391 – total of 2 AO's

- B. **Work Order 3 and 5 - Existing PLC Network Modifications:** Provide all hardware and programming necessary to eliminate all existing SRTP communications and all GE Genius loop communications between PLCs within the system. Communication protocol shall utilize EGD communications with direct connection to the iFIX database such that any loss in communications to any PLC will result in question marks (???'s) filling the data fields on the iFIX operator display screens for all I/O associated with a particular PLC.
- C. **Work Order 2, 3, 4, and 5 - PLC Components:** The INTEGRATOR shall furnish PLC's as specified herein and as shown on the Drawings. PLC's shall be provided complete with power supplies, I/O cards, special function cards, instructions, memory, input/output capacity, and appurtenances to provide all features and functions as described herein.
1. New PLC's shall be GE Ri3x series PLCs, no substitutions, designed to operate in an industrial environment with an ambient temperature range of 0 – 60 degrees Celsius and a relative humidity of 5-95 percent, non-condensing. PLC's shall operate on 120V supply voltage from an existing UPS source in the control panel housing the PLC components.
  2. Each new PLC and remote I/O chassis shall be equipped with two power supplies configured as a redundant pair fed by the panel UPS. If one power supply fails, the PLC or remote I/O shall continue to operate without disruption and the power supply failure shall be indicated in a memory register for remote monitoring. PLC power supplies shall be as recommended by GE and shall match existing similar equipment at this facility.
  3. PLC memory, communications, I/O modules, and processor shall be adequate for all control functions specified.
  4. The amount of RAM to be provided with each PLC shall be adequate for all specified functions, with at least 40% of the RAM reserved for future use. Non-volatile storage shall be provided with each PLC on a 1 GB Secure Digital memory card.
  5. PLC communications shall be based on Ethernet/IP. Each PLC Ethernet module shall be configured for communication on the PLC Network.
  6. In addition to a communications port for the network, communication ports shall be provided for any other devices required (e.g., operator interface unit) plus an additional communication port for connection to a notebook computer.
  7. Input/output hardware shall be GE Rx3i series chassis mounted modules. Each unit shall handle the required number of process inputs and outputs to match the replace GE 90-30s.
  8. Discrete inputs to the PLC shall be through isolated discrete input modules to match devices currently used at the facility for both number of channels and input voltage. Modules shall be 16 point, 24Vdc.

9. Discrete outputs from the PLC shall be through isolated discrete output modules to match devices currently used at the facility for both number of channels and input voltage. Modules shall be 16 point, 24Vdc.
10. Analog inputs shall be through analog input modules to match devices currently used at the facility for both number of channels and signal type. Modules shall be 4 channel, isolated, 4-20mA.
11. Analog outputs shall be through analog output modules to match devices currently used at the facility for both number of channels and signal type. Modules shall be 4 channel, 4-20mA.
12. Input/output modules shall be configured for ease of wiring and maintenance. The modules shall be connected to wiring arms which can be disconnected to permit removal of a module without disturbing field wiring. Covers shall be provided to prevent operator personnel from inadvertently touching the terminals. The process interface modules shall be provided with screw-type terminal blocks with barriers between adjacent terminals for connection of field inputs. Terminals shall be suitable for accepting up to and including No. 14 AWG wire. Indicating lights shall be provided for status indication for each input and output point.
13. Remote I/O shall be PLC rack type I/O as manufactured by the PLC manufacturer. Remote I/O communication modules shall be modular and individually replaceable. Slave remote I/O shall communicate with the master PLC using Profinet communications.
14. The PLC software package shall consist of all simulation, programming, configuration, and documentation software needed to place new PLC's in satisfactory operation and fully replace the functionality of the replaced GE 90-30 PLCs.
15. The simulation, configuration and programming software shall support communication over the Ethernet Network (or Profinet) for transmitting and receiving data for status, alarms, process conditions, and setpoint values. Each PLC shall be able to operate independent of the plant network in the case of loss of network connection. All necessary hardware required to allow a notebook computer to perform local PLC configuration and programming shall be provided. Programming software shall be the latest current version used by PRMRWSA for GE Rx3i devices.
16. PLC programming shall be fully commented and follow the PRMRWSA's standard programming protocol, formats, signal conditioning, tagging and address nomenclature, and file management systems. Programming shall be accomplished through the use of function block logic and standard ladder logic to the maximum extent possible and shall be fully documented throughout the code such that a programmer unfamiliar with the program can quickly understand how it functions.
17. Provide software licenses registered to PRMRWSA whenever new licenses are required beyond that already in the PRMRWSA's possession for new components and hardware.

**D. Work Orders 2, 3, 4, and 5 - Network Switches:**

1. The network topology shall include multiple main plant rings, secondary level rings, and secondary level hub/star configurations as shown on the Drawings. Network topology consists of a combination of twisted pair copper and multiple strand fiber optic cable to accomplish the data transmission requirements specified herein. Each connected device shall communicate directly with the iFIX database through its own network interface.
2. Bi-directional communications between the network and network connected equipment shall be provided by network interface units. The network interface units shall be common to all equipment and shall include all required modems, communications processors and memories to provide a transparent interface between the network(s) and the connected devices.
3. Multilayered peer-to-peer communications protocol shall be employed. Protocol shall be CSMA/CD ("Ethernet"). Repeaters (with associated UPS systems) shall be provided where necessary to meet data highway distance requirements whether or not they are specifically shown on the Drawings. Communications between PLCs for process specific parameters, in particular plant influent flows, shall be provided with proper protections for a multi-cast environment and producer-consumer set up.
4. Network speed shall utilize 10/100 (100MB) rate to prevent network errors, fragmented packets, and fiber communications light distortion over the distances between devices.
5. New Ethernet switches are to be the layer 2, managed, hardened industrial type mounted inside control panel enclosures. The switches shall be equipped with the number of ports required as indicated on the Drawings but as a minimum, at least four 10/100 Mbps RJ45 twisted pair ports, and two small form pluggable (SFP) 100 Mbps ports for connection to the fiber optic cable specified herein. Switches shall be configured to operate with ring topology and shall automatically failover to an alternate network route in the event the primary route fails. The failover shall occur in less than 200 ms. Ethernet switches shall have the following features:
  - a. Operating temperature: -40°F to 158°F
  - b. Operating humidity: 5 to 95% RH, non-condensing
  - c. Network administrator management via SNMP, Web Browser, Telnet or a Local Console port.
  - d. IGMP snooping and IGMP query.
  - e. Rapid spanning tree protocol (IEEE 802.1w) for communications with devices outside the main plant east and west fiber rings.
  - f. Extended ring protocol as supplied by Phoenix Contact, or equal, for all devices on the main plant east and west fiber rings.
  - g. VLAN support

- h. Compatible with GE EGD applications.
  - 6. Ethernet switches shall be Phoenix Contact 3000/4000 series or approved equal.
  - 7. Power to all networking equipment shall be connected to the existing uninterruptible power supply (UPS) system at each existing panel. Power for the new network switch in panel 60-CP-1 shall be connected to the existing UPS in the room with extension of the UPS power provided by PRMRWSA staff.
- E. **Work Orders 1 and 3 - Media Converters:** Media converters for Ethernet copper to fiber and fiber to copper communications shall be provided as needed either integral with the network switch supplied or as stand-alone devices. Stand-alone devices shall be as supplied by Phoenix Contact or as otherwise recommended by the network switch manufacturer utilized.
- F. **Work Order 1 - Fiber Patch Panels:**
- 1. New fiber optic patch panels shall include adapter plates to terminate all active and spare incoming fiber optic cables. Each port and fiber shall be equipped with a connector, terminated, and labeled. Connectors shall be LC type. Housings shall be all metal construction, surface mounted, with independently lockable service side and user side doors. Patch panels shall include grommets, cable ties, spools, strain relief bracket and ID/caution labels.
  - 2. Patch cables between the patch panel and the fiber optic device shall be multi-mode, ceramic terminated fiber optic cable with LC connectors and 6 strands of breakout type fiber suitable for direct termination to devices.
  - 3. Patch panels and cables shall be manufactured by Corning, similar to that provided within existing panel 35-CP-2, Corning WIC-025.
- G. **Work Order 1 - Fiber Cable:**
- 1. New fiber optic cable shall contain two groups of 12-strand tight-buffered fiber (24 strands total in a single cable). All active and spare strands shall be terminated with end connectors and connected to a patch panel. Fiber optic cable shall be multi-mode fiber, 9/125 micron, riser rated multi-fiber type, with an Aramid strength member. Maximum attenuation through the fiber shall not exceed 0.5 dB/km at 1310 nm. Cable shall be suitable for outdoor installation in direct buried conduit.
  - 2. The cable diameter shall be no more than 0.30 inches. Maximum installation tensile load shall be 600 lbs. Minimum bend radius shall be 3.0 inches. Operating temperature range shall be -40 to +85 degrees Celsius. Fiber optic cable shall be UL-listed OFNR rated HC Series High Density Cables as manufactured by Optical Cable Corporation, or equal.
  - 3. Fiber optic cable shall utilize mechanically spliced, field installable, LC compatible connectors. Connections shall have a typical loss of 0.3 dB or better and shall provide stable optical performance after numerous rematings. Heat or UV cured connections shall not be acceptable. Connectors shall be Corning Unicam, or equal.

4. Reel test, terminate, and then retest the installed fiber optic cables both active and all spares. Measure the dB loss of each fiber over the cable length and provide reports of the test results to the Engineer for approval.
- H. **Work Orders 1, 2, 3, and 4 as needed - Ethernet Cable:** New Ethernet copper cable shall be 4-pair, 24 AWG stranded Category 6 (CAT 6) shielded twisted pair (STP) cable with 100% foil shield, factory installed RJ-45 connectors, and strain relief boots. Cable shall be certified to be used with Ethernet/IP service. Cables shall be by Belkin.
- I. **Work Orders 1, 2, 3, and 4 as needed - Conduit:** New conduit shall be rigid SCH80 PVC conduit as manufactured by Carlon, An Indian Head Co., Kraloy Products Co., Inc., Highland Plastics Inc., or approved equal.

## 2.02 NEW AND MODIFIED PROGRAMMING

- A. Application Software (as applicable to **all work orders**):
  1. Programming software for the facility's new and modified GE PLCs and the facility's new and modified workstation iFIX displays / historical database shall be completed using PRMRWSA's existing programming software, current versions,
  2. Programming of the PLCs shall follow all formatting, documentation, conventions, data transfer, and signal conditioning standards utilized and established by PRMRWSA for plant PLC ladder logic programming. All PLC GE programming shall be performed on site at each individual PLC location using the INTEGRATOR's portable laptop computer. All PLC programming shall be fully commented line by line to completely describe the ladder or logic block intent and function.
  3. Programming of the HMI shall follow all formatting (alarms, controls, trends, and historical data collection), documentation, display features, operator interface, data base conventions, and file management standards utilized and established by PRMRWSA for plant HMI programming. HMI iFIX programming shall be performed on site at the facility's work stations.
  4. The main objective for programming requirements under this project is to eliminate the GE 90-70 main PLC in panel 60-CP-1 and the associated remote I/O rack in panel 60-CP-2. This main PLC has subroutines for control and monitoring of the high service pumps, chemical feed systems, alarm handling, flow totalizing, and system clock. This main PLC also acts as a data concentrator for several PLCs over an SRTP communications loop and a Genius Bus loop. These functions must either be eliminated (if no longer needed) or taken over by other existing PLCs as noted herein.
  5. A copy of the existing GE 90-70 PLC program (GE Proficy format) has been made available to the INTEGRATOR who shall utilize this documentation knowledge in the planning and execution of the work. All functions performed by the GE 90-70 necessary for the continued operation of the PRWTF in meeting all permit requirements and member agreements shall be continuously maintained throughout the implementation of this project and successfully transferred to other existing PLCs as a condition of acceptance for substantial and final completion. The INTEGRATOR is fully responsible for meeting this condition and no additional compensation for completing this work will be considered due to the INTEGRATOR's lack of sufficient



investigations into the GE 90-70 functions as depicted in the existing application programming.

**B. Work Order 2 - High Service Pumping (HSP):**

1. Existing Pumps: The twelve existing high service pumps include both constant speed (CS) and variable speed (VS) pumps of varying capacities. The twelve pumps include:
  - a. Constant Speed, 300 hp: 62-P-4, 62-P-5, 60-P-5, and 60-P-8
  - b. Variable Speed, 300 hp: 60-P-2, 60-P-3, 60-P-4, 62-P-1, 62-P-2, and 62-P-3
  - c. Constant Speed, 350 hp: 60-P-6 and 60-P-7
  - d. Note that existing pump 60-P-1 is a small, 50 hp pump that is not used.
2. Existing I/O: The I/O for the twelve existing high service pumps reside in three PLC panels as follows:
  - a. 60-CP-3: 60-P-2, 60-P-3, 60-P-4, 60-P-6, and 60-P-7 (3 VS's, 2 CS's)
  - b. 62-CP-1: 62-P-1, 62-P-2, 62-P-3, 62-P-4, 62-P-5, and 60-P-8 (3 VS's, 3 CS's)
  - c. 60-CP-1: 60-P-5 (CS)
3. Existing Sequencer: The pumping sequence for the HSPs resides within the GE 90-70 PLC in 60-CP-1 with some sequence logic resident in the HMI programming. Subroutines HSP, HSP\_LLA, HSP\_LLS, HSP\_WPC, and HSPLLA1 along with logic within the iFIX HMI programming control the sequence of the twelve pumps using a complicated, highly interdependent selection of lead and lag VFD and CS pump assignments with the speed of any running VFD pumps varied to maintain a distribution system pressure setpoint.
4. Programming Modification Objectives: The level of complexity for the existing HSP sequence is not to be repeated in the modified sequence. Simplification of the sequence is to be provided along with placing the simplified sequence entirely within the new replacement GE Rx3i PLC in panel 60-CP-3, deleting the logic within the iFIX application other than interface necessary for setpoint input, manual pump assignment, and manual pump operation. The physical I/O for Pump 60-P-5 is to be moved from panel 60-CP-1 to panel 60-CP-3 as depicted on the Drawings along with reprogramming of this I/O to integrate with the new pump sequence logic in 60-CP-3. Pump 60-P-1 is also to be migrated to panel 60-CP-3 but not be made part of the sequence. Pressure inputs for control of the pumps shall be migrated to 60-CP-3 from 60-CP-1 and 60-CP-2 as previously noted so that these inputs are to the PLC that will contain the sequence.
5. HSP CONTROL: The twelve pumps shall operate based on a step sequence as noted herein, beginning with a "base volume" step. The initial "base volume" step is a manual determination of which pumps will be placed in HAND (at the HMI or at a VFD) will operate under this initial step. Any pumps in "HAND" or "OFF" at the HMI or associated VFD will be taken out of the automatic sequence. All remaining pumps left

in REMOTE at the VFD and in AUTO at the HMI will operate under an automatic sequence, Steps 1 through X, with manual selection of pump assignment. The number of steps (X) will be based on the number of pumps in REMOTE and AUTO. Operation shall be as follows:

- a. **BASE VOLUME:** Operated determined number of pumps (normally two) will be placed in HAND at the pump VFD (normally) or on the HMI (optionally) by the operators. The selected pumps will be set to run continuously and be removed from the pump sequence. Any of the twelve pumps can be used for this purpose. The automated pump sequence shall operate as noted below utilizing any remaining pumps that are in AUTO and not faulted.
- b. **STEPS 1 and 2:** Two of the variable speed pumps that are in AUTO will be manually selected at the HMI as the designated LEAD and LAG1 pumps. The selected LEAD and LAG1 pumps shall operate as follows:
  1. **STEP 1:** The LEAD shall start after an adjustable time delay and the PLC shall modulate the speed of the LEAD pump VFD in response to the error signal between the actual distribution system pressure and the distribution system pressure setpoint entered at the HMI.
  2. **STEP 2:** if the speed of the LEAD pump exceeds an adjustable high speed setpoint (initially set at 98% speed) for more than an adjustable time delay, the PLC shall call for the LAG1 pump to start with the speed output ramping up the LAG1 pump VFD to match the speed of the LEAD pump VFD and then modulate both VFDs to maintain the pressure setpoint.
  3. **Return to STEP 1:** If, while the LEAD and LAG1 pumps are running and after the same adjustable time delay, the speed of the two pumps falls below an adjustable low speed setpoint (initially set at 80% speed), the LEAD pump shall turn off, the LAG1 pump shall become the new LEAD pump, and the speed of the new LEAD pump shall then be modulated to maintain the pressure setpoint. A LEAD pump shall always be running at any given time.
- c. **STEPS 3 through X:** Remaining pumps not selected for STEP 1 or STEP 2 service, shall be manually selected at the HMI as the designated LAG2 through LAGY pumps. These remaining pumps shall cycle on and off as follows:
  1. **STEP 3:** If the speed of the LEAD and LAG1 pumps exceeds the high speed setpoint for more than an adjustable time delay, the PLC shall call for the LAG2 pump to start (CS pumps at full capacity, VS pumps at full speed). The LEAD and LAG1 pumps shall continue to be used to maintain the pressure setpoint.
  2. **STEP 4 and higher:** Additional pumps shall be called to run in the same manner each time the speed of the LEAD and LAG1 pumps are at maximum speed and additional demand volume is needed.
  3. **Return to lower STEPS:** If in STEPS 3 or higher, if the speed of the LEAD and LAG1 pumps falls below the low speed setpoint for more than an adjustable time delay, the PLC shall turn off the pump in the highest level

- step (if in STEP 4, the LAG3 pump shall turn off to return to STEP 3) and continue to use the LEAD and LAG1 pumps to maintain the pressure setpoint.
4. The LAG3 through LAGY pumps shall not alternate duty assignment – these pumps shall maintain the assigned status set at the HMI.
  5. The total number of steps (X) shall be equal to 12 minus the number of pumps not in AUTO (4 pumps not in AUTO, X = 8). The lag numbering required (Y) will then be 1 minus X (if there are 8 steps, there will need to be assignments for LEAD and LAG1 through LAG7).
- d. **PUMP ASSIGNMENT:** Assignment of LEAD and LAG pumps shall be manual. Operators shall manually enter pump assignments at the HMI (LEAD, LAG1, etc.). Once an assignment to a pump is made, if another pump had that assignment, that pump shall be stopped and be labeled as “unassigned” and the newly selected pump shall start and take its place in the sequence in a bump-less transition. Unassigned pumps shall remain so until manually assigned by the operator. No logic shall be done at the HMI level. Only pumps in AUTO shall be able to be given an assignment.
  - e. **PUMP FAULT condition:** If one of the pumps in STEP 1 experience a fault condition or otherwise fail to run (or are placed in OFF), no change in the pump sequence shall be made. If one of the pumps in STEPs 2 and 3 similarly fault or are placed in OFF, the remaining pump shall become or remain the LEAD and an alarm shall be initiated to alert operators to this condition (only one VS pump available as selected to modulate to maintain pressure). Otherwise, no change in the pump sequence shall be made and STEP 3 shall be started if needed skipping STEP 2. If any pump selected for STEPs 4 or higher fault out or are placed in OFF, the pump sequence shall simply go to the next STEP that has a pump available for service, skipping the step with the faulted or out of service pump.
  - f. **PUMP BROWN OUT condition:** Pumps connected to 60-CP-3 operate off Generators 1 and 2 during brown outs. Pumps connected to 62-CP-1 operate off Generators 3 and 4. When a brown out occurs as indicated by the loss of utility power, all pumps will shut down temporarily due to the loss of power. The PLC shall retain the step level the pumps were at when the brown out occurred. Once the dedicated generators are up to speed and the power source is connected to the backup emergency power, the pumps shall be started up and operated in the same sequence up to the step the pumps had been at with an adjustable time delay between starts to avoid multiple pumps starting back up at the same time.
  - g. **PUMP SEQUENCE display:** The pump operational status shall be depicted on a new pump sequence display that employs situational awareness for operation staff. Operators shall be able to readily understand what step the sequence is in, what pumps are running, which pumps are available for use and which are in alarm or out of service (in OFF), and what assignment each pump has been designated to. Display shall be similar to the example sequence display provided at the end of this document. The display and specific features of the sequence logic is open to

input from the programmer for possible improvements. This shall be determined during program submittal review and at discussions within progress meetings with written approval for any changes made.

- h. PUMP STATUS display: The HMI shall continue to display pump status for monitoring and control of the pumps as currently exists, including:
- LOW pressure alarm setpoint
  - Hand/Off/Auto Control Selection at the HMI for each pump
  - Manual Speed adjustment for each pump when in HMI hand
  - Start output command to each pump
  - Run Status for each pump
  - Runtime Indication (in hours) for each pump
  - Field Hand/Off/Remote Status for each pump
  - Fault condition alarm for each pump
  - Speed Indication for each VS pump
  - Ready Indication for each pump (in remote at drive, Auto on HMI)
  - STEP indication for which step is currently active
  - LOW (MIN) pump speed setpoint
  - HIGH (MAX) pump speed setpoint
  - Stepup and stepdown time delay setpoint
  - System PRESSURE setpoint
  - Pump sequence selection for each pump (LEAD, LAG1, LAG2, etc)

C. Work Orders 2 and 5 - Influent Flow Signal:

1. Existing Flow Meters: The four existing plant influent flow meters monitor flow from the reservoir to each of the four treatment plants. The flow signals are utilized to pace all chemical feeds for the four plants.
2. Existing I/O: The I/O for the four existing flow meters reside in two PLC panels as follows:
  - a. 35-CP-2: Plants 1 and 2 influent flows
  - b. 100-CP-6: Plants 3 and 4 influent flows
3. Existing Signal Utilization: A flow totalization subroutine resides within the GE 90-70 PLC in 60-CP-1, Subroutine FLOWTOL, but the HMI only displays the previous day's total (no historical capture). The totalizer does not reset to zero each day and is calculated in 9 digits (billions). The flow signals are inputs to the Subroutines used for chemical dosing with Subroutines CHEM\_P1, CHEM\_P2, CHEM\_P3, and CHEM\_P4 within the GE 90-70 PLC in 60-CP-1.
4. Programming Modification Objectives: Functions that reside within the logic in the GE 90-70 PLC in panel 60-CP-1 are to be migrated to, and performed by, the respective PLC that receives the signal inputs (35-CP-2 and 100-CP-6 as noted previously). This includes calculations and internal recording for flow totalization, signal conditioning and mapping to other PLCs that require the influent flow signal value to complete logical functions and the signal scaling and database interface with the HMI. This is in support of completely eliminating the GE 90-70 PLC (Work Order 2).

5. **PLANT INFLUENT FLOW SIGNAL TOTALIZATION:** The four plant influent flow signals shall be individually monitored and recorded (AR), totaled in increments of 1,000 gallons (ACC-T), and averaged (ACC-A) as follows or as otherwise programmed within the existing PLC:
  - a. AR module shall be employed to monitor/record the measured flow to reflect monitoring/recording of flow in the historical database
  - b. ACC-T module shall accumulate the flow signal adding one digit per each unit digit value specified. For a digit value of 1,000 gallons, then the ACC-T module shall add 1 digit to the value each time 1,000 gallons is measured based on time and actual flow rate (at 2,000 gpm, 1 digit is added every 30 seconds). The daily total (midnight to midnight) each day shall be recorded by the historian software for use in HMI reports.
  - c. ACC-A module shall average the flow values over a daily period (midnight to midnight), recording the calculated value in the historian software for use in HMI reports. Each sample shall be weighted equally in the average.

**D. Work Orders 2 and 5 - Chemical Feed Control:**

1. **Existing Chemical Feeds:** There are six chemical feed systems used at the facility with varying capacities and number of feed skids. The six systems include:
  - a. Alum Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b><u>Plant 1</u></b>			
Pump 1	130.00	150	At the Pentagon splitter box *
Pump 2	130.00	150	
Pump 3	130.00	150	
<b><u>Plant 2</u></b>			
Pump 4	130.00	150	Train 3
Pump 5	130.00	150	Train 5 & 6
Pump 6	130.00	150	Train 4
<b><u>Plant 3</u></b>			
Pump 15	85.60	100	SCU 5 & 6 *
Pump 16	85.60	100	
Pump 17	85.60	100	
<b><u>Plant 4</u></b>			
Pump 18	85.60	100	SCU 7 & 8 *
Pump 19	85.60	100	
Pump 20	85.60	100	

\* For Plants 1, 3, & 4 the Alum Pump feeds are run in parallel to the same feed point. If one Pump fails the others can speed up to meet demand.

b. Polymer Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b><u>Plant 1</u></b>			
Pump 5	161.00	180.00	SCU 1
Pump 6	161.00	180.00	SCU 2
Pump 7	161.00	--	(spare for pumps 5 & 6)
<b><u>Plant 2</u></b>			
Pump 15	161.00	180.00	Train 3
Pump 16	161.00	180.00	Train 4
Pump 17	161.00	--	(spare for pumps 15 & 16)
<b><u>Plant 3</u></b>			
Pump 25	85.60	100.00	SCU 5
Pump 26	85.60	100.00	SCU 6
Pump 27	85.60	--	(spare for pumps 25 and 26)
<b><u>Plant 4</u></b>			
Pump 35	85.60	100.00	SCU 7
Pump 36	85.60	100.00	SCU 8

Spare pumps use the meter for the pump they replace.

c. PAC (activated carbon) Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b><u>Plant 1</u></b>			
Pump 23	383.00	395.00	Raw Water
Pump 25	383.00	395.00	(spare for pumps 23, 18, 19, 20)
Pump 24	383.00	395.00	(spare for pumps 23, 18, 19, 20)
<b><u>Plant 2</u></b>			
Pump 18	383.00	400.00	Raw Water
<b><u>Plant 3</u></b>			
Pump 19	383.00	400.00	Raw Water
<b><u>Plant 4</u></b>			
Pump 20	383.00	400.00	Raw Water

Spare pumps use the meter for the pump they replace.

d. Hypochlorite (CL2 or Bleach) Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b>Plant 1</b>			
Pump 17	46.00	60.00	Trains 1 & 2 (spare for pumps 15, 16, 17)
Pump 18	46.00	--	
<b>Plant 2</b>			
Pump 15	46.00	60.00	Train 3
Pump 16	46.00	60.00	Train 4
<b>Plant 3</b>			
Pump 10	46.00	60.00	Train 5
Pump 11	46.00	60.00	Train 6
<b>Plant 4</b>			
Pump 12	46.00	60.00	Train 7
Pump 13	46.00	60.00	Train 8
Pump 14	46.00	--	(spare for pumps 10, 11, 12, 13)

Spare pumps use the meter for the pump they replace.

e. Ammonia (NH3) Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b>Plant 1</b>			
Pump 13	7.00	10.00	NH3, Train 1
Pump 14	7.00	10.00	NH3, Train 2
Pump 15	7.00	--	(spare for pumps 16, 17, 18, 19)
<b>Plant 2</b>			
Pump 10	7.00	--	(spare for pumps 11, 12, 13, 14)
Pump 11	7.00	10.00	Train 3
Pump 12	7.00	10.00	Train 4
<b>Plant 3</b>			
Pump 17	7.00	10.00	Train 5 & 6
Pump 18	7.00	10.00	Train 5 & 6
<b>Plant 4</b>			
Pump 16	7.00	10.00	Train 7 & 8
Pump 19	7.00	10.00	Train 7 & 8

Spare pumps use the meter for the pump they replace.

f. Sodium Hydroxide (NaOH or Caustic) Feed:

<u>Pumps</u>	<u>Capacity (gph)</u>	<u>Meter Range (gph)</u>	<u>Feed Point</u>
<b><u>Plant 1</u></b>			
Pump 1	46.00	46.00	Raw
Pump 2	46.00	46.00	(spare for pumps 1 & 3)
Pump 4	46.00	46.00	Pre-Filter
Pump 8	46.00	46.00	Transfer
Pump 9	46.00	46.00	(spare for pumps 8 & 10)
<b><u>Plant 2</u></b>			
Pump 3	46.00	46.00	Raw
Pump 5	46.00	46.00	Pre-Filter Train 3
Pump 6	46.00	46.00	(spare for pumps 4, 5, & 7)
Pump 7	46.00	46.00	Pre-Filter Train 4
Pump 10	46.00	46.00	Transfer
<b><u>Plant 3</u></b>			
Pump 20	46.00	60.00	Raw
Pump 22	46.00	60.00	Pre-Filter
Pump 25	46.00	60.00	Transfer
<b><u>Plant 4</u></b>			
Pump 21	46.00	60.00	Raw
Pump 23	46.00	60.00	Pre-Filter
Pump 24	46.00	--	(spare pumps 20, 21, 22, 23)
Pump 26	46.00	60.00	Transfer
Pump 27	46.00	--	(spare for pumps 25 & 26)

Spare pumps use the meter for the pump they replace when the spare pump does not have its own meter.

2. Existing I/O: The I/O for the six existing chemical feed systems reside in eighteen PLC panels as follows:
  - a. 100-CP-6: GE 90-30, data concentrator PLC for the Alum, Polymer, and PAC feed systems.
  - b. 145-CP-3: GE 90-30, data concentrator PLC for the Hypochlorite, Ammonia, and NaOH feed systems.
  - c. 100-CP-1: GE 90-30, Alum feed for Plant 4
  - d. 100-CP-2: GE 90-30, Alum feed for Plant 3
  - e. 100-CP-3: GE Rx3i, Alum feed for Plant 1
  - f. 100-CP-4: GE Rx3i, Alum feed for Plant 2
  - g. 110-CP-1: GE 90-30, Polymer feed for Plants 1 through 4
  - h. 125-CP-3: GE 90-30, PAC feed for Plants 2, 3, and 4



- i. 125-CP-4: GE Rx3i, PAC feed for Plant 1
  - j. 145-CP-1: GE 90-30, Hypochlorite feed for Plants 1 and 2
  - k. 145-CP-2: GE 90-30, Hypochlorite feed for Plants 3 and 4
  - l. 155-CP-1: GE 90-30, Ammonia feed for Plants 1 and 2
  - m. 155-CP-2: GE 90-30, Ammonia feed for Plants 3 and 4
  - n. 130-CP-1: GE 90-30, NaOH pre-feed for Plants 3 and 4
  - o. 130-CP-2: GE 90-30, NaOH post-feed for Plants 3 and 4
  - p. 130-CP-3: GE Rx3i, NaOH raw-feed for Plants 1 and 2
  - q. 130-CP-4: GE Rx3i, NaOH pre-feed for Plants 1 and 2
  - r. 130-CP-5: GE Rx3i, NaOH post-feed for Plants 1 and 2
3. Existing Chemical Feed Output Calculations: The various chemical feed output calculations reside within the GE 90-70 PLC in 60-CP-1 which rely on chemical pump capacity inputs, inputs from the HMI for dose setpoints and chemical concentrations, as well as the four plant influent meter flow signals. Subroutines CHEM, CHEM\_P1, CHEM\_P2, CHEM\_P3, CHEM\_P4, and CHEMCAL reside within the GE 90-70 PLC in 60-CP-1. Process variable is the signal from actual flow meters on each pump.
  4. Programming Modification Objectives: Functions that reside within the logic in the GE 90-70 PLC in panel 60-CP-1 are to be migrated to and performed by the respective PLC that otherwise controls the individual chemical feed pump outputs. This generally includes a chemical pump feed rate output calculation that is a function of the influent flow rate, the dose setpoint set at the HMI, and the chemical concentration value set at the HMI reflecting the concentration of the delivered chemical. All existing functions shall be migrated to the individual chemical control PLCs, including the dose calculation, chemical feed output, signal mapping for the influent flow rate from applicable remote PLC, and signal scaling and database interface with the HMI for the dose and chemical concentration setpoints. This is in support of completely eliminating the GE 90-70 PLC (Work Order 2).
  5. CHEMICAL FEED FLOW: Flow monitoring, control feedback, and chemical flow totalizer logic shall be migrated / developed and resident in each associated chemical feed PLC where the flow meter signals are inputs. The flow signals for each pump shall be individually monitored and recorded (AR) and the flow to each plant is to be totalized in increments of 10 gallons (ACC-T) as follows or as otherwise programmed within the existing PLC:
    - a. AR module shall be employed to monitor/record the measured flow to reflect monitoring/recording of flow in the historical database
    - b. ACC-T module shall accumulate the flow signal adding one digit per each unit digit value specified. The daily total (midnight to midnight) each day shall be recorded by the historian software for use in HMI reports.

6. CHEMICAL FEED CALCULATION: The following calculations shall be performed at each chemical feed system PLC for outputs for each of the existing chemical feed pumps:
- a. Chemical Feed Rate (lbs/hr) = Flow (mgd) x dose (ppm) x 8.34.
  - b. Feed Rate Conversion (gph) =  $\frac{\text{Feed Rate (lbs/hr)}}{\text{Concentration (lbs/gal)}}$
  - c. Chemical Pump Output = modulate pump speed to meet calculated feed rate based on flow meter signal process variable

E. Work Orders 2 and 5 - Emergency Power Generation:

1. Existing Generator Control: Existing emergency power generation for the entire facility includes the following:
  - a. The PLC in panels 60-CP-2 and CAT-GEAR control the operation of Generators 1 and 2 and utility breakers U1 and U2 (through Modbus communications to CAT-GEAR panel as this panel contains the only Modicon PLC at this facility).
  - b. The PLCs in panels 60-CP-1 and 190-CP-34 control the operation of Generators 3 and 4 with inputs for the generators as well as utility breakers U3 and U4 through panel 190-CP-2 over the plant communication network.
  - c. Both sets of generators provide backup power to portions of the facility generally down stream of the associated utility breakers for each set of generators. There are some key process components that are located between the power company's 23.5kV switchgear (monitored by 190-CP-3) and the two sets of utility breakers at the generators. To provide backup power to these components, PRMRWSA staff manually open the breakers at the 23.5kV switchgear and close one set of utility breakers while the associated generators are running in order to back-feed power to the upstream components (only one set of generators can be used for this purpose due to existing logic limitations).
2. Programming Modification Objectives:
  - a. Functions that reside within the logic in the GE 90-70 PLC in panel 60-CP-1 for Generators 3 and 4 are to be migrated to and performed by the PLC in 190-CP-2. Logic shall be similar to that which controls Generators 1 and 2 for sequencing of utility breakers and generators upon power loss.
  - b. Add logic within 60-CP-3 and associated HMI interface to allow PRMRWSA staff to be able to manually select either set of generators to back-feed upstream components (close either set of utility breakers) and open the 23.5kV switchgear breakers from the HMI. Include appropriate logic safeguards to allow automatic switchover to generator power on loss of utility power and prevent automatic switchover upon return of utility power if the manual back feed from either set of generators is in use.

F. **Work Order 5 - Network Communications:**

1. Existing Networks: The existing GE 90-70 PLC in panel 60-CP-1 communicates with several plant PLCs over an SRTP communication loop, with a distribution system radio telemetry communications link for customer billing remote RTUs, and with several plant PLCs over a GE genius communications loop. The GE Rx3i PLC within panel 60-CP-2 communicates with several plant PLCs over an EGD communications loop.
2. Network Modification Requirements: Subroutines that reside within the logic in the GE 90-70 PLC related to data concentration for populating database values in the HMI software are to be converted to a system that connects all the plant PLCs to the HMI over an Ethernet link that utilizes EGD communications protocol. This is in support of completely eliminating the GE 90-70 PLC (Work Order 2). Subroutines with titles in the format of "E005C01" (related to communications with the PLC in panel 5-CP-1) that reside within the GE 90-70 PLC are to be replaced with logic for data transfer within each of the impacted PLCs. Caution is to be taken to not overwrite data in register numbers as some register numbers within the existing SRTP network match register numbers in the existing EGD network.
3. Peer-to-Peer Checking: Subroutines to provide a peer-to-peer network communications check shall be added to all PLCs that handle calculations and data transfer for control of the HSPs, influent flow signals, chemical feed systems, and emergency power generation. A sample subroutine for this function is available on the existing GE Rx3i PLC in panel 60-CP-3.
4. Single Point of Failure Elimination: Existing single points of failure points within the existing PLC network have been identified. Means to provide backup for such points is depicted on the drawings. The INTEGRATOR shall provide all necessary programming to support such network modifications / additions.

G. **Work Order 2 - Radio Communications:** Logic within the GE 90-70 PLC in panel 60-CP-1 for radio communications with remote sites is to be migrated to 60-CP-2 as part of completely eliminating the GE 90-70 PLC. This will required a new radio communication module to be added to the GE Rx3i line up in 60-CP-2 along with connection of the existing network cable from the base station radio to this new module.

H. **Work Order 2 - Miscellaneous PLC Functions:** The GE 90-70 PLC in panel 60-CP-1 includes less critical subroutines for such things as alarm interface and system clock and daylight savings time. The use and need for these subroutines, and any other subroutines not mentioned previously, shall be investigated by the INTEGRATOR. If found that any subroutine is still of use, the INTEGRATOR shall migrate that function to an appropriate PLC to allow the complete elimination of the GE 90-70 PLC. Provide logic necessary to synchronize all PLCs on the plant network to one time clock set at the HMI (primarily used for totalizer functions). Provide logic necessary for alarm conditions to be directly communicated to the HMI from individual PLCs.

I. HMI Interface: Programming revisions required for the PLC, the plant PLC network communications, and iFIX software as noted above shall be made such that functions and graphic displays match that supplied for similar existing devices and controls unless otherwise noted. Revisions/Additions include:

1. **Work Order 5 - Network Health Display:** Add a display to depict the health of the network as determined by the peer-to-peer checking system and internal diagnostics from the plant PLCs. Displays for an overall site plan and a summary table shall be developed to show communication failures throughout plant that allow operators to easily identify what component has failed (easily recognized name of devices) and depict where failed component(s) are located. Lost communications to any PLC shall also be indicated with ???'s in the data fields (currently PLCs not directory connected to the HMI hold last value which is not acceptable).
2. **Work Order 2 - HSP Matrix Display:** Provide a revised, situational awareness based HSP matrix display to effectively communicate the current status of the pump sequence and individual pump availability and usage.

### PART 3 – EXECUTION

#### 3.01 IMPLEMENTATION

- A. Work Order 1 can be started upon notice to proceed and is somewhat independent of the other work order efforts. Coordinate this work with other work order scope items as needed and cooperate with other such work efforts for the efficient and timely execution of the work.
- B. Work Order 2 is to be independent of work performed under Work Order 5. To fully eliminate the GE 9070, the chemical feed and power generation programs will need to be migrated to the noted PLCs so that the process controls within the GE9070 are no longer necessary. For programming within existing GE9030s that are scheduled to be replaced under Work Order 5, complete all work under Work Order 2 using permanent or temporary programming as needed to allow the complete removal of the GE 9070 and its remote I/O. Temporary programming within the GE9030s scheduled to be replaced under Work Order 5 will then need to be repeated under Work Order 5.
- C. Work Order 3 is somewhat dependent on the work performed under Work Orders 2 and 5. A temporary Genius loop module (install as part of Work Order 2) may be needed within the existing Rx3i PLC in panel 60-CP-2 if the work under Work Order 5 is not complete.
- D. Work Orders 4 and 5 are consecutive. The components to be installed and programmed under Work Order 5 are to be purchased under Work Order 4 before starting work under Work Order 5. Under Work Order 5, the work is to be completed on one chemical skid, one plant, or one process section, one at a time, as approved by PRMRWSA and as noted herein. As the replacement PLC hardware is ordered and installed the associated programming for each particular PLC lineup is to be ready to download, test, and implemented on the same day as the installation of the replacement hardware. Coordinate all work efforts between these two work orders.
- E. Work Orders 3 and 5 require coordination of programming efforts to verify new EGD communications implemented within these two work orders use identical methods, protocol, and programming style and documentation.

### 3.02 TESTING REQUIREMENTS

- A. The CONTRACTOR shall provide the services of experienced factory trained technicians, tools and equipment to field calibrate, test, inspect, and adjust all equipment in accordance with manufacturer's specifications and instructions.
- B. The proper control of all final control elements shall be verified by tests conducted in accordance with the requirements specified herein.
- C. All modulating final control elements shall be tested for appropriate speed or position response by applying power and input demand signals, and observing the equipment for proper direction and level of reaction. Each final control element shall be tested at 0, 25, 50, 75, and 100 percent of signal input level and the results checked against specified accuracy tolerances. Final control elements which require turndown limits such as VFD's shall be initially set during this test.
- D. Prior to control system startup and testing, each monitoring and control loop shall be tested on an individual basis from the primary element to the final element, including the operator work station or loop controller level, for continuity and for proper operation and calibration.
- E. Signals from transducers, sensors, and transmitters shall be utilized to verify control responses. Simulated input data signals may be used subject to prior written approval by the Engineer. All modes of control shall be exercised and checked for proper operation.
- F. Control system startup and testing shall be performed to demonstrate complete compliance with all specified functional and operational requirements. Testing activities shall include the simulation of both normal and abnormal operating conditions.
- G. Each loop and control strategy test shall be witnessed and signed off by both the Contractor (or designee) and the Engineer upon satisfactory completion.
- H. Upon completion of the startup tests and prior to final system acceptance, the new controls shall be tested under normal operating conditions, initiated either automatically or manually, over a 45 day test period to demonstrate continuous reliable operation as intended.
- I. If the system fails the 45 day availability test, the 45 day test period shall be restarted after the failed component or software is repaired / replaced and full operation is restored.

### 3.02 FINAL ACCEPTANCE

- A. Final acceptance of the instrumentation programming will be determined complete by the Engineer, and shall be based successful completion of startup testing and training of the operations staff to the Owner's satisfaction.

- THIS PAGE INTENTIONALLY LEFT BLANK -

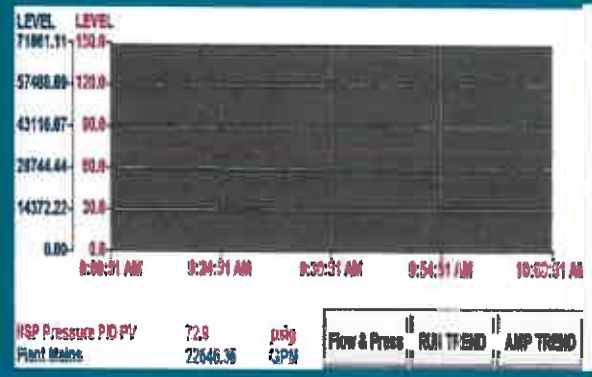
Pump Number	Drive	Control Mode	Run Status	Called to Run	Assigned Step	Percent Speed
60-P-2	VS	AUTO		LEAD	LEAD	87%
60-P-3	VS	AUTO		LAG5	LAG5	0%
60-P-4	VS	AUTO		LAG7	LAG7	0%
60-P-5	CS	HAND				---
60-P-6	CS	OFF				OFF
60-P-7	CS	OFF				OFF
60-P-8	CS	AUTO		LAG2	LAG2	ON
62-P-1	VS	AUTO		LAG4	LAG4	0%
62-P-2	VS	AUTO		LAG1	LAG1	87%
62-P-3	VS	AUTO		LAG6	LAG6	0%
62-P-4	CS	AUTO		LAG3	LAG3	OFF
62-P-5	CS	HAND				OFF

### LAG PUMP ADD/SUBTRACT CONTROL

ADD LAG PUMP DELAY TIME: 15 sec  
 ADD LAG PUMP SPEED VALUE: 98%  
 SUB LAG PUMP DELAY TIME: 30 sec  
 SUB LAG PUMP SPEED VALUE: 82%  
 LEAD PUMP SWITCH DELAY TIME: 6 hrs

### PRESSURE / PUMP SPEED CONTROL

CURRENT PRESSURE (PV) 62-P-10: 72.9 psig  
 PRESSURE SETPOINT (SP): 73.0 psig  
 PUMP SPEED COMMAND (CV): 86%  
 MANUAL/AUTOMATIC SELECT:    
 SP/CV INCR/DECR ADJUST:    
 PRESSURE HIGH ALARM VALUE: 78.3 psig  
 PRESSURE LOW ALARM VALUE: 65.0 psig



PLANT OVERVIEW	2025 - PLANT 1 R&S	40 - GROUND STORAGE	CHEM FLOWS OVERVIEW	110 - POLYBEN PUMPS	PLANT 25 KV SWITCH	RTV STATIONS
CHEMICAL TOTALIZATION	2025 - PLANT 2 R&S	51 - ASR WELLS	PLANT 1 CHEMICAL DOSE	120/125 - PAC PUMPS	PLANT GENERATORS 1 & 2	NEW DATA OVERVIEW
5 - RIVER PUMPS	2025 - PLANT 3 & 4 SCUs	8062 - HIGH-SERVICE PUA	PLANT 2 CHEMICAL DOSE	130 - CAUSTIC Pks 1&2	PLANT GENERATORS 3 & 4	REGIONAL PUMP STATION
10 - RESERVOIR PUMPS	30 - PLANT 1 & 2 FILTERS	80 - SLUDGE THICKENING	PLANT 3 CHEMICAL DOSE	130 - CAUSTIC Pks 3&4	RESERVOIR 25 KV SWITCH	REGIONAL P.S. VALVES
15 - PAC CONTACT 1 & 2	30 - PLANT 3 & 4 FILTERS	90 - SLUDGE DEWATERING	PLANT 4 CHEMICAL DOSE	140 - CHLORINE PUMPS	RESERVOIR GENERATOR	601 METERING SITE
15 - PAC CONTACT 3 & 4	35 - TRANSFER PUMPS	97 - RECYCLE PUMPS	180 - ALUM PUMPS	143 - AMMONIA PUMPS	GENERATOR FUEL TANKS	RESERVOIR 2

ACK	Tagname	Value	Description
<input checked="" type="checkbox"/>	P250 MAP24	OPEN	T34MP-34 LOR not in REMOTE
<input checked="" type="checkbox"/>	P255 LK_TKT	0.00	125 NORTH PAC Tank LOW LEVEL ALARM

- END OF SECTION -

- THIS PAGE INTENTIONALLY LEFT BLANK -



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 02, 2017*

**REGULAR AGENDA**  
**ITEM 1**

**Water Supply Conditions**

---

**Presenter -** Richard Anderson, System Operations Manager

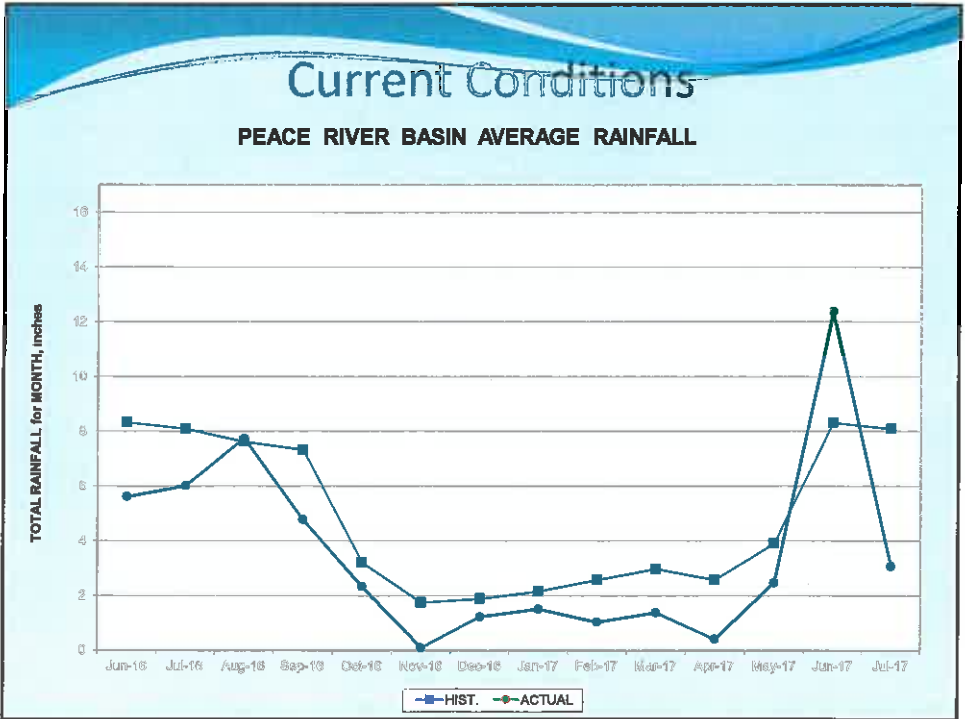
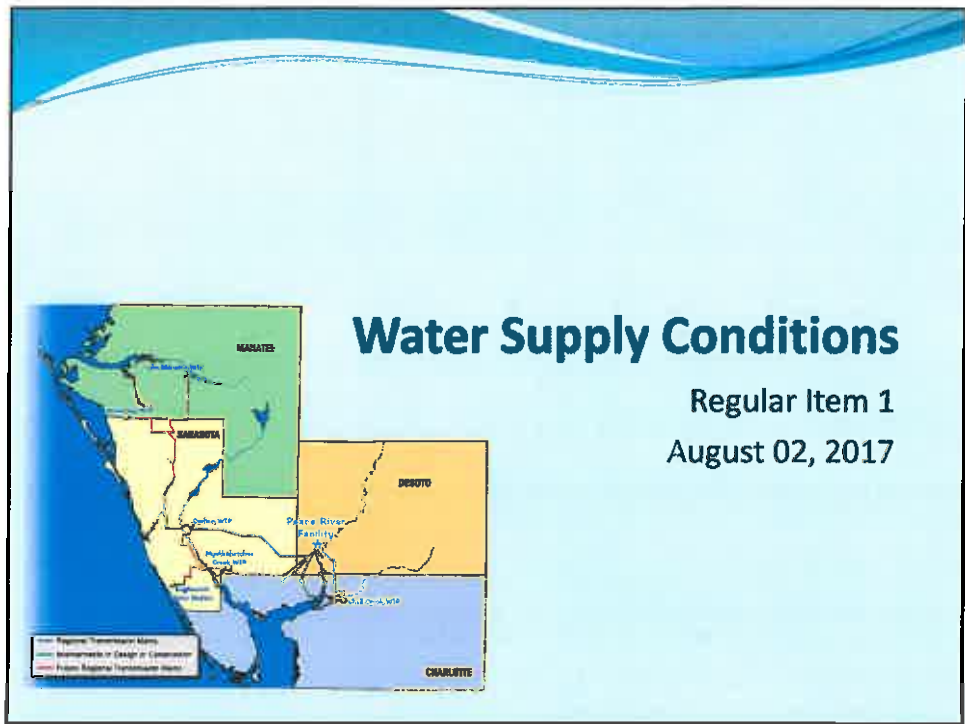
**Recommended Action -** **Status Report.** This item is presented for the Board's information and no action is required.

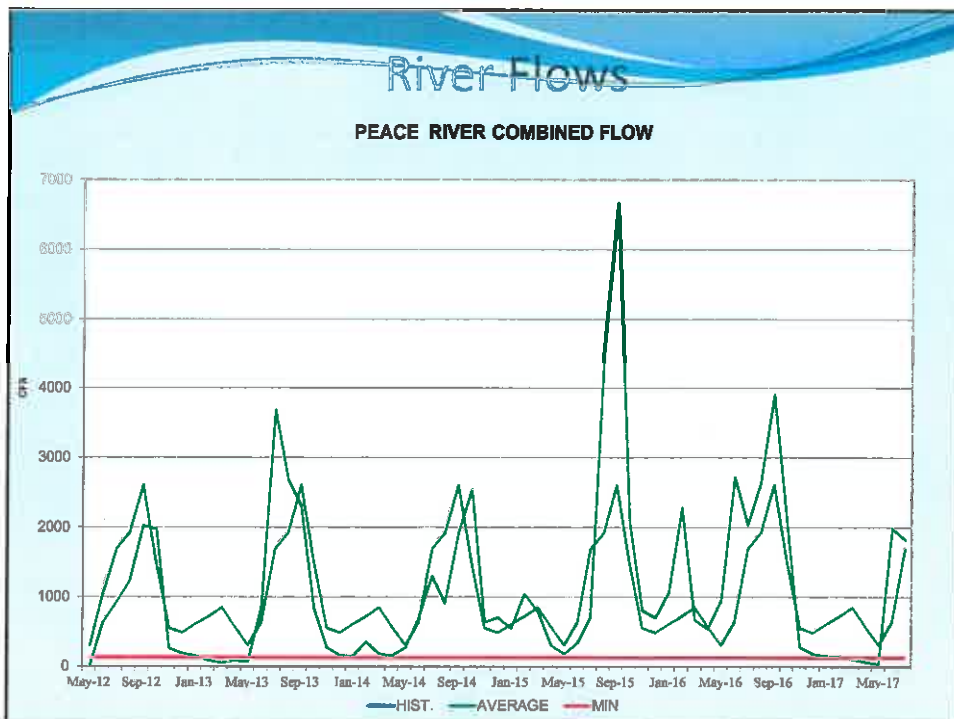
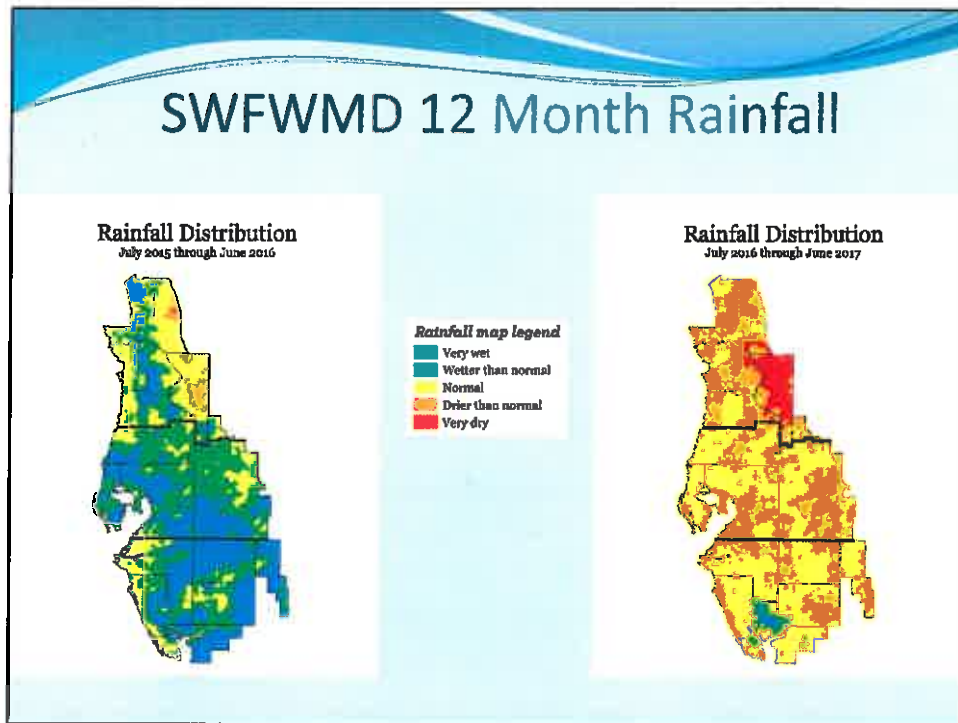
Water Supply Conditions at the Peace River Facility as of July 18, 2017.

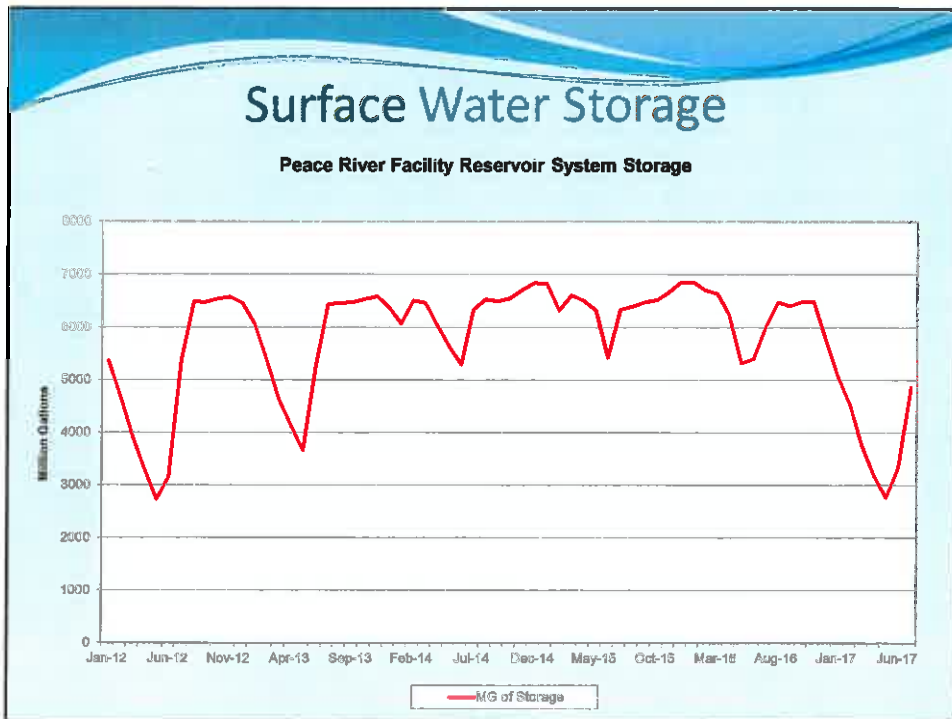
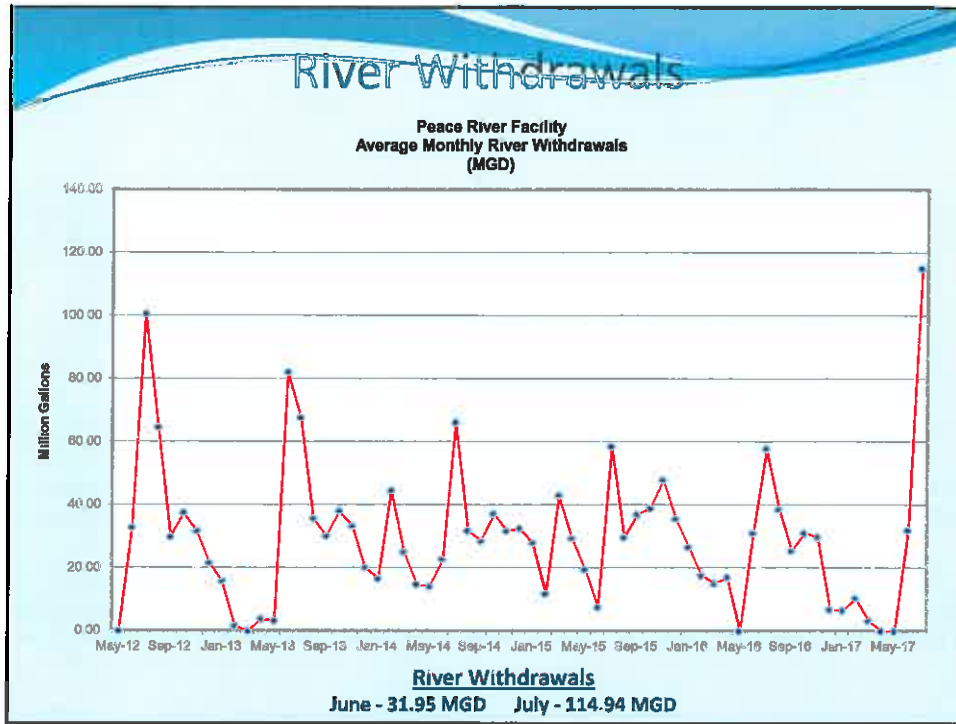
- Water Supply Quantity: Excellent
- Treated Water Quality: Excellent

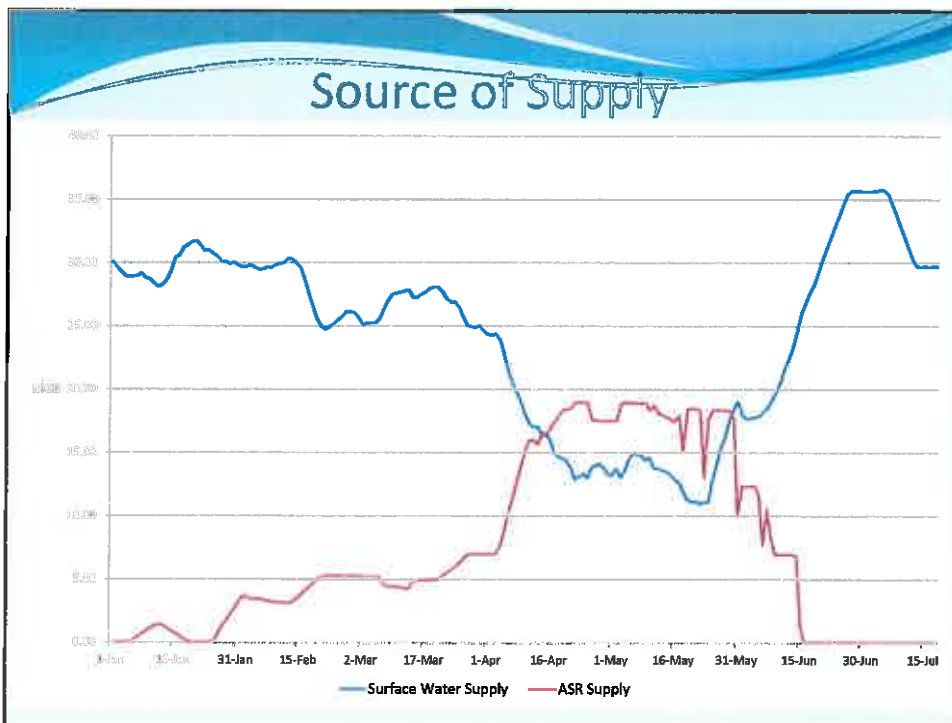
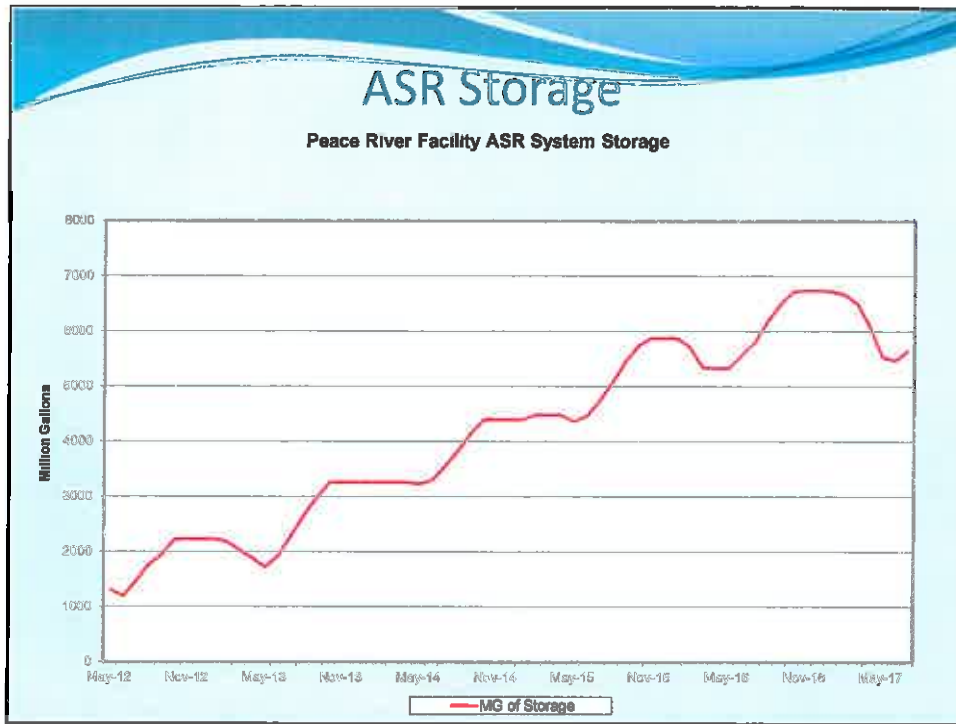
July Water Demand	21.61 MGD
July River Withdrawals	114.94 MGD
<u>Storage Volume:</u> Reservoirs ASR Total	4.86 BG <u>5.65 BG</u> 10.51 BG

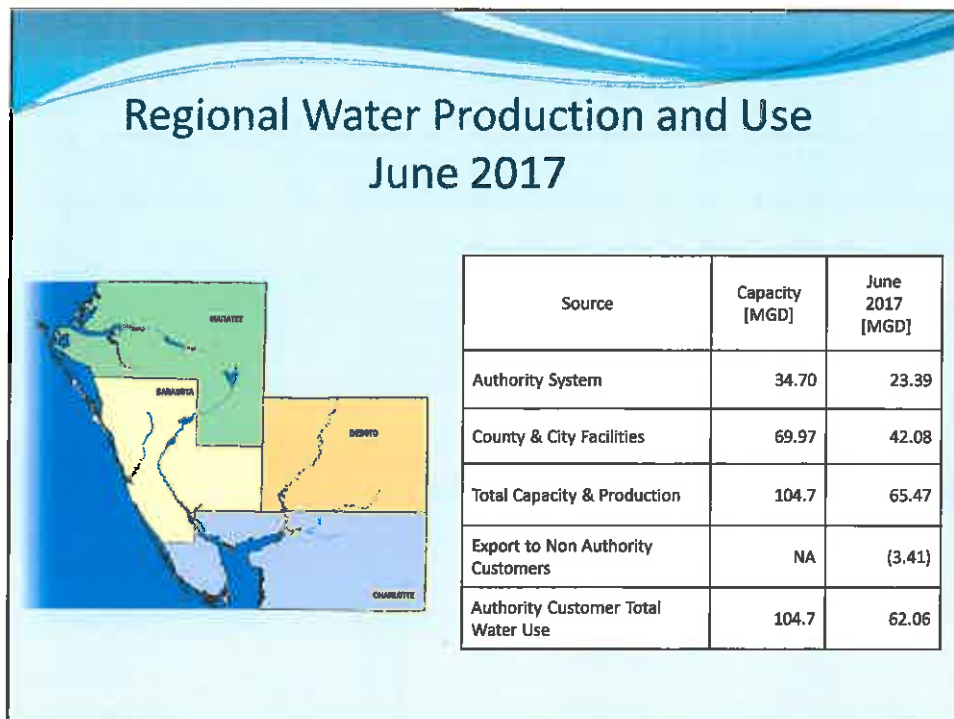
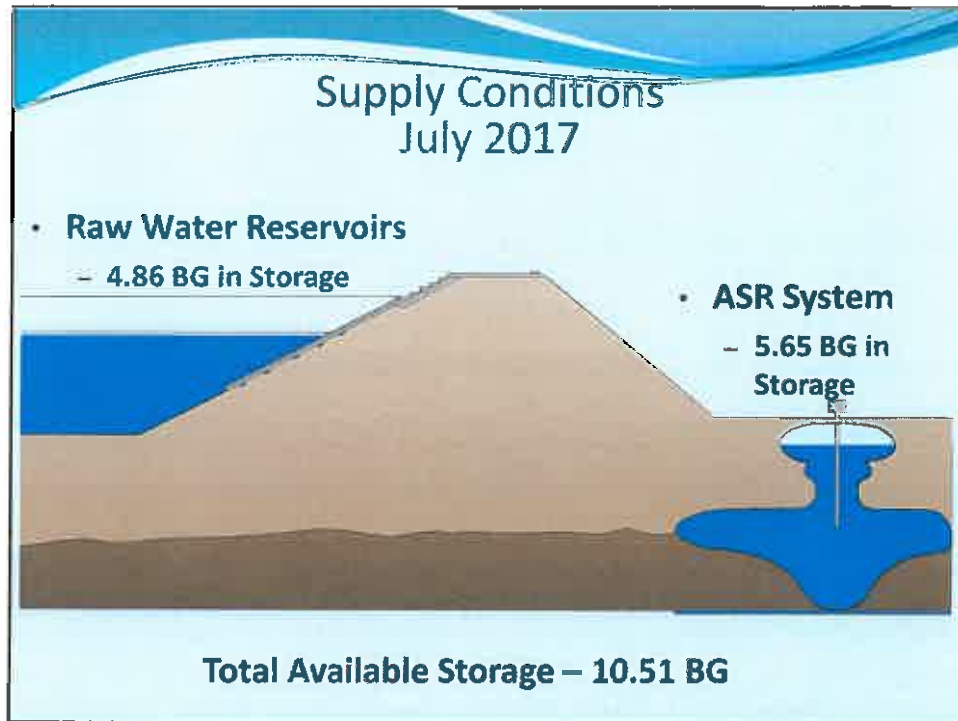
**Attachments:**  
Presentation Materials

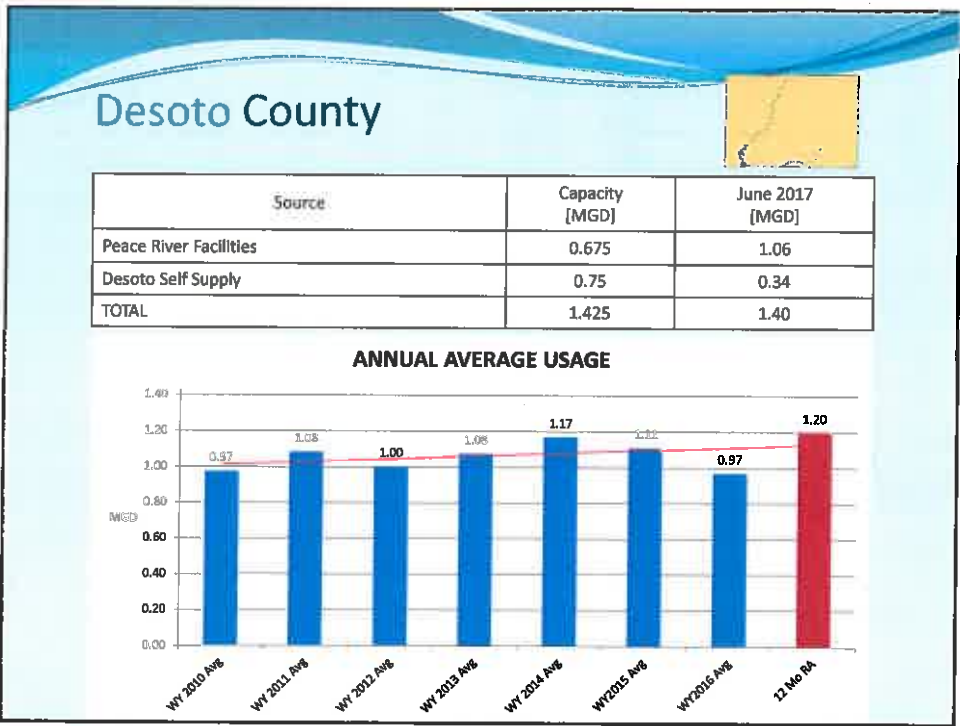
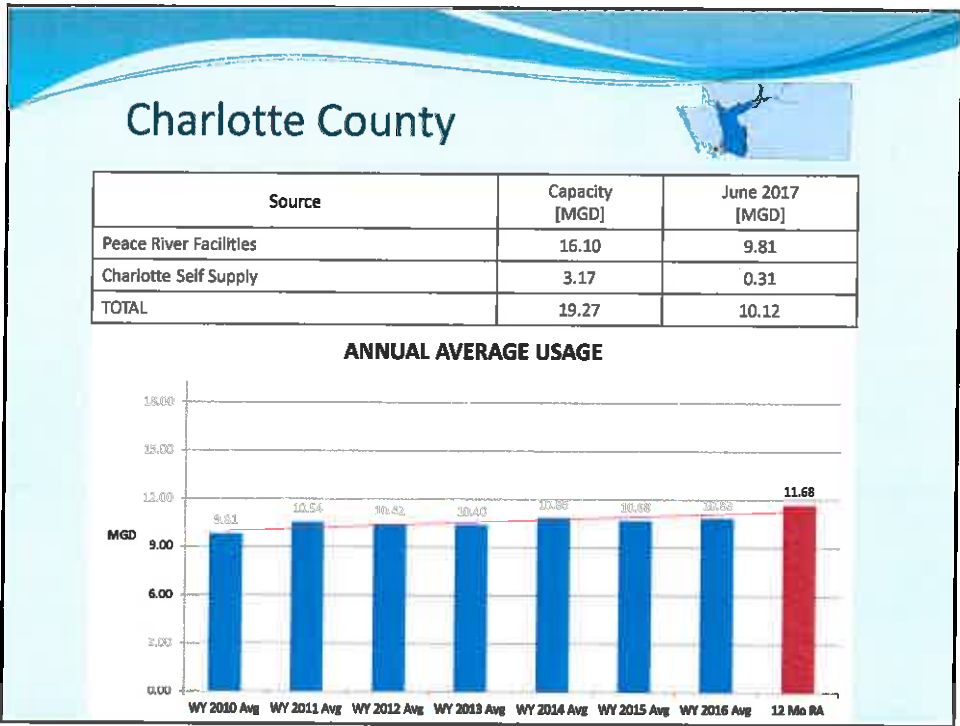








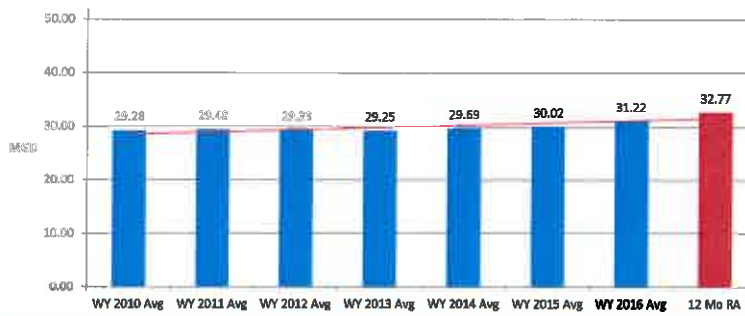




## Manatee County

Source	Capacity [MGD]	June 2017 [MGD]
Manatee Self Supply	52.00	29.40
Export to Sarasota Co.	NA	4.02
Export to Others	NA	3.40
<b>TOTAL</b>	<b>52.00</b>	<b>36.83</b>

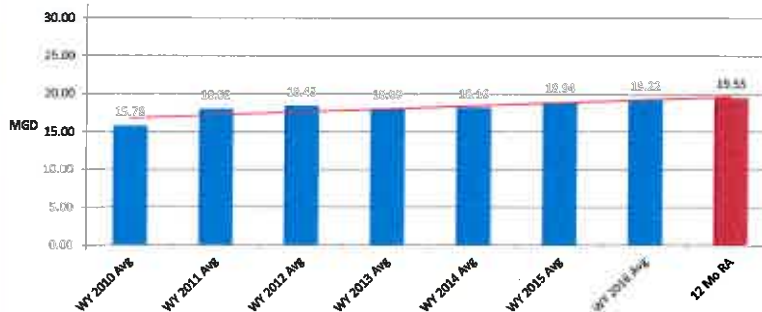
**ANNUAL AVERAGE USAGE**



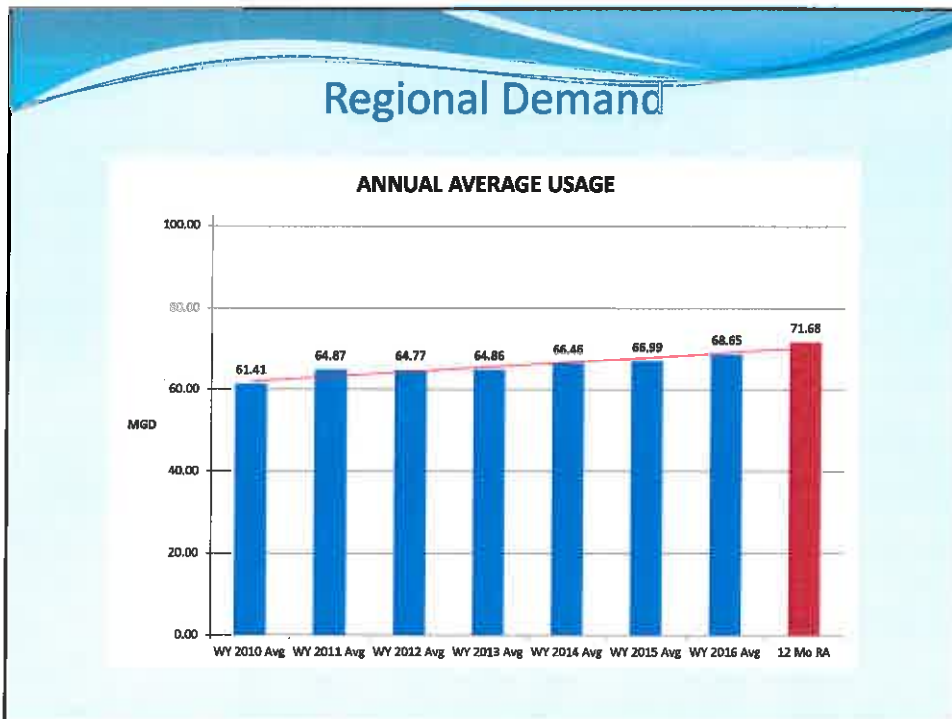
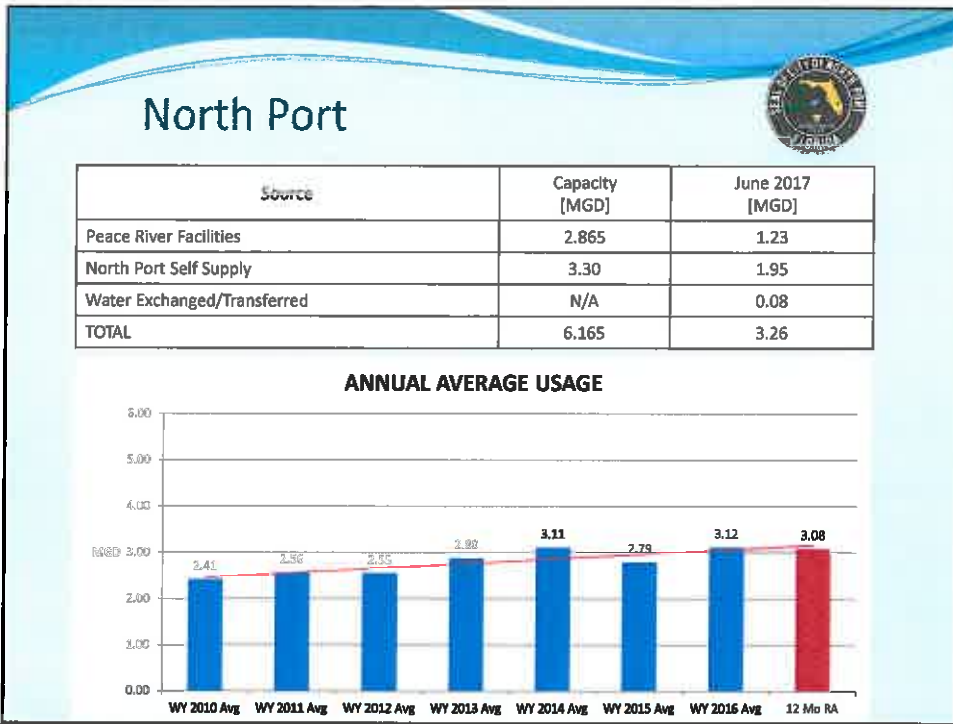
## Sarasota County

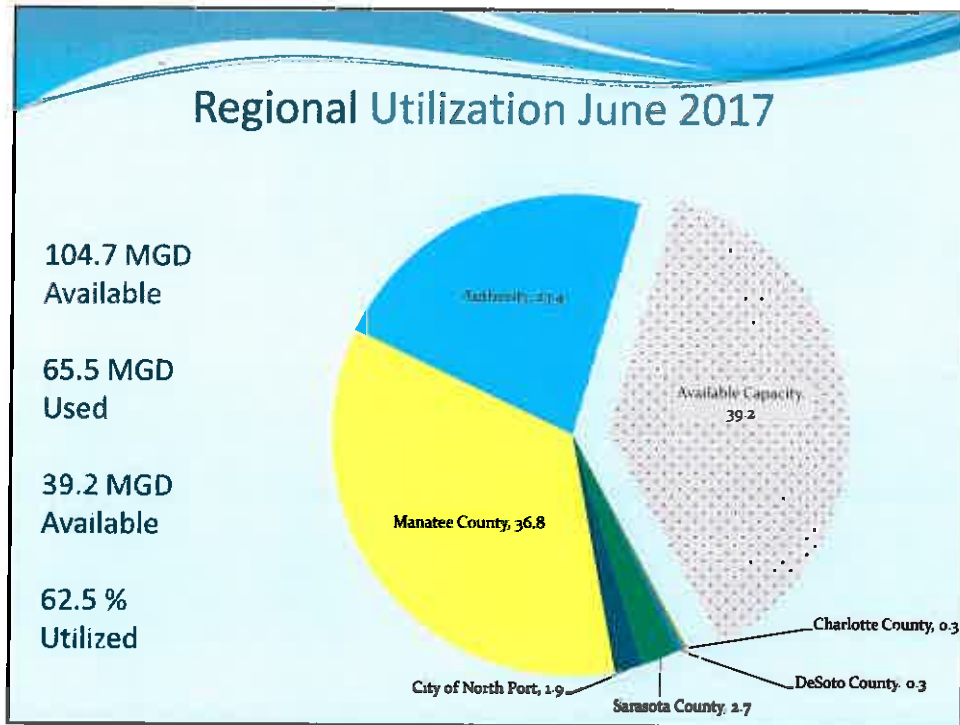
Source	Capacity [MGD]	June 2017 [MGD]
Peace River Facilities	15.06	11.28
Import from Others	8.00	3.95
County Self Supply (Wellfields)	10.52	2.65
<b>TOTAL</b>	<b>33.58</b>	<b>17.88</b>

**ANNUAL AVERAGE USAGE**









**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**REGULAR AGENDA**  
**ITEM 2**

**Peace River Facility WUP Modification**

---

**Presenter -** Mike Coates, Deputy Director

**Recommended Action -** **Status Report.** This item is presented for the Board's information and no action is required.

Additional supply project are planned at the Peace River Facility to meet future water needs in the region. Some of those projects rely on additional water availability from the Peace River, and that availability is controlled through a Water Use Permit (WUP) issued by SWFWMD.

On February 1, 2017 Authority staff briefed the Board on future supply needs and projects and received Board direction to prepare an application to renew and modify the WUP for the Peace River Facility to support future supply projects at this location. A meeting was held with SWFWMD regulatory and legal staff on May 4, 2017 to discuss the application process, including requested changes and supporting materials that will be required. Staff will brief the Board on project progress and estimated completion timeframe.

**Attachments:**

- Tab A Presentation Materials
- Tab B Project Status Report
- Tab C Existing Water Use Permit

**TAB A**  
**Presentation Materials**

# Peace River Facility Water Use Permit Modification/Renewal - Update

Regular Item 2  
August 2, 2017

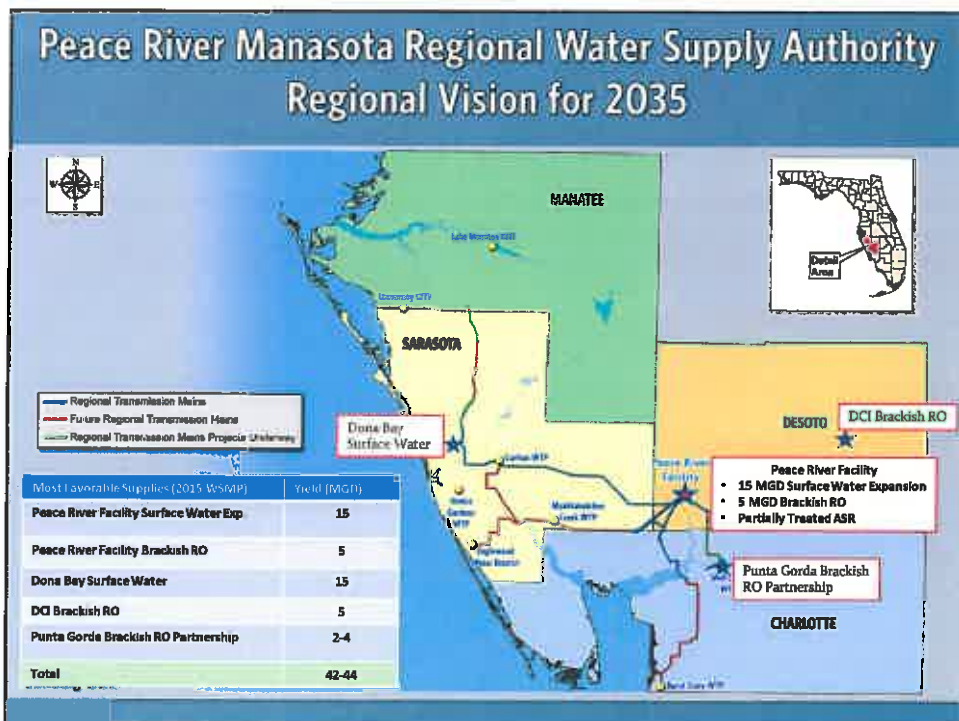
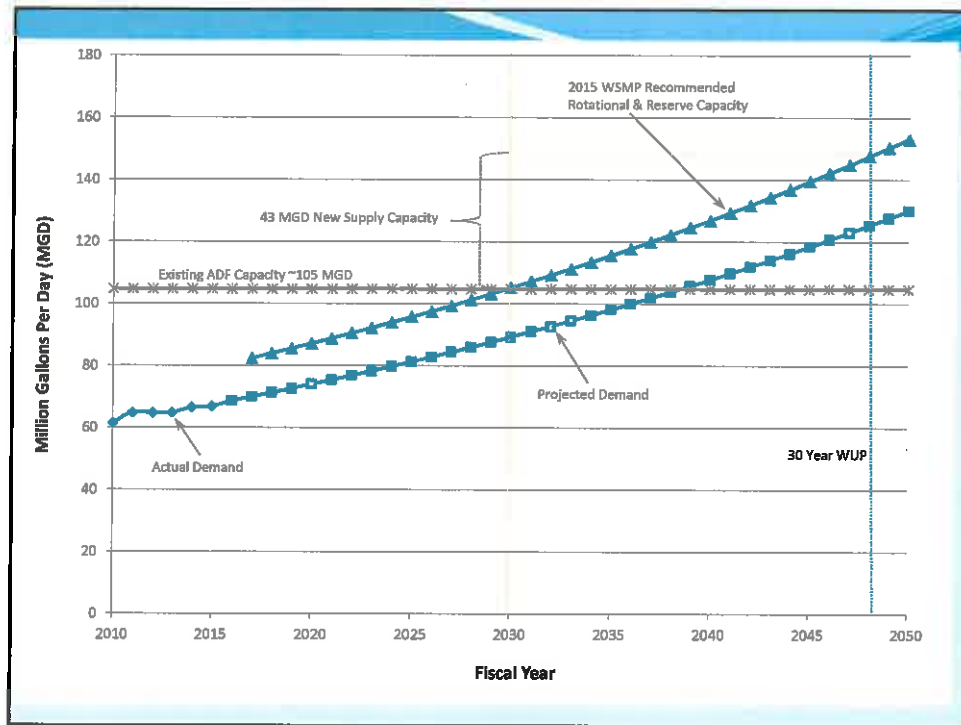
## Current Water Use Permit

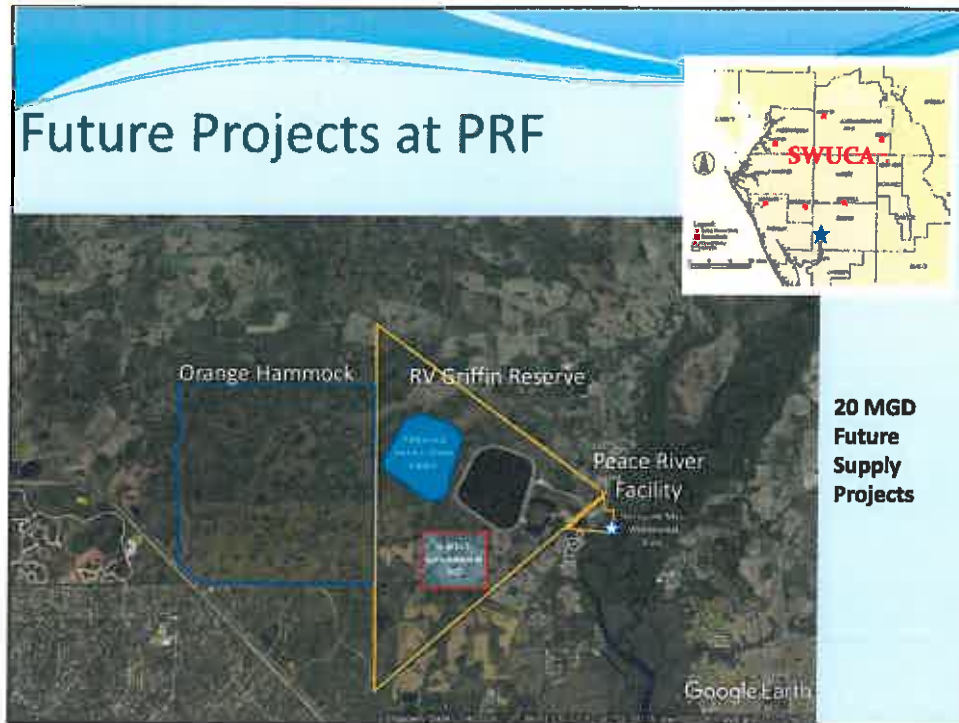


- Expires October 2037
- Permitted Average Annual Delivery 34.8 MGD
- Max River Withdrawal Rate 120 MGD
- Flow-Based Schedule of River Withdrawals

River Flow	Block 1 (1/1 – 12/31)	Block 2 (10/26 – 4/19)	Block 3 (6/26 – 10/27)
84 – 404 MGD	16%	16%	16%
> 405 MGD	16% <sup>(1)</sup>	28%	28%
Maximum Withdrawal Rate	120 MGD	120 MGD	120 MGD

<sup>(1)</sup> Excludes Block 2 & 3 Dates





## Proposed Changes in WUP

Proposed Change	➔	Why Change?
<ul style="list-style-type: none"> <li>• Renewal for Longest Term Possible (up to 50 Years?)</li> </ul>	➔	<ul style="list-style-type: none"> <li>• Supports Long-Term Demand and Supply Planning.</li> </ul>
<ul style="list-style-type: none"> <li>• Increase Maximum Allowable Withdrawal Rate from Peace River to 258 MGD</li> </ul>	➔	<ul style="list-style-type: none"> <li>• Supports Future Facilities Planned at PRF. Consistent with Existing MFL.</li> </ul>
<ul style="list-style-type: none"> <li>• Remove Annual Average Delivery Quantity (34.855 MGD) from WUP</li> </ul>	➔	<ul style="list-style-type: none"> <li>• Improves Regional Operational Flexibility. Consistent with SWUCA Recovery Strategy.</li> </ul>

# Estimated Project Time-Line

Milestone	2017												2018											
	J	F	M	A	M	J	J	A	S	O	N	D	J	F	M	A	M	J	J	A	S	O	N	D
Board Approval to Move Forward																								
Prepare Application Documents																								
Pre-Application Meeting with SWFWMD																								
Board Update																								
Submit Application																								
SWFWMD 30-Day Review & RA Request																								
Compile & Submit Additional Information																								
Board Update																								
Presumed Application Complete																								
SWFWMD Permit Action Required																								
Board Update																								





**TAB B**  
**Project Status Report**

## **Project Status Report**

**Project:** Peace River Facility Water Use Permit Modification/Renewal

**Date:** August 2, 2017

**Prepared by:** Mike Coates, P.G., Deputy Director

---

### **Project Description**

The Authority's Peace River Facility relies on water withdrawn from the Peace River, primarily during high flow conditions, to fill off-stream storage and support the drinking water needs of our Customers. The conditions and limits that govern our withdrawals from the river are established in a Water Use Permit (WUP) issued to the Authority by the Southwest Florida Water Management District. The WUP authorizes a "withdrawal schedule" based on flow conditions in the river at three U.S. Geological Survey gauges upstream of the Peace River Facility.

While the current WUP withdrawal schedule supports the existing storage and treatment configuration, and customer contracted quantities, there are multiple future supplies and supply improvements planned at the Peace River site (and adjacent RV Griffin Reserve) that will rely on an increased harvest of water (above currently permitted quantities) from the Peace River. There is available quantity within the Minimum Flows and Levels established by SWFWMD for the Lower Peace River to enable safe harvest of the additional quantities needed to support future capacity increase projects at this site. This additional harvest will require modification of the the Authority's WUP to allow increased maximum withdrawal rates from the river by the Authority. In addition, renewal of the WUP for increased duration (current permit expires in 2037) should also be considered.

### **Current status**

Staff discussed the concept and rational for this WUP modification/renewal with the Authority Board on February 1, 2017. Board direction was for renewal of the permit for the longest duration allowable, and to consider increase in withdrawal rates from the river to the allowable limit in the established MFL. Authority representatives met with SWFWMD staff on May 4, 2017 to discuss the application for permit renewal and modification. Authority staff and consultants are preparing the application package. Submittal timeframe is projected as late summer.

## Project History Briefing

**Project:** Peace River Facility Water Use Permit Modification/Renewal

**Date:** August 2, 2017

**Prepared by:** Mike Coates, P.G., Deputy Director

---

The following information summarizes the historical milestones and key events of the Peace River Facility Water Use Permit Modification/Renewal Project.

- February 2017 Staff presentation to the Authority Board February 1, 2017 regarding need to consider increased withdrawals from the Peace River to support future projects and demand, and increase term of the Authority's existing WUP. Board direction was to request longest permit duration allowable, and maximum withdrawal allowable under the current MFL and eliminate delivery quantity.
- March 2017 Staff and consultants assembling supporting information for withdrawal increase and extended permit term. Pre-application meeting with SWFWMD proposed in early May.
- April 2017 Staff and consultants preparation for meeting with SWFWMD on May 4<sup>th</sup> to discuss the application.
- May 2017 Authority representatives met with SWFWMD staff on May 4<sup>th</sup> in Tampa to discuss the WUP renewal and modification. February 2017 Authority Board direction pertaining to changes in the permit and permit duration were conveyed to District staff along with history of the facility, review of supply operations and future planning for water supply development at the Peace River Facility site. Meeting held with project consultant (PWR) on May 11<sup>th</sup> to develop application outline based on SWFWMD meeting.
- June 2017 Working on application document including demand projections, conservation plans, facility history, operations discussion and HBMP.
- July 2017 Met with project consultant (PWR) July 7<sup>th</sup> to discuss application preparation progress to date. Continuing work on application and supporting documents.

**TAB C**  
**Existing Water Use Permit**



An Equal  
Opportunity  
Employer

# Southwest Florida Water Management District

2379 Broad Street, Brooksville, Florida 34604-6899

(352) 796-7211 or 1-800-423-1476 (FL only)

TDD only: 1-800-231-6103 (FL only)

On the Internet at [WaterMatters.org](http://WaterMatters.org)

**Bartow Service Office**  
170 Century Boulevard  
Bartow, Florida 33830-7700  
(863) 534-1448 or  
1-800-422-7862 (FL only)

**Sarasota Service Office**  
6750 Fruitville Road  
Sarasota, Florida 34240-9711  
(941) 377-3722 or  
1-800-320-9503 (FL only)

**Tampa Service Office**  
7801 Highway 301 North  
Tampa, Florida 33637-6759  
(813) 965-7481 or  
1-800-836-0797 (FL only)

August 25, 2015

Peace River Manasota Regional Water Supply Authority  
Attn: Patrick Lehman, P.E.  
9415 Town Center Parkway  
Lakewood Ranch, FL 34202

Sarasota County B.O.C.C.  
Attn: Alen Maio  
1660 Ringling Boulevard  
Sarasota, FL 34236

**Subject:** Final Agency Action Transmittal Letter  
Individual Water Use Permit No. 20 010420.009

Dear Permittee:

This Water Use Permit was approved by the District Governing Board subject to all terms and conditions set forth in the Permit.

Please be advised that the Governing Board has formulated a water shortage plan referenced in a Standard Water Use Permit Condition (Exhibit A) of your permit, and will implement such a plan during periods of water shortage. You will be notified during a declared water shortage of any change in the conditions of your Permit or any suspension of your Permit, or of any restriction on your use of water for the duration of any declared water shortage. Please further note that water conservation is a condition of your Permit and should be practiced at all times.

The well tags for your withdrawals will be applied by a District representative. If you have any questions or concerns regarding your tags, please contact Adam Hange at extension 6518, in the Sarasota Service Office. If you have any questions or concerns regarding your permit or any other information, please contact the Tampa Service Office and ask to speak to someone in the Water Use Permit Bureau.

Sincerely,

**Darrin Herbst, P.G.** Electronically Signed

Darrin Herbst, P.G.  
Bureau Chief  
Water Use Permit Bureau  
Regulation Division

Enclosures: Approved Permit

cc: James Guida, P.G., Progressive Water  
Resources Mike Coates, P.G.  
Charlotte County B.O.C.C.  
City of North Port  
Desoto County B.O.C.C.  
Doug Manson, Esquire  
Manatee County B.O.C.C.

**SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT**  
**WATER USE PERMIT**  
**Individual**  
**PERMIT NO. 20 010420.009**

**PERMIT ISSUE DATE:** August 25, 2015

**EXPIRATION DATE:** October 01, 2037

The Permittee is responsible for submitting an application to renew this permit no sooner than one year prior to the expiration date, and no later than the end of the last business day before the expiration date, whether or not the Permittee receives prior notification by mail. Failure to submit a renewal application prior to the expiration date and continuing to withdraw water after the expiration date is a violation of Chapter 373, Florida Statutes, and Chapter 40D-2, Florida Administrative Code, and may result in a monetary penalty and/or loss of the right to use the water. Issuance of a renewal of this permit is contingent upon District approval.

**TYPE OF APPLICATION:** Modification

**GRANTED TO:** Peace River Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, FL 34202  
Charlotte County B.O.C.C.  
18500 Murdock Circle, Suite 536  
Port Charlotte, FL 33948  
City of North Port  
4970 City Hall Boulevard  
North Port, FL 34286  
DeSoto County B.O.C.C.  
201 East Oak Street  
Arcadia, FL 34255  
Sarasota County B.O.C.C.  
1880 Ringling Boulevard  
Sarasota, FL 34236  
Manatee County B.O.C.C.  
Post Office Box 1000  
Bradenton, FL 34206

**PROJECT NAME:** Peace River Water Treatment Plant

**WATER USE CAUTION AREA(S):** SOUTHERN WATER USE CAUTION AREA

**COUNTY:** Desoto

TOTAL QUANTITIES AUTHORIZED UNDER THIS PERMIT (in gallons per day)	
ANNUAL AVERAGE	34,855,000 gpd
PEAK MONTH <sup>1</sup>	41,852,000 gpd
CROP PROTECTION/MAXIMUM <sup>2</sup>	120,000,000 gpd

1. Peak Month: Average daily use during the highest water use month.
2. Crop Protection/Maximum: Maximum use allowed any 24-hour period/Frost and Freeze protection of crops.

**ABSTRACT:**

This is a modification of an existing water use permit for public supply. The Peace River Manasota Regional Water Supply Authority (PRMRWSA) is a regional utility that relies exclusively on surface water withdrawals from the Peace River.

This modification acknowledges an increase in the finished water capacity coming out of the water treatment plant, from 32.855 MGD to 34.855 MGD on an annual average basis, as a result of water treatment plant upgrades and increased customer demand. The peak month quantity for finished water is also increased, from 38.3 MGD to 41.852 MGD. There is no increase in the raw water withdrawals from the Peace River going into the water treatment plant, which remain limited by the Minimum Flow established for the lower Peace River; the previously authorized diversion schedule; and existing storage and withdrawal capacity. There is no change in Use Type from the previous revision. This permit is located within the Southern Water Use Caution Area and relies exclusively on an alternative water source.

Special Conditions include those that require the Permittee to maintain a per capita rate of no more than 150 gpd; maintain a water conserving rate structure; submit the public supply Water Use Annual Report by April 1 of each year; record and report daily river flows; record and report monthly meter readings from all withdrawal points; sample Aquifer Storage & Recovery (ASR) wells on a monthly basis; maintain withdrawals in compliance with the MFL for the lower Peace River; continue implementation of the Hydrobiological Monitoring Plan (HBMP); and maximize the use of ASR.

WATER USE TABLE (in gpd)

<u>USE</u>	<u>ANNUAL AVERAGE</u>	<u>PEAK MONTH</u>	<u>CROP PROTECTION /MAXIMUM</u>
Public Supply	34,855,000	41,852,000	120,000,000

USE TYPE

Regional Public Supply  
System

PUBLIC SUPPLY:

Population Served: 338,989  
Per Capita Rate: 97 gpd/person

WITHDRAWAL POINT QUANTITY TABLE

Water use from these withdrawal points are restricted to the quantities given below :

<u>I.D. NO.</u>	<u>DIAM</u>	<u>DEPTH</u>	<u>USE DESCRIPTION</u>	<u>AVERAGE</u>	<u>PEAK</u>	<u>CROP</u>
<u>PERMITTEE/ DISTRICT</u>	<u>(in.)</u>	<u>TTL./CSD.FT.</u>		<u>(gpd)</u>	<u>MONTH</u>	<u>PROTECTION</u>
		<u>(feet bte)</u>			<u>(gpd)</u>	<u>(gpd)</u>
14 / 14	30	N/A / N/A	Public Supply	34,855,000	41,852,000	120,000,000
S-1 / 20	8	920 / 570	Re-Pump	398,000	462,300	N/A
S-2 / 21	12	900 / 570	Re-Pump	711,200	828,700	N/A
S-3R / 22	16	789 / 580	Re-Pump	711,200	828,700	N/A
S-4 / 23	12	905 / 570	Re-Pump	711,200	828,700	N/A
S-6 / 25	12	910 / 580	Re-Pump	711,200	828,700	N/A
S-7 / 26	12	916 / 575	Re-Pump	711,200	828,700	N/A
S-8 / 27	12	623 / 510	Re-Pump	711,200	828,700	N/A
S-9R / 28	16	800 / 580	Re-Pump	711,200	828,700	N/A
S-10 / 29	16	905 / 620	Re-Pump	711,200	828,700	N/A

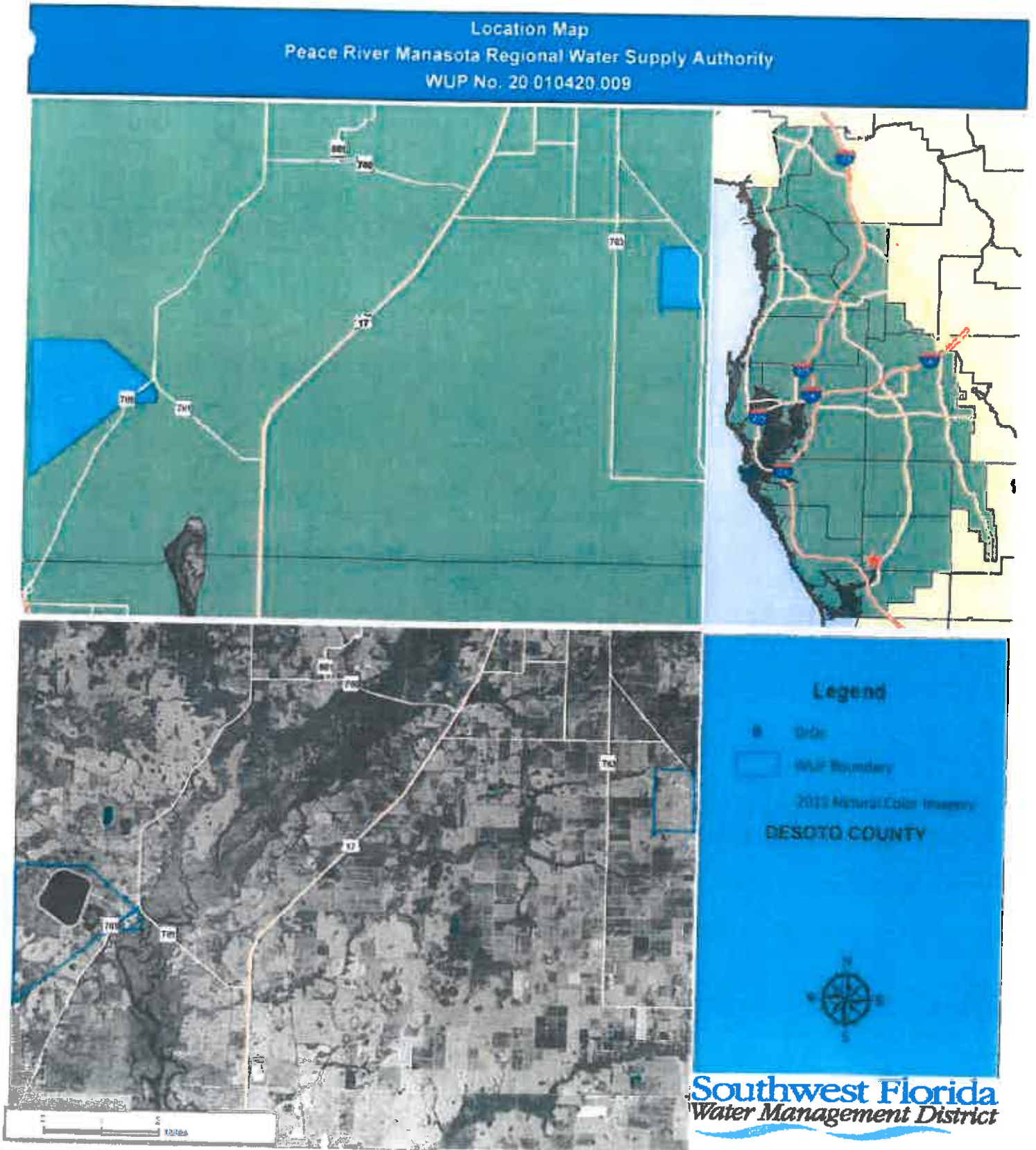
S-11 / 30	18	908 / 585	Re-Pump	711,200	828,700	N/A
S-12 / 31	18	900 / 600	Re-Pump	711,200	828,700	N/A
S-13 / 32	16	898 / 621	Re-Pump	711,200	828,700	N/A
S-14 / 33	16	900 / 568	Re-Pump	711,200	828,700	N/A
S-15 / 34	16	900 / 583	Re-Pump	711,200	828,700	N/A
T-1 / 35	12	482 / 380	Re-Pump	298,000	346,200	N/A
S-5R / 36	16	955 / 650	Re-Pump	711,200	828,700	N/A
S-16 / 37	16	902 / 583	Re-Pump	711,200	828,700	N/A
S-17 / 38	16	883 / 579	Re-Pump	711,200	828,700	N/A
S-18 / 39	18	900 / 592	Re-Pump	711,200	828,700	N/A
S-19 / 40	16	900 / 585	Re-Pump	711,200	828,700	N/A
S-20 / 41	16	898 / 566	Re-Pump	711,200	828,700	N/A
S-21 / 42	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-22 / 43	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-23 / 44	18	900 / 570	Re-Pump	711,200	828,700	N/A
S-24 / 45	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-25 / 46	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-26 / 47	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-27 / 48	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-28 / 49	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-29 / 57	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-30 / 58	18	900 / 570	Re-Pump	711,200	828,700	N/A
S-31 / 59	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-32 / 60	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-33 / 61	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-34 / 62	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-35 / 63	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-36 / 64	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-37 / 65	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-38 / 66	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-39 / 67	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-40 / 68	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-41 / 69	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-42 / 70	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-43 / 71	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-44 / 72	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-45 / 73	16	900 / 570	Re-Pump	711,200	828,700	N/A
S-46 / 74	16	900 / 570	Re-Pump	711,200	828,700	N/A
DJ-1 / 78	10	590 / 108	Public Supply	77,500	504,000	N/A
Standby						
DJ-3 / 80	8	570 / 70	Public Supply	77,500	504,000	N/A
Standby						



WITHDRAWAL POINT LOCATION TABLE

<u>DISTRICT I.D. NO.</u>	<u>LATITUDE/LONGITUDE</u>
14	27° 05' 12.45"/81° 59' 57.95"
20	27° 05' 29.27"/82° 00' 07.96"
21	27° 05' 29.20"/82° 00' 09.32"
22	27° 05' 22.56"/82° 00' 08.23"
23	27° 05' 05.44"/82° 01' 10.05"
25	27° 05' 15.75"/82° 00' 28.10"
26	27° 05' 10.37"/82° 00' 27.40"
27	27° 05' 09.37"/82° 00' 35.61"
28	27° 05' 16.05"/82° 00' 17.92"
29	27° 04' 57.68"/82° 01' 06.56"
30	27° 05' 00.30"/82° 01' 06.66"
31	27° 04' 57.58"/82° 01' 09.77"
32	27° 05' 00.09"/82° 01' 10.03"
33	27° 04' 57.18"/82° 01' 13.12"
34	27° 04' 59.77"/82° 01' 13.33"
35	27° 05' 28.50"/82° 00' 09.30"
36	27° 05' 22.49"/82° 00' 18.12"
37	27° 05' 03.01"/82° 01' 06.60"
38	27° 05' 06.04"/82° 01' 06.28"
39	27° 05' 03.12"/82° 01' 09.73"
40	27° 05' 02.91"/82° 01' 13.38"
41	27° 05' 06.28"/82° 01' 13.50"
42	27° 05' 15.14"/82° 02' 02.11"
43	27° 05' 11.53"/82° 01' 51.25"
44	27° 05' 11.79"/82° 02' 13.61"
45	27° 05' 05.88"/82° 02' 03.06"
46	27° 05' 00.85"/82° 01' 51.16"
47	27° 04' 58.44"/82° 02' 02.94"
48	27° 04' 50.88"/82° 01' 52.27"
49	27° 04' 40.72"/82° 01' 51.75"
57	27° 04' 36.96"/82° 01' 45.36"
58	27° 04' 33.17"/82° 01' 35.30"
59	27° 04' 26.68"/82° 01' 44.88"
60	27° 04' 27.82"/82° 01' 50.57"
61	27° 04' 33.30"/82° 01' 58.70"
62	27° 04' 38.14"/82° 02' 06.80"
63	27° 04' 42.88"/82° 02' 15.54"
64	27° 04' 48.47"/82° 02' 16.76"
65	27° 04' 52.20"/82° 02' 24.73"
66	27° 05' 05.44"/82° 02' 36.38"
67	27° 05' 24.55"/82° 02' 36.34"

68	27° 05' 15.87"/82° 02' 40.60"
69	27° 04' 55.99"/82° 02' 39.77"
70	27° 04' 50.51"/82° 02' 35.83"
71	27° 04' 42.69"/82° 02' 26.75"
72	27° 04' 33.68"/82° 02' 16.61"
73	27° 04' 31.33"/82° 02' 06.78"
74	27° 04' 22.54"/82° 02' 05.68"
76	27° 08' 14.83"/81° 48' 13.24"
80	27° 08' 12.54"/81° 48' 11.76"



**STANDARD CONDITIONS:**

The Permittee shall comply with the Standard Conditions attached hereto, incorporated herein by reference as Exhibit A and made a part hereof.

**SPECIAL CONDITIONS:**

1. All reports and data required by condition(s) of the permit shall be submitted to the District according to the due date(s) contained in the specific condition. If the condition specifies that a District-supplied form is to be used, the Permittee should use that form in order for their submission to be acknowledged in a timely manner. The only alternative to this requirement is to use the District Permit Information Center ([www.swfwmd.state.fl.us/permits/epermitting/](http://www.swfwmd.state.fl.us/permits/epermitting/)) to submit data, plans or reports online. There are instructions at the District website on how to register to set up an account to do so. If the report or data is received on or before the tenth day of the month following data collection, it shall be deemed as a timely submittal.

All mailed reports and data are to be sent to:

Southwest Florida Water Management District  
Tampa Service Office, Water Use Permit Bureau  
7601 U.S. Hwy. 301 North  
Tampa, Florida 33637-6759

Submission of plans and reports: Unless submitted online or otherwise indicated in the special condition, the original and two copies of each plan and report, such as conservation plans, environmental analyses, aquifer test results, per capita annual reports, etc. are required.

Submission of data: Unless otherwise indicated in the special condition, an original (no copies) is required for data submittals such as crop report forms, meter readings and/or pumpage, rainfall, water level, evapotranspiration, or water quality data.  
(499)

2. The Permittee shall construct the proposed wells according to the surface diameter, casing depth, and total depth specifications listed below. The casing shall be continuous from land surface to the minimum depth stated and is specified to prevent the unauthorized interchange of water between different water bearing zones. The surface diameter and total depth specified are those proposed by the Permittee in the application process. However, it is the Permittee's responsibility to have the water in the well sampled during well construction before reaching the estimated minimum total depth. Such sampling is necessary to ensure that the well does not encounter water quality that cannot be utilized by the Permittee, and to ensure that withdrawals from the well will not cause salt-water intrusion. All depths given are in feet below land surface.  
District ID Nos. 42 through 49, and 57 through 74, Permittee ID Nos. S-21 through S-46, having a surface diameter of 16 inches, with a minimum casing depth of 570 feet, drilled to a minimum total depth of 900 feet.  
(235)
3. Any wells not in use, and in which pumping equipment is not installed shall be capped or valved in a water tight manner in accordance with Chapter 62-532.500, F.A.C.(568)
4. Beginning January 1, 2012, the Permittee shall comply with the following requirements:
  - A. Customer billing period usage shall be placed on each utility-metered, customer's bill.
  - B. Meters shall be read and customers shall be billed no less frequently than bi-monthly.
  - C. The following information, as applicable to the customer, shall be provided at least once each calendar year and a summary of the provisions shall be provided to the District annually as described in Section D, below. The information shall be provided by postal mailings, bill inserts, online notices, on the bill or by other means. If billing units are not in gallons, a means to convert the units to gallons must be provided.
    1. To each utility-metered customer in each customer class - information describing the rate structure and shall include any applicable:
      - a. Fixed and variable charges,
      - b. Minimum charges and the quantity of water covered by such charges,

- c. Price block quantity thresholds and prices,
- d. Seasonal rate information and the months to which they apply, and
- e. Usage surcharges

2. To each utility-metered single-family residential customer - Information that the customer can use to compare its water use relative to other single-family customers or to estimate an efficient use and that shall include one or more of the following:

a. The average or median single-family residential customer billing period water use calculated over the most recent three year period, or the most recent two year period if a three year period is not available to the utility. Data by billing period is preferred but not required.

b. A means to calculate an efficient billing period use based on the customer's characteristics, or

c. A means to calculate an efficient billing period use based on the service area's characteristics.

D. Annual Report: The following information shall be submitted to the District annually by October 1 of each year of the permit term to demonstrate compliance with the requirements above. The information shall be current as of the October 1 submittal date.

1. Description of the current water rate structure (rate ordinance or tariff sheet) for potable and non-potable water.

2. Description of the current customer billing and meter reading practices and any proposed changes to these practices (including a copy of a bill per A above).

3. Description of the means the permittee uses to make their metered customers aware of rate structures, and how the permittee provides information their metered single-family residential customers can use to compare their water use relative to other single-family customers or estimate an efficient use (see C 1 & 2 above).  
(592)

5. This Permit is located within the Southern Water Use Caution Area (SWUCA). Pursuant to Section 373.0421, Florida Statutes, the SWUCA is subject to a minimum flows and levels recovery strategy, which became effective on January 1, 2007. The Governing Board may amend the recovery strategy, including amending applicable water use permitting rules based on an annual assessment of water resource criteria, cumulative water withdrawal impacts, and on a recurring five-year evaluation of the status of the recovery strategy up to the year 2025 as described in Chapter 40D-80, Florida Administrative Code. This Permit is subject to modification to comply with new rules.(652)
6. The Permittee shall maintain a water conserving rate structure for the duration of the permit term. Any changes to the water conserving rate structure described in the application shall be described in detail as a component of the next Annual Report on Water Rate, Billing and Meter Reading Practices of the year following the change.(659)
7. The Permittee shall submit a "Water Use Annual Report" to the District by April 1 of each year on their water use during the preceding calendar year using the form, "Public Supply Water Use Annual Report Form" (Form No. LEG-R.047.00 (09/09)), referred to in this condition as "the Form," and all required attachments and documentation. The Permittee shall adhere to the "Instructions for Completion of the Water Use Annual Report" attached to and made part of this condition in Exhibit B. The Form addresses the following components in separate sections.

#### Per Capita Use Rate

A per capita rate for the previous calendar year will be calculated as provided in Part A of the Form using Part C of the Form to determine Significant Use deduction that may apply. Permittees that cannot achieve a per capita rate of 150 gpd according to the time frames included in the "Instructions for Completion of the Water Use Annual Report," shall include a report on why this rate was not achieved, measures taken to comply with this requirement, and a plan to bring the permit into compliance.

#### Residential Use

Residential use shall be reported in the categories specified in Part B of the Form, and the methodology used to determine the number of dwelling units by type and their quantities used shall be documented in an attachment.

#### Non-Residential Use

Non-residential use quantities provided for use in a community but that are not directly associated with

places of residence, as well as the total water losses that occur between the point of output of the treatment plant and accountable end users, shall be reported in Part B of the Form.

#### Water Conservation

In an attachment to the Form, the Permittee shall describe the following:

1. Description of any ongoing audit program of the water treatment plant and distribution systems to address reductions in water losses.
2. An update of the water conservation plan that describes and quantifies the effectiveness of measures currently in practice, any additional measures proposed to be implemented, the scheduled implementation dates, and an estimate of anticipated water savings for each additional measure.
3. A description of the Permittees implementation of water-efficient landscape and irrigation codes or ordinances, public information and education programs, water conservation incentive programs, identification of which measures and programs, if any, were derived from the Conserve Florida Water Conservation Guide, and provide the projected costs of the measures and programs and the projected water savings.

#### Water Audit

If the current water loss rate is greater than 10% of the total distribution quantities, a water audit as described in the "Instructions for Completion of the Water Use Annual Report" shall be conducted and completed by the following July 1, with the results submitted by the following October 1. Indicate on Part A of the Form whether the water audit was done, will be done, or is not applicable.

#### Alternative Water Supplied Other Than Reclaimed Water

If the Permittee provides Alternative Water Supplies other than reclaimed water (e.g., stormwater not treated for potable use) to customers, the information required on Part D of the Form shall be submitted along with an attached map depicting the areas of current Alternative Water Use service and areas that are projected to be added within the next year.

#### Suppliers of Reclaimed Water

1. Permittees having a wastewater treatment facility with an annual average design capacity equal to or greater than 100,000 gpd:

The Permittee shall submit the "SWFWMD Annual Reclaimed Water Supplier Report" on quantities of reclaimed water that was provided to customers during the previous fiscal year (October 1 to September 30). The report shall be submitted in Excel format on the Compact Disk, Form No. LEG-R.026.00 (05/09), that will be provided annually to them by the District. A map depicting the area of reclaimed water service that includes any areas projected to be added within the next year, shall be submitted with this report.

2. Permittees that have a wastewater treatment facility with an annual average design capacity less than 100,000 gpd:

- a. The Permittee has the option to submit the "SWFWMD Annual Reclaimed Water Supplier Report," Form No. LEG-R.026.00, as described in sub-part (1) above, or

- b. Provide information on reclaimed water supplied to customers on Part E of the Form as described in the "Instructions for Completion of the Water Use Annual Report".

#### Updated Service Area Map

If there have been changes to the service area since the previous reporting period, the Permittee shall update the service area using the map that is maintained in the District's Mapping and GIS system. (660)

8. The Permittee shall be allowed to divert surface water from the Peace River with the following limitations:

- a. No diversion from the Peace River may occur when the combined average daily flow as measured at the Arcadia Station, Joshua Creek at Nocatee, and Horse Creek near Arcadia for the previous day was less than 130 cubic feet per second (cfs);

- b. The amount of diversion on the Peace River at District Withdrawal No. 14 shall not exceed the following percentages of the combined average daily flow rate of the river as read at the Arcadia Station, Joshua Creek at Nocatee, and Horse Creek near Arcadia for the previous day:

- (1) All blocks (January 1 through December 31) - 16% of the combined average daily flow

- (2) Block 2 (October 28 through April 19) - 28% of the combined average daily flow when the sum of flow is equal to or exceeds 625 cfs

(3) Block 3 (June 26 through October 27) - 28% of the combined average daily flow when the sum of flow is equal to or exceeds 625 cfs;

c. However, in no case shall the diversion amount exceed the difference between the combined previous day measurements at the Arcadia Station, Joshua Creek at Nocatee, and Horse Creek near Arcadia, and 130 cfs.(992)

9. Background water quality samples shall be collected during drilling from all ASR production wells completed after issuance of this permit. The samples shall be collected at intervals of 50 feet or less, from 600 feet below land surface to the bottom of the well or as may otherwise be specified in the well construction permit in accordance with regulatory requirements in effect at the time. The Permittee's sampling procedure shall follow the handling and chain of custody procedures designated by the certified laboratory which will undertake the analysis. The results of the sampling program shall be due within 30 days of the completion of the construction of the well. For sampling, analysis and submittal requirements, see Exhibit B, attached to and made part of this permit.  
District ID Nos. 42 through 49, and 57 through 74, Permittee ID Nos. S-21 through S-74 for total dissolved solids, sulfate, conductivity, chlorides, and pH.  
(753)
10. The Permittee shall continue to record and submit water levels for the following wells and report them to the District at the frequency listed for the interval, aquifer system, or geologic formation listed. To the maximum extent possible, water levels shall be recorded on a regular schedule: same time each day, same day each week, same week each month as appropriate to the frequency required. The readings shall reported online via the WUP Portal at the District website or mailed in hardcopy on District-provided forms to the Water Use Permit Bureau, on or before the tenth day of the following month. The frequency of recording may be modified by the Water Use Permit Bureau Chief, as necessary to ensure the protection of the resource.  
District ID Nos. 20, 21, 22, 23, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41 and 50, Permittee ID Nos. S-1, S-2, S-3R, S-4, S-6, S-7, S-8, S-9R, S-10, S-11, S-12, S-13, S-14, S-15, T-1, S-5R, S-16, S-17, S-18, S-19, S-20 and E on a weekly basis.  
District ID Nos. 51 and 52, Permittee ID Nos. M-2 and T-2 on a continuous (hourly) basis and then reduce the data to daily minimum and maximum values.  
(758)
11. The Permittee shall maintain a per capita rate of 150 gpd whether it is calculated as an unadjusted gross per capita, an adjusted gross per capita, or a compliance per capita as provided in Chapter 3, Part B of the "Water Use Permit Information Manual". Compliance with the per capita rate shall be monitored via the Annual Report and the Reclaimed Water Supplier Report that are required to be submitted by April 1 of each year for the term of the permit.(67)
12. The following existing standby withdrawal facilities (those that provide back-up water for another withdrawal point in the event the other withdrawal point becomes unusable) shall continue to be metered: District ID Nos. 78 and 80, Permittee ID Nos. DJ-1 and DJ-3. Meter reading and reporting, as well as meter accuracy checks every five years shall be in accordance with instructions in Exhibit B, Metering Instructions, attached to and made part of this permit.(722)
13. The following proposed withdrawal facilities shall be metered within 90 days of completion of construction of the facilities: District ID Nos. 42 through 49, and 56 through 74, Permittee ID Nos. S-21 through S-46. Meter reading and reporting, as well as meter accuracy checks every five years shall be in accordance with instructions in Exhibit B, Metering Instructions, attached to and made part of this permit.(718)
14. During groundwater recharge and recovery operations, water quality samples from the wells listed below shall be collected after pumping the withdrawal point at its normal rate for a pumping time specified below, or to a constant temperature, pH, and conductivity. The frequency of sampling per water quality parameter is listed in the table according to the withdrawal point. The recording and reporting shall begin according to the first sample date for existing wells and shall begin within 90 days of completion of any proposed wells. Samples shall be collected whether or not the well is being used unless infeasible. If sampling is infeasible, the Permittee shall indicate the reason for not sampling on the water quality data form or in the space for comments in the WUP Portal for data submissions. Recharge water quality shall be reported as the treated water discharged from the plant (District ID No. 18). Water quality samples during recovery shall be collected at the sample tap for each ASR well. For sampling, analysis and submittal requirements see Exhibit B, Water Quality Sampling Instructions, attached to and made part of this permit.

Recharge:

District ID No. 18, Permittee ID No. PR DIS for TDS, sulfates, conductivity, chlorides and pH, after a minimum pumping time of 20 minutes, on a monthly basis.

Recovery:

Existing District ID Nos. 20, 21, 22, 23, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40 and 41, Permittee ID Nos. S-1, S-2, S-3R, S-4, S-6, S-7, S-8, S-9R, S-10, S-11, S-12, S-13, S-14, S-15, T-1, S-5R, S-16, S-17, S-18, S-19 and S-20 for TDS, sulfates, conductivity, chlorides and pH, after a minimum pumping time of 20 minutes, on a monthly basis.

Proposed District ID Nos 42 through 49, and 57 through 74, Permittee ID Nos. S-21 through S-47, for TDS, sulfates, conductivity, chlorides and pH, after a minimum pumping time of 20 minutes, on a monthly basis.

Monitor Wells:

District ID Nos. 51 and 52, Permittee ID Nos. M-2 and T-2 for TDS, sulfates, conductivity, chlorides and pH, after a minimum pumping time of 20 minutes, on a monthly basis.

District ID No. 50, Permittee ID No. E, for chlorides, after a minimum pumping time of 20 minutes, on a monthly basis.

(752)

15. The average day and peak monthly quantities for District ID No. 14, Permittee ID No. 14, shown in the Withdrawal Point Quantity Table, represent finished water quantities that the Permittee is authorized to deliver to its customers to meet demand, and are not intended to restrict the withdrawal quantities authorized from the Peace River. The quantities withdrawn from the Peace River are limited by the diversion schedule referenced in the applicable Special Conditions, existing storage capacity, and the maximum day quantity of 120 MGD. Any proposed change in existing storage capacity shall require a permit modification.(995)
16. The following withdrawal facilities shall continue to be maintained and operated with existing, non-resettable, totalizing flow meter(s) or other measuring device(s) as approved by the Water Use Permit Bureau Chief:
- A. District ID No. 14, Permittee ID No. 14 (river intake to reservoir)
  - B. District ID No. 15, Permittee ID No. RESV (raw water from reservoir to plant)
  - C. District ID No. 17, Permittee ID No. PR WTP (river intake directly to plant)
  - D. District ID No. 18, Permittee ID No. PR DIS (finished water from plant)
  - E. District ID Nos. 20, 21, 22, 25, 26, 27, 28, 35 and 36, Permittee ID Nos. S-1, S-2, S-3R, S-6, S-7, S-8, S-9R, T-1 and S-5R (ASR Wellfield No. 1)
  - F. District ID Nos. 23, 29, 30, 31, 32, 33, 34, 37, 38, 39, 40 and 41, Permittee ID Nos. S-4, S-10, S-11, S-12, S-13, S-14, S-15, S-16, S-17, S-18, S-19 and S-20 (ASR Wellfield No. 2)
- Meter reading and reporting, as well as meter accuracy checks every five years shall be in accordance with instructions in Exhibit B, Metering Instructions, attached to and made part of this permit. Total quantities and cumulative volumes of water recharged and recovered for each ASR production well shall also be recorded and reported on a monthly basis in accordance with the Exhibit B instructions.(719)
17. Flow in the Peace River shall be read at the Arcadia Station, USGS gage 02296750 (District ID No. 16); Horse Creek near Arcadia, USGS gage 02297310 (District ID No. 75); and Joshua Creek at Nocatee, USGS gage 02297100 (District ID No. 76). The combined flow of the three gages will be reported as District ID No. 77. Flow shall be read on a daily basis and reported to the Water Use Permit Bureau (using District approved forms) on or before the tenth (10th) day of the following month. The recordings shall include daily average water flow in million gallons per day (MGD), and daily average water flow in cubic feet per second (cfs).(990)
18. Aquifer Storage and Recovery (ASR) is being utilized for storage (recharge) of water, which has been withdrawn from the Peace River at District ID No. 14 and treated at the Peace River Regional WTP. Storage shall be in the Tampa and Suwannee Formations of the Upper Floridan Aquifer. Delivery (recovery) of this stored water to the service customers shall be in quantities not to exceed the Annual Average and Peak Month quantities allowed under the permit for the entire ASR system. The Permittee shall operate ASR (recharge and recovery) as deemed necessary for the best interests of their service customers, but subject to the Special and Standard conditions of this permit. In addition, the total quantity of water recovered shall not exceed the total quantity of water stored.(993)
19. The Permittee shall continue implementation of the Peace River Hydrobiological Monitoring Program (HBMP) which was incorporated into this permit on March 26, 1996. As specified in the HBMP, the District will convene a scientific review panel to review the progress and findings of the HBMP.(994)



40D-2  
Exhibit A

**WATER USE PERMIT STANDARD CONDITIONS**

1. With advance notice to the Permittee, District staff with proper identification shall have permission to enter, inspect, collect samples, take measurements, observe permitted and related facilities and collect and document any information deemed necessary to determine compliance with the approved plans, specifications and conditions of this permit. The Permittee shall either accompany District staff onto the property or make provision for access onto the property.
2. When necessary to analyze impacts to the water resource or existing users, the District shall require the Permittee to install flow metering or other measuring devices to record withdrawal quantities and submit the data to the District.
3. A District Identification tag shall be prominently displayed at each withdrawal point that is required by the District to be metered or for which withdrawal quantities are required to be reported to the District, by permanently affixing the tag to the withdrawal facility.
4. The Permittee shall mitigate any adverse impact to environmental features or offsite land uses as a result of withdrawals. When adverse impacts occur or are imminent, the District shall require the Permittee to mitigate the impacts. Examples of adverse impacts include the following:
  - A. Significant reduction in levels or flows in water bodies such as lakes, impoundments, wetlands, springs, streams or other watercourses; or
  - B. Damage to crops and other vegetation causing financial harm to the owner; and
  - C. Damage to the habitat of endangered or threatened species.
5. The Permittee shall mitigate any adverse impact to existing legal uses caused by withdrawals. When adverse impacts occur or are imminent, the District may require the Permittee to mitigate the impacts. Adverse impacts include:
  - A. A reduction in water levels which impairs the ability of a well to produce water;
  - B. Significant reduction in levels or flows in water bodies such as lakes, impoundments, wetlands, springs, streams or other watercourses; or
  - C. Significant inducement of natural or manmade contaminants into a water supply or into a usable portion of an aquifer or water body.
6. Permittee shall notify the District in writing within 30 days of any sale, transfer, or conveyance of ownership or any other loss of permitted legal control of the Project and / or related facilities from which the permitted consumptive use is made. Where Permittee's control of the land subject to the permit was demonstrated through a lease, the Permittee must either submit documentation showing that it continues to have legal control or transfer control of the permitted system / project to the new landowner or new lessee. All transfers of ownership are subject to the requirements of Rule 40D-1.6105, F.A.C. Alternatively, the Permittee may surrender the consumptive use permit to the District, thereby relinquishing the right to conduct any activities under the permit.
7. All withdrawals authorized by this WUP shall be implemented as conditioned by this permit, including any documents submitted as part of the permit application incorporated by reference in a permit condition. This permit is subject to review and modification, enforcement action, or revocation, in whole or in part, pursuant to Section 373.136 or 373.243, F.S.
8. This permit does not convey to the Permittee any property rights or privileges other than those specified herein, nor relieve the Permittee from complying with any applicable local government, state, or federal law, rule, or ordinance.
9. The Permittee shall cease or reduce surface water withdrawal as directed by the District if water levels in lakes fall below the applicable minimum water level established in Chapter 40D-8, F.A.C., or rates of flow in streams fall below the minimum levels established in Chapter 40D-8, F.A.C.
10. The Permittee shall cease or reduce withdrawal as directed by the District if water levels in aquifers fall below the minimum levels established by the Governing Board.

11. A Permittee may seek modification of any term of an unexpired permit. The Permittee is advised that section 373.239, F.S., and Rule 4DD-2.331, F.A.C., are applicable to permit modifications.
12. The Permittee shall practice water conservation to increase the efficiency of transport, application, and use, as well as to decrease waste and to minimize runoff from the property. At such time as the Governing Board adopts specific conservation requirements for the Permittee's water use classification, this permit shall be subject to those requirements upon notice and after a reasonable period for compliance.
13. The District may establish special regulations for Water-Use Caution Areas. At such time as the Governing Board adopts such provisions, this permit shall be subject to them upon notice and after a reasonable period for compliance.
14. Nothing in this permit should be construed to limit the authority of the District to declare a water shortage and issue orders pursuant to chapter 373, F.S. In the event of a declared water shortage, the Permittee must adhere to the water shortage restrictions, as specified by the District. The Permittee is advised that during a water shortage, reports shall be submitted as required by District rule or order.
15. This permit is issued based on information provided by the Permittee demonstrating that the use of water is reasonable and beneficial, consistent with the public interest, and will not interfere with any existing legal use of water. If, during the term of the permit, it is determined by the District that a statement in the application and in the supporting data are found to be untrue and inaccurate, the use is not reasonable and beneficial, in the public interest, or does impact an existing legal use of water, the Governing Board shall modify this permit or shall revoke this permit following notice and hearing, pursuant to sections 373.136 or 373.243, F.S. The Permittee shall immediately notify the District in writing of any previously submitted information that is later discovered to be inaccurate.
16. Within the Southern Water Use Caution Area, if the District determines that significant water quantity or quality changes, impacts to existing legal uses, or adverse environmental impacts are occurring, the District, upon reasonable notice to the Permittee, including a statement of facts upon which the District based its determination, may reconsider the quantities permitted or other conditions of the permit as appropriate to address the change or impact, but only after an opportunity for the Permittee to resolve or mitigate the change or impact or to request a hearing.
17. All permits are contingent upon continued ownership or legal control of all property on which pumps, wells, diversions or other water withdrawal facilities are located.

Exhibit B  
Instructions

METERING INSTRUCTIONS

The Permittee shall meter withdrawals from surface waters and/or the ground water resources, and meter readings from each withdrawal facility shall be recorded on a monthly basis within the last week of the month. The meter reading(s) shall be reported to the Water Use Permit Bureau on or before the tenth day of the following month for monthly reporting frequencies. For bi-annual reporting, the data shall be recorded on a monthly basis and reported on or before the tenth day of the month following the sixth month of recorded data. The Permittee shall submit meter readings online using the Permit Information Center at [www.swfwmd.state.fl.us/permits/epermitting/](http://www.swfwmd.state.fl.us/permits/epermitting/) or on District supplied scanning forms unless another arrangement for submission of this data has been approved by the District. Submission of such data by any other unauthorized form or mechanism may result in loss of data and subsequent delinquency notifications. Call the Water Use Permit Bureau in Tampa at (813) 985-7481 if difficulty is encountered.

The meters shall adhere to the following descriptions and shall be installed or maintained as follows:

1. The meter(s) shall be non-resettable, totalizing flow meter(s) that have a totalizer of sufficient magnitude to retain total gallon data for a minimum of the three highest consecutive months permitted quantities. If other measuring device(s) are proposed, prior to installation, approval shall be obtained in writing from the Water Use Permit Bureau Chief.
2. The Permittee shall report non-use on all metered standby withdrawal facilities on the scanning form or approved alternative reporting method.
3. If a metered withdrawal facility is not used during any given month, the meter report shall be submitted to the District indicating the same meter reading as was submitted the previous month.
4. The flow meter(s) or other approved device(s) shall have and maintain an accuracy within five percent of the actual flow as installed.
5. Meter accuracy testing requirements:
  - A. For newly metered withdrawal points, the flow meter installation shall be designed for inline field access for meter accuracy testing.
  - B. The meter shall be tested for accuracy on-site, as installed according to the Flow Meter Accuracy Test Instructions in this Exhibit B, every five years in the assigned month for the county, beginning from the date of its installation for new meters or from the date of initial issuance of this permit containing the metering condition with an accuracy test requirement for existing meters.
  - C. The testing frequency will be decreased if the Permittee demonstrates to the satisfaction of the District that a longer period of time for testing is warranted.
  - D. The test will be accepted by the District only if performed by a person knowledgeable in the testing equipment used.
  - E. If the actual flow is found to be greater than 5% different from the measured flow, within 30 days, the Permittee shall have the meter re-calibrated, repaired, or replaced, whichever is necessary. Documentation of the test and a certificate of re-calibration, if applicable, shall be submitted within 30 days of each test or re-calibration.
6. The meter shall be installed according to the manufacturer's instructions for achieving accurate flow to the specifications above, or it shall be installed in a straight length of pipe where there is at least an upstream length equal to ten (10) times the outside pipe diameter and a downstream length equal to two (2) times the outside pipe diameter. Where there is not at least a length of ten diameters upstream available, flow straightening vanes shall be used in the upstream line.
7. Broken or malfunctioning meter:
  - A. If the meter or other flow measuring device malfunctions or breaks, the Permittee shall notify the District within 15 days of discovering the malfunction or breakage.
  - B. The meter must be replaced with a repaired or new meter, subject to the same specifications given above, within 30 days of the discovery.
  - C. If the meter is removed from the withdrawal point for any other reason, it shall be replaced with another meter having the same specifications given above, or the meter shall be reinstalled within 30 days of its removal from the withdrawal. In either event, a fully functioning meter shall not be off the withdrawal point for more than 60 consecutive days.
8. While the meter is not functioning correctly, the Permittee shall keep track of the total amount of time the withdrawal point was used for each month and multiply those minutes times the pump capacity (in gallons per minute) for total gallons. The estimate of the number of gallons used each month during that period shall be submitted on District scanning forms and noted as estimated per instructions on the form. If the data is submitted

by another approved method, the fact that it is estimated must be indicated. The reason for the necessity to estimate pumpage shall be reported with the estimate.

9. In the event a new meter is installed to replace a broken meter, it and its installation shall meet the specifications of this condition. The permittee shall notify the District of the replacement with the first submittal of meter readings from the new meter.

#### FLOW METER ACCURACY TEST INSTRUCTIONS

1. **Accuracy Test Due Date** - The Permittee is to schedule their accuracy test according to the following schedule:

- A. For existing metered withdrawal points, add five years to the previous test year, and make the test in the month assigned to your county.
- B. For withdrawal points for which metering is added for the first time, the test is to be scheduled five years from the issue year in the month assigned to your county.
- C. For proposed withdrawal points, the test date is five years from the completion date of the withdrawal point in the month assigned to your county.
- D. For the Permittee's convenience, if there are multiple due-years for meter accuracy testing because of the timing of the installation and/or previous accuracy tests of meters, the Permittee can submit a request in writing to the Water Use Permit Bureau Chief for one specific year to be assigned as the due date year for meter testing. Permittees with many meters to test may also request the tests to be grouped into one year or spread out evenly over two to three years.
- E. The months for accuracy testing of meters are assigned by county. The Permittee is requested but not required to have their testing done in the month assigned to their county. This is to have sufficient District staff available for assistance.

January	Hillsborough
February	Manatee, Pasco
March	Polk (for odd numbered permits)*
April	Polk (for even numbered permits)*
May	Highlands
June	Hardee, Charlotte
July	None or Special Request
August	None or Special Request
September	DeSoto, Sarasota
October	Citrus, Levy, Lake
November	Hernando, Sumter, Marion
December	Pinellas

\* The permittee may request their multiple permits be tested in the same month.

2. **Accuracy Test Requirements:** The Permittee shall test the accuracy of flow meters on permitted withdrawal points as follows:

- A. The equipment water temperature shall be set to 72 degrees Fahrenheit for ground water, and to the measured water temperature for other water sources.
- B. A minimum of two separate timed tests shall be performed for each meter. Each timed test shall consist of measuring flow using the test meter and the installed meter for a minimum of four minutes duration. If the two tests do not yield consistent results, additional tests shall be performed for a minimum of eight minutes or longer per test until consistent results are obtained.
- C. If the installed meter has a rate of flow, or large multiplier that does not allow for consistent results to be obtained with four- or eight-minute tests, the duration of the test shall be increased as necessary to obtain accurate and consistent results with respect to the type of flow meter installed.
- D. The results of two consistent tests shall be averaged, and the result will be considered the test result for the meter being tested. This result shall be expressed as a plus or minus percent (rounded to the nearest one-tenth percent) accuracy of the installed meter relative to the test meter. The percent accuracy indicates the deviation (if any), of the meter being tested from the test meter.

3. **Accuracy Test Report:** The Permittees shall demonstrate that the results of the meter test(s) are accurate by submitting the following information within 30 days of the test:

- A. A completed Flow Meter Accuracy Verification Form, Form LEG-R.014.00 (07/08) for each flow meter tested. This form can be obtained from the District's website ([www.watermatters.org](http://www.watermatters.org)) under "ePermitting and Rules" for Water Use Permits.

- B. A printout of data that was input into the test equipment, if the test equipment is capable of creating such a printout;
- C. A statement attesting that the manufacturer of the test equipment, or an entity approved or authorized by the manufacturer, has trained the operator to use the specific model test equipment used for testing;
- D. The date of the test equipment's most recent calibration that demonstrates that it was calibrated within the previous twelve months, and the test lab's National Institute of Standards and Testing (N.I.S.T.) traceability reference number.
- E. A diagram showing the precise location on the pipe where the testing equipment was mounted shall be supplied with the form. This diagram shall also show the pump, installed meter, the configuration (with all valves, tees, elbows, and any other possible flow disturbing devices) that exists between the pump and the test location clearly noted with measurements. If flow straightening vanes are utilized, their location(s) shall also be included in the diagram.
- F. A picture of the test location, including the pump, installed flow meter, and the measuring device, or for sites where the picture does not include all of the items listed above, a picture of the test site with a notation of distances to these items.

**WATER QUALITY INSTRUCTIONS**

The Permittee shall perform water quality sampling, analysis and reporting as follows:

1. The sampling method(s) from both monitor wells and surface water bodies shall be designed to collect water samples that are chemically representative of the zone of the aquifer or the depth or area of the water body.
2. Water quality samples from monitor wells shall be taken after pumping the well for the minimum time specified (if specified) or after the water reaches a constant temperature, pH, and conductivity.
3. The first submittal to the District shall include a copy of the laboratory's analytical and chain of custody procedures. If the laboratory used by the Permittee is changed, the first submittal of data analyzed at the new laboratory shall include a copy of the laboratory's analytical and chain of custody procedures.
4. Any variance in sampling and/or analytical methods shall have prior approval of the Water Use Permit Bureau Chief.
5. The Permittee's sampling procedure shall follow the handling and chain of custody procedures designated by the certified laboratory which will undertake the analysis.
6. Water quality samples shall be analyzed by a laboratory certified by the Florida Department of Health utilizing the standards and methods applicable to the parameters analyzed and to the water use pursuant to Chapter 64E-1, Florida Administrative Code, "Certification of Environmental Testing Laboratories."
7. Analyses shall be performed according to procedures outlined in the current edition of Standard Methods for the Examination of Water and Wastewater by the American Public Health Association-American Water Works Association-Water Pollution Control Federation (APHA-AWWA-WPCF) or Methods for Chemical Analyses of Water and Wastes by the U.S. Environmental Protection Agency (EPA).
8. Unless other reporting arrangements have been approved by the Water Use Permit Bureau Chief, reports of the analyses shall be submitted to the Water Use Permit Bureau, online at the District WUP Portal or mailed in hardcopy on or before the tenth day of the following month. The online submittal shall include a scanned upload of the original laboratory report. The hardcopy submittal shall be a copy of the laboratory's analysis form. If for some reason, a sample cannot be taken when required, the Permittee shall indicate so and give the reason in the space for comments at the WUP Portal or shall submit the reason in writing on the regular due date.
9. The parameters and frequency of sampling and analysis may be modified by the District as necessary to ensure the protection of the resource.
10. Water quality samples shall be collected based on the following timetable for the frequency listed in the special condition:

Frequency

- Weekly
- Quarterly
- Semi-annually
- Monthly

Timetable

- Same day of each week
- Same week of February, May, August, November
- Same week of May, November
- Same week of each month

**WELL CONSTRUCTION INSTRUCTIONS**

All wells proposed to be constructed shall be drilled and constructed as specified below:

1. All well casing (including liners and/or pipe) must be sealed to the depth specified in the permit condition.
2. The proposed well(s) shall be constructed of materials that are resistant to degradation of the casing/grout due to interaction with the water of lesser quality. A minimum grout thickness of two (2) inches is required on wells four (4) inches or more in diameter.
3. A minimum of twenty (20) feet overlap and two (2) centralizers is required for Public Supply wells and all wells six (6) inches or more in diameter.
4. Any variation from estimated, maximum or minimum total depths; maximum or minimum casing depths; well location or casing diameter specified in the condition requires advanced approval by the Water Use Permit Bureau Chief, or the Well Construction Section Manager.
5. The Permittee is notified that a proposal to significantly change any of these well construction specifications may require permit modification if the District determines that such a change would result in significantly greater withdrawal impacts than those considered for this Permit.
6. The finished well casing depth shall not vary from these specifications by greater than ten (10) percent unless advance approval is granted by the Water Use Permit Bureau Chief, or the Well Construction Section Manager.

**ANNUAL REPORT SUBMITTAL INSTRUCTIONS**

The "Public Supply Water Use Annual Report Form" (Form No. LEG-R.023.00 (01/09)), is designed to assist the Permittee with the annual report requirements, but the final authority for what must be included in the Water Use Annual Report is in this condition and in these instructions. Two identical copies of the "Public Supply Water Use Annual Report Form" and two identical copies of all required supporting documentation shall be included if submitted in hard copy. "Identical copy" in this instance means that if the original is in color, then all copies shall also be printed in color. If submitted electronically, only one submittal is required; however, any part of the document that is in color shall be scanned in color.

1. **Per Capita Use Rate** - A per capita rate for the previous calendar year will be progressively calculated until a rate of 150 gpd per person or less is determined whether it is the unadjusted per capita, adjusted per capita, or compliance per capita. The calculations shall be performed as shown in Part A of the Form. The Permittee shall refer to and use the definitions and instructions for all components as provided on the Form and in the Water Use Permit Applicant's Handbook Part B. Permittees that have interconnected service areas and receive an annual average quantity of 100,000 gpd or more from another permittee are to include these quantities as imported quantities. Permittees in the Southern Water Use Caution Area (SWUCA) or the Northern Tampa Bay Water Use Caution Area (NTBWUCA), as it existed prior to October 1, 2007, shall achieve a per capita of 150 gpd or less, and those in these areas that cannot achieve a compliance per capita rate of 150 gpd or less shall include a report on why this rate was not achieved, measures taken to comply with this requirement, and a plan to bring the permit into compliance. Permittees not in a Water Use Caution Area that cannot achieve a compliance per capita rate of 150 gpd or less by December 31, 2019 shall submit this same report in the Annual Report due April 1, 2020.
2. **Residential Use** - Residential water use consists of the indoor and outdoor water uses associated with each category of residential customer (single family units, multi-family units, and mobile homes), including irrigation uses, whether separately metered or not. The Permittee shall document the methodology used to determine the number of dwelling units by type and the quantities used. Estimates of water use based upon meter size will not be accepted. If mobile homes are included in the Permittees multi-family unit category, the information for them does not have to be separated. The information for each category shall include:
  - A. Number of dwelling units per category,
  - B. Number of domestic metered connections per category,
  - C. Number of metered irrigation connections,
  - D. Annual average quantities in gallons per day provided to each category, and
  - E. Percentage of the total residential water use provided apportioned to each category.
3. **Non-Residential Use** - Non-residential use consists of all quantities provided for use in a community not directly associated with places of residence. For each category below, the Permittee shall include annual average gpd provided and percent of total non-residential use quantities provided. For each category 1 through 6 below, the number of metered connections shall be provided. These non-residential use categories are:
  - A. Industrial/commercial uses, including associated lawn and landscape irrigation use,
  - B. Agricultural uses (e.g., irrigation of a nursery),

- C. Recreation/Aesthetic, for example irrigation (excluding golf courses) of Common Areas, stadiums and school yards,
  - D. Golf course irrigation,
  - E. Fire fighting, system testing and other accounted uses,-
  - F. K-through-12 schools that do not serve any of the service area population, and
  - G. Water Loss as defined as the difference between the output from the treatment plant and accounted residential water use (B above) and the listed non-residential uses in this section.
4. **Water Audit** - The water audit report that is done because water losses are greater than 10% of the total distribution quantities shall include the following items:
- A. Evaluation of:
    - 1) leakage associated with transmission and distribution mains,
    - 2) overflow and leakage from storage tanks,
    - 3) leakage near service connections,
    - 4) illegal connections,
    - 5) description and explanations for excessive distribution line flushing (greater than 1% of the treated water volume delivered to the distribution system) for potability,
    - 6) fire suppression,
    - 7) un-metered system testing,
    - 8) under-registration of meters, and
    - 9) other discrepancies between the metered amount of finished water output from the treatment plant less the metered amounts used for residential and non-residential uses specified in Parts B and C above, and
  - B. A schedule for a remedial action-plan to reduce the water losses to below 10%.
5. **Alternative Water Supplied other than Reclaimed Water** - Permittees that provide Alternative Water Supplies other than reclaimed water (e.g., stormwater not treated for potable use) shall include the following on Part D of the Form:
- A. Description of the type of Alternative Water Supply provided,
  - B. County where service is provided,
  - C. Customer name and contact information,
  - D. Customer's Water Use Permit number (if any),
  - E. Customer's meter location latitude and longitude,
  - F. Meter ownership information,
  - G. General customer use category,
  - H. Proposed and actual flows in annual average gallons per day (gpd) per customer,
  - I. Customer cost per 1,000 gallons or flat rate information,
  - J. Delivery mode (e.g., pressurized or non-pressurized),
  - K. Interruptible Service Agreement (Y/N),
  - L. Month/year service began, and
  - M. Totals of monthly quantities supplied.
6. **Suppliers of Reclaimed Water** - Depending upon the treatment capacity of the Permittees wastewater treatment plant, the Permittee shall submit information on reclaimed water supplied as follows:
- A. Permittees having a wastewater treatment facility with an annual average design capacity equal to or greater than 100,000 gpd shall utilize the "SWFWMD Annual Reclaimed Water Supplier Report" in Excel format on the Compact Disk, Form No. LEG-R.026.00 (05/09). The "SWFWMD Annual Reclaimed Water Supplier Report" is described in Section 3.1 of Chapter 3, under the subheading "Reclaimed Water Supplier Report" and is described in detail in the Water Use Permit Applicant's Handbook Part B.
  - B. Permittees that have a wastewater treatment facility with an annual average design capacity less than 100,000 gpd can either utilize the "SWFWMD Annual Reclaimed Water Supplier Report," Form No. LEG-R.026.00, as described in sub-part (1) above or provide the following information on Part E of the Form:
    - 1) Bulk customer information:
      - a) Name, address, telephone number,
      - b) WUP number (if any),

- c) General use category (residential, commercial, recreational, agricultural irrigation, mining),
  - d) Month/year first served,
  - e) Line size,
  - f) Meter information, including the ownership and latitude and longitude location,
  - g) Delivery mode (pressurized, non-pressurized).
- 2) Monthly flow in gallons per bulk customer.
  - 3) Total gallons per day (gpd) provided for metered residential irrigation.
  - 4) Disposal information:
    - a) Site name and location (latitude and longitude or as a reference to the service area map),
    - b) Contact name and telephone,
    - c) Disposal method, and
    - d) Annual average gpd disposed.

Darrin Herbst, P.G. Electronically Signed

Authorized Signature

SOUTHWEST FLORIDA WATER MANAGEMENT DISTRICT

This permit, issued under the provision of Chapter 373, Florida Statutes and Florida Administrative Code 40D-2, authorizes the Permittee to withdraw the quantities outlined above, and may require various activities to be performed by the Permittee as described in the permit, including the Special Conditions. The permit does not convey to the Permittee any property rights or privileges other than those specified herein, nor relieve the Permittee from complying with any applicable local government, state, or federal law, rule, or ordinance.



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**BOARD OF DIRECTORS MEETING**

*August 2, 2017*

**REGULAR AGENDA**

**ITEM 3**

**Orange Hammock Ranch Conservation**

---

**Presenter -**

Patrick Lehman, Executive Director  
Douglas Manson, General Counsel

**Recommended Action -**

**Board direction to staff.**

The Orange Hammock Property is located in southeastern Sarasota County within the limits of the City of North Port. The property is undeveloped and abuts the western boundary of the RV Griffin Reserve owned by SWFWMD and managed by the Authority for multiple uses including the regional reservoir and ASR Wellfield.

The SWFWMD (as lead negotiator) continues to work with Sarasota County and others in collaboration on exploring options to acquire the OHR. Both agencies are working to identify potential funding sources. The SWFWMD, with the support of Sarasota County, sent an offer letter to purchase the property in the amount of \$18M. Subsequently, a letter was received from the OHR owners' representative in April with a counter-offer of a cash purchase in the amount of \$22M with a closing date of September 30, 2017. Negotiations remain on-going for the acquisition of the property.

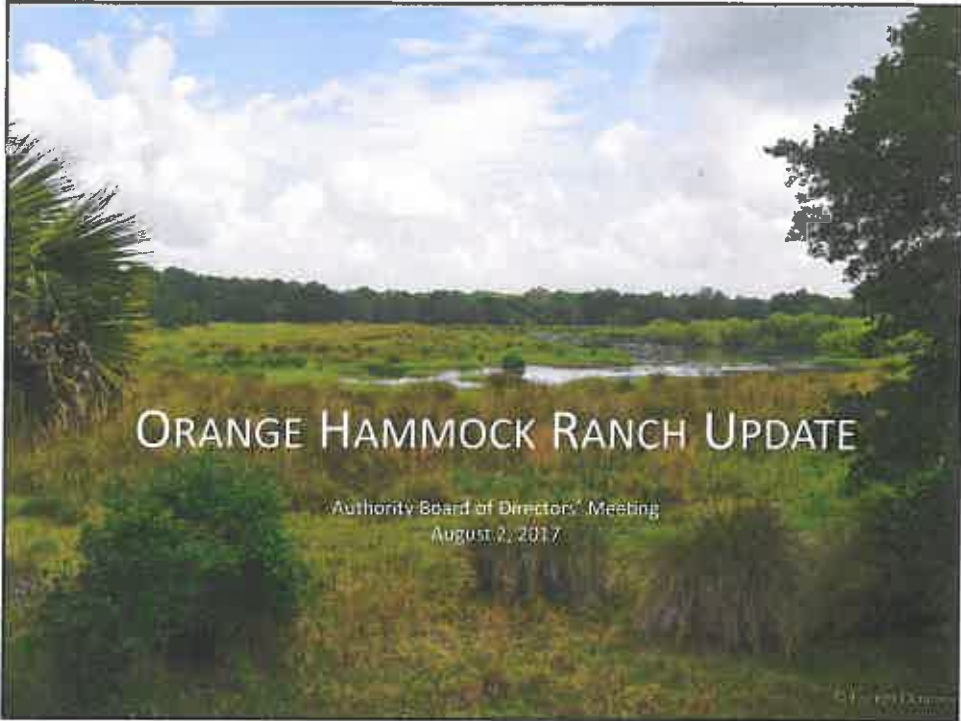
One of the key considerations is the property provides an environmental buffer to the RV Griffin Reserve and opportunity for restoration and mitigation for water supply expansion on the RV Griffin Reserve. The Authority Board sent a letter of support for the purchase of OHR and presented a fact-sheet identifying potential water supply and water management benefits for acquisition and preservation of OHR at their meeting on June 1, 2016.

Staff will provide an update on the process and seek Board direction to staff to collaborate with SWFWMD staff to draft an Operation and Maintenance Agreement for Orange Hammock Ranch and evaluate potential funding with Authority members and City of North Port to bring back to the Board in October.

**Attachments:**

- Tab A Orange Hammock Ranch Presentation
- Tab B Orange Hammock Ranch and RV Griffin Reserve Maps
- Tab C Orange Hammock Ranch Fact Sheet (June 2016)
- Tab D Sarasota County BOCC Update (June 6, 2017)
- Tab E Potential Surplus Land Map
- Tab F Letters of Support for Acquisition
- Tab G Management and Operations Agreement for the RV Griffin Reserve

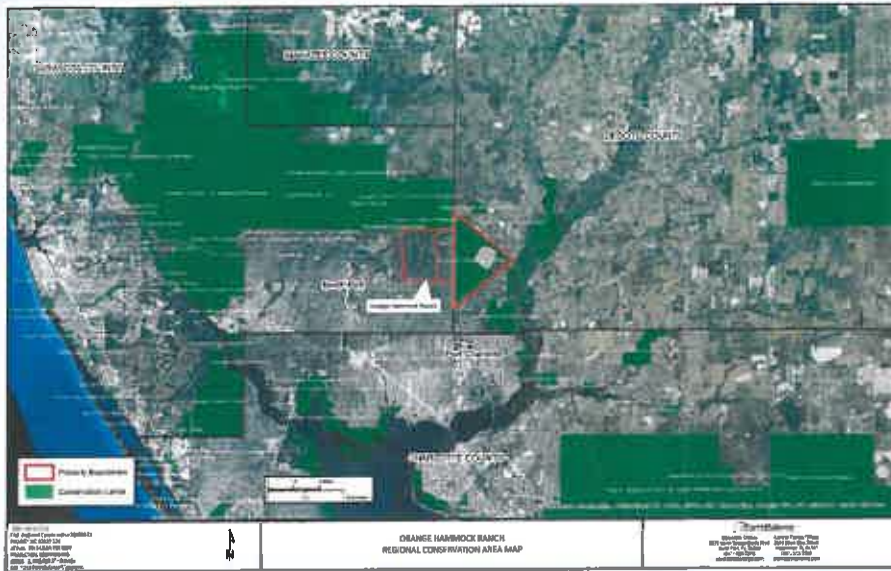
TAB A  
Orange Hammock Ranch Presentation



### Orange Hammock Ranch – Location

- The Orange Hammock Ranch is 5,774± acres, predominantly native tract of land within southeast Sarasota County and the City of North Port.

## Orange Hammock Ranch – Regional Connectivity



## Orange Hammock Ranch – Historical Events

**ISLES OF ATHENA**  
Development of Regional Impact  
Comprehensive Plan Amendment  
**First Sufficiency Response**

Prepared For:  
North Port Land Development, L.L.P.

Submitted by:  
Houston Cuzzens Group, Inc.

November 2005  
February 2007

2005	Isles of Athena DRI process
2006	City of North Port annexes property
2010	Isles of Athena Property reverts back to original owner, South Florida Sod, Inc.
2014	Orange Hammock Ranch LLC takes ownership of OHR
2016	Conservation Foundation of the Gulf Coast solicits support for acquisition
2017	Negotiation for acquisition on-going

## Orange Hammock Ranch – Public Benefit

- Environmental buffer to the Authority's water supply infrastructure on RV Griffin Reserve;
- Protection of the Authority's Water Supply Storage (ASR Wellfield);
- Protection/Enhancement of City of North Port's Surface Water Supply;
- Downstream Flood Protection within City of North Port;
- Opportunity for environmental mitigation/hydrologic restoration;
- Improved surface water quality; and
- Wildlife habitat connectivity and recreational opportunities.

## RV Griffin Reserve – Concept to Reality

### GDC/Peace River

**Basin:** Peace River  
**County:** DeSoto  
**Land Acquired:** 5,932  
**Cost to Date:** \$5,309,770  
**Land to Be Acquired:** 2,636

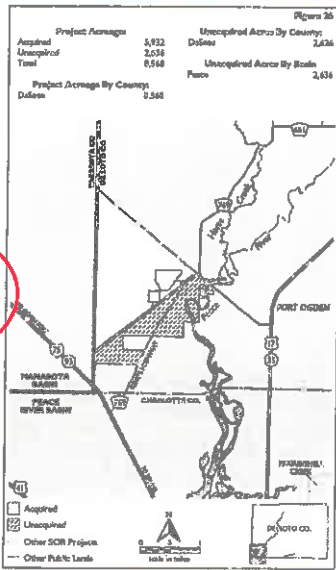
**Description of Lands:** Located in southwestern DeSoto County, the project includes lands supporting and surrounding the existing facilities at the Peace River/Manassas Regional Water Supply Authority treatment

project area include mixed hardwood forests along the river; however, the majority of the lands consist of pine flatwoods, rangelands, pastures and pine plantations

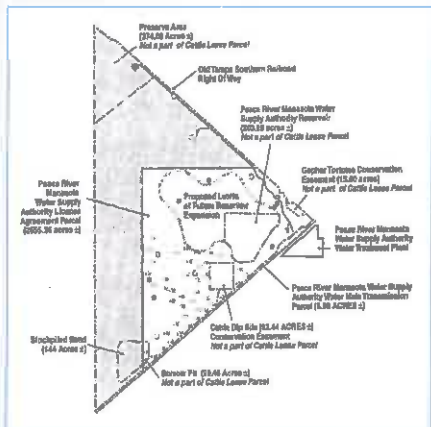
**Importance to Water Management:** As a local municipal potable water supply, the water supply authority's facilities are of high importance to public users in the cities of

**Reasons for Acquisitions:** Acquisition of the proposed area will support and protect present potable water supplies and provide opportunities for potential expansion, aquifer storage-recovery wells system

**Recreational Potential:** Undetermined at this time



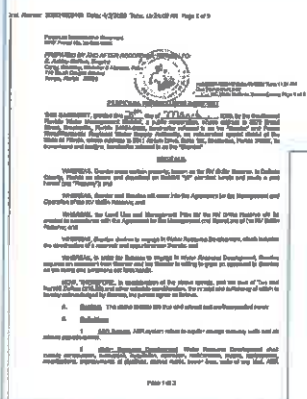
## RV Griffin Reserve – Concept to Reality



1992 SWFWMD Purchases RV Griffin Reserve – 9 Sq. Miles in DeSoto Co

2017 PRMRWSA Water Supply Facilities on RV Griffin Reserve

## RV Griffin Reserve – Concept to Reality



Easement for RV Griffin Reserve

### Management and Operation Agreement

2017

MANAGEMENT AND OPERATION AGREEMENT BETWEEN THE AUTHORITY AND THE PROPERTY OWNER FOR THE RV GRIFFIN RESERVE

This Management and Operation Agreement ("Agreement") is made and entered into this day of ... 2017 by and between the Peace River Manasota Regional Water Supply Authority, an incorporated municipal entity of the State of Florida, and the Property Owner, known as the "Agreement Parties" and the "Authority".

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

WHEREAS, the Authority is the owner of the Property, known as the RV Griffin Reserve, located in DeSoto County, Florida, as depicted on the attached map;

### Peace River Manasota Regional Water Supply Authority



RV Griffin Reserve Land Use and Management Plan

October 2017

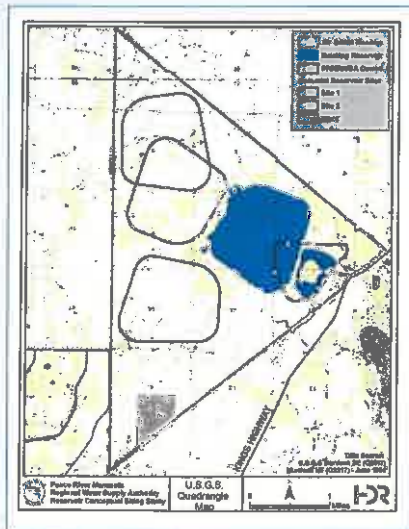
### Land Management Plan

## RV Griffin Reserve – Concept to Reality



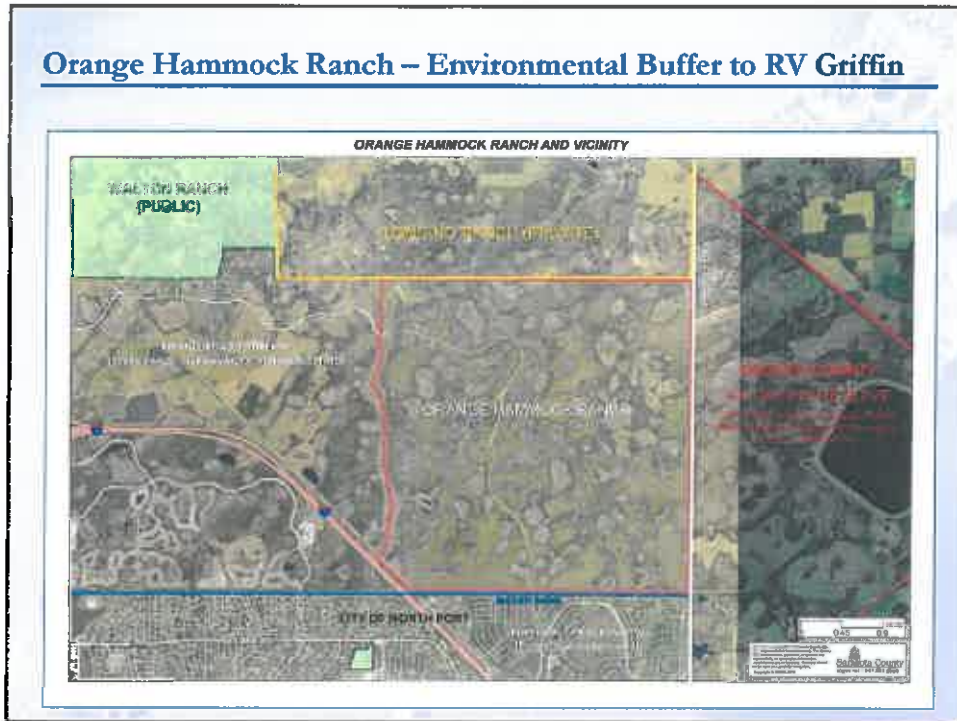
- RV Griffin Reserve purchased and owned by SWFWMD
- Easement granted to PRMRWSA for water resource development
- Authority provides all land management
- Multi-use property
  - Reservoir
  - ASR Wellfield
  - Mitigation site/restored lands
  - Cattle lease for grazing
  - Horse trails/passive recreation
  - Model Airplane club

## RV Griffin Reserve – Future Water Storage Opportunities

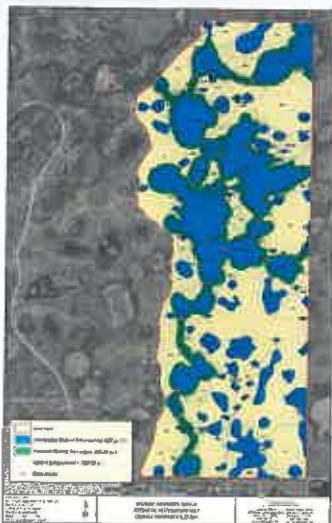


- The RV Griffin Reserve was acquired by SWFWMD for the expansion and protection of the Authority's water supply system.
- Current facilities include two reservoirs, ASR Wellfield and transmission pipelines.
- The property can accommodate an additional reservoir in the future.
- Proposed WUP withdrawal increase to accommodate future storage reservoir and expanded ASR.

## Orange Hammock Ranch – Environmental Buffer to RV Griffin



## Orange Hammock Ranch – Mitigation/Restoration Opportunities



- Conceptual restoration plan for Orange Hammock Slough could preserve and restore 1,976± acres, to mitigate future water supply development on the RV Griffin Reserve



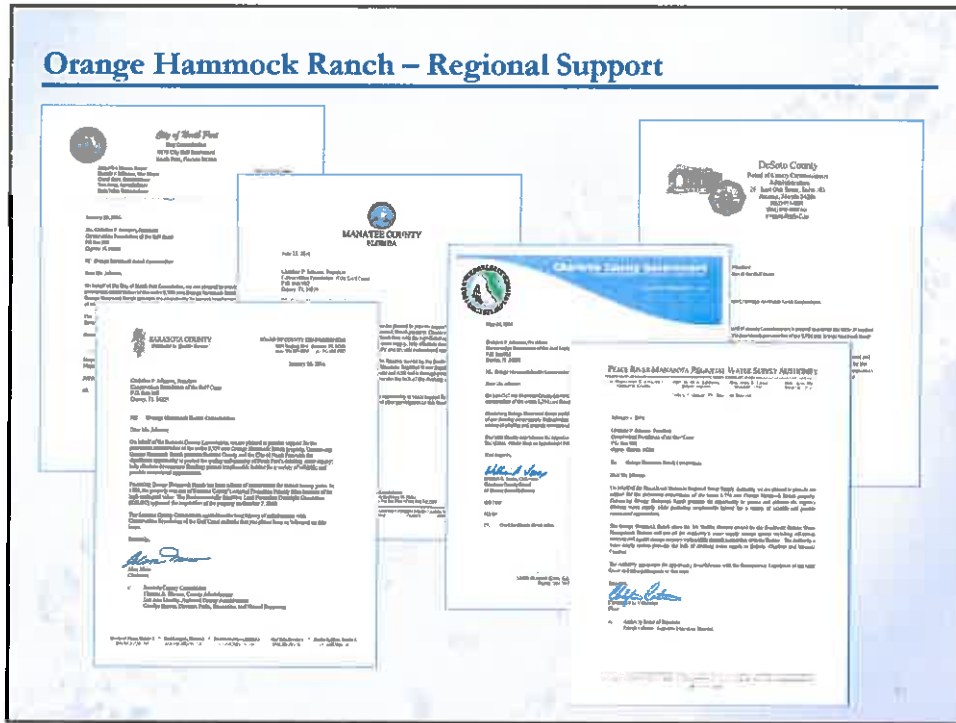
**Orange Hammock Ranch – Mitigation/Restoration Opportunities**



**Orange Hammock Ranch – Mitigation/Restoration Opportunities**



## Orange Hammock Ranch – Regional Support



## Orange Hammock Ranch – Acquisition Timeline

June 30, 2014	Conservation Foundation of the Gulf Coast (CFGC) submitted a Florida Forever project proposal for acquisition of OHR to the state. Project ranked 5 <sup>th</sup> but received no funding.
January 26, 2016	Sarasota County Commission sent a letter of support to CFGC noting that the County's Environmentally Sensitive Lands Oversight Committee recommended acquisition in 2010.
February 1, 2016	Authority Board sent a letter of support to CFGC.
June 3, 2016	Authority issues white paper on OHR acquisition.
July 19, 2016	CFGC hosted a 'kick-off' meeting to explore opportunities to acquire OHR attend by representatives of SWFWMD, Sarasota County, Authority, North Port, and FWC.
March 20, 2017	SWFWMD sent an offer letter to purchase OHR in the amount of \$18 on behalf of Sarasota County and SWFWMD.
April 3, 2017	Letter received from OHR representative with counter-offer of cash purchase in the amount of \$22M with a closing date of September 30, 2017.
May 5, 2017	SWFWMD and Sarasota County agreed to obtain updated appraisals.

## Orange Hammock Ranch – Acquisition Options



- SWFWMD staff, in conjunction with Sarasota County staff continue to evaluate funding and acquisition options
- SWFWMD staff discussion on potential surplus of approximately 875 acres (approx. 330 acres of developable uplands).







## Orange Hammock Ranch – Board Direction

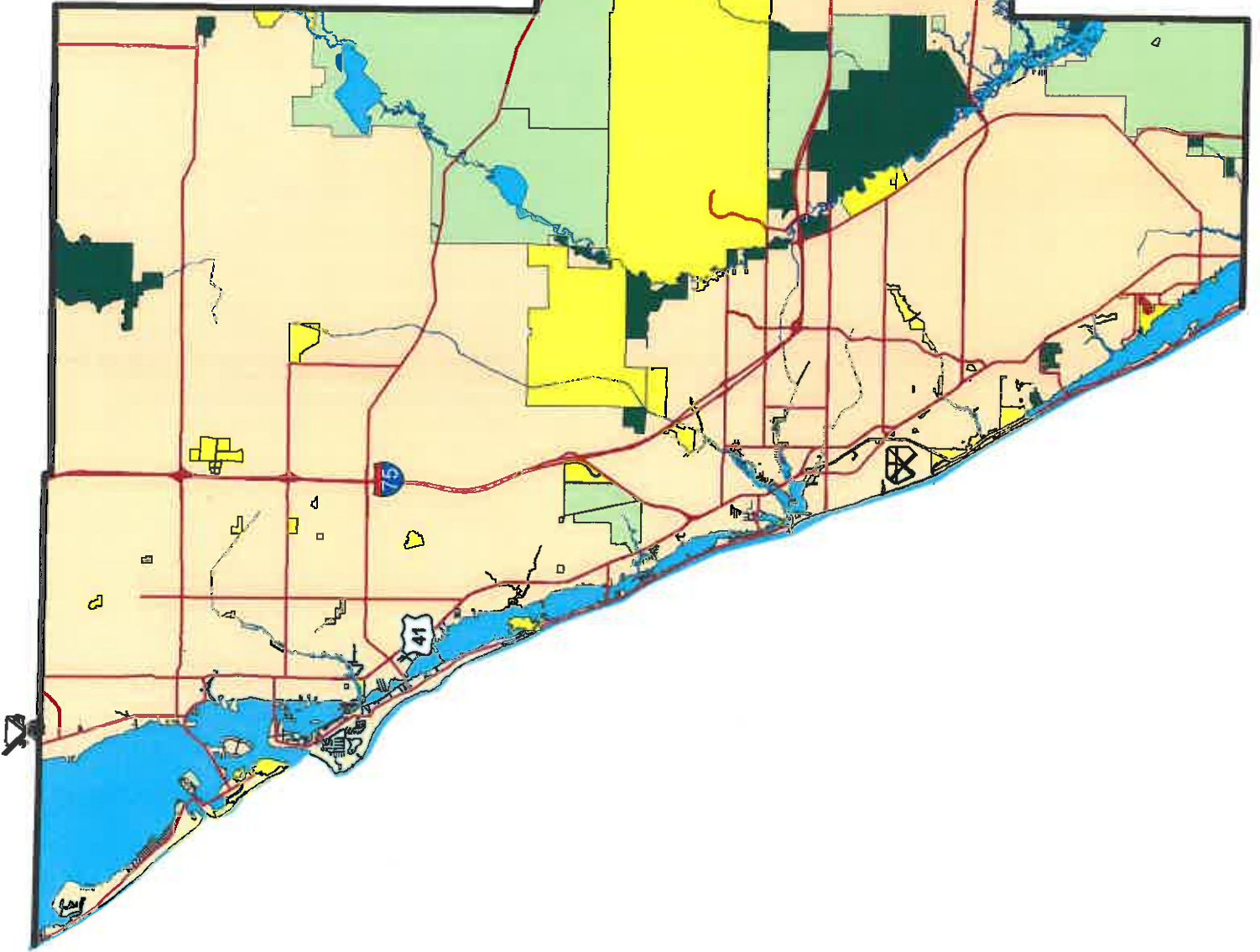
- Continue to participate in acquisition discussions with SWFWMD staff and other stakeholders.
- Collaborate with SWFWMD staff to draft a Management and Operations Agreement for Orange Hammock Ranch similar to RV Griffin Reserve.
- Evaluate potential funding sources with Authority members and City of North Port.
- Report back to the Board at October Board meeting.

**TAB B**  
**Orange Hammock Ranch Maps**

# SARASOTA COUNTY ACQUISITION INVENTORY ESLPP, NPP, NATURAL AREAS & STATE LANDS

**Legend**

-  Acquired ESLPP, Neighborhood Parklands, Conservation Easements
-  Non ESLPP Conservation Lands (Including Privately Protected)
-  State, City Conservation Lands
-  Sarasota County Boundary
-  Gulf, Bays, Rivers, etc.
-  Major Roads



*This map is produced from Sarasota County GIS, and is representative information only. The County does not warrant, guarantee, or assume any responsibility for geographic information completeness and/or accuracy. This map should not be used as a guide for navigation.*

# ORANGE HAMMOCK RANCH AND VICINITY



TAB C  
Orange Hammock Ranch Fact Sheet (June 2016)

# PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY

## Orange Hammock Ranch Conservation

### Fact Sheet

---



#### Authority's Regional Water Supply Infrastructure

The RV Griffin Reserve (RVG) property is owned by the Southwest Florida Water Management District (SWFWMD) and contains the primary regional water supply facilities of the Peace River Manasota Regional Water Supply Authority (Authority).

Located in southwest DeSoto County, the RVG consists of approximately 5,913 acres (9 sq. miles) and was acquired by the SWFWMD in 1992 to accommodate the expansion and protection of the water supply facilities owned by the Authority. The Authority currently owns and operates two raw water supply reservoirs, an aquifer storage and recovery (ASR) wellfield and transmission pipeline facilities on the property. The Authority manages the RVG property in exchange for using the property for water supply facilities through easements granted by SWFWMD to the Authority for the entire RVG site.

The RVG is a multi-use property that in addition to water supply facilities includes mitigation sites, horse trails, cattle grazing and model airplane club facility (Exhibit A).

The Authority's water use permit (WUP) provides for expansion of the ASR Wellfield on the RVG. The recently completed Integrated Regional Water Supply Plan (April 2015) also provides for potential expansion of the reservoir system and development of brackish groundwater to optimize and expand the current water supply facilities. The RVG property can accommodate another reservoir in the future to provide additional raw water storage for the Authority. Engineering and hydrologic evaluation indicates that site conditions are suitable for construction of a future reservoir, similar in construction to the existing Reservoir No. 2 (Exhibit B). The primary constraints/considerations with respect to siting a new reservoir on the RVG are potential impacts to existing wetland habitats and floodplain areas. Siting of a new reservoir on the RVG property is feasible, provided sufficient acreage for wetland mitigation and floodplain compensation can be secured.

#### Orange Hammock Ranch

The Orange Hammock Ranch (OHR) property is 5,774± acres located within southeast Sarasota County and the City of North Port, Florida, east of I-75 (Exhibit C). The OHR property is on the Florida Forever Priority List and the SWFWMD has considered purchase of the property several times over the past two decades. Among considerations for the purchase of the OHR (e.g. natural system benefits), SWFWMD has previously cited benefits in relation to water supply, water quality, and flood protection.

Orange Hammock Ranch is a large, predominantly native tract of land abutting the DeSoto County line and adjacent to the RVG Reserve where the Authority has made significant investments in the protection of water resources and water supply infrastructure for the regional water supply system as discussed previously (Exhibit D). Regional infrastructure also includes the major transmission pipeline that traverses the OHR and supplies Sarasota County Utilities with the bulk of its drinking water supply.



### Water Resources of Orange Hammock Ranch

Surface water runoff from the OHR property drains to the Snover Waterway, a tributary to Big Slough (aka Myakkahatchee Creek), and thus represents a source of water supply to the City of North Port. The most noteworthy water resource feature within the property is Orange Hammock Slough located on the eastern third of the OHR (Exhibit C).

Many of the wetlands on OHR have been altered by regional drainage and by ditching to drain wetlands and improve forage for cattle. A conceptual restoration plan developed by Authority consultants for Orange Hammock Slough portion of the OHR property would preserve and provide opportunities for the restoration of approximately 1,976 acres of the slough directly adjacent to the RVG (Exhibit E).

Restoration of Orange Hammock Slough has the ability to provide significant water management benefits to the region by potentially increasing storage capacity for flood attenuation in the City of North Port, improving groundwater recharge, and enhancing water quality for downstream users. In addition, the restoration could significantly enhance the quality of wildlife habitat, regional connectivity of wildlife corridors, and recreational opportunities. Restoration also has the potential to provide compensatory wetland mitigation and floodplain compensation within the OHR property for the siting of a future new reservoir on the RVG.

### Benefit of Orange Hammock Ranch to Regional and Local Water Supply

In addition to being beneficial for natural systems and associated wildlife habitats, preservation of the existing OHR property presents local and regional opportunities for the protection and enhancement of existing water resources and supplies, facilitation of new potential water supplies, as well as the protection and potential enhanced flood protection within the City of North Port. The OHR property is located within the City of North Port's public water supply watershed and is in proximity to the Authority's water supply facilities on the adjacent RVG. The OHR property provides ground and surface water supply source protection and enhancement benefits for the RVG property, provides a buffer to existing reservoir and ASR operation, and could provide cost-effective mitigation credits necessary for future water supply projects including new reservoir, ASR wellfield expansion and/or brackish groundwater development on the RVG.

### Highlights of Potential Orange Hammock Ranch Acquisition

- **Environmental Buffer to the Authority's Water Supply Infrastructure.** The OHR provides a buffer for existing regional water supply facilities and operations on the RVG including the Authority's ASR and raw water storage reservoirs, protecting the region's investment.
- **Protection of City of North Port Surface Water Supply Source.** Acquisition of the OHR property provides opportunities to protect the quantity and quality of the City of North Port's surface water supply source by maintaining and potentially restoring the natural condition and flow regimes of the site. Acquisition would also decrease potential for competition from a new water user thereby also assisting in protection of the City's existing legal water use.
- **Protection of the Authority's Water Supply Storage (ASR Wellfield).** Large scale groundwater withdrawals (such as those for the previously proposed development of OHR) have the potential

to impact the ASR Wellfield on the RVG. Acquisition of OHR would ensure protection of the Authority's ASR Wellfield, and support potential expansion of the ASR Wellfield in the future.

- **Enhancement of the City of North Port's Surface Water Supply.** Purchase of the OHR could also provide opportunities to enhance the reliability of the City of North Port's surface water supply source with the potential capture and storage of surface water from the OHR during high flow periods.
- **Flood Protection.** Protection of the extensive OHR floodplain could contribute towards potential flood insurance premium discounts for the citizens of North Port through the FEMA Community Rating System credits.
- **Opportunity for Environmental Mitigation.** Restoration of the Orange Hammock Slough provides opportunity to generate cost-effective compensatory wetland mitigation credit that could offset wetland impacts associated with potential future water supply projects such as a new regional reservoir on the RVG.
- **Opportunity for Hydrologic Restoration.** Current site conditions afford considerable opportunity for improvement through appropriate hydrological restoration, enhancement of the natural communities, preservation, and long-term management.
- **Improved Surface Water Quality.** Restoration of natural and historic storage systems in the OHR lengthen the duration of inundation enhancing surficial aquifer recharge and extending water detention times. The former could improve groundwater supply sustainability and the later could improve surface water quality leaving the site.
- **Wildlife Habitat Connectivity and Recreational Opportunities.** The OHR property could provide low-cost passive use opportunities that would enhance or limit disturbance to the natural attributes of the land. The property's connectivity with other public lands provides the added benefit of continuity of a regional wildlife corridor and recreational opportunities extending through Sarasota County to the Peace River in DeSoto County (Exhibit F).

### **Summary**

Public ownership of the Orange Hammock Ranch offers benefits to both regional and local drinking water supply, protecting existing water supply infrastructure and operations, and facilitating opportunities for development of future regional water supply projects on the adjacent RV Griffin Reserve to meet future public water supply needs of the region as well as protection and enhancement of the City of North Port's drinking water supply from Myakkahatchee Creek. Acquisition of Orange Hammock Ranch would also offer other significant public and environmental benefits in the region, including wildlife habitat connectivity, recreational opportunities and enhanced flood protection.

### **Contact**

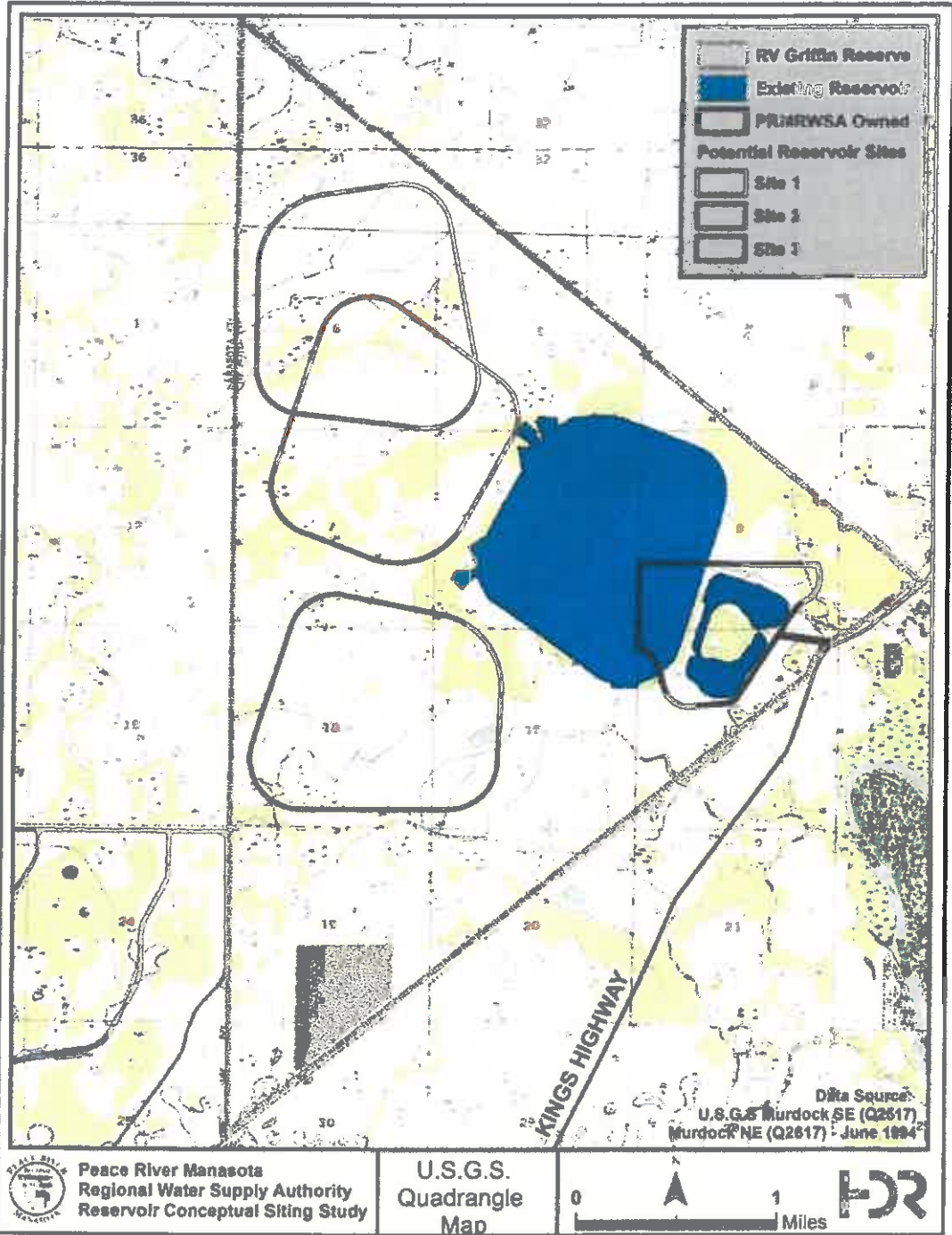
Patrick Lehman, Executive Director  
[plehman@regionalwater.org](mailto:plehman@regionalwater.org)

Peace River Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, FL 34202  
Tele: 941-316-1776

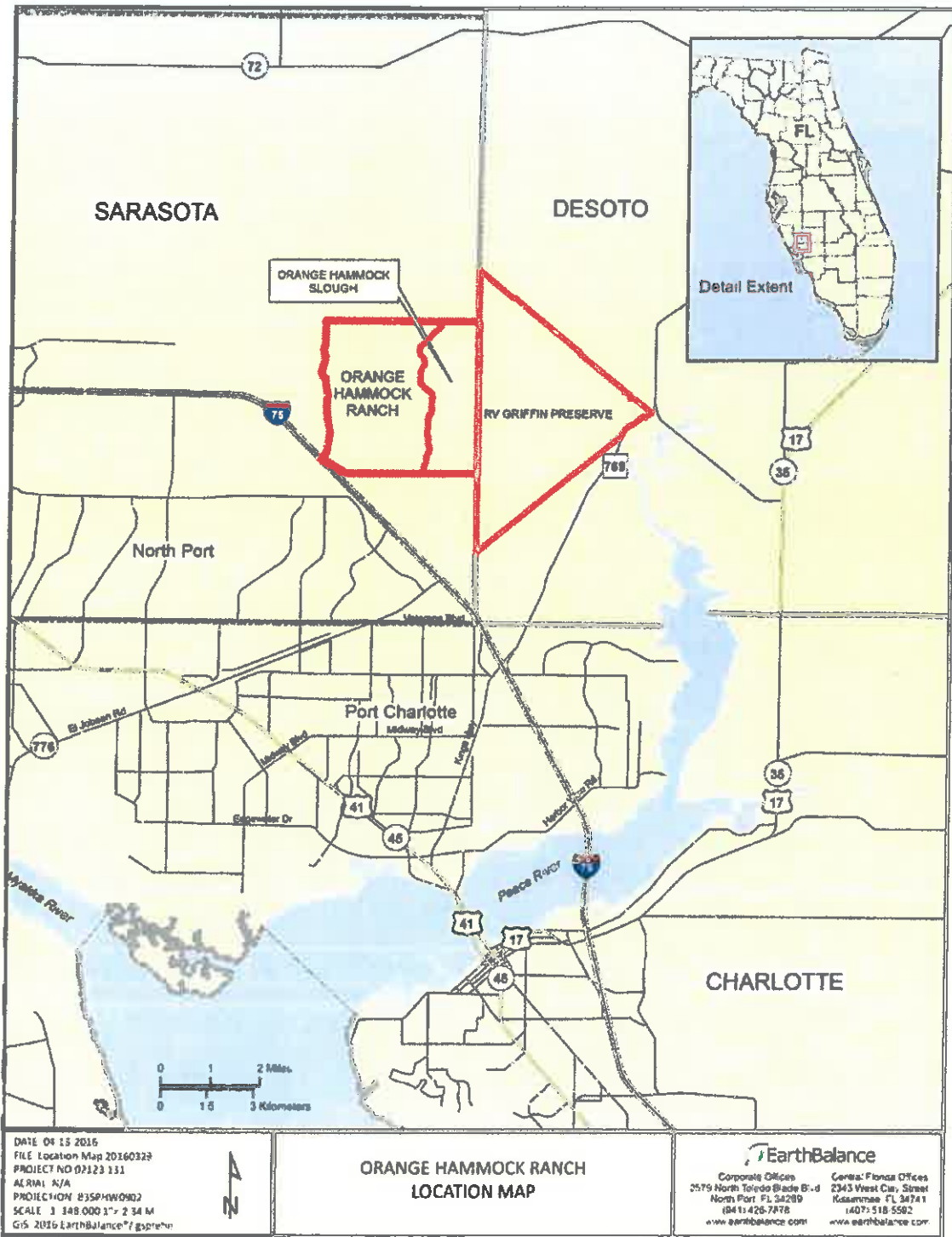
**Exhibit A. RV Griffin Reserve Site Map**



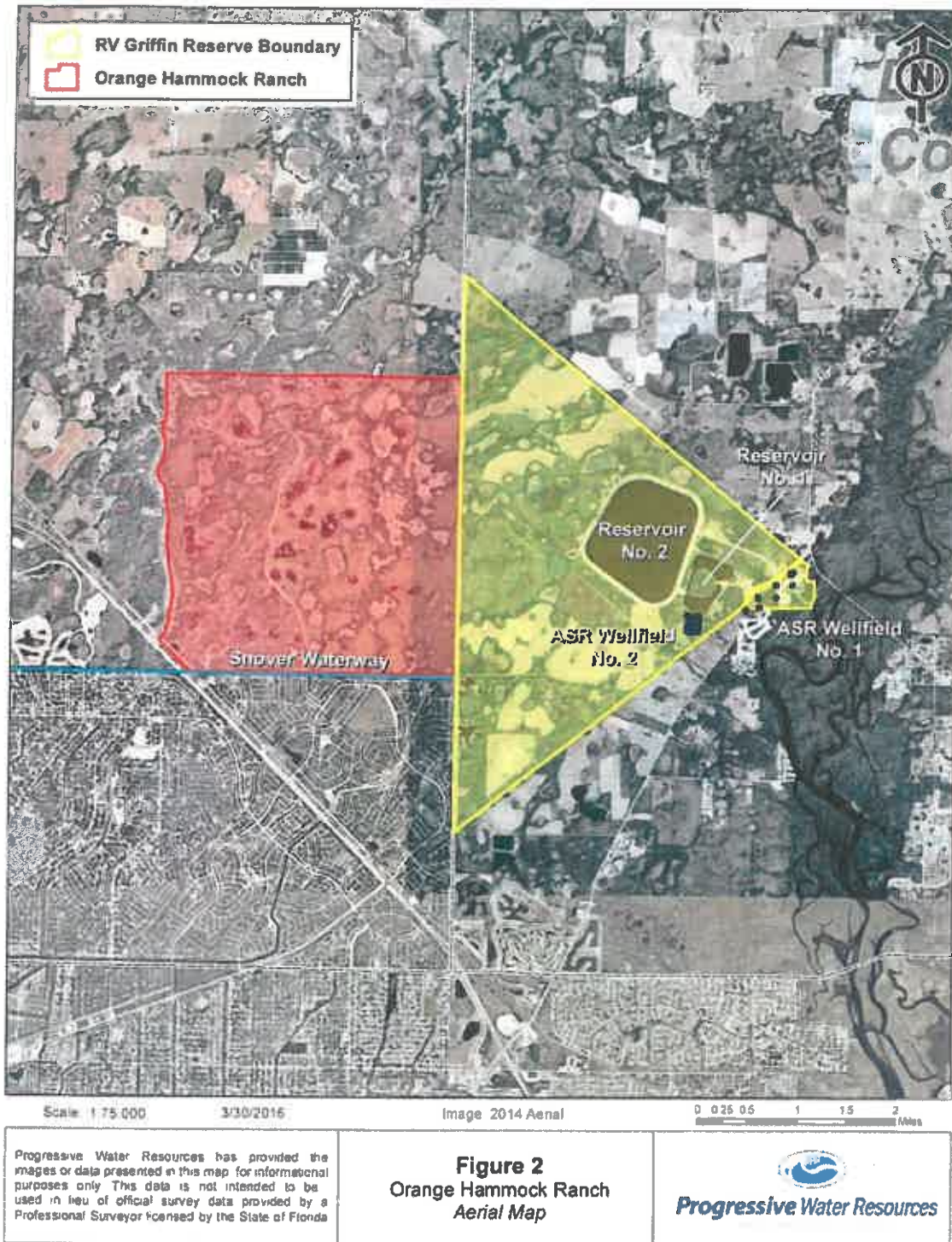
**Exhibit B. Conceptual Future Reservoir Siting on RV Griffin Reserve**



**Exhibit C. Orange Hammock Ranch Location Map**



**Exhibit D. Orange Hammock Ranch Aerial Map**



**Exhibit E. Potential Restoration Map of Orange Hammock Slough**

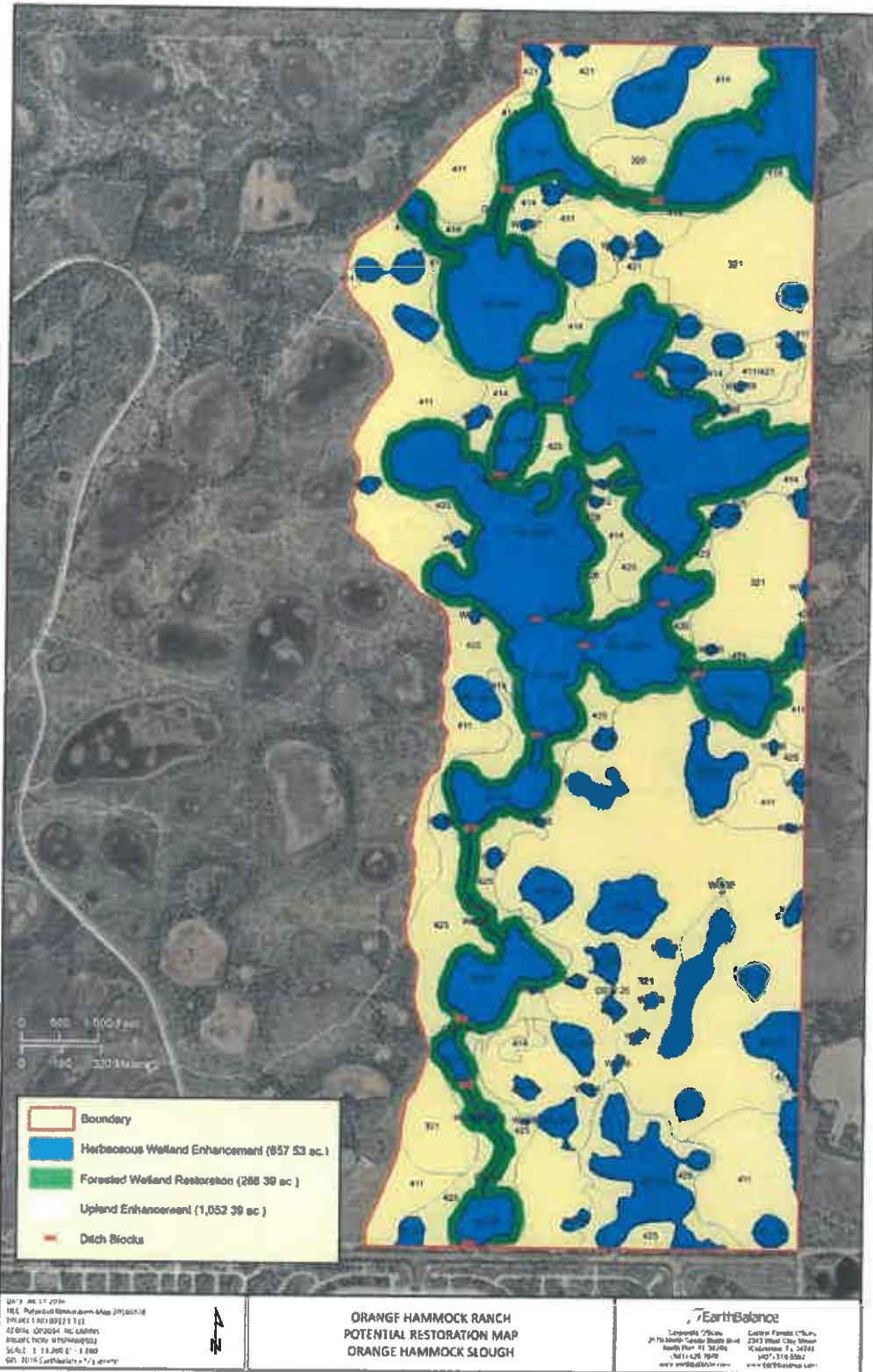
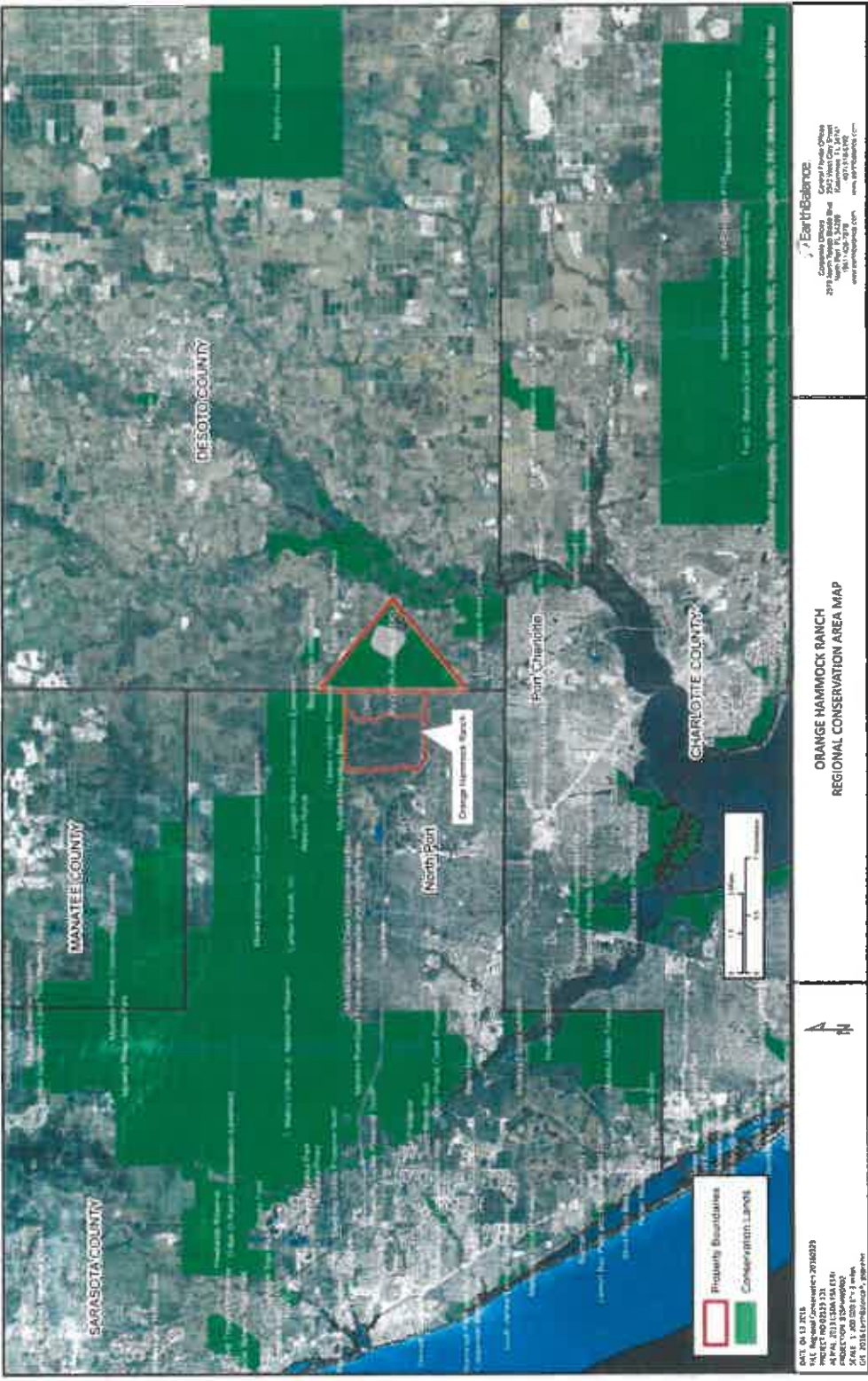


Exhibit F. Regional Conservation Area Map



EarthBalance  
 Central Florida Office  
 2019 Corporate Center  
 1911 Corporate Blvd  
 Orlando, FL 32809  
 407.116.8100  
 www.earthbalance.com

**ORANGE HAMMOCK RANCH  
 REGIONAL CONSERVATION AREA MAP**

DATE: 04/12/16  
 PROJECT NO: 2016029  
 A/P/N: 20131204/54/154  
 GIS: 2016/EarthBalance/10/2016029



TAB D  
Sarasota County BOCC Orange Hammock Ranch Update (June 6, 2017)

# SARASOTA COUNTY GOVERNMENT

## *Parks, Recreation and Natural Resources*

**TO:** Sarasota County Commission  
**THROUGH:** Thomas A. Harmer, County Administrator  
**FROM:** Carolyn Brown, Director, Parks, Recreation & Natural Resources  
**DATE:** June 6, 2017  
**SUBJECT:** **Updates on the Protection of Orange Hammock Ranch**

### **RECOMMENDED MOTION(S) OR ACTION(S):**

Update on the protection of Orange Hammock Ranch.

### **BACKGROUND:**

The 5,744-acre Orange Hammock Ranch (OHR) is located in the southeastern area of Sarasota County (County), east of I-75 and adjacent to the City of North Port (City). The property, formerly known as Isles of Athena and the McCall Tract, is currently owned by Orange Hammock Ranch LLC (Attachment 1).

On June 30, 2014, the Conservation Foundation of the Gulf Coast (CFGC) submitted a *Florida Forever* project proposal to the Florida Department of Environmental Protection. *Florida Forever* is Florida's premier conservation and recreation lands acquisition program. The proposal, titled Myakka Island Conservation Corridor, includes OHR, and was reviewed and ranked by the State's Acquisition and Restoration Council (ARC). The project was ranked 5<sup>th</sup> on the *Florida Forever* Priority List under the Less-Than-Fee Projects category. No funding was received.

On January 26, 2016, the County Commission sent a letter of support to Christine Johnson of the CFGC. The letter also noted that the Environmentally Sensitive Lands Oversight Committee (ESLOC) recommended the acquisition of the property on October 7, 2010 (Attachment 2).

On July 15, 2016, Sarasota County Administration and staff met with representatives from the Southwest Florida Water Management District (SWFWMD) to discuss the potential acquisition, use and management of OHR. Discussions included both agencies' desire to acquire the property in partnership with others.

On July 19, 2016, CFGC hosted a "kick-off" meeting to explore opportunities to purchase OHR. In attendance were representatives from CFGC, Sarasota County, SWFWMD, the City of North Port, Peace River Manasota Regional Water Supply Authority, and Florida Fish and Wildlife Conservation Commission. During the meeting, the history of the property was discussed, followed by a synopsis of the work done to date toward the protection, and scenarios for protection, management and use of the property. In addition, a designated point person was established from each agency attending the meeting. The agencies represented at the meeting were in agreement, and dedicated to work towards the goal to conserve OHR.

On September 12, 2016, Ms. Johnson gave an update to the Board and City Commission on the status of the acquisition of OHR at the Joint Commission Meeting. She stated that the property owners want

significant movement before they extend the Option Agreement which expired October 4, 2016. She indicated that significant movement meant that there is a sincere conversation regarding funding commitments. On October 3, 2016, CFGC submitted a request to the property owners of OHR to extend the Option Agreement 90 days.

On November 8, 2016, County staff provided the County Commission with an update on the potential purchase of the acquisition of OHR. The update included a list of other acquisitions and start-up projects being considered through ESLPP and the funding availability. Additionally, staff informed the Board of ESLOC's support of the use of ESLPP funds for Orange Hammock providing that the County retains capacity for other acquisitions and that it is consistent with the enabling ordinance. ESLOC encouraged the Board to support the OHR acquisition.

On March 20, 2017, with the support of the County, SWFWMD sent an offer letter to purchase the property in the amount of \$18M on behalf of the County and SWFWMD. Subsequently, a letter was received from Dykes Everett, the owners' representative, on April 3, 2017 with a counter-offer of a cash purchase in the amount of \$22M with a closing date of September 30, 2017.

On May 5, 2017, SWFWMD and the County agreed to obtain revisions of the current appraisals, as they are now over a year old, and to continue to analyze after receipt of the revised appraisals.

**RELEVANT PRIOR BOARD ACTION:**

1. January 26, 2016 – The Board voted unanimously to send a letter of support to the Conservation Foundation of the Gulf Coast regarding the Orange Hammock Ranch property (5-0 vote).
2. September 12, 2016 - The Board of County Commissioners and the North Port City Commission considered an update on the Conservation Foundation of the Gulf Coast efforts related to the Orange Hammock Ranch property. (No action was taken.)
3. November 8, 2016 – The Board requested the County Administrator continue to negotiate the purchase of the Orange Hammock Ranch property and work with stakeholders to reach an acceptable purchase price and develop a plan for use, management, maintenance, and public access to the property; develop a proposed agreement for the Board's consideration; preserve the money for the Walton Ranch and Deer Prairie Creek Preserve Improvement Projects, as scheduled to go forward, not putting a cap on the dollar amount; and to include preserving the Old Myakka Preserve Davidson Parcel cost (5-0 vote).

**ANALYSIS/NEXT STEPS:**

The County understands that the Option Agreement with the Conservation Foundation expired and was not extended. However, the County and SWFWMD (as lead negotiator) continue to work in collaboration on exploring options to acquire the OHR. Both agencies are working to identify any other funding sources. SWFWMD indicated they potentially have up to \$9M toward conserving the property. They have noted that their policy is to only pay 90% of the appraised value.

**ATTACHMENTS:**

1. Aerial Map
2. Letter of Support to the Conservation Foundation of the Gulf Coast, dated January 26, 2016

**TAB E**  
**Potential Surplus Land Map**

**From:** Tom Harmer  
**Sent:** Wednesday, June 7, 2017 5:58 PM  
**To:** BCC  
**Cc:** Carolyn Brown  
**Subject:** UPDATE - Orange Hammock: Surplus Portion.

Commissioners, FYI- as a follow-up to the joint meeting with the City of North Port yesterday the Water Management District wanted to let the County know that it is their official position that their interest in acquiring Orange Hammock includes the ability to surplus a portion of the property.

The District has identified approximately 875 acres that they are interested in surplus (approx. 330 acres of developable uplands). They believe this will help fund the overall acquisition and also help the City of North Port achieve their goal of keeping some of the property on the tax role. In addition, due to its location next to I-75 they believe that portion of the property would be much more difficult to manage as conservation lands due to the limited ability to conduct prescribed fire.

I have attached a map from the District depicting the surplus property area.

As mentioned yesterday- we are currently working with the District on updated appraisals and continued negotiations with the property owner's representative.

Sincerely,

Tom

**Thomas A. Harmer, ICMA-CM**  
County Administrator  
Sarasota County  
1660 Ringling Blvd. 2nd Floor  
Sarasota, FL 34236  
941.861.5111 (phone)  
941.861.5987 (fax)  
[tharmer@scgov.net](mailto:tharmer@scgov.net)  
[www.scgov.net](http://www.scgov.net)

# Orange Hammock Potential Surplus Location Exhibit



**TAB F**  
**Letters of Support**

# PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY

---

HON. CHRISTOPHER G. CONSTANCE  
CHARLOTTE COUNTY

HON. ELTON A. LANGFORD  
DE SOTO COUNTY

HON. JOHN R. CHAPPIE  
MANATEE COUNTY

HON. ALAN MAIO  
SARASOTA COUNTY

PATRICK J. LEHMAN, P.E., EXECUTIVE DIRECTOR

February 1, 2016

Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
P.O. Box 902  
Osprey, Florida 34229

Re: Orange Hammock Ranch Conservation

Dear Ms. Johnson:

On behalf of the Peace River Manasota Regional Water Supply Authority, we are pleased to provide our support for the permanent conservation of the entire 5,774 acre Orange Hammock Ranch property. Conserving Orange Hammock Ranch presents the opportunity to protect and enhance the region's drinking water supply while protecting irreplaceable habitat for a variety of wildlife and provide recreational opportunities.

The Orange Hammock Ranch abuts the RV Griffin Reserve owned by the Southwest Florida Water Management District and site of the Authority's water supply storage system including off-stream reservoir and aquifer storage recovery wells (ASR) through partnership with the District. The Authority's water supply system provides the bulk of drinking water supply to DeSoto, Charlotte and Sarasota Counties.

The Authority appreciates the opportunity to collaborate with the Conservation Foundation of the Gulf Coast and other participants on this issue.

Sincerely,



Christopher G. Constance  
Chair

cc: Authority Board of Directors  
Patrick Lehman, Authority Executive Director





May 24, 2016

Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
P.O. Box 902  
Osprey, FL 34229

RE: Orange Hammock Ranch Conservation

Dear Ms. Johnson:

On behalf of the Charlotte County Commissioners, we are pleased to provide support for the permanent conservation of the entire 5,774 acre Orange Hammock Ranch property.

Conserving Orange Hammock Ranch presents significant opportunity to protect and enhance the quality of our drinking water supply; help alleviate downstream flooding; protect irreplaceable habitat for a variety of wildlife; and provide recreational opportunities.

Charlotte County appreciates the opportunity to collaborate with the Conservation Foundation of the Gulf Coast. Please keep us apprised on this important issue.

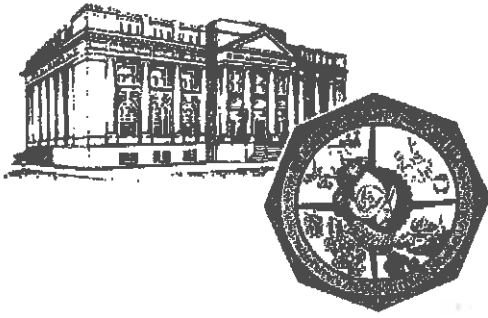
Kind Regards,

William G. Truex, Chairman  
Charlotte County Board  
of County Commissioners

WGT:dw

#16-57

CC: Charlotte County Commission



**DeSoto County**  
**Board of County Commissioners**  
**Administration**  
201 East Oak Street, Suite 201  
Arcadia, Florida 34266  
(863) 993-4800  
(863) 993-4809 fax  
[www.co.desoto.fl.us](http://www.co.desoto.fl.us)

June 14, 2016

Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
P.O. Box 902  
Osprey, FL 34229

**Subject: Letter of Support / Orange Hammock Ranch Conservation**

Dear Ms. Johnson,

The DeSoto County Board of County Commissioners is pleased to provide this letter of support to the Foundation for the permanent conservation of the 5,774 acre Orange Hammock Ranch property based on its many conservation values.

We believe that the preservation of this property presents a great opportunity to protect and enhance the quality of our drinking water supply, provide flood protection measures for the area, and maintain a unique habitat for an abundance of wildlife. In addition, the conservation of this property provides the residents and visitors of Florida with natural recreational opportunities.

Sincerely,



Juril O. Mansfield, Chairman



**MANATEE COUNTY  
FLORIDA**

June 21, 2016

Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
P.O. Box 902  
Osprey, FL 34229

RE: Orange Hammock Ranch Conservation

Dear Ms. Johnson:

On behalf of the Manatee County Commission, we are pleased to provide support for the permanent conservation of the entire 5,774 acre Orange Hammock Ranch property. Conserving Orange Hammock Ranch presents Sarasota County and the City of North Port with the significant opportunity to protect the quality and quantity of North Port's drinking water supply; help alleviate downstream flooding; protect irreplaceable habitat for a variety of wildlife; and provide recreational opportunities.

The Orange Hammock Ranch abuts the RV Griffin Reserve, owned by the Southwest Florida Water Management District and site of the Peace River Manasota Regional Water Supply Authority water supply storage system including off-stream reservoir and ASR wells through partnership with the District. The PRMRWSA water supply system provides the bulk of the drinking water supply to DeSoto, Charlotte and Sarasota County.

The Manatee County Commission appreciates the opportunity to voice support for the collaboration of the Conservation Foundation of the Gulf Coast and other participants on this issue.

Sincerely,

BOARD OF COUNTY COMMISSIONERS  
MANATEE COUNTY, FLORIDA

  
Vanessa Baugh,  
Chairman

C: Manatee County Commission  
Ed Hunzeker, County Administrator  
Mike Gore, Director, Utilities Department

Board of County Commissioners  
1112 Manatee Avenue West, Bradenton, FL 34205  
Website: [www.mymanatee.org](http://www.mymanatee.org) \* Phone: 941.745.3700 \* FAX: 941.745.3790



**SARASOTA COUNTY**  
"Dedicated to Quality Service"

**BOARD OF COUNTY COMMISSIONERS**

1660 Ringling Blvd., Sarasota, FL 34236  
phone 941-861-5344 fax 941-861-5987

January 26, 2016

Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
P.O. Box 902  
Osprey, FL 34229

**RE: Orange Hammock Ranch Conservation**

Dear Ms. Johnson:

On behalf of the Sarasota County Commission, we are pleased to provide support for the permanent conservation of the entire 5,774 acre Orange Hammock Ranch property. Conserving Orange Hammock Ranch presents Sarasota County and the City of North Port with the significant opportunity to protect the quality and quantity of North Port's drinking water supply; help alleviate downstream flooding; protect irreplaceable habitat for a variety of wildlife; and provide recreational opportunities.

Protecting Orange Hammock Ranch has been a focus of conservation for almost twenty years. In 1988, the property was one of Sarasota County's original Protection Priority Sites because of its high ecological value. The Environmentally Sensitive Land Protection Oversight Committee (ESLOC) approved the acquisition of the property on October 7, 2010.

The Sarasota County Commission appreciates the long history of collaboration with Conservation Foundation of the Gulf Coast and asks that you please keep us informed on this issue.

Sincerely,

Alan Maio  
Chairman

c: Sarasota County Commission  
Thomas A. Harmer, County Administrator  
Lee Ann Lowery, Assistant County Administrator  
Carolyn Brown, Director, Parks, Recreation, and Natural Resources



## *City of North Port*

**City Commission**  
4970 City Hall Boulevard  
North Port, Florida 34286

Jacqueline Moore, Mayor  
Rhonda Y. DiFranco, Vice-Mayor  
Cheryl Cook, Commissioner  
Tom Jones, Commissioner  
Linda Yates, Commissioner

Tel: (941) 429-7000  
Fax: (941) 429-7008  
[www.cityofnorthport.com](http://www.cityofnorthport.com)

---

January 19, 2016

Ms. Christine P. Johnson, President  
Conservation Foundation of the Gulf Coast  
PO Box 902  
Osprey, FL 34229

RE: Orange Hammock Ranch Conservation

Dear Ms. Johnson:

On behalf of the City of North Port Commission, we are pleased to provide our support for the permanent conservation of the entire 5,774 acre Orange Hammock Ranch property. Conserving Orange Hammock Ranch presents the opportunity to protect irreplaceable habitat for a variety of wildlife and provide recreational opportunities.

The City of North Port Commission appreciates the opportunity to collaborate with Conservation Foundation of the Gulf Coast and asks that you keep us informed on this issue.

Sincerely,

  
Jacqueline Moore  
Mayor

JM/ds

CC: City Commission  
Jonathan Lewis, City Manager  
Helen Raimbeau, City Clerk

**TAB G**

**Management and Operations Agreement for the RV Griffin Reserve**

RV Griffin Reserve  
SWF Parcel no. 20-223-131X

**MANAGEMENT AND OPERATIONS AGREEMENT BETWEEN THE DISTRICT AND  
THE AUTHORITY FOR THE RV GRIFFIN RESERVE**

This Management and Operation Agreement ("Agreement") is made and entered into this 9<sup>th</sup> day of June, 2010 (the "Effective Date") between the **Southwest Florida Water Management District**, whose address is 2379 Broad Street, Brooksville, Florida 34604-6899, hereinafter referred to as the "District" and **Peace River Manasota Regional Water Supply Authority**, an independent special district of the State of Florida, whose address is 6311 Atrium Drive, Suite 100, Bradenton, Florida 34202, hereinafter referred to as the "Authority."

**RECITALS:**

**WHEREAS**, 5,820-acre property known as RV Griffin Reserve, located in southwest DeSoto County, was acquired by the District in 1992; and

**WHEREAS**, RV Griffin Reserve was purchased by the District in order to provide lands to accommodate the expansion of a water supply and storage system currently owned and operated by the Authority located on adjoining lands; and

**WHEREAS**, the District conveyed a non-exclusive easement over approximately 4,434 acres, which is legally described on Exhibit "A" (the "Property") and is recorded as Instrument Number 200814003442 of the DeSoto County Public Records ("Easement"); and

**WHEREAS**, the District and the Authority entered into a License Agreement ("License Agreement") on January 28, 1992 for the purpose of authorizing the Authority to use a portion of the RV Griffin Reserve for water resource development; and

**WHEREAS**, the water supply values of the Property served as the primary basis for the acquisition and preservation of those values and is the paramount land management goal for the Property; and

**WHEREAS**, protective measures for water supply and other special protection areas designated for the Property, including preservation areas, designated gopher tortoise conservation areas, and conservation easements will take precedence over all other land use and management considerations; and

**WHEREAS**, in addition to the land management goals set forth above, the management of the Property requires natural resources management, including exotic plant species control, prescribed fire maintenance, security of the Property, and management of certain recreational areas; and

**WHEREAS**, the District and the Authority agree that it is in the public interest for each to participate in the management of the Property; and

**WHEREAS**, the District and the Authority desire that the Authority be the lead managing agency for the Property; and

**WHEREAS**, the District and Authority are entering into this Agreement to delineate each party's respective responsibilities as to the Property.

**NOW THEREFORE**, the District and Authority, for and in consideration of Ten Dollars and 00/100 (\$10.00) and other good and valuable consideration, the receipt of which is hereby acknowledged, agree as follows:

**1. Definitions.**

A. Authorized Uses. Those uses provided in the Easement and management activities that the Authority is authorized to perform under any Management Plan. The Authorized Uses will, at minimum, always include resource protection, public access, habitat management and enhancement and land use monitoring as set forth in an approved Management Plan. Authorized Uses may also include recreational use.

B. Facilities. "Facilities" include access roads, multi-use recreational trails, fences, gates, signage and structures and any other improvements on the Property in furtherance of the works of the District or the Authority.

C. Annual Work Plan. The "Annual Work Plan" is a plan to be prepared by the Authority on an annual basis detailing the maintenance and improvements the Authority intends to make to the Property in the following year. Submitted Annual Work Plans will be in conformity with the Management Plan.

D. Management Plan. The "Management Plan" is the ten year plan for all proposed uses, management and maintenance activities on the Property including, at a minimum and without limitation, habitat management, mitigation, restoration, completion of any natural resource inventories, monitoring, exotic species removal, prescribed burning, security measures, construction of facilities or other improvements and public access/recreational opportunities as described herein.

a. Recreational Use. "Recreational Use" means activities that include, but that are not limited to, the use of a model airplane flying field, hiking, bicycling and horseback riding trails. However, in no event will the use of motorized vehicles or all-terrain vehicles (i.e. ATVs) be permitted for recreational purposes unless authorized as part of an approved "Special Use" as defined below or as part of an authorized hunt as provided herein. All Recreational Uses will be in accordance with the Management Plan.



b. Special Use. A "Special Use" is a use of the Property other than as provided herein or the Management Plan and may be authorized pursuant to this Agreement and in accordance with Chapter 40D-9, Florida Administrative Code.

**2. Term and Renewal**

The term of this Agreement is for a period of twenty (20) years from the Effective Date of this Agreement ("Initial Term"). Upon expiration of the Initial Term, the District and the Authority by mutual consent will have the right to renew the term of this Agreement for an additional twenty (20) years.

**3. Management Plan and Annual Work Plan**

A. Maintenance. The Authority will manage the Property in a manner that is consistent with the Management Plan and any Annual Work Plan which will in general terms include providing security to the Property, controlling exotic plant species, maintaining and improving the water quality and natural habitat, maintaining fire lines and managing authorized Recreational Uses on the Property ("Maintenance and Improvements"). However, in no event will the Authority be required to expend funds that are significantly in excess of or not reasonably expected amounts budgeted for such Maintenance and Improvements.

B. Approval of Management Plan. Within one (1) year of the Effective Date of this Agreement, the Authority will provide the District for review and approval a Management Plan that describes the overall essential site management that the Authority will implement during the term of this Agreement. The District's approval of the Management Plan will not be unreasonably withheld. The Management Plan will be written in accordance with the District's procedure, 61-3b, for Land Use and Management Planning.

C. Review Process for Management Plan.

i. Comment Period. The parties will engage in the following review process for the Management Plan.

1. Within ninety (90) days from the District's receipt of the Management Plan ("Comment Period"), the District will provide its comments and recommendations to the Authority ("Comments"). If the District provides Comments, the Authority will respond to the District within thirty (30) days from receipt of the Comments in the following manner:

- a. Prepare and provide the District with a revised Management Plan that incorporates the Comments; or
- b. Respond to the District as to why it is not feasible to revise the Management Plan to address the Comments; or
- c. Request the District grant additional time to complete the necessary research to respond to the Comments; or
- d. Meet with the District staff to resolve the issues presented in the Comments.

- ii. Approval Assumed. If the District fails to provide Comments within the Comment Period the Management Plan will be deemed accepted and the District will have no right to seek any revisions or changes thereto.
- iii. Consents and Cooperation. The District, as the underlying fee owner of the Property, hereby agrees to cooperate and assist the Authority in obtaining any permits, licenses, financial grants, consents, approvals or any other similar applications, requests or approvals that are reflected in, required by, or conform to any activities referenced or implied by the Management Plan.

D. Submission of Annual Work Plan and Annual Work Report.

- i. Annual Work Plan. In order to budget and implement the Management Plan, the Authority will provide to the District in February of each year, commencing the year following the Effective Date of this Agreement, a draft annual work plan (“Annual Work Plan”). The Annual Work Plan will provide a brief description of the scheduled management activities, maintenance and improvements that the Authority plans to provide on the Property beginning in the following fiscal year (October 1 – September 31) in order to implement the requirements of the Management Plan.
  - 1. Comment Period. The parties will engage in the following review process for the Annual Work Plan.
    - a. Within thirty (30) days from the District’s receipt of the Annual Work Plan (“Comment Period”), the District will provide its comments and recommendations to the Authority (“Comments”). If the District provides Comments, the Authority will respond to the District within thirty (30) days from receipt of the Comments (“Comment Deadline”) in the following manner:
      - i. Prepare and provide the District with a revised Annual Work Plan that incorporates the Comments; or
      - ii. Respond to the District as to why it is not feasible to revise the Annual Plan to address the Comments; or
      - iii. Request the District grant additional time to complete the necessary research to respond to the Comments; or
      - iv. Meet with the District staff to resolve the issues presented in the Comments.
  - 2. Approval Assumed. Should the District fail to provide Comments within the Comment Deadline the Annual Work

Plan will be deemed accepted and the District will have no right to seek any revisions or changes thereto.

- ii. Annual Work Report. On or about November 1<sup>st</sup> of each year, commencing the year following the Effective Date of this Agreement, the Authority will submit to the District a report describing the maintenance and improvements made to the Property during the prior twelve (12) month period.

E. Implementation of Management Plan and Annual Work Plan. The Authority may use Authority personnel, engage a third-party entity or request the services of District staff to comply with the provisions of Section 3(a). The District reserves the right to decline the Authority's request to engage the services of District staff. If District staff is engaged to perform work on the Property for and at the request of the Authority, the District will provide a written description of the expected work, schedule and cost. Upon acceptance of the proposal by the Authority and acceptable completion of the work the District will invoice the Authority. Invoices will include copies of any sub-contractor invoices within thirty (30) days of the end of the quarter. The Authority will reimburse the District within thirty (30) days of receiving an accurate invoice. All work to be performed on the Property by the District and associated costs at the request of the Authority must first be approved by the Authority in writing.

F. Inspection of Work Progress. Commencing in December of the year following the Effective Date of this Agreement, and each December or January thereafter during the term of this Agreement, the District and Authority together may inspect the Property to determine if activities and on-going maintenance are adequately and correctly implementing the work described in the Management Plan and the previous Annual Work Plan and Annual Work Report. The District may otherwise inspect the Property at any reasonable time upon prior notice to the Authority to determine conformance with the Annual Work Plan and Management Plan.

#### 4. **Development, Operating and Maintenance of the Property and Facilities.**

A. Special Use. The Authority may authorize and coordinate the implementation of and terms for any Special Use of the Property upon notification to and subsequent written approval by the District. Such Special Use will not materially interfere with the District's rights as fee owner of the Property. The District may authorize and coordinate the implementation of and terms for any Special Use of the Property upon notification to the Authority. Notwithstanding the foregoing, the District will not implement or authorize implementation of a Special Use on the Property that is inconsistent with or which will or may materially interfere with the Authority's rights as set forth in the Easement. Further, regardless of the Authority's or District's implementation of a Special Use, the party which authorizes the Special Use will pay all costs and expenses related to such Special Use.

B. No Construction of Facilities Required. The District acknowledges that the Authority is not required to construct any Facilities on the Property. The Authority may construct new Facilities on the property upon written approval by the District.

C. Recreational Facilities. It is expressly understood that the Property may be used for Recreational Use. The Management Plan and Annual Work Plan will delineate the Authority's obligations to operate and maintain facilities supporting Recreational Uses.

D. Best Management Practices. The Authority will implement applicable Best Management Practices for all activities conducted under this Agreement in compliance with the Florida Administrative Code.

E. Water Resource Development. The District specifically understands and agrees that the Authority may use the Property for Water Resource Development, as that term is defined in the Easement. The Authority will incorporate their Water Resource Development plans in the Management Plan and Annual Work Plans

5. **Pasture B Restoration.** A portion of the Property is known as Pasture "B" and is legally described on Exhibit "B" (the "Pasture"). The Authority will commence restoration of the Pasture once Mitigation Area A & B reaches Success Criteria ("Restoration Commencement Date") as detailed in the Management Plan and Permit issued to the Authority by the Florida Department of Environmental Protection, Permit No. 14-0257291-002. Upon the Restoration Commencement Date, the restoration of the Pasture will also be included in the Annual Work Plan, until such time that the Pasture is restored.

6. **Mitigation Area.** The Authority is solely responsible for reaching Success Criteria of the aforementioned Mitigation Area A & B as detailed in the Permit issued by the Department of Environmental Protection, Permit No. 14-0257291-002.

7. **Existing Cattle Grazing/Haying Lease Agreement.**

A. The Lease. The parties recognize that there currently exists a Cattle Grazing/Haying Lease Agreement (the "Lease") for a portion of the Property; the Lease is incorporated herein and a copy of the Lease is attached hereto as Exhibit "C".

B. Assignment of the Lease. Within six (6) months of the Effective Date of this Agreement, the District will assign all its rights and responsibilities with regard to the Lease to the Authority. The assignment will be subject to approval from the District's Governing Board and Harrison Cattle, LLC (Lessee), the other party to the Lease.

C. Natural Resource Management. The District recognizes that the activities undertaken by the Lessee in accordance with the Lease accomplish primary management objectives with respect to the natural resources on the Property. To continue the benefit resulting from these management activities upon the expiration or termination of the Lease, the Authority may solicit offers to lease or contract for natural resource management of the Property. Cattle grazing activities may be a component of such lease or contract. Any resulting lease or contract must conform to the Land Use and Management Plan for the Property and any lease shall be approved in writing by the District's Land Resources Director. The process by which the Authority solicits and awards a new lease or contract for natural resource management must conform to District policies and procedures.

D. All activities on the Property associated with a cattle grazing operation will be conducted in accordance with all applicable rules and regulations. The Authority further agrees to require lessee or contractor, when practicable, to conduct all activities in accordance with the most recent Water Quality Best Management Practices (BMPs), established by the Florida Department of Agriculture and Consumer Services, Office of Agricultural Water Policy (OAWP). Prior to conducting activities on the Property, the Authority will require lessee or contractor to demonstrate intent to implement practicable BMPs by signing the following forms and submitting them to the OAWP:

- Water Quality/Quantity Best Management Practices Manual Registration Form incorporated herein and attached hereto as Exhibit "C-1" -
- Notice of Intent to Implement Water Quality BMPs for Florida Cow/Calf Operations incorporated herein and attached hereto as Exhibit "C-2"

E. Revenue from Lease or Contract. Subsequent to assignment of the Lease as described in paragraph 7B above, the Authority may collect revenue from a lessee or contractor in exchange for use of the Property for cattle grazing activities. Any such revenue collected by the Authority will be used by it for the sole purpose of reimbursing the Authority for actual and budgeted expenses incurred or to be incurred in the management, operation, maintenance and security of the Property or the improvements thereon. If revenue collected from a lessee or contractor as described in this paragraph exceeds actual and budgeted expenses incurred in the management, operation, maintenance and security of the Property or the improvements thereon, such excess revenue will be paid to the District. Nothing in this Agreement will prohibit the Authority from seeking funding from federal or state agencies through grants or other sources to assist with its management responsibilities. The Authority, upon request, will permit the District to examine all records and documents related to revenues gained and expenses incurred in the performance of this Agreement.

## 8. Agreement for Use of Airfield

A. Model Airplane License. The parties recognize that the District has entered into a Non-Exclusive License Agreement ("Model Airplane License") with Charlotte Sport Modelers Society, Inc., a Florida non-profit corporation (the "Club") to allow the Club to use a portion of the Property to fly model airplanes, a copy of which is attached hereto as Exhibit D.

B. Management of Model Airplane License. The District hereby authorizes the Authority to act on behalf of the District with respect to the Model Airplane License in that the Authority will have all rights and obligations of the District as set forth in said Airplane License. However, the Authority will not have the right to terminate the Model Airplane License as set forth therein without the consent of the District, which consent will not be unreasonably withheld, conditioned or delayed.

C. Amendments to Model Airplane License. Any amendments or modifications to the Model Airplane License must be approved in writing by the Authority.

D. Access License. The Authority has entered into a separate license agreement with the Club and Lessee of the Cattle Lease for use of a road owned by the Authority in order for the

Club to access the Airfield and Lessee to access the Leased Property ("Access License"). A copy of each Access License is attached hereto as Exhibit E.

9. **Discrimination.** The Authority will not discriminate against any individual because of that individual's race, color, religion, sex, national origin, age, handicaps, or marital status with respect to any activity occurring or conducted on the Property.

10. **Unauthorized Uses.** The Authority will through its agents and employees, use its reasonable efforts to prevent the unauthorized use of the Property or any use thereof not in conformance with this Agreement.

11. **Alcohol.** The possession, consumption, or other use of any alcoholic beverage, intoxicant and unlawful drug or substance by anyone within or on the Property is specifically prohibited.

12. **Firearms.** The possession of any weapons or firearms on the Property is prohibited unless in accordance with Section 790.06, Florida Statutes. Possession of firearms may be authorized for law enforcement officials, security personnel or any other authorized personnel or in connection with an authorized hunt.

13. **Hunting.** Hunting and trapping of wildlife on the Property is prohibited unless it is necessary in connection with exotics and nuisance control or as an authorized hunt. All hunts must be approved by the District and the Authority.

14. **Assignment.** Neither party may assign any of its rights under this Agreement voluntarily or involuntarily, whether by merger, consolidation, dissolution, operation of law, or any other manner without the prior written consent of the other party. In the event of any purported assignment of rights in violation of this section, the parties agree that this Agreement shall terminate and is void.

15. **Archaeological and Historical Sites.** Execution of this Agreement in no way affects any of the parties' obligations pursuant to Chapter 267, Florida Statutes. The collection of artifacts or the disturbance of archaeological and historic sites on the Property is prohibited unless prior authorization has been obtained from the Division of Historical Resources of the Department of State. The Authority will make all reasonable efforts to insure that adequate measures have been planned to locate, identify and protect and preserve the archaeological and historical sites and properties on the Property.

16. **Taxes and Assessments.** If any ad valorem taxes, intangible property taxes, personal property taxes, or other taxes or assessments of any kind are assessed or levied lawfully on the Property or the Facilities based on the Authority's use thereof during the term of this Agreement the Authority will pay said taxes within thirty (30) days after receiving written notice thereof from the District. In the event the Authority fails to pay all the taxes assessed or levied on the Property or the Facilities within thirty (30) days after receiving written notice thereof from the District, the District may, at its sole option, pay said taxes subject to immediate reimbursement thereof in full together with any interest thereon at the maximum rate allowed by law and any administrative costs thereof incurred by the District, including reasonable attorneys fees. Failure of the Authority to pay said taxes will constitute a material breach of this Agreement.

**17. Fees, Revenue and Records.**

A. User Fees. The Authority may charge an entrance or user fee to the visitors and users of the Property and Facilities after receiving prior written approval from the District. Any such fees charged by the Authority will be used for the sole purpose of reimbursing the Authority for actual and budgeted expenses incurred or to be incurred in the operation, maintenance and security of the Property and Facilities.

B. Other Revenues. The Authority may explore revenue-producing initiatives that are compatible with the purposes for which the Property was acquired and compatible with Florida Forever statutory directives after obtaining written approval from the District. Any revenue that is generated by the Authority under these initiatives will be applied to management and operation costs of the Property and the Facilities.

C. Records. The Authority will, upon request, permit the District to examine or audit all records, books, documents and papers relating to the Property or this Agreement. The Authority will maintain the records, books, documents and papers relating to the Property or this Agreement as set forth in Chapter 119 Florida Statutes (Public Records Act (the "Act")). All documents, letters and materials relating to the Property or this Agreement are public records open to inspection by the public and cannot be held confidential unless such record or material is statutorily exempt from the Act.

**18. Default, Cure and Remedies.**

A. Default. The District may terminate this Agreement as set forth below upon the following events of default ("Events of Default"):

1. The Authority fails to submit a Management Plan or Annual Work Plan in accordance with the terms of this Agreement, or
2. The Authority intentionally destroys or degrades the natural systems, or rare or endangered habitats that are targeted for preservation, except as provided in any Management Plan or Annual Work Plan, or
3. The Authority intentionally violates any Federal, State, or local laws, rules, regulations, or ordinances relating to the Property, or
4. The Authority causes the Property to be contaminated with Hazardous Wastes or other pollutants; or
5. The Authority fails to comply with the other terms of this Agreement.

B. Curative Period. In the Event of a Default, the District will notify the Authority in writing as to the nature of the default ("Notice of Default"). The Authority will have sixty (60) days from the date of receipt of the Notice of Default to cure said default ("Curative Period") or, if the default cannot be cured within the Curative Period, commence a cure of the default and diligently pursue same until completion.

19. **No Regulatory Authority Granted.** This Agreement will not be construed to grant any permits or regulatory authority as to any uses or activity upon the Property.

20. **License Agreement.** This Agreement will supersede any license agreement between the District and Authority relating to RV Griffin Reserve, including that License Agreement dated January 28, 1992 as amended on August 25, 1999 pursuant to a First Amendment to the License Agreement recorded in O.R. Book 443, Page 1154 of the Public Records of DeSoto County, Florida and the parties will record a termination of the License Agreement in the form attached hereto as Exhibit F.

21. **Liability.** Nothing in the Agreement is intended or is to be construed as a waiver of either party's sovereign immunity or an expansion of liability beyond the limits established as provided under Section 768.28, Florida Statutes, or as otherwise provided by law.

22. **Recording.** This Agreement may not be recorded.

23. **Notices.** Any and all notices, requests or other communications hereunder will be deemed to have been duly given if in writing and if transmitted by hand delivery with receipt therefore, or by registered mail posted prior to the expiration date for such notice, return receipt requested and first class postage prepaid as follows:

To the Authority:      Peace River Manasota Regional Water Supply Authority  
6311 Atrium Drive, Suite 100  
Bradenton, Florida 34202

To the District:      Southwest Florida Water Management District  
Land Resources Department  
2379 Broad Street  
Brooksville, Florida 34604-6899

24. **Governing Law.** This Agreement will be construed and enforced in accordance with the Laws of the State of Florida.

25. **Effective Date of Agreement.** This Agreement will be effective upon the date of execution of both the Authority Board of Directors and the Southwest Florida Water Management District whichever is the later.

26. **Binding Effect.** This Agreement will be binding upon and inure to the benefit of the parties hereto, and their representatives, successors, and assigns.

27. **Amendments.** This Agreement may be amended in writing by mutual consent of the District and the Authority.

SIGNATURES BEGIN ON THE FOLLOWING PAGE



RV Griffin Reserve  
SWF Parcel no. 20-223-131X

**SOUTHWEST FLORIDA WATER  
MANAGEMENT DISTRICT**

ATTEST:

Witness: Chuck Lane  
CHUCK LANE - Sr. Land Use Spec  
Print Name/Title

By: Eric Sutton  
Eric Sutton, Director  
Land Resources Department

**ACKNOWLEDGEMENT**

**STATE OF FLORIDA  
COUNTY OF HERNANDO**

The foregoing instrument was acknowledged before me this 26<sup>th</sup> day of May 2010, by Eric Sutton and Chuck Lane, Director and Senior Land Use Specialist, respectively, of the Land Resources Department of the Southwest Florida Water Management District, who executed and acknowledged that they executed the foregoing instrument for the purposes stated therein. They are personally known to me.



Elaine Vergara  
Name of Notary

\_\_\_\_\_  
(Name of Notary printed or stamped)

Commission No. \_\_\_\_\_

My Commission Expires 8/7/2013

PEACE RIVER/MANASOTA  
REGIONAL WATER SUPPLY  
AUTHORITY

ATTEST:

By: *Miss J Carter*  
Its: WATER Resources Director

By: *Patrick J Lehman*  
Its: Executive Director

ACKNOWLEDGEMENT

STATE OF FLORIDA  
COUNTY OF DESOTO  
MANASOTA

The foregoing instrument was acknowledged before me this 9 day of JUNE 2010, by PATRICK J Lehman, Miss J Carter of Peace River/Manasota Regional Water Supply Authority, who executed and acknowledged that they executed the foregoing instrument for the purposes stated therein. They are personally known to me.

*Edward Yates*  
Name of Notary

  
(Name of Notary or Initials of Notary)

Commission No. \_\_\_\_\_

My Commission Expires 3/17/12

APPROVED BY:	INITIALS	DATE
ATTORNEY	<i>W</i>	5/12/10
MANAGER	<i>W</i>	5-12-10
DIRECTOR	<i>EL</i>	17 May 10
DEPUTY EXEC DIR	<i>@</i>	5-11-10

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**REGULAR AGENDA**  
**ITEM 4**

**SWFWMD Cooperative Funding Initiative Policy Revisions**

---

**Presenter -** Mike Coates, Deputy Director

**Recommended Action -** **Status Report.** This item is presented for the Board's information and no action is required.

The SWFWMD Governing Board adopted Board Policy 130-4 for the purpose of implementing the District's Cooperative Funding Initiative program. The policy was revised at their Governing Board meeting on June 26, 2017. District staff utilizes this policy to evaluate cooperative funding requests.

The specific changes to the policy are:

- 1) Administrative changes to remove references to Basin Boards;
- 2) Inclusion of third party review language to better estimate project costs;
- 3) Provide a definition of 'base supply' for potable alternative water supply projects; and
- 4) Provide a definition for a 'regional entity'.

Staff will provide an overview of the policy as revised by the SWFWMD.

**Attachments:**

SWFWMD Cooperative Funding Initiative Policy (130-4) Revised June 27, 2017

## Cooperative Funding Initiative Policy 130-4

### STATEMENT OF POLICY:

In accordance with Chapter 373, Florida Statutes, the Governing Board (Board) may participate and cooperate with county governments, municipalities, water supply authorities, and other interested entities in water management programs and projects of mutual benefit, provided such programs and projects are consistent with the District's statutory authority and will ensure proper development, utilization, and conservation of the water resources and ecology within the jurisdictional boundaries of the District. In addition, the Governing Board will implement the state's Water Protection and Sustainability Program through its Cooperative Funding Initiative if state funds are appropriated for this program.

### POLICY GUIDELINES:

The following guidelines apply to all projects. The Governing Board may deviate from the guidelines for a specific project if it determines that such a deviation would be appropriate.

1. The Board will give priority consideration to those projects designed to further the implementation of the District Strategic Plan, Water Management Plan, Comprehensive Watershed Management Plans, Surface Water Improvement and Management Plans, and Regional Water Supply Plan.
2. The District is committed to supplier diversity in the performance of all contracts associated with District Cooperative Funding projects. The District requires the second party to make good faith efforts to encourage the participation of minority and women-owned business enterprises, both as prime contractors and sub-contractors, in accordance with applicable laws. Applicants will be required to document all contractors and sub-contractors who perform work in association with the project, including the amount spent and, to the extent such information is known, whether each contractor or sub-contractor was a minority owned or small business enterprise. The applicant will be required to provide the District a report of this information upon completion of the project prior to final payment, or within 30 days of the execution of any amendment of an agreement that increases project funding and prior to disbursement of any additional funds by the District.
3. The Board will consider the applicant's efforts in developing, implementing, and enforcing best water management practices, including but not limited to, conservation oriented water rate structures and irrigation, landscape and flood protection ordinances.
4. Funding may be provided to assist with the cost of data collection, research, feasibility studies, conservation and environmental education initiatives; ecosystem restoration, water resource investigation and plan development; and design, permitting and construction of capital projects. Funding is not available for operation and maintenance, payment of debtor submittal, and responses to required District permits.
5. Funding assistance will be contingent upon concurrent project action and commitment by the county, municipality, water supply authority, or other interested entity to ensure the project goals will be implemented.
6. The Board will consider funding based on the applicant's ability to demonstrate that such funding is necessary to make the project economically feasible.

7. The cooperating entity must demonstrate any matching funds have been appropriated, are contained within a Capital Improvement Plan, or otherwise committed to the project.
8. Any state or federal appropriations or grant monies received by a county government, a municipality, or a water supply authority for a specific project shall be first applied toward the total cost of the cooperator's proposed project. The District will typically fund up to 50 percent of the remaining project costs with a similar match from the cooperator.
9. Pursuant to the provisions of Section 288.06561, Florida Statutes, the Board may reduce or waive requirements for matching funds when requested by rural counties or municipalities, as defined by Subsection 288.0656{1} {b},
10. All applications submitted for funding consideration by the Board must be signed by a single Senior Administrator acting as a coordinator for the Cooperative Funding Initiative for the county, municipality, water supply authority, or interested entity. If an entity submits multiple applications, an overall ranking of the projects is required. Final decisions regarding the funding of project proposals are the exclusive responsibility of the Board.
11. Construction projects estimated to cost over \$5,000,000 will undergo a third party review at the completion of the 30 percent design stage. This review is to confirm the project cost, schedule, and ability of the project to meet the proposed resource benefit. Additionally, projects that cost between \$1,000,000 and \$5,000,000 that staff has determined will benefit from a third party review will also undergo such review at the completion of the 30 percent design stage. Results of the third party review will be presented to the Governing Board for approval before the project can proceed to final design.
12. Refer to District Procedure Number 13-4 for additional guidance.

The following additional guidelines apply to potable alternative water supply projects:

13. It is the express intent of the Board to utilize its incentive based funding to encourage the development of fully integrated, robust, multijurisdictional water supply systems comprised of diverse sources {i.e., groundwater, surface water, offstream reservoirs, desal, etc.}, managed in a manner that takes full advantage of Florida's intense climatic cycles to ensure reliable, sustainable and drought resistant systems, which maximize the use of alternative supplies to the greatest extent practicable. Multijurisdictional means two or more water utilities or local governments that have been organized into a larger entity or have entered into an interlocal agreement or contract for the purpose of more efficiently pursuing water supply development or alternative water supply development projects pursuant to a regional water supply plan. The water supply systems of the multijurisdictional entity must be interconnected and must have a formalized operational management agreement that ensures the interconnected supplies are managed as described in the Board's intent as described herein. All operational agreements between multijurisdictional entities will be evaluated by the District and must be deemed consistent with the Board's intent as described herein. Consistent with Section 373.707, Florida Statutes, the District shall prioritize funding for alternative water supply projects as follows:
  - Highest priority - Alternative water supply projects owned, operated and controlled, or perpetually controlled by a Regional Water Supply Authority (RWSA) or a regional entity created by an interlocal agreement that establishes a separate legal entity, with

sufficient authority to fund, own, construct, operate and maintain alternative potable water supply systems. The regional entity must be recognized by the Governing Board through a commitment of funds that assist in the establishment of the entity.

- Medium priority - Alternative water supply projects that are not owned, operated and controlled, or perpetually controlled by a RWSA, but meet the definition of multijurisdictional.
- ~~Lowest priority - Projects that do not meet the multijurisdictional criteria. Funding for these projects would be limited to consideration by the appropriate Basin Board(s). (note: modification to this policy will be discussed by the Board as circumstances arise)~~

14. If a member government of a RWSA proposes a potable water supply project, it must be submitted by the RWSA to be considered for District funding.
15. Projects submitted by non-member governments within the service area of a RWSA will be considered for funding only if the non-member government has reviewed its plan with the RWSA to ensure the project is not inconsistent with the RWSA plan. An affirmative written statement from the RWSA indicating that the project is not inconsistent is required.
16. All potable alternative water supply projects will be required to identify the quantity of alternative water supply that will be made available upon completion of the project. It is the intent of the District's Governing Board that the quantity made available will be used as "base supply". The base supply will be clearly defined by the cooperator on a project-by-project basis and will include, but not be limited to, the overall alternative water supply system capacity, typically expressed in million gallons per day, the expected annual average use for the life of the project, as well as the frequency and timing of use of the available alternative water supply quantities. The base supply defined by the cooperator will be reviewed and approved by the Governing Board as a part of the Cooperative Funding Initiative project review and budgeting process. The cooperative funding agreement between the District and the cooperator will include the base supply requirements approved by the Governing Board. The Governing Board may consider adjustments to a project's base supply quantity and definition by amendment of the cooperative funding agreement.
17. In determining whether, and how much funding will be provided by the District, the District will consider the project's total cost per 1,000 gallons and the cost per gallon of water supply produced. These costs shall exclude distribution system components and will be compared to, among other things:
  - a. The cost of other available potable water supply that could be purchased by the applicant from a supplier who is capable of meeting the demand.
  - b. The cost to develop other viable alternative water supplies.
  - c. The unitary rate or wholesale water cost of the RWSA in the area where the applicant is located. For applicants outside the area of a RWSA or within the service area of a RWSA that does not own, operate and control an alternative water supply project, cost information from other RWSAs with alternative water supplies can be used for comparison purposes.
  - d. The applicant's current cost of water supply and projected cost of water supply after the project is in operation.

All cost information must be certified and adjusted to reflect present values for the current fiscal year.

18. The District will consider the applicant's conservation oriented water rate structure(s) and per capita water use as factors in its incentive based funding. Where an applicant has not achieved the District per capita water use requirements as described in Chapter 40D-2, Florida Administrative Code, or where they have not adopted an effective conservation rate structure, District funding may be limited to consideration of water conservation projects only.

**REFERENCES:** Chapter 373, Florida Statutes  
Chapter 40D-2, Florida Administrative Code

**SUPERSEDES:** 12/18/07, 10/24/06, 9/27/05, 9/28/04, 3/25/03, 11/01/01

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**REGULAR AGENDA**  
**ITEM 5**

**State Water Project Funding for Partially Treated Raw Water ASR Project**

---

**Presenter -** Mike Coates, Deputy Director

**Recommended Action -** Board Discussion and direction to staff.

The state legislative session starts in January 2018. Senate President Joe Negron has released the senate schedule for interim committee weeks to begin the week of September 11, 2017 and continuing through the week of December 4, 2017. It is also expected that the respective county delegation meetings will be held as early as September.

In preparation for the upcoming 2018 legislative session staff requests Board discussion and direction for seeking sponsorship for state water project funding for the Partially Treated ASR Project. The project is currently in the pilot test phase with full-scale design and construction anticipated through FY 2020. The total estimated project cost is \$7.755M.

Given the short period of time before delegation meetings and start of legislative committee meetings, staff requests Board discussion and direction for soliciting legislative sponsors and presenting to the delegations request for funding for the Partially Treated Raw Water ASR Project. The Authority's lobbyist, Diane Salz, will be working with staff to promote the Partially Treated Raw Water ASR Project and drafting legislative priorities to present to the Board in October.

**Attachments:**

- Tab A Presentation Materials
- Tab B Partially Treated ASR Project Fact Sheet
- Tab C Senate Schedule for Interim Committee Weeks
- Tab D Local Delegation Members



**TAB A**  
**Presentation Materials**

# State Water Project Funding for Partially Treated Water ASR Project

Regular Item 5  
August 2, 2017

## Peace River ASR Facilities



# Partially Treated Water ASR

- Presented to Board April 2016
- Large Cost Savings If Successful
- Improved Recovery Efficiency
- Facilitates Higher Storage/Recovery Volume
- Doesn't Require Excess Water Treatment Capacity to Function
- Potential to Over-Recharge for SWUCA Environmental Benefit or GW Credits
- Beneficial Example – State Wide

Method	Quantity Recharged	Quantity Recovered (1)	Total Annual Cost (2) (3)
Current Fully Treated Water	1.2 BG	960 MG	\$1,598,000
Partially Treated Water	1.2 BG	960 MG	\$1,264,000

(1) Estimate recovery at 80% for comparative purposes  
 (2) Partially Treated Cost includes debit service on 57.5M pumping facilities & additional O&M  
 (3) Partially Treated costs don't include any re-landfill for pumping facilities

Southern Water Use Caution Area (SWUCA)

# Pilot Testing Using Partially Treated Water

- Approved by Board October 2016
- Test @ Two Existing Wells
- Approximately 1-Year
- Permit Approved December 2016
- Began Test February 2017
- Complete Test November 2017
- Technical Report February 2018

ASR Test Wells

# Budget / Work / Time

Work	FY 2016	FY 2017	FY 2018	FY 2019	FY 2020
Preliminary Evaluation, Permitting & Pilot Testing					
Permitting & Preliminary Design					
Pilot Design					
Construction of Facilities					
<b>Est. Total Costs</b>	<b>\$225,000</b>	<b>\$230,000</b>	<b>\$730,000</b>	<b>\$6,550,000</b>	

## Pease River Alternative Treatment Water Sewer District Preliminary Treated Raw Water ASR Project

### Executive Summary

Through engineering and cost estimates, the analysis used to establish what costs, schedule and impact a sustainable, non-sustainable regional water supply system.

### Project Description

The Pease River Facility, located in northern DeKalb County, is a 21 million gallon per day (mgd) water treatment plant providing the majority of drinking water to Cherokee, DeKalb and Spalding Counties' residents. This is an Alternative Water Supply where water is pumped from the Pease River during high flow times and stored off-stream in surface reservoirs until Aquifer Storage and Recovery (ASR) system for use when river flow is too low for self-sustained harvest.

The ASR system includes 21 production wells with a total design storage capacity of 0.2 billion gallons. Water withdrawn from the Pease River during high flow periods is currently stored in drinking water treatment plant to improve water quality and not pumped back. Water stored in the water treatment plant ASR, returned to drinking water standards and delivered to Auxiliary Chambers. Consistency of ASR is more generally treated water under daily treated drinking water when regular water treatment efficiency, provide beneficial water storage as a groundwater source used for the Eastern Water (the Eastern Water) and serve as a quick emergency response to any necessary additional water resources in Florida.

### Project Need Rationale

Throughout several decades Florida's water resources has expanded due to years of groundwater over-pumping. As a result, the state has identified the region served by the Authority as a water stressed area. Through a collaborative and cooperative project with the member governments the Authority responsibility incorporated to remove regional water supply over the past few decades, making alternative water supplies including surface reservoirs and ASR to meet drinking water needs in form of developing groundwater.

The withdrawal of surface water during high flow periods from the Pease River to ensure that the Pease provides consistent flow for downstream users and Cherokee County requires the additional flow needed to sustain a healthy environment while meeting the demands for public water supply and a growing economy in the region. Water storage is the key to creating a reliable, safe and affordable water supply.

ASR - Two recent research from 2011-12

### Project Milestones

- | Project Milestone  | Completion Date |
|--|-----------------|
| • Installation of existing ASR wells in state park water (the first 10) under ASR (consent) at the existing ASR production well. | Complete        |
| • Conducting pilot testing, evaluating results and evaluating new wells for construction to partially treated ASR.               | December 2017   |
| • If results are favorable the ASR system would be implemented to construct an use of partially treated water for drinking.      | December 2017   |
| • New treatment facilities would be constructed to support partially treated ASR drinking.                                       | December 2019   |

## Pease River Facility



### Contact:

Patrick Latham, Executive Director  
platham@peasewater.com

Mike Clark, Deputy Director  
mclark@peasewater.com

Pease River Authority, 1000 Peachtree Street, NE  
Atlanta, Georgia 30309  
Tel: 404.525.4477



**TAB B**  
**Partially Treated ASR Project Fact Sheet**

# PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY

## Partially Treated Raw Water ASR Project

### Fact Sheet



*‘Through cooperation and collaboration the Authority and its members shall create, maintain and expand a sustainable, interconnected regional water supply system.’*

### **Project Description:**

The Peace River Facility, located in southwest DeSoto County, is a 51 million gallon per day (mgd) water treatment plant providing the majority of drinking water to Charlotte, DeSoto and Sarasota Counties’ utilities. This is an Alternative Water Supply where water is harvested from the Peace River during high flow times and stored off-stream in surface reservoirs and an Aquifer Storage and Recovery (ASR) system for use when river flow is too low for safe environmental harvest.

The ASR system includes 21 production wells with a total storage capacity of 6.3 billion gallons. Water withdrawn from the Peace River during high flow periods is treated to drinking water standards prior to injection into the ASR wells and stored until needed. When needed the water is recovered from ASR, re-treated to drinking water standards and delivered to Authority customers. Conversion of ASR to inject partially treated water, rather than fully treated drinking water offers considerable cost savings (since it is only treated to drinking water standards once), improve ASR recovery efficiency, provide beneficial aquifer recharge in a groundwater water critical area (the Southern Water Use Caution Area), and serve as a model supporting improved use of seasonally abundant water resources in Florida.

### **Project Need/Benefit:**

Throughout coastal southwest Florida, salt water intrusion has occurred due to years of groundwater over-pumping. As a result, the state has identified the region served by the Authority as a water critical area. Through a collaborative and cooperative process with its member governments the Authority successfully constructed an extensive regional water system over the past two decades, utilizing alternative water supplies that includes off-stream reservoirs and ASR to meet drinking water needs.

The withdrawal of surface water during high flow periods from the Peace River to mimic Mother Nature provides assurance that the downstream estuary and Charlotte Harbor receives the freshwater flow needed to sustain a healthy environment while meeting the demands for public water supply and a growing economy in the region. Water storage is the key to assuring a reliable, safe and affordable water supply.

**Cost:** Total project estimated cost is \$7.8 M.

### **Project Schedule:**

	Completion Date
• Modification of existing ASR permits to allow pilot testing the partially treated ASR concept on two existing ASR production wells.	Complete
• Conducting pilot testing, evaluating results and evaluating cost/benefit for conversion to partially treated ASR.	December 2017
• If results are favorable the ASR system would be re-permitted to convert to use of partially treated water for recharge.	December 2018
• New pumping facilities would be constructed to support partially treated ASR recharge.	December 2019

**Peace River Facility:**



**Contacts:**

Patrick Lehman, Executive Director  
[plehman@regionalwater.org](mailto:plehman@regionalwater.org)

Mike Coates, Deputy Director  
[mcoates@regionalwater.org](mailto:mcoates@regionalwater.org)

Peace River Manasota Regional Water Supply Authority  
9415 Town Center Parkway  
Lakewood Ranch, FL 34202  
Tele: 941-316-1776



**TAB C**  
**Senate Schedule for Interim Committee Weeks**

## **INTERIM COMMITTEE MEETING SCHEDULE**

**September 2017 – Week of the 11<sup>th</sup>**

**October 2017 - Week of the 9<sup>th</sup>**

**October 2017 - Week of the 23<sup>rd</sup>**

**November 2017 - Week of the 6<sup>th</sup>**

**November 2017 - Week of the 13<sup>th</sup>**

**December 2017 - Week of the 4<sup>th</sup>**

**TAB D**  
**Local Delegation Members**

**Peace River Manasota Regional Water Supply Authority  
Member County Legislative Delegations**

<b>Delegation</b>	<b>Legislators</b>
Charlotte County	Senator Greg Stube (R-23) Senator Denise Grimsley (R-26)  Representative Michael Grant (R-75)
DeSoto County	Senator Denise Grimsley (R-36)  Representative Ben Albritton (R-56)
Manatee County	Senator Bill Galvano (R-21)  Representative Wengay 'Newt' Newton (D-70) Representative Jim Boyd (R-71) Representative Joe Gruters (R-73)
Sarasota County	Senator Greg Stube (R-23)  Representative Jim Boyd (R-71) Representative Alexandra 'Alex' Miller (R-72) Representative Joe Gruters (R-73) Representative Julio Gonzalaz (R-74)

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**GENERAL COUNSEL'S REPORT**

---

**Presenter -**

Douglas Manson, General Counsel

**Recommended Action -**

**Status Report.** This item is presented for the Board's information and no action is required.

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017**

**EXECUTIVE DIRECTOR'S REPORT**

---

**Presenter -**

Patrick Lehman, Executive Director

**Recommended Action -**

**Motion** to schedule workshop and approve change of venue for October 4, 2017 Board Meeting to Lakewood Ranch Town Hall.

Staff recommends that the Board schedule a workshop in conjunction with the regularly scheduled Board Meeting for October 4, 2017. The purpose of the workshop is to conduct 'Water 101' session detailing the Authority's governing document, policies and procedures. To better facilitate a workshop format the venue is recommended to be changed from the Manatee County Commission Chambers to Lakewood Ranch Town Hall located in Lakewood Ranch.

***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**ROUTINE STATUS REPORTS  
ITEM 1**

**Hydrologic Conditions Report**

## MEMORANDUM

**Project:** Hydrologic Conditions Report

**Date:** August 2, 2017

**Developed By:** Mike Coates, Deputy Director

---

This memorandum summarizes rainfall and surface water conditions, and the Authority's current water storage and supply conditions for the month of July 2017, and the preceding 12-month period.

### Rainfall Conditions & Projections

Rainfall in the Peace River Basin for the past 12-months is about 17 inches below-normal. This data covers the 12-months through July 14 (see Table 1). Rainfall for the month of July 2017 totaled about 1.5 inches while the historical average rainfall for the full month of July is about 8.1 inches.

Region-wide rainfall conditions reported by SWFWMD for the 12-month period ending June 30, 2017 are shown in Figure 1 (this is most up-to-date map available). Conditions shown on Figure 1 indicate normal to drier-than-normal conditions in the four-county service area, but mostly dryer than normal conditions in the Peace River Basin.

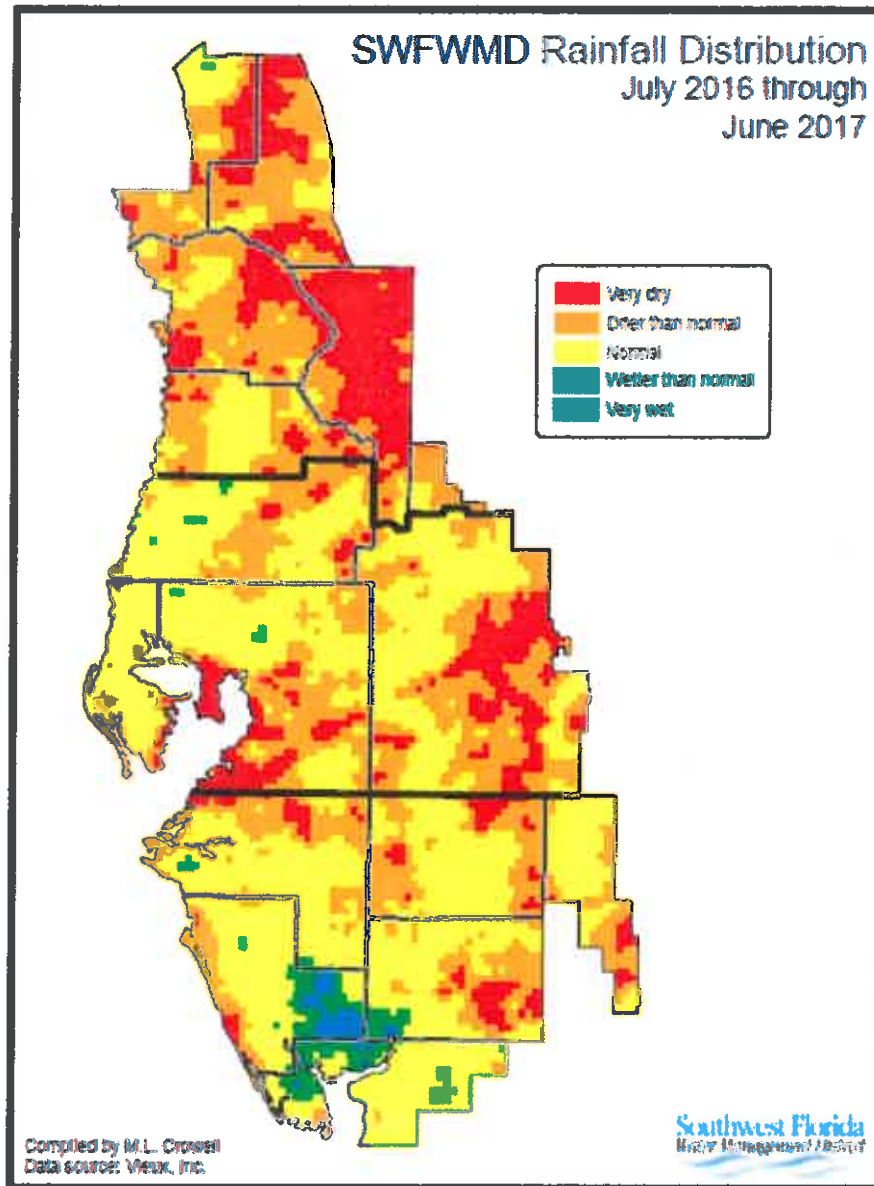
Projections for the next three months (August - October) from NOAA are for above-normal temperatures and near-normal rainfall for southwest Florida. The NOAA extended forecast is for continued ENSO neutral conditions (neither El Nino nor La Nina condition) through fall 2017 and winter 2018.

Table 1 (Peace River Basin Rainfall - Inches)

Item	Aug	Sept	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Total
<b>Long-Term Avg.</b>	7.60	7.30	3.19	1.73	1.90	2.10	2.56	2.96	2.56	3.89	8.31	8.09	52.2
<b>Actual Past 12 Months</b>	7.73	4.73	2.31	0.04	1.21	1.49	1.02	1.36	0.39	0.65	12.9	1.49	35.4
<b>Difference</b>	0.13	-2.57	-0.88	-1.69	-0.69	-0.61	-1.54	-1.60	-2.17	-3.24	4.59	-6.60	-16.8



Figure 1 (SWFWMD Rainfall Conditions Map)



### River Flow Conditions

The locations of two U.S. Geological Survey gages, one in the upper portion of the basin and one in the lower portion are shown in Figure 2, and flow conditions at these gages are discussed below:

July 2017 flow in the “Peace River at Fort Meade” (upper part of the watershed) was well below normal due to low rainfall in the upper part of the basin (see Figure 3). The “Peace River at Arcadia” gage (about 15 miles upstream of the Authority’s intake) is one of the gages used to calculate how much water the Authority can withdraw from the river each day. Flow at the “Peace River at Arcadia” gage (lower part of the watershed) was

slightly above normal as a result of higher rainfall in the lower portion of the basin (see Figure 4).

Figure 2 (Peace River Basin showing selected gage locations and Location of PRF)

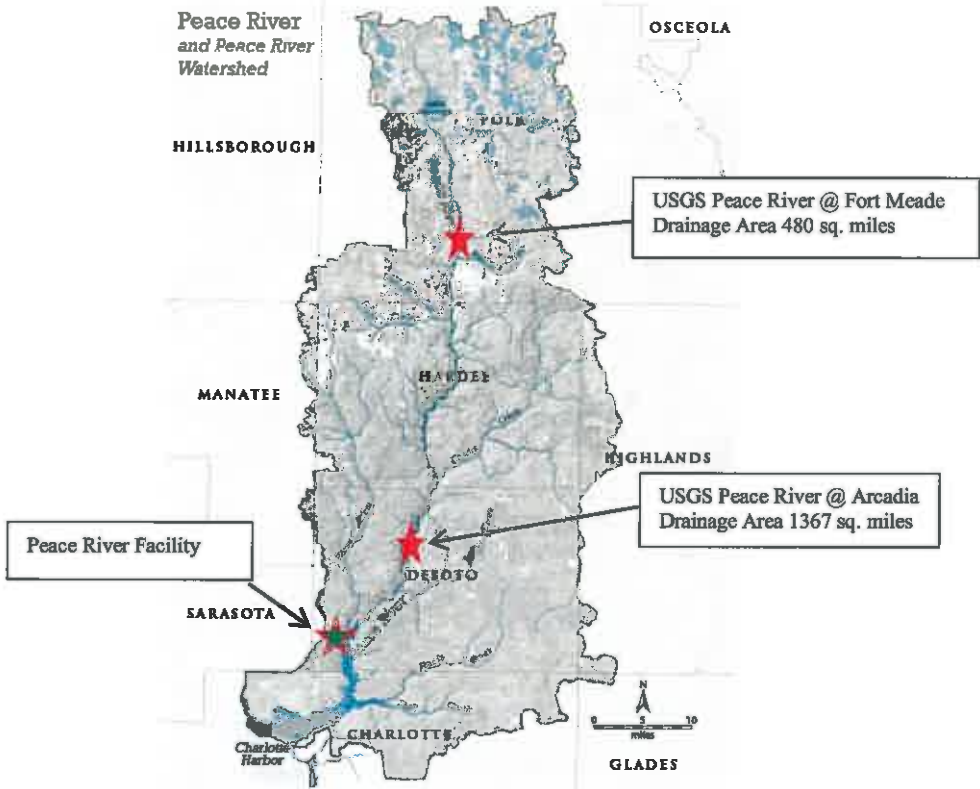


Figure 3 (Peace River Flow @ Fort Meade)

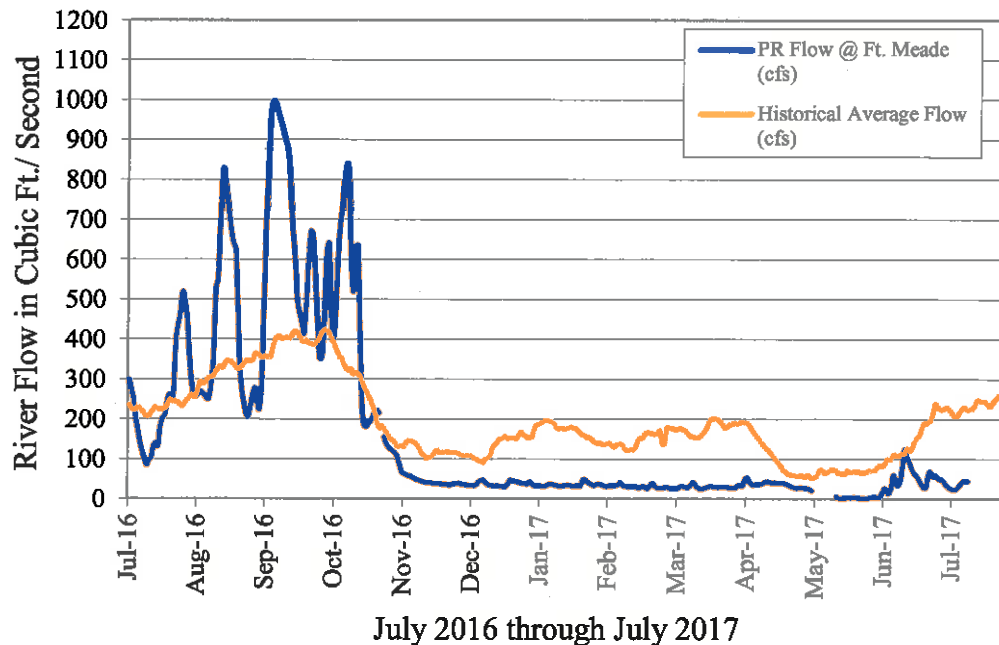
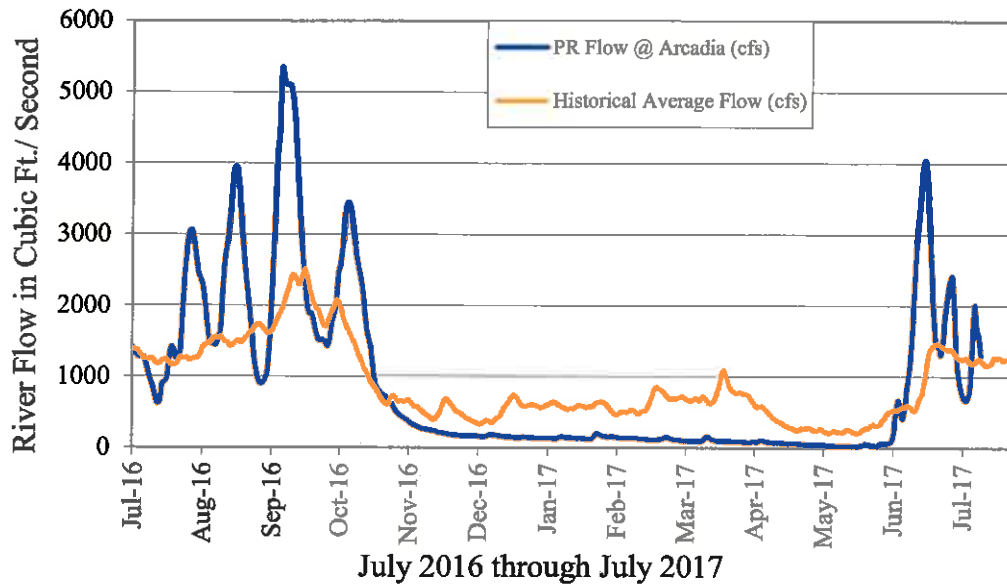


Figure 4 (Peace River Flow @ Arcadia)



**River Withdrawals, Finished Water Production & Demand**

While water was available in the permitted withdrawal schedule as early as June 6<sup>th</sup>, withdrawals from the river were not initiated until June 19, 2017 due to water quality (TDS) considerations. Withdrawals are ongoing at rates up to the permit maximum day limit of 120 MGD.

Figure 5 (Withdrawals from Peace River)

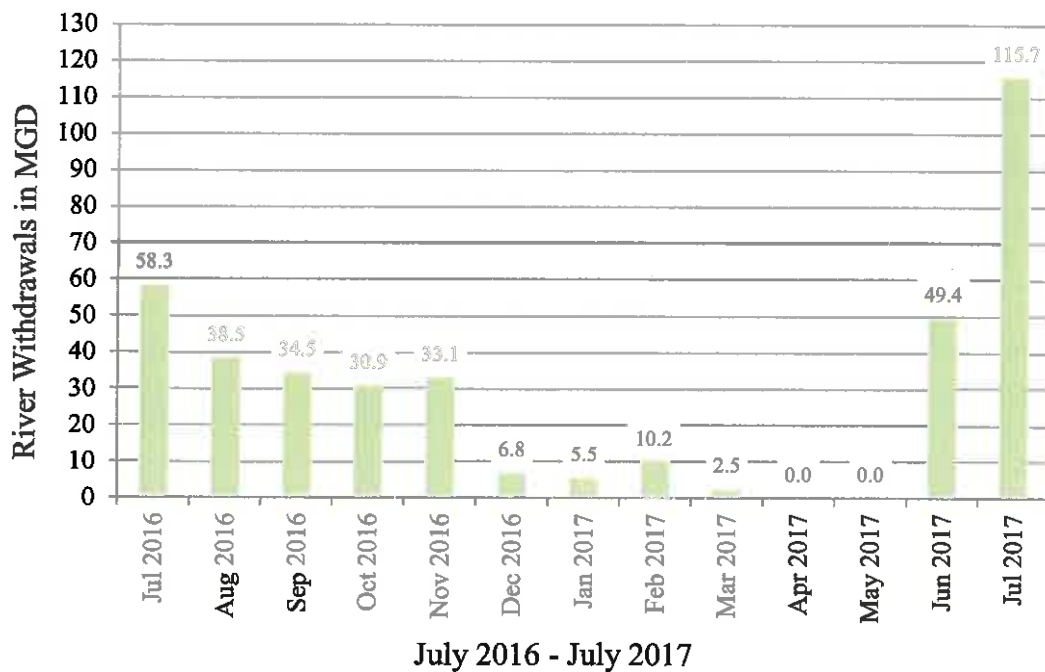
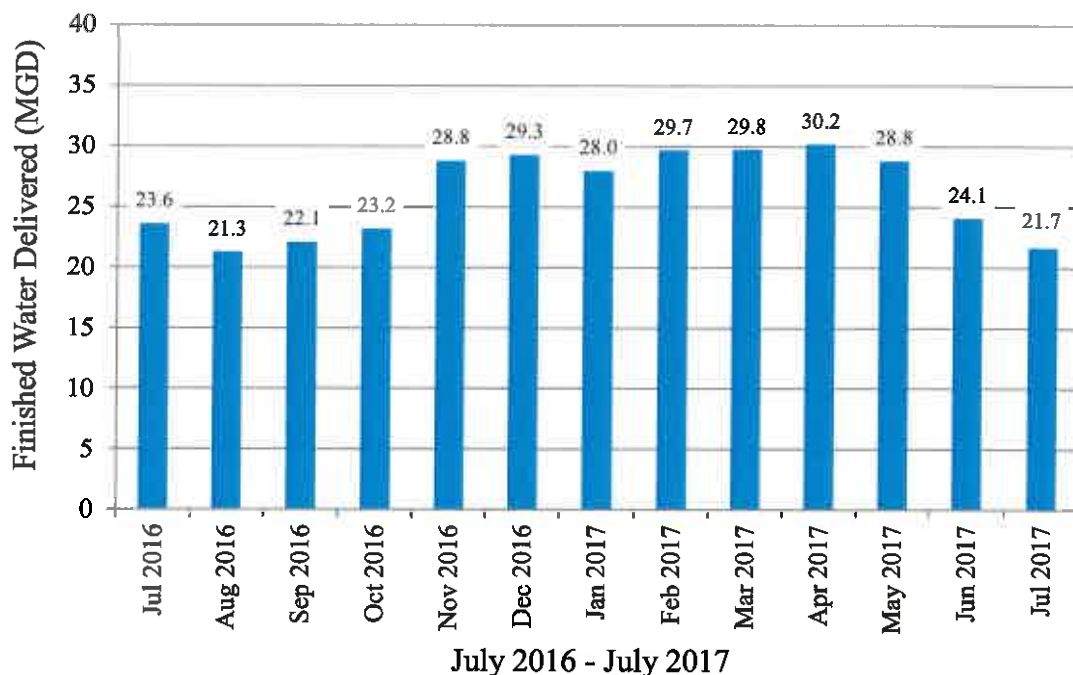


Figure 6 shows monthly finished water deliveries to Customers for the 12-month period ending mid-July 2017. Finished water deliveries to Customers during July were about 22 MGD. Seasonal water delivery from the City of Punta Gorda to the Regional System is ongoing.

Figure 6 (Peace River Facility Deliveries to Customers)



### Stored Supplies at the PRF

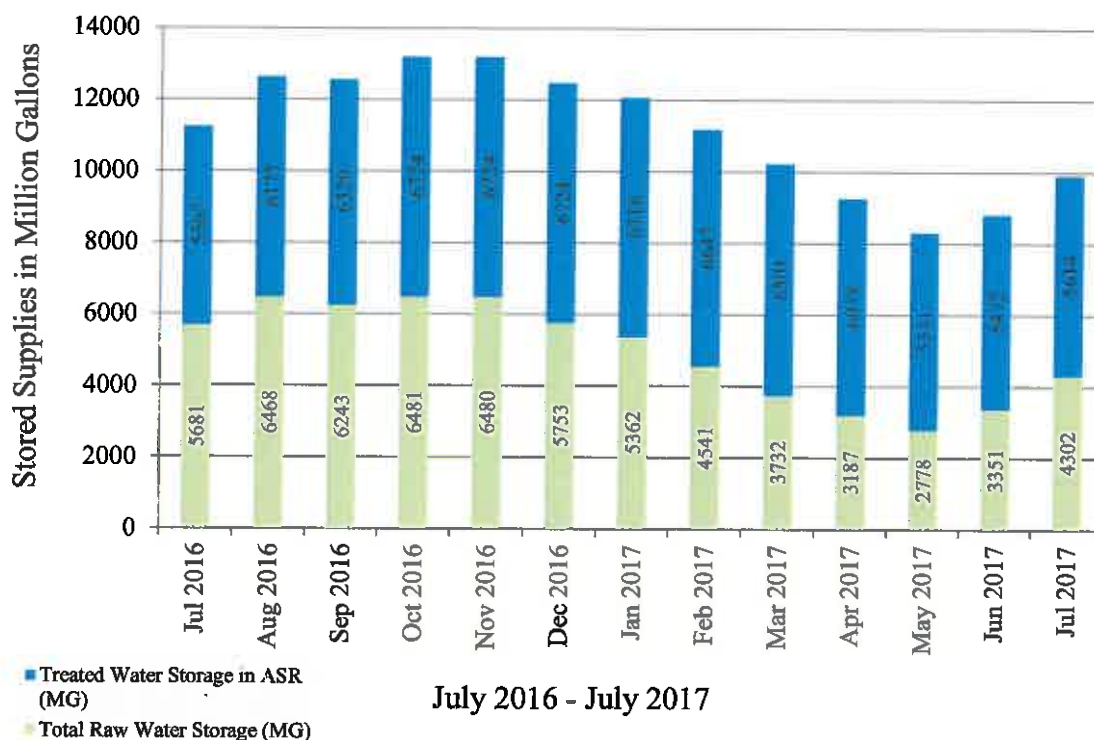
The Authority maintains two large capacity off-stream storage systems at the PRF. The primary storage is raw river water stored in Reservoir No. 1 and No. 2. When flow in the River is high enough, a small percentage of that flow is harvested at the Authority's pumping facility on the Peace River and stored in Reservoirs 1 and 2. This storage is designed to be completely refilled each wet season. Total raw-water storage capacity is seasonally adjusted. During the hurricane season the total raw water storage capacity is 6.5 billion gallons (BG). Outside of hurricane season, additional water can be safely stored, for example, the maximum raw water storage capacity in December and January is 6.9 BG. **Raw water stored as of mid-July 2017 totaled about 4.3 BG.**

The secondary storage at the PRF is treated water stored in the Aquifer Storage and Recovery (ASR) system. The design capacity of the ASR system is approximately 6.3 BG. Because this supply must be fully treated to drinking water standards before storage, it can't be stored as rapidly as water in the raw-water reservoirs. Filling ASR storage is done incrementally each year as excess treatment capacity and hydrologic condition allow. Pumping from ASR in FY 2017 was initiated on January 12, 2017 and ended on June 15, 2017. A total of 1.32 BG was pulled from the system. Water recovered from ASR is discharged to the surface reservoir system and undergoes full treatment again

with the rest of the raw-water stream before delivery to Authority Customers. **Treated water stored in ASR as of mid-July 2017 totaled 5.6 BG.** ASR Recharge has been ongoing since June 19<sup>th</sup>.

Stored raw water supplies (combined storage in Reservoir No. 1 and No. 2) and stored water in the ASR system for the past year are shown in Figure 8. **The total water in storage as of mid July 2017 was about 9.9 BG.** This is about 1.3 BG less water in storage than in July 2016.

Figure 8 (Stored Water Supplies)



***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**ROUTINE STATUS REPORTS  
ITEM 2**

**Check Registers for May 2017 and June 2017**

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
APR17FRS	05/02/2017	FLORIDA DIVISION OF RETIREMENT	26,388.73
36437	05/05/2017	PRO-CHEM INC.	641.39
36438	05/05/2017	MSC INDUSTRIAL SUPPLY CO.	1,028.08
36439	05/05/2017	DMS-FINANCIAL MGMT SERVICES	87.23
36440	05/05/2017	AA ELECTRIC SE INC.	446.25
36441	05/05/2017	ALLIED UNIVERSAL CORP.	11,997.19
36443	05/05/2017	DO-ALL RENTAL INC.	154.00
36444	05/05/2017	Fisher Scientific	2,286.77
36445	05/05/2017	Hach Company	637.68
36446	05/05/2017	KINGSWAY ACE HARDWARE	35.94
36447	05/05/2017	MCMASTER-CARR SUPPLY CO	1,853.20
36448	05/05/2017	BUSINESS CARD	1,008.57
36449	05/05/2017	BUSINESS CARD	795.90
36450	05/05/2017	STANTEC CONSULTING SERVICES	31,601.90
36451	05/05/2017	FENDER'S TIRE & BATTERY INC.	509.00
36453	05/05/2017	FEI-FT.MYERS WATERWORKS #127	995.00
36454	05/05/2017	SARASOTA HERALD TRIBUNE	79.75
36456	05/05/2017	BUSINESS CARD	1,036.83
36457	05/05/2017	BUSINESS CARD	2,266.02
36458	05/05/2017	UNIVAR USA INC	33,919.74
36459	05/05/2017	Cummins Power South	7,923.34
36460	05/05/2017	TOTALFUNDS BY HASLER	200.00
36462	05/05/2017	CENTURYLINK	1,496.70
36463	05/05/2017	AECOM TECHNICAL SERVICES, INC.	1,867.50
36464	05/05/2017	ATKINS NORTH AMERICA, INC.	19,896.18
36465	05/05/2017	BATTERIES PLUS BULBS #451	272.90
36466	05/05/2017	BENCHMARK ENVIROANALYTICAL INC	7,997.00
36467	05/05/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
36468	05/05/2017	MICHAEL CHELL	452.91
36469	05/05/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36470	05/05/2017	DOLPHIN TRANSPORTATION SPECIALISTS	546.08
36471	05/05/2017	EARTH BALANCE	6,155.00
36472	05/05/2017	E-CONOLIGHT LLC	994.88
36473	05/05/2017	ENVIRONMENTAL EXPRESS INC.	148.05
36474	05/05/2017	ENVIRONMENTAL PR GROUP	1,914.00
36475	05/05/2017	FL ASSOC. FOR WATER QUALITY CONTROL	1,200.00
36476	05/05/2017	FLUID CONTROL SPECIALTIES, INC.	1,894.28
36477	05/05/2017	FLOWMASTER PETROLEUM SERVICES, LLC	2,325.00
36478	05/05/2017	AIRGAS SPECIALTY PRODUCTS	2,931.97
36479	05/05/2017	HAWKINS, INC.	699.49
36480	05/05/2017	Icon Technologies	1,450.00
36481	05/05/2017	JCB Inc	88,253.63
36482	05/05/2017	KIMLEY-HORN AND ASSOCIATES, INC.	5,165.08
36483	05/05/2017	L.I.S. INC.	199.30
36484	05/05/2017	MADER ELECTRIC, INC.	2,995.00
36485	05/05/2017	Natural Resources LLC	30,272.39
36487	05/05/2017	C & S CHEMICALS INC.	44,183.79
36488	05/05/2017	PATRICK J LEHMAN	453.84
36489	05/05/2017	PMC ENGINEERING LLC	2,113.92
36490	05/05/2017	PROGRESSIVE WATER RESOURCES, LLC	13,622.50
36491	05/05/2017	RICHARD ANDERSON	94.00
36492	05/05/2017	M. THOMAS DOBBS JR.	52.50
36493	05/05/2017	TEST GAUGE AND BACKFLOW SUPPLY INC.	891.79
36494	05/05/2017	THE LAKE DOCTORS, INC.	3,000.00
36495	05/05/2017	GOSSAMER BAY INC	2,955.00
36496	05/05/2017	U.S. BANK EQUIPMENT FINANCE	830.65
36497	05/05/2017	U.S. TENT RENTAL INC.	2,790.40
36498	05/05/2017	VANASSE HANGEN BRUSTLIN, INC	15,362.50
36499	05/05/2017	ASWATHY WARRIER	1,350.00

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36442	05/05/2017	AIRGAS USA, LLC	196.04
36452	05/05/2017	SIEMENS INDUSTRY, INC.	1,340.00
36455	05/05/2017	ENDRESS+HAUSER, INC.	1,827.54
Dbt5517	05/05/2017	Intuit	624.85
DBT5517	05/05/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
34261	05/05/2017	GRAINGER	2,076.64
dbt06051017	05/10/2017	Valic	6,936.37
dbt05242017	05/24/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt052417	05/24/2017	Valic	7,015.29
36501	06/02/2017	AECOM TECHNICAL SERVICES, INC.	11,300.00
36502	06/02/2017	AIRGAS SPECIALTY PRODUCTS	2,912.38
36503	06/02/2017	AIRGAS USA, LLC	34.30
36504	06/02/2017	ALL FLORIDA WATER-TAMPA	211.58
36505	06/02/2017	ALLIED ELECTRONICS, INC.	791.16
36506	06/02/2017	ALLIED UNIVERSAL CORP.	17,672.15
36507	06/02/2017	AMAZON	4,211.62
36508	06/02/2017	ANIXTER INC.	6,726.78
36509	06/02/2017	ARGILA ENTERPRISES, INC.	3,600.00
36510	06/02/2017	ASWATHY WARRIER	2,375.00
36511	06/02/2017	ATKINS NORTH AMERICA, INC.	2,801.12
36512	06/02/2017	AWWA	448.00
36513	06/02/2017	Bates Flags & Flagpoles	180.75
36514	06/02/2017	BENCHMARK ENVIROANALYTICAL INC	30,054.85
36515	06/02/2017	BILL'S BOTTLED WATER SERVI CE	32.58
36516	06/02/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	1,166.50
36517	06/02/2017	Buffalo Graffix	904.87
36518	06/02/2017	BUSINESS CARD	2,917.42
36519	06/02/2017	C & S CHEMICALS INC.	98,345.21
36520	06/02/2017	CENTURYLINK	1,875.23
36521	06/02/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,049.94
36522	06/02/2017	CHARLOTTE COUNTY UTILITIES	164,694.84
36523	06/02/2017	Cimtec Automation, LLC	3,282.65
36524	06/02/2017	CINTAS	189.54
36525	06/02/2017	COLE-PARMER INSTRUMENT CO.	108.89
36526	06/02/2017	Cummins Power South	3,822.70
36527	06/02/2017	D. M. CONSTRUCTION CORP.	10,057.35
36528	06/02/2017	DELL MARKETING L.P.	2,980.03
36529	06/02/2017	DESOTO AUTOMOTIVE ENTERPRISES INC	981.65
36530	06/02/2017	DESOTO COUNTY (V)	66,333.33
36531	06/02/2017	DESOTO COUNTY WATER UTILITY	2,047.05
36532	06/02/2017	DEX IMAGING	291.23
36533	06/02/2017	DIANE R. SALZ	3,750.00
36534	06/02/2017	DILLER-BROWN & ASSOC. INC.	622.14
36535	06/02/2017	DMS-FINANCIAL MGMT SERVICES	271.91
36536	06/02/2017	DOMINION EXTERMINATORS	130.00
36537	06/02/2017	Doug Morton	249.81
36538	06/02/2017	EARTH BALANCE	30,541.28
36539	06/02/2017	Entech	9,035.00
36540	06/02/2017	ENVIRONMENTAL PR GROUP	43,883.68
36541	06/02/2017	FEDERAL EXPRESS	84.29
36542	06/02/2017	FEI-FT.MYERS WATERWORKS #127	5,433.81
36543	06/02/2017	Fisher Scientific	999.27
36544	06/02/2017	FLORIDA DEPARTMENT OF STATE	36.50
36545	06/02/2017	FLORIDA POWER & LIGHT COMPANY	135,782.16
36546	06/02/2017	FLUID CONTROL SPECIALTIES, INC.	2,799.00
36547	06/02/2017	FORSBERG CONSTRUCTION INC.	180,940.24
36548	06/02/2017	FRONTIER COMMUNICATIONS	214.99



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36549	06/02/2017	GOVERNMENT FINANCE OFFICERS ASSOC	160.00
36550	06/02/2017	GRAYBAR	927.60
36551	06/02/2017	Hach Company	1,186.71
36552	06/02/2017	HAZEN AND SAWYER	24,515.70
36553	06/02/2017	HDR ENGINEERING INC.	21,327.55
36554	06/02/2017	HIME PHOTOGRAPHY	350.00
36555	06/02/2017	HOME DEPOT	2,485.49
36556	06/02/2017	HVMI, LLC	4,773.08
36557	06/02/2017	ISA	120.00
36558	06/02/2017	Jacobi Carbons Inc	93,706.80
36559	06/02/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36560	06/02/2017	JAN-PRO OF MANASOTA	249.00
36561	06/02/2017	JANICKI ENVIRONMENTAL, INC.	34,155.00
36562	06/02/2017	JOHNSON ENGINEERING, INC.	11,721.25
36563	06/02/2017	KED GROUP INC.	13,464.00
36564	06/02/2017	KEETON'S OFFICE & ART SUPPLY	2,664.14
36565	06/02/2017	Ken Burton Jr. , Tax Collector	7.50
36566	06/02/2017	KING ENGINEERING ASSOCIATES INC.	1,025.00
36567	06/02/2017	KINGSWAY ACE HARDWARE	347.02
36568	06/02/2017	Liquid Engineering Corp	9,675.00
36569	06/02/2017	M. THOMAS DOBBS JR.	35.00
36570	06/02/2017	MANSON BOLVES DONALDSON VARN, P.A.	23,476.33
36571	06/02/2017	McCABE & ASSOCIATES	2,400.00
36572	06/02/2017	MOCK ENGINEERING, INCORPORATED	890.00
36573	06/02/2017	MSC INDUSTRIAL SUPPLY CO.	795.51
36574	06/02/2017	Natural Resources LLC	67,727.95
36575	06/02/2017	PAGE MECHANICAL GROUP, INC.	206.50
36576	06/02/2017	PRO-CHEM INC.	540.89
36577	06/02/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36578	06/02/2017	RAPID SECURITY SOLUTIONS, LLC	9,008.24
36579	06/02/2017	Rob Wilson	36.61
36580	06/02/2017	SARASOTA HERALD TRIBUNE	170.50
36581	06/02/2017	SHEARER CONSULTING INC.	3,000.00
36582	06/02/2017	SIMS CRANE & EQUIPMENT	1,476.60
36583	06/02/2017	SMITH RANCH & GARDEN, INC.	599.20
36584	06/02/2017	State of Florida Department of Health	200.00
36585	06/02/2017	SUNBELT RENTALS	692.09
36586	06/02/2017	SUNCOAST COMMERCIAL DOOR & HARDWARE INC	7,755.00
36587	06/02/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36588	06/02/2017	TAMPA ARMATURE WORKS, INC.	1,838.85
36589	06/02/2017	THATCHER CHEMICAL OF FLORIDA	21,760.00
36590	06/02/2017	THE LAKE DOCTORS, INC.	2,800.00
36591	06/02/2017	THE SHIPPING POST	78.12
36592	06/02/2017	THE SUN	82.94
36593	06/02/2017	TKW CONSULTING ENGINEERS, INC.	7,879.72
36594	06/02/2017	Tom Evans Environmental Inc	47,800.15
36595	06/02/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	200.61
36596	06/02/2017	U.S. BANK EQUIPMENT FINANCE	1,770.92
36597	06/02/2017	UNIVAR USA INC	62,265.53
36598	06/02/2017	UPS	111.94
36599	06/02/2017	USA Bluebook	1,073.15
36600	06/02/2017	VANASSE HANGEN BRUSTLIN, INC	27,803.54
36601	06/02/2017	VIDEOGUY PRODUCTIONS	2,200.00
36602	06/02/2017	VOYAGER FLEET SYSTEMS, INC.	4,915.30
36603	06/02/2017	WEST COAST MOWING	8,453.50
36604	06/02/2017	Winzer Corporation	1,453.89
36605	06/02/2017	WOMACK SANITATION INC.	1,202.00
36606	06/02/2017	XBYTE TECHNOLOGIES	1,150.00

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
dbt060617	06/06/2017	FLORIDA DIVISION OF RETIREMENT	24,593.10
dbt06072017	06/07/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt060717	06/07/2017	Valic	7,033.25
	06/08/2017	QuickBooks Payroll Service	78,705.54
36607	06/16/2017	ALL FLORIDA WATER-TAMPA	211.58
36608	06/16/2017	ALLIED UNIVERSAL CORP.	14,474.48
36609	06/16/2017	ARGILA ENTERPRISES, INC.	2,250.00
36610	06/16/2017	ASWATHY WARRIER	1,400.00
36611	06/16/2017	ATKINS NORTH AMERICA, INC.	1,257.40
36612	06/16/2017	BENCHMARK ENVIROANALYTICAL INC	9,134.90
36613	06/16/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	269.25
36614	06/16/2017	BUREAU OF ELEVATOR SAFETY	75.00
36615	06/16/2017	C & S CHEMICALS INC.	40,514.07
36616	06/16/2017	CENTURYLINK	370.63
36617	06/16/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
36618	06/16/2017	CHARLOTTE COUNTY UTILITIES	164,694.84
36619	06/16/2017	Cimtec Automation, LLC	1,640.16
36620	06/16/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36621	06/16/2017	Cummins Power South	1,361.51
36622	06/16/2017	DESOTO COUNTY (V)	66,333.33
36623	06/16/2017	DEX IMAGING	5,676.49
36624	06/16/2017	DIANE R. SALZ	3,750.00
36625	06/16/2017	DMS-FINANCIAL MGMT SERVICES	10.75
36626	06/16/2017	EARTH BALANCE	21,615.92
36627	06/16/2017	Entech	6,803.10
36628	06/16/2017	FEDERAL EXPRESS	24.24
36629	06/16/2017	Fisher Scientific	525.16
36630	06/16/2017	FLORIDA DEPARTMENT OF STATE	22.96
36631	06/16/2017	FRONTIER COMMUNICATIONS	216.98
36632	06/16/2017	GRAYBAR	535.24
36633	06/16/2017	Hach Company	754.12
36634	06/16/2017	Hilltop Securities	1,500.00
36635	06/16/2017	HOME DEPOT	263.46
36636	06/16/2017	Hudson Pump	5,022.84
36637	06/16/2017	HVMI, LLC	6,579.34
36638	06/16/2017	Jacobi Carbons Inc	31,359.60
36639	06/16/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36640	06/16/2017	JAN-PRO OF MANASOTA	249.00
36641	06/16/2017	JANICKI ENVIRONMENTAL, INC.	18,567.50
36642	06/16/2017	JOHNSON ENGINEERING, INC.	20,957.80
36643	06/16/2017	KEETON'S OFFICE & ART SUPPLY	743.96
36644	06/16/2017	KIMLEY-HORN AND ASSOCIATES, INC.	254.31
36645	06/16/2017	KINGSWAY ACE HARDWARE	287.94
36646	06/16/2017	Knight Supply of Arcadia	1,042.12
36647	06/16/2017	M&M CONTRACTORS INC.	2,720.00
36648	06/16/2017	MANSON BOLVES DONALDSON VARN, P.A.	25,034.74
36649	06/16/2017	MCMaster-CARR SUPPLY CO	1,175.52
36650	06/16/2017	MOCK ENGINEERING, INCORPORATED	622.00
36651	06/16/2017	Natural Resources LLC	70,896.23
36652	06/16/2017	PREFERRED GOVERNMENT INSURANCE TRUS	13,421.75
36653	06/16/2017	PRESTI & NAEGELE	1,475.00
36654	06/16/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36655	06/16/2017	RING POWER CORPORATION	4,500.00
36656	06/16/2017	SAM'S CLUB	90.47
36657	06/16/2017	SARASOTA TROPHY & AWARDS INC.	15.50
36658	06/16/2017	STANTEC CONSULTING SERVICES	14,500.00
36659	06/16/2017	THE SUN	54.34
36660	06/16/2017	TOTALFUNDS BY HASLER	84.89

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36661	06/16/2017	U.S. BANK EQUIPMENT FINANCE	288.96
36662	06/16/2017	UNIVAR USA INC	22,793.99
36663	06/16/2017	UPS	71.87
36664	06/16/2017	USA Bluebook	-
36665	06/16/2017	VERIZON WIRELESS	1.10
36666	06/16/2017	WOMACK SANITATION INC.	795.00
36667	06/16/2017	USA Bluebook	144.77
db16/21/17	06/21/2017	Valic	6,919.86
adb162117	06/21/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
	06/22/2017	QuickBooks Payroll Service	75,464.47
36668	06/30/2017	Agilent Technologies Inc	114.00
36669	06/30/2017	AIRGAS SPECIALTY PRODUCTS	2,837.94
36670	06/30/2017	AIRGAS USA, LLC	35.08
36671	06/30/2017	ALLIED ELECTRONICS, INC.	1,997.05
36672	06/30/2017	ALLIED UNIVERSAL CORP.	19,456.98
36673	06/30/2017	AMAZON	3,911.66
36674	06/30/2017	ANN LEE	132.00
36675	06/30/2017	ASWATHY WARRIER	1,400.00
36676	06/30/2017	BENCHMARK ENVIROANALYTICAL INC	2,431.75
36677	06/30/2017	BUSINESS CARD	1,494.92
36678	06/30/2017	C & S CHEMICALS INC.	40,479.23
36679	06/30/2017	CENTURYLINK	1,504.60
36680	06/30/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,274.87
36681	06/30/2017	CHENANGO SUPPLY CO., INC.	35.59
36682	06/30/2017	Cimtec Automation, LLC	1,957.01
36683	06/30/2017	CINTAS	331.90
36684	06/30/2017	D. M. CONSTRUCTION CORP.	10,615.43
36685	06/30/2017	DEX IMAGING	8.00
36686	06/30/2017	DILLER-BROWN & ASSOC. INC.	858.00
36687	06/30/2017	DMS-FINANCIAL MGMT SERVICES	67.23
36688	06/30/2017	Doug Morton	164.11
36689	06/30/2017	FEDERAL EXPRESS	38.42
36690	06/30/2017	FEI-FT.MYERS WATERWORKS #127	186.74
36691	06/30/2017	Fisher Scientific	1,403.40
36692	06/30/2017	FLORIDA POWER & LIGHT COMPANY	148,471.28
36693	06/30/2017	FORD RITZ	207.50
36694	06/30/2017	G-TEC Equipment Services	1,230.00
36695	06/30/2017	GRAYBAR	1,919.03
36696	06/30/2017	Hach Company	1,815.51
36697	06/30/2017	HAZEN AND SAWYER	4,837.00
36698	06/30/2017	Jacobi Carbons Inc	61,882.20
36699	06/30/2017	JET AUTO SERVICE	1,915.87
36700	06/30/2017	KEETON'S OFFICE & ART SUPPLY	431.82
36701	06/30/2017	KING ENGINEERING ASSOCIATES INC	750.00
36702	06/30/2017	KINGSWAY ACE HARDWARE	383.94
36723	06/30/2017	LABORATORY DATA CONSULTANTS FL, INC.	1,311.20
36704	06/30/2017	MAILFINANCE	299.61
36705	06/30/2017	MANATEE COUNTY SHERIFF	25.00
36706	06/30/2017	MANSON BOLVES DONALDSON VARN, P.A.	7,777.83
36707	06/30/2017	MSC INDUSTRIAL SUPPLY CO.	1,697.87
36708	06/30/2017	PAGE MECHANICAL GROUP, INC.	2,313.71
36709	06/30/2017	PATRICK J LEHMAN	412.80
36710	06/30/2017	PROGRESSIVE WATER RESOURCES, LLC	4,850.00
36711	06/30/2017	RAPID SECURITY SOLUTIONS, LLC	97.00
36712	06/30/2017	RICHARD ANDERSON	193.94
36713	06/30/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36714	06/30/2017	TKW CONSULTING ENGINEERS, INC.	3,500.00
36715	06/30/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	61.98
36716	06/30/2017	TRANSCAT, INC.	1,104.16
36717	06/30/2017	TRULY NOLEN BRANCH 079	178.00
36718	06/30/2017	U.S. BANK EQUIPMENT FINANCE	1,193.00
36719	06/30/2017	UNIVAR USA INC	34,245.80
36720	06/30/2017	UNIVERSITY ENTERPRISES, INC.	187.00

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
CHECK REGISTER: MAY & JUNE 2017**

**Bank Code:** PUBLIC FUNDS INTEREST CHECKING (PNC)

Document Number	Date	Payee Name / Description	Amount
36721	06/30/2017	US Plastic Corp	763.24
36722	06/30/2017	USA Bluebook	15.58
ADBT63017	06/30/2017	FLORIDA DIVISION OF RETIREMENT	25,350.36
<b>Total</b>			<b>3,190,713.46</b>

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**Alphabetically by Vendor**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36440	05/05/2017	AA ELECTRIC SE INC.	446.26
36463	05/05/2017	AECOM TECHNICAL SERVICES, INC.	1,867.50
36501	06/02/2017	AECOM TECHNICAL SERVICES, INC.	11,300.00
36688	06/30/2017	Agilent Technologies Inc	114.00
36478	05/05/2017	AIRGAS SPECIALTY PRODUCTS	2,931.97
36502	06/02/2017	AIRGAS SPECIALTY PRODUCTS	2,912.38
36669	06/30/2017	AIRGAS SPECIALTY PRODUCTS	2,837.94
36442	05/05/2017	AIRGAS USA, LLC	195.04
36503	06/02/2017	AIRGAS USA, LLC	34.30
36670	06/30/2017	AIRGAS USA, LLC	35.08
36504	06/02/2017	ALL FLORIDA WATER-TAMPA	211.58
36607	06/16/2017	ALL FLORIDA WATER-TAMPA	211.58
36505	06/02/2017	ALLIED ELECTRONICS, INC.	791.16
36671	06/30/2017	ALLIED ELECTRONICS, INC.	1,997.05
36441	05/05/2017	ALLIED UNIVERSAL CORP.	11,997.19
36506	06/02/2017	ALLIED UNIVERSAL CORP.	17,672.15
36608	06/16/2017	ALLIED UNIVERSAL CORP.	14,474.48
36672	06/30/2017	ALLIED UNIVERSAL CORP.	19,456.98
36507	06/02/2017	AMAZON	4,211.62
36673	06/30/2017	AMAZON	3,911.66
36508	06/02/2017	ANIXTER INC.	6,726.78
36674	06/30/2017	ANN LEE	132.00
36509	06/02/2017	ARGILA ENTERPRISES, INC.	3,600.00
36609	06/16/2017	ARGILA ENTERPRISES, INC.	2,250.00
36499	05/05/2017	ASWATHY WARRIER	1,350.00
36510	06/02/2017	ASWATHY WARRIER	2,375.00
36610	06/16/2017	ASWATHY WARRIER	1,400.00
36675	06/30/2017	ASWATHY WARRIER	1,400.00
36464	05/05/2017	ATKINS NORTH AMERICA, INC.	19,896.18
36511	06/02/2017	ATKINS NORTH AMERICA, INC.	2,801.12
36611	06/16/2017	ATKINS NORTH AMERICA, INC.	1,257.40
36512	06/02/2017	AWWA	448.00
36513	06/02/2017	Bates Flags & Flagpoles	180.75
36465	05/05/2017	BATTERIES PLUS BULBS #451	272.90
36466	05/05/2017	BENCHMARK ENVIROANALYTICAL INC	7,997.00
36514	06/02/2017	BENCHMARK ENVIROANALYTICAL INC	30,054.85
36612	06/16/2017	BENCHMARK ENVIROANALYTICAL INC	9,134.90
36676	06/30/2017	BENCHMARK ENVIROANALYTICAL INC	2,431.75
36515	06/02/2017	BILL'S BOTTLED WATER SERVI CE	32.58
36516	06/02/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	1,166.50
36613	06/16/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	269.25
36517	06/02/2017	Buffalo Graffix	904.67
36614	06/16/2017	BUREAU OF ELEVATOR SAFETY	75.00
36448	05/05/2017	BUSINESS CARD	1,008.57
36449	05/05/2017	BUSINESS CARD	795.90
36456	05/05/2017	BUSINESS CARD	1,036.83
36457	05/05/2017	BUSINESS CARD	2,268.02
36518	06/02/2017	BUSINESS CARD	2,917.42
36677	06/30/2017	BUSINESS CARD	1,494.92
36487	05/05/2017	C & S CHEMICALS INC.	44,183.79
36519	06/02/2017	C & S CHEMICALS INC.	98,345.21
36615	06/16/2017	C & S CHEMICALS INC.	40,514.07
36678	06/30/2017	C & S CHEMICALS INC.	40,479.23
36462	05/05/2017	CENTURYLINK	1,496.70
36520	06/02/2017	CENTURYLINK	1,875.23
36616	06/16/2017	CENTURYLINK	370.63
36679	06/30/2017	CENTURYLINK	1,504.60
36521	06/02/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,049.94
36680	06/30/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,274.67

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**Alphabetically by Vendor**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36467	05/05/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
36617	06/16/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
36522	06/02/2017	CHARLOTTE COUNTY UTILITIES	184,694.84
36618	06/16/2017	CHARLOTTE COUNTY UTILITIES	164,694.84
36681	06/30/2017	CHENANGO SUPPLY CO., INC.	35.59
36523	06/02/2017	Cimtec Automation, LLC	3,282.65
36619	06/16/2017	Cimtec Automation, LLC	1,640.16
36682	06/30/2017	Cimtec Automation, LLC	1,957.01
36524	06/02/2017	CINTAS	189.54
36683	06/30/2017	CINTAS	331.90
36525	06/02/2017	COLE-PARMER INSTRUMENT CO.	108.89
36469	05/05/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36620	06/16/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36459	05/05/2017	Cummins Power South	7,923.34
36526	06/02/2017	Cummins Power South	3,822.70
36621	06/16/2017	Cummins Power South	1,361.51
36527	06/02/2017	D. M. CONSTRUCTION CORP.	10,057.35
36684	06/30/2017	D. M. CONSTRUCTION CORP.	10,615.43
36528	06/02/2017	DELL MARKETING L.P.	2,980.03
36529	06/02/2017	DESOTO AUTOMOTIVE ENTERPRISES INC	981.65
36530	06/02/2017	DESOTO COUNTY (V)	66,333.33
36622	06/16/2017	DESOTO COUNTY (V)	66,333.33
36531	06/02/2017	DESOTO COUNTY WATER UTILITY	2,047.05
36532	06/02/2017	DEX IMAGING	291.23
36623	06/16/2017	DEX IMAGING	5,676.49
36685	06/30/2017	DEX IMAGING	8.00
36533	06/02/2017	DIANE R. SALZ	3,750.00
36624	06/16/2017	DIANE R. SALZ	3,750.00
36534	06/02/2017	DILLER-BROWN & ASSOC. INC.	822.14
36686	06/30/2017	DILLER-BROWN & ASSOC. INC.	858.00
36439	05/05/2017	DMS-FINANCIAL MGMT SERVICES	67.23
36535	06/02/2017	DMS-FINANCIAL MGMT SERVICES	271.91
36625	06/16/2017	DMS-FINANCIAL MGMT SERVICES	10.75
36687	06/30/2017	DMS-FINANCIAL MGMT SERVICES	67.23
36443	05/05/2017	DO-ALL RENTAL INC.	154.00
36470	05/05/2017	DOLPHIN TRANSPORTATION SPECIALISTS	546.08
36536	06/02/2017	DOMINION EXTERMINATORS	130.00
36537	06/02/2017	Doug Morton	249.81
36688	06/30/2017	Doug Morton	164.11
36471	05/05/2017	EARTH BALANCE	6,155.00
36538	06/02/2017	EARTH BALANCE	30,541.28
36626	06/16/2017	EARTH BALANCE	21,615.92
36472	05/05/2017	E-CONOLIGHT LLC	994.98
36455	05/05/2017	ENDRESS+HAUSER, INC.	1,827.54
36539	06/02/2017	Entech	9,035.00
36627	06/16/2017	Entech	6,803.10
36473	05/05/2017	ENVIRONMENTAL EXPRESS INC.	148.05
36474	05/05/2017	ENVIRONMENTAL PR GROUP	1,914.00
36540	06/02/2017	ENVIRONMENTAL PR GROUP	43,883.68
36541	06/02/2017	FEDERAL EXPRESS	84.29
36628	06/16/2017	FEDERAL EXPRESS	24.24
36689	06/30/2017	FEDERAL EXPRESS	38.42
36453	05/05/2017	FEI-FT.MYERS WATERWORKS #127	995.00
36542	06/02/2017	FEI-FT.MYERS WATERWORKS #127	5,433.81
36690	06/30/2017	FEI-FT.MYERS WATERWORKS #127	196.74
36451	05/05/2017	FENDER'S TIRE & BATTERY INC.	509.00
36444	05/05/2017	Fisher Scientific	2,286.77

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

Alphabetically by Vendor

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36543	06/02/2017	Fisher Scientific	999.27
36629	06/16/2017	Fisher Scientific	525.16
36691	06/30/2017	Fisher Scientific	1,403.40
36475	05/05/2017	FL ASSOC. FOR WATER QUALITY CONTROL	1,200.00
36544	06/02/2017	FLORIDA DEPARTMENT OF STATE	38.50
36630	06/16/2017	FLORIDA DEPARTMENT OF STATE	22.96
APR17FR6	05/02/2017	FLORIDA DIVISION OF RETIREMENT	26,388.73
dbi060817	06/06/2017	FLORIDA DIVISION OF RETIREMENT	24,593.10
ADBT63017	06/30/2017	FLORIDA DIVISION OF RETIREMENT	25,350.36
36545	06/02/2017	FLORIDA POWER & LIGHT COMPANY	135,782.18
36692	06/30/2017	FLORIDA POWER & LIGHT COMPANY	148,471.28
36477	05/05/2017	FLOWMASTER PETROLEUM SERVICES, LLC	2,325.00
36476	05/05/2017	FLUID CONTROL SPECIALTIES, INC.	1,894.28
36546	06/02/2017	FLUID CONTROL SPECIALTIES, INC.	2,799.00
36693	06/30/2017	FORD RITZ	207.50
36547	06/02/2017	FORSBERG CONSTRUCTION INC.	180,940.24
36548	06/02/2017	FRONTIER COMMUNICATIONS	214.99
36631	06/16/2017	FRONTIER COMMUNICATIONS	216.98
36495	05/05/2017	GOSSAMER BAY INC	2,955.00
36549	06/02/2017	GOVERNMENT FINANCE OFFICERS ASSOC	160.00
34261	05/05/2017	GRAINGER	2,076.64
36550	06/02/2017	GRAYBAR	927.60
36632	06/16/2017	GRAYBAR	535.24
36695	06/30/2017	GRAYBAR	1,919.03
36694	06/30/2017	G-TEC Equipment Services	1,230.00
36445	05/05/2017	Hach Company	637.68
36551	06/02/2017	Hach Company	1,186.71
36633	06/16/2017	Hach Company	754.12
36696	06/30/2017	Hach Company	1,815.51
36479	05/05/2017	HAWKINS, INC.	699.49
36552	06/02/2017	HAZEN AND SAWYER	24,515.70
36697	06/30/2017	HAZEN AND SAWYER	4,837.00
36553	06/02/2017	HDR ENGINEERING INC.	21,327.55
36634	06/16/2017	Hilltop Securities	1,500.00
36554	06/02/2017	HIME PHOTOGRAPHY	350.00
36555	06/02/2017	HOME DEPOT	2,485.49
36635	06/16/2017	HOME DEPOT	263.46
36636	06/16/2017	Hudson Pump	5,022.64
36556	06/02/2017	HVMI, LLC	4,773.08
36637	06/16/2017	HVMI, LLC	6,579.34
36480	05/05/2017	Icon Technologies	1,450.00
Dbt5517	05/05/2017	Intuit	624.85
36557	06/02/2017	ISA	120.00
36558	06/02/2017	Jacobi Carbons Inc	93,706.80
36638	06/16/2017	Jacobi Carbons Inc	31,359.60
36698	06/30/2017	Jacobi Carbons Inc	61,882.20
36561	06/02/2017	JANICKI ENVIRONMENTAL, INC.	34,155.00
36641	06/16/2017	JANICKI ENVIRONMENTAL, INC.	18,567.50
36559	06/02/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36639	06/16/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36560	06/02/2017	JAN-PRO OF MANASOTA	249.00
36640	06/16/2017	JAN-PRO OF MANASOTA	249.00
36481	05/05/2017	JCB Inc	88,253.63
36699	06/30/2017	JET AUTO SERVICE	1,915.67
36562	06/02/2017	JOHNSON ENGINEERING, INC.	11,721.25
36642	06/16/2017	JOHNSON ENGINEERING, INC.	20,957.80
36563	06/02/2017	KED GROUP INC.	13,464.00
36564	06/02/2017	KEETON'S OFFICE & ART SUPPLY	2,664.14

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

Alphabetically by Vendor

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36643	06/16/2017	KEETON'S OFFICE & ART SUPPLY	743.96
36700	06/30/2017	KEETON'S OFFICE & ART SUPPLY	431.82
36565	06/02/2017	Ken Burton Jr. , Tax Collector	7.50
36482	05/05/2017	KIMLEY-HORN AND ASSOCIATES, INC.	5,165.08
36644	06/16/2017	KIMLEY-HORN AND ASSOCIATES, INC.	254.31
36701	06/30/2017	KING ENGINEERING ASSOCIATES INC	750.00
36566	06/02/2017	KING ENGINEERING ASSOCIATES INC.	1,025.00
36446	05/05/2017	KINGSWAY ACE HARDWARE	35.94
36567	06/02/2017	KINGSWAY ACE HARDWARE	347.02
36645	06/16/2017	KINGSWAY ACE HARDWARE	287.94
36702	06/30/2017	KINGSWAY ACE HARDWARE	383.94
36646	06/16/2017	Knight Supply of Arcadia	1,042.12
36483	05/05/2017	L.I.S. INC.	199.30
36723	06/30/2017	LABORATORY DATA CONSULTANTS FL, INC.	1,311.20
36568	06/02/2017	Liquid Engineering Corp	9,675.00
36647	06/16/2017	M&M CONTRACTORS INC.	2,720.00
36492	05/05/2017	M. THOMAS DOBBS JR.	52.50
36569	06/02/2017	M. THOMAS DOBBS JR.	35.00
36484	05/05/2017	MADER ELECTRIC, INC.	2,995.00
36704	06/30/2017	MAILFINANCE	299.61
36705	06/30/2017	MANATEE COUNTY SHERIFF	25.00
36570	06/02/2017	MANSON BOLVES DONALDSON VARN, P.A.	23,476.33
36648	06/16/2017	MANSON BOLVES DONALDSON VARN, P.A.	25,034.74
36706	06/30/2017	MANSON BOLVES DONALDSON VARN, P.A.	7,777.83
36571	06/02/2017	McCABE & ASSOCIATES	2,400.00
36447	05/05/2017	MCMASTER-CARR SUPPLY CO	1,853.20
36649	06/16/2017	MCMASTER-CARR SUPPLY CO	1,175.52
36468	05/05/2017	MICHAEL CHELL	452.91
36572	06/02/2017	MOCK ENGINEERING, INCORPORATED	890.00
36650	06/16/2017	MOCK ENGINEERING, INCORPORATED	622.00
36438	05/05/2017	MSC INDUSTRIAL SUPPLY CO.	1,028.08
36573	06/02/2017	MSC INDUSTRIAL SUPPLY CO.	795.51
36707	06/30/2017	MSC INDUSTRIAL SUPPLY CO.	1,697.87
36485	05/05/2017	Natural Resources LLC	30,272.39
36574	06/02/2017	Natural Resources LLC	67,727.95
36651	06/16/2017	Natural Resources LLC	70,896.23
36575	06/02/2017	PAGE MECHANICAL GROUP, INC.	206.50
36708	06/30/2017	PAGE MECHANICAL GROUP, INC.	2,313.71
36486	05/05/2017	PATRICK J LEHMAN	453.84
36709	06/30/2017	PATRICK J LEHMAN	412.90
36489	05/05/2017	PMC ENGINEERING LLC	2,113.92
36652	06/16/2017	PREFERRED GOVERNMENT INSURANCE TRUS	13,421.75
36653	06/16/2017	PRESTI & NAEGELE	1,475.00
36437	05/05/2017	PRO-CHEM INC.	641.39
36576	06/02/2017	PRO-CHEM INC.	540.89
36490	05/05/2017	PROGRESSIVE WATER RESOURCES, LLC	13,822.50
36710	06/30/2017	PROGRESSIVE WATER RESOURCES, LLC	4,850.00
	06/08/2017	QuickBooks Payroll Service	78,705.54
	06/22/2017	QuickBooks Payroll Service	75,464.47
36577	06/02/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36654	06/16/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36578	06/02/2017	RAPID SECURITY SOLUTIONS, LLC	9,008.24
36711	06/30/2017	RAPID SECURITY SOLUTIONS, LLC	97.00
36491	05/05/2017	RICHARD ANDERSON	94.00
36712	06/30/2017	RICHARD ANDERSON	193.94
36655	06/16/2017	RING POWER CORPORATION	4,500.00
36579	06/02/2017	Rob Wilson	36.61
36656	06/16/2017	SAM'S CLUB	90.47



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**CHECK REGISTER: MAY & JUNE 2017**  
**Alphabetically by Vendor**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36454	05/05/2017	SARASOTA HERALD TRIBUNE	79.75
36580	06/02/2017	SARASOTA HERALD TRIBUNE	170.50
36657	06/16/2017	SARASOTA TROPHY & AWARDS INC.	15.50
36581	06/02/2017	SHEARER CONSULTING INC.	3,000.00
36452	05/05/2017	SIEMENS INDUSTRY, INC.	1,340.00
36582	06/02/2017	SIMS CRANE & EQUIPMENT	1,476.60
36583	06/02/2017	SMITH RANCH & GARDEN, INC.	599.20
36450	05/05/2017	STANTEC CONSULTING SERVICES	31,601.90
36658	06/16/2017	STANTEC CONSULTING SERVICES	14,500.00
36584	06/02/2017	State of Florida Department of Health	200.00
DBT5517	05/05/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt05242017	05/24/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt06072017	06/07/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
adb62117	06/21/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
36585	06/02/2017	SUNBELT RENTALS	692.09
36586	06/02/2017	SUNCOAST COMMERCIAL DOOR & HARDWARE INC	7,755.00
36587	06/02/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36713	06/30/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36588	06/02/2017	TAMPA ARMATURE WORKS, INC.	1,838.85
36493	05/05/2017	TEST GAUGE AND BACKFLOW SUPPLY INC.	891.79
36589	06/02/2017	THATCHER CHEMICAL OF FLORIDA	21,760.00
36494	05/05/2017	THE LAKE DOCTORS, INC.	3,000.00
36590	06/02/2017	THE LAKE DOCTORS, INC.	2,800.00
36591	06/02/2017	THE SHIPPING POST	78.12
36592	06/02/2017	THE SUN	82.94
36659	06/16/2017	THE SUN	54.34
36593	06/02/2017	TKW CONSULTING ENGINEERS, INC.	7,879.72
36714	06/30/2017	TKW CONSULTING ENGINEERS, INC.	3,500.00
36594	06/02/2017	Tom Evans Environmental Inc	47,800.15
36460	05/05/2017	TOTALFUNDS BY HASLER	200.00
36660	06/16/2017	TOTALFUNDS BY HASLER	84.89
36595	06/02/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	200.61
36715	06/30/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	61.98
36716	06/30/2017	TRANSCAT, INC.	1,104.16
36717	06/30/2017	TRULY NOLEN BRANCH 079	178.00
36496	05/05/2017	U.S. BANK EQUIPMENT FINANCE	830.65
36596	06/02/2017	U.S. BANK EQUIPMENT FINANCE	1,770.92
36661	06/16/2017	U.S. BANK EQUIPMENT FINANCE	288.96
36718	06/30/2017	U.S. BANK EQUIPMENT FINANCE	1,193.00
36497	05/05/2017	U.S. TENT RENTAL INC.	2,790.40
36458	05/05/2017	UNIVAR USA INC	33,919.74
36597	06/02/2017	UNIVAR USA INC	62,265.53
36662	06/16/2017	UNIVAR USA INC	22,793.99
36719	06/30/2017	UNIVAR USA INC	34,245.80
36720	06/30/2017	UNIVERSITY ENTERPRISES, INC.	167.00
36598	06/02/2017	UPS	111.94
36663	06/16/2017	UPS	71.87
36721	06/30/2017	US Plastic Corp	763.24
36599	06/02/2017	USA Bluebook	1,073.15
36664	06/16/2017	USA Bluebook	-
36667	06/16/2017	USA Bluebook	144.77
36722	06/30/2017	USA Bluebook	15.58
dbt06051017	05/10/2017	Valic	6,936.37
dbt052417	05/24/2017	Valic	7,015.29
dbt060717	06/07/2017	Valic	7,033.25
dbt6/21/17	06/21/2017	Valic	6,919.86
36498	05/05/2017	VANASSE HANGEN BRUSTLIN, INC	15,362.50
36800	06/02/2017	VANASSE HANGEN BRUSTLIN, INC	27,803.54
36665	06/16/2017	VERIZON WIRELESS	1.10
36601	06/02/2017	VIDEOGUY PRODUCTIONS	2,200.00
36602	06/02/2017	VOYAGER FLEET SYSTEMS, INC.	4,915.30
36603	06/02/2017	WEST COAST MOWING	8,453.50
36604	06/02/2017	Winzer Corporation	1,453.89

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**Alphabetically by Vendor**

<b>Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)</b>			
<b>Document Number</b>	<b>Date</b>	<b>Payee Name / Description</b>	<b>Amount</b>
36605	06/02/2017	WOMACK SANITATION INC.	1,202.00
36666	06/16/2017	WOMACK SANITATION INC.	795.00
36606	06/02/2017	XBYTE TECHNOLOGIES	1,150.00
<b>Total</b>			<b>3,190,713.46</b>

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**By Amount Largest to Smallest**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36547	06/02/2017	FORSBERG CONSTRUCTION INC.	180,940.24
36522	06/02/2017	CHARLOTTE COUNTY UTILITIES	164,694.84
36618	06/16/2017	CHARLOTTE COUNTY UTILITIES	164,694.84
36692	06/30/2017	FLORIDA POWER & LIGHT COMPANY	148,471.28
36545	06/02/2017	FLORIDA POWER & LIGHT COMPANY	135,782.18
36519	06/02/2017	C & S CHEMICALS INC.	98,345.21
36558	06/02/2017	Jacobi Carbons Inc	93,706.80
36481	05/05/2017	JCB Inc	88,253.63
	06/08/2017	QuickBooks Payroll Service	78,705.54
36467	05/05/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
36617	06/16/2017	CHARLOTTE COUNTY BD OF COMMISSIONER	78,498.62
	06/22/2017	QuickBooks Payroll Service	75,464.47
36651	06/16/2017	Natural Resources LLC	70,896.23
36574	06/02/2017	Natural Resources LLC	67,727.95
36530	06/02/2017	DESOTO COUNTY (V)	66,333.33
36622	06/16/2017	DESOTO COUNTY (V)	66,333.33
36597	06/02/2017	UNIVAR USA INC	62,265.53
36698	06/30/2017	Jacobi Carbons Inc	61,882.20
36594	06/02/2017	Tom Evans Environmental Inc	47,800.15
36487	05/05/2017	C & S CHEMICALS INC.	44,183.79
36540	06/02/2017	ENVIRONMENTAL PR GROUP	43,883.68
36615	06/16/2017	C & S CHEMICALS INC.	40,514.07
36678	06/30/2017	C & S CHEMICALS INC.	40,479.23
36719	06/30/2017	UNIVAR USA INC	34,245.80
36561	06/02/2017	JANICKI ENVIRONMENTAL, INC.	34,155.00
36458	05/05/2017	UNIVAR USA INC	33,919.74
36450	05/05/2017	STANTEC CONSULTING SERVICES	31,601.90
36638	06/16/2017	Jacobi Carbons Inc	31,359.60
36538	06/02/2017	EARTH BALANCE	30,541.28
36485	05/05/2017	Natural Resources LLC	30,272.39
36514	06/02/2017	BENCHMARK ENVIROANALYTICAL INC	30,054.85
36600	06/02/2017	VANASSE HANGEN BRUSTLIN, INC	27,803.54
APR17FRS	05/02/2017	FLORIDA DIVISION OF RETIREMENT	26,388.73
ADB763017	06/30/2017	FLORIDA DIVISION OF RETIREMENT	25,350.36
36648	06/16/2017	MANSON BOLVES DONALDSON VARN, P.A.	25,034.74
dbt060617	06/06/2017	FLORIDA DIVISION OF RETIREMENT	24,593.10
36552	06/02/2017	HAZEN AND SAWYER	24,515.70
36570	06/02/2017	MANSON BOLVES DONALDSON VARN, P.A.	23,476.33
36662	06/16/2017	UNIVAR USA INC	22,793.99
36589	06/02/2017	THATCHER CHEMICAL OF FLORIDA	21,760.00
36626	06/16/2017	EARTH BALANCE	21,615.92
36553	06/02/2017	HDR ENGINEERING INC.	21,327.55
36642	06/16/2017	JOHNSON ENGINEERING, INC.	20,957.80
36464	05/05/2017	ATKINS NORTH AMERICA, INC.	19,896.18
36672	06/30/2017	ALLIED UNIVERSAL CORP.	19,456.98
36641	06/16/2017	JANICKI ENVIRONMENTAL, INC.	18,567.50
36506	06/02/2017	ALLIED UNIVERSAL CORP.	17,672.15
36498	05/05/2017	VANASSE HANGEN BRUSTLIN, INC	15,362.50
36658	06/16/2017	STANTEC CONSULTING SERVICES	14,500.00
36608	06/16/2017	ALLIED UNIVERSAL CORP.	14,474.48
36490	05/05/2017	PROGRESSIVE WATER RESOURCES, LLC	13,622.50
36563	06/02/2017	KED GROUP INC.	13,464.00
36652	06/16/2017	PREFERRED GOVERNMENT INSURANCE TRUS	13,421.75
36577	06/02/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36654	06/16/2017	RANCH PROPERTY HOLDINGS LLC	12,448.29
36441	05/05/2017	ALLIED UNIVERSAL CORP.	11,997.19
36562	06/02/2017	JOHNSON ENGINEERING, INC.	11,721.25
36501	06/02/2017	AECOM TECHNICAL SERVICES, INC.	11,300.00
36684	06/30/2017	D. M. CONSTRUCTION CORP.	10,615.43

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**By Amount Largest to Smallest**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36527	06/02/2017	D. M. CONSTRUCTION CORP.	10,057.35
36568	06/02/2017	Liquid Engineering Corp	9,675.00
36612	06/16/2017	BENCHMARK ENVIROANALYTICAL INC	9,134.90
36539	06/02/2017	Entech	9,035.00
36578	06/02/2017	RAPID SECURITY SOLUTIONS, LLC	9,008.24
36603	06/02/2017	WEST COAST MOWING	8,453.50
36486	05/05/2017	BENCHMARK ENVIROANALYTICAL INC	7,997.00
36459	05/05/2017	Cummins Power South	7,923.34
36593	06/02/2017	TKW CONSULTING ENGINEERS, INC.	7,879.72
36706	06/30/2017	MANSON BOLVES DONALDSON VARN, P.A.	7,777.83
36586	06/02/2017	SUNCOAST COMMERCIAL DOOR & HARDWARE INC	7,755.00
dbt060717	06/07/2017	Valic	7,033.25
dbt052417	05/24/2017	Valic	7,015.29
dbt06051017	05/10/2017	Valic	6,936.37
dbt6/21/17	06/21/2017	Valic	6,919.86
36627	06/16/2017	Entech	6,803.10
36508	06/02/2017	ANIXTER INC.	6,726.78
36637	06/16/2017	HVMI, LLC	6,579.34
36471	05/05/2017	EARTH BALANCE	6,155.00
36623	06/16/2017	DEX IMAGING	5,676.49
36542	06/02/2017	FEI-FT.MYERS WATERWORKS #127	5,433.81
36482	05/05/2017	KIMLEY-HORN AND ASSOCIATES, INC.	5,165.08
36636	06/16/2017	Hudson Pump	5,022.64
36602	06/02/2017	VOYAGER FLEET SYSTEMS, INC.	4,915.30
36710	06/30/2017	PROGRESSIVE WATER RESOURCES, LLC	4,850.00
36697	06/30/2017	HAZEN AND SAWYER	4,837.00
36556	06/02/2017	HVMI, LLC	4,773.08
36655	06/16/2017	RING POWER CORPORATION	4,500.00
36680	06/30/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,274.67
36507	06/02/2017	AMAZON	4,211.62
36521	06/02/2017	CHARLOTTE COUNTY BCC - LANDFILL	4,049.94
36673	06/30/2017	AMAZON	3,911.66
36526	06/02/2017	Cummins Power South	3,822.70
36533	06/02/2017	DIANE R. SALZ	3,750.00
36624	06/16/2017	DIANE R. SALZ	3,750.00
36509	06/02/2017	ARGILA ENTERPRISES, INC.	3,600.00
36714	06/30/2017	TKW CONSULTING ENGINEERS, INC.	3,500.00
36523	06/02/2017	Cimtec Automation, LLC	3,282.65
36581	06/02/2017	SHEARER CONSULTING INC.	3,000.00
36494	05/05/2017	THE LAKE DOCTORS, INC.	3,000.00
36484	05/05/2017	MADER ELECTRIC, INC.	2,995.00
36528	06/02/2017	DELL MARKETING L.P.	2,980.03
36495	05/05/2017	GOSSAMER BAY INC	2,955.00
36478	05/05/2017	AIRGAS SPECIALTY PRODUCTS	2,931.87
36518	06/02/2017	BUSINESS CARD	2,917.42
36502	06/02/2017	AIRGAS SPECIALTY PRODUCTS	2,912.38
36669	06/30/2017	AIRGAS SPECIALTY PRODUCTS	2,837.94
36511	06/02/2017	ATKINS NORTH AMERICA, INC.	2,801.12
36590	06/02/2017	THE LAKE DOCTORS, INC.	2,800.00
36546	06/02/2017	FLUID CONTROL SPECIALTIES, INC.	2,799.00
36497	05/05/2017	U.S. TENT RENTAL INC.	2,790.40
36647	06/16/2017	M&M CONTRACTORS INC.	2,720.00
36564	06/02/2017	KEETON'S OFFICE & ART SUPPLY	2,664.14
36555	06/02/2017	HOME DEPOT	2,485.49
36469	05/05/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36620	06/16/2017	CORONADO LAWN SERVICE OF FL	2,440.00
36676	06/30/2017	BENCHMARK ENVIROANALYTICAL INC	2,431.75

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**By Amount Largest to Smallest**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36571	06/02/2017	McCABE & ASSOCIATES	2,400.00
36510	06/02/2017	ASWATHY WARRIER	2,375.00
36477	05/05/2017	FLOWMASTER PETROLEUM SERVICES, LLC	2,325.00
36708	06/30/2017	PAGE MECHANICAL GROUP, INC.	2,313.71
36444	05/05/2017	Fisher Scientific	2,286.77
36457	05/05/2017	BUSINESS CARD	2,266.02
36609	06/16/2017	ARGILA ENTERPRISES, INC.	2,250.00
36601	06/02/2017	VIDEOGUY PRODUCTIONS	2,200.00
36489	05/05/2017	PMC ENGINEERING LLC	2,113.92
34261	05/05/2017	GRAINGER	2,076.64
36531	06/02/2017	DESOTO COUNTY WATER UTILITY	2,047.05
36671	06/30/2017	ALLIED ELECTRONICS, INC.	1,997.05
36682	06/30/2017	Cimtec Automation, LLC	1,957.01
36595	06/30/2017	GRAYBAR	1,919.03
36699	06/30/2017	JET AUTO SERVICE	1,915.87
36474	05/05/2017	ENVIRONMENTAL PR GROUP	1,914.00
36476	05/05/2017	FLUID CONTROL SPECIALTIES, INC.	1,894.28
36520	06/02/2017	CENTURYLINK	1,875.23
36463	05/05/2017	AECOM TECHNICAL SERVICES, INC.	1,867.50
36447	05/05/2017	MCMASTER-CARR SUPPLY CO	1,853.20
36588	06/02/2017	TAMPA ARMATURE WORKS, INC.	1,838.85
36455	05/05/2017	ENDRESS+HAUSER, INC.	1,827.54
36696	06/30/2017	Hach Company	1,815.51
36596	06/02/2017	U.S. BANK EQUIPMENT FINANCE	1,770.92
36707	06/30/2017	MSC INDUSTRIAL SUPPLY CO.	1,697.87
36619	06/16/2017	Cimtec Automation, LLC	1,640.16
36679	06/30/2017	CENTURYLINK	1,504.60
36634	06/16/2017	Hilltop Securities	1,500.00
36462	05/05/2017	CENTURYLINK	1,496.70
36677	06/30/2017	BUSINESS CARD	1,494.92
36582	06/02/2017	SIMS CRANE & EQUIPMENT	1,476.60
36653	06/16/2017	PRESTI & NAEGELE	1,475.00
36604	06/02/2017	Winzer Corporation	1,453.69
36480	05/05/2017	Icon Technologies	1,450.00
36691	06/30/2017	Fisher Scientific	1,403.40
36610	06/16/2017	ASWATHY WARRIER	1,400.00
36675	06/30/2017	ASWATHY WARRIER	1,400.00
36621	06/16/2017	Cummins Power South	1,361.51
36499	05/05/2017	ASWATHY WARRIER	1,350.00
36452	05/05/2017	SIEMENS INDUSTRY, INC.	1,340.00
36723	06/30/2017	LABORATORY DATA CONSULTANTS FL, INC.	1,311.20
36611	06/16/2017	ATKINS NORTH AMERICA, INC.	1,257.40
36694	06/30/2017	G-TEC Equipment Services	1,230.00
36605	06/02/2017	WOMACK SANITATION INC.	1,202.00
36475	05/05/2017	FL ASSOC. FOR WATER QUALITY CONTROL	1,200.00
36718	06/30/2017	U.S. BANK EQUIPMENT FINANCE	1,193.00
36551	06/02/2017	Hach Company	1,186.71
36649	06/16/2017	MCMASTER-CARR SUPPLY CO	1,175.52
36516	06/02/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	1,166.50
36606	06/02/2017	XBYTE TECHNOLOGIES	1,150.00
36716	06/30/2017	TRANSCAT, INC.	1,104.16
36599	06/02/2017	USA Bluebook	1,073.15
36646	06/16/2017	Knight Supply of Arcadia	1,042.12
36456	05/05/2017	BUSINESS CARD	1,036.83
36438	05/05/2017	MSC INDUSTRIAL SUPPLY CO.	1,028.08
36566	06/02/2017	KING ENGINEERING ASSOCIATES INC.	1,025.00
36448	05/05/2017	BUSINESS CARD	1,008.57
36543	06/02/2017	Fisher Scientific	999.27

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**CHECK REGISTER: MAY & JUNE 2017**  
**By Amount Largest to Smallest**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36453	05/05/2017	FE-FT.MYERS WATERWORKS #127	995.00
36472	05/05/2017	E-CONOLIGHT LLC	994.98
DBT5517	05/05/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt05242017	05/24/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
dbt06072017	06/07/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
adb062117	06/21/2017	STATE OF FLORIDA DISBURSEMENT UNIT	993.06
36529	06/02/2017	DESOTO AUTOMOTIVE ENTERPRISES INC	981.85
36550	06/02/2017	GRAYBAR	927.60
36517	06/02/2017	Buffalo Graffix	904.87
36493	05/05/2017	TEST GAUGE AND BACKFLOW SUPPLY INC.	891.79
36572	06/02/2017	MOCK ENGINEERING, INCORPORATED	890.00
36686	06/30/2017	DILLER-BROWN & ASSOC. INC.	858.00
36496	05/05/2017	U.S. BANK EQUIPMENT FINANCE	830.65
36449	05/05/2017	BUSINESS CARD	795.90
36573	06/02/2017	MSC INDUSTRIAL SUPPLY CO.	795.51
36666	06/16/2017	WOMACK SANITATION INC.	795.00
36505	06/02/2017	ALLIED ELECTRONICS, INC.	791.16
36721	06/30/2017	US Plastic Corp	763.24
36633	06/16/2017	Hach Company	754.12
36701	06/30/2017	KING ENGINEERING ASSOCIATES INC	750.00
36643	06/16/2017	KEETON'S OFFICE & ART SUPPLY	743.96
36479	05/05/2017	HAWKINS, INC.	699.49
36585	06/02/2017	SUNBELT RENTALS	692.09
36437	05/05/2017	PRO-CHEM INC.	641.39
36445	05/05/2017	Hach Company	637.68
Dbt5517	05/05/2017	Intuit	624.85
36534	06/02/2017	DILLER-BROWN & ASSOC. INC.	622.14
36650	06/16/2017	MOCK ENGINEERING, INCORPORATED	622.00
36583	06/02/2017	SMITH RANCH & GARDEN, INC.	599.20
36470	05/05/2017	DOLPHIN TRANSPORTATION SPECIALISTS	546.08
36576	06/02/2017	PRO-CHEM INC.	540.89
36632	06/16/2017	GRAYBAR	535.24
36628	06/16/2017	Fisher Scientific	525.16
36451	05/05/2017	FENDER'S TIRE & BATTERY INC.	509.00
36559	06/02/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36639	06/16/2017	JAN-PRO CLEANING SYSTEMS OF SW FLORIDA	495.00
36488	05/05/2017	PATRICK J LEHMAN	453.84
36468	05/05/2017	MICHAEL CHELL	452.91
36512	06/02/2017	AWWA	448.00
36440	05/05/2017	AA ELECTRIC SE INC.	446.25
36700	06/30/2017	KEETON'S OFFICE & ART SUPPLY	431.82
36709	06/30/2017	PATRICK J LEHMAN	412.90
36702	06/30/2017	KINGSWAY ACE HARDWARE	383.94
36616	06/16/2017	CENTURYLINK	370.63
36554	06/02/2017	HIME PHOTOGRAPHY	350.00
36567	06/02/2017	KINGSWAY ACE HARDWARE	347.02
36583	06/30/2017	CINTAS	331.90
36704	06/30/2017	MAILFINANCE	299.61
36532	06/02/2017	DEX IMAGING	291.23
36661	06/16/2017	U.S. BANK EQUIPMENT FINANCE	288.96
36645	06/16/2017	KINGSWAY ACE HARDWARE	287.94
36465	05/05/2017	BATTERIES PLUS BULBS #451	272.90
36535	06/02/2017	DMS-FINANCIAL MGMT SERVICES	271.91
36613	06/16/2017	BLUSITE SOLUTIONS OF SOUTHWEST FLORIDA	269.25
36635	06/16/2017	HOME DEPOT	263.46
36644	06/16/2017	KIMLEY-HORN AND ASSOCIATES, INC.	254.31
36537	06/02/2017	Doug Morton	249.81
36560	06/02/2017	JAN-PRO OF MANASOTA	249.00

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**By Amount Largest to Smallest**

Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)			
Document Number	Date	Payee Name / Description	Amount
36640	06/16/2017	JAN-PRO OF MANASOTA	249.00
36631	06/16/2017	FRONTIER COMMUNICATIONS	216.98
36548	06/02/2017	FRONTIER COMMUNICATIONS	214.99
36504	06/02/2017	ALL FLORIDA WATER-TAMPA	211.58
36607	06/16/2017	ALL FLORIDA WATER-TAMPA	211.58
36693	06/30/2017	FORD RITZ	207.50
36675	06/02/2017	PAGE MECHANICAL GROUP, INC.	206.50
36595	06/02/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	200.61
36584	06/02/2017	State of Florida Department of Health	200.00
36460	05/05/2017	TOTALFUNDS BY HASLER	200.00
36483	05/05/2017	L.I.S. INC.	199.30
36690	06/30/2017	FEI-FT.MYERS WATERWORKS #127	196.74
36442	05/05/2017	AIRGAS USA, LLC	195.04
36712	06/30/2017	RICHARD ANDERSON	193.94
36524	06/02/2017	CINTAS	189.54
36513	06/02/2017	Bates Flags & Flagpoles	180.75
36717	06/30/2017	TRULY NOLEN BRANCH 079	178.00
36580	06/02/2017	SARASOTA HERALD TRIBUNE	170.50
36720	06/30/2017	UNIVERSITY ENTERPRISES, INC.	167.00
36688	06/30/2017	Doug Morton	164.11
36549	06/02/2017	GOVERNMENT FINANCE OFFICERS ASSOC	160.00
36443	05/05/2017	DO-ALL RENTAL INC.	154.00
36473	05/05/2017	ENVIRONMENTAL EXPRESS INC.	148.05
36667	06/16/2017	USA Bluebook	144.77
36674	06/30/2017	ANN LEE	132.00
36536	06/02/2017	DOMINION EXTERMINATORS	130.00
36557	06/02/2017	ISA	120.00
36668	06/30/2017	Agilent Technologies Inc	114.00
36598	06/02/2017	UPS	111.94
36525	06/02/2017	COLE-PARMER INSTRUMENT CO.	108.89
36711	06/30/2017	RAPID SECURITY SOLUTIONS, LLC	97.00
36491	05/05/2017	RICHARD ANDERSON	94.00
36656	06/16/2017	SAM'S CLUB	90.47
36660	06/16/2017	TOTALFUNDS BY HASLER	84.89
36541	06/02/2017	FEDERAL EXPRESS	84.29
36592	06/02/2017	THE SUN	82.94
36454	05/05/2017	SARASOTA HERALD TRIBUNE	79.75
36591	06/02/2017	THE SHIPPING POST	78.12
36614	06/16/2017	BUREAU OF ELEVATOR SAFETY	75.00
36663	06/16/2017	UPS	71.87
36439	05/05/2017	DMS-FINANCIAL MGMT SERVICES	67.23
36687	06/30/2017	DMS-FINANCIAL MGMT SERVICES	67.23
36715	06/30/2017	TRACTOR SUPPLY COMPANY CREDIT PLAN	61.98
36659	06/16/2017	THE SUN	54.34
36492	05/05/2017	M. THOMAS DOBBS JR.	52.50
36544	06/02/2017	FLORIDA DEPARTMENT OF STATE	38.50
36689	06/30/2017	FEDERAL EXPRESS	38.42
36579	06/02/2017	Rob Wilson	36.61
36587	06/02/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36713	06/30/2017	SUNSHINE STATE ONE CALL OF FL, INC.	36.32
36446	05/05/2017	KINGSWAY ACE HARDWARE	35.94
36681	06/30/2017	CHENANGO SUPPLY CO., INC.	35.59
36670	06/30/2017	AIRGAS USA, LLC	35.08
36569	06/02/2017	M. THOMAS DOBBS JR.	35.00
36503	06/02/2017	AIRGAS USA, LLC	34.30
36515	06/02/2017	BILL'S BOTTLED WATER SERVICE	32.58
36705	06/30/2017	MANATEE COUNTY SHERIFF	25.00
36628	06/16/2017	FEDERAL EXPRESS	24.24
36630	06/16/2017	FLORIDA DEPARTMENT OF STATE	22.96
36722	06/30/2017	USA Bluebook	15.58
36657	06/16/2017	SARASOTA TROPHY & AWARDS INC.	15.50
36625	06/16/2017	DMS-FINANCIAL MGMT SERVICES	10.75
36685	06/30/2017	DEX IMAGING	8.00

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**By Amount Largest to Smallest**

<b>Bank Code: PUBLIC FUNDS INTEREST CHECKING (PNC)</b>			
<b>Document Number</b>	<b>Date</b>	<b>Payee Name / Description</b>	<b>Amount</b>
36565	06/02/2017	Ken Burton Jr. , Tax Collector	7.50
36665	06/16/2017	VERIZON WIRELESS	1.10
36664	06/16/2017	USA Bluebook	-
<b>Total</b>			<b>3,190,713.46</b>



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**CHECK REGISTER: MAY & JUNE 2017**

**Bank Code:** CONSTRUCTION CHECKING (PNC)

Document Number	Date	Payee Name / Description	Amount
2726	05/05/2017	KING ENGINEERING ASSOCIATES INC	164,626.15
2727	06/02/2017	AECOM TECHNICAL SERVICES, INC.	7,396.25
2728	06/02/2017	CH2M HILL ENGINEERS INC.	49,806.40
2729	06/02/2017	KING ENGINEERING ASSOCIATES INC	174,964.03
2730	06/30/2017	AECOM TECHNICAL SERVICES, INC.	22,602.50
2731	06/30/2017	KING ENGINEERING ASSOCIATES INC	187,909.40
<b>Total</b>			<b>627,306.73</b>

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**

**CHECK REGISTER: MAY & JUNE 2017**

**Alphabetically by Vendor**

**Bank Code: CONSTRUCTION CHECKING (PNC)**

Document Number	Date	Payee Name / Description	Amount
2727	06/02/2017	AECOM TECHNICAL SERVICES, INC.	7,396.25
2730	06/30/2017	AECOM TECHNICAL SERVICES, INC.	22,602.50
2728	06/02/2017	CH2M HILL ENGINEERS INC.	49,806.40
2726	05/05/2017	KING ENGINEERING ASSOCIATES INC	184,628.15
2729	06/02/2017	KING ENGINEERING ASSOCIATES INC	174,964.03
2731	06/30/2017	KING ENGINEERING ASSOCIATES INC	187,909.40
<b>Total</b>			<b>627,306.73</b>

**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**CHECK REGISTER: MAY & JUNE 2017**  
**By Amount Largest to Smallest**

**Bank Code:** CONSTRUCTION CHECKING (PNC)

Document Number	Date	Payee Name / Description	Amount
2731	06/30/2017	KING ENGINEERING ASSOCIATES INC	167,909.40
2726	05/05/2017	KING ENGINEERING ASSOCIATES INC	184,628.15
2729	06/02/2017	KING ENGINEERING ASSOCIATES INC	174,964.03
2728	06/02/2017	CH2M HILL ENGINEERS INC.	49,806.40
2730	06/30/2017	AECOM TECHNICAL SERVICES, INC.	22,602.50
2727	06/02/2017	AECOM TECHNICAL SERVICES, INC.	7,396.25
<b>Total</b>			<b>627,306.73</b>

***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**ROUTINE STATUS REPORTS  
ITEM 3**

**Regional Integrated Loop System  
Phase 1 Interconnect [U.S. 17 to Punta Gorda]**

## Project Status Report

**Project:** Regional Integrated Loop System Phase 1 Interconnect Pipeline Project  
[U.S. 17 to Punta Gorda]

**Date:** August 2, 2017

**Prepared by:** Ford Ritz, P.E., Project Engineer

---

The following information summarizes the project description and current status. (see attached conceptual pipe route map).

### Project Description

The Phase 1 Interconnect will provide a plant-to-plant connection between the Peace River Facility in DeSoto County with the Punta Gorda Shell Creek Water Treatment Plant in Charlotte County. The project will support the City in meeting drinking water quality requirements through blending with regional supply, provide back-up water supply to the DeSoto County system, and improve regional and local water supply system reliability. The Phase 1 Pipeline is bi-directional and is envisioned to delivery 4-million gallons per day (mgd) of regional finished water to the City's Shell Creek Facility and to receive 2-mgd from the Shell Creek Facility. The estimated project cost is \$12-million. The design and construction schedule is estimated to be 30 to 36 months from start to finish.

The project scope includes:

- Approximately 6.3 miles of a minimum of 24-inch diameter pipeline
- A subaqueous crossing of Shell Creek by Horizontal Directional Drilling (HDD)
- Metering/SCADA and telemetry at connection facilities
- Need for pumping and storage facilities (evaluated during design)
- Conceptual route(s) (evaluated during design).

In 2006 the Authority completed a Regional Integrated Loop System Feasibility/Routing Study for proposed Regional Transmission Mains including the Phase 1 Interconnect. As currently envisioned, the Phase 1 Interconnect begins at the terminus of the regional system's DeSoto Regional Transmission Main on U.S. 17 at the DeSoto/Charlotte County line, continues south along U.S. 17, east and south along Washington Loop Road, south along Three Rivers Road adjacent to an abandoned railroad corridor, and across Shell Creek to the City's Shell Creek WTP. Refer to the attached conceptual route map.

## Current status

The Phase 1 Interconnect was Board approved for Design by King Engineering Associates, Inc. (King) on February 25, 2016. The Notice-to-Proceed for Work Order 1- Preliminary Design Services/Basis of Design Report was issued to King on March 5, 2016, subsequent to execution of the SWFWMD Cooperative Funding Agreement. The Project Kick-Off Meeting was held on March 15, 2016.

At the December 7, 2016 Board Meeting, King presented the Phase 1 Interconnect, final draft Basis of Design Report (BODR). The BODR was finalized in January 2017 and distributed. Three routes were assessed by King during preliminary engineering. King the recommended Route 2, which follows the original Phase 1 Interconnect Route from the 2006 60%-complete Phase 1 Design Build Project, with the following exceptions:

- New Pipeline is not in or on the Hendrickson Dam embankments
- As currently proposed, the Pipeline crosses Shell Creek by Horizontal Directional Drilling (HDD) downstream of the Hendrickson Dam, upland to upland.

The Engineer's Opinion of Probable (total) Cost for the Phase 1 Interconnect is \$11,960,000 and is scheduled to be operational by February 2020.

In January 2017 King submitted Work Order 2 'Design, Permitting and Bidding Services' for the Phase 1 Interconnect. King's Work Order 2 was approved at the February 1, 2017 Board Meeting. King was issued Notice-to-Proceed for Work Order 2 on February 10<sup>th</sup>. Work Order No. 2 includes survey, geotechnical services, design, permitting, property acquisition services, and bid phase services. These project activities cover a 23-month schedule with design and permitting efforts completed in the fall of 2018 allowing selection of a contractor for construction in January 2019.

The Phase 1 Project design is approximately 60% complete. This period King is currently reviewing, the draft U.S. Army Corps of Engineering (ACOE) permit, and the Florida Department of Environmental Protection (FDEP) Environmental Resources Permit (ERP). The Shell Creek Tidal Study was completed and accepted by the FDEP. The Bathometric Survey for the Shell Creek Crossing via Horizontal Directional Drilling (HDD) was also completed. Easement documents, and survey and legal descriptions, for property procurement at Shell Creek are being developed. The Project is currently on budget and schedule.

## **Project History Briefing**

**Project:** Regional Integrated Loop System Phase 1 Interconnect Pipeline Project  
[U.S. 17 to Punta Gorda]

**Date:** August 2, 2017

**Prepared by:** Ford Ritz, P.E., Project Engineer

---

The following information summarizes the historical milestones and events of the Regional Integrated Loop System Phase 1 Interconnect.

- July 24, 2015 The Authority Advertised for Consultant Statement of Qualifications (SOQs) for engineering design and construction management services for the Phase 1 Regional Interconnect Pipeline Project.
- August 25, 2015 Deadline for consultant SOQ package. Five SOQ packages were timely received by the following:
  - Atkins North America, Inc.
  - Johnson Engineering, Inc.
  - Kimley Horn and Associates, Inc.
  - King Engineering Associates, Inc.
  - TKW Consulting Engineers, Inc.
- August 28, 2015 Electronic Copies of the SOQ Packages were distributed to member and customer utility directors and the SWFWMD for feedback or comments. Feedback was requested by September 14, 2015.
- Sept. 22, 2015 A short list of three Consultants were listed in alphabetical order and posted on the Authority Web Site.
  - Atkins North America, Inc.
  - King Engineering Associates, Inc.
  - TKW Consulting Engineers, Inc.
- October 7, 2015 Short listed consultants gave their presentations and were interviewed by the Authority Board. King Engineering Associates, Inc. was selected by the Board for the Phase 1 Project.
- December 2, 2015 The Authority Board approved the Interlocal Agreement for the Phase 1 Regional Interconnect Between the PRMRWSA and the City of Punta Gorda.

- December 2, 2015 The Consent Request for approval of the Authority/Punta Gorda Phase 1 Interconnect Project was submitted to the Charlotte County Board of County Commissioners.
- February 23, 2016 Charlotte County Board of County Commissioners granted Consent for the Phase 1 Interconnect Project.
- February 25, 2016 The Authority Board (Special Board Meeting) Approved the following:
  - The Interlocal Agreement between PRMRWSA and DeSoto County for the Phase 1 Regional Interconnect.
  - The Cooperative Funding Agreement between the SWFWMD and PRMRWSA for the Phase 1 Regional Interconnect for a total of \$12 million. Subdivided into Punta Gorda payment of \$2 million, State Appropriations of \$4 million and SWFWMD Cooperative Funding of \$6 million.
  - The Contract for Professional Engineering Services for Design and Construction Management/Inspection for the Phase 1 Regional Interconnect with King Engineering Associates, Inc. King).
  - Work Order No. 1 for Preliminary Design Services of Phase 1 with King in the amount of \$278,760. The effort for completion of Work Order 1 is 180- calendar days from the Notice-to-Proceed date.
- March 5, 2016 Pending execution of the Cooperative Funding Agreement between the SWFWMD and PRMRWSA for the Phase 1 Regional Interconnect the Notice-to-Proceed was issued to King for Work Order 1, Preliminary Design Services.
- March 15, 2016 The Phase 1 Interconnect kickoff meeting was held at the Peace River Facility. The meeting was attended by Authority staff, SWFWMD, King and the City of Punta Gorda.
- April/May 2016 On April 18, 2016, a Coordination Meeting was held with Florida Power and Light, regarding Easements/ROW on potential project Routes. The meeting was attended by King, Authority, and FPL.

On April 28, 2016, a Project Progress Meeting held. The meeting was attended by the Desoto County, SWFWMD, King and Authority staff. Items discussed included:

1. Status of Preliminary Engineering Effort
2. Project Metering and SCADA requirements



3. Operations of Project Prairie by Desoto County
4. Status of Route Evaluations
5. Schedule for BODR

On May 10, 2016, a Project Progress meeting was held with the Desoto County at the South Booster Station/Project Prairie site. The meeting was attended by Desoto County, King, and Authority staff. The group toured the site including the pump building, yard piping routes, and meter assemblies. Desoto County described how water flow is control at the Booster Station. Phase 1 yard piping, meters and telemetry alternatives as well as potential site locations for new meter assemblies were discussed.

Also on May 10, 2016 a Project Progress meeting was held with Punta Gorda at the Shell Creek Water Treatment Plant. The meeting was attended by Punta Gorda, King and Authority staff. Phase 1 connection points at the Plant, metering, and telemetry were discussed. Coordination between the Phase 1 and the City's RO Plant construction schedules were also discussed. The group toured the Shell Creek reservoir and dam. King explained alternate construction methods for crossing Shell Creek that are being evaluated. The City plans to implement and operate Phase 1 flow control set points similar to the current Phase 1A flow control scheme.

- June/July 2016

On June 23, 2016, a Project Progress Meeting was held. The meeting was attended by the City of Punta Gorda, Desoto County, SWFWMD, King and Authority staff. Items discussed included:

1. Status of Preliminary Engineering Effort
2. Pipeline Hydraulics, including City, and County demands and delivery points. An interim connection at Shell Creek was discussed since the Phase 1 Interconnect is scheduled to be completed prior to the Shell Creek RO Facility.
3. Status of Route Evaluations; discussions focused on Phase 1 Interconnect Routes evaluated in the 2006 Routing Study (4-Routes) and a new Route 5, per King.
4. Discussions/concerns regarding the Hendrickson Dam embankments, including embankment geotechnical issues that occurred during the 2009 Dam Improvements Project.
5. Pros and cons for pipe crossing methods/locations @ Shell Creek.
6. Land Requirements for the new Route 5 (west of the Hendrickson Dam) adjacent to the FPL ROW.
7. Next period King will complete the Route Evaluation which is includes re-evaluation of 4-routes from the 2006 Regional Integrated Loop System Feasibility/Routing Study and Route-5

per King.

8. A Public Meeting for the Phase 1 Interconnect will be schedule in early August.
9. Development of the Basis of Design Report by King is on schedule and on budget.

- August/Sept. 2016 On August 11, 2016, a Project Information Meeting was held at the Laishley Park Municipal Marina in Punta Gorda from 6:00pm to 8:00pm. In addition to private citizens, the meeting was attended by the City of Punta Gorda, Charlotte County, SWFWMD, King and Authority staff. Three potential routes, Route 1, Route 2 and Route 5, were shown on poster boards and discussed with attendees. Private citizens were provided with comment cards and asked to provide a preference ranking of the routes.

Poster boards regarding, how the Phase 1 pipeline fits into the Authority's Regional Vision for transmission mains to interconnect water treatment plants, project goals, funding sources, construction methods for crossing Shell Creek and Schedule were also shown and discussed with attendees.

The Project Information Meeting was advertised in local papers and over 250 letters of invitation were sent out to residents and businesses along prospective routes, and to Local and State government officials.

On August 17, 2016 an Operations Coordination Meeting was held with the City of Punta Gorda to discuss operations, meter configurations and instrumentation, residuals and connection points for the Phase 1 Interconnect at the Shell Creek Water Treatment Plant. Much of the meeting focused on interim operation of the Phase 1 Interconnect prior to the City's Reverse Osmosis Treatment Plant coming on line. The meeting was attended by King, City and Authority staff.

On September 15, 2016 an Operations Coordination Meeting was held with Desoto County to review the status of the Phase 1 Project with the County and to discuss future operations, meter configurations, instrumentation and connection points for the Phase 1 Interconnect at the County's Project Prairie facility.

The Authority is currently reviewing draft sections of the Basis of Design report. King Engineering Associates continues to evaluate pipeline routes, and develop preliminary design requirements and Opinion of Probable Construction Costs for each prospective pipeline route.

- Oct./Nov. 2016 On September 26<sup>th</sup> King submitted the preliminary draft of the Basis of

Design Report (BODR) to the Authority. The Authority reviewed and forwarded comments to King on October 6<sup>th</sup>. The preliminary draft BODR did not include results for soil borings in Shell Creek at the proposed Route 2 and Route 5 creek crossings as discussed below. Per the preliminary draft BODR, Route 2 is now proposed to cross downstream of the Hendrickson Dam (previously it was going to cross upstream of the Dam). The Route 2 Shell Creek crossing by horizontal directional drill was moved downstream because it is shorter/less expensive.

King's Geotechnical sub-consultant performed soil borings at Routes 2 and 5 in Shell Creek in the vicinity of the horizontal directional drill (HDD) creek crossings. The proposed Route 2 HDD creek crossing is approximately 300-ft downstream of the Hendrickson Dam. The proposed Route 5 HDD creek crossing is about 1.5 miles downstream of the Hendrickson Dam adjacent to a Florida Power and Light power line crossing. The soil borings were performed during the last week of September. The soil boring report was submitted to King October 11<sup>th</sup>. King evaluated the results of the soil borings for inclusion in the final draft of the Phase 1 draft BODR.

On November 1, 2016 a progress meeting was held with King and Authority Staff.

On November 16, 2016 King submitted the final draft of the Phase 1 Interconnect BODR which evaluated 3 route alternatives. Based on preliminary engineering evaluation and analysis Route 2 was recommended.

On November 17, 2016 the final draft of the Phase 1 Interconnect BODR was submitted to Charlotte County, Desoto County, Manatee, and Sarasota Counties as well as the City of North Port, the City of Punta Gorda, SWFWMD and FDEP for feedback. Review comments to the Authority are anticipated to be received by December 17, 2016.

- Dec. 2016 & Jan. 2017

At the December 7, 2016 Board Meeting, King presented the Phase 1 Interconnect, final draft Basis of Design Report (BODR). Three routes were assessed by King during preliminary engineering. King recommended Route 2, which follows the original Phase 1 Interconnect Route from the 2006 60%-complete Phase 1 Design Build Project, with the following exceptions:

- New Pipeline is not in or on the Hendrickson Dam embankments
- As currently proposed, the Pipeline crosses Shell Creek by Horizontal Directional Drilling (HDD) downstream of the

Hendrickson Dam, upland to upland.

The Engineer's Opinion of Probable (Total) Cost for the new Phase 1 Pipeline is \$11,960,000. The Phase 1 Pipeline is scheduled to be operational by February 2020. In November the final draft of the BODR was submitted to Charlotte, Desoto, Sarasota and Manatee Counties, the Cities of North Port, and Punta Gorda, the South West Florida Water Management District (SWFWMD) and the Florida Department of Environmental Protection (FDEP) for feedback. Review questions and comments were forwarded to King in December 2016 and January 2017 and incorporated into the Final BODR.

In January 2017 King submitted Work Order 2 'Design, Permitting and Bidding Services' for the Phase 1 Interconnect. Work Order No. 2 to King, includes survey, geotechnical services, design, permitting, property acquisition services, and bidding services. These project activities cover a 23-month schedule with design and permitting efforts completed in the fall of 2018 allowing selection of a contractor for construction in January 2019. The Authority negotiated with King and then forward Work Order No. 2 with King to Desoto, Charlotte, Sarasota and Manatee Counties, the Cities of Punta Gorda and North Port, SWFWMD and FDEP for feedback.

- February & March 2017

The Board approved King's Work Order 2 for 'Design, Permitting and Bid Phase Services' at the February 1, 2017 Board Meeting. King was issued the Notice-To-Proceed for Work Order 2 on February 10th. A Kickoff Meeting for the Design Phase was held on February 15th.

On March 1st a meeting was held with King, the Authority and the president of the Three Rivers Home Owners Association to discuss the proposed horizontal direction drilling (HDD) alignment at Shell Creek. The Three Rivers HOA does not have any issues with the proposed HDD alignment passing under the HOA's boat ramp property located on the north side shore of Shell Creek, downstream of the Hendrickson Dam. Additionally, King has been in communication with private property owners along the proposed (HDD) route at Shell Creek where easements may be required.

On March 6th an Operations Coordination meeting was held with the City of Punta Gorda at the Shell Creek Facility (SCF). Discussions focused on the Phase 1 Interconnect connection at the SCF, use of proposed pumps in the existing clear well to be dedicated to the Phase 1 Interconnect (for pumping flows south to north), communications from the new meter station to the SCF via fiber, and power for the new meter station.

In March geotechnical boring were performed in and around Shell Creek for the proposed horizontal direction drilling subaqueous crossing of Shell Creek. The dam transect survey for the HDD alignment was also completed. Identification, collection of information and survey of environmental sensitive areas is underway for permitting in the vicinity of Shell Creek.

During this period King has completed the majority of the topo survey of the Phase 1 Interconnect alignment. King provided proposed plan drawings of the alignment to other utility providers along the Phase 1 route to coordinate and identify potential infrastructure conflicts. The Project design drawings are 30% +/- complete. Currently, the Project is on time and on budget.

- April & May 2017

Project Progress Meetings were held on April 25<sup>th</sup> and May 10<sup>th</sup> and attended by King the Authority, SWFWMD (April) and the City of Punta Gorda (April). Geotechnical Work for the Shell Creek Horizontal Direction Drilling (HDD) crossing was completed in May. King is currently refining the HDD alignment across Shell Creek. When the HDD alignment is selected, a bathymetric survey of the proposed alignment and the mean high water survey will be performed.

King's land agent met with property owners and representatives of the Three Rivers Home Owners Association on May 16<sup>th</sup> to discuss potential easements for the Phase 1 Pipeline alignment/HDD at Shell Creek.

King and the Authority met with the FDEP regarding pre-application for the Environmental Resources Permit (ERP) on May 16<sup>th</sup>. On May 24<sup>rd</sup> King and the Authority met with the U.S. Army Corps of Engineering (ACOE) regarding pre-application for the ACOE Permit for the entire proposed pipeline alignment.

This period topographic survey for the Phase 1 Interconnect alignment was completed. Survey of subsurface utilities, was also completed. Additionally, survey of environmental sensitive areas for permitting, was completed. King submitted proposed design drawing for the pipeline route with profiles. The project design drawings are 50% +/- complete. Currently the project is on budget and schedule.

- June & July 2017

On June 20<sup>th</sup> a Project Progress Meetings was held and attended by King the Authority and SWFWMD. King reviewed pipeline plan and profile, and meter station progress, drawings. Engineering evaluations regarding pipe selection (wall thickness and corrosion control) were discussed. Additionally the proposed table of contents for Project Specifications was reviewed.

On April 10<sup>th</sup> the Authority requested an Amendment to the SWFWMD Cooperative Funding Agreement (CFA) to the revise the Contract Period Schedule. On June 13<sup>th</sup> SWFWMD returned the Amendment to the Agreement for signature by the Authority. The Authority returned signed the Amendment to SWFWMD on June 19<sup>th</sup>.

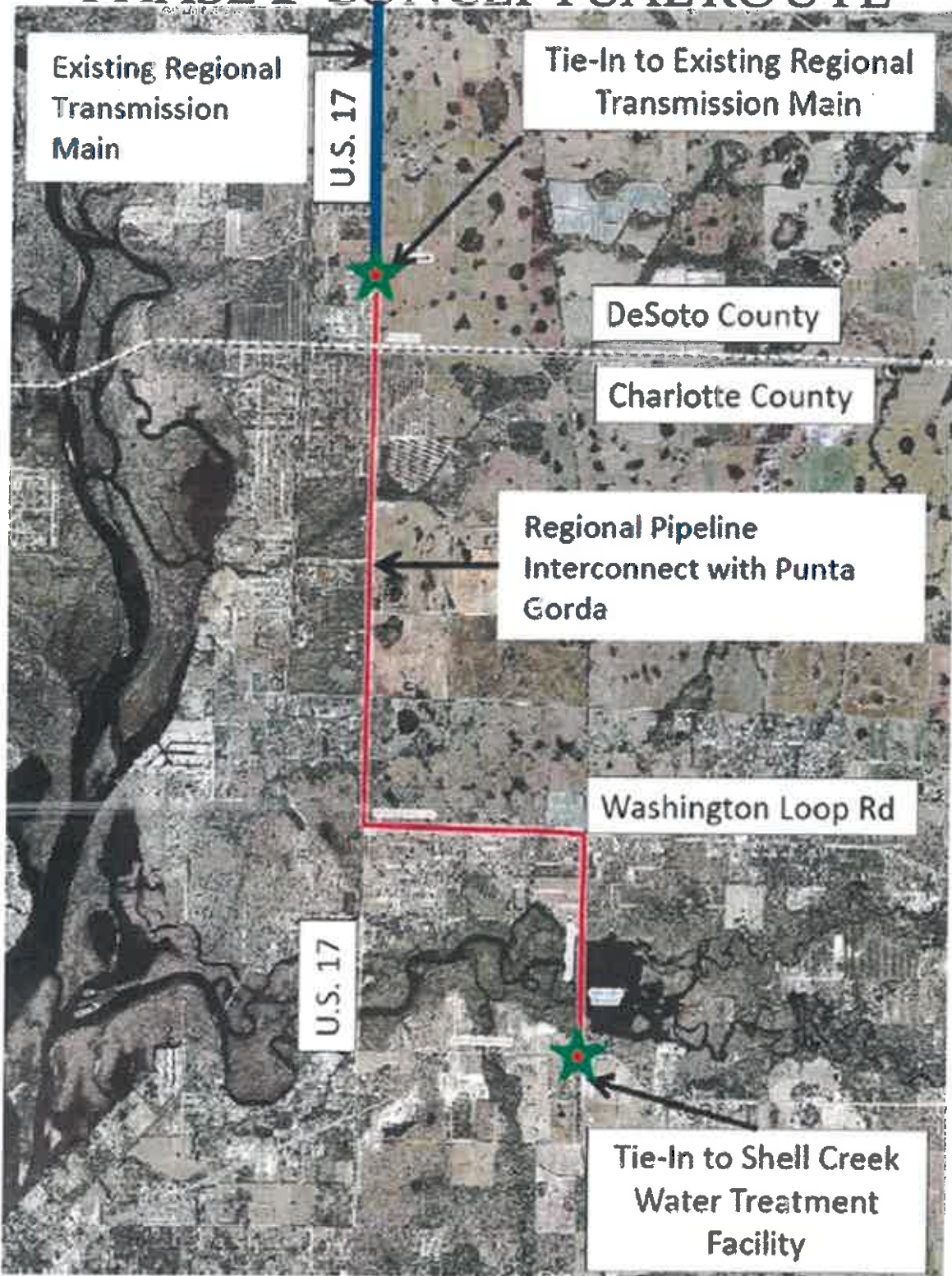
The draft USACOE permit and FDEP ERP permits have been drafted by King sub-consultants and are under review by King Engineering.

This period the Tidal Study at Shell Creek was accepted by the FDEP (May 23, 2017). King has also completed the Bathometric Survey for the proposed Horizontal Directional Drilling (HDD) alignment across Shell Creek.

On June 12<sup>th</sup>, King and their Land Agent (FLAA) and the Authority met with General Counsel/Manson Bolves Donaldson P.A. to discuss property procurement for the pipeline alignment at Shell Creek. Easement documents, and legal descriptions and sketches, are being developed.

The Phase 1 Project design is approximately 60% complete. The Project is currently on budget and schedule.

# PHASE 1 CONCEPTUAL ROUTE



**PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY**  
**BOARD OF DIRECTORS MEETING**  
*August 2, 2017*

**ROUTINE STATUS REPORTS**  
**ITEM 4**

**Regional Integrated Loop System**  
**Phase 3B Interconnect [Preymore Interconnect to Clark Road]**



## **Project Status Report**

**Project:** Regional Integrated Loop System Phase 3B Interconnect Pipeline Project  
[Preymore Interconnect Clark Road (SR 72)]

**Date:** August 2, 2017

**Prepared by:** Kevin Morris, Science & Technology Officer

---

The following information summarizes the project description and current status. (see attached conceptual pipe route map).

### **Project Description**

The Phase 3B Interconnect will extend the regional loop system within Sarasota County approximately 5 miles further north from the Preymore Interconnect location near the Municipal Solid Waste Complex to Clark Road (SR 72). The Phase 3B Pipeline will be bi-directional and will interconnect with the regional Phase 3A pipeline to the south and to Sarasota County's system on the north. As originally envisioned, the project included a repump facility at its northern end to boost water pressures for delivery northward, or, when operating in the reverse direction, this pumping facility would boost pressures coming southward.

Early in the Basis of Design Report effort, working closely in conjunction with County staff, an alternate configuration was developed that ultimately proved viable and will save the region significant capital and operational expense over the long term. The project team analyzed sizing the Phase 3B pipeline along with the County's planned interconnecting water main under various scenarios. The team showed that the Phase 3B pipeline could deliver water to the County's Pump Station No. 5 as well as a future repump facility located another 7 miles further north at the juncture between future Phases 3C and 3D without the need for booster pumping at SR 72 (Clark Road). This effectively eliminates one of the repump stations originally envisioned more than 10 years ago as part of the regional integrated loop system.

Rapid growth and development along the boundaries of Manatee and Sarasota Counties has already spurred developer-installation of the Phase 3D pipeline. The developer wanted to install the pipeline coincident with the roadway to avoid the later disruption that would come if the pipeline followed initial development. The Phase 3D pipeline is being interconnected with Manatee County to the north and will also tie in with Sarasota County to the south. The southernmost leg of Phase 3D terminates close to one of the Phase 3C conceptual routes from the 2006 Regional Integrated Loop System Feasibility/Routing Study.

Although the Phase 3C pipeline leg of the regional transmission system is envisioned to follow Phase 3B pipeline leg of the regional transmission system by several years, there appears to be need for the regional repumping facility now in the area where pipeline segments Phase 3D and 3C will conceptually meet (the intersection of Lorraine and Fruitville Roads). The ability to store, chemically recondition and repump water from this location could be important

strategically to the region since it represents the approximate midpoint between the Carlton WTP to the south and the Lake Manatee WTP to the north. Authority and County staff are conferring with our Water Management District funding partner about relocation of the originally planned Phase 3B Repump facility north to near the location of Fruitville and Lorraine Roads.

Another recent development has been the completion of a two county water system hydraulic model for Sarasota and Manatee Counties. This model, developed by Carollo Engineers under contract with the counties, is a valuable decision tool that can be used to evaluate regional loop elements. The model provides a sophisticated methodology whereby water demands are disaggregated granularly across the region from a spatial perspective and it also includes the existing web of distribution piping down to minor conveyances as small as 3 and 4-inches in diameter. This model is a valuable regional resource that can be used to analyze various interconnection and pumping scenarios and will serve useful for water managers as they consider improvements at regional and sub-regional system level. Discussions regarding commitments to Phase 3D and future Phase 3C pipeline segments are ongoing.

### Current status

The Final BODR for the Pipeline was accepted by the Authority Board at the meeting on June 7, 2017. Final design and permitting is underway and on schedule. Recent activities include pre-permitting meetings with the US Army Corps of Engineers and the Florida Department of Environmental Protection. The team expects to reach 60% completion in the month of July.

The BODR for the Phase 3B Pumping Station was finalized and presented to the Authority Board for acceptance at the June 7, 2017 meeting. However, unlike the Pipeline design which is well underway, final design for the Pumping Station is delayed pending scenario analysis with the new 2-county hydraulic water system model developed by a consultant working for Sarasota and Manatee Counties. It is possible that work with the water system model may aid in refining pump station conditions and parameters and based on that that opportunity, neither the County nor Authority staff felt it would be prudent to initiate final design of the pumping facility until additional hydraulic model scenarios are completed.

**Project History Briefing**

**Project:** Phase 3B Regional Interconnect Pipeline Project

**Date:** August 2, 2017

**Prepared by:** Kevin Morris, Science & Technology Officer

---

The following information summarizes the historical milestones and events of the Phase 3B Regional Interconnect Pipeline Project.

- July 24, 2015 The Authority advertised for Consultant SOQ Packages for engineering design and construction management services for the Phase 3B Regional Interconnect Pipeline Project.
- August 5, 2015 The Authority Board of Directors approved the Southwest Florida Water Management District cooperative funding request for the project "Phase 3B Regional Interconnect Pipeline Project for an estimate project cost of \$26,970,000.
- August 25, 2015 Consultant SOQ Packages were due. A total of five packages were timely received from the firms identified in alphabetical order as follows: Atkins North America Inc., Black & Veatch Inc., HDR Engineering Inc., King Engineering Associates Inc. and Stantec Consulting Services Inc.
- August 28, 2015 Distributed electronic copies of the SOQ packages to member and customer Utility Directors for feedback or comments. Feedback requested by September 14, 2015.
- September 22, 2015 Following review of the SOQ packages and in accordance with the Authority's Procurement Policy a short-list of three top candidates was developed and included: HDR Engineering Inc., Inc., King Engineering Associates Inc. and Stantec Consulting Services Inc.
- October 7, 2015 The Authority Board listened to presentations from the shortlisted firms (HDR Engineering Inc., Inc., King Engineering Associates Inc. and Stantec Consulting Services Inc.). The Board ranked the consultants to establish the order-of-preference, with King Engineering Associates Inc. selected as the top-ranked firm.

- December 2, 2015 The Board approved a contract with King Engineering Associates Inc. for Professional Engineering Design and Construction Management/Inspection Services for the Phase 3B Regional Interconnect Project.
- December 2, 2015 The Board approved Work Order No. 1 ‘Phase 3B Interconnect Preliminary Design Services’ for \$397,958 which included \$25,000 of contingency funding with the stipulation that work not be commenced until a letter of funding commitment had been received from Sarasota County for the cost. Work Order No. 1 included evaluation of up to five (5) major pipeline corridor routes between the existing terminus of Phase 3A at 681 northward to Clark Road. This work included efforts to coordinate with multiple Sarasota County Departments for future planning and infrastructure work in this area. The work included modeling of flows and pressures and will result in a recommendation for pipeline diameter, a route, a possible pumping station location and estimated construction cost. This effort was planned to be completed within 270 calendar days.
- January 26, 2016 Sarasota County Board of County Commissioners approved a letter of funding commitment for the entirety of the cost of Work Order No. 1 at \$397,958 should the out-of-cycle funding request to the Water Management District to cover part of Work Order No. 1 be denied.
- January 28, 2016 Authority Board approves out-of-cycle funding request to the Water Management District for the project
- February 3, 2016 Authority staff sends a letter requesting out-of-cycle funding for the project to the Water Management District.
- February 3, 2016 Authority staff issue Notice-to-Proceed to King Engineering Associates Inc. for the project. It is noted that this approximately 2 month’s post Board-award of the Contract Work Order No. 1. This delay is considered unavoidable as the Authority Board clearly indicated work should not commence until funding was assured. Authority staff not this delay could not be avoided and will be considered if the work under Work Order No. 1 should run into difficulty meeting its original 270 calendar day schedule for completion.
- February 17, 2016 Project kickoff meeting was conducted at the Sarasota County BOB Building including staff from Sarasota County, King Engineering Associates Inc., Southwest Florida Water Management District and the Authority. A significant amount of

planning information was delivered to the team by Sarasota County staff.

- February 25, 2016 Draft of Interlocal Agreement as required by the MWSC for the Phase 3B Regional Interconnect Project between the Authority and Sarasota County distributed to key County staff for review and comment.
- February 29, 2016 Project meeting conducted with Sarasota County Utilities Water System staff at the Sarasota County BOB Building including staff from Sarasota County, King Engineering Associates Inc. Southwest Florida Water Management District and the Authority. Items discussed at the meeting were County expectations concerning delivery pressure and disaggregation of future water demands. County staff also related their intended operational protocols for the new project and provided feedback on preliminary pipeline routes.
- March 14, 2016 Project meeting conducted with Manatee County staff at the Manatee County Utilities Operation Division facility on west Cortez Road. Participants included staff from Manatee County, King Engineering Associates Inc. Southwest Florida Water Management District and the Authority. Items discussed included location of existing Manatee County water mains near the county line, planning for future water mains and expectations regarding emergency supply interconnection and routine water transfers in large mains that may be needed to keep water mains from becoming stagnant.
- March 25, 2016 Project meeting with Sarasota County Utilities Water, Solid Waste and Stormwater System staff at the Sarasota County BOB Building including staff from Sarasota County, King Engineering Associates Inc. Southwest Florida Water Management District and the Authority. The team discussed constraints in the area of the Sarasota County Landfill and Dona Bay project areas including the alternate landfill access route along Knights Trail Road, planned roadway improvements in the area and the need for the landfill and Dona Bay projects to collaborate on significant earth movement projects over the next several decades and how this might impact some of the pipeline routes.
- April 8, 2016 Project meeting with Sarasota County Utilities, Planning and Transportation Department staff at the Sarasota County BOB Building including staff from Sarasota County, King Engineering Associates Inc., the Southwest Florida Water Management District

and the Authority. The group discussed planned roadway developments in the project area over the next several years.

- April 18, 2016 Project meeting with Florida Power and Light (FP&L) including staff from King Engineering Associates Inc. and the Authority at the FP&L Hammock Place Substation Operations Center in Sarasota. The group discussed co-locating water lines within or proximate to existing power transmission corridors for the Phase 3B as well as Phase 1 regional interconnect pipeline projects.
- June 20, 2016 Project meeting with Sarasota County staff including staff from King Engineering Associates Inc., the Authority and SWFWMD staff at Sarasota County BOB building. The group discussed potential pipeline corridors and the project team elicited County input on suitability of corridors north of SR 72 (Clark Road). Although the Phase 3B project does not currently extend northward of Clark road at this time, where Phase 3B gets installed will greatly influence the routing for future Phase 3C anticipated sometime after the year 2022. County staff expressed a preference for routes further east, away from existing development where there are fewer existing encumbrances. Many of the eastward routes under consideration also would likely involve lower land acquisition costs since the County owns much of the land along those potential routes. The Project team also discussed conceptual level costs.
- June 21, 2016 Amendment No. 1 was issued to King Engineering Associates, Inc. for Work Order No. 1 to fund an effort behind identifying potential parcels for a Phase 3C pump station in the vicinity of Fruitville and Lorraine Roads. Although this pump station will not be constructed as a part of Phase 3B, it was deemed prudent to start the search activity now while vacant, undeveloped lands were still available in that region. This effort will only identify suitably sized parcels; it does not include contacting landowners to assess their willingness to sell not real estate negotiations. This work was funded using \$24,849 of the Owner's Contingency Allowance.
- August 2, 2016 Met with a property owner along one of the potential routes to discuss potential easement acquisition: Roman Catholic Diocese of Venice.
- August 16, 2016 Met with a property owner along one of the potential routes to discuss potential easement acquisition: LT Partners, LLLP.

- August 16, 2016 Met with a property owner along one of the potential routes to discuss potential easement acquisition: Mrs. Hawkins.
- September 6, 2016 Presented summary of potential Phase 3B pipelines routes and discussed selection criteria and weighting factors with Sarasota County staff. At this point all of the environmental assessments have been completed including wetland assessments, protected species reviews, floodplain issues and soils reviews. In addition, all potentially affected private property owners along the routes have been contacted regarding acquisition of easements and that feedback was shared with County staff. King Engineering indicated route selection would be completed within the next 2 weeks and the draft Basis of Design Report was tentatively planned for completion by the end of the month.  
  
Finally, the effort to conceptually lay out a future Phase 3C pump station and identify suitable parcels for acquisition was completed and staff was briefed on those findings and recommendations.
- September 8, 2016 Provided electronic copy of Pump Station Siting Memorandum to County staff for review.
- October 24, 2016 Authority staff reviewed draft chapters of the BODR and provided feedback and comments to King Engineering.
- October 28, 2016 Provided update to Sarasota County staff on status of the project at the County's BOB facility.
- November 8, 2016 King Engineering hand delivered the draft BODR (hardcopies and CDs) to the Authority's Lakewood Ranch office.
- November 9, 2016 Hand delivered the draft BODR report for review and comment to Sarasota County (hardcopy and CD) and in electronic version (CD) only to the following: Charlotte County, Desoto County, Manatee County and the City of North Port.
- November 17, 2016 Transmitted copies of the draft BODR to both of the project's FDEP and SWFWMD Project Managers, respectively for consideration and comment.
- December 1, 2016 Received review comments on the draft Phase 3B BODR from SWFWMD project manager.
- January 3, 2017 Coordination meeting with King Engineering Associates, Inc. to develop scope for final design work order.

- February 1, 2017 Authority Board Meeting at the PRF. At this meeting:
  - The Board accepts draft Phase 3B Pipeline BODR.
  - The Board is briefed on the concept of dislocating the Phase 3B Pump Station from the Pipeline Project and migrating the pump station further north where there is greater immediate need.
  - Board authorizes Work Order No. 2 ‘Phase 3B Interconnect Final Design, Permitting and Bid Phase Services’ to King Engineering Associates, Inc., for an amount not to exceed \$1,090,391. This effort included a task to complete a BODR for the Pump Station to be returned to the Board within the next 4 months.
  
- February 9, 2017 Project coordination meeting with SWFWMD staff to discuss cooperative funding for the project. Topics discussed included schedule, cost and deliverables and legal review and coordination of agreements.
  
- March 10, 2017 Project coordination meeting with Sarasota County staff at the Sarasota County Central Solid Waste Complex attended by County Solid Waste, County Stormwater and County Utilities staff. Topics discussed included gaining access to the route for project surveyors and the soils testing and ecological consultants. We also discussed how to navigate around/under/over county conveyances and roads with our pipeline.
  
- March 10, 2017 Received authorization from Sarasota County Solid Waste for surveyors to access the pipeline route to commence gathering topographic data.
  
- March 30, 2017 Project update meeting with Sarasota County staff at the County’s BOB location off Fruitville Road attended by County staff, Authority staff and King Engineering.
  
- April 7, 2017 AWWA Annual Water Taste Testing Event conducted at the SWFWMD’s Fruitville Road location. The guest speaker from Carollo Engineers and provided an overview of a Two County Water System Hydraulic Model they were working to complete for Sarasota and Manatee Counties.
  
- April 26, 2017 Workshop at the Sarasota County BOB location with Sarasota and Manatee Counties and their mutual consultant, Carollo Engineers, to discuss the recently completed Two County Water System Hydraulic Model.



- May 1, 2017 Project coordination meeting with the SWFWMD in the Tampa Service Office to meet their designated 3<sup>rd</sup> party reviewer for the project (CDM) and to discuss coordination details, data needs, schedule and expectations.
- May 9, 2017 As agreed with Sarasota County staff, King Engineering Associates, Inc. reached out to Sarasota National Cemetery representatives to register interest in utility easements along the southern boundary of their property and inquire about the cemetery's willingness to cooperate on such a venture.
- May 15, 2017 King Engineering provided electronic copy of the draft Phase 3B Pump Station BODR for review and comment.
- May 16, 2017 Pre-application meeting with the FDEP in Fort Myers, FL.
- May 19, 2017 Completed internal review of Phase 3B Pump Station BODR and transmitted to King Engineering for implementation.
- May 22, 2017 Transmitted an electronic copy of the draft Phase 3B Pump Station BODR to Sarasota County for review and comment.
- May 22, 2017 Provided project WaterCAD model to the SWFWMD for their designated project 3<sup>rd</sup> party reviewer (CDM).
- May 24, 2017 Pre-application meeting with the US Army Corps of Engineers in Tampa, FL.
- May 24, 2017 Received final Phase 3B Pipeline BODR electronically. Changes from the draft BODR document accepted by the Authority Board in February are not substantive but editorial in nature.
- June 2, 2017 Received comments from Sarasota County on Phase 3B Pump Station BODR document responded in kind the same day. Several questions were answered and County preferences expressed that the Authority agreed to implement should this project proceed to the final design stage.
- June 2, 2017 Progress Meeting with King Engineering Associates at the Authority's Lakewood Ranch Office.
- June 7, 2017 Authority Board of Directors accepts the Final Phase 3B Pipeline BODR and the Final Phase 3B Pump Station BODR documents.
- June 12, 2017 Project team met with Authority legal counsel to generally discuss easement acquisition processes. The Phase 3B route falls entirely

on County-owned property and so it is not envisioned that private easement acquisition will be necessary. This meeting was more a prefutory opportunity to meet with counsel to advise them on the overall status of the project and confirm the current understanding of overall easement needs.

- June 23, 2017 King Engineering presented the compressed vertical profile for the pipeline, known in the industry as an “EKG” because it resembles a graph similar to the up and down pattern reflected in a heart beat monitor. This tool is used to determine the relative high and low points of the pipeline which govern the installation locations for pipeline air relief valves and blowoff’s.
- July 3, 2017 Project team made the decision to case the 3B pipeline where it crosses from the west to the east side of the 100 foot right-of-way strip which serves as an alternate access route to the landfill from Clark Road. This will better ensure that the pipeline will be unaffected in the future should this transportation corridor door be developed.
- July 11, 2017 Transmitted Copies of Final Phase 3B Pump Station and Pipeline BODRs to FDEP point-of-contact.
- July 18, 2017 Scheduled site visit with SWFWMD staff and their 3<sup>rd</sup> party reviewer, CDM.

***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**ROUTINE STATUS REPORTS  
ITEM 5**

**Partially Treated Water Aquifer Storage & Recovery Pilot Testing**

## **Project Status Report**

**Project:** Partially Treated Water Aquifer Storage and Recovery

**Date:** August 2, 2017

**Prepared by:** Mike Coates, P.G., Deputy Director

---

### **Project Description**

The Authority's Aquifer Storage and Recovery (ASR) System includes 21 ASR production wells with a design storage capacity of 6.3 BG. While this system is a critical storage component for the Peace River Facilities, it is operationally expensive. Water in ASR is fully treated twice to drinking water standards; first on injection in accordance with our existing operations permit for ASR; and again on recovery as water recovered from ASR is discharged to the raw water reservoir system because of naturally occurring arsenic picked up during storage in the limestone aquifer. Operationally this makes water from ASR twice as expensive as water from the raw water reservoir system.

Converting to a partially treated (minimal filtration and possibly disinfection prior to injection) ASR system has the potential to offer considerable cost savings, improve ASR recovery efficiency, and may also provide opportunities to obtain credit for over-recharging the Floridan Aquifer in the Southern Water Use Caution Area. The project is expected to involve multiple steps including:

- Modification of the existing ASR permit to allow pilot testing the partially treated ASR concept on two existing ASR production wells.
- Conducting the pilot testing, evaluating results, and re-evaluating costs for the system.
- If results are favorable the ASR system would be re-permitting to enable use of partially treated water for recharging the system.
- New pumping facilities would be constructed adjacent to Reservoir 1 to support ASR recharge.

### **Current status**

Cycle 1 for the pilot testing was initiated on February 9, 2017 and completed on April 10<sup>th</sup>. Approximately 60 MG of water was recharged and about 26 MG was recovered during cycle 1 of the test. Analysis of data collected during Cycle 1 is ongoing. Received FDEP approval for running an extended Cycle 2 test instead of two additional cycles. Cycle 2 (recharge) began on July 6<sup>th</sup> at a rate of approximately 2.5 MGD. Cycle 2 recharge is intended to continue until mid-September, followed by a storage period and ultimately by a recovery period ending in November 2017. Data collection is ongoing.

## Project History Briefing

**Project:** Partially Treated Water Aquifer Storage and Recovery

**Date:** August 2, 2017

**Prepared by:** Mike Coates, P.G., Deputy Director

---

The following information summarizes the historical milestones and key events of the Partially Treated ASR Project.

- October 2015 Executed Work Order 15-02 with CH2M for Partially Treated ASR Desk-Top Study October 9, 2015.
- March 2016 Desk-top study completed March 24, 2016. Recommends pilot testing partially treated concept. If pilot testing is successful, study indicates potential savings of \$334K to \$394K per year for partially treated system compared with current system. Requires new \$7.5M pumping facilities near Reservoir 1 for recharging ASR.
- April 2016 Presentation of partially treated ASR concept to Authority Board April 6, 2016. Recommended scheduling meeting with FDEP in Tallahassee to discuss concept, permit modification and pilot testing. Met with FDEP staff in Tallahassee April 29, 2016 to discuss partially treated water ASR at the Peace River Facility. Recommendation from meeting is to apply for ASR permit modification enabling pilot testing.
- May - July 2016 Began preparing application to modify ASR permit to allow pilot testing of partially treated ASR concept on two wells in Wellfield No. 2.
- August 2016 August 3, 2016 - Submitted request to FDEP for major modification of the Authority's ASR permit and associated Water Quality Criteria Exemption to enable pilot testing of partially treated ASR concept on two wells in Wellfield No. 2.

- September 2016

September 1, 2016 - Received Request for Additional Information (RAI) from FDEP to support the Authority's ASR permit modification request. September 8, 2016 - CH2M prepared and submitted responses to the FDEP's RAI. CH2M preparing Work Order for pilot testing of partially treated ASR concept on two wells in Wellfield No. 2. September 30, 2016 - Authority received Draft Class V, Group 7 permit from FDEP including the requested changes to enable pilot testing at ASR Wells S-4 and S-20.
- October 2016

Board approved WO 17-01 to CH2M for Pilot Testing at ASR Wellfield 2 (October 5, 2016).
- November 2016

Conducted Public Meeting November 17, 2016 at Peace River Facility for public comment on recently issued draft permit modification for Authority Class V Group 7 ASR system. Site visit by SWFWMD staff November 21, 2016 for review and discuss co-funding application the partially treated ASR Project.
- December 2016

Received notice of permit on December 14, 2016 authorizing pilot testing. Authorized CH2M to begin work on test set-up. Attended meeting with SWFWMD staff in Tampa on December 22<sup>nd</sup> to discuss project co-funding. Low probability for out-of-cycle funding for FY 2016 and 2017 work on this project.
- January 2017

Conducted project safety & coordination meeting with consultant and Authority staff on January 11<sup>th</sup> in preparation for beginning the test. Authority staff collecting background samples from production and monitor wells and reservoir 1. Installation of piping to ASR wells S-4 and S-20 and recharge pump is ongoing.
- February 2017

Installation of piping and pumping equipment was completed and background water quality monitoring was completed the week of February 6<sup>th</sup> and testing (recharge cycle) was initiated on February 9, 2017. An intensive data collection effort in nearby monitor and ASR production wells is ongoing. Recharge rates are averaging approximately 0.7 MGD, and 1.3 MGD into ASR wells S-4 and S-20 respectively.
- March 2017

The recharge portion of this cycle in the testing was completed on March 9, 2017. Total volume of water pumped from Reservoir 1 into S-4 and S-20 was about 60 MG. Storage and recovery portions of the testing are ongoing, as are associated data collection efforts.

- April 2017

Recovery portion of the pilot test was ceased on April 10, 2017 after recovering approximately 26 MG from Testwells S-4 & S-20 (total) in order to enable full scale recovery operations in ASR Wellfield 2. Data collection efforts supporting the pilot testing operations continued.
- May 2017

Data collection efforts associated with the test continued, and analysis of test data is underway to aid in refining the test procedure for Cycle 2 (probable timeframe mid-summer 2017). Authority and CH2M staff met on May 25<sup>th</sup> to discuss test results and plan Cycle 2 testing.
- June 2017

Authority requested test revision from FDEP on June 22, 2017 to conduct extended cycle 2 in lieu of two separate shorter cycles to complete the pilot testing program. FDEP approval received on June 27, 2017 for the extended cycle. Data analysis from Cycle 1 is ongoing. Preparing for initiation of Cycle 2 (extended) in early July. Authority staff are working with SWFWMD staff on development of the co-funding agreement for the project.
- July 2017

Initiated Cycle 2 recharge on July 6, 2017 at initial rate of 2.6 MGD. Recharge of the entire ASR system is ongoing at this time – although the other 19 ASR wells are being recharged with fully treated drinking water. Data collection is ongoing.

***PEACE RIVER MANASOTA REGIONAL WATER SUPPLY AUTHORITY  
BOARD OF DIRECTORS MEETING  
August 2, 2017***

**ROUTINE STATUS REPORTS  
ITEM 6**

**Peace River Basin Report**



**MEMORANDUM**

**TO:** Board Members and Pat Lehman  
**FROM:** Doug Manson, Laura Donaldson and Paria Shirzadi  
**RE:** Peace River Basin Report  
**DATE:** July 24, 2017

---

**Mosaic Fertilizer, LLC- South Fort Meade Mine**

On July 14, 2017, DEP gave Notice of Permit Issuance for Industrial Wastewater Facility Permit Number FL0037958, a renewal of an existing permit, to Mosaic Fertilizer, L.L.C. ("Mosaic") for its South Fort Meade Mine in Polk and Hardee Counties. The South Fort Meade Mine operations include phosphate mining and beneficiation facilities, phosphatic clay settling areas, sand tailings disposal areas and a mine water recirculation system. The monitoring requirements for groundwater discharges from sand tailings areas are also covered under this permit. Decanted water from the clay settling areas is returned to the beneficiation plant for reuse and discharged, as necessary, through National Pollutant Discharge Elimination System ("NPDES") Outfalls authorized under this permit. The facility is permitted to receive up to 1.0 million gallons per day ("MGD"), annual average daily flow, of reclaimed water from the City of Fort Meade for reuse into the facility's mine water recirculation system. The limitations for discharge of reclaimed water into the permittee's mine recirculation system are as provided under the City of Fort Meade's Municipal Wastewater Permit [FLA016529-005-DW1P/NRL].



Integrity. Intelligence. Diligence.

Discharges from the South Fort Meade Mine are dependent upon the rainfall contributions to the system in excess of the available storage capacity and the inflow of ground water into mining cuts. This mine system discharges treated excess process wastewater, stormwater runoff, groundwater inflow, and reclaimed domestic wastewater from designated outfalls as follows: Outfall D-001 (WBID 1623H) discharges into an unnamed swale, a tributary of the Peace River; Outfall D-002 (WBID 1777) is a 25-ft multi-stage v-notch weir, which discharges into an unnamed swale, a tributary of Parker Branch, then Little Charlie Creek (WBID 1774), which discharges into the Peace River (WBID 1623F); Outfall D-003 will be designed to discharge into an unnamed swale, a tributary of Little Charlie Creek (WBID 1774), which then discharges into the Peace River (WBID 1623F); and Outfall D-004 will be designed to discharge into an unnamed swale, a tributary of Little Charlie Creek (WBID 1774), which then discharges into the Peace River (WBID 1623F).

**Mosaic Fertilizer, LLC- West Ona Pipeline Corridor**

On May 31, 2017 Mosaic sent DEP an Affidavit of Publication as proof of publication of a public notice for DEP's issuance of Environmental Resource Permit ("ERP") No. MMR\_142476-070 to Mosaic for its West Ona Pipeline Corridor located in Hardee, Hillsborough and Manatee Counties. The activities authorized by the ERP are located within a 1,237.3-acre project site known as the West Ona Operations Corridor. The ERP authorizes Mosaic to build mining infrastructure that will facilitate the transfer of, and provide primary separation of, phosphate ore to be mined from the western portions of the



Integrity. Intelligence. Diligence.

Ona and South Pasture Extension Mines and transported to the Four Corners Mine beneficiation plant. The infrastructure authorized consists of a new pre-washer, a pre-washer entrance road, new electrical power lines, a dragline walkpath, matrix, clay and sand tailings, and hydraulic water pipelines. The project shall function as an operations corridor through 1,237.3 acres of previously mined lands that are in various stages of reclamation, and at the end of the use of the operations corridor, 1,237.3 acres of uplands, wetlands, and other surface waters will be reclaimed.

The West Ona Operations Corridor is located mainly within the existing Ft. Green Mine with small portions of the pipeline corridor located within the South Pasture and Four Corners Mine areas, in Hardee, Manatee, and Hillsborough Counties. Wetlands and other surface waters within the West Ona Operations Corridor project boundary are associated with the Horse Creek, which ultimately flows to the Peace River.

#### **Mosaic Fertilizer, LLC- Wingate Creek Mine**

The current National Pollutant Discharge Elimination System (“NPDES”) permit for the Wingate Creek Mine (FL0032522) includes three existing outfalls: D-001 to Wingate Creek, D-002 to Johnson Creek, and D-004 to Horse Creek, which ultimately flows to the Peace River. On May 23, 2017, Mosaic submitted its NPDES renewal application (FL0032522-010) (“Application”) for its Wingate Creek Mine, which included as attachments: a narrative discussion of the site history, facility operations and the monitoring that has been performed over the past permit cycle; a site aerial, site topographic map and additional figures; and a summary of discharge water quality data



Integrity. Intelligence. Diligence.

and associated trend graphs, with other monitoring data summaries.

The Application requests several modifications to the monitoring parameters, schedules and facility descriptions in the NPDES permit. The Application requests to modify the facility description to indicate the transfer of water between Wingate Creek and other Mosaic mine facilities by adding the following language: “A hydrological connection exists between the Wingate Creek, South Pasture Mine (FL0040177), Fort Green/Payne Creek (FL0027600) and Four Corners (FL0036412) Mines. This permit authorizes the transfer of surplus water for environmental safeguard and management purposes between the above referenced mine facilities and recognizes boundary overlaps including mining, reclamation, and stormwater management activity in the footprint(s) of the mines.” The Application also includes proposed changes to the facility description language to reflect the fact that the Domestic Wastewater Treatment Plant referenced under permit FLA012622 has been decommissioned and a county permitted commercial septic system has been installed to provide sanitary wastewater treatment.

Finally, the Application removes references to Outfall D-001 (which is being abandoned) and the former Fort Green site and permit transfers for property and outfall D-004 from the draft facility language and proposes the following monitoring changes: reduce the sand tailings monitoring from annually to once per permit cycle; reduce or eliminate monitoring for several analytes based on low levels of typical discharge and minimal potential environmental impacts; eliminate total suspended solids and fixed solid monitoring since the facility history has been in compliance over this permit cycle and at

average of less than 25% of the permit allowable; reduce sulfate monitoring to annually from the current monthly basis; reduce arsenic monitoring to quarterly from the current monthly basis; reduce fluoride monitoring to annually from the current quarterly basis; reduce oil and grease monitoring to annually from the current monthly basis; reduce Gross Alpha monitoring to annually from the current quarterly basis; and change dissolved oxygen monitoring to address the new dissolved oxygen percent saturation standard.

**Mosaic Fertilizer, LLC- Four Corners Mine**

On May 19, 2017, Mosaic submitted to DEP its Quarterly Report for Outfall D-003 at its Four Corners Mine. On March 20, 2012, DEP issued a permit modification to Mosaic for its NPDES Permit No. FL0036412, to install a new outfall, D-003, associated with the Four Corners Mine on an Unnamed Tributary which joins the Little Manatee River (“LMR”) in a portion designated as an Outstanding Florida Water (“OFW”) in southeastern Hillsborough County. As a condition of the permit issuance, DEP issued an Administrative Order (No. AO-01PM10) requiring Mosaic to conduct a minimum of three year in-stream water quality and biological monitoring program in the Unnamed Tributary and LMR. The goal of the monitoring and reporting program is to verify the discharge from the new outfall will not degrade the existing water quality in the LMR designated as an OFW as predicted by the water quality model, or cause an impairment in the Unnamed Tributary.

As a result of the lack of discharge during the initial three year period of the Administrative Order (July 2012 to June 2015), Mosaic requested to extend the Administrative Order monitoring program and quarterly reporting to allow for additional



Integrity. Intelligence. Diligence.

data collection to verify water quality has not significantly changed in the Unnamed Tributary or the LMR as a result of the D-003 discharge. The 2017 Quarterly Report contains all of the water quantity and quality data collected to date as part of the Administrative Order, including the most recent results of water quality monitoring conducted from January to March 2017. The Quarterly Report states that most of the streamflow in the LMR appears to be rainfall driven as evidenced by peaks following high rainfall events and that there was a positive correlation between monthly streamflow and rainfall from July 2012 to March 2017. The Quarterly Report also reported that “although periodic excursions from some water quality criteria have been observed in the past (DO and pH), new data from the January to March 2017 timeframe were all within applicable Class III water quality standards.”

**Mosaic Fertilizer, LLC- DeSoto Mine**

On June 24, 2017, Mosaic submitted an Annual Status Report (“Report”) to DEP for its DeSoto Mine ERP (MMR\_331292-001). The Report explains that commencement of the permitted activity within the DeSoto Mine has not yet begun and that initiation of the mining activities is dependent on the Army Corps of Engineers (“ACOE”) permit and approval of the DeSoto County Rezoning, Mining Master Plan and operating permit. The Report states that Mosaic is working through the permitting process with the ACOE and DeSoto County but does not yet have an estimate of when the permits will be finalized and issued. Mosaic will provide notification to DEP once the ACOE permit and DeSoto County approval are obtained and prior to any disturbance within the DeSoto mine.



Integrity. Intelligence. Diligence.

**Jack Paul Properties, Inc.- Water Use Permit Modification**

On June 27, 2017, the Southwest Florida Water Management District (“SWFWMD”) issued Water Use Permit No. 13370.001 to Jack Paul Properties, Inc. The modification authorizes an allocation of 1.478 MGD average, which is an increase from the previously permitted quantity of 0.547 MGD annual average. The water use permit is for agricultural use in DeSoto County, in the Peace River Basin, and is located in the Southern Water Use Caution Area.

**Optimum Ranch Florida, LLC- Water Use Permit New/Modification**

On June 7, 2017, SWFWMD received a water use permit application (“WUP Application”) (WUP No.20703.000) from Optimum Ranch Florida, LLC for agricultural uses in DeSoto County, located in the Peace River Basin, and the Southern Water Use Caution Area. The WUP Application is requesting a split/transfer from an existing Water Use Permit No. 20554. The WUP Application requests an allocation of 6.1568 MGD average, which is substantially greater than the allocation currently authorized under the existing water use permit. On June 21, 2017, SWFWMD sent a Request for Additional Information to Optimum Ranch Florida, LLC, which included the following comment/request addressing the allocation issue:

The application submitted requests 6,156,800 gallons per day (gpd) Annual Average and 10,877,600 gpd Peak Month for supplemental irrigation of 812 acres of spring vegetables and 609 acres of fall vegetables. Please be advised that the active water use quantities associated with the wells being transferred from WUP No. 20020554.001 include a total of 1,539,200 gpd Annual Average and 2,719,400 gpd Peak Month. Water use quantities allocated to District ID Nos. 1, 3 and 4, Permittee ID Nos. 16, 17 and 25, are rotational water use quantities and do not add to the permit total. If new



Integrity. Intelligence. Diligence.

water use quantities are being requested, please provide assurances that the requested new quantities are reasonable and beneficial, and will not cause adverse impacts the water resources or legal existing users in the affected area. If information on the application was submitted in error, please confirm that the application only requests the active quantities for District ID No. 2 and provide a revised crop plan and demand calculations for the application.