ANDERSON REGIONAL
JOINT WATER SYSTEM

998 Hunters Trail Anderson, SC 29625 Phone: 864-332-6534 Fax: 864-224-6116

BOARD AGENDA

Board of Commissioners
February 18, 2021
11:30 am

Call to Order / Determination of Quorum
Pledge of Allegiance
Commissioners' Comments
Public Comment

I. Approval of Minutes October 21, 2020

II. Consent Calendar (Old Business)

1. None

III. Items requiring immediate action

1. Approve Flow-Based Voting Recalculation for 2021

IV. Discussion (New Business)

1. FY 2021/22 Budget Process
2. Personnel
3. Executive Director's Report (Oral)

V. Informational Reports

1. Finance and Administration Report
2. Operations Report
3. Staff Member Focus

VI. Closed Executive Session

1. None.

VII. Adjournment

ANDERSON REGIONAL
JOINT WATER SYSTEM

Your Community-Owned and Operated System

998 Hunters Trail Anderson, SC 29625
Phone: 864-332-6534 Fax: 864-224-6116
www.arjwater.com

MINUTES OF THE
ANDERSON REGIONAL JOINT WATER SYSTEM
October 21, 2020

LET THE MINUTES SHOW THAT THE MEDIA WERE NOTIFIED OF THIS MEETING IN ACCORDANCE WITH THE SOUTH CAROLINA FREEDOM OF INFORMATION ACT.

A QUORUM OF THE BOARD IS PRESENT.

COMMISSIONERS PRESENT: Jeff Caldwell, City of Anderson; Benjie McGill, City of Clemson; Douglas Locke, Broadway; Patrick Jackson, Starr-Iva; Mitch Ellenburg, Belton-Honea Path; Jeremy Gillespie, Sandy Springs; Tommy Phillips, Broadway; Phillip Mishoe, Town of Central

ABSENT: Dwight Edwards, West Anderson; Larry Harrell, Homeland Park; Josh Addis, Town of Central; Dyke Spencer, Powdersville; David Rogers, Town of Williamston; Chuck Cortez, Big Creek-Hammond; Steve Miller, Town of Pendleton

OTHERS PRESENT: Scott Willett, ARJWS; Jodi Logan, ARJWS; Lisa Evatt, ARJWS; Erik Rolfe, ARJW; Bryan Bates, ARJWS; David Gailey, ARJWS; Kendall Cleary, AJRWS; Trey Burns, ARJWS; Billy Bolger, Clemson University

Chairman Benjie McGill called the Board meeting of Anderson Regional Joint Water System to order 12:00 p.m. on October 21, 2020.

Chairman McGill asked for any Commissioners comments. Mr. McGill announced that Mr. Franklin Harvey Turner, Jr. passed away on Thursday, October 15, 2020, after a lengthy illness. He also stated a member of the Big Creek-Hammond Board, Bill Kay, passed away recently. Mr. Ellenburg thanked everyone for offering resources and help with the broken valve repair.

There were no public comments.

Mr. Caldwell made a motion to approve the August 18, 2020 minutes and Mr. Locke seconded. Motion carried.

I. Consent Calendar (Old Business)

None

II. Items requiring immediate action

1. FYE 2020 Comprehensive Financial Annual Report

Mrs. Cleary introduced Mr. David Phillips, Independent Auditor of Greene Finney, LLP. Mr. Phillips was responsible for auditing the financial statements of ARJWS for the FYE June 30, 2020. Professional standards require that the independent auditors communicate with the Board any informative information and findings related to the audit. Mr. Phillips presented the Board of Commissioners with a Financial Audit Presentation and Management Letter. Mr. Phillips was able to inform the Board of Commissioners that there were no findings, no disagreements with management, and nothing to disclose. A copy of the financial reports, presentation, and management letter is attached. Mr. Locke made a motion to accept and file the FYE 2020 Financial Reports and audit results. Mr. Gillespie seconded that motion. Motion carried.

III. Discussion (New Business)

1. Adopt ARJWS Employee Handbook-Revision Date 10/8/2020

Mrs. Cleary explained the proposed changes in the ARJWS employee handbook. The discussion included changes to the Leave Pay-out, Inappropriate Uses/ Abuse of Sick Leave, Overtime Expectation, and added Pregnancy Accommodations Act verbiage. Mr. Mishoe made a motion to approve and accept the ARJWS Employee Handbook revisions. Mr. Ellenburg seconded that motion. Motion carried.

2. Strategic Plan Comments

Mr. Willett gave a review of the Strategic Plan that was presented at the last Board meeting and asked for additions, comments, or modifications to the Strategic Plan. No comments were made. Mr. Willet stated that ARJWS will take the objectives in-hand, goals, and targets and redevelop staff objectives for the performance plan on the managerial level.

3. Executive Director's Report (Oral)

Mr. Willett gave an update on SCDOT and the Whitehall/Dixon Road project. Mr. Willett announced that ARJWS open positions have been filled. The employees hired are Kyle Merritt, Maintenance; Austin Satterfield, Maintenance; Quentin Ervin, Water Treatment Operator Trainee. ARJWS is using Find Great People to recruit for the Asset Management position.

IV. Informational Reports

1. Financial Reports
2. Administration Report
3. Operations and Maintenance Report
4. Engineering Report

These reports are for information and for each Member to review as written. A copy of each report is attached to the file copy of these minutes.

V. Adjournment

With no further business, Mr. Jackson made a motion to adjourn at 12:39 p.m. and Mr. Locke seconded. Motion carried.

Respectfully submitted,

Jeff Caldwell
City of Anderson

ANDERSON REGIONAL
JOINT WATER SYSTEM

998 Hunters Trail Anderson, SC 29625
Phone: 864-332-6534 Fax: 864-224-6116

BOARD MEMORANDUM

February 10, 2021

Subject

Flow-based Vote Recalculation

Recommendation

Approve the member agency flow-based vote allocation based on 2020 water deliveries to all member agencies except Clemson University.

Alternatives:

1. Identify errors in flow data and do not approve member agency flow-based vote allocation.

Background

Article 3, Section 8 of the Joint Water System By-laws states that each Commissioner representing a Member Agency shall have one vote for each unit of flow measured by the immediate prior year's water purchase. For these purposes, a unit of flow shall be determined by dividing the total flow of all Commissioners by 1000. Voting units shall be prorated, based on the above each year, but total voting units shall not exceed 1000 units plus one vote for each Member Agency.

Discussion

During calendar year 2020, the Joint Water System delivered an average of 16.07 million gallons per day for a total of 5,863,732,481 gallons to all member agencies. Factoring out sales to Clemson University of 293,641,462 gallons, sales used to calculate flow-based votes was 5,570,091,019 gallons. In addition to the flow-based votes, each Member Agency is entitled to 1 vote. Per the By-Laws, total flow based votes shall equal 1000 and shall be apportioned pro rata on sales. In addition to the flow based votes, each Member Agency present shall receive 1 vote. With 14 Member Agencies, the Joint Water System votes will total 1014 when all are present. The new vote totals will be effective with votes taken after March 1, 2021

Vote Allocation 2021						
	2021 Votes		CY 2020 Sales		2020 Votes	
	Flow	*Total*	*Total Flow*	*Share*	*Flow*	*Total*
City of Anderson	262	263	1,457,581,833	26.17%	273	274
Hammond	132	133	735,328,382	13.20%	135	136
City of Clemson	132	133	733,096,431	13.16%	126	127
Sandy Springs	118	119	658,428,947	11.82%	115	116
West Anderson	86	87	476,606,379	8.56%	84	85
Starr Iva	65	66	363,582,449	6.53%	60	61
Big Creek	55	56	307,400,000	5.52%	55	56
Broadway	45	46	249,389,705	4.48%	43	44
Homeland Park	44	45	242,365,548	4.35%	39	40
Williamston	28	29	153,894,573	2.76%	34	35
Pendleton	24	25	131,549,243	2.36%	25	26
Powdersville	11	12	60,867,529	1.09%	11	12
Belton/Honea Path	0	1	0	0.00%	0	1
Town of Central	0	1	0	0.00%	0	1
Voting Flow			5,570,091,019			
Clemson University	0	0	293,641,462		0	0
Total System Flow	1000	1014	6,385,348,249	100.00%	1000	1014

Approved by: Scott Willett, Executive Director

ANDERSON REGIONAL
JOINT WATER SYSTEM

998 Hunters Trail Anderson, SC 29625
Phone: 864-332-6534 Fax: 864-224-6116

BOARD MEMORANDUM

February 4, 2021

Subject

Finance and Administration Report

Discussion

Billing

Meters were read on January 28, 2021 with usage up 5.26% from last month (for the same number of days) and up 2.81% from last year (for the same number of days).

AGENCY	PREV.YR SAME MONTH	LAST MONTH	CURRENT
# of Billing Days	**31**	**30**	**29**
Anderson	108,802,832	110,004,162	110,216,211
Big Creek	21,300,000	23,500,000	23,600,000
Broadway	18,147,072	19,004,273	19,859,640
Clemson	59,913,594	45,172,888	48,000,090
Clemson University	26,235,387	15,874,372	20,824,721
Hammond	47,880,025	49,144,008	49,117,518
Homeland Park	18,434,099	18,648,937	18,955,786
Pendleton	12,017,219	8,671,172	9,202,229
Powdersville	2,699,000	4,192,382	3,941,116
Sandy Springs	54,613,000	47,349,925	47,509,000
Starr-Iva	29,108,857	27,236,711	28,526,906
West Anderson	31,959,479	36,587,542	34,058,398
Williamston	12,738,163	14,115,316	13,050,968
TOTAL	**443,848,727**	**419,501,688**	**426,862,583**

Changes in State and Federal Rules

Payroll Tax Deferral Guidance

The U.S. Treasury issued guidance on August 28, 2020 to help employees with the implementation of the deferral of the employee share of payroll taxes issued in a Presidential Memorandum on August 8, 2020. The guidance allows, but does not require, employers to suspend withholding and paying the employees' portion of Social Security payroll taxes. The tax deferral runs from September 1, 2020 through December 31, 2020 and applies to employees earning wages less than $4,000 for a biweekly pay period (or $104,000 per year). This is only a deferral and the employers must subsequently withhold and pay all of the deferred taxes by April 30, 2021.

GASB Statement No. 87, "Leases"
GASB Statement number 87, Leases, eliminates operating leases. All contracts that meet the definition of lease should be accounted for as an asset and a liability by the lessee, similar to capital leases. For governments that are a lessee or a lessor will have to report these leases from when the lease began throughout the lease term. The requirement for this statement will take effect for financial statements for the fiscal year ending December 31, 2020. See the GFOA website for guidance and examples.

Prepared by: Kendall Cleary, Accountant
Approved by: Scott Willett, Executive Director

Attachments: Profit & Loss Summary – Budget, Actual and Forecast

ANDERSON REGIONAL
JOINT WATER SYSTEM

Profit & Loss
For the Month ending January 31, 2021

				7+5	Ideal Percentage:	58%	
	Annual Budget	YTD Budget (7 months)	YTD Actual	Year End Projection	% of Budget Used	YTD Variance	
Operating Revenue							
Operations and Maintenance	4,626,200	2,698,617	2,538,584	4,466,168	55%	(160,032)	
Capital Charges	5,392,245	3,145,476	3,145,476	5,392,245	58%	-	
Renewal and Replacement							
Water System	1,574,695	918,572	918,439	1,574,562	58%	(133)	
Pump Station	72,378	42,221	42,211	72,368	58%	(10)	
Miscellaneous	148,599	86,683	134,687	196,603	91%	48,004	
Total Operating Revenue	11,814,117	6,891,568	6,779,397	11,701,946			
Operating Expenses							
Salaries and Wages	1,403,800	818,883	767,674	1,352,590	55%	(51,210)	
Payroll Taxes and Employee Benefits	566,700	330,575	341,078	577,203	60%	10,503	
Operations and Maintenance							
Administrative Expenses	191,400	111,650	111,118	190,868	58%	(532)	
Operations Expenses							
Lab Supplies/Uniforms/Safety Equipment	88,800	51,800	67,352	104,352	76%	15,552	A
Chemicals	446,900	260,692	308,525	494,734	69%	47,834	
Sludge Disposal	185,000	107,917	220,192	220,192	119%	112,276	B
Utilities and Security	1,112,500	648,958	616,077	1,079,618	55%	(32,882)	
Maintenance Expenses	281,700	164,325	177,539	294,914	63%	13,214	
Professional Fees	90,000	52,500	22,499	59,999	25%	(30,001)	
Insurance	93,100	54,308	-	93,100	0%	(54,308)	
Debt Expenses	5,490,245	3,202,643	2,932,491	5,220,093	53%	(270,152)	
Junior Lien Bond Payments	-	-	572,113	753,219	100%	572,113	C
Source Water Protection	51,000	29,750	21,148	42,398	41%	(8,602)	
Miscellaneous Expenses	115,300	67,258	48,983	97,025	42%	(18,275)	
Total operating expenses before depreciation	10,116,445	5,901,260	6,206,790	10,580,307			
Net operating income	1,697,672	990,309	572,607	1,121,639			
Raw Water							
Raw Water Income	57,646	33,627	155,481	179,500	270%	121,854	
Raw Water O&M Expenses	-	-	113,474	113,474	100%	113,474	
Raw Water Operating Income	57,646	33,627	42,007	66,026			

	Cash Balances	Days Cash on Hand
Operating Cash	1,680,167	61
Capital Project Fund	2,003,992	
R&R Funds (Restricted)	1,139,473	
	4,823,631	

A: Lab Supplies is over budget due to the purchase of turbidimeters for $14k.

B: Sludge Disposal is over budget due to ARJWS allowing the project to exceed the budget by approximately $35,000 to make a more substantial impact in the effort to rid the lagoon from excess sludge caused by using PAC in prior years. This is a single event and the percentage of budget used should self correct as the fiscal year moves forward.

C: Junior Lien bond payments are non budget impacting and are paid for from reserves.

ANDERSON REGIONAL
JOINT WATER SYSTEM

998 Hunters Trail Anderson, SC 29625
Phone: 864-332-6534 Fax: 864-224-6116

BOARD MEMORANDUM

February 5, 2021

Subject
Operations Report

Discussion

Operations

As of February 5, 2021, Lake Hartwell's surface elevation was 657.48 ft. below mean sea level, 2.52 ft. below full pool. Raw water is being drawn from the first gate of the intake structure. Water temperature at the first gate is 50.9°F. The Joint Water System reached 48% of settled water turbidity goals for the month of January. Raw water pH levels are constant. Settled and Finished water pH levels are normal. The maximum day for January water production was 44.30% of Finished water capacity.

In addition to water quality sampling for the Lake Hartwell Water Treatment Plant, Joint Water System staff processed 179 Total Coliform distribution samples for local entities during the month of January.

Weather Data

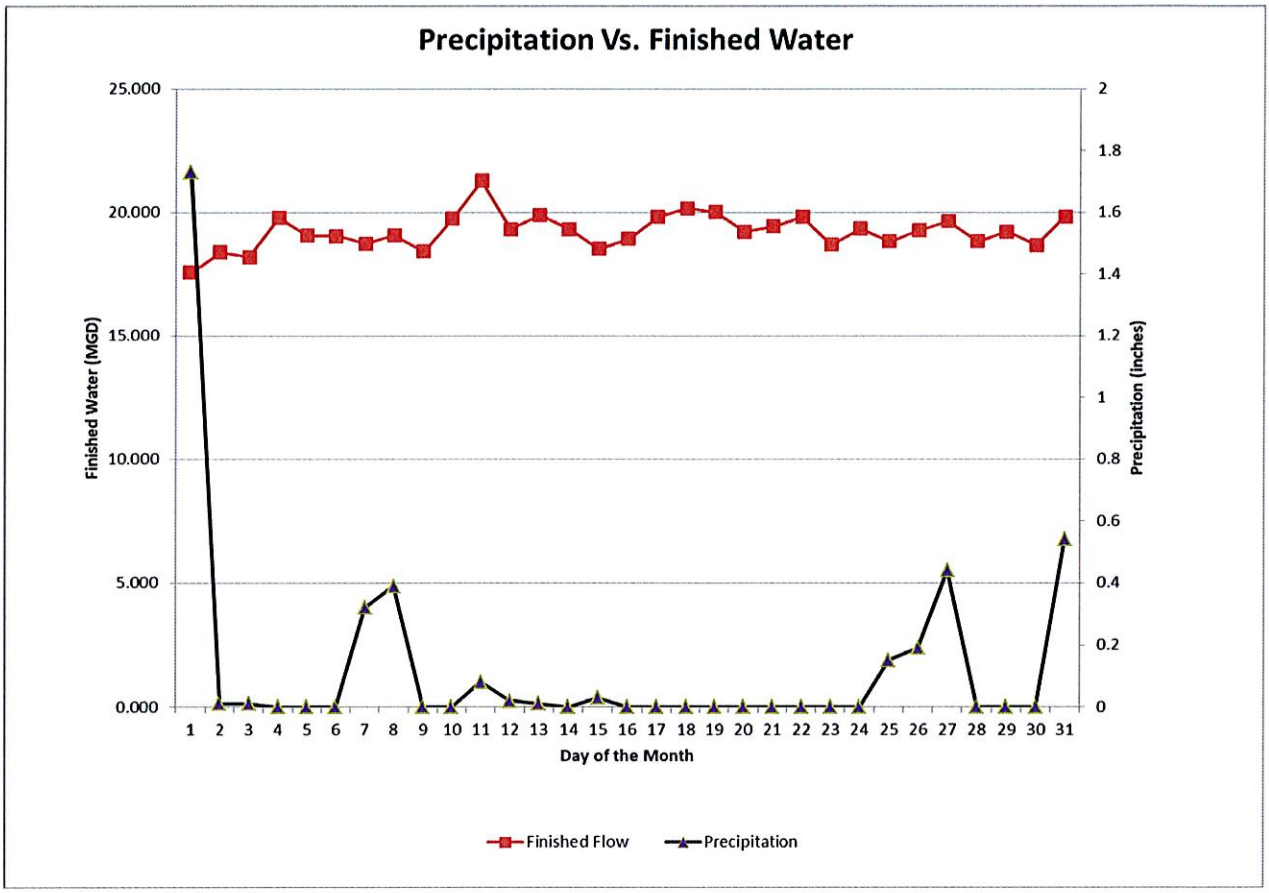
	Minimum	Maximum	Total
Rainfall	0.00 in.	1.73in.	3.92 in.
Temperature	27.1° F	70.5° F	N/A
Humidity	22%	100%	N/A

Water Production Data

	Average	Minimum	Maximum	Total
Raw Water (MG)	18,362,000	15,007,000	24,957,000	569,220,000[‡]
Finished Water (MG)	19,224,000	17,570,000	21,265,000	595,949,000[‡]
Finished Max Capacity	40.05%	36.60%	44.30%	40.05%

NOTE: Percentages are finished water capacities.

[‡] - Typically, the raw water total exceeds the finished water total by ~10 million gallons. During January, we ran a chemical trial where we processed more water through one side of the plant that uses a different style flow meter (ultrasonic vs venturi). We suspect this accounts for the apparent flow discrepancy in January where the Finished Water total exceeded the Raw Water Total by ~27 million gallons.



Water Quality Data

	Raw	Settled	Finished
pH	7.00	6.66	7.12
Turbidity (NTU) Range	1.50 to 4.00	0.53 to 2.60	0.02 to 0.12
Turbidity (NTU) Average	2.29	1.16	0.03
Turbidity (NTU) Exceedance	-	52.00%	0.00%
Total Organic Carbon	1.44	-	0.84
Fluoride Average (ppm)	-	-	0.69**
Residual Disinfectant (ppm)	-	-	1.7
TTHM (DBP)	-	-	0.9 ppb
Methylisoborneol (MIB)*	<1.0 NG/L	-	<1.0 NG/L
Geosmin*	<1.0 NG/L	-	<1.0 NG/L

*Note: For the general population, detection of MIB & Geosmin occurs at 10 NG/L.

**Note: DHEC has encouraged all water treatment plants to maintain Fluoride levels between 0.60-1.00 ppm. ARJWS will comply with this request, which will be reflected on future water quality data summaries.

TTHM Discussion

TTHMs

TTHMs, or Total Trihalomethanes, are formed when a disinfectant, like chlorine, comes into contact with organic material within a distribution system. As the water increases in temperature within a distribution system, so too does the organic content. At high concentrations, these disinfection by-products can have adverse health effects. Therefore, the Environmental Protection Agency, EPA, has set a Maximum Contaminant Level, or MCL, for TTHMs at 80 parts per billion. The Operations Staff at ARJWS collects monthly, one-time samples, which are analyzed for TTHMs. The following report displays this month's readings, along with annual maximum, minimum, and overall averages at the designated sample locations.

Disinfection Byproduct Analysis Report

Sample Location	Current TTHM Reading	12 Month Maximum	12 month Minimum	12 Month Average
Broadway	5.0	24.3	5.0	11.9
Big Creek	4.4	24.1	4.4	13.4
Clemson Armory	3.4	18.5	3.4	9.8
Sandy Springs-Michelin	2.3	17.9	2.3	9.0
Sandy Springs-5 Forks	3.9	16.8	3.9	10.0
West Anderson	2.1	12.1	2.1	6.2
Bolt Drive Tank	7.4	28.6	5.3	14.5
McAlister Tank	3.8	25.4	3.8	13.8
Highview Pump Station	3.8	19.6	3.8	10.5
Starr-Iva Hydrant	1.3	18.9	1.3	7.9
Clemson Pump Station	2.2	17.9	2.2	8.7

Note: All TTHM results are in ppb, or parts per billion. Also, the Water Quality Data Table displays the plant TTHMs.

Water Quality Strategic Planning Discussion

For the month of January, the following Water Quality Strategic Planning goals were met:

- Finished water pH was held within the designated 7.1-7.4 range.
- Fluoride dosing average was kept within the approved 0.60 – 0.75 ppm range.
- Finished water Chlorine residual was maintained above a 1.2 ppm leaving the facility.
- Non-detect for taste and odor was achieved, despite detectable concentrations at the source.
- All 11 routine distribution sample locations were less than half of the maximum contaminant level for TTHMs.

In summary, the ARJWS staff has done an outstanding job in the month of January, achieving the strategic planning goals for Effective Utility Management adopted by the ARJWS board.

Discussion

Corrosion

Metal pipe naturally corrodes based on the chemical properties surrounding it. Corrosivity of water is directly related to pH. Lower pH concentrations, under 7.0, are considered acidic, and therefore increase corrosion to metal piping. For this reason, The Lake Hartwell Water Treatment Plant adds lime to increase the pH levels to non-corrosive levels. In addition, orthophosphate is added to create a protective barrier on the inner linings of all distribution and premise piping. The added orthophosphate barrier keeps water from contact with bare metal.

pH adjustment technique-

The recommended pH range for orthophosphate to minimize lead, iron, and copper solubility is 7.4-7.8. For the month of January, the Lake Hartwell Water Treatment Plant Finished water pH was stable at 7.1. ARJWS has made this change, as we have noticed pH levels within the distribution system increase over time, due to water age.

Orthophosphate corrosion inhibitor technique-

The Lake Hartwell Water Treatment Plant has determined to adjust the baseline numbers for Orthophosphate to a running annual average to establish a consistent dose rate. During the month of January, the Lake Hartwell Water Treatment Plant Finished water running annual average dose rate is within the desired 1.0 ppm to 1.6 ppm protective barrier range at 1.2 ppm.

Monthly Power Consumption Data

Month	On Peak kW	Off Peak kW	Total kW	Finished Water MG	$/ MG	12 month Average
Jan – 20	187,200	811,200	998,400	537.1	$94.08	$100.38
Feb – 20	206,400	832,800	1,039,200	508.1	$102.90	$100.97
Mar – 20	184,800	763,200	948,000	536.1	$91.49	$99.70
Apr – 20	180,000	861,600	1,041,600	533.1	$96.46	$100.17
May – 20	199,200	873,600	1,072,800	571.8	$92.87	$100.04
Jun – 20	228,000	969,600	1,197,600	621.3	$104.51	$101.57
Jul – 20	235,200	1,111,200	1,346,400	730.7	$104.09	$100.98
Aug – 20	259,200	1,137,600	1,396,800	675.3	$115.59	$101.75
Sep – 20	230,400	1,060,800	1,291,200	643.4	$112.53	$101.83
Oct – 20	208,800	945,600	1,154,400	619.7	$88.86	$100.45
Nov – 20	201,600	914,400	1,116,000	561.8	$84.53	$99.14
Dec – 20	172,800	864,000	1,036,800	550.6	$81.30	$97.43
Jan – 21	208,800	856,800	1,065,600	595.9	$86.81	$96.62

Monthly Power Consumption Update

For the month of January, ARJWS was able to treat 595,949,000 gallons of water at a cost of $86.81 per million gallons produced. These costs include the power needed to produce Ozone continuously for effective taste and odor removal for the system. ARJWS also incurred a power rate increase, which went into effect on May 15, 2019. The 12 month Running Annual Average is currently at $96.62.

Discussion

January Operations Highlights

Strategic Planning Goal of staff development:
-Had operators trained on additional operational responsibilities.
-Performed chemical trials with polymer and alum substitute to improve settled water quality.

Other Highlights:
- Successfully completed the sanitary survey

Discussion

EPA released its revised lead and copper rule on January 15, 2021. It will go into effect March 16, 2021.

Operations Preventative Maintenance Report

Lab (includes weekly verification of clarifier and filter turbidity meters):
Total hours completed 10.0 hours (verification included for 4 weeks)

Prepared by: Bryan Bates, Operations Manager
Approved by: Scott Willett, Executive Director

ANDERSON REGIONAL
JOINT WATER SYSTEM

998 Hunters Trail Anderson, SC 29625
Phone: 864-332-6534 Fax: 864-224-6116

BOARD MEMORANDUM

February 11, 2021

Subject

Staff Member Focus

Discussion

Anderson Regional Joint Water would like to introduce Mark Miller. Mark was hired in July 2007 as a Maintenance Technician. As a Maintenance Technician Mark was the 2nd employee at that time to hold both a level "A" Water Treatment and level "A" Water Distribution license. After holding the Maintenance Technician position for 5 years, Donnie Curry retired and Mark assumed the new role as Water Treatment Plant Operator. Mark has won the Water Environment Association of South Carolina Blue Ridge Foothills District award for Water Operator Of The Year in 2015 and Maintenance Operator Of The Year in 2010.

Mark moved to South Carolina from Louisiana in 1988. He resides in Seneca, SC. When Mark is not working he enjoys hunting, fishing, golfing, and of course watching LSU football.

Mark believes that working at ARJWS is appealing because he only has to work 2 weekends a month and enjoys the long stretch of time off built into his schedule. Mark would like to invite all Board members to come to say hello when he is working so he can take them on a tour.