

Serving Conserving

Memorandum

- To: Albemarle County Board of Supervisors From: Gary O'Connell, Executive Director
- **Date:** October 19, 2022
- **Re:** Albemarle County Service Authority (ACSA) Quarterly Briefing
- **CC:** Mr. Jeff Richardson, County Executive; Mr. Lance Stewart, Director of Facilities, ACSA Board of Directors; ACSA Leadership Team and Operations Council

We always are appreciative of the continuing opportunity to share with the Board of Supervisors and the broader community what is happening at your water agency, the Albemarle County Service Authority (ACSA). We pride ourselves on safe, clean, reliable Albemarle water at a good value. Here are some recent updates from the ACSA:

- <u>Fall Customer Newsletter</u> The fall customer newsletter includes a "thank you" to our long-time Director of Engineering, Pete Gorham, who retired; customer survey; tips on reducing cooking oils/grease (Thanksgiving message); watching out for water testing scams; announcing a student art contest for Imagine a Day Without Water Value of Water. These newsletters go out quarterly to our 22,500 customers via their bills (hard copy) or ebills (electronic copy).
- 2. <u>AMI (Advanced Metering Infrastructure)</u> One of our Strategic Plan major initiatives is to utilize the various AMI technologies that are available in the water metering world. A tremendous advantage with AMI is near real time leak detection inside the customer's home or business, or water service line, a tremendous water conservation and cost savings tool. The first phase was about 1,200 meters, primarily residential meters in Scottsville, and all 450 large meters in the ACSA system (1/3 of overall monthly use). The remaining 20.900 meters are the final phase, awaiting meter delivery. With the global chip shortages, the meters are slowly being built. We are looking to early 2023 to restart installations.
- 3. <u>Strategic Plan</u> The current three-year Strategic Plan is nearing completion. This fall we are doing the planning work to prepare a new Strategic Plan 2023-25 to present to the ACSA Board in early 2023. We are involving our stakeholders,

customers, employees and ACSA Board, through formal surveys and focus group interviews. We also have scheduled a Best Practices Review Panel of several experienced utility managers to take a look at where we are as an organization and where we should be heading. We will use this feedback and assessments to fashion the priority goals and projects for our upcoming Strategic Plan.

- 4. <u>Water Quality</u> Our water quality remains high, as validated by over 400,000 tests annually. We have great source water, as well as advanced water treatment including GAC filtering (granular activated carbon). As you read and hear the national news, you will find a number of communities have water quality issues like lead and PFAS forever chemicals. The water that the ACSA delivers to our customers is of the highest quality and under any measure is safe to drink. We do not have lead nor PFAS issues with our water.
- 5. <u>ACSA Capital Projects Update</u> The approved FY 2023 Capital Improvements Program totals \$8 million. Highlights and current major projects are detailed below:
 - <u>Madison Park Pump Station Upgrade</u> Constructed 37 years ago, by a private development, and the original equipment is wearing down, building is undersized, and we are not able to install SCADA (computerized monitor). The plan is to replace this pump station on-site. A construction contract has been approved. The project is coordinating with a nearby development to reimburse the ACSA for the increased cost for the necessary upgrades.
 - <u>Jefferson Village Water Main Replacement</u> Replacing older (49 years) water mains made of inferior pipe product. Since originally part of a former well system, many of the mains are undersized. Construction is underway.
 - <u>Pantops Sewer Study</u> Area study to reduce wet weather infiltration and inflow (I/I). This study will likely lead to targeted sanitary sewer system rehabilitation. Flow monitoring and manhole inspections have been completed, and the investigation portion of this project, including robotic televising of the sewer lines, has been completed. Rehabilitation work was completed this month (100% complete).
 - <u>SCADA (computerized monitoring)</u> A three phased project is nearing completion for over 40 water and wastewater facilities in the ACSA system. This is another of our projects to provide emergency alerting and monitoring to assure reliable water and wastewater service. We have completed the second phase of work, with the third phase of construction beginning.
 - <u>Crozet Phase 4 Water Main Replacement</u> Our Strategic Plan calls for the eventual replacement of all asbestos-cement water mains in our system, as they are older and made of a weaker material than the current industry norm. This project continues our systematic program to replace the aging and undersized water mains in the Crozet Water System. This is the fourth of five phases that have been defined to carry

out these improvements. The design phase is complete and easement acquisition is under way.

- <u>Hollymead Sewer Rehabilitation</u> ACSA staff has identified other large drainage basins to be evaluated for infiltration and inflow (I/I) to continue our efforts to maintain the integrity of our wastewater collection system. This study area includes the oldest portions of the Hollymead Subdivision, as well as the offsite portion of the sewer main that serves the westernmost area of Forest Lakes South. All of the manholes have been inspected, flow monitoring and smoke testing have been completed. Rehabilitation work is complete.
- <u>Energy Audit</u> This project will consist of a comprehensive energy audit of the Operations Center and all pump stations (20). It will evaluate current energy consumption and the factors that drive it, as well as an analysis of utility rate structures to identify potential cost savings. Surveys were conducted of all systems, including operation and maintenance procedures to determine where energy conservation can be improved. An evaluation of infrastructure needed to convert our fleet to electric vehicles (EV) has been added to the scope of the audit. A draft report is complete and under review.
- <u>Avon Street Maintenance Yard</u> The Avon Street property has long been held as a future location to build additional facilities in a central location, as needed. The current Maintenance Yard at our Pantops Operations Center is becoming overcrowded with equipment and materials, causing us to relocate some equipment and larger materials to the former ACSA Maintenance Yard at the Crozet Water Treatment Plant, which we lease from RWSA. This project will develop the ACSA owned Avon Street property into a satellite facility for larger vehicle and materials storage. This site creates the opportunity for some sustainable and conservation oriented applications. Design of the site is under way at the 65% stage, and the initial site plan has been submitted to the Albemarle County Planning staff. This site and drainage work is being coordinated with a County sidewalk project on Avon.
- Ragged Mountain Phase 1 Water Main Replacement This project will replace the oldest active water main remaining in our system, which was part of the water main that served customers out Reservoir Road. This cast iron pipe is over 90 years old and is severely tuberculated, which greatly reduces the flow capacity in this section. Design work is 90% complete. We are coordinating with VDOT where their bridge replacement project overlaps with ours. VDOT is evaluating their project, as they twice have been unsuccessful in bidding. Easement acquisition has been completed.
- <u>Northfields Water Main Replacement</u> This project addresses the goal in our Strategic Plan for the eventual replacement of all asbestos-cement water mains in our system. The existing water mains are approximately 54 years old and have reached the end of their useful life. As a former well system that was connected to public water, most of the mains are also

undersized. Field surveying is complete, with design under way at the 50% stage. The design of some sanitary sewer extensions as part of this project, specifically in areas along the road, has been added to our consultant's scope of work.

- <u>Exclusion Meters Replacement</u> In the mid 1990's with the development of Glenmore, many new customers installed irrigation systems for their properties and wanted to have their sewer bills reduced by the amount of water that was diverted to irrigate their properties. Private meters were installed behind their ACSA meter to record this volume and it was "excluded" from the calculation of their sewer charges and these became known as exclusion meters. On January 1, 2006 the ACSA Rules and Regulations were modified to no longer allow exclusion meters, and required that all future irrigation meters would be tapped separately off our water mains to be owned and controlled by the ACSA. This project is a multi-year replacement program by our in-house CIP Crew to install dedicated, ACSA owned irrigation meters that will eliminate all remaining private exclusion meters in our system. The number of exclusion meters in the ACSA system has been reduced to 361. Active work in Glenmore underway.
- <u>Pipe Saddles Replacement</u> The ACSA Maintenance Department has discovered in recent years that pipe saddles used to make water service line connections to PVC water mains have been failing. Either the zinc-coated straps or the cast iron saddle bodies are deteriorating. This project is a multi-year replacement program.
- <u>Scottsville Phase 4 (James River Road) Water Main Replacement</u> -Continues our systematic program to replace undersized and deteriorating water mains in the ACSA system. At the 90% design stage. Construction is not anticipated until mid-2024.
- <u>Briarwood Water Main Replacement</u> Our Strategic Plan calls for the eventual replacement of PVC (pre-1990) water mains in our system, as they are older and made of weaker material than the current industry norm. This project will replace the PVC water mains that have been in service since the early 1980's. The field surveying work has been completed. Design work is nearing the 90% stage.
- <u>Broadway Street Water Main Replacement</u> This project will replace the ductile iron water main that was installed in the early 1970's and has been found to be in deteriorating condition based upon recent excavations. With the redevelopment of the Woolen Mills Factory and Albemarle County's increased attention on economic revitalization of this corridor, replacement of this water main is crucial to transforming this area. Project is at the 90% design stage.
- <u>Bellair Liberty Hills Sewer</u> Over the past several years there has been an increase in residents of the Bellair Subdivision seeking to connect to public sanitary sewer service since most residents are currently served by private septic fields. In an effort to gauge community interest for such a project, ACSA staff mailed out a survey to the residents seeking feedback

on their interest. Based on initial feedback received, a majority of the property owners are interested in connecting to public sewer if it was made available. The project is in the preliminary design phase (10%) with the field surveying complete. Fifty-percent design documents recently received and under review by ACSA staff.

- <u>Raintree and Fieldbrook Water Main Replacement</u> Planned replacement of aging PVC water mains that have failing service line pipe saddles due to corrosion. Project is in the initial design phase.
- <u>Barracks West Water Main Replacement</u> This project will replace undersized and aging water pipe that are over 60 years old. Project design is at the 50% design phase.
- <u>Airport Trunk Sewer Upgrade</u> With the continued growth in the Hollymead Town Center area, the existing sewer collector serving the airport and the area west of Route 29 is in need of upgrading to handle full build-out. The existing sewer was originally sized to serve the light industrial zoning designated for that area at the time of construction. The increased density specified in the County Comprehensive Plan for the same drainage basin will exceed the capacity of the existing sewer. Project design is at the 90% stage, with easement acquisition underway.

Let us know if you have further questions or comments. We are more than glad to meet with you or hold a virtual meeting to talk about any of our projects, or facilities, or provide a tour if that would be useful.

Attachment:

-Fall ACSA Customer Newsletter/E-newsletter



Thankful for Service. Seeking Your Assistance.

Dear Customer,

A few weeks ago, the Albemarle County Service Authority said farewell to Pete Gorham, our Director of Engineering, who retired after 43 years of service to the ACSA and its customers. Pete's work ethic and expertise, combined with his welcoming personality, wit, and humor, made the ACSA a better place since the late 1970s(!).

We also had the pleasure of honoring the work anniversaries for four other employees who celebrated their 45th, 40th, and 25th years respectively, working in our Operations and Construction divisions. All of these dedicated staff members embody our mission to provide clean safe water, exemplary wastewater services, and reliable fire protection infrastructure.

It is also ACSA's mission to work with our community partners to maintain and improve our utility system in a timely, cooperative, and financially responsible manner. To achieve success for the future, the ACSA is again fielding a customer survey to continue our efforts learn about your interactions with us and the services we offer. The survey was sent to you whether you use a paper bill or an e-bill, and it can be found on our homepage "carousel" at www.serviceauthority.org. Don't recall seeing the message? Email custserv@serviceauthority.org for more information.

The survey, and all of our other interactions with our customers and community partners, will help set the direction for the ACSA as we create our next strategic plan, which we hope will set the proper path for a future that will likely offer enormous opportunities and considerable challenges.

We look forward to reviewing your responses and mapping our course for the future. A future whose foundation has been laid for us all by people like Pete Gorham.

Gary O'Connell, Executive Director



Pete Gorham

Thank you, Pete, for all of your years of dedicated service to the customers and employees of the ACSA.

Protect Your Home Against Fats, Oils, & Grease



The fall means turkey dinners, gatherings of families and friends, and copious amounts of food. For the ACSA, it means an increase in fats, oils and grease that could go down your pipes - and ours - and clog them up!

<u>Take these steps to help save yourself from a costly repair.</u> Never pour grease down the drain. Let it cool and pour it into a can. Don't run water over greasy dishes; wipe them down with paper towels. Scrape scraps covered in grease into the garbage, not the disposal. And if you're deep frying your turkey, follow the box instructions and take it to the McIntire Recycling Center or the Ivy Material Utilization Center.



Watch Out for Water Testing Scams!

Water quality concerns have been making the news of late, with extensive coverage of the tragic infrastructure failures of Jackson, Mississippi. Whenever an emergency like Jackson happens, scammers seeking to capitalize on concerns always appear to try and take advantage of people.

Most will use kits like the one pictured that involves a subjective review of colors to try and get people to purchase a treatment system that, in almost every case, only addresses personal preferences like taste, not actual quality.

We at the ACSA are very confident in the quality of our water; you can read your latest Water Quality Report on our website - www.serviceauthority.org.





2022 Youth Art Contest

Imasine a Day without Water

Open to: All Youth that live in the City of Charlottesville & Albemarle County in Grades K to 12th.

Theme: "Value of Water" Water is essential for life. You need water for everything from brushing your teeth, growing the food you eat, and making the things you use everyday. This year tell us why or how you value water and save water in our community.

www.charlottesville.gov/artcontest

Running from September 28 through October 31, this year's "Imagine a Day Without Water" Youth Art Contest focuses on the "Value of Water," asking young people to submit artwork or photos about life's most precious resource.

Entries can be made using the city's Art Contest Platform, mailing them to the city's Water Conservation Office, or by dropping them off at selected Jefferson-Madison Regional Libraries.

For all the details you need, including the entry form, visit www.charlottesville.gov/artcontest.