News from the Savannah River Site
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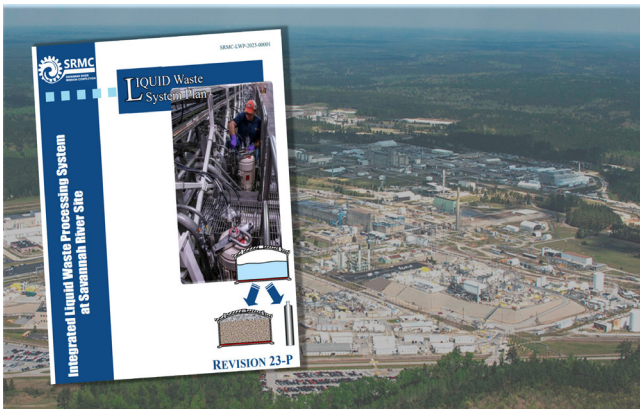
FOR IMMEDIATE RELEASE

Latest Savannah River Site Liquid Waste System Plan Outlines Path to Tank Closure

AIKEN, . (July 27, 2023) – The U.S. Department of Energy's Office of Environmental Management (EM)'s revised roadmap for completion of the liquid waste program at the Savannah River Site is now available.

Developed by SRS liquid waste contractor Savannah River Mission Completion (SRMC) for EM, the Liquid Waste System Plan, Revision 23 documents the SRS liquid waste processing goals and operational outlook.

The system plan integrates and outlines the activities required for the disposition of existing and future high-level radioactive waste and the removal from service of radioactive liquid waste tanks and facilities belonging to the DOE-Savannah River Operations Office. It records a planning basis for waste processing in the liquid waste system through the end of the program mission.



The Department of Energy's Office of Environmental Management and Savannah River Mission Completion have published the latest edition of the Savannah River Site (SRS) Liquid Waste System Plan, which forecasts continued progress in achieving the liquid waste program processing goals at SRS.

Jim Folk, DOE-Savannah River assistant manager for waste disposition, said the system plan provides the strategy to finish the liquid waste mission while achieving milestone agreements and adhering to goals made between DOE and regulating agencies.

"DOE has worked collaboratively with Savannah River Mission Completion to plan for accelerated and aggressive performance in waste processing," Folk said. "The updated SRS Liquid Waste System Plan outlines several production improvements that increase the feed and processing rates of our key facilities. Overall, we are forecasting the best possible outcome for dispositioning the remaining 34 million gallons of waste at SRS."

The liquid waste program has seen substantial changes since the last system plan iteration, including:

- The Salt Waste Processing Facility (SWPF) began operation and has processed over 6 million gallons of dissolved salt solution;
- SRMC assumed operation of SWPF from the constructor of the facility;
- Construction of Saltstone Disposal Units 7 and 8 was completed;
- Three salt blend tanks are now in use to prepare feed for SWPF; and,
- The Defense Waste Processing Facility converted to an improved chemical flowsheet to increase processing capacity and reliability.

Also new to Revision 23 of the SRS plan is the incorporation of the newly developed liquid waste system modeling to identify process or facility improvements most likely to accelerate the liquid waste mission. The outputs from

the computer models create tables, charts and schedules used for system planning and funding profiles for cleanup activities.

Partnering with technical subcontractor DBD, SRMC subject matter experts provide data input — such as tank capacities, operating limits, program priorities, processing steps, pump speeds, transfer routes, and planned and unplanned downtimes for facilities — to DBD to develop the model design basis and build the digital model. The SRMC experts validate the model against current physical plant performance. The model outputs are then analyzed using data visualization software to determine what process and facility changes are appropriate for implementation.

SRMC President and Program Manager Dave Olson said system modeling has played a key role in aligning the right factors to achieve the program's No. 1 goal of reducing risk to the environment by removing waste and operationally closing tanks.

"Savannah River Mission Completion began our contract with the end in mind: to complete the liquid waste mission by 2037," Olson said. "We will continue to put safety first, adhere to our core values and use the system plan to move forward with the treatment of the radioactive liquid waste in a manner that is responsible and meets the mission goals and objectives."