Chapter 2: **Environmental Management System**

The Savannah River Site (SRS) Environmental Management System (EMS) implements the U.S. Department of Energy (DOE) commitment to sound environmental stewardship policy and practices. These safeguards protect air, water, land, and natural resources as well as archaeological and cultural resources that SRS potentially affects.

The EMS plans and evaluates SRS construction, operations, maintenance, and decommissioning projects to protect public health and the environment, prevent pollution, and comply with applicable environmental and cultural resource protection requirements. The way SRS conducts its actions demonstrates the Site's commitment to minimize waste, manage water, foster renewable energy, reduce greenhouse gases, acquire sustainable services, remediate, and observe best management practices. All these attributes are vital components of environmental management.

2024 Highlights

DOE sets objectives for carrying out its mission in an environmentally responsible manner that supports a policy of national energy security and addresses global environmental challenges. SRS continues to make substantial progress in meeting Site goals. Below are the highlights of the EMS program:

- A triennial external EMS audit was completed, which determined that the SRS EMS meets the requirements of ISO 14001:2015 with zero non-conformances identified.
- SRS diverted 58.5% of municipal solid waste from landfills.
- SRS was recognized for significant contributions toward achieving 100% Zero Emission Vehicle (ZEV) Fleet. For this, SRS received the DOE fiscal year (FY) 2024 Green Fleet Award, which was accompanied by a $250,000 grant to support ZEV acquisition and improving electric vehicle (EV) charging infrastructure across the Site.

2.1 SRS ENVIRONMENTAL MANAGEMENT SYSTEM

The Savannah River Site (SRS) utilizes an Environmental Management System (EMS) as a framework to implement programs to reduce environmental impacts and fulfill environmental compliance obligations in accordance with approved instructions from the Department of Energy (DOE) Office of Environment, Health, Safety and Security. Sites must also maintain their EMS as being certified to or conforming to the International Organization for Standardization's (ISO) 14001:2015.

In 2024, the SRS EMS program underwent a triennial, external conformance audit. This audit included all three entities covered by the SRS EMS—Savannah River Nuclear Solutions (SRNS), Battelle Savannah River Alliance (BSRA), and Savannah River Mission Completion (SRMC). The audit lasted three days and included extensive document reviews and onsite interviews. The audit identified no non-conformances. The external auditor identified three areas of SRS's EMS program as noteworthy achievements:

- SRS environmental compliance programmatic infrastructure is comprehensive and exhibits a mature program.
- The SRNS, BSRA, and SRMC environmental compliance organizations are well organized, technically competent, and effectively engaged in regulatory compliance, environmental remediation activities, and the protection of the environment in site operations.
- Strong organizational leadership and personnel commitments to environmental stewardship are readily evident throughout the contractors' organizations

Subsequently, the DOE Site Manager declared that the SRS EMS conforms to ISO 14001:2015.

In addition to the SRS EMS audit, the Centerra-SRS (the Site's protective force services contractor) is also audited by an accredited independent certification body. As a result, in 2024, Centerra-SRS's EMS was certified to ISO 14001:2015.

Chapter 2—Key Terms

Environmental impacts *are any positive or negative changes to the environment caused by an organization's activities, products, or services.*

Environmental objectives *define the organization's environmental goals.*

Environmental sustainability *is interacting responsibly with the environment to conserve natural resources and promote long-term environmental quality. It includes reducing the amount of waste produced, using less energy, and developing processes that maintain the long-term quality of the environment.*

2.1.1 SRS Environmental Policy

The goal of the SRS Environmental Policy is to protect the public and future generations from any impacts from Site operations. SRS commits to this by doing the following:

- Promoting sound environmental stewardship
- Preventing pollution onsite and in surrounding communities
- Conducting science and energy research
- Continuing the national security mission

SRS accomplishes this through the following:

- Complying with environmental laws and regulations
- Continuing process improvements
- Conducting safe operations
- Communicating with the workforce, public, and stakeholders

2.1.2 Integration with the Integrated Safety Management System

SRS incorporates an Integrated Safety Management System (ISMS) with the EMS to provide a comprehensive framework under which it manages environmental, safety, and health programs. This makes it possible for the Site to accomplish all work while protecting the public, workers, and the environment. The integration confirms that SRS can evaluate work and associated hazards, and that the Site adapts standards, practices and controls in a DOE-approved safety management system.

ISMS execution involves five functions: 1) defining scope of work, 2) analyzing hazards, 3) developing and implementing controls, 4) performing work, and 5) providing feedback and improvement. Likewise, SRS accomplishes the EMS objectives using the **Plan-Do-Check-Act** approach, where:

- **Plan**—defines work scope and objectives, identifies environmental aspects and analyzes hazards, and develops controls
- **Do**—implements these controls and performs the work (operations)
- **Check**—evaluates performance (feedback) and management reviews
- **Act**—embodies corrective actions, improvements, and incorporates lessons learned into practices

Figure 2-1 illustrates the integration that exists between the SRS ISMS and EMS.

Figure 2-1 Integrated Safety Management System Continual Improvement Framework within the ISO 14001 Environmental Management System

2.2 EMS IMPLEMENTATION

The Plan-Do-Check-Act approach applies to the Site's various work activities and functions, including policies, programs, and processes. It is integral to the Site's overall management of environmental compliance and performance.

2.2.1 Plan-Do-Check-Act: Plan

The Site establishes environmental objectives for each project and activity. Before SRS undertakes any actions or projects, it

evaluates associated environmental aspects and their impacts (or potential environmental hazards). The purpose of this is to ensure that SRS can control or mitigate the potential hazards or risks in order to reduce or eliminate impacts to the environment. The Site performs these evaluations against all applicable federal and state regulations, state permits, and local laws. These regulations and permits are the foundation for internal manuals, standard operating procedures, and standard requirement-implementing documents. Additionally, before DOE takes any actions, the Site develops a National Environmental Policy Act (NEPA) checklist to identify potential environmental impacts and environmental compliance requirements (e.g., federal/state permits, monitoring/reporting requirements, etc.) associated with proposed actions. This ensures proposed activities and projects consider the potential environmental aspects and provide mitigative solutions as necessary.

Another aspect of planning involves sitewide training for personnel and training to perform specific tasks and activities within a project's scope. SRS trains all employees on various policies and job-related requirements. The Site requires that every employee complete annual training. Employees must have General Employee Training upon beginning employment at SRS, and each year thereafter, they must complete Consolidated Annual Training. These courses ensure all employees are aware of the potential hazards and risks associated with work onsite. Task- and project-specific training includes skills development and safe-work practices.

Incorporating training and evaluating environmental aspects and their impacts into work planning ensures SRS will perform activities in a manner that protects the public, workers, and the environment. Additionally, the Site generates regular and routine employee written and multimedia communications as a reminder of the SRS commitment to environmental protection and stewardship.

2.2.2 Plan-Do-Check-Act: Do

Environmental Compliance Authorities (ECAs) and Environmental Subject Matter Experts (SMEs) support facilities and programs in identifying and carrying out their environmental responsibilities. The SMEs communicate environmental regulatory requirements to the SRS workforce and submit required documents to the United States Environmental Protection Agency (EPA), the South Carolina Department of Environmental Services (SCDES), and other stakeholders. ECAs work with the facilities to ensure that they implement the regulatory requirements.

DOE requires the Site to develop its *SRS Environmental Report* annually to inform the public of Site compliance with applicable environmental requirements and of the risk assessment of DOE operations. Chapter 3, *Compliance Summary*, of this report describes SRS's environmental compliance, provides the number of NEPA reviews, the number of SRS construction and operating permits, and the status of key federal and state environmental laws. Chapter 6, *Radiological Dose Assessment*, explains the risk assessment and dose calculations associated with DOE operations. Chapter 7, *Groundwater Management Program*, identifies SRS efforts to monitor, conserve, and protect groundwater and to restore contaminated SRS groundwater to EPA drinking-water quality standards while conforming to state and federal laws.

2.2.3 Plan-Do-Check-Act: Check

This phase allows for evaluation of how effective SRS is at meeting commitments and environmental objectives. All monitoring and measurement data is documented and maintained for assessment of how environmental performance changes over time. SRS evaluates environmental performance using both internal and external checks.

2.2.3.1 Internal Checks

Internal checks are performed via document reviews, interviews, facility walkthroughs, etc. to determine whether SRS conforms to its own policies and procedures. SRS assesses and evaluates Site work to ensure personnel are performing the work as planned and that Site operations are not adversely impacting worker and public health and the environment.

The Environmental Monitoring and Environmental Surveillance programs at SRS follow applicable requirements to collect and analyze samples across SRS and within a 25-mile radius extending from the center of the Site. Both programs (described in Chapter 4, *Nonradiological Environmental Monitoring Program* and Chapter 5, *Radiological Environmental Monitoring Program*) regularly examine whether all compliance obligations, including mandatory and voluntary commitments are being met while ensuring potential exposure to the public and environment is minimal and as low as reasonably achievable.

2.2.3.2 External Checks

SRS uses external assessments to evaluate Site work to confirm that work is performed as planned and that Site operations do not adversely impact worker and public health and the environment. Regulators from various state and federal government organizations perform external assessments of Site operations. SCDES conducts several inspections and audits annually to verify that the Site is complying with state permits. The EPA and SCDES participate in Federal Facility Act-driven inspections. The EPA may conduct compliance evaluation inspections or participate alongside SCDES inspections. Chapter 3, *Compliance Summary*, lists and gives results of the annual external agency audits and inspections of the SRS Environmental Program.

In 1995, SCDES enrolled in an Agreement in Principle (AIP) program with DOE at SRS. As a result, SCDES created the Environmental Surveillance Oversight Program (ESOP). Through the AIP grant, ESOP evaluates the adequacy of DOE activities related to environmental monitoring and reporting and confirms that DOE's activities have not adversely impacted public health and safety and the environment.

Every three years, a qualified independent certification auditor performs a conformity assessment of the SRS EMS including SRNS, BSRA, and SRMC. In 2024, the external audit identified no nonconformances and concluded the SRNS, BSRA, and SRMC EMS is conforming to ISO 14001:2015.

2.2.4 Plan-Do-Check-Act: Act

SRS enhances environmental performance and the health of the EMS through corrective actions and continual improvement. The Site establishes, implements, and maintains the corrective actions program in accordance with an internal manual for contractor assurance. It provides guidance to manage actual or potential conditions of nonconformity, for example, NOVs or findings and opportunities for improvement from internal assessments and audits. Chapter 8, *Quality Assurance*, summarizes annual improvements to the Site's Environmental Monitoring Program and laboratory performance in various proficiency and certification programs.

Communication is vital throughout all programs and activities to facilitate feedback and to incorporate lessons learned for improvement. This report and the accompanying *SRS Environmental Report Summary* also serve as communication tools for stakeholders, including the public, academia, SRS Citizen's Advisory Board, regulators, and other DOE sites.

2.3 STEWARDSHIP GOALS AND ACHIEVEMENTS

SRS ensures environmental compliance and stewardship are seamlessly incorporated into its activities and projects and addresses requirements for resource conservation, pollution reduction, and environmental surveillance. Metrics reporting in this chapter utilizes the DOE sustainability goals, which are recorded in the DOE Sustainability Dashboard. SRS uses the DOE Sustainability Dashboard and Site Sustainability Plan (SSP) to document environmental stewardship and waste minimization. The goals, which DOE sets annually for all sites, include the following:

- Reducing total energy use
- Increasing renewable energy use
- Reducing water use
- Purchasing environment-friendly, or "green," products and services
- Generating less solid waste
- Increasing the number of sustainable buildings
- Reducing fleet and petroleum use
- Using energy-compliant electronic devices

Updated annually, the Sustainability Dashboard and SSP outline the strategies in place and identify the Site's contributions to meeting DOE's objectives. The dashboard is the source of the goal performance information in Table 2-1. This table summarizes specific metrics as well as SRS's FY 2024 performance against the targets.

Table 2-1 FY 2024 Sustainability Goals, Metrics, and SRS Performance

Goal	Status
Energy Management	
Continue operation of the four biomass plants.	On track.
Implement/Identify Energy Conservation Measures (ECMs).	In fiscal year (FY) 2024, 16 buildings were audited. From those audits, 33 ECMs were identified. The identified ECMs included conversions to light-emitting diode (LED) lighting, replacement of end-of-life heating, ventilation, and air conditioning (HVAC) units and roof replacements that utilize cool roof technology. A strategy is being developed to prioritize projects to provide the greatest impact.
Clean and Renewable Energy	
Continue operation of the four biomass plants.	On track.
Plan for solar field development.	On track.
Water Management	
Reduce water use through low-flow device installation and replacement of degraded pipes.	SRS has found great results in water conservation through the continual inspection and immediate repairs of any leaks along the hundreds of miles of piping utilized across the Site. SRS will continue replacing aged water system piping, both proactively and in response to failures, and installing flow meters as budgetary constraints allow.
Continue to reduce non-potable (industrial, landscaping, agricultural (ILA) water consumption.	Due to consistent yearly rainfall, there is no irrigation or irrigation infrastructure onsite for decorative landscape. Thus, use of greywater and rainfall collection on a large scale has not been thoroughly explored.
Performance Contracting	
Continue to look for new opportunities for energy saving performance contracts (ESPC).	SRS has one active energy-saving performance contract, which is with Ameresco to operate the Biomass Cogeneration Facility (BCF) and additional biomass plants.
Sustainable Buildings	
Complete preventative maintenance and energy efficient repairs.	Ongoing efforts.
Evaluate buildings that are meeting a significant portion of the Guiding Principles for Sustainable Buildings.	During FY 2024, SRS conducted an evaluation to determine if third-party verification was required for Sustainable Federal Building compliance. SRS determined “self-compliance” is achievable. However, meter installation will be required prior to being able to apply for Sustainable Federal Building compliance. Due to the size of the Site and number of buildings, meter installation will be installed in a staggered approach, as budgetary constraints allow. There are 2-meter installation projects scheduled for FY 2025.

Table 2-1 FY 2024 Sustainability Goals, Metrics, and SRS Performance (continued)

Goal	Status
Waste Management	
Continue to divert at least 50% of sanitary waste to recycle.	On track.
Continue to recycle excess and construction related waste.	On track.
Energy Management, Building Evaluations, Benchmarking	
Conduct 15 Energy Independence and Security Act (EISA) audits.	In FY 2024, sixteen buildings were audited. From those audits, thirty-three ECMs were identified. The identified ECMs included conversions to LED lighting, replacement of end-of-life HVAC units, and roof replacements that utilize cool roof technology. SRS will be applying a graded approach to maximize funding resources.
Perform building upgrades for LED, HVAC, building automation, metering, rightsizing of equipment, and other applicable ECMs.	SRS demonstrated continued success in FY 2024 with the completion of several energy efficiency efforts; 1 building had an overall LED lighting replacement, 1 supply basin platform had exterior lighting replaced with LED lights, lighting of 1 cooling tower was converted to LEDs, and 22 HVAC units were replaced with more energy efficient units. As part of right-sizing efforts and to reduce the SRS infrastructure footprint, approximately 2 miles of high-risk sections of abandoned 13.8kV and SCADA overhead power lines were removed, 500 ft of abandoned steam lines were removed, and a Powerhouse was deactivated.
Fleet Management	
Continue to replace vehicles with Alternative Fuel Vehicles (AFVs) and obtain low GHG emission vehicles.	At the close of FY 2024, 25% of the light-duty SRS fleet had been converted to zero-emission vehicles (ZEV). Of the 155 light-duty ZEVs onsite, 12 are electric vehicle (EV) sedans, 91 are EV pickup trucks, 50 are plugin hybrid electric vehicle (PHEV) minivans, and 2 are PHEV SUVs. Additionally, in FY 2024, SRS received three medium-duty ZEV; two EV cargo vans and one EV truck.
Install 16 charging stations for 62 Battery Electric Vehicles (BEH).	SRS has 16 ZEV charging stations located at 3 strategically placed locations across the Site. These 16 charging stations are a combination of 8 level 3 DC fast chargers and 8 Level 2 chargers. All 16 chargers have the ability to charge a total of 24 vehicles simultaneously.

Table 2-1 FY 2024 Sustainability Goals, Metrics, and SRS Performance (continued)

Goal	Status
Acquisition and Procurement	
Include statutory requirements for sustainable acquisition in applicable contract actions.	On track.
Evaluate actions to ensure sustainable acquisitions.	On track.
Electronic Stewardship	
Acquire electronics that are sustainable.	SRS continues to purchase energy efficient electronics to the maximum extent possible.
Continue to recycle electronics by donating to schools, non-profit organizations, or by using authorized recycling companies.	On track. SRS continues the electronic recycling programs.
Greenhouse Management and Reporting	
Operate four biomass plants.	SRS continues to operate four biomass plants.
Continue E-85 usage and alternative fuel vehicle leases.	On track.
Continue to monitor fugitive emissions with the Chemical Safety Environmental Management System (CHMEMS) Software.	On track.
Utilize online communication services for teleconferences to reduce travel requirements.	In FY 2024 both ground and air travel showed reductions.
Resilience	
Continue to complete resilience projects	SRS defined actionable resilient solutions projects as projects that aid in SRS being able to withstand and recover from deliberate attacks, accidents, or naturally occurring threats or incidents. Forty-eight resilient solutions projects were completed in FY 2024. SRS continues to identify additional resilient solutions projects as the need arises, while simultaneously completing projects that have already been identified.

2.3.1 Energy Management

SRS demonstrated continued success in 2024 by completing the following energy efficiency efforts:

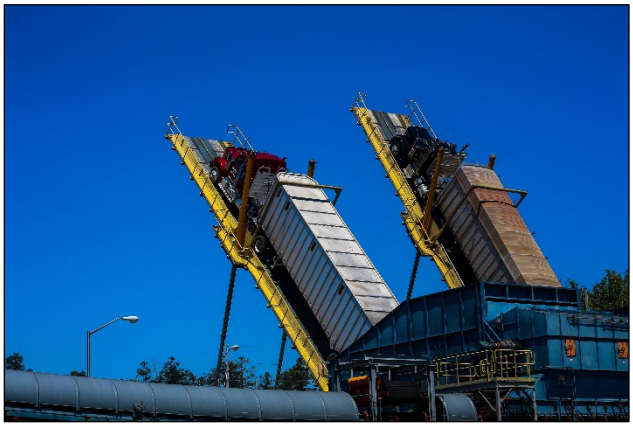
- Upgraded building interior and exterior lighting by utilizing light-emitting diodes (LEDs).
- Upgraded heating, ventilation, and air conditioning (HVAC) units by using more energy-efficient units.
- Reduced the footprint of SRS infrastructure through rightsizing, including removal of approximately 2 miles of high-risk sections of abandoned 13.8 kilovolt (kV) and Supervisory Control and Data Acquisition (SCADA) overhead powerlines, removal 500 feet of abandoned steam line, and deactivation of the 784-A Powerhouse.

SRS conducted energy audits of buildings under Section 432 of the Energy Independence and Security Act of 2007 (EISA). Under this program, SRS has identified 63 Site buildings that are subject to EISA

audits because each one helps to constitute 75% of the Site's energy use. The number of buildings subject to EISA audits may change annually as buildings are constructed, repurposed, or removed from service. Identified buildings must undergo a comprehensive energy and water evaluation once every four years. The Site completed 16 audits in FY 2024. From the 16 buildings audited, 33 energy conservation measures (ECMs) were identified, including conversions to LED lighting, replacement of end-of-life HVAC units, and roof replacements that utilize cool-roof technology.

2.3.2 Clean and Renewable Energy

SRS utilizes a large Biomass Cogeneration Facility (BCF) to generate steam for operational processes. Additionally, the BCF utilizes excess steam to generate electricity to the grid thereby reducing purchased electricity demand. The biomass plant uses wood chips as a primary fuel source. Tires and fuel oil are used as secondary sources. SRS produces all the steam used onsite from four biomass plants, including the large BCF and three smaller plants in A Area, K Area, and L Area.



At the Biomass Cogeneration Facility, Filled Trucks Are Lifted in the Air to Unload Their Wood Chips, Which Will Be Used to Generate Electricity.

In 2024, SRS focused its efforts on finding locations onsite that were appropriate for future installation of two approximately 75-megawatt (MW) solar arrays. SRS evaluated 11 separate locations for viability and eventually decided upon two locations that would not impact mission priorities, would minimize the impact on the environment, and were accessible from public roadways. Prior to land lease negotiations being concluded, Site Use Permits were routed, in part, to determine whether there would be negative impacts from the permanent clearcutting of the chosen forested areas. DOE selected Stellar Renewable Power, LLC and Ameresco Federal Solutions to lease land at SRS upon which each company would build and maintain an approximately 75-MW solar array. The United States Army Corps of Engineers (USACE) were contracted to perform the required Environmental Baseline Study (EBS) for both sites, which will be completed in 2025. In addition, selected areas still need to undergo both a National Environmental Policy Act (NEPA) review and a National Historic Preservation Act (NHPA) survey before construction can begin.

2.3.3 Water Management

It is SRS's goal to reduce potable and non-potable water use. By the end of FY 2024, SRS decreased potable water use by 10.8% from FY 2023 and achieved a cumulative reduction of 24.9% from the 2007 baseline. In FY 2024, SRS installed touchless restroom fixtures in three buildings. Studies have shown that touchless fixtures can result in 30-50% water conservation over conventional faucets.

In a multiyear project, SRS has outlined a strategic plan to replace at-risk sections of pipe to mitigate leaks resulting from aged and degrading underground pipe. SRS routinely monitors for leaks and maintains response crews that quickly and efficiently respond and conduct necessary repairs to minimize service interruptions and water waste. SRS continuously monitors water pressure across the Site and routinely conducts physical examinations of above-ground piping.

2.3.4 Performance Contracting

SRS has used Energy Saving Performance Contracting (ESPC) to engage Ameresco Federal Solutions in several projects that conserve energy and water. ESPC funds energy- and water-saving building improvements with future energy savings. Ameresco Federal Solutions operates the Biomass Cogeneration Facility (BCF) at SRS. This facility produces steam and electricity on a 24-hour-a-day, full-time basis. The BCF was constructed and completed in 2012 and replaced the more than 50-year-old coal-fired steam and electrical-generation plant. The BCF is in the 12th year of a 21-year ESPC period. Realization of cost savings will increase significantly after year 21, when the facility's mortgage debt has been satisfied. Ameresco also operates steam-only biomass plants for heating buildings in K Area and L Area at SRS.

2.3.5 Sustainable Buildings

SRS has a goal for new construction and major renovations to conform to applicable building energy-efficiency requirements and sustainable design principles, to consider building efficiency when renewing or entering leases, and to implement space utilization and optimization practices. The Guiding Principles address the following six sustainable principles for new construction and modernization and for existing buildings:

- Employ integrated design principles
- Optimize energy performance
- Protect and conserve water
- Enhance the indoor environmental quality
- Reduce the environmental impact of materials
- Assess and consider building resilience

The updated Guiding Principles include a new requirement that the square footage must be greater than 25,000 square feet for a project to be considered a sustainable building. Therefore, the two buildings SRS historically claimed no longer count toward the goal due to the square footage being less than 25,000 square feet. Because of this, at the end of FY 2024, SRS had no buildings count as complying with the Guiding Principles for sustainable buildings. However, SRS has identified several buildings that can meet the Guiding Principles with minor renovations within the next five years. The Site is also planning to review proposed building projects for possible future inclusion.

Most buildings at SRS are aging and are not cost effective to upgrade. This is based on the type of construction (process facilities) and budget constraints required to modify existing facilities. However,

the SRS emphasis on maintenance, repairs, and ECMs identified in EISA audits (LED lighting upgrades and more efficient HVAC systems) supports the goals detailed in the directive.

2.3.6 Waste Management

Pollution prevention is a commitment in the SRS Environmental Policy. Environmentally safe and cost-effective reuse or recycling diverts pollutants and wastes from the waste stream. Pollution prevention at SRS reduces wastes, mitigates health risks, and protects the environment.

By the end of FY 2024, SRS diverted 58.5% of municipal solid waste, thereby surpassing the annual goal of 50% diversion. SRS diverted 400 metric tons of municipal solid waste out of 684 metric tons. The Site recycled 276 metric tons of routine waste (typically office- and municipal-type waste) through the North Augusta Material Recovery Facility (NA-MRF). SRS works with the NA-MRF to enhance the process to attain and improve upon a 50% recovery rate. SRS continues to monitor this waste stream for opportunities to recycle materials. In addition, SRS shredded and recycled 124 metric tons of sensitive office paper through its contract with Augusta Data Storage.

By the end of FY 2024, SRS diverted 7.9% of C&D materials and debris, thereby not meeting the 50% diversion goal. C&D debris includes waste generated from constructing, remodeling, repairing and deconstructing buildings, roads, bridges, and drainage and sewage systems. This debris is often concrete, asphalt, glass, metal, plastic, and land-clearing scrap. In FY 2024, the Site diverted 3,295 metric tons of the 41,575 metric tons of C&D waste generated.

Future road projects and construction projects may present opportunities for diverting C&D waste. However, the low cost of onsite C&D landfill services and limited cost-effective reuse options for scrap debris significantly challenges cost-effective recycling options beyond what is already executed.

SRS has improved the diversion rate of waste streams from landfills through initiatives, such as removing items that include nonradioactive scrap metal and scrap furniture from the waste stream and creating avenues for recycling. Universal waste is another source that includes batteries, mercury-containing equipment, and light bulbs. Universal waste must be recycled when generated by businesses; otherwise, the waste must be sent to a Resource Conservation and Recovery Act-permitted facility. Table 2-2 breaks down the recycled waste amounts for FY 2024.

Table 2-2 SRS Recycling and Sustainability in FY 2024 by Amount

Items Recycled in FY 2024	Amount Recycled
Concrete and Asphalt	19,507,200 pounds
Scrap Metal	5,308,350 pounds
Office Paper	881,849 pounds
Furniture	383,790 pounds
Lead Acid Batteries	79,904 pounds
Consumer Electronics	76,746 pounds
Used Tires	34,833 pounds
Universal Waste - Fluorescent Lamps	18,287 pounds
Toner Cartridges	13,355 pounds
Refrigerants	10,309 pounds
Universal Waste - Batteries	4,741 pounds
Used Oil	2,500 gallons
Universal Waste - Aerosol Cans	2,469 pounds
Silver Fixative	789 pounds
Universal Waste - Mercury-Containing Devices	< 1 pound

2.3.7 Fleet Management

In FY 2022, SRS developed the SRS Electric Vehicle (EV) Implementation Plan. The five-phase plan maps out the infrastructure requirements needed to support fleet conversion. In FY 2024, the Charging Infrastructure Strategic Planning (CISP) was completed and detailed the EV charging infrastructure analysis and outlined SRS EV fleet transition scenarios. Phase II of the EV Implementation Plan was launched in FY 2024 and identified three new locations for the installation of an additional 18 Electric Vehicle Supply Equipment (EVSE). Once installed there will be a total of 52 charging ports at six strategically placed locations across SRS.

At the close of FY 2024, 25% of the light-duty SRS fleet had been converted to zero-emission vehicles (ZEVs). In addition, SRS received three medium-duty ZEVs: two EV cargo vans and one EV truck. In FY 2024, SRS received the Green Fleet award which recognized SRS's accomplishments in converting its fleet to ZEVs and included a $250,000 grant to further support ZEV acquisition and improving EV charging infrastructure across the Site.

2.3.8 Acquisition and Procurement

SRS has an ongoing goal to track and make improvements for acquiring, using, and disposing of products and services (including electronics). SRS maximizes acquisition of designated products by procuring:

- Products that meet minimum requirements for recycled content as the EPA identifies
- Products that the United States Department of Agriculture (USDA) designates as biobased or BioPreferred®
- Products that maximize substituting alternatives to ozone-depleting substances the EPA's Significant New Alternatives Policy (SNAP) identifies
- Products that meet Electronic Product Environmental Assessment Tool (EPEAT) standards or those that the EPA's ENERGY STAR® program designates as having the potential to generate significant energy savings

Procurement continues to support the subsequent actions and initiatives of other SRS entities (engineering, maintenance, and infrastructure organizations) by procuring environmentally preferable product (EPP) alternatives as recommended for Site utilization. SRS and its contract partner, Savannah River Nuclear Solutions (SRNS), were recognized as a 2024 EPEAT Purchaser Award winner, celebrating leaders in sustainable electronics procurement. This national recognition by the Global Electronics Council (GEC), the non-profit organization managing the EPEAT ecolabel, emphasized the environmental benefits and energy-related savings obtained by SRS.

2.3.9 Electronics Stewardship

SRS implements many strategies to reduce energy use, waste, and costs associated with electronics by:

- Purchasing computers rather than leasing
- Procuring desktops, laptops, and monitors that meet EPEAT standards and copiers that are ENERGY STAR-compliant
- Setting up all eligible computers and imaging equipment to automatically print on both sides of paper (duplex printing)
- Programming all eligible desktops, laptops, and monitors to default to power-save mode when in standby

The Site either recycles or reuses electronics in an environmentally sound manner by donating to schools and nonprofit organizations or by recycling through authorized vendors. After donations, SRS recycled 100% of its remaining electronics through a certified recycler, thereby meeting the goal of 100% recycling or donating.

In 2024, 100% of eligible computers and monitors implemented and actively used power management features, and 100% of eligible printers implemented and actively used duplex printing features.

Additionally, SRS's extension of the time frame for replacing a computer from three to five years has significantly reduced the number of computers being retired and the amount of scrap electronics generated.

2.3.10 Data Center Efficiency

SRS strives to implement practices that promote managing servers and federal data centers in an energy-efficient manner. Data centers are energy-intensive operations that contribute to agency energy and water use and costs.

One measure of energy efficiency for data centers is power usage effectiveness (PUE), which is the ratio of total energy used by a computer data center facility to the energy delivered to the computing equipment. While no specific target PUEs have been set, agencies are collecting data. Of the nine data centers at SRS, only the Central Computing Facility has an electrical meter to determine actual power consumption. Therefore, determining the actual power consumption (and thus, PUE) is not currently possible.

2.3.11 Adaptation and Resiliency

SRS has the goal to prioritize actions that enhance the resilience of federal infrastructure and operations. SRS ensures that federal operations and facilities can continue to protect and serve citizens in a changing climate.

SRS has collected weather data onsite for decades to define extreme events and make decisions regarding extreme weather event procedures for resilience-planning scenarios. Based on a plan using this information, SRS defined actionable resilient solutions to mitigate the most probable high impact weather events (i.e., heat waves, lightning, precipitation, ice storms, tornados, wildfires, and droughts) that threaten the Site. The 48 completed resilient solutions projects in FY 2024 included; repair and replacement of various electrical feeders, installation of new transformers, repair and replacement of critical components for a cooling tower, and HVAC replacements with more energy efficient units. These projects focus on improvements to aid in faster recovery times from adverse events.

SRS supports emergency situations through the Emergency Response Organization (ERO). The ERO provides an in-command response to emergencies and recoveries as applicable. The organization also has regularly scheduled facility and sitewide drills and exercises involving accidents, spills, and natural disaster scenarios to better respond to and recover from such disruptions should they occur.

2.4 EMS BEST PRACTICES (COMMUNITY—WORKFORCE—OUTREACH)

SRS implements EMS best practices to further reduce impacts from Site missions on the environment and surrounding community.

2.4.1 Community Outreach

SRS is committed to continuing to support programs and activities to support communities within 50 miles of the center of SRS and reducing socioeconomic and environmental impacts to all communities.

SRS provides opportunities for community engagement and decision-making through information sharing and empowering communities around the Site. SRS continues to expand its outreach with educational opportunities and access to information on SRS operations and environmental and public health risk assessments. Outreach programs at the Site include educational opportunities, workforce development, and community advocacy and outreach.

2.4.1.1 Educational Opportunities

U.S. Department of Energy-Savannah River partners with SRS's Education Outreach Programs (EOPs) to provide a variety of science and literacy outreach programs that focus on enhancing interest in Science, Technology, Engineering and Mathematics (STEM) and to support improvements in education in the Central Savannah River Area (CSRA) by using the unique resources available at the Site.

Additionally, SRS's EOPs provide employees the opportunity to support the education community through volunteering. These initiatives help build programs and partnerships with regional educational institutions that encourage students to pursue careers in STEM disciplines. Through these efforts, the intent is to create a local pool of job candidates with the necessary core competencies to support future missions at SRS and other regional industries.

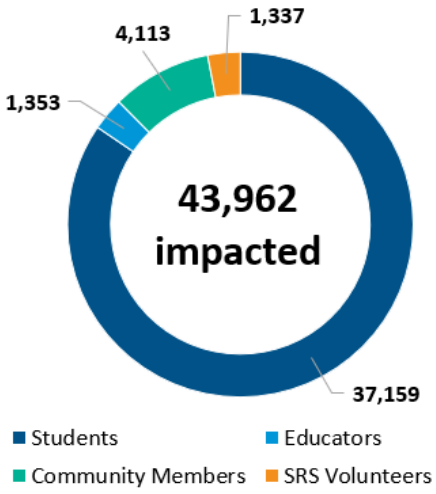


Figure 2-2 Impact of Education Outreach Programs in 2024

Typically, EOPs reach a population of students and teachers in an eight-county area within the CSRA through a variety of programs and events. The service area includes Aiken, Allendale, Bamberg, Barnwell, Edgefield, and Orangeburg counties in South Carolina and Columbia and Richmond counties in Georgia. In 2024, outreach programs intended to expand educational achievement. The following were some of the educational programs offered in 2024:

- Thirteen teams competed for the state championship in the 24th annual **DOE Savannah River Regional Science Bowl**. Like "Jeopardy", this timed competition of fast-paced questions and answers covers a range of academic disciplines in science and math. Lakeside High School earned the right to compete nationally in Washington, D.C. in late April 2024. Students not in the double elimination matches participated in a Brain Teaser activity sponsored by SRNS and the American Chemical Society. Only three DOE sites have participated since inception, and SRS is one of the three.
- The **SRNS Innovative Teaching Mini Grants Program** is a competitive program that recognizes and celebrates innovative teaching methods by providing funds to enhance elementary, middle, and high school classroom instruction. SRNS awarded grants of $500, $750, and $1,000 to purchase STEM equipment, materials, and supplies for the classroom for educators within the eight-county service area. In 2024, SRNS funded 114 grants, totaling $75,000 and impacting

17,534 students.

- The objectives of the **Medical Job Shadow Program** are to give nursing students from University South Carolina Aiken (USC Aiken) an opportunity to experience an occupational medical program environment and to gain insight into the practice of occupational nursing in an industrial setting, as established through a Memorandum of Understanding (MOU) between the USC Aiken and SRNS. This opportunity allows individual nursing students, during his or her course of study, to job shadow at SRS Site Medical.
- **STEM that Travels** serves to involve students and educators with volunteer STEM professionals from the site offering hands-on learning activities while discussing careers that shape the workforce. This includes mentor support of projects, school organized Science and Math Days, Career Fairs, Workshops, Summer Camps, Classroom Requests, and Community STEM Festivals.
- **STEM Like a Girl**, in celebration of Nuclear Science Week, a daylong Saturday event held at the Ruth Patrick Science Education Center, USC Aiken, encouraged 58 8th grade girls, from 31 area middle schools to pursue STEM career fields, such as engineering or information technology (IT). Activities were led by 53 women in areas of robotics, coding, design engineering, and electrical circuits. In follow up survey responses, a majority of the girls reported a new interest in pursuing STEM career fields.
- **STEM Pals** program seeks to demystify STEM careers, humanize STEM professionals and empower students to explore new opportunities through letter writing. Educators initiate the relationship by drafting letters that contain questions from the students on STEM-related topics and careers. SRS volunteers, as Subject Matter Experts, reply to the students, often with follow up opportunities to engage with students in-person, in the school setting.
- In celebration of National Engineers Week and National Job Shadow Day, SRNS Education Outreach and SRNS Engineering offered the program, **Discover Engineering – SRNS Engineers in the Classroom**, to eight CSRA middle schools. Through this program, engineers visited middle school classrooms to speak to students about engineering careers, conduct a hands-on demonstration or activity with students, or both. This impacted 1,484 students and 19 educators.
- **Student-Focused Career Tours** were offered throughout the year. This program focuses on secondary and post-secondary students in multiple areas, including electrical and instrumentation mechanics, maintenance mechanics, apprenticeships, IT, environmental science, machining, and various areas of construction. Offering this unique experience brings awareness of careers that help build a workforce for SRS, our community, state and nation.
    - Students and educators from Barnwell Career Center visited for a career day focused on construction and welding, labor relations, and union craft.
    - Students and educators from Marion Barnes Career Center visited for career day focused on classes taught on Electrical and HVAC.
    - Aiken County students, supporting Aiken Works, participated in a National Job Shadow Career Tour.

  - Dell Program students and educators from North Augusta High School participated in an IT Career Tour of the Data Center and PC Administration facility.
  - A team of three faculty and eight student researchers, from Duke University, Nicholas Institute of Energy Environment and Sustainability, traveled to Aiken to participate in daylong activities involving nuclear energy, historical and current.
  - Students from Edisto High School Student Tour attended a student career tour focused on workforce careers in technical areas. Working with the South Carolina Department of Education and Workforce (DEW), arrangements were made to host students from the low county.

- **Educator-Focused Career Tours** were held for career counselors, regional workforce advisors, and university faculty in the surrounding counties. The SRS Educator Tours focused on the industrial workforce against the backdrop of the nuclear industry. By reaching the education community, information can then be shared with countless students, to include adult programs.
  - Faculty from Winthrop University visited, per an MOU, to tour and meet key leaders, gain Site exposure, and gather information on internship and apprenticeship student partnerships. The faculty had an opportunity to tour the Environmental Bioassay Lab.
  - A group of 23 participants representing 17 education and workforce development organizations participated in a multi-regional educator tour of SRS. The group ranged from high school teachers to regional workforce advisors across 12 counties from the Upper Savannah Region, Lower Savannah Region, and Lowcountry.
- **Career Speakers** traveled to career fairs and classrooms helping students connect with opportunities and putting a face to potential future professions.
- **In-Person and Virtual Field Trips** to SRS were offered and enriched classroom instruction with field investigation for students and educators in kindergarten through 12th grade. These field trips were offered through the Science and Technology Enrichment Program (STEP).
  - Virtual Education Outreach released a fourth virtual field trip in 2024, I Spy Math in Nature, which aligns with state standards for kindergarten through 3rd grade. Accompanying resources include an activity sheet, teacher key, vocabulary list, and identification of applicable state standards. This was also offered as a free resource to educators worldwide through the National Science Teaching Association's (NSTA) website.
  - In-Person field trips to SRS were offered to students and educators. Lessons utilize real-world investigations that focus on science and math. The program allows students to make use of SRS natural resources, trading classrooms for the trees and waterways of SRS. Classes can include analyses of aquatic ecosystem limnology, which includes biological, chemical, physical, and geological characteristics.
- The **CSRA College Night**, held annually since 1993, brings over 100 colleges and universities to area students, parents, and members of the community and provides opportunities to meet with representatives, professional societies, and branches of the military. Seminars and the SRS

Career Lane offer discussions on the workforce, apprenticeships, and financial aid. Seniors were eligible to win one of fifteen $1,000 scholarships though a random drawing of attending students. In 2024, College Night impacted 4,720 students and parents and 177 SRS volunteers.

2.4.1.2 Workforce Development

SRS engages the local workforce to create a capable workforce through funding, outreach programs, and hands-on training. These programs provide individuals in the local communities with technical skillsets necessary for DOE mission-critical careers. This outreach allows for meaningful involvement of individuals from the surrounding communities affected by Site operations. The following are some of the programs in 2024 related to workforce development:

- Local universities and colleges partnered with DOE and SRS are educating the workforce on DOE missions. The Workforce Opportunities in Regional Careers (WORC) Grants also fund this mission and partner with various local colleges to ensure its success. WORC I academic partners are Aiken Technical College, USC Aiken, USC Salkehatchie, Augusta Technical College, and Augusta University. WORC II academic partners are Aiken Technical College, Augusta Technical College, Augusta University, Claflin University, USC Aiken, and USC Salkehatchie.
- Internships offered at SRS during the summer and year-round provide technical skills and workplace experience in the student's field of study. This allows students in schools across the country, but specifically in South Carolina and Georgia, to gain technical experience, creating a conduit for transitioning from internships to jobs at SRS. Additionally, the internship program educates students on historical and current operation missions at SRS and provides opportunities for students to network and volunteer in the community.
- The apprenticeship program, partnered with Apprenticeship Carolina and the Lower Savannah Council of Governments, is developing a viable workforce in the counties neighboring SRS. The program provides apprentices paid on-the-job experience as they pursue a technical education. Unlike internships, apprenticeships promote and document knowledge transfer and provide participants with proof of skill mastery as portable U.S. Department of Labor credentials. The program also consists of youth- and collegiate-levels, which provide an important avenue into employment for students who are facing social, educational, and economic barriers.
- SRS attended local technical schools, university, and veteran outreach recruiting events, specifically ensuring representation in South Carolina low country counties (Barnwell, Allendale, Denmark, Bamberg, and Orangeburg).
- SRS hosted a low country region recruiting event in Blackville, South Carolina, for radiological protection and control, maintenance, and production operators. Additionally, in-person recruiting events for IT, engineering, and project controls, resulted in successful hires in critical skill areas.
- SRS increased the number of Memoranda of Understandings (MOUs) to support SRS workforce development needs and missions that bridge the gap between academic study and professional practice. SRNS now has MOUs with 13 different educational institutes, nine of which are Historically Black Colleges and Universities (HBCUs).

- In support of pipeline development efforts by assisting NNSA with the Higher Education Workforce Development funding initiative, SRS facilitated the award of $5.9 million in funding through collaboration with local HBCUs.

2.4.1.3 Community Advocacy and Outreach

SRS engages the community by working with advocacy groups, updating the community on current operations, and providing resources and materials. SRS continues to support community outreach initiatives to foster a climate of trust and partnership with stakeholders on a variety of community- and SRS-related issues. Through direct corporate sponsorship and responding to community and regional needs, SRS and its employees are active leaders in community service. SRS has a significant economic development impact across the region, and the Site supports local colleges and schools, nonprofits, and many other worthwhile causes in both Georgia and South Carolina. These and other programs provide individuals in the community with decision-making, educational opportunities, and tangible resources.

The following are some of the programs related to community advocacy and outreach:

- The SRS Citizens Advisory Board (CAB) is a stakeholder group of individuals from South Carolina and Georgia counties affected by Site operations. The SRS CAB provides advice, information, and recommendations to DOE on issues that affect the Environmental Management program at SRS.
- The SRS Community Reuse Organization (SRSCRO) is a private, nonprofit organization that develops and implements a comprehensive strategy to diversify the economy around the Site. SRSCRO ensures that SRS excess and operating resources benefit the economic well-being of the surrounding areas. It also assists new and expanding businesses and industries through its programs. SRSCRO has several grants from DOE that help advance education, training, and historical preservation in the region. Additionally, the organization has two WORC grants in effect to strengthen the local workforce pool needed to support DOE missions.
  - For the WORC I Grant (2016-2026), SRSCRO is the fiscal agent coordinating the WORC program with regional colleges and universities to support training in various science, technology, and engineering-based fields.
  - For the WORC II Grant (2020-2025), SRSCRO received an additional grant to boost workforce development to support the NNSA-proposed plutonium pit mission, the long-standing tritium mission, and the surplus plutonium disposition missions at SRS. SRSCRO accomplishes this through partnerships with local colleges and universities.
- The SRS Tour Program offers both virtual and onsite tours to the public. The tours allow visitors to gain an understanding of the DOE facilities, missions, and the workforce that changed the face of nearby counties and helped the United States during the Cold War. Guests to the Site will also learn about current and future DOE-EM and NNSA missions at SRS. The tour includes a visit to the University of Georgia's Savannah River Ecology Laboratory (SREL), where participants learn about the laboratory's history and mission and get an up-close view of animals found on the Site.

- SRNS Corporate Communications mails *Environmental Bulletins* to neighboring landowners. This makes certain the property owners, who wish to receive a bulletin, are aware of activities occurring at the Site. SRS also publishes the document on its webpage.

2.4.2 Earth Day

For 2024, SRS held an Earth Day celebration with the theme "Make Every Day Matter." SRS Earth Day celebrations increase awareness of Environmental Stewardship and, more specifically, the EMS program. Earth Day booths were available during the SRS 2024 Safety Exposition. The booths represented Environmental Compliance, Environmental Monitoring, and Site Services. Information was presented on recycling and waste minimization and introduced individuals to the Environmental Compliance Authorities (ECAs) at each facility. Outside organizations with booths included South Carolina Department of Environmental Services, both State and Aiken County Offices, which discussed local environmental concerns.

2.4.3 Reuse or Recycling of Equipment and Materials

SRS partnered with SRSCRO to turn excess equipment and material into revenue that benefits Aiken, Allendale, and Barnwell counties in South Carolina and Richmond and Columbia counties in Georgia. Surplus equipment and materials include the following:

- Small items, such as office equipment, valves, and glassware for laboratory experiments
- Large items of potentially much greater value, such as electrical turbines, diesel-powered pumps, and fire engines
- Hundreds of thousands of tons of metal

SRSCRO is the interface organization that, in addition to coordinating the WORC grants, takes in items that the Site no longer needs through the Asset Transition Program and Asset Removal Projects. The organization sells these items and uses the proceeds for the economic good of numerous businesses throughout the large region surrounding SRS. SRSCRO helps technology-based startups, business expansion, and new ventures across the Aiken, Allendale, and Barnwell counties in South Carolina and Columbia and Richmond counties in Georgia. The program has had an estimated savings from the SRS asset transition program since 2013 of $173 million.

SRS utilizes the Federal Prison Industries, Inc. (UNICOR) services to recycle electronics. UNICOR operates electronics recycling centers that convert electronics into recyclable materials for resale to registered vendors. UNICOR vendors must abide by an environmental commitment that requires signing no-landfill certifications, following restrictive export policies, and agreeing to site inspections. UNICOR's services directed 100% (117,446 pounds) of SRS scrap electronics for recycling in FY 2024.

2.4.4 Sustainable Environmental Remediation

SRS continues to excel in efficient sustainable remediation. Of the 41 remediation systems currently operating, 25 are completely passive, requiring no energy to implement, and 13 are low-energy systems. These low-energy systems use low-cost sustainable technologies, such as solar-powered microblowers and barometric pressure-driven BaroBalls™, to pump volatile organic contaminants from the subsurface, thus reducing contamination in soils and groundwater. SRS is also using the HydraSleeve™ sampling methodology for more than 240 wells, which significantly reduces excess groundwater that needs to be managed as waste.

In 2024, SRS continued monitoring to ensure the effectiveness of the lower-energy, innovative methods to address groundwater cleanup implemented in 2019. These included injecting a vegetable-oil microbe mixture into the subsurface to intercept a groundwater plume and break down trichlorethylene (TCE) and injecting recycled iron into a series of wells to form these *in situ* remediation systems that intercept the groundwater plume and breaks down TCE.

In both examples, using these *in situ* remediation systems utilizes the natural flow of the groundwater plume. The systems are passive and do not require pumps or equipment to move groundwater. SRS anticipates the vegetable oil to be effective for three to five years before it needs to be reinjected into the subsurface, and the iron permeable reactive barrier will be effective for decades with little maintenance.

Over 60 years of power plant operation, which generated acidic materials and metals associated with coal, has made an impact on the groundwater in D Area. The coal-powered plant, which began operations in 1952, produced electricity for D Area and other parts of SRS until 2012. Even though the coal was removed in 2012-2013, decades of rainwater passing through the coal on the ground left the soils underneath acidic. Metals leached from the coal and natural soil minerals, causing shallow groundwater contamination. It is common in the United States for contamination such as this to exist where coal was used for power production.

This unique groundwater remediation system is saving millions of dollars compared to traditional technologies that are not as sustainable, passive, or cost effective. This system passively ensures a neutral buffering to the groundwater to help correct the currently overly acidic conditions caused by the decades of coal storage in the area.

While this passive technology project is adjusting the balance of the groundwater below the coal storage and runoff basin areas, it will take time to see the groundwater restored to pristine conditions. By the end of 2024, a total of 124 million gallons had been injected.

SRS continues to use remotely operated devices (drones and wireless stormwater sampling equipment) discussed in *SRS Environmental Reports* from previous years. Not only do these devices address environmental remediation, improve worker safety, and increase productivity, but they also decrease vehicle and fuel use, thereby supporting fleet management goals.

2.4.5 Innovative Environmental Compliance

SRS continues to deploy innovative methods to address compliance efforts. SRS utilizes a commercially available Comprehensive Environmental Permits Linking Tool (CEPLT), known as Benchmark ESH I Gensuite, to track regulatory and DOE commitments. The Compliance Calendar module allows SRS users to create and track regulatory commitments (tasks) that can be assigned to an SRS Benchmark user. Permit Manager organizes permits, regulations, and other environmental requirement documents (for example, consent orders and DOE Orders) and links to Compliance Calendar. Using Benchmark increases accountability and awareness of regulatory and DOE Order commitments and helps improve environmental compliance. In FY 2024, CEPLT allowed all Compliance Calendar task metric reporting to be tracked, completed, and supplied to DOE on or ahead of schedule.

In 2024, SRS developed the Air Compliance System (AirCS) to manage data and permit requirements associated with the Site's Title V Permit. The custom application allows SRS flexibility to quickly modify software to align with changing Site conditions and federal and state regulations.

2.4.6 Challenges and Barriers to Implementation

EMS implementation can often pose a variety of challenges for any organization. Identification of the factors that hinder implementation of EMS are essential for continuous environmental improvements. Below are some of the challenges or barriers that have been identified in the implementation of the SRS EMS and, where relevant, how the site is working to overcome these.

2.4.6.1 Energy Management Challenges

There are challenges at SRS related to energy management. One key challenge is the inability to accurately measure, monitor and control energy usage of individual buildings on the Site. Of the 4,500 buildings and structures located at the Site, only 46 buildings are equipped with individual meters. The sensitive nature of some of the missions at the Site requires a level of security which does not currently accommodate "smart" meters. Furthermore, proper benchmarking of a facility at the Site is also problematic without individual metering.

2.4.6.2 Water Usage Challenges

To reduce potable water use, water conservation efforts were utilized across Site, such as installation of touchless restroom fixtures in four buildings. To help overcome any challenges, SRS has outlined a multi-year strategic plan to replace at-risk sections of pipe to mitigate leaks resulting from aged and degrading underground pipe. However, continued water conservation efforts will face a reasonable challenge to reaching the FY 2030 goal of 50%, due to budget limitations for new major water-efficient equipment.

2.4.6.3 Building Efficiency Challenges

SRS demonstrated continued success in FY 2024 with the completion of a number of energy efficiency efforts. In FY 2024, 16 buildings were audited. From those audits, 33 energy conservation measures (ECMs) were identified. The identified ECMs included conversions to light-emitting diode (LED) lighting,

replacement of end-of-life heating, ventilation, and air conditioning (HVAC) units, and roof replacements that utilize cool roof technology. SRS will be applying a graded approach to Deep Energy Retrofits (DER) to maximize funding resources. One challenge is that a strategy still needs to be developed on bundling and prioritizing projects to provide the greatest impact.

2.4.6.4 Fleet Management Challenges

Two challenges currently impacting complete conversion of the SRS fleet to ZEV are security and a potential fire hazard presented by the lithium ion (Li-ion) batteries that power electric vehicles (EVs) and plugin hybrid electric vehicles (PHEVs). This may limit SRS efforts to electrify the fleet.