



# Fiscal Year 2022

## Sustainability Scorecard Summary

NASA Kennedy Space Center's Sustainability Goal Scorecard provides a snapshot of the center's performance in meeting its sustainability goals. The scorecard provides a status of functional areas spanning renewable energy, sustainable buildings, sustainable acquisition, water efficiency, fleet management, energy performance contracting, and waste management. Kennedy's Environmental Management Branch monitors the performance in each of these categories to achieve a "Go for Green" status and identify improvement opportunities.



### GOAL 1

#### Energy Efficiency/Renewable Energy

Increase clean and renewable energy while maximizing energy efficiency in facilities.

- Kennedy is constructing a two-megawatt solar site as part of a performance contract project; the materials are on-site and are currently undergoing final designs and permitting.
- Kennedy participated in a Federal Energy Management Program (FEMP) Energy Storage Initiative to evaluate adding solar and Battery Energy Storage Systems.

**INTERESTING FACT:** In a year, the two-megawatt solar site will generate enough energy to drive a car to the Moon and back 20 times.



### GOAL 2

#### Building Efficiency Measures/Performance Contracting

Use performance contracts for energy and water efficiency measures, modernizing buildings, and meeting infrastructure goals.

- Utility Energy Service Contract Phase 1 Design and Implementation:
  - ✧ Upgraded from fluorescent tubes to LED lighting throughout facilities on center.
  - ✧ Replaced high-flow fixtures and commodes with low-flow alternatives.
  - ✧ Replaced end-of-life transformers with energy efficient models.

**INTERESTING FACT:** Through high-payback energy conservation measures, such as LEDs, Kennedy was able to cover some replacement costs of items such as air handling units.



### GOAL 3

#### Water Efficiency

Implement water conservation measures.

- In FY22, Kennedy had significantly increased water usage due to storm and age-related breaks on several waterlines and a ruptured seal on one storage tank. An increase in usage occurred due to operational support of the Artemis I launch.
- Currently, Kennedy has a project in development that will address critical water metering needs to help locate leaks more efficiently and to identify opportunities for reduction.

**INTERESTING FACT:** During the test and launch of the Artemis I mission, 450,000 gallons of water was released onto the mobile launcher and flame deflector to dampen sound and vibrations to keep the rocket and launch pad safe at liftoff.



### GOAL 4

#### Sustainable Buildings

Meet or exceed the Silver Certification in Leadership in Energy and Environmental Design (LEED) for new construction and renovation projects.

- 28.5% of Kennedy's gross square feet currently qualify as sustainable.
- Ongoing construction for the Converter Compressor Facility (CCF) with expected LEED Silver at completion.
- Portfolio includes nine LEED certified facilities, consisting of 540,690 square feet:
  - ✧ Two Platinum: Central Campus and Propellants North Facility.
  - ✧ Three Gold: Electrical Maintenance Facility, Ordnance Operations Facility, and Fuel Storage Area 1.
  - ✧ Four Silver: Life Support System Building, Neil Armstrong Operations and Checkout Building (North Wing), Space Station Processing Facility Science Annex, and Kennedy Data Center.

**INTERESTING FACT:** The Kennedy Space Center Visitor Complex's newest attraction, Gateway: The Deep Space Launch Complex, is striving toward LEED Silver Certification.



### GOAL 5

#### Waste Management

Reducing waste going to landfills to less than 50% annually.

- Kennedy's diversion rate for construction and debris (C&D) waste didn't meet the less than 50% goal due to polychlorinated biphenyl (PCB) paint on the concrete from the old Headquarters building demolition project. Nonetheless, Kennedy diverted more than 37.5 million pounds of C&D waste from the landfill, exceeding the 50% goal for non-C&D.

**INTERESTING FACT:** The mosaic-tiled entryway with the NASA insignia was preserved in place from the space-race era historic Headquarters building.



### GOAL 6

#### Fleet Management

Improve fleet efficiency, reduce costs, and meet mission requirements.

- Through a Fixing America's Surface Transportation (FAST) act agreement with Florida Power and Light, NASA was able to install 28 dual-head Level 2 Electric Vehicle (EV) chargers at a minimal cost to the government.

**INTERESTING FACT:** The government avoided approximately one million dollars in design and implementation costs using the FAST Act.



### GOAL 7

#### Sustainable Acquisition

Acquire, use, and dispose of products and services in accordance with federal green purchasing requirements.

- In FY22, 89.3% of Kennedy's contract actions had environmental language that required purchasing of green products and services and represents 96.1% of obligated dollars.

**INTERESTING FACT:** Kennedy had over \$1.3 billion in obligated dollars for FY22.