

## FY 2023 BUDGET AT-A-GLANCE

# DECARBONIZING the Electricity Sector

## Overview

The Office of Energy Efficiency and Renewable Energy (EERE) accelerates the research, development, demonstration, and deployment of technologies and solutions to equitably transition America to net-zero greenhouse gas emissions economy-wide by 2050, creating good-paying jobs, and ensuring the clean energy economy benefits all Americans, especially workers and communities impacted by the energy transition and those historically underserved by the energy system and overburdened by pollution. To ensure its continued leadership in this transition, **EERE's FY 2023 budget request is for \$4 billion.**

## Transition to a Carbon-Free Electricity Sector No Later Than 2035

EERE will invest in projects that support the Biden Administration's goal of massively increasing the annual deployment of renewable energy sources and generating all domestic electricity from clean energy sources by 2035. FY 2023 funding will focus on reducing the cost of renewable energy and accelerating the integration and utilization of renewable power sources with the energy grid. These measures will ensure reliability, security, and resiliency even as expanded electrification increases the demands on our power system.

## FY 2023 BUDGET HIGHLIGHTS

EERE's FY 2023 budget request for enterprise-wide activities and programs to decarbonize the electricity sector totals \$1.47 billion. Highlights include:



**Scale renewable energy deployment.** Research and development for solutions to environmental and siting challenges for land-based and offshore wind, including funds to improve collaboration and communication between government, communities, utilities, industry, and other stakeholders, and \$37M to address barriers to widespread, equitable solar deployment.



**Supercharge domestic clean energy manufacturing.** Launch of a new Solar Manufacturing Accelerator with \$150M to build domestic capacity in solar energy supply chains while moving away from imported products including from vulnerable foreign and potentially unethical sources, and \$134M for a major new focus on the U.S. supply chain for offshore wind, a nascent industry with a huge potential for domestic manufacturing.



**Address system-level renewable integration challenges.** Optimize the integration, planning, operation, and regulation of the grid with high levels of renewable energy technologies, including technical assistance support for decision makers.



**R&D to make enhanced geothermal a reality (\$65M).** Expand subsurface R&D and testing, including for demonstrations in untapped areas and drilling and well-completion initiatives in order to capture and scale abundant, always-available zero-carbon geothermal energy.



**Expand flexibility and storage provided by hydropower.** Support for efforts to maximize hydropower's potential role as a flexible resource on the grid, including a national-scale HydroWIREs study on hydropower and pumped storage hydropower. Improve tools to understand and address climate change effects on hydropower systems and supports the first year of construction for a hydropower test facility.

	FY 2021 Enacted	FY 2022 Annualized CR <sup>1</sup>	FY 2023 Request	FY 2023 Request vs FY 2021 Enacted	
				\$	%
<b>Sustainable Transportation</b>					
Vehicle Technologies	400,000	400,000	602,731	+202,731	+50.7%
Bioenergy Technologies	255,000	255,000	340,000	+85,000	+33.3%
Hydrogen and Fuel Cell Technologies	150,000	150,000	186,000	+36,000	+24.0%
<b>Renewable Power</b>					
Renewable Energy Integration	0	0	57,730	+57,730	NA
Solar Energy Technologies	280,000	280,000	534,575	+254,575	+90.9%
Wind Energy Technologies	110,000	110,000	345,390	+235,390	+214.0%
Water Power Technologies	150,000	150,000	190,500	+40,500	+27.0%
Geothermal Technologies	106,000	106,000	202,000	+96,000	+90.6%
<b>Energy Efficiency</b>					
Advanced Manufacturing	396,000	396,000	582,500	+186,500	+47.1%
Federal Energy Management Program	40,000	40,000	0	-40,000	-100.0%
Building Technologies	290,000	290,000	392,000	+102,000	+35.2%
<b>Weatherization and Intergovernmental Programs</b>					
Weatherization Assistance Program	310,000	310,000	0	-310,000	-100.0%
Training and Technical Assistance	5,000	5,000	0	-5,000	-100.0%
State Energy Program	62,500	62,500	0	-62,500	-100.0%
<b>Total, Weatherization and Intergovernmental Programs</b>	<b>377,500</b>	<b>377,500</b>	<b>0</b>	<b>-377,500</b>	<b>-100.0%</b>
<b>Corporate Support Programs</b>					
Facilities and Infrastructure (NREL)	130,000	130,000	210,100	+80,100	+61.6%
21-EE-001-Energy Materials and Processing at Scale (EMAPS)	0	0	60,000	+60,000	NA
23-EE-TBD, STM Carbon Free District Heating/Cooling	0	0	31,500	+31,500	NA
<b>Total, Facilities and Infrastructure</b>	<b>130,000</b>	<b>130,000</b>	<b>301,600</b>	<b>+171,600</b>	<b>+132.0%</b>
Program Direction	165,000	165,000	224,474	+59,474	+36.0%
Strategic Programs	14,500	14,500	59,385	+44,885	+309.6%
<b>Subtotal, EERE</b>	<b>2,864,000</b>	<b>2,864,000</b>	<b>4,018,885</b>	<b>+1,154,885</b>	<b>+40.3%</b>
<i>P.L. 116-260: Unobligated Balance Rescission</i>	-2,240	-2,240	0	0	-100%
<b>Total, EERE</b>	<b>2,861,760</b>	<b>2,861,760</b>	<b>4,018,885</b>	<b>+1,157,125</b>	<b>+40.4%</b>

<sup>1</sup> The FY 2022 Annualized CR amounts reflect the P.L. 117-95 continuing resolution level annualized to a full year.