



USAID
FROM THE AMERICAN PEOPLE



USAID/UKRAINE ENERGY SUPPORT

Ukraine's energy system emerged damaged but intact from the heavy shelling and targeted attacks inflicted by Russia's armed forces over the winter of 2022-2023, with USAID supporting the Government of Ukraine and energy system operators to continue providing power, heat, and water to millions of Ukrainians. USAID assistance plays a vital role in rebuilding, strengthening, and maintaining Ukraine's energy systems, and in supporting reforms to help the country build a modern, transparent, and well-regulated energy sector that meets the needs of the Ukrainian people while advancing the country's Euro-Atlantic integration.

USAID's energy programming in Ukraine covers two activities. The USAID Energy Security Project (ESP) in Ukraine strengthens Ukraine's energy independence by advancing market reforms, increasing the resilience of energy systems, and promoting diversified energy sources, thereby promoting broad-based economic development. USAID's Energy Sector Transparency (EST) activity reduces corruption in the energy sector by increasing data transparency and empowering public oversight over the energy sector.

USAID energy programming:

- Helps Ukraine achieve inclusive and sustainable economic development to underpin its recovery from Russia's full-scale war;
- Supports Ukraine to strengthen its linkages with the European Energy Community and bolster its energy security despite Russia's aggression;
- Promotes private sector-led investments in renewable energy to meet EU integration commitments and reduce dependence on energy imports; and
- Advances reforms and investments to ensure affordable and reliable energy supplies for the Ukrainian people.

RAPID RESPONSE TO RUSSIA'S FULL-SCALE INVASION

USAID is providing \$475 million in emergency energy assistance in response to Russia's full-scale war against Ukraine, delivering power grid equipment, heating pipes, power generators, boiler houses, hardware and software, and other equipment to help ensure energy supplies to communities across Ukraine. This support includes:

- 3,600+ power generators for schools, hospitals, and other public facilities.
- 85+ kilometers of steel and pre-insulated pipes to repair and maintain heating systems.
- 60 excavators delivered to district heating companies in 48 cities to repair underground heating infrastructure.
- A 28 MW mobile power plant, which is large enough to power more than 100,000 Ukrainian homes at any given time. The plant can be operated in different cities or regions across the country, depending on need, strengthening Ukraine's energy security amid Russia's continuing strikes against critical infrastructure.
- More than 360 heating tents to provide temporary shelter to Ukrainians when heat and power is knocked out by Russia's strikes.
- 3,300 tactical first aid kits, 48 mobile boiler houses, 20 emergency vehicles, four bucket trucks, and other supplies.

ENERGY SECTOR REFORMS, IMPLEMENTATION, AND EU INTEGRATION

USAID facilitates Ukrainian efforts to adopt and implement energy sector market reforms and integration with the EU. Our reform and technical assistance initiatives focus on:

- Analyzing and modeling post-war reconstruction plans for the country's energy systems.
- Supporting the transition of district heating systems away from fossil fuel-powered systems to cogeneration and more renewable energy resources.
- Reform of energy sector financial structures, such as subsidies, cross-subsidies, public service obligations, renewable energy feed-in tariffs, and regulatory asset base tariffs.
- Complete integration of electricity and gas markets with competitive European energy markets and structures, such as wholesale energy markets integrity and transparency regulation (REMIT).
- Strengthening the corporate governance of state-owned enterprises and privatization.
- Helping Ukraine further integrate into the European Network of Transmission System Operators for Electricity (ENTSO-E) and for Gas (ENTSO-G) via the development of network models, flow studies, least-cost generation scenarios, and long-term network planning.
- Promoting reforms and regulatory implementation and strengthening independence and competency of the energy regulator to conduct oversight, combat corruption and promote greater transparency and accountability in Ukrainian energy markets.

During Russia's full-scale war against Ukraine, USAID has providing the following notable technical assistance:

- Supported the synchronization of Ukrainian and European electricity transmission networks through technical assistance for power system modeling, isolated mode and

synchronized mode planning, turbine-generator testing, and the establishment of ancillary services. The successful system test for isolated mode was accomplished on the first day of Russia's full-scale invasion (February 24, 2022) and synchronization with Europe was accomplished on March 16, 2022.

- Supported the development and adoption of the REMIT law by Ukraine's Parliament, which will promote transparent electricity and gas markets in Ukraine. The law is one of the key prerequisites for Ukraine's integration with the European Energy Community.
- Providing legal assistance to Ukraine's Ministry of Energy to review the country's existing legislation against the EU energy acquis, and supporting the translation of key EU energy acquis documents in coordination with the Ministry of Energy and the Governmental Office for Coordination of European and Euro-Atlantic Integration.