

Energy Renovation of Multi-Family Buildings in Valjevo: 35% Savings

Estimates show that residential buildings in Serbia consume two to four times more energy than average buildings in the EU, with significant heat losses through exterior walls. While some progress has been made in improving energy efficiency in single-family homes, public, and industrial buildings, advancements in multi-family buildings have been limited due to technical, legal, and financial barriers.

To address this challenge and establish a best-practice model for local authorities and residential communities, the USAID Better Energy project, at the request of the Ministry of Mining and Energy, provided support for the energy renovation of four multi-family residential buildings in Valjevo.

Thanks to the joint collaboration and combined efforts of USAID's Better Energy project, the Ministry of Mining and Energy, the City of Valjevo, and the building owners, the renovation was successfully completed in 2023. The project provided technical and financial support, with expert assistance from E3 International, while the local municipality and Ministry contributed to securing funding and coordinating the process.

These buildings were among the first multi-family residential buildings in Serbia to apply for energy efficiency improvement funding. Due to rising construction material costs, the project's implementation was at risk, but with the support of the Better Energy project, the renovations at Vlade Danilovića 1, Vladike Nikolaja 20, Sretena Dudića 28L, and Karađorđeva 101/V were successfully completed.

The energy renovation included installing 10 cm of thermal insulation and upgrading the facade, along with renovating or replacing doors and windows in common areas. The Better Energy team also managed data collection, energy assessments, design and specification of efficiency measures, as well as procurement and installation. The primary goal was to reduce heat losses and lower heating costs for residents.

An assessment conducted in March 2024 showed that, in addition to improved comfort and aesthetics, the renovations resulted in an average energy savings of approximately 35% across all four buildings.

Disclaimer

This activity was largely implemented by E3 International under its engagement on the USAID Serbia **BETTER ENERGY PROJECT** in cooperation with Chemonics International.



Multi-apartment building at Vladike Nikolaja 20 before and after energy renovation (Source: Better Energy)