The dissertation, which consists of three chapters, combines two chapters that explain the effect of electricity and gas prices on energy savings in Ukraine and a third chapter that describes the implementation of energy-efficient measures in Ukraine as a result of such price increases. All three chapters are based on the data from original household surveys conducted before and after sharp and repeated energy price fluctuations in Uzhhorod, Ukraine. The first chapter focuses on extreme tariff variations over time and across household customers to estimate the price elasticity of electricity demand from dwellings in Uzhhorod, Ukraine. The findings suggest that the price elasticity of electricity demand is −0.2 to −0.5, with the majority of the estimates around −0.3. The elasticity becomes stronger over the first three months after prices change. Only modest evidence shows that the response to the price variations is more pronounced for respondents who were attentive to their bills, consumption levels, or the tariffs. The second chapter addresses the tariff reforms in gas prices, aiming to understand whether consumers adapt their consumption in response to such changes, and estimates the price elasticity of gas demand. To separate the behavioral aspect, only dwellings without energy-efficient renovations were used. The results suggest that consumers can decrease gas consumption over time, even without renovations. The price elasticity of natural gas demand is around −0.16. The demand becomes more inelastic for households with higher incomes and heavy users. The third chapter describes the types, rates, and prices of various energy-efficiency measures implemented by households between 2008 and 2018 in Ukraine. Data indicates that households follow a step-by-step approach and implement energy-efficiency measures on average over three years, deciding to implement up to five different upgrades. Additionally, homeowners with lower education and income levels, larger household sizes, and at least one child living in multi-family buildings with a larger number of rooms are more prone to invest in energy-efficient renovations. This probability increases for households that recently moved into their dwelling and if one or more household members work abroad.