GABRETA SMART GRIDS

General Information

Gabreta Smart Grids aims to accelerate the digitization of the distribution grid by fostering the cross-border cooperation between Germany (Bavaria) and the Czech Republic in the location of border region of the Bavarian/Bohemian forest, also known by the Celtic expression "Gabreta".

In addition to a new interconnection between Germany and the Czech Republic on the



Estimated time of realization: 2023-2030

The distribution grid will be upgraded with digital technology accommodating it for the further integration of renewable energy sources and the ongoing decentralization of energy system.

distribution level, the project will accelerate the digitization of both countries' girds. Gabreta Smart Grids will provide higher security and quality of supply, as well as prepare the electricity grid for ongoing changes in the European internal energy market.

Specific Activities

Gabreta Smart Grids comprises the creation of a cross-border interconnection between Germany and Czech Republic. Additional activities include the construction and modernization of high and medium voltage lines (OHL, cable) with monitoring systems, energy storage systems, substations and transformer stations. Smart elements will be deployed to the power grid (PLC, AMM, remote-control devices, etc.). Modern optical fiber networks and IT for Smart Grids will improve data sharing capabilities.

Project Goals

Main goals of the project are the modernization and digitization of the energy infrastructure. Gabreta Smart Grids will foster the cross-border cooperation mainly on the distribution level. The specific project activities will prepare the power grid infrastructure for a broader energy transition towards intermittent renewable sources.

Project Benefits

Main benefits of the project include an economically efficient electricity system with decreased losses and enhanced quality, security of supply, improved integration of renewable energy sources, increased grid users' capacity, improved capacity utilization, positive environmental impact and enhanced international cooperation and knowledge sharing.





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