

Smart Street paves the way for a smarter energy future

Electricity North West, the region's network operator, has completed a pioneering £11.5 million project to make the region's energy network smarter and more efficient, and save money for five million customers across the North West.

Using intelligent software installed at the company's control centre in Manchester, the Smart Street project trialled new innovative techniques to stabilise voltage, which could cut £70 a year off customers' bills, by making their electrical appliances perform more efficiently.

The project, which started in January 2014, will also help prepare the electricity network for the expected increase in low carbon technologies such as electric vehicles, heat pumps and solar panels which will have an impact on the way power is used. Last year the UK government announced a ban on petrol/diesel cars from 2040 which will encourage customers to buy electric vehicles and help reduce air pollution.

While electric vehicles and heat pumps using large amounts of power will cause voltage to dip, solar panels exporting electricity to the network will have the opposite effect. The impact of these changes will affect the performance of everyday electrical appliances.

By using new technology installed on the electricity network, the Smart Street project will stabilise voltage and make it easier to connect large numbers of low carbon technologies to help support the move to a greener and cleaner energy future.

Smart Street was trialled at a number of substations serving 67,000 customers in Manchester, Wigan, Wigton and Egremont. A series of customer focus groups were organised to help understand if the new project impacted the electricity supply in homes. All the customers confirmed that they hadn't noticed any changes when using their everyday appliances, such as kettles and washing machines.

Steve Cox, head of engineering for Electricity North West, said: "Our innovative Smart Street project has proved that controlling voltage on our low voltage network brings significant benefits to our customers. It can reduce their electricity bills, reduce carbon emissions and will provide more flexible solutions to help us connect low carbon technologies to the network.

"The results from the trials have shown that Smart Street will deliver energy savings for our customers by stabilising voltage without impacting on reliability and the quality of the power network. This is a fantastic result and it will benefit electricity networks up and down the country."

More details and the project closedown report can be found on the company's [website](#).