

HEAT CASE STUDY:

Warmworks, Dumfries and Galloway

Allocated funds £1,250,000



THE ASK

Through this project, we plan to install battery storage technology in 150 off-gas homes in the Stewartry area, where fuel poverty is disproportionately high. A major Kirkcudbright substation is also being upgraded nearby.

WHY IT WAS SELECTED

The target properties are electrically heated and have been specifically identified as in or at risk of fuel poverty. By helping to make energy bills more affordable, the project should have a significant positive impact on the lives of residents.

Simon Kemp, Warmworks

“The Green Economy Fund event in Glasgow provided some insight into the successes and challenges of other projects, and was an excellent way to learn how others have overcome obstacles and led the way to deliver. Communications and support from the GEF team have always been open and accessible, supported by the knowledge that their aims are aligned to those of the projects in supporting consumers and the sustainability of the energy network.”

THE PROJECT

The project will allow us to better understand what effect a decentralised storage facility would have on managing demand and reducing carbon emissions. We'll also take on valuable learnings for grid management and the incorporation of future-facing technologies.

We'll be able to evaluate the real-life performance and reliability of battery storage equipment and controllers. 150 batteries have been bought and 75 have been installed to date, creating a unique opportunity to reduce energy bills for fuel-poor householders, all while creating a virtual power plant to support the further development of network balancing services for DNOs.

How this project serves the GEF aims

Putting the planet and people first

We predict a carbon saving of 754tCO₂ over the lifetime of the battery units.

Staff have attended 25 training sessions to help achieve project deliverables in sustainable living and protecting the planet.



We must keep evolving

We have built a viable, scalable commercial model and platform for development that both addresses fuel poverty and tackles demand management. Such a future-ready model can help make the network more dynamic, and take us forward.



We're already making an impact, and will continue to do so

Eight jobs have been secured as a result of the project, with another four jobs created because of the project.

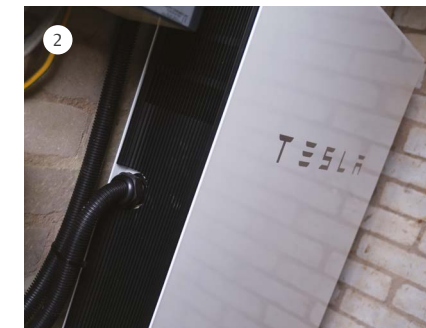


Support where it's needed most

359 energy customers have received advice and support directly through the project.



1-3. Warmworks, October 2020



HEAT

Key findings

Through analysis of the projects monthly reporting, we were able to identify the following key findings:

Encouraging residents and owners to engage with free energy advice can be difficult.

Developing case studies is crucial for projects as they help us understand and anticipate challenges and establish good practices.

There is a requirement as an industry to improve installation training of emerging energy technologies.

Currently there is a limited understanding within the mechanical and electrical consultancies and installations companies of demand side response (DSR) controlled hybrid communal heating systems.

Coherent legal advice is required for installing low carbon heat solutions in multi-ownership properties.

There needs to be more choice and competition attracted to this sector to make the procurement of required project elements easier.

