

Tender for Battery Storage Solutions

ENERGISE BARNLSLEY CBS SOLAR (www.energisebarnsley.co.uk)

Premise

- Energise Barnsley, is embarking on a residential retrofitting of domestic batteries in tenanted homes with solar project, run in partnership with AgeUK Barnsley and local housing association Berneslai Homes.
- Energise Barnsley is the project manager for the 2 year 'Smart Solar' project
- The partnership has been successful in obtaining funding from the Ofgem Redress Fund for 75 properties with senior residents with existing solar, to be fitted with domestic smart batteries.
- The 'Smart Solar' project will potentially see additional savings of up to 60% off resident's current electricity bills.
- Project delivery by Energise Barnsley will be coordinated through it's management contract with Generation Community Ventures Limited
- Funded through the Energy Industry Voluntary Redress Scheme (www.energyredress.org.uk), this research project will enable higher utilisation of the solar power by individual households (up to 85%) reducing reliance on and spillage to the national grid
- Berneslai Homes will be identifying households to participate and they will also be undertaking the physical installation of the batteries
- Age UK Barnsley's Information & Advice Service will be up skilled to work alongside participating tenants – providing reassurance and guidance as to how to make the best of this fantastic opportunity. Advice will also be given with respect to better value electricity tariffs, and benefits checks will also be carried out

Current Situation

- Initial feasibility study has been completed, including building of stakeholder relationships, high level financials and identification of due diligence hurdles
- The project start date is 01/05/2021 and the timeframe is for up to 2 years

Requirements

Energise Barnsley is tendering for services that cover the following requirements:

- Delivery of 75x domestic batteries to be retrofitted with existing solar installations in Q3 2021
- Solar installations typically 2.9kWp
- Training of Berneslai Homes Construction Services for installation purposes by battery supplier
- The battery delivery partner must be willing to work with an academic partner through shared API's to extract and share data for research purposes and the final study report
- Applications can not be accepted from retail electricity suppliers or their partners
- Payments terms must be at least 60 days as the grant funding is claimed quarterly in arrears. Proof of grant offer letter will be provided upon request
- The batteries and inverter must satisfy the following technical specifications:

Clause	Requirement
1.0	Inverters must meet the following minimum specification: -
1.1	Comply with G98 or G99 Fast-Track, or latest equivalent
1.2	Be supplied with DNO/ENA compliant type testing certificate
1.2	Achieve a round-trip efficient of at least 92.5%
1.2	Be able charge and discharge the battery packs at a minimum of 2.5kW
1.2	Be able to manage both the charging / discharging of the batteries and conversion of PV generation simultaneously
1.2	To have the inbuilt ability to provide EMS/UPS in the event of a power cut
1.2	Have a 10-year unlimited cycle manufacturer warranty
2.0	The Inverter must be able to communicate with an online platform and provide accurate, measurement time stamped readings including faults as listed below: -
2.1	Solar PV Generation
2.2	Battery Charge / Discharge
2.3	Import from / Export to Grid
3.0	The inverter must be able to communicate with an online platform and allow control of the following: -
3.1	Switch system between autonomous and manual mode
3.2	Specify battery charge or battery discharge power in manual mode
3.3	Include charging source
4.0	The following sets out the battery construction and performance specification: -
4.1	Minimum of 3.0kW and 2.5kWh to each property
4.2	Be supplied with DNO compliant type testing certificate
4.3	The battery packs must use Grade A Lithium Iron Phosphate (LiFePO4) cells
4.4	Cells to have a Depth of Discharge (DoD) of 96%
4.5	Operating temperatures of between -0°c & +50°c
4.6	IP65 rated suitable for both indoor & outdoor installation
4.7	Battery packs must be modular i.e. multiple packs that can be connected to increase the total capacity if needed in future
4.8	The battery must support autonomous and manual modes, with a local and cloud to cloud API for 3rd party control
5.0	The battery storage should meet the following minimum warranty requirements: -
5.1	10-year, unlimited cycle



5.2	There must be suitable end-of-life procedures in place for the recycling of the battery packs
5.3	There must be a minimum of 80% usable capacity remaining in the battery packs once the warranty period expires (10 years)
5.4	Full set of safety compliance certificates, performance testing results (TBC what tests need to be done)

Closing Date

Tender proposals should be submitted to Andy Heald (contact details below) no later than 13.00hrs on Friday 24 May 2021

Scoring Matrix

Any applications received by 13.00hrs, 24/05/2021 will be scored as follows, with the winning tender contacted on the 01/06/2021.

Value for money - 30%

Technical Ability - 30%

Communication & Data Control - 15%

Training, delivery and Company Ethos - 15%

Size and Aesthetics - 10%

CONTACT

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