

Western Isles Transmission Project: Consultation on Final Needs Case and Delivery model

Response from the Energy Saving Trust, May 2019

Background

The Energy Saving Trust is responding to this consultation in our capacity as the lead partner for Local Energy Scotland. Local Energy Scotland is a consortium made up of The Energy Saving Trust, Changeworks, The Energy Agency, SCARF and The Wise Group. The consortium administers and manages the Scottish Government's Community and Renewable Energy Scheme (CARES) which has been established to encourage local and community ownership of renewable energy across Scotland and to help maximise the benefits to communities of renewable energy systems – whether commercial or community-owned. Local Energy Scotland has managed CARES since 2013.

CARES has been working with community groups in the Western Isles (WI) since the mid-2000s. In that time there has been significant capacity building and 21.3MW of wholly community owned generation was installed prior to the closure of the WI grid network to new generation. (The WI grid is currently, and has for years, only been able to accept 3.68 kW per phase which is less than the output of a domestic scale wind turbine.) When larger scale renewable developments are taken into account there is a total of 34.3MW of generation already connected to the Western Isles Distribution network.

Since CARES began working with community groups in the WI the energy landscape has changed significantly, but the desire and interest of communities to make real and lasting positive change to their future through energy projects has remained unchanged, with **130MW of potentially new community owned capacity being currently explored or developed.**

The WI has some of the best renewable resource in the world, and boasts some of the most progressive and skilled community development trusts in the UK. The WI is a prime example of the community energy projects that can be developed which can happen if groups are given the support and opportunities to progress schemes, with 21.3MW of existing wholly owned generation installed prior to the closure of the WI grid network. These projects have levered in £30million of investment into the Isles and are providing a total of £2million into local communities annually for re-investment into the local economy.

In the context of the UK Government's climate change targets and recent advice on these from the CCC, the Scottish Government's recent declaration of a climate emergency together with its recent commitment to adopt the CCC's recommended emissions reductions targets for Scotland, together with the knowledge that decarbonisation will require greater electrification of both the heat and transport sectors, and commitments by the Scottish Government to largely decarbonise the electricity system it is vitally important that local energy developments such as those in the WI are enabled.

Question 1: Do you agree that the current network on the Western Isles needs reinforcing in order to connect additional generation?

Yes. The WI have some of the best Renewable Energy resource (in terms of wind and wave) in Europe and yet the local area is supplied from mainland power stations with standby on-island diesel generators. The current network is full with no additional capacity for anything over 3.68kW per phase. This has a seriously negative impact on community energy development in the WI, which in turn is having a detrimental impact on the area's economic development. A decision to go for a

450MW cable would leave very little scope for community energy groups to take forward schemes which they have been developing for years and for any future community developments.

Question 2: What are your views on the generation scenarios developed by SHE-T? We are particularly interested in views on the likelihood of wind generation on the Western Isles developing to the levels predicted by SHE-T's scenarios.

A number of the generation scenarios explored by SHE-T are particularly applicable to the community energy landscape as they would allow additional capacity for local community projects to progress. These scenarios are SHE-T's GHD-S3 and GHD-S4 options. We believe these options are realistic and credible due to the vast resource available on island and strong demand from community energy groups to develop projects.

The following volumes of generation are already contracted in the Western Isles:

Lewis Wind Power Stornoway Wind Farm	180MW
Lewis Wind Power Uisenis Wind Farm	189MW
FORSA Druim Leathann Wind Farm	49MW
TOTAL	418MW

The following community led schemes are currently in Planning consideration and aiming to secure Grid contracts from August 2019 onwards:

Arnish Moor Consortium (CARES funded)	35MW
Beinn Thulabhaigh Wind Farm (CARES funded)	5MW
Tol Mor (Barvas) Wind Farm	24MW
Pairc Trust HydroElectric Pumped Storage (CARES funded)	24MW
TOTAL	88MW

The following community led schemes are in pipeline (early development):

Community Wind, Rural Lewis (Scoping Complete)	35MW
Community Wind Rural Lewis (Scoping Commissioned)	16MW
Community Wind Rural Lewis (Early Exploration)	13MW
TOTAL	64MW

In addition, the local authority has indicated that there is real potential for Floating Offshore Wind developments around Lewis but such developments will be dependent on having grid access.

Question 3: What are your views on SHE-T's approach to optioneering, specifically relating to the routes and link capacities considered, and are there other options that SHE-T could have considered?

We believe that SHE-T have undertaken a thorough review and the selected option (Arnish to Beaully HVDC) is the most appropriate option. There may be benefits in the future of upgrading the links to Skye in order to bolster resilience and to increase capacity.

Question 4: What are your views on the CBA put forward by the ESO, particularly in relation to the results it produces?

We are concerned as are Comhairle nan Eilean Siar and it's partners, that a different approach has been taken in Orkney and Shetland where a 'Steady State' of 0MW has been accepted whereas 'Steady State' is given a lot of emphasis in the WI case. There is also concern that there is inconsistency in terms of application of the 'Tipping Point' between Orkney and the WI.

If 'Steady State' is discounted (as in Orkney and Shetland) and the 'Tipping Point' methodology used in Orkney is applied to the WI the result would be that the 600MW cable performs best.

Question 5: What are your views on the technical design and costs of the proposed Western Isles link?

We appreciate the need to keep costs to a minimum. However, we note that SHE-T have tendered for the 600MW link which takes account of the actual conditions to be encountered. A 450MW link has not yet been tendered and this process could add 12-15 months to the delivery timetable.

Question 6: What are your views on the following points:

i. Do you agree with our minded-to position to reject the 600MW link conditional on only the two Lewis Wind Power projects securing CfDs?

No, the minded-to position does not adequately take account of the community energy developments which are currently in the pipeline, or connection for Floating Offshore Wind, or the development of pre-commercial Wave Energy technology. Reduction to 450MW will also adversely affect the competitiveness of the WI anchor projects at CfD Auction.

ii. What are your views on our analysis of the information, which suggests a 450MW link would represent the best outcome for existing and future consumers if only the two LWP projects secure CfDs?

We do not believe that a 450MW link is in the best interest of UK consumers as it is very likely to require additional costs in the near future. A small additional cost now (about 5%) would enable an additional 33% of capacity to be provided for the future. Given the potential renewable energy around the WI and the appetite for community energy development the risk of a 450MW link being under sized is significant while risk of a 600MW link being oversized appears to be small.

iii. Do you consider that consumers could be appropriately protected from the costs of funding a potentially significantly oversized link if we were to approve the needs case for a 600MW link? If so, how could this be achieved?

We believe that consumers could be appropriately protected if account is taken of the opportunity to deliver clean, renewable electricity into the GB energy system, thereby enhancing the UK's security of supply. The WI presents a renewable energy frontier which has hitherto been excluded in terms of

opportunity but which needs to be opened up given existing UK and Scottish climate change targets together with recent advice from the CCC which recommends a faster route to decarbonisation than required by existing legislative targets.

We would also encourage Ofgem to explore initiatives which would enable the underwriting the additional marginal cost of the 600MW cable in a way that protects the consumer without negatively impacting on aspiring community energy projects.