

Technological Innovations and Climate Change – Offshore Wind

Submission of CPRE Norfolk

Introduction

1. CPRE Norfolk is a county branch of the Campaign to Protect Rural England. It campaigns for a better future for the Norfolk countryside, working locally and with the CPRE national charity to protect, shape and enhance a beautiful, thriving countryside for everyone to value and enjoy. CPRE Norfolk provides an independent voice for the landscape, engaging with local and regional planning systems to ensure that its views are heard by decision makers. CPRE Norfolk campaigns locally for positive solutions that will support the long-term future of Norfolk – one of England's most rural counties.

Submission

Our submission focuses on two of the Committee's initial questions:

- How well is the UK industry managing the environmental and social impacts of offshore wind installations, particularly on coastal communities with transmission-cable landing sites?
 - How well is Government policy supporting innovation in transmission technology to improve the efficiency of electricity transmission?
2. CPRE Norfolk is very aware of the importance of a renewable energy strategy for the UK and the important role Norfolk plays in this. It is inevitable that some disruption will occur as new sites come on stream, and land-based works for offshore wind farm sites are required to feed the power generated to the grid. However, choices in regard to the transmission routes and the technology employed should be those which minimise damage to the countryside and landscape, as well as disruption to local communities, tourism and the wider economy. For example, CPRE Norfolk supports the use of high voltage direct current (HVDC) rather than high voltage alternating current (HVAC) for on-shore transmission cables, as well as advocating the use of underground cabling and Horizontal Direct Drilling (HDD) for crossing sensitive barriers such as rivers and streams. The main reasons for supporting the use of HVDC is the smaller amount of land-take, soil disturbance and use of cable-relay stations which HVAC systems require.
 3. In addition, and very importantly, a much better long-term solution to the problem of unnecessary harm being done to landscapes and the environment, as well as the costly, lengthy and frequent disruptions to local residents and visitors is the construction of an Offshore Ring Main (ORM). This would enable multiple connections from offshore wind farms to be made offshore, with only one cable corridor being necessary from each ORM to the National Grid. This would result in much lower environmental and social impacts across the many miles of landscape the cable-corridors transverse, with separate works being needed for each offshore windfarm as it connects to the National Grid onshore. Despite needing considerable investment, a change in the current system of permissions for connecting offshore wind farms to the National Grid and time to put into operation, an ORM would reduce connection costs in the long-term as well as making connections quicker and easier.

Michael Rayner, CPRE Norfolk, Planning Campaigns Consultant, 19 May 2020

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