



Photo: Stiftung Offshore Energie/Detlef Gehring

3 The power grid

- ➔ We must stop thinking of electrical grids as national infrastructure and start developing them – onshore and offshore – to become European highways of electricity trade.
- ➔ The faster grids are developed, the faster we will have large-scale renewable energy when fuel import supplies are disrupted or the cost of fuel becomes too expensive.

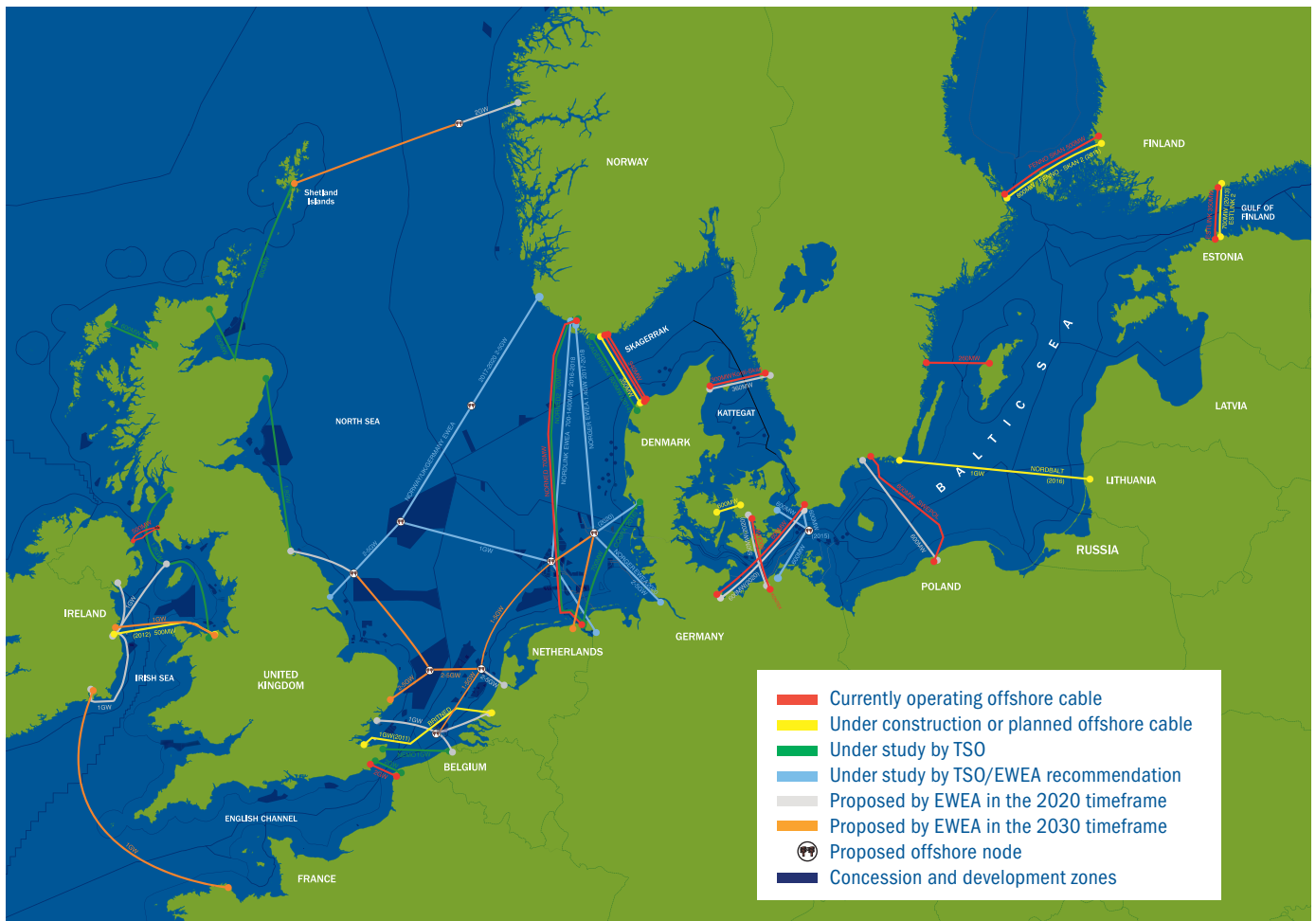
Did you know?

- ➔ European electricity infrastructure is ageing and far too little has been invested in new grids.
- ➔ By 2020, power capacity equivalent to 42% of the EU's current capacity needs to be built to replace ageing power plants and meet the expected increase in demand.¹
- ➔ This is the ideal opportunity to build a Europe-wide, modern grid that connects offshore and onshore wind farms with consumers.
- ➔ Europe needs just such a grid, and properly functioning electricity markets, to cope with larger amounts of wind power and make electricity trade possible, driving down power prices.
- ➔ The Europe-wide grid will help enhance Europe's competitiveness and energy security, while creating hundreds of thousands of manufacturing and related jobs and technology exports.

¹ EWEA: Pure Power, 2009



EWEA's 20 year offshore network development master plan



EWEA's 20 year offshore network development master plan provides a step by step approach to planning Europe's offshore grid in the North and Baltic Seas, and is based on the:

- ➡ 11 currently operating offshore grids.
- ➡ 21 offshore grids currently under construction, planned or being studied by the grid operators in the Baltic and North Seas.
- ➡ Eight additional offshore grids proposed by EWEA in the 2020 timeframe.
- ➡ Six additional offshore grids proposed by EWEA in the 2030 timeframe.

EWEA urges the European Commission, when drafting its Blueprint for a North Sea Grid, and the European Network of Transmission System Operators, when drafting its biennial Ten-Year Network Development Plans, to incorporate EWEA's Offshore Network Development Master Plan.