Danish Energy
Agency

A Danish energy island?

Political backing

Common understanding among parties supporting the Danish government

"test the option for Denmark to build the first energy island with minimum 10 GW by 2030"

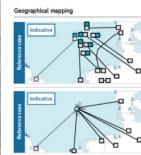


Building on previous work

North Sea Wind Power Hub



Roland Berger - 2019



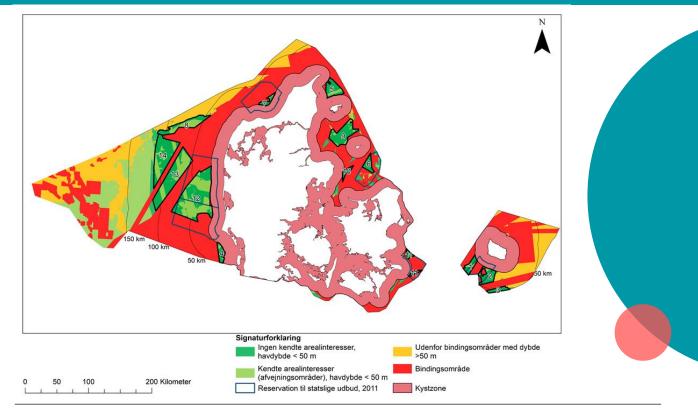
Reference case	Hybrid case ¹⁾	Difference
Nominal capacity int	erconnector [MW]	
- 2,000 (DK-NL), - 200 (NL-DE)	Up to 4,000 (to NL), 6,000 (to DE), 2,000 (to DK)	0
Length interconnect	or [km]	
339 (329 + 10)	0	- 339
Nominal capacity OV	VF [MW]	
12,000	12,000	0
Length export cable	[km]	
2,100 - 2,400	2,100 - 2,400	0
Offshore transforme	r / converter / switching stal	tions
6/6/0	6/6/6	+6
Onshore transformer	/ converter stations	
0/10	0/6	-4

Converter station Transformer station - Transmission cable 1) Additional value provided by inclusion of power-to-gas infrastructure in final project setup

Source: Roland Berger study on North Seas Offshore Energy Clusters



Total potential: 40 GW



Who needs the power?

