

DENMARK AS A BOTTOM-UP CASE

PITCH AT THE SESSION: “DECARBONIZATION OF THE EUROPEAN ENERGY SYSTEM”

Wind Energy Denmark 2019

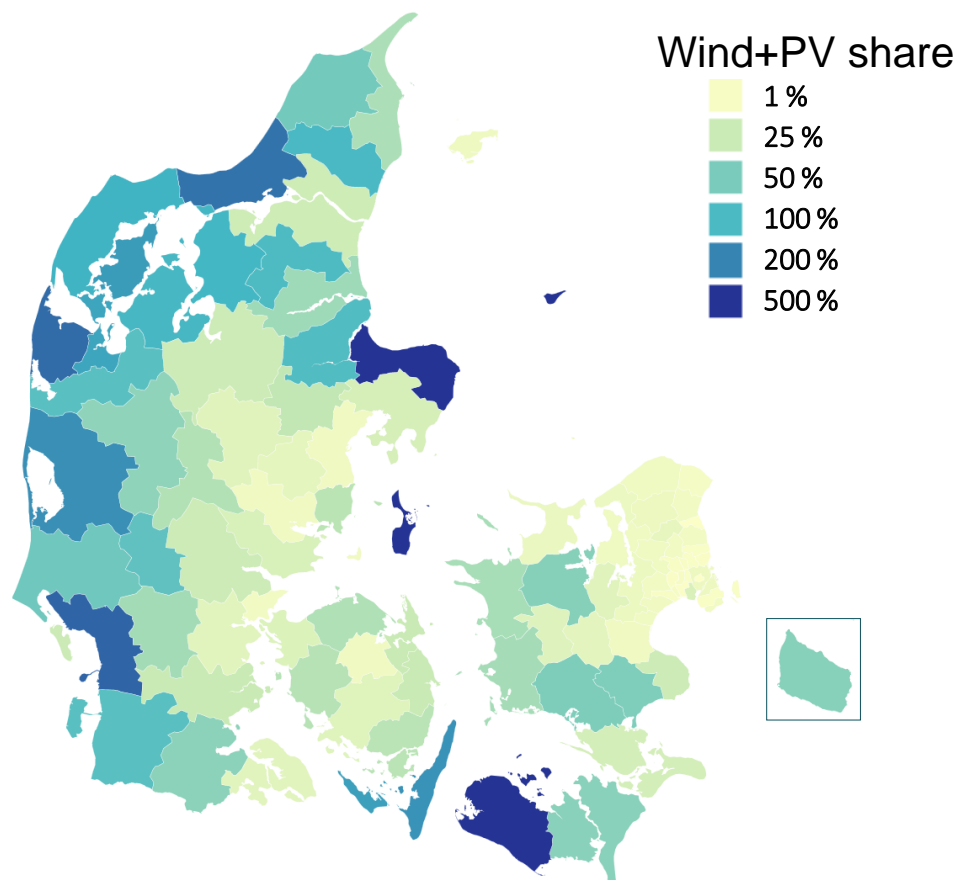
1. October 2019, Herning

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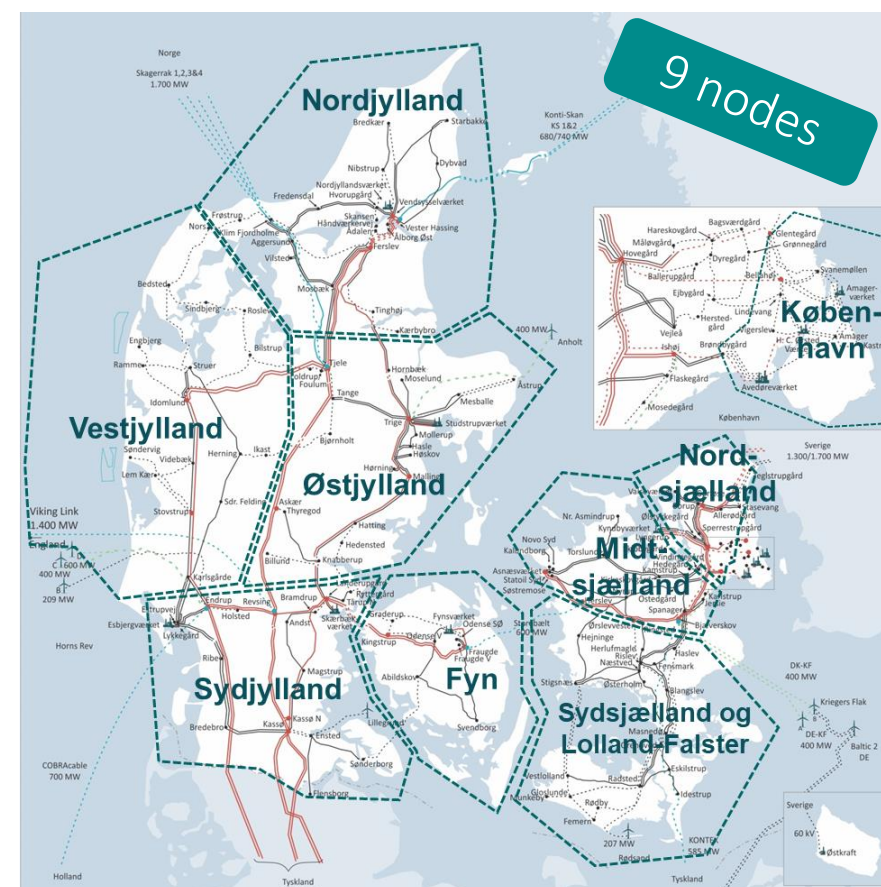
NO COUNTRY (OR PRICE AREA) IS A COPPER PLATE

Wind+PV share at municipality level in Denmark (2017)

VRE production compared to gross power consumption



Grid model used in the analysis: "System Perspective 2035"

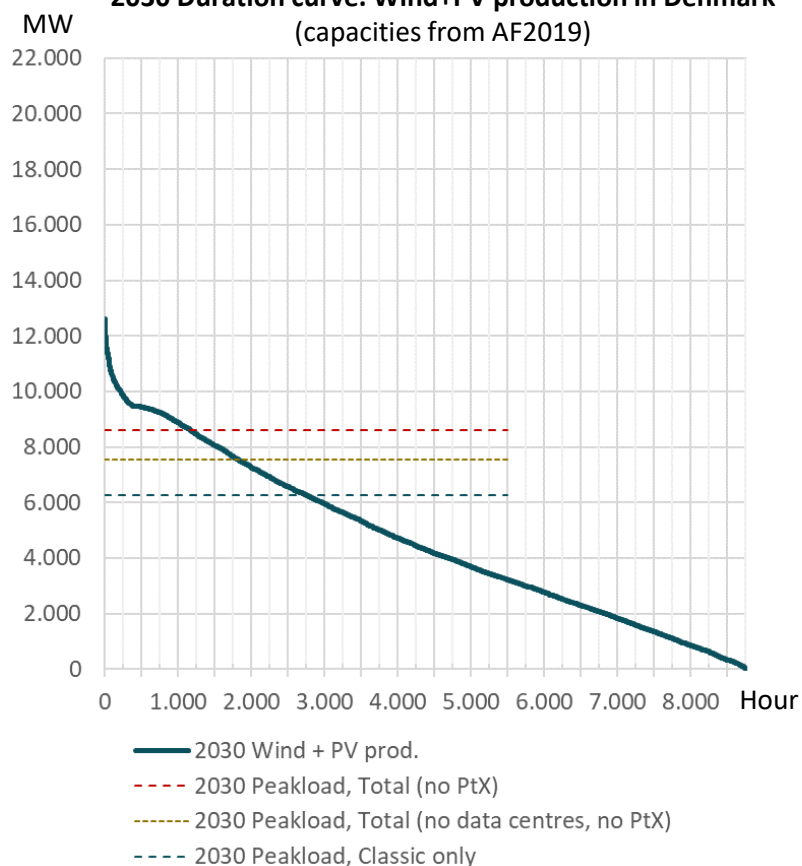


IS A DOMESTIC AC-GRID DIMENSIONED BEYOND “SECURITY OF SUPPLY” POSSIBLE?

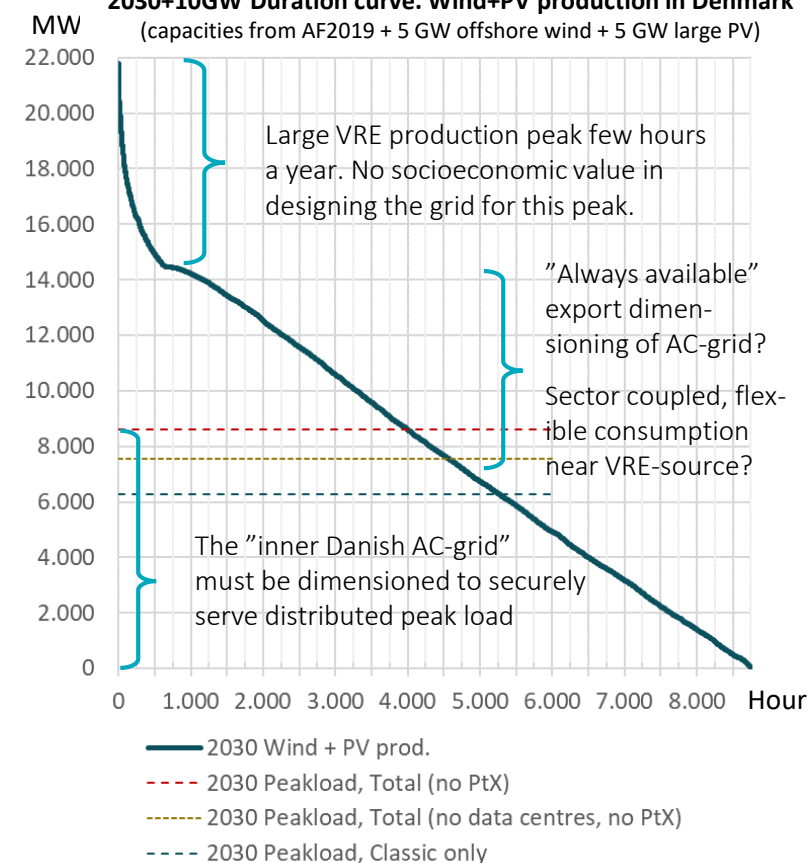
2019 Duration curve. Wind+PV production in Denmark
(capacities from AF2019)



2030 Duration curve. Wind+PV production in Denmark
(capacities from AF2019)



2030+10GW Duration curve. Wind+PV production in Denmark
(capacities from AF2019 + 5 GW offshore wind + 5 GW large PV)



INTEGRATION OF MULTI GW OFFSHORE WIND

APPLIES TO LARGER ONSHORE VRE AS WELL!

