



# EU Research and Innovation Strategy on Offshore Wind and Grids

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*EERA Workshop*

**EU Biodiversity Strategy for 2030**

**Offshore Renewable Energy Strategy**

**European Climate Pact**

**Year of Rail**

**Methane Strategy**

**Renovation Wave**

**Climate Law**

**European Bauhaus**

**Chemicals Strategy for Sustainability**

**Circular Economy Action Plan**

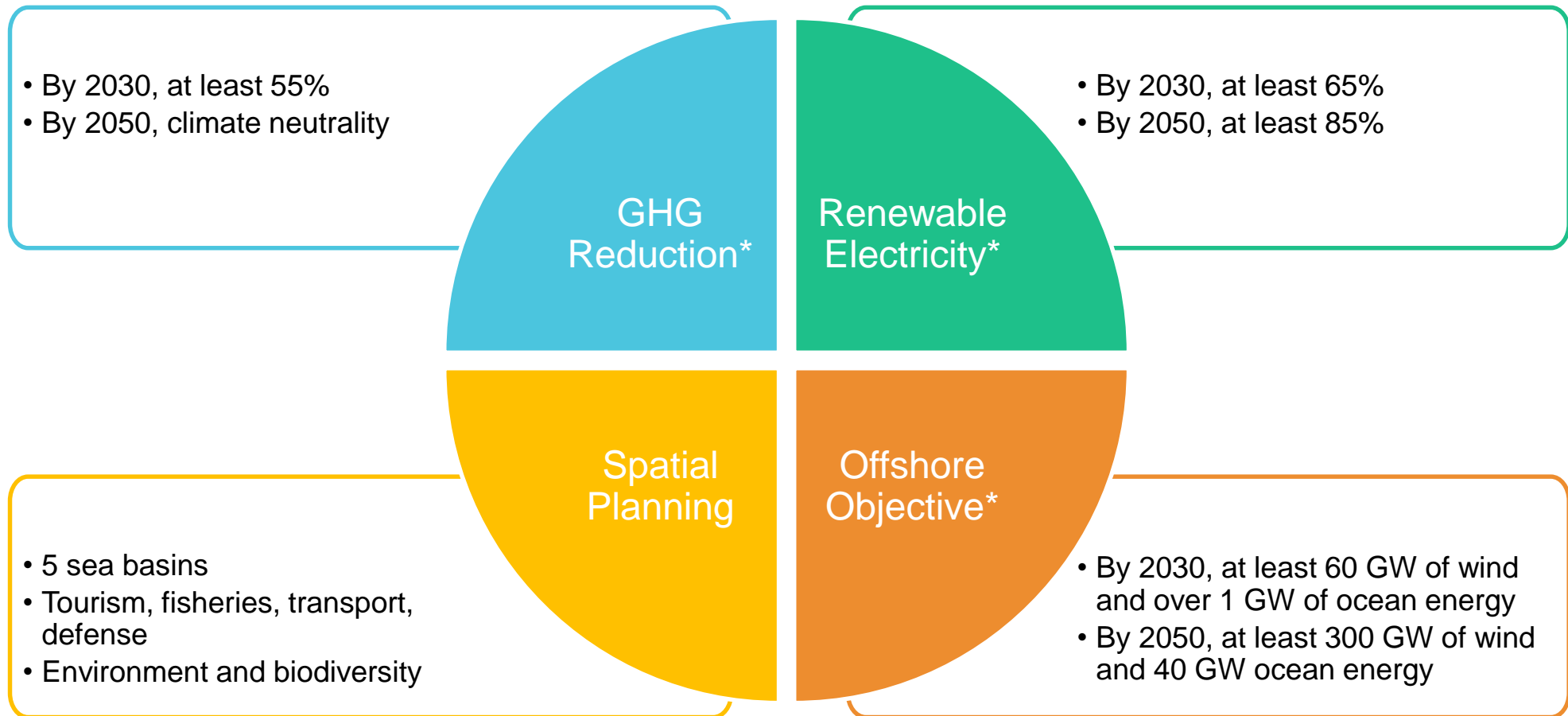
**GREEN  
DEAL**

# Offshore Strategy lights the way.

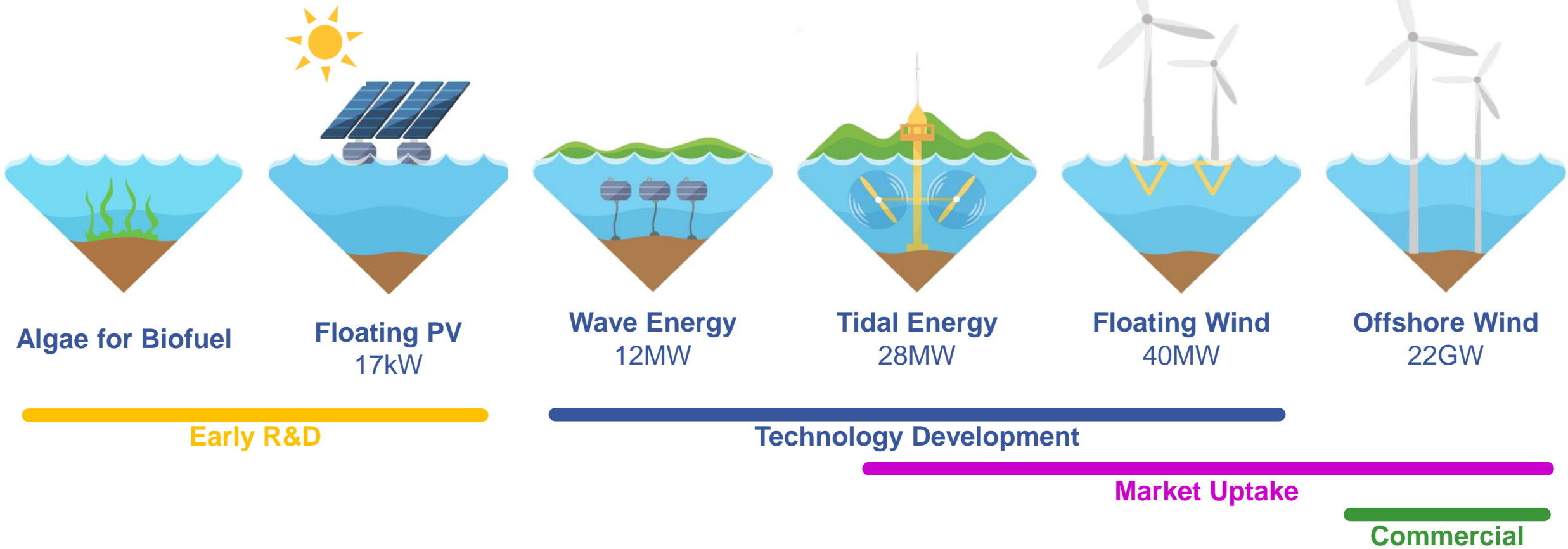
*“The clean energy transition should involve and benefit consumers. Renewable energy sources will have an essential role. **Increasing offshore wind production will be essential**, building on regional cooperation between Member States.”*

*“This will include ways to manage maritime space more sustainably, notably to help **tap into the growing potential of offshore renewable energy**.”*

# Why an Offshore Strategy?

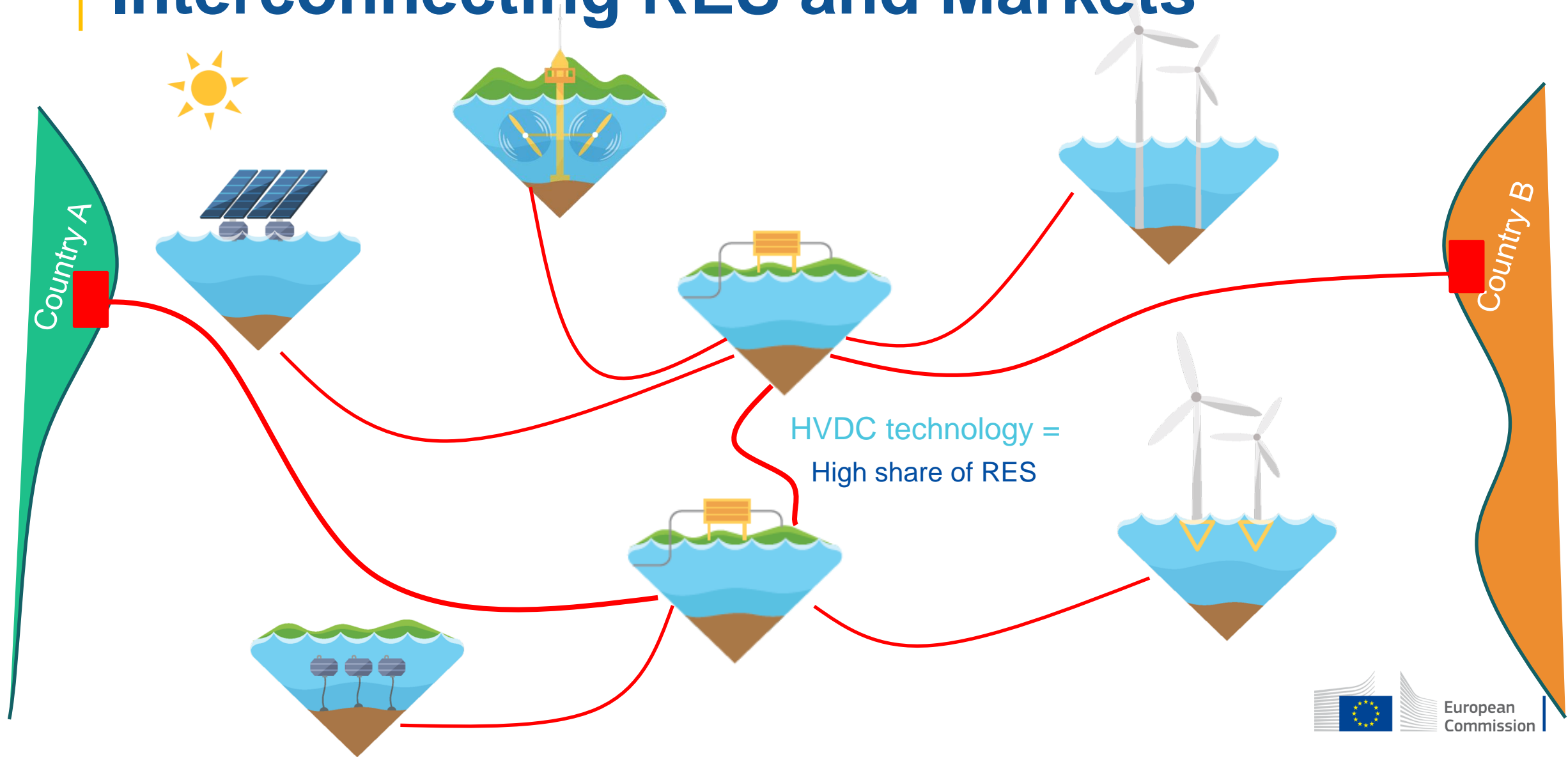


# Wide Range of Offshore Technologies.



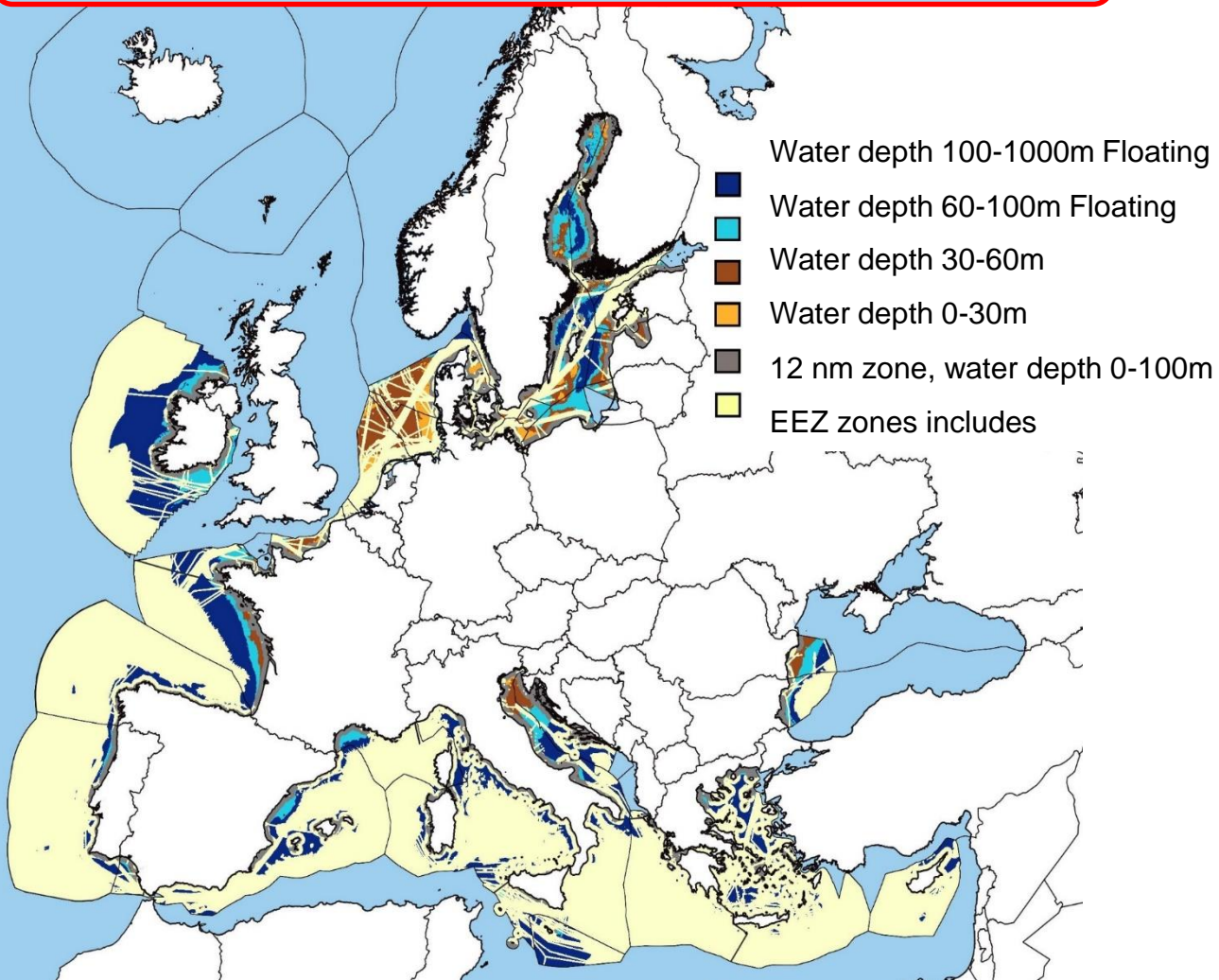


# Innovative Grid Technologies: Interconnecting RES and Markets



# A Strategy for the Whole EU

## Energy potential in all EU sea basins



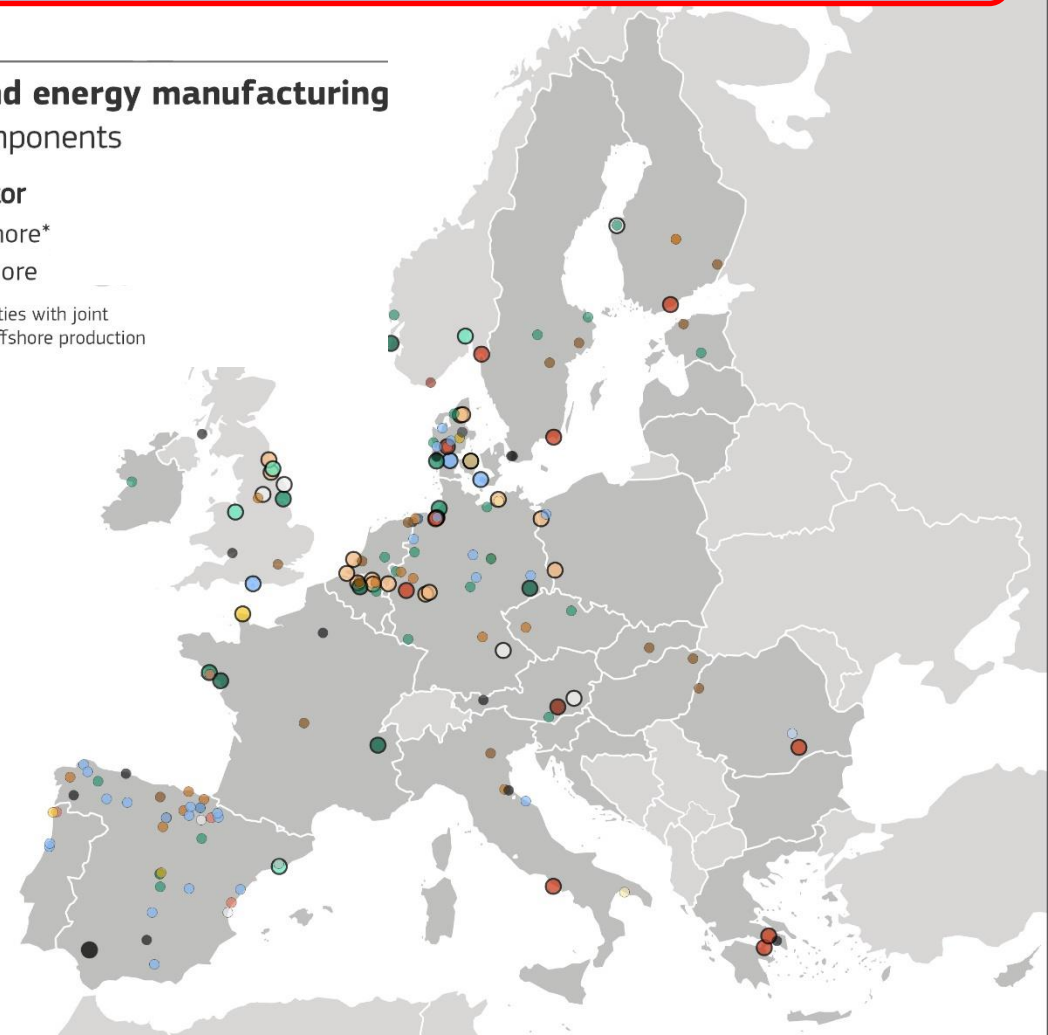
## Industrial potential in all EU MS

### Wind energy manufacturing Components

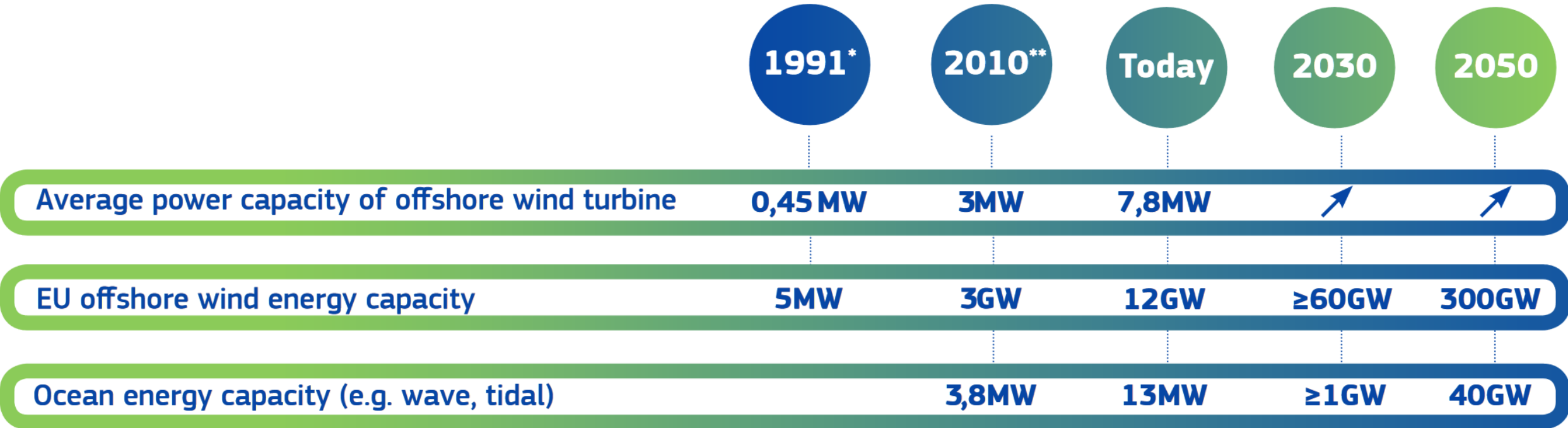
#### Wind sector

- Offshore\*
- Onshore

\*includes facilities with joint onshore and offshore production



# A Challenging Way Forward.



\* First offshore wind farm: Vindeby, Denmark.

\*\* Including UK



# The Offshore Strategy in 4 Acts.



## Investment

- ▶ Encourage the necessary investment to effectively develop offshore renewable technologies
  - estimated at almost €800 billion between now and 2050
- ▶ Increase certainty for investors and smooth the path for investments, ease bottlenecks, and find the best combination of public and private finance



## Regional Cooperation

- ▶ Promote cross-border cooperation, in particular in the North Sea, Baltic Sea, Mediterranean Sea, Black Sea, Atlantic Ocean, and outermost regions and overseas territories
- ▶ Promote a pan-European supply chain involving multiple regions, in coastal and inland areas
- ▶ Enhance maritime spatial planning for a successful large-scale deployment of offshore renewable energy and the sustainable use of our sea space and resources



## Predictable Legal Framework

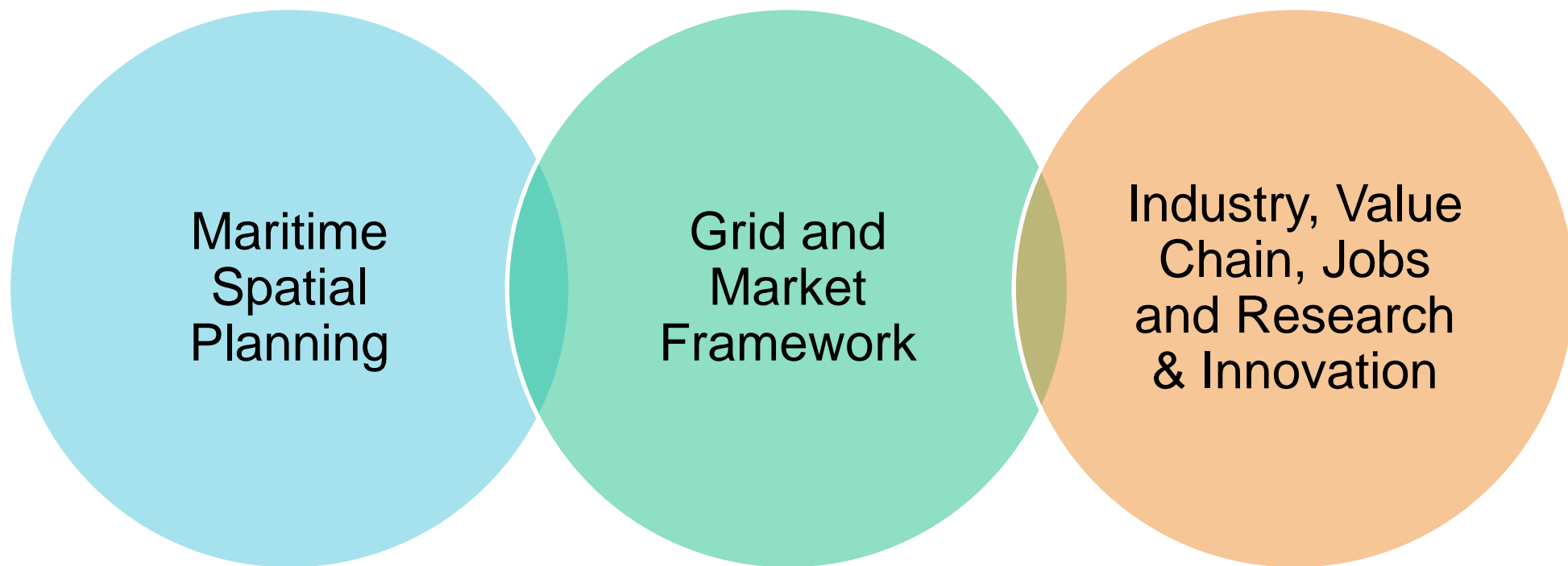
- ▶ Promote innovative projects that will ensure a cost-effective deployment of offshore renewable energy
- ▶ Give certainty to promoters and reduce risk for investors



## Strengthening Supply Chains and Supporting Continuous Innovation

- ▶ Maintain and develop European technological and research leadership
- ▶ Upgrade port infrastructure to support deployment and connection of offshore energy
- ▶ Boost the full industrial value chain in Europe, including skills and labour support

# The Focal Areas



# Challenges

## Mobilizing investments

Nearly €800B needed. Mostly private investments. Catalytic role of EU funds

## Main Actions

Encourage MS to include offshore in their national recovery and resilience plans

Facilitate the development of cross-border cooperation projects

Support strategic investment in offshore energy  
InvestEU

# Challenges

## Supporting Research & Innovation in Offshore Renewable Energy

Strengthening Europe's technological leadership

## Main Actions

Circularity by design

Support cooperation for large-scale HVDC-grid demonstration project

Use of available funds for ocean energy technologies

Develop new wind, ocean energy, and solar floating technology designs

Review SET Plan targets on ocean energy and offshore wind

SET Plan group on HDVC

Improve industrial efficiency across the value chain

# Challenges

**Build a social and inclusive growth through offshore renewable energy takeoff**

## Main Actions

Cohesion Policy Funds  
Just Transition Fund

Support to the development  
of technical and academic  
educational programmes



# Horizon Europe as an Instrument for the Green Deal.



# Thanks. Danke. Merci. Obrigado.

More info at:

<https://ec.europa.eu/research/>  
<https://ec.europa.eu/energy/>