



On-line workshop:

‘Avanzamento Delle Energie Rinnovabili Marine: Strategia Europea, Attività In Corso In Italia, e Aggiornamento Del Piano D’azione Nazionale Del Cluster-Big’

24 e 25 Febbraio 2022



‘SET–Plan IWG Offshore Wind’

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On–line workshop, 24 e 25 Febbraio 2022

Some milestones in the Offshore Wind WG activity



2018: Approval of the Implementation Plan submitted by the TWG 'Offshore Wind'

2019: TWG becomes IWG: national delegate checks the status of the IP on each nation



2020-2022: SET-Wind: EU project to support the IWG activity. Italy is in the Executive Committee.



2022: a) Saipem asks to support the activity of the National Delegate
b) An update of the implementation plan is on going, in close cooperation with EERA-JP-Wind and ETIP-Wind



A new integrated strategy of the SET-Plan



The SET-Plan is nestled in an EU policy context consisting of the EU Energy Union, the European Green Deal, the EU Fit-4-55 package and a set of strategy papers touching directly on the issue of offshore wind, namely the EU Strategy for Offshore Renewable Energy (Nov 2020), The EU Strategy for Energy System Integration (July 2020) and the EU Strategy for Hydrogen (July 2020).

New targets and priority actions for the future

The main elements of the first 2018 Implementation Plan were the cost targets for floating and bottom fixed offshore wind and the nine R&I priority actions.

Both elements have been updated in the present 2020 Implementation Plan.

The targets have been expanded from two to four targets while the priority actions have been reduced from nine to six.



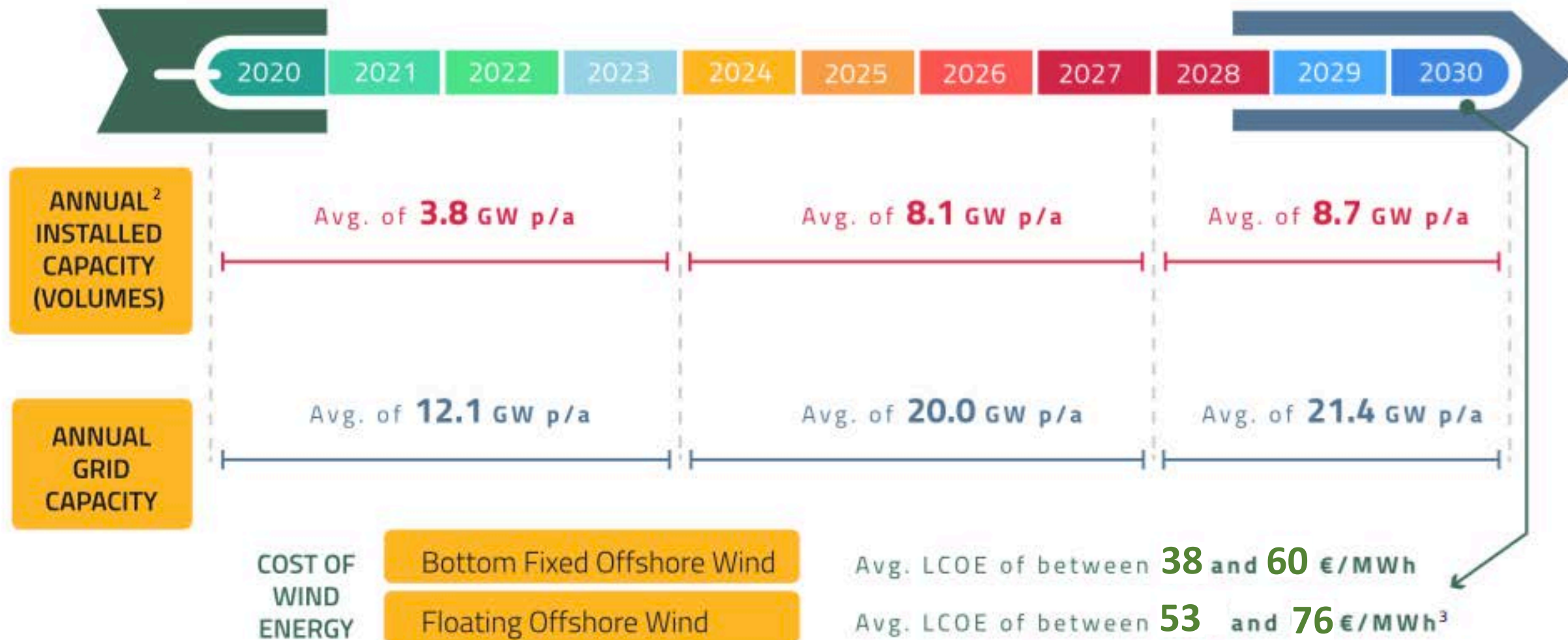


From old targets... (2019)





to New targets... (2022)





and priority actions...

| ETIPWIND | EERA JP Wind | IEA Wind TCP Grand Challenges | SET-Plan Implementation Plan Priority Actions |
|--|--|---|--|
| Next Generation Technologies | Next Generation Wind Turbine Technology & Disruptive Concepts | Science & Engineering of the Wind Turbines | Next Generation Wind Turbine Technology |
| Grid & System Integration | Grid Integration & Energy Systems | Optimisation & Control of Wind Plants in the Grid | Offshore Wind Farms & System Transformation |
| Floating Wind | Offshore Wind (Bottom Fixed + Floating) | | Floating Offshore Wind & Wind Energy Industrialisation |
| Operation & Maintenance | Operation & Maintenance | | Wind Energy Operation, Maintenance & Installation |
| Digitalisation, Electrification, Industrialisation & Human Resources | Sustainability, Social Acceptance, Economics & Human Resources | | Ecosystem, Social Impact & Human Capital Agenda |
| Offshore Balance of Plants | | | |
| | Fundamental Wind Energy Science | Deeper Understanding of the Physics of Atmospheric Flow | Basic Wind Energy Sciences |



Lighthouse initiatives

The term "lighthouse initiative" refers to a visionary, science-driven large-scale initiative with significant budget (tens of millions of Euros) and duration (5 years or more) that will address grand scientific and technical challenges that are crucial for the further advancement of offshore wind energy, providing new knowledge and basis for innovation.

Achieving Europe's ambitions for offshore wind requires ambitious R&D efforts.

Complementing the national programmes, Horizon Europe and the Proposal for a Clean Energy Transition Partnership, the SETWind project has conducted an extensive consultation with stakeholders to identify two main areas for a European Lighthouse initiative. The two areas are:

- **Floating offshore wind technology**, being the new frontier in offshore wind energy development that offers a huge potential to exploit the wind resources over deep water. The overall goal is to make floating offshore wind cost competitive.
- **Integration of large-scale offshore wind energy**, to enable the future reliable operation of the power system with zero emission of CO₂.



See you in the near future (April/May)

- *with dedicated meetings of the Italian Offshore Wind Group*
- *to check the status of the implementation plan in Italy*

