



Eurocentric GVA Study – Detailed Approach For Consultation

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Overview



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ETIP Ocean 2's Finance Objective

- ETIP Ocean focuses on three elements of the commercialisation of ocean energy: environment and socioeconomics, technology and finance.
- This task is centred around overcoming financial challenges to the commercialisation of ocean energy.



GVA Study

- Quantification of the economic benefit, in Gross Value Added (GVA) terms, that Europe could gain through the deployment of ocean energy in European and international waters
- Based on current European supply chain
- Study parameters will be informed by the ETIP Ocean platform, meaning the results will be of maximum benefit to the sector, European policy and the direction of research and development
- Results delivered in January 2021



What is GVA?

- Gross Value Added (GVA) is the preferred economic metric used to describe the value of goods and services produced and consumed within an economy

$$GVA + \text{taxes on products} - \text{subsidies on products} = GDP$$

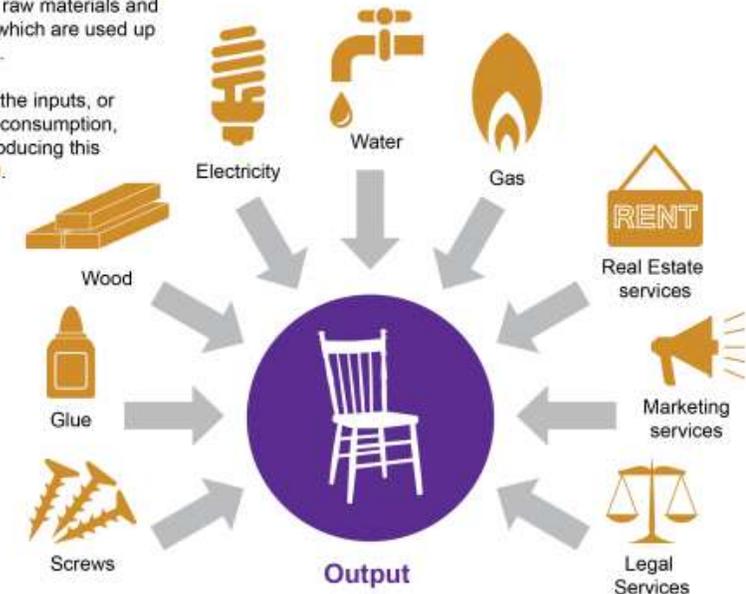
- GVA is calculated by establishing the value across the entire supply chain of the output of one single unit of a good or service
- Where GDP describes an aggregate value of the economy as a whole, GVA is sector-specific

$$\text{Output} - \text{Intermediate consumption} = GVA$$

Intermediate consumption

is the cost of raw materials and other inputs which are used up in production.

The value of the inputs, or intermediate consumption, going into producing this chair are £30.



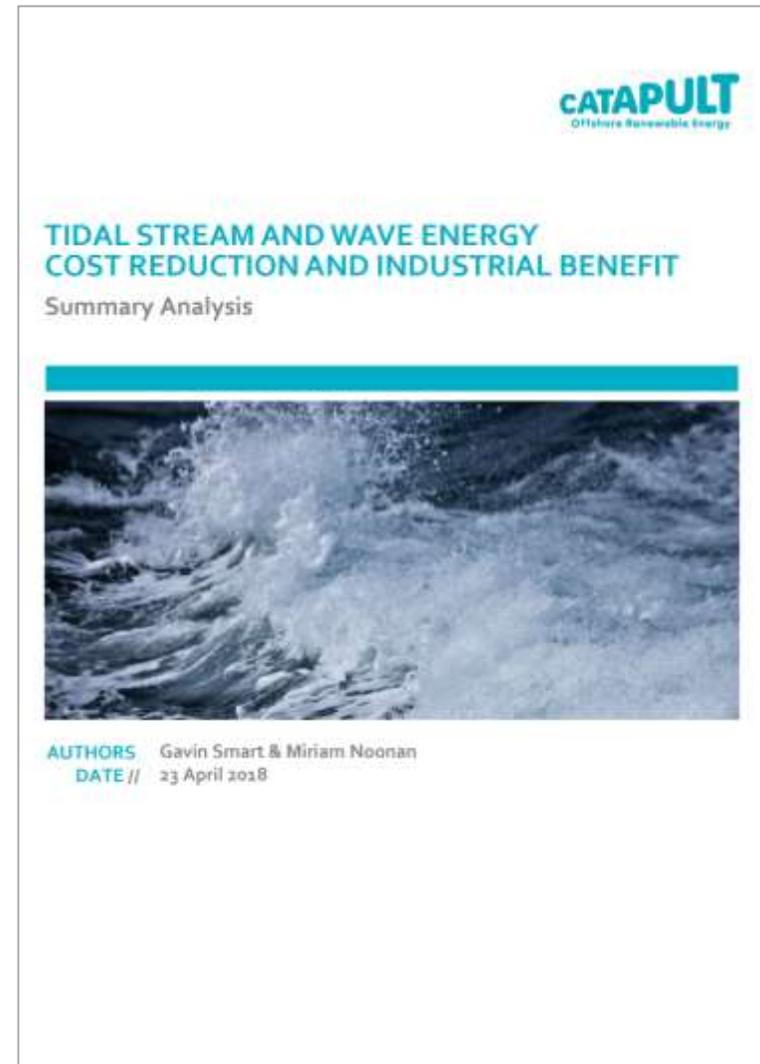
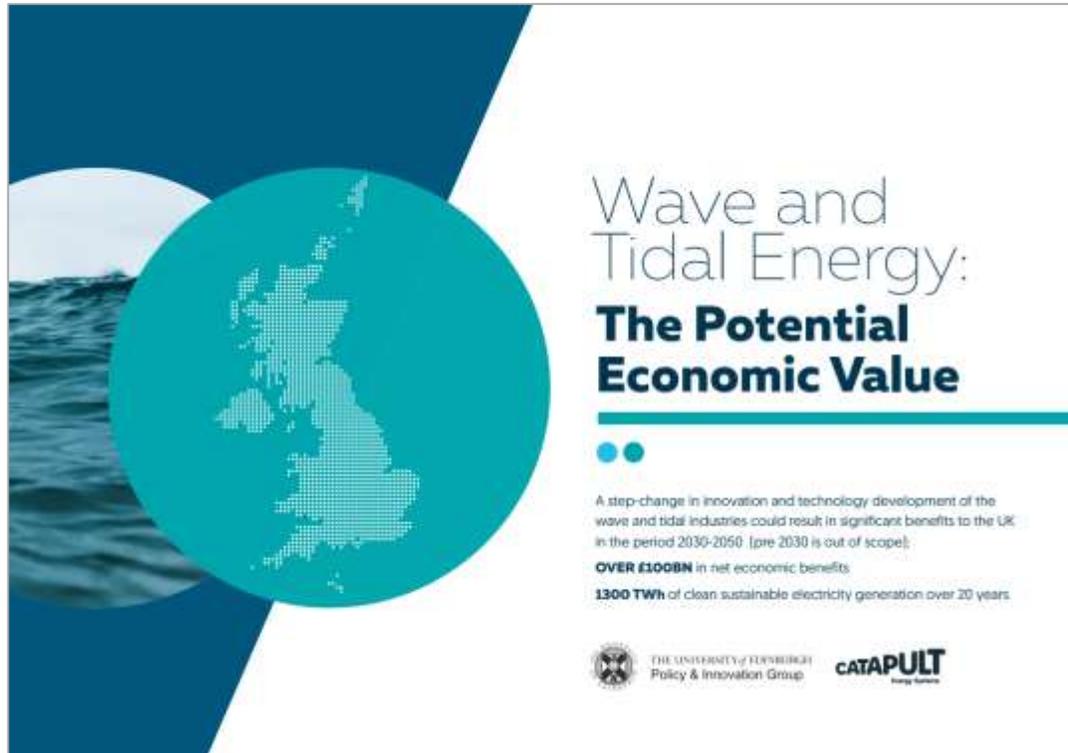
Output
is the goods or services which are produced.
In this case the **chair** is the output and is worth £50.

This means that the **GVA** from this chair is:

$$£50 - £30 = £20$$

The Scottish Parliament, 2018

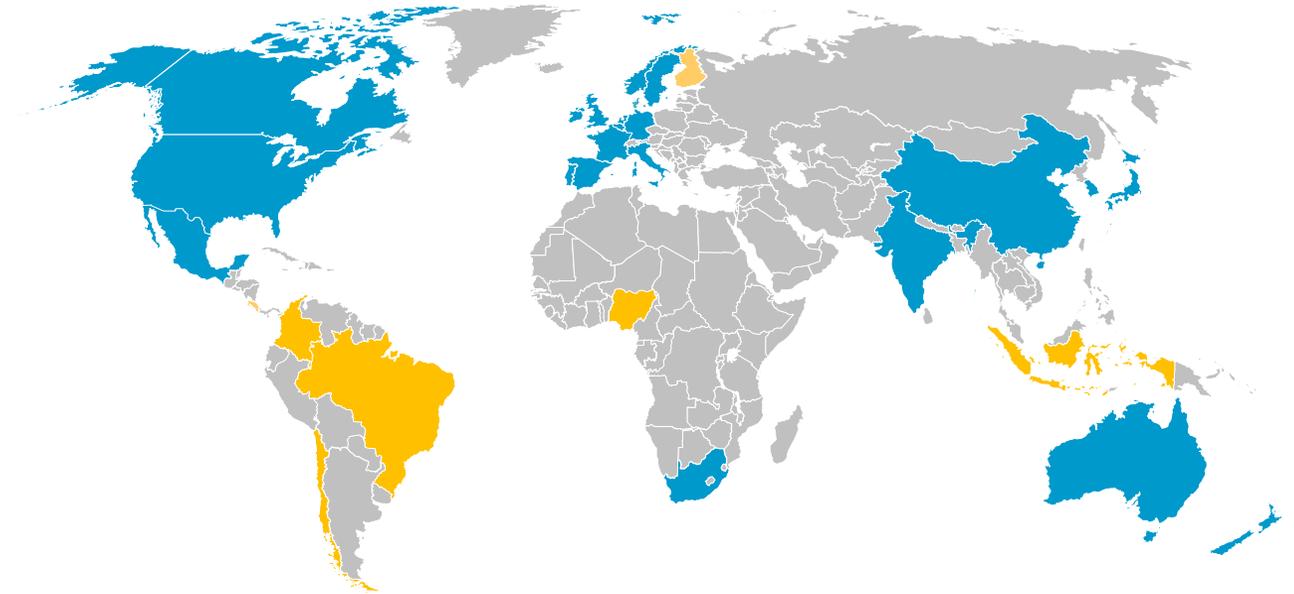
GVA Track Record



Geographical Parameters of the Study



JRC, Deployment Scenarios for Low Carbon Technologies 2018



- IEA-OES Member countries (24) + European Commission
- Observers; countries invited to join IEA-OES

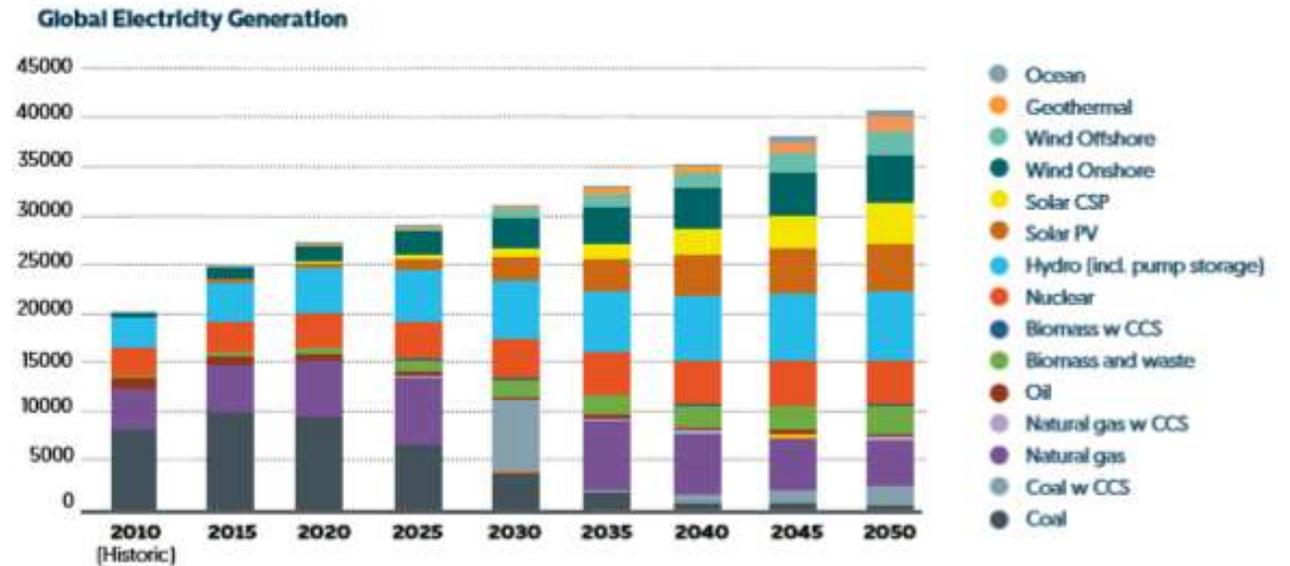
Deployment Modelling



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Deployment modelling



Policy and Innovation Group, 2019

Deployment Scenarios



Consultation Questions: Deployment Scenarios

1. Do you agree with the +/- 10% variation of the modelled deployment level?
 - a) If not, which LCOE would you like to see modelled in the pessimistic and optimistic scenarios?

Q & A



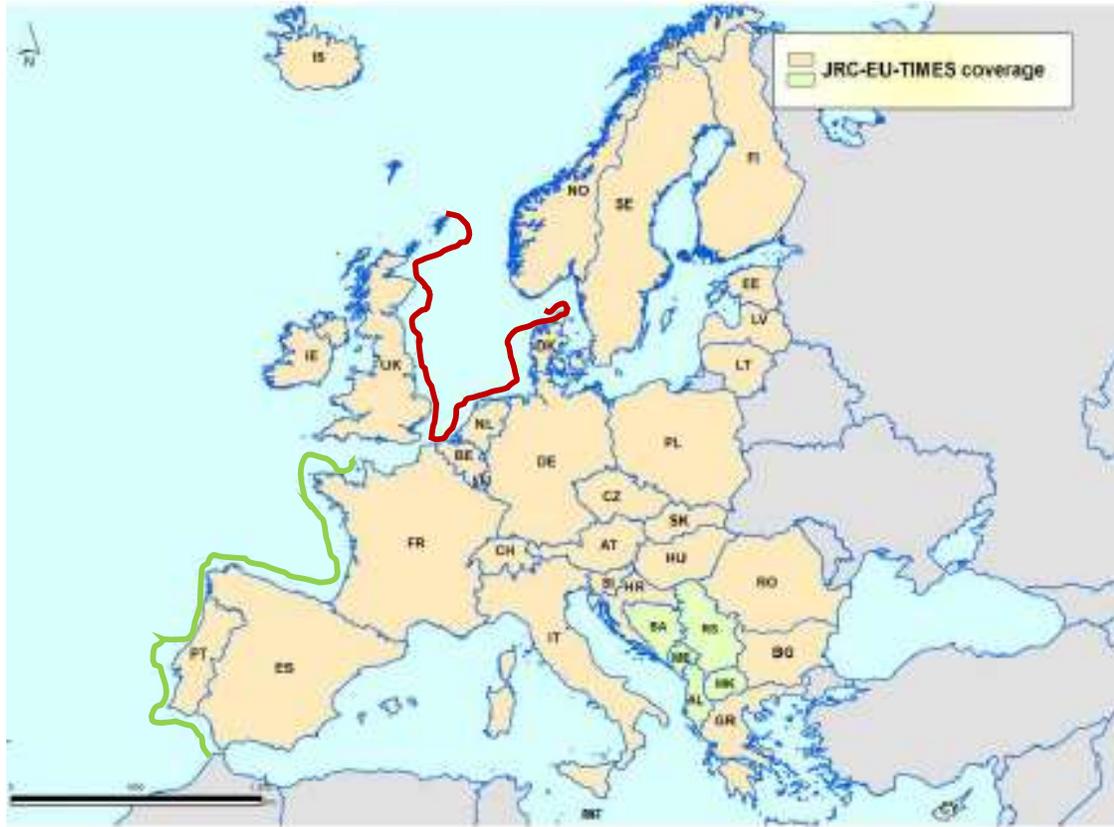
Geographical Scope



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Geographical Scope: Case Studies



Some suggestions:

North Sea-border region

Atlantic region

Consultation Questions: Geographical Scope

Q & A



1. Should we also consider separate countries, in addition to the whole-EU as a single region? If so, which country and why?
2. Similarly, would you recommend we carry out the study with clustered regions?

Leakage

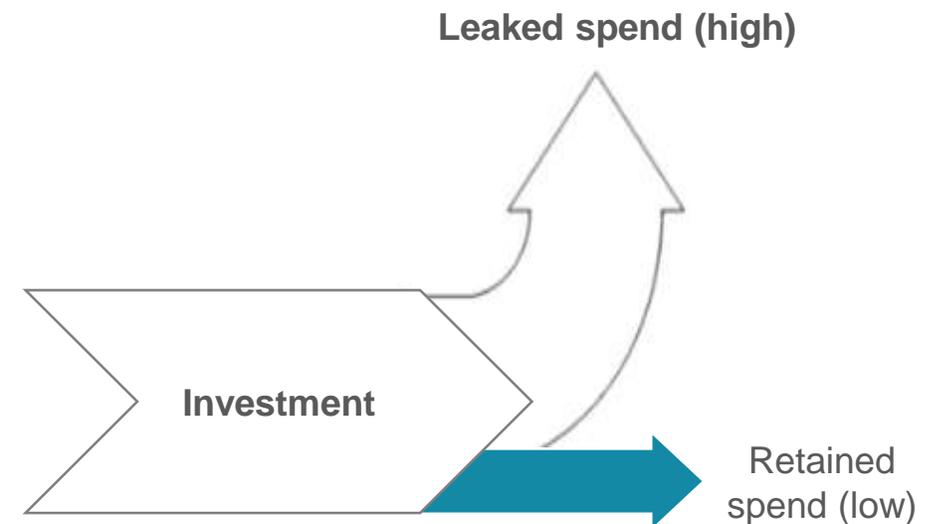
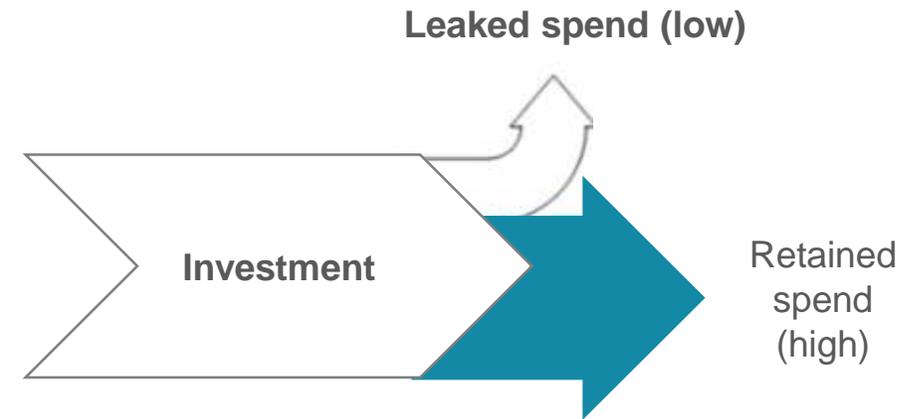


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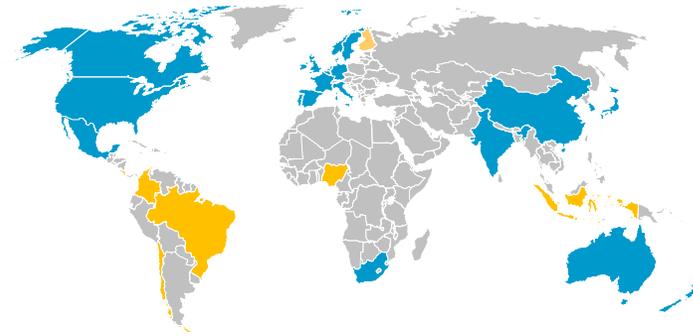
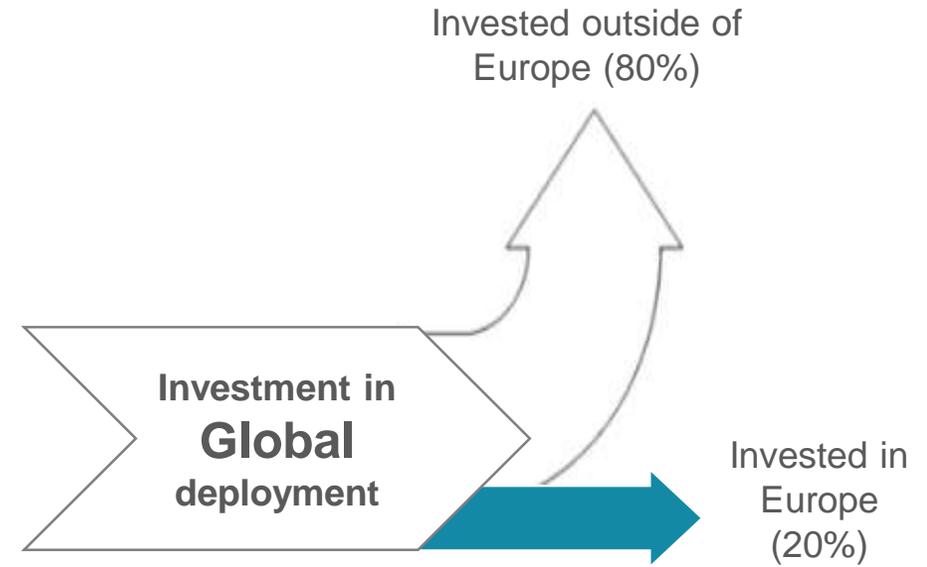
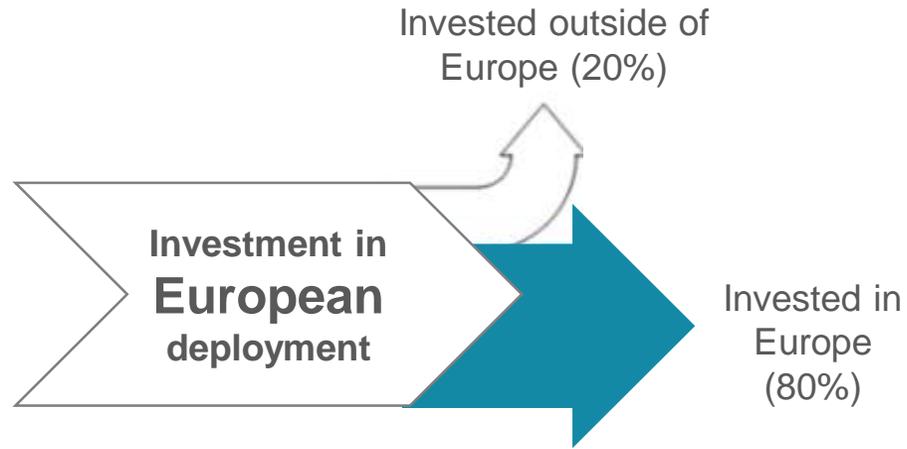


What is leakage?

- Leakage describes the proportion of investment that does not remain within the economy of the country or region in question – it ‘leaks’ to other economies.
- A low leakage rate means that more of the initial investment is spent and retained within the domestic economy.
- A high leakage rate means that a small proportion of initial investment is retained within the domestic economy.



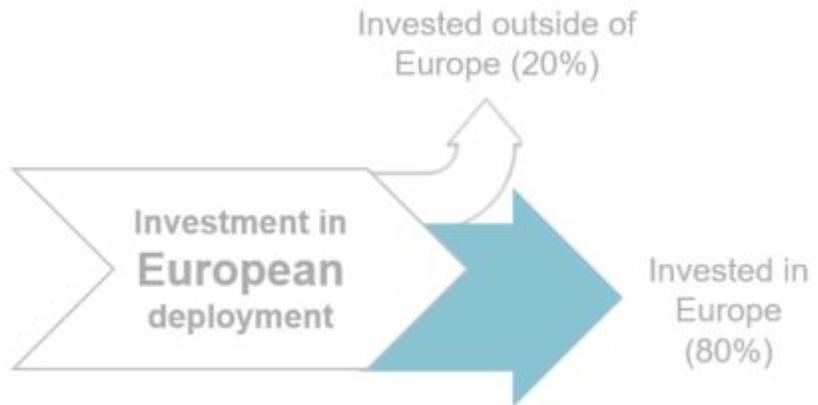
Leakage



Consultation Questions: Leakage

Q & A

1. Do you agree with the reference leakage scenarios, with 10% variation?
 - a) If not, which range would you suggest?



Intended Results

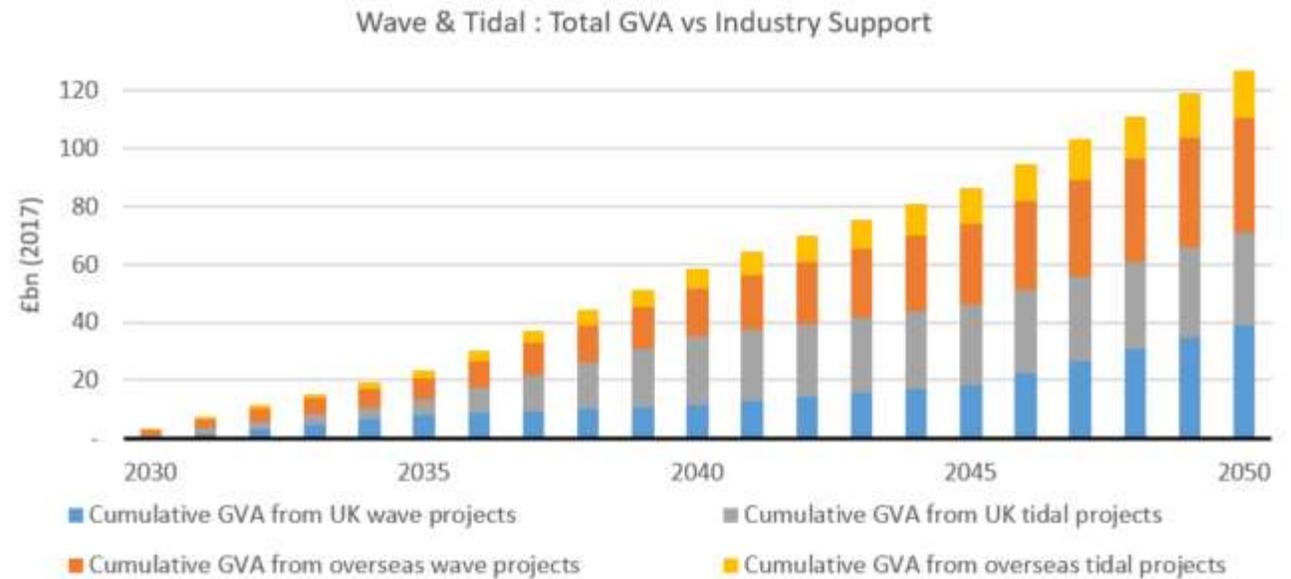


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Intended Results

- Quantification of economic benefit offered to Europe by the European and global deployment of ocean energy generation technology, in GVA terms
- A range of GVA figures for each scenario, including sensitivity analyses and regional case studies where appropriate



A GVA Example from *Wave and Tidal Energy: The Potential Economic Value Policy and Innovation Group 2019*



Feedback Questions



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Feedback Questions

Summary

Q & A

Deployment Scenarios

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Geographical Scope

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Leakage

1. Do you agree with the reference leakage scenarios, with 10% variation?
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