9th & 10th July 2024, Brussels

Policy & Research Dialogue Conference

## Managing the Transition to Net Zero: EU Climate Policy in a Global Context





NDC ASPECTS and 4i-TRACTION have received funding from the European Union's Horizon 2020 Research and Innovation programme under grant agreements No 101003866 and 101003884.

#### The conference

Day 1: EU policy focus – investments, infrastructure, and international integration

Day 2: Global policy focus – hard to abate sectors, action by major emitters, cooperation



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#### A Resilient Climate Policy for a Just Transition to Climate Neutrality

Keynote by Yvon Slingenberg, (Acting) Deputy Director-General DG CLIMA



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#### The two Projects: Scientific Analysis to Support Effective Policy-Making for the Transition



Wolfgang Obergassel, Wuppertal Institute



Benjamin Görlach, Ecologic Institute

# **NDC**ASPECTS

Assessing Sectoral Perspectives on Climate Transitions to Support the Global Stocktake and Subsequent NDCs

Wolfgang Obergassel | Wuppertal Institute







- Learning from previous NDCs
- Conditions for subsequent NDCs
  - Systematically identify transformation opportunities and challenges, trade-offs and synergies
  - Determine benchmarks for collective progress
  - Derive ambitious yet realistic national pathways for selected countries
- Enabling conditions and options for enhanced climate action
  - policy and governance options for ambitious, effective, and transformative climate action
  - Transdisciplinary engagement to validate and promote policy options
  - Identify and formulate options to enhance (sectoral) governance at the international level
- Dissemination and exploitation



#### **Sectoral Approach**





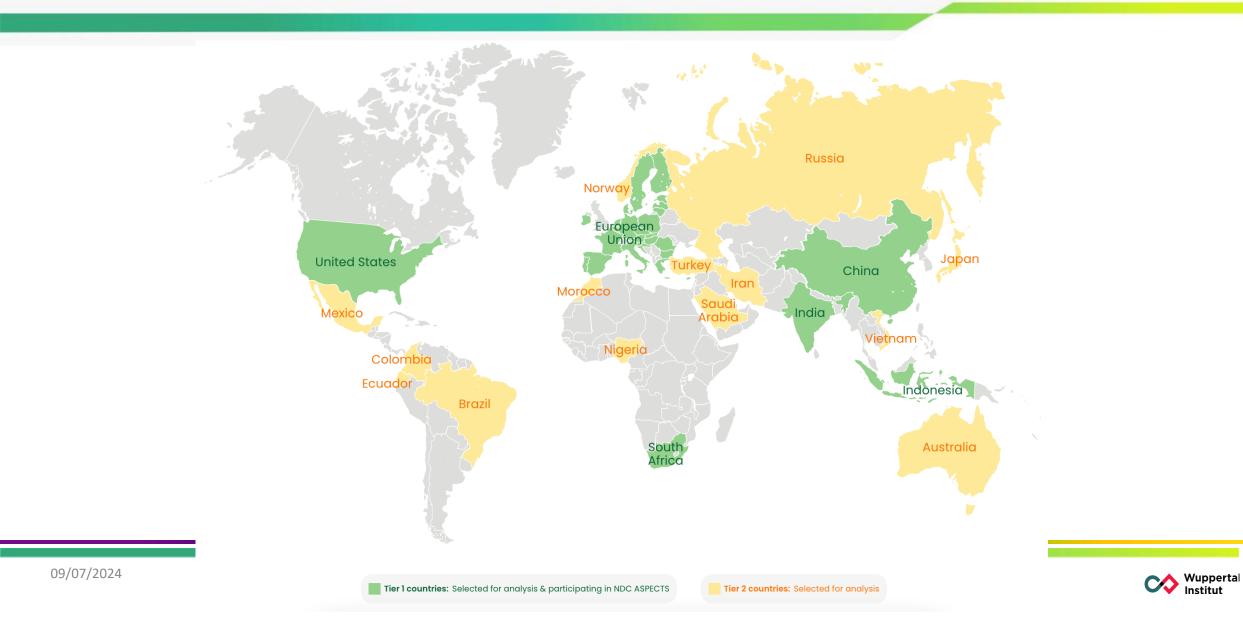


CROSS-SECTORAL INTEGRATION



#### **Geographic Coverage**







- New Messages for the "Hard to Abate" Sectors
- Sectoral Transformations in Other Major Emitter Countries
- Bending the Global Curve
- Avenues for International Cooperation



Consortium







BASQUE CENTRE FOR CLIMATE CHANGE

Klima Aldaketa Ikergai Sustainability, that's it!



Energy Economy Environment















The NDC ASPECTS project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No. 101003866.



## **4i-TRACTION**

innovation, investment, infrastructure and sector integration: TRAnsformative policies for a ClimaTe-neutral European UnION

Benjamin Görlach, Ecologic Institute, Project Coordinator

## **4i-TRACTION**



- What is needed to make EU climate policy transformative?
   Addressed through the lens of four related challenges:
  - fostering breakthrough **innovation**,
  - shifting investment and finance,
  - rolling out the **infrastructure** for a climate-neutral and resilient economy, and
  - **integration** of solutions across sectors.
- Backward-looking stocktake: what contributed to the achievement of EU targets, how well is current EU climate policy equipped to deliver transformative change?
- Forward-looking analysis: Which policy avenues could lead the EU to climate neutrality? What governance changes are needed to embark on these avenues

#### **Project parameters**



- June 2021 May 2024
- Nine research institutions from seven EU countries academic institutions and think tanks on the interface between research and policy
- Strong focus on governance, combining political sciences, economics, and law



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NDC ASPECTS

13:30 – 14:30	Keynote: A resilient climate policy for a just transition to climate neutrality
	<b>Context</b> : Scientific analysis to support effective policy-making for the transition
14:30 – 14:45	EU Focus: Making EU climate policy fit for the transition
14:45 – 15:30	Thematic Session 1: An EU Climate Investment Agenda
15:30 – 16:00	Coffee break
16:00 - 16:45	Thematic Session 2: An Integrated EU Energy Infrastructure Policy
16:45 – 17:50	<b>Future Policy Panel</b> : Effective EU Climate Policymaking in a Competitive Global Context
17:50 – 18:00	Closing of Day 1: Wrap-up and outlook
18:00 – 19:00	Reception



09/07/2024

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## Making EU Climate Policy Fit for the Transition to Climate Neutrality

Key Insights and Recommendations from the 4i-TRACTION Project

Benjamin Görlach, Ecologic Institute

9 July 2024



### **The Transformation Gap** What is lacking to make EU climate policy fit for transformative change?

#### **The Transformation Gap**



integration

Climate policy **integration** remains **uneven** across sectors and limited in agriculture and transport. The coordination of innovation, investment, and infrastructure remains deficient.



innovation

Progress is lacking across the **innovation** chain – but mostly at demonstration and deployment stages. This includes **limited and incoherent funding** and lack of directionality.



The climate **investment gap** is in the order of **€406 billion annually** and the existing framework is insufficient to mobilise it. In parallel to ramping up climate investments, EU must end investments into fossil value chains.

路

infrastructure

The roll-out of **infrastructure** for a climate-neutral economy is **too slow**, especially for energy and transport infrastructure, also due to a lacking **comprehensive strategy for transnational infrastructure**.



## Needs for Transformative Governance

In what ways does transformative climate policy have to go beyond "policy as usual"?

#### **Needs for Transformative Governance**

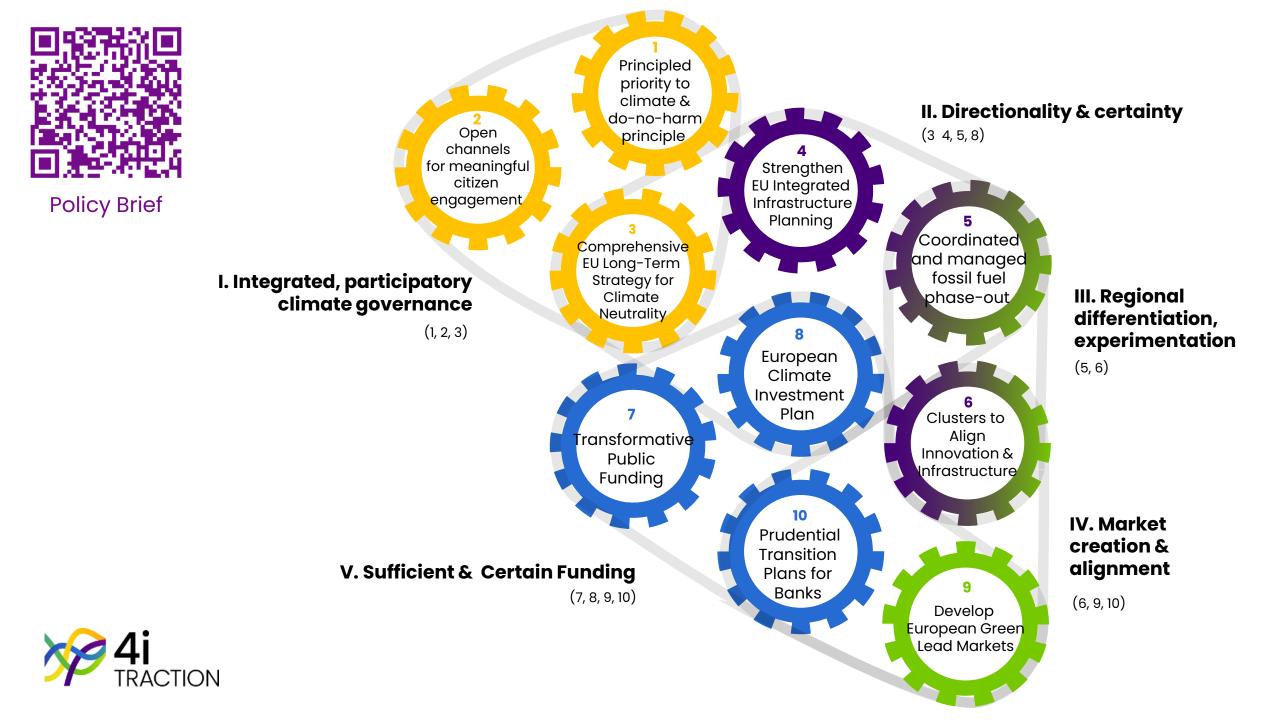


I. Integrated, participatory governance	<b>Needed: integrated, participatory</b> governance to coordinate parallel, interdependent developments across sectors, address <b>cross-cutting challenges</b> innovation, infrastructure and investment, secure <b>societal support</b> by involving stakeholders and ensuring buy-in
II. Provide directionality & certainty	<b>Needed: directionality and certainty</b> amid considerable uncertainty by aligning infrastructure, investment, and regulatory frameworks, providing greater <b>predictability</b> to investors and consumers about the possible way forward and necessary actions
III. Encourage regional differentiation, experimentation	<b>Needed: regional differentiation and experimentation</b> to capitalize on Europe's diverse regional strengths, encouraging regions to innovate based on their resources, skills, and infrastructure
IV. Market creation & alignment	Needed: align existing markets or create new ones to scale up solutions, mobilise private funding, and stimulate demand for climate-neutral solutions
V. Ensure Sufficient & Certain Funding	<b>Needed:</b> coordinated approach that <b>combines public and private investments</b> , aligns fiscal policy and financial regulation with climate neutrality and ensures a <b>stable investment framework</b>



## How to Make EU Climate Policy Fit for Transformative Change?

Ten Recommendations from the 4i-TRACTION Project



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#### Thematic Session 1: An EU Climate Investment Agenda Input: Clara Calipel, I4CE

Panel:

- Miguel Gil Tertre, Chief Economist, DG ENER
- Suzana Carp, Head of EU Policy, Cleantech for Europe



investment



## Thematic Session 1: An EU Climate Investment Agenda

Managing the transition to net zero: EU climate policy in a global context 09/07/2024

Clara Calipel, research fellow, I4CE



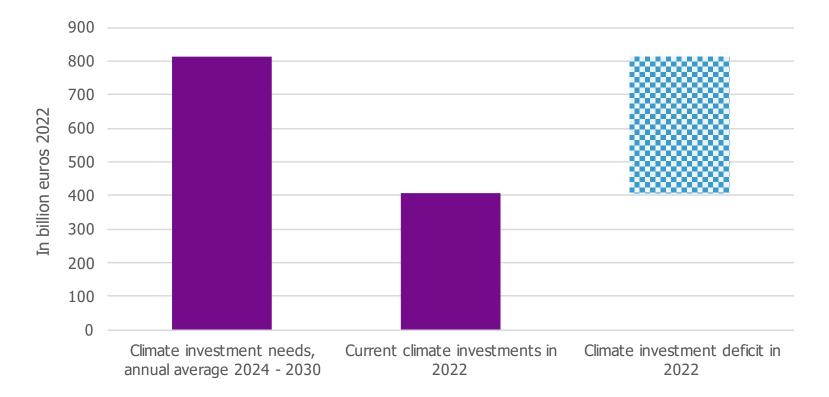
#### **Delivering the European Green Deal**



- To mitigate climate change and ensure Europeans can access clean, affordable and secure energy, the EU has set itself several ambitious targets for 2030 and 2050.
- In line with the EU climate and energy targets, Member States have updated their National and Energy Climate Plans.
- Delivering the European Green Deal and Member States NECPS requires significant investments, both public and private.
- Investment decisions made today shape the EU's future for decades to come.



## The climate investment deficit to reach EU 37 2030 targets



- Meeting the EU's 2030 climate targets requires at least €813bn of annual investment in the energy, buildings and transport sectors.
- This leads to annual climate investment deficit of €406 bn.

## The climate investment deficit to reach EU 3/2040 target

Table 16: Average annual energy system investment needs (billion EUR 2023).

	51			52			53			ΔLIFE		
	2031- 2040	2041- 2050	2031- 2050									
Supply	236	377	306	289	328	308	341	281	311	-59	-14	-36
Power grid	79	88	84	88	81	85	96	75	85	-15	-2	-9
Power plants	97	187	142	128	157	142	151	133	142	-28	-6	-17
Other	59	102	81	72	90	81	94	73	83	-16	-6	-11
Demand excl. transport	<u>332</u>	377	<u>354</u>	<u>355</u>	<u>357</u>	<u>356</u>	<u>372</u>	338	<u>355</u>	<u>-23</u>	<u>1</u>	<u>-11</u>
Industry	38	31	35	46	24	35	48	22	35	-7	-3	-5
Residential	225	250	237	237	242	239	248	230	239	-12	4	-4
Services	49	78	63	53	73	63	57	67	62	-4	1	-2
Agriculture	19	19	19	19	19	19	20	18	19	0	0	0
Transport	866	875	870	861	885	<u>873</u>	856	882	869	<u>-80</u>	-85	<u>-82</u>
Total	1433	1629	<u>1531</u>	1505	1570	<u>1537</u>	1570	1501	1535	-162	<u>-97</u>	-129
Total excl. transport	567	754	661	644	685	664	713	619	666	-82	-12	-47
Memo:												
Real GDP (period average)	19444	22369	20906	19444	22369	20906	19444	22369	20906	19444	22369	20906

Note: "ALIFE" compares the cost of the LIFE scenario to the S3 scenario, which both meet the same overall net GHG reductions by 2040.

Source: PRIMES.

- According to the European Commission, ~€1500 bn euros will be needed per year over the next decade (2031-2040) to meet the EC's 2040 target.
- Closing the climate investment deficit also has co-benefits for EU infrastructure modernisation, EU competitiveness and energy security.



#### A European Long-Term Climate Investment Plan to Close the Climate Investment Deficit



- While several instruments and policies exist at EU and national level to finance climate action, there is currently no mechanism in place to coordinate the different elements, including both public and private finance.
- In order to deliver the European Green Deal, and related national policies, and to close the climate investment deficit, the EU should implement a climate investment plan with a long-term view.
- This EU long-term climate investment plan should answer several questions, such as:
  - How much EU-level funding will be mobilized and how?
  - How much money is expected to come from public budget at Member States level and sub-national levels?
  - How to align subsidies, taxation and fiscal policies with EU climate objectives to provide a clear price signal for private investments?



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investment

## **Coffee Break**

#### We continue at 16:00

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#### Thematic Session 2: An Integrated EU Energy Infrastructure Policy

Input: Bettina Kampman, CE Delft

Panel:

- François Beaude, Strategy Lead, ACER
- Savannah Altvater, Head of Distribution & Market Facilitation, EURELECTRIC



infrastructure



## Infrastructure – policy recommendations

from the 4i-TRACTION Project

Bettina Kampman, CE Delft

9 July 2024

#### Strengthen EU Integrated Infrastructure Planning – Why?



- → A climate-neutral energy system requires a **very different infrastructure** than we have today
- → Some of the changes are drastic: power grid reinforcements, district heating networks, a hydrogen grid that extends to different regions and end users
- → Infrastructure needs to be expanded & adapted quickly enough to facilitate the necessary CO<sub>2</sub>-mitigation efforts in energy supply and demand
- → Recommendations aimed at overcoming the **key challenges**:
  - → Funding
  - Coordination
  - → Long lead times

#### Infrastructure: policy recommendations



- → Building on existing EU-coordination programmes and institutions, the EU should take a stronger role in ensuring the necessary transnational infrastructure is planned and implemented.
- → Develop an EU Integrated Infrastructure Plan that aligns with the EU's climate goals and long-term strategy.
- → Strengthen EU governance by designating infrastructure as one of the key dimensions of the EU Governance Regulation.
  - → Strengthen and expand infrastructure-related planning requirements in NECPs and LTSs.
- → EU infrastructure policy should first focus on **expanding electricity infrastructure.**

All this can build on existing institutions and policies

#### Thematic Session 2: An Integrated EU Energy Infrastructure Policy

Input: Bettina Kampman, CE Delft

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infrastructure

#### **Closing of Day 1**

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## Managing the Transition to Net Zero: EU Climate Policy in a Global Context





Future Policy Panel: Effective EU Climate Policymaking in a Competitive Global Context

#### Panel:

- Marta Torres Gunfaus, Director, Climate Change Programme, IDDRI
- Thomas Pellerin-Carlin, MEP-elect for S&D group
- Hilton Trollip, University of Cape Town

**Moderation: Matthias Duwe, Ecologic Institute** 







OR

OR

b. go to **menti.com** & enter **89 61 50 2** 

c. click on the **link** in the chat

#### **Closing of Day 1**

Policy & Research Dialogue Conference

## Managing the Transition to Net Zero: EU Climate Policy in a Global Context





Day 2: Global policy focus – hard to abate sectors, action by major emitters, cooperation

## Welcome coffee from 08:30 Start at 09:00

**See you tomorrow!** 

