

Assessing the potential for Nordic Energy Technology Perspectives 2

Background information + Questions for discussion

Nordic energy-related CO₂ emissions



NETP presented three Nordic scenarios based on the IEA's global 4C and 2C scenarios. The Carbon Neutral Scenario describes an 85% reduction from 1990, representing national climate goals for 2050, in a world heading for the global 2C scenario.

order



Nordic total primary energy supply



In the Carbon-Neutral Scenario - the main scenario for NETP - biomass replaces oil to becomes the largest energy source, while growth in wind power contributes to net electricity export in 2050.

norden

rdic Energy Research

Energy Agency





Key challenges



CCS 🗸

Infrastructure

Biomass Supply

NETP identified the four challenges above and Nordic cooperation as the key challenges to address

Nordic Energy Technology Perspectives







Controversial results from NETP 1

- Significant net electricity export in 2050
- Industrial activity level in 2050 in line with today
- Net biomass import in 2050
- Nuclear power in Sweden and Finland
- CCS in industry

NETP1 goals

- 1. To provide a common reference document for energy technology policymaking
- 2. To profile the Nordic region as a leader in low-carbon energy system transition
- 3. To strengthen Nordic research competencies

(tentative) NETP2 goals

- 1. Assist Nordic decision-makers in realising the opportunities presented in NETP scenarios
- 2. Contribute with knowledge for policy-makers in other countries by distilling Nordic lessons
- 3. Further develop Nordic research competencies

NETP1 vs NETP2 focus (tentative)

Scenarios — Scenarios

Indicators — Indicators

Policy overview — Policy overview

Short-term recommendations —— Short-term recommendations

In-depth analysis — In-depth analysis

Less focus on the scenario results as they won't have changed much

More focus on indicators to show how we are doing relative to the targets

Less on the current policy overview and the structure of the energy system as they have not changed

More focus on recommendations for financing, infrastructure and instruments in the short term

More focus on in-depth analysis of specific issues relevant to achieving the scenarios



Organisation

NETP1

20	11								20 ⁻	12											20 ⁻	13	
Apr	Mai	Jun	Jul	Aug	Sep	Okt	Nov	Des	Jan	Feb	Mar	Apr	Mai	Jun	Jul	Aug	Sep	Okt	Nov	Des	Jan	Feb	Mar
calls							planning analysis						reviev						launch				
	approval						kicł	kickoff						analysis					layo	out,	print		

NETP2 (tentative) – a longer process

20	14											20	15											20 ⁻	16				
Jan	Feb	Mar	Apr	Mai	Jun	Jul	Aug	Sep	Okt	Nov	Des	Jan	Feb	Mar	Apr	Mai	Jun	Jul	Aug	Sep	Okt	Nov	Des	Jan	Feb	Mar	Apr	Mai	Jun
	calls							planning analy												review					launch				
app	orova	al					kicł	kickoff				analysis											layo	out,	prin	ting			



Evaluation: External stakeholders: Which areas would benefit from deeper analysis?



Compatibility of potential focus areas with Global ETP (bigger = more compatible)



- The link between the Nordic region and Europe
- The role of RD&D activities
- Required policy actions in the coming decade
- The role of Nordic cooperation
- Results for individual Nordic countries
- How Nordic solutions could apply outside region
- Deeper sectoral analysis
- Greater variation in the scenarios





Discussion

- 1. How can a second NETP improve on the first?
- 2. What are the key areas of analysis most relevant for [country] ?
- 3. Which [national] solutions are other countries most interested in? How can they be included?
- 4. How can we make it more accessible/useful for decision-makers? How will the timing fit national processes?
- 5. How should a second project be organised vis-à-vis NETP1?



Further discussion

- 1. What are the three questions <u>Nordic end-users</u> would like the NETP 2 to answer?
- 2. What are the three questions *international end-users* would like the NETP 2 to answer?
- 3. What are the three questions <u>researchers</u> would like the NETP 2 to answer?