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# **Sustainability transition from macro policies to regional practices?**

## **Development actors' perspective on forest bioeconomy**

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# Research based on two projects

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# Background

- Starting point: Forest bioeconomy discourses have raised to a central role in the sustainability transition which impacts on the regions within the forests
- **Policies** at the European Union (EU) and national levels **produce the bioeconomy discourses** aiming to **govern the transition into favorable direction** (Gibbs & O'Neill 2014; Rakovic et al. 2020; Skarbøvik et al. 2020; Albrecht et al. 2021)
- Transition through bioeconomy **seems promising** for a **forest-rich country** where **desired future development** is centered around the **forest bioeconomy** and related businesses (Hetemäki et al., 2017; Hurmekoski et al., 2018; Programme of Prime Minister ..., 2019; D'Amato et al., 2020; Kunttu et al., 2020; Näyhä, 2019)
- In **European forest peripheries** like East and North Finland (2019), most of the regions **have downscaled the norms** of sustainable development **to the regional level** and **set similar expectations** to forest bioeconomy

# However 1

The forest bioeconomy discourses are loaded with **various tensions**:

- between **economic growth** and **ecological conditions** such as biodiversity and carbon sinks (see Mutanen et al., 2019)
- between regimes/orientations: **techno-economic** and **socio-techno, biotech** and **biomass**, (Geels, 2011; Perez, 2016; Kleinschmit et al., 2014; Befort, 2020), environmental concerns (Mustalahti, 2018; D'Amato et al., 2020) -> **biosave**
- **social justice, fairness, and equity** (e.g. Ramcilovic-Suominen and Pülzl, 2018) between **people and places**

# However 2

The forest bioeconomy discourses are loaded with various tensions:

- Between **scales**, geographical **differences** and **possibilities** of promoting transitions in a certain direction, spatial **hierarchies** and **power relations**  
(Truffer et al. 2015; Truffer & Coenen, 2012)
- Power relations
  - **who can impact** the transition
  - **whose** values, voices, and concerns **are recognized**
  - **whose** socioeconomic and environmental **benefits are improved**

(Lawhon & Murphy, 2012; Truffer et al., 2015; Kenter et al., 2019)

# Normative macro policies

- Normative **top-down** policy-documents which **set the rules of the game** for the forest discourses (cf. Art and Buizer, 2009)
- Represent the **ideas and goals** which are **downscaled further** to the lower levels at first adopting them into the national policies
- **“You can have it all (if you close your eyes)”** discourse identified as the most striking **hegemonic discourse**
- The utilization of forest-based resources can be done in a way that:
  - economic growth and various benefits can be provided
  - without ruining biomass production possibilities, the welfare of future generations, or the ecological system

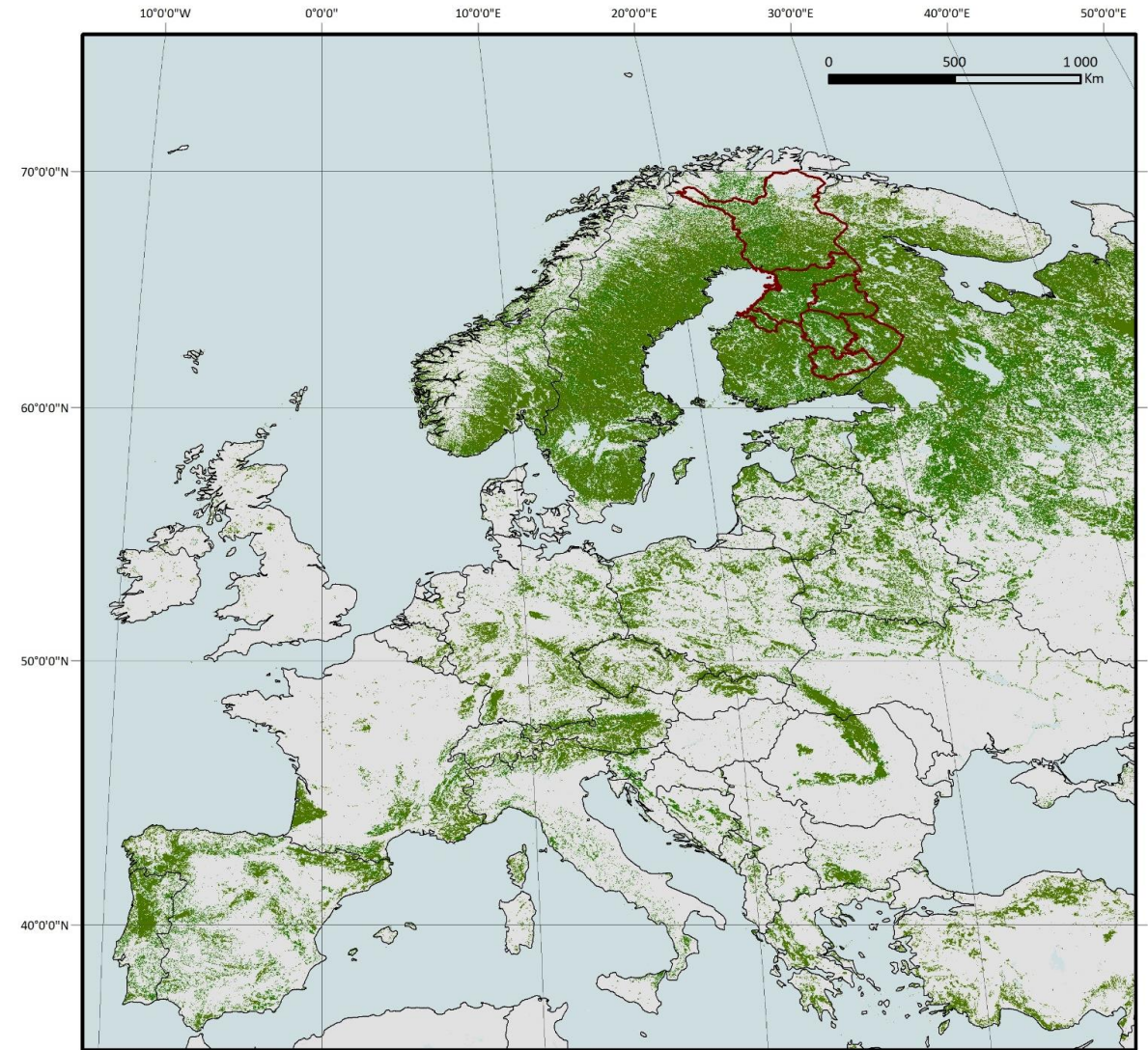
# Reviewed forest-related and forest-focused policy documents

Level	Focus	Document
International	General	UNEP: Towards a Green Economy
International	General	EU: The European Green Deal
International	Bioeconomy	EU: A Sustainable Bioeconomy for Europe
International	Biodiversity	EU: Biodiversity strategy for 2030
International	Land use, Forests	EU Regulation 2018/841: Lulucf *
International	Forests	EU: Forest strategy (current & preparation)
National	General	Programme of Prime Minister Sanna Marin's Government
National	General	Sustainable Growth Programme for Finland
National	Bioeconomy	Bioeconomy Strategy 2014
National	Forests	National Forest Strategy 2025 (update 2019)
National	Forests	Government Report on Forest Policy 2050

\*Lulucf regulation is counted as a part of governing policies

# Regional practices

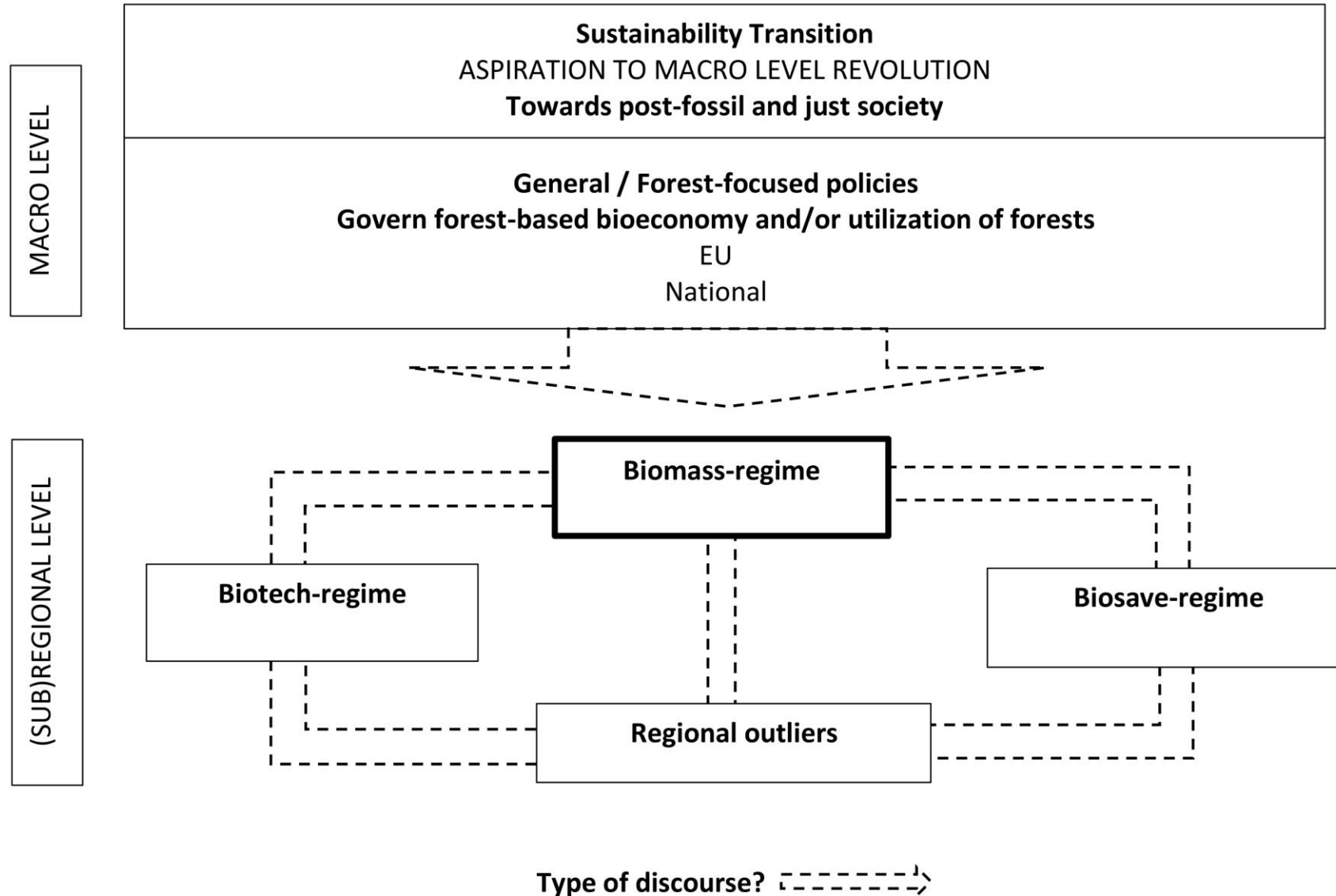
- Focus area: East and North Finland as examples of forest peripheries in Europe
- Data: 20 interviews with regional (provinces) and sub-regional development actors (2020-2021)
- Critical discourse analysis (Fairclough, 1995; Fairclough, et al. 2013):
  - (re)production of political, economic and cultural changes
  - power relations
  - forms of (in)justice
  - Interplay between institutional macro structures and localized social action



Data sources: ECJRC, 2003; ArcGIS Hub, 2015; National Land Survey of Finland & Ek, 2021



# Analytical Framework



# You can have it all - is possible

- The combination of forest bioeconomy and socio-ecological **objectives** are seen highly suitable for the regional development
- The **aspirations** of regional development actors reproduce the biomass-regime as the **hegemonic discourse** to which **other** regimes and regional outliers **can be merged**
- For instance, the aims of climate change mitigation are **not presented as the opposite** to regional biomass-regime but as a natural part of it
- **Macro policies** appear to be **smoothly directed** to the **regional attempts** and **no conflicts** arise in **power relations**

# You can have it all – is dependent on many ifs

- Explicit when the policies are downscaled from the objectives to the **practices**
- The **realization** of bioeconomy-based transition set an **emphasis on technoeconomic drivers** and challenge institutional orientation
- Crucial factors or conditions are **not smoothly merged** with the hegemonic discourse
- The **spatial randomness** of actors who would **be able** and **willing** to use their innovative or transformative power
- The **power relations** become more **complex** as they appear vertical and horizontal within the heterogenous actors' network in and out of the regions

# You can have it all – runs into conflicts

- Conflicts arise because of **unfavorable interlinkages between parts** of the regimes, policies, regional outliers and actors within them
- The quality of the tensions may be
  - **Explicitly concrete** between the policies and practices
  - **Abstract and hidden** between regional and non-regional **knowledge, recognition, political will, or benefits**
- Three **main conflicts** arise which also relate to **powerlessness**
  - **Relatively small scale** of economic activities
  - **Uncontrolled ownerships** of forest resources
  - **Eco-cultural clashes** between local and non-local heritage/knowledge

# Concluding remarks

- Ideals and general aims of macro policies are rather effectively downscaled to regional aspirations but they tend to collide with region specific practices
- The sustainable forest-based bioeconomy can be governed by the institutions within certain limits but the realization of the aims requires suitable match between policy implementations, regimes, and regional outliers
- This complex combination adds the randomness of the outcomes of sustainability transitions, as well as experiences of insecurity and possibly unjust transitions
- Transition appears unjust especially if the external benefits, knowledge and heritage are regarded over the regional ones

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