

Governing Bioeconomy Pathways

An Initiative of the
Stockholm Environment Institute

Bioeconomy In Action Workshop
Bangkok, Thailand, 3 April 2023



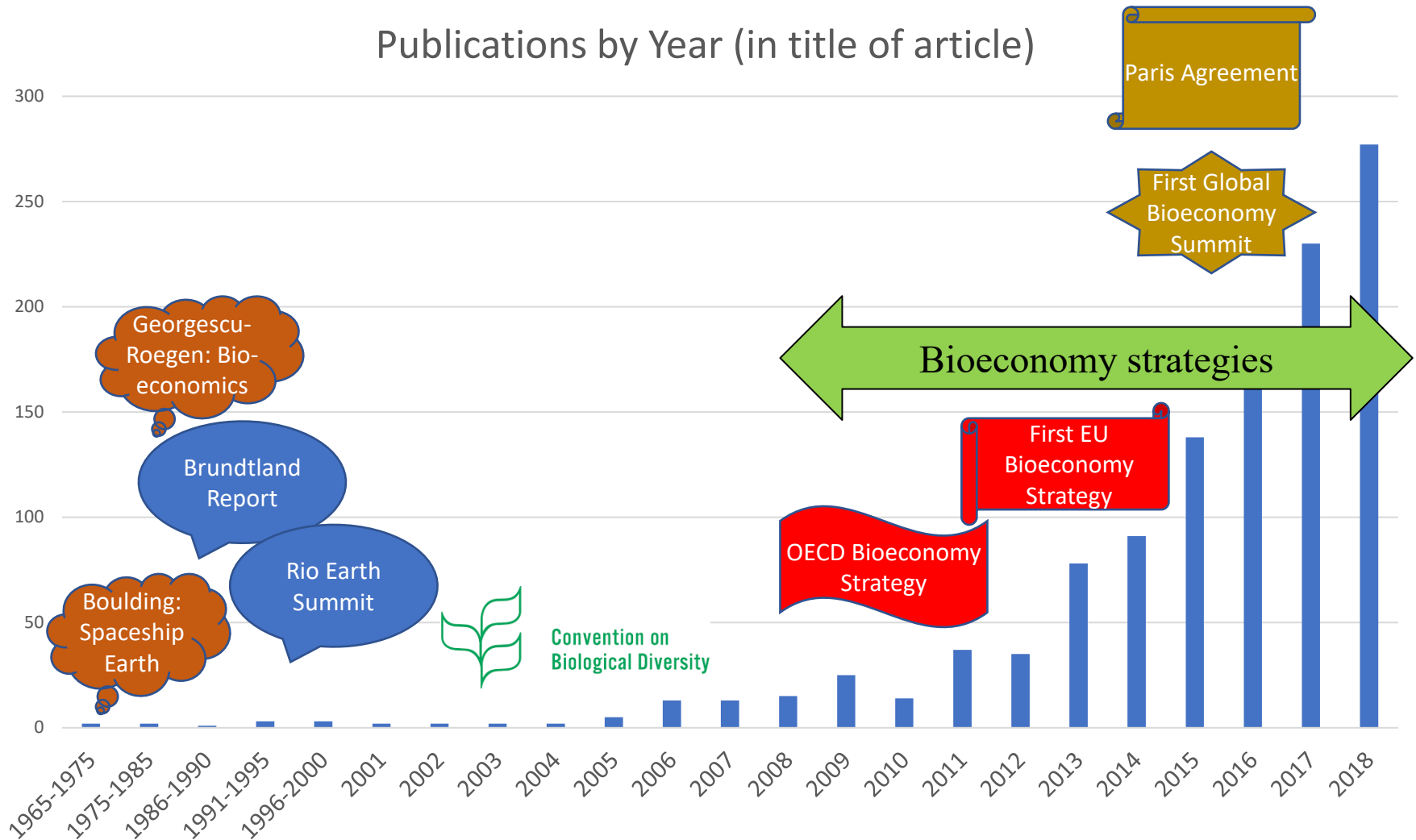


- SEI founded in 1989 from predecessor: **Beijer Institute**
- Named for 1972 UN Conference on the Human Environment (known as the **Stockholm Conference**)
- **Mission:** induce change towards sustainable development
- Circularity/Bioeconomy are key, historically and thematically



Some historical background:

Sustainable Development as a concept came out of Bioeconomy!
(numbers/refs from Google Scholar: bioeconomy, bioeconomies, bio-economics)



Working definition of the bioeconomy

GBS 2018

The production, utilization and **conservation** of biological resources, including related knowledge, **science, technology**, and innovation, to provide **information, products, processes** and services across all economic sectors aiming toward a sustainable economy.

The **3 Bioeconomy visions**: used in analysis and in framing discussions



Bio- technology vision

Achieve economic growth and job creation through application of biotechnology and commercialisation of research and technology



Bio- resource vision

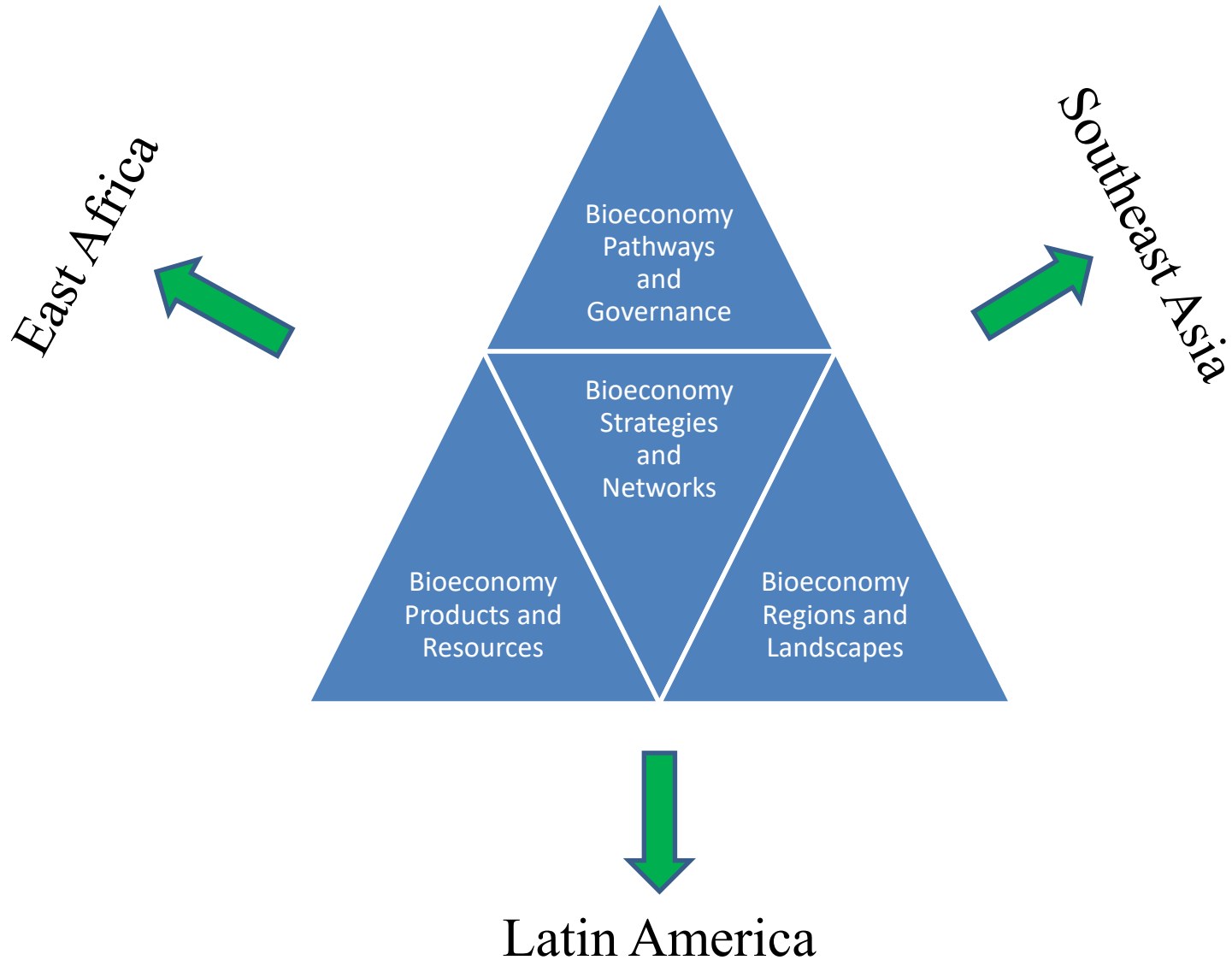
Achieve economic growth and sustainability through conversion and upgrading of bio-resources for human use



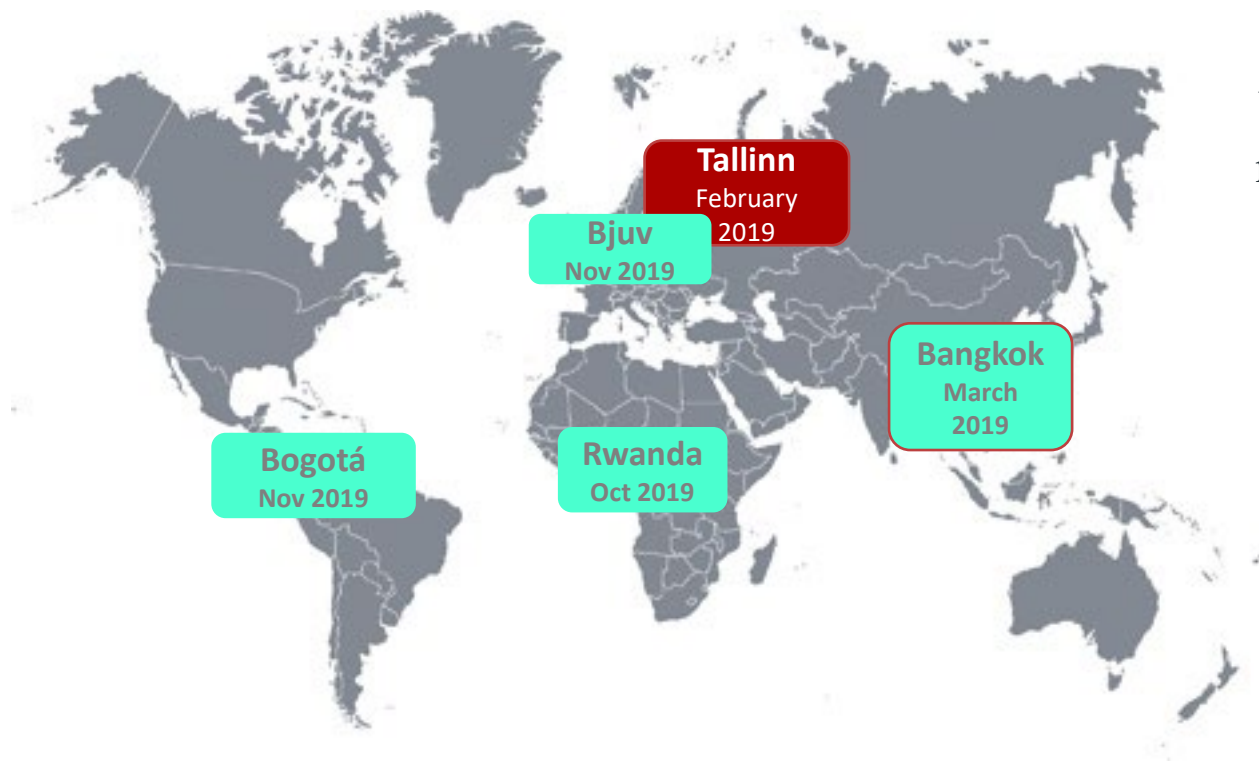
Bio-ecology vision

Achieve sustainability, biodiversity, conservation of ecosystems and avoiding soil degradation through integrated production systems

Cross-regional engagement



Policy Dialogues on Bioeconomy Pathways



Aim was to investigate the **barriers** and **enablers** for a more **inclusive** bioeconomy across different **visions** and potential **pathways** of implementation and across different **bioresource** endowments, levels of **governance** and levels of **development**

 = pilot dialogue

Comparison across Bioeconomy Visions for the four Dialogues

Dialogue location	Key Theme(s) in the dialogue	Biotechnology	Bio-resources	Bio-ecology
Sweden (southern)	Circular bioeconomy for Food Production	Biotechnology needs dictated by sustainable bioeconomy aims rather than being drivers	Focus on developing biomass resources to full potential by well-integrated local supply chains	Resource efficiency and circular economy contribute to improved local ecology
Colombia	Aligning sectoral strategies	Emphasis on the linear model of biotechnology development based on investment in scientific research	Focus on differentiated territorial development based on variation in agroecological and socioeconomic conditions	Safeguarding of genetic material and protection of genetic resources but emphasising markets alongside conservation
Rwanda	Alternative pathways for woody biomass use	New technologies for conversion in combination with improved land use management systems	Shift from uncoordinated resource extraction to planning for long-term resource use and applications	Planning for conservation, sustainable land management and greater diversity in managed landscapes
Thailand	Inclusive Bioeconomy strategies	Strategic application of biotechnology targeting valued-added products for regional markets	Strategies for increased use of agricultural resources that offer improved income and livelihoods to farmers	Establish environmental sustainability criteria to be applied and compared across bioeconomy pathways

Global Bioeconomy Summit 2020 (online)



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Track 4: Regional bioeconomies & global collaboration

Regional cooperation for innovative bioeconomy pathways to promote health and well-being

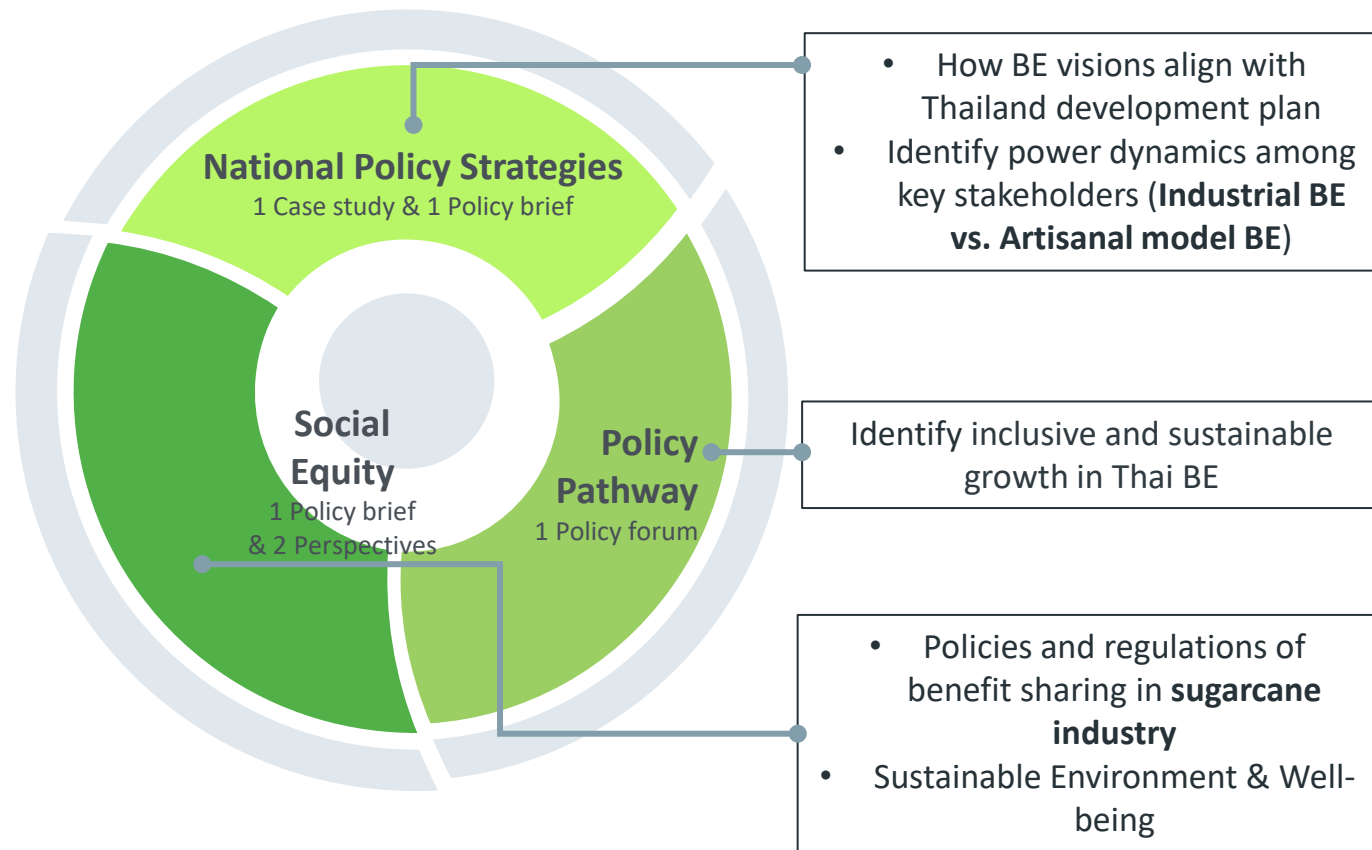


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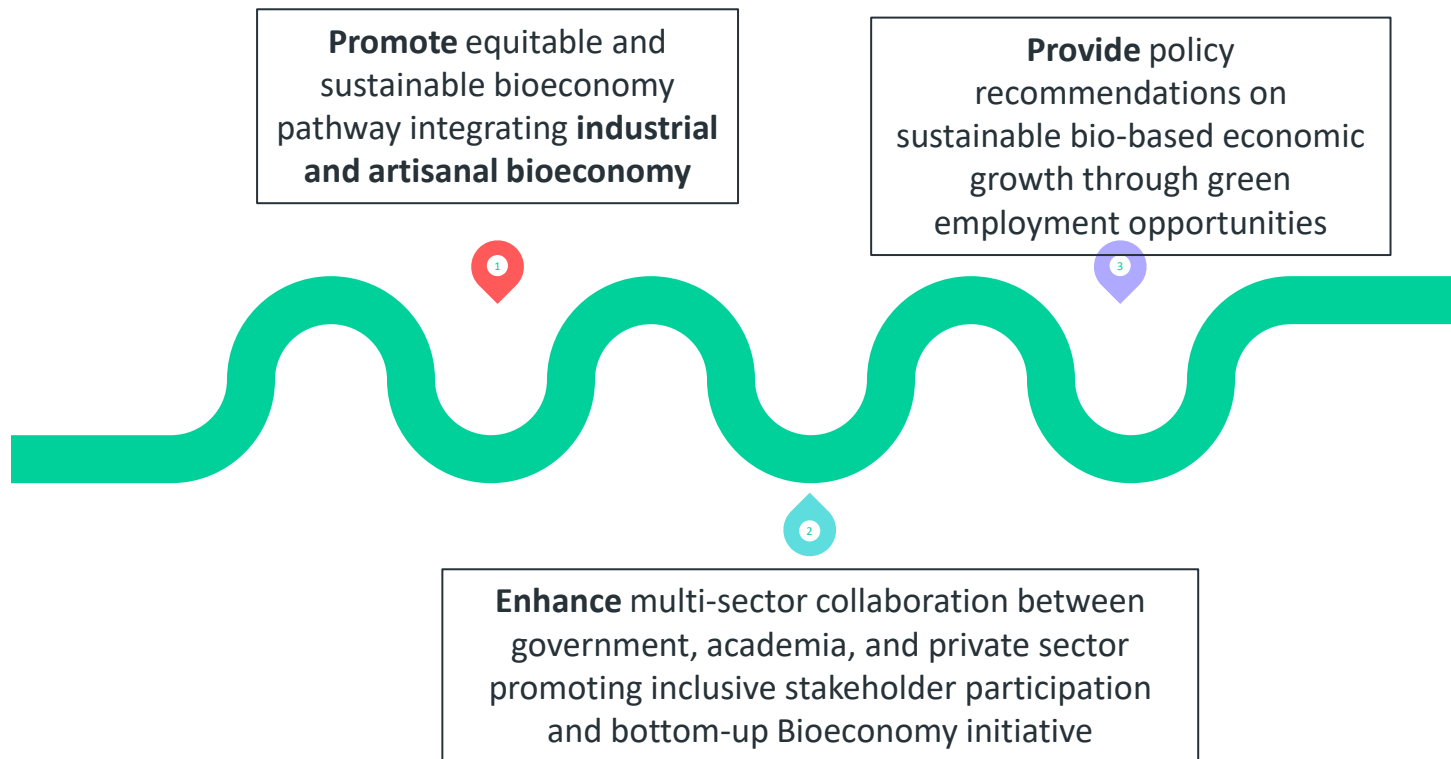
Timing: November 16, 4-6 p.m. (CET) and November 18, 8-10 a.m. (CET)

Bioeconomy Phase 1 & 2 Asia Centre

Focus on social equity and inclusivity



Bioeconomy Policy and Practice in SE-Asia



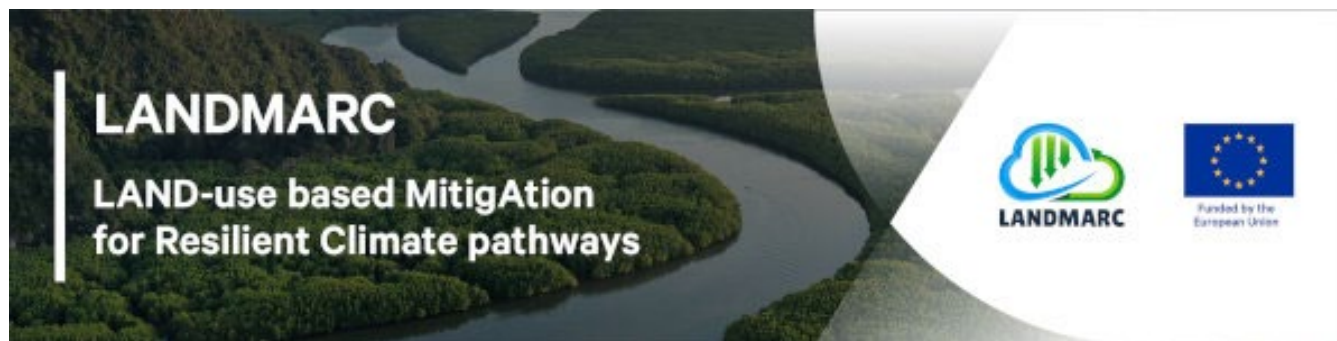


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<https://www.sei.org/projects-and-tools/projects/sei-initiative-bioeconomy/>



<https://www.landmarc2020.eu/>