Sitra's and Finland's circular economy journey – Inspiration for Serbia and beyond

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Outline of the presentation

What does a future house do? And what are megatrends and weak signals?

Insights from Sitra's and Finland's circular economy road map work.

Strategies and tools for accelerating the circular transition in businesses.



1. FORESIGHT

Study both megatrends and weak signals to project possible futures.



5 important things

- 1. A gift from Parliament to the 50-year-old Finland. Still under the direct control of the Finnish Parliament.
- 2. An independent future house: a futurologist, visionary, developer, experimentalist, financier, partner, trainer, and networker.
- 3. The aim is the successful Finland of tomorrow, the vision is the next era of well-being a fair and sustainable future.
- 4. Funded by returns on endowment capital and capital investments.
- 5. The vision is implemented by three themes and hundreds of projects.

+ the most important of all

Building our future together.



Mega trends 2023

What trends will shape society in years to come?



WEF Global Risk Report

In this year's report, 5/6 risks over the next 10 years are environmental...

...compared to 3/6 in last year's report.



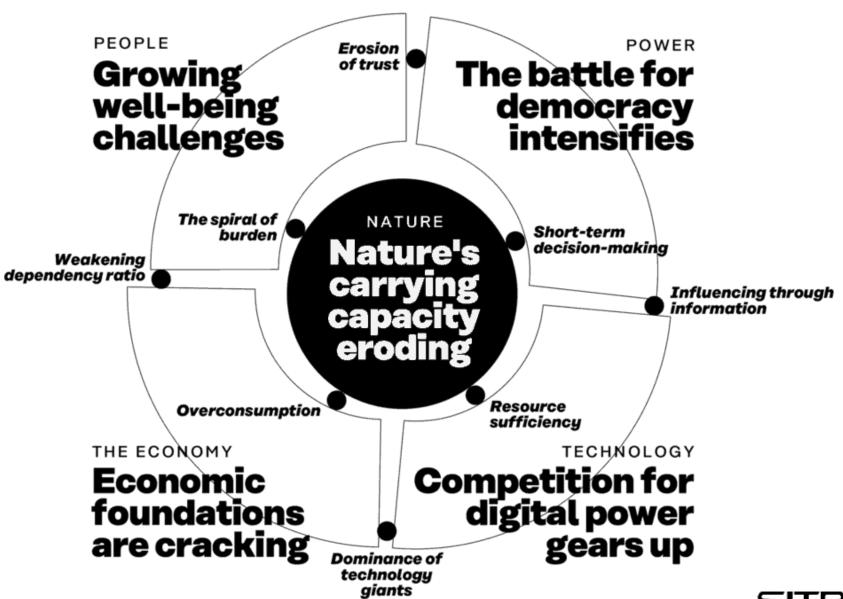
https://www3.weforum.org/docs/WEF_Global_Risks_Report_2023.pdf



Mega trends 2023

What trends will shape society in years to come?

How can we design solutions for this future?





Solving for the future

We have designed today's society...

...we can also redesign it.





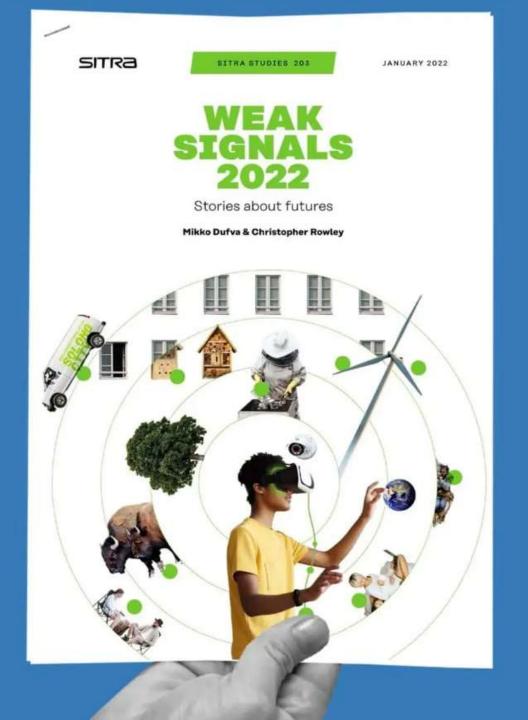
We have pioneered studies that capture the potential of a circular economy in tackling climate change and biodiversity loss

Circular approaches in steel, plastics, cement and aluminium can create large savings and reduce CO₂ emissions from materials production in the EU by 56% by 2050.

Sitra etc. 2018: The Circular Economy – A Powerful Force for Climate Mitigation

A circular economy in four sectors can halt and reverse global biodiversity loss by 2035







2. ROAD MAP

Set the course with clear targets, effective collaboration and concrete steps for delivery.







Use

The product should be used for as long as possible, it must be serviced and repaired and parts changed when necessary.



Consumer demand creates a supply of sustainable products and commodities.

From company to company

Companies will procure and require their subcontractors to provide parts that can be easily repaired – instead of single-use parts.

Retail

Retailers will sell services instead of goods and inform customers about maintenance and repair services, environmental impacts, materials and further use in the final phase of the life cycle.

Distribution

Transport co-ordinated between different sectors, renewable fuels and jointly owned transport equipment will be used in distribution.

The life

cycle

continues in <u>a new</u>

loop

- **1** Sustainable food system
- **2** Forest-based loops
- **3** Technical loops
- 4 Transport and logistics
- **5** Common action

Primary sector (raw materials sector)

The raw materials are capital for the primary sector. Sustainable solutions are based on the wise use of raw materials.

Material processing

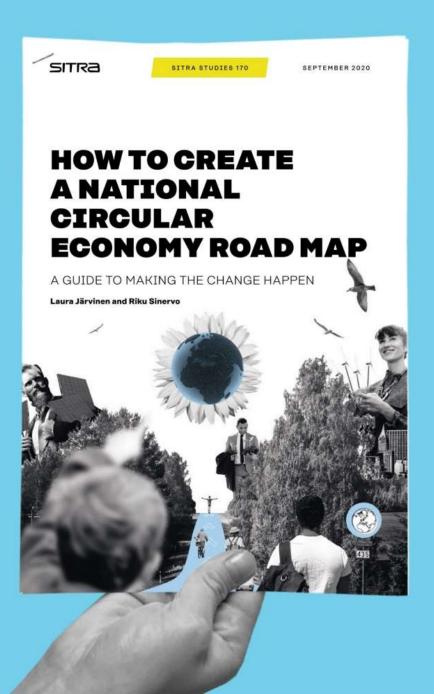
Process planning will reduce the energy needed to refine huge amounts of raw materials. The use of side streams will be taken into consideration.

Manufacturing industry

Long-term products that can be repaired and maintained will be brought onto the market.

Materials will be separated at the end of the product's life cycle.





How to create a national circular economy road map?

Based on what we have learned, we put together a guide to help countries **start their journey** towards a circular economy.

The guide features **tools**, **guidelines** and **inspiration** for countries that want to move towards or are already taking their first steps towards a circular economy.

The guide can be used as both an inspiration and a guide that walks the reader through each phase of the road map process.



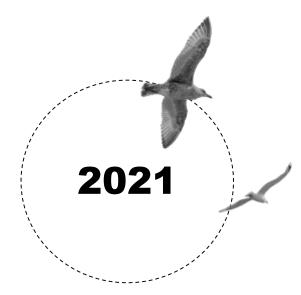


The road map process in a nutshell

- 1. Groundwork and preconditions
- 2. Stakeholders and participation
- 3. The situational picture
- 4. Vision and goals
- 5. Focus areas
- 6. Planning the actions
- 7. Compile and publish
- 8. Execution and implementation
- 9. Evaluation and revision



Circular economy as a sustainable foundation of Finland's economy



Finnish strategic programme to promote a circular economy

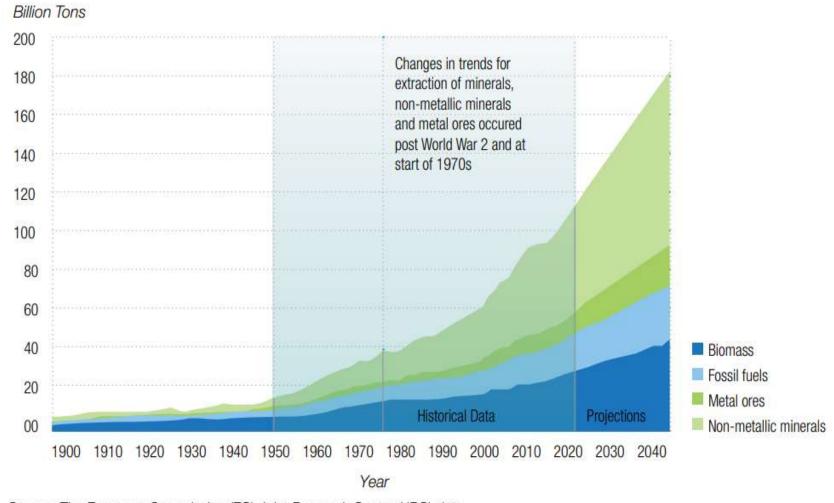
The programme was created in collaboration with many societal stakeholders. It outlines **three objectives:**

- 1. The consumption of non-renewable natural resources will decrease, and the sustainable use of renewable natural resources may increase to the extent that the total consumption of primary raw materials in Finland in 2035 will not exceed what it was in 2015.
- 2. Resource productivity will double in 2035 compared with 2015.
- 3. The circular material use rate (CMU) must also be doubled by 2035.



The goal is to reduce our resource extraction by rethinking our relationship with materials

FIGURE ES.1: HISTORICAL AND PROJECTED GLOBAL MATERIAL EXTRACTION BY RESOURCE



Source: The European Commission (EC) Joint Research Centre (JRC) data



Public procurement to accelerate the circular economy is key

Sustainable use of public funding calls for taking account of the circular economy in public procurement. The KEINO Competence Centre for Sustainable and Innovative Public Procurement in Finland provides public organisations with tools to do this.



Photo: Topias Dean/Sitra

https://www.sitra.fi/en/cases/publicprocurement-accelerates-circular-economy/



https://www. mvicriteria.nl/en

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3. BUSINESS

Provide the tools, facilitate collaboration and promote good examples.



BUSINESS EXAMPLES

124 examples to explore.

Most interesting companies in the circular economy in Finland 2.1 - Sitra

BUSINESS MODELS

Product-life extension

Product as a service

Sharing platforms

Resource efficiency and recycling

Show all

ENTERPRISE SIZE

Large enterprise

Startup

Small and medium-sized enterprise

Show all

Renewability



3stepIT offers more than just the leasing of laptops: "Up to 98 per cent of devices re-enter circulation"



Combi Works takes advantage of factories' surplus capacity: "We offer factory production as a service"



Lindström provides workwear as a service: "We reduce overconsumption of textiles and save natural resources"



Whim gathers all modes of transport into one package: "We provide freedom of movement without the trouble of ownership"



Tamturbo offers compressed air as a service: "We are creating a technological revolution in factories"



3stepIT offers more than just the leasing of laptops: "Up to 98 per cent of devices re-enter circulation"



"As our name suggests, we are involved in the three steps of a device's life cycle: helping customers find the right device, monitoring its use and ultimately ensuring the reuse of the device.

The manufacturing of phones, computers and tablets consumes natural resources. This makes it important to ensure that a device's life cycle is as long as possible.

The monitoring and reuse of devices reduces their carbon footprint by 40 per cent.

Mika Enberg, Managing Director

Lindström provides workwear as a service: "We reduce overconsumption of textiles and save natural resources"



"We provide companies with the textiles they need and look after the entire life cycle of the products, from design to reuse.

We design and manufacture textiles only for the companies' needs and make them as durable as possible.

This enables us to reduce overconsumption and save natural resources."

 Anna-Kaisa Huttunen, Former Senior Vice President





www.circularplaybook.fi





www.kemianteollisuus.fi/ hiilineutraalikemia2045

www.nordicinnovation.org/nordiccircular-economy-playbook



The most interesting companies in the circular economy in Finland

A list compiled by Sitra to showcase Finland's most inspiring examples of the circular economy.

- 1. Product-life extension
- 2. Product as a service
- 3. Sharing platforms
- 4. Renewability
- 5. Resource efficiency and recycling

Sitra is using the list as a way to challenge Finnish companies to meet the changing needs of the world.



Implications of the presentation

- 1. Use the circular economy as a tool for tackling multiple crises at once (climate, biodiversity, pollution and resilience).
- 2. Focus on national areas of particular importance and continuously map emerging opportunities.
- 3. Leverage the potential of public procurement start with a few services.
- 4. Facilitate partnerships and catalyse the business transition.
- 5. The future is circular: Measure the transition to unlock it!





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