Nature Based Materials

based on Circular Value Chains

Circular Biobased Products
June 22, 2023
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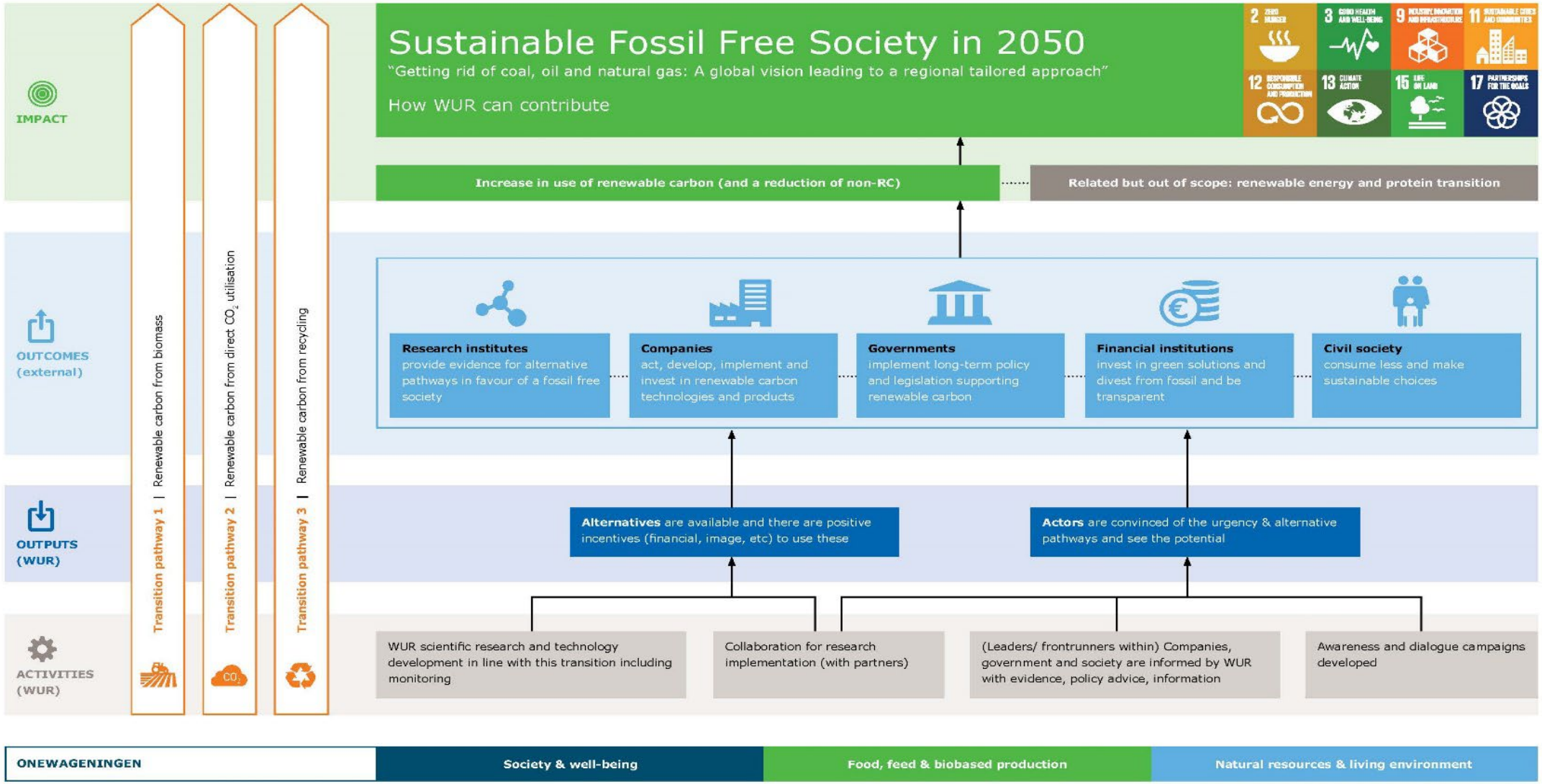

Assumptions

1 Agenda WUR aligns with agenda's of partners that are needed to make the foreseen transition.
2 The information is well understood and reaches the right people / organisations.
3 The external output is of such kind that it leads to raising awareness, dialogue and campaigns / lobby.
4 There is enough funding for the research programmes.
5 The entire WUR has incorporated this transition in their work and output.
6 There is a clear alternative pathway on which various actors can act and benefit from acting.
7 Actors have the willingness, ability, tools and resources to act on this new knowledge (resistance is overcome).
8 Market system dynamic is in favor of alternatives; Society norms and values aligns with alternatives
9 Implementation leads indeed to a sustainable fossil free society

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Some facilities

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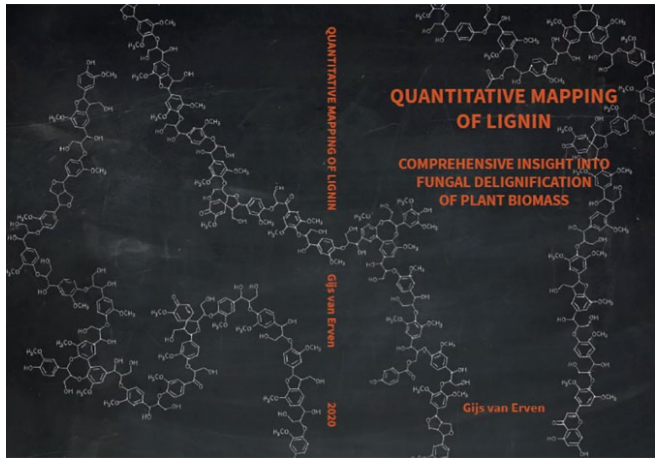
Using nature based resources for every day materials, ingredients and products

To transform our current fossil-based society to a sustainable climate neutral one within planetary boundaries, we need to produce our materials and ingredients from biobased resources. The preferred way to do so is to use the **functionalities** and components that nature provides and fit those to the applications we need in everyday life. We develop **mild innovative biorefinery and conversion technologies** and **sustainable value chains** to source and valorize all the components in biomass as feedstock for renewable materials, ingredients and products.

We provide technical and non-technical solutions as part of **circular ecosystems** for applications in areas such as infrastructure, building materials, textiles, packaging, ingredients and interior. Always in balance with its local conditions and requirements.

Biomass Characterization and Valorization



Few examples
- Flavour from asperagus residues
- Chitosan from fungal residues
- Protein from microbial biomass
- Biostimulants from algae
- Insect feed from household wastes
- Anti-oxidants from grape seeds
- Lignin based binder

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Biobased Building Materials

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Thank you
for your attention

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