

Living within the planetary boundaries

Biomass as the base of our future circular society

Wageningen University & Research is proud to announce the conference: Living within the planetary boundaries – biomass as the base of our future circular society, Circular@WUR, from 6 till 8 December 2021.

Circular@WUR provides an overview of the state-of-the-art of current knowledge about a circular, bio-based society. At the conference participants not only can listen to relevant and impactful keynotes, but they can also actually experience the circular challenge themselves by participating in masterclasses, attending relevant sessions and obtaining inspiration by visiting the most innovative circular companies in the Netherlands. Ultimately Circular@WUR aims to provide pathways to accelerate the transition towards a circular bio-based society ensuring climate restoration.

The conference is built around the graph of the Sustainable development Goals in figure 1. In this graphic the SDGs fall apart into 4 categories: 1) Biosphere (the bottom ring); 2) Society (the middle ring); 3) Economy (the top ring) and 4) SDG 17 for partnerships that is connecting all three rings like a pin. Each of these themes will be introduced by highly relevant and impactful keynote speakers.



Figure 1: Relation of different domains within the Sustainable Development Goals (SDGs), biosphere, society, and economy and the connecting partnership arrow.

(adapted from the original figure of the Azote Images for Stockholm Resilience Centre)

For our conference scope we defined four main topics along 4 categories



Biosphere Rethinking our food and bio-based systems





Society

Social organisation and risk management in a circular bio-based society





Economy
Economic perspectives in the circular bio-based society





Partnerships
Governance of transitions





The concept of a circular, bio-based society is increasingly seen as a promising way to meet the needs of a growing and wealthier population within the planetary boundaries. While this concept makes scientific sense, much research is needed to realize food and bio-based systems that meet society's needs for food, fuels, clothes and other bio-products, while maintaining the quality of life and remaining within planetary boundaries. So far, no country achieves a good quality of life within planetary boundaries. This theme seeks answers to questions like: How can we produce enough food and biomass for essential bio-based products (clothes, plastics, construction material, paper etc.) while safeguarding our natural resources? How to avoid losses and wastes in our food and bio-based systems? How to best utilise and recycle biomass and bio-products for different purposes without introducing (new) risks for the environment? Within this theme we therefore seek for sessions and masterclasses on topics like: Circular and nature-inclusive agriculture/aquaculture; the role of farm animals/aquaculture and future foods in a circular food system; The role of the marine system in a circular food system, and the optimal utilisation of all crop parts in our food and bio-based systems.



Society

Social organisation and risk management in a circular bio-based society

A circular society entails major social changes. Within this theme we want to address changes expected and/or needed by citizen, consumers and households. The theme will address topics like behavioural change, new forms of social organisation such as platforms and cooperatives, and new forms of spatial organisation. Within this theme we seek for sessions and masterclasses on questions like: How do we ensure that these changes happen in a socially responsible manner? How do we guarantee inclusivity and prevent exclusion of groups. What new behavior is needed to make that the transition to a circular society also ensures climate restoration? What is the potential of circular human diets. How to best utilise and recycle biomass and bio-products for different purposes without introducing (new) risks to human health and how to assess and measure and manage food safety risks in a circular production system?



Economic activities form the base of our society, and currently development is measured by the narrow metric of economic growth (GDP). We need to rethink economics that ensures prosperity for all within the boundaries of our planet. A circular economy could decouple economic growth from environmental degradation. However, can an inclusive and sustainable economy be achieved with continuous economic growth or do we need degrowth? This requires a new economic framework and within this framework the new circular bio-based society asks for drastic changes in our economy: new partnerships, new products, new business models and as a consequence new markets. Within this theme we seek for sessions and masterclasses on topics like: A new economic framework (including role of government and financial institutions). Economic (de) growth in the circularity concept, The world market in a circular society including global and regional competition for biomass between food and non-food products, Circular & climate smart business models (incl risk management), Circular bio-based materials to replace fossil feedstock, Circular fashion.



Major governance challenges arise with the transition to a circular Biobased economy and society. Within this theme we want to address the question of how to steer or bring about this transformative change. Within this theme we therefore seek for sessions and masterclasses that address questions like: How can governments innovate to facilitate a transition to a circular society - not only by applying traditional regulatory and policy incentives and restrictions, but also by appreciating and facilitating societal and initiatives. In addition to examining governmental policies the focus is also on private governance arrangements or partnerships between citizens, governments and companies. How to allocate responsibilities for the governance of transitions between public and private actors, between difference layers (global to local) and difference policy domains? How to monitor and evaluate these policies and arrangements?

Mission

A transition towards a circular bio-based and climate smart society is the answer to many of the societal challenges we are facing today. Circular systems in the green and in the blue domain will close water, nutrient and carbon cycles and from this, minimise resource losses and climate change effects, and hence assure that society can live within the planetary boundaries. Integrated circular systems will replace linear systems by making smart connections within and between terrestrial (plant and animal based) and marine production cycles and strengthen networks. At this moment society, be it scientists, policymakers, private companies or concerned citizen, are developing knowledge and expertise in order to develop the necessary building blocks of such a circular bio-based society that ensures climate restoration. These building blocks include, for example, decision support models for effective use of land, water and energy, carbon sequestration approaches, nature based solutions safeguarding biodiversity, changes in consumer behavior and innovative governance structures, new business models and economic changes. In this conference we aim to bring together pioneers in the circular bio-based society from different backgrounds.

Call for sessions

Call for scientific sessions/workshops and masterclasses. The programme will be co-created with you!

The SDGs can be grouped into 4 categories:

- 1 Biosphere (SDG 8, 13, 14, 15)
- 2 Society (SDG 1, 2, 3, 4, 5, 7, 11, 16)
- 3 Economy (SDG 8, 9, 10, 12)
- 4 Partnerships (SDG 17)

For each of these four topics we invite you to actively participate in the organisation.

We invite you to send us a proposal for a:

- scientific session that will be open for contributions of other researchers via abstract submission
- workshop (thinking together)
- masterclass (learning from an expert)

Please send your ideas to: circular@WUR.nl

Detailed information can be found on our website www.wur.eu/circular-at-wur-conference

Registration

(prices so far indicative awaiting final budget, to be opened in April 2021)

To register, please visit www.wur.eu/circular-at-wur-conference	٦	Categories	Early registration fee (until Sept 30, 2021)	Regular Registration fee (from Oct 1, 2021)
	 	Full participant	€ 360	€ 475
	-	Online participant	€ 100	€ 150
	-	Student*	€ 250	€ 350
	-	One day registration	€ 180	€ 240
We invite you to send us a proposal before		Conference dinner	€ 50	€ 50

2020	2021							
1st September	1st March	31th March	14th April	1st September	15th September	30th September		
Call for sessions, masterclasses and workshops open	Deadline for sessions, masterclasses and workshops abstract submission	Notification of sessions, masterclasses and workshops acceptance	Call for abstracts open	Deadline for abstract submission	Notification of abstract acceptance	Early registration		

Venue

Wageningen University & Research

Orion, Bronland 1, building 103 6708 WH Wageningen www.wur.eu/circular-at-wur-conference

circular@wur.nl