

2018, 13th - 15th June

24th International Sustainable Development Research Society Conference ACTION FOR A



Conference Programme

## The Sharing Economy and Sustainable Patterns of Consumption and Production

### Abstract

Patterns of consumption and production are changing under the influence of digitalization. Some applications of Information and Communication Technology (ICT) are even disrupting economic structures and business models that were believed to be unchangeable. The effects of the digital transformation may be positive or negative from the perspective of sustainable development. An obvious example is provided by ICT-based forms of the sharing economy, where sharing has positive effects in terms of resource utilization and cooperation of people, but new concerns are raised regarding the sustainability. The importance of sustainable patterns of production and consumption is explicitly stressed as ensuring it is one of the goals of the United Nations 2030 agenda for sustainable development. Its importance can be also implicitly perceived, as sustainable production and consumption are interconnected with other goals – namely energy, economic growth, sustainable communities, and climate change. Although technological improvements in the ICT-enabled sharing economy allow for making less energy and resource use by enabling the sharing mode for consumption, which can also contribute to a circular economy, it is argued that sustainability-related challenges are not resolved thoroughly or at least not as expected. Some sustainability issues may remain yet with the sharing economy and some may emerge either as new challenges or already-known challenges that would shift from one area to the other. In our presentation, by relying on the existing economic literature on the way/extent that production and consumption patterns have been disrupted by the digitally-enabled sharing economy, we will discuss how/whether the sharing economy and the services connected to it can contribute, or have already contributed, to environmental sustainability by enabling a shift towards sustainable consumption and production. We conduct a qualitative study and adopt two main frameworks from the existing literature to conceptualize and orient our study. The first one is a theoretical framework for service sector that provides a useful tool for contextualizing the sharing economy in service systems. The second is a conceptual framework for the effects of ICT on environmental sustainability that we use for studying the environmental impacts of the sharing economy as a featured application of ICT in the economy area. The findings of our study suggest that sharing resources does not necessarily lead to less resource consumption. We find that some of the newly emerged consumption and production patterns would practically bring us closer to sustainability and some may drive us away from it by presenting new sustainability concerns and challenges, and that, in some cases, a combination of both scenarios is expected.

**Keywords:** Sharing economy, ICT, consumption and production, sustainability.

### Authors

1. [Maria J. Pouri](#) (University of Zurich)
2. Lorenz M. Hilty (University of Zurich and Empa Materials Science and Technology)

### Topic Area

5e. Sustainable consumption and consumers

### Session

OS5-5e » [5e. Sustainable consumption and consumers](#) (09:30 - Friday, 15th June, Rectorate - Aula Magna - First floor)

### Paper



[empty\\_final\\_draft.pdf](#)