

Presenters (in alphabetical order):

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Techniques Workshop**Introducing the Futures Clinique approach: examining decision-making for long-range futures of the Bioeconomy**

The next 50 years are anticipated to be a crucial time period for the sustainability of our planet. Bioeconomy is one concept that has been proposed as a potential solution for a number of sustainability related challenges, ranging from combating climate change to helping with the resource scarcity issue. However, the concept itself is complex, filled with uncertainties and risks. Therefore, it can be framed both as a solution and a threat. Despite this uncertainty, there is urgency to reach important decisions soon to implement the structures and infrastructure in order for the expected results to take effect in time. These features of the Bioeconomy context make it an excellent platform for examining the process of anticipation, directed at making sense of this complex phenomenon. What are the right questions to ask? What kinds of potential bifurcation points - often in the form of decisions - can be identified? Who are the key agents providing futures leadership?

We propose arranging a workshop with the purpose of introducing a novel approach called the Futures Clinique to the participants of the Anticipation conference. The Futures Clinique approach is designed specifically to address wicked problems with implications reaching far into the future, through a co-creative workshop process. The Futures Clinique approach was originally developed at the Finland Futures Research Centre, University of Turku by professor Sirkka Heinonen (2013), and it has been since utilised in a number of key research projects for holistic anticipation and scanning of long-range futures. The approach brings together different anticipation methods, both old and novel. In the proposed workshop the following five methods and concepts are combined: 1) raw seed scenarios as input for the workshop, 2) an audio-visual weak signal method called 'futures window' (Hiltunen 2010), 3) futures wheel technique (Glenn 2009) and 4) futures table (Seppälä 1984). 5) Futures images (e.g. Rubin 2005) based on the outcomes of all the phases, will be presented at the end of the workshop. The Futures Clinique approach is designed to be able to address multifaceted futures oriented issues that require a systematic approach, taking into account differing approaches, views, opinions, and interests. The method encourages development of ideas that diverge radically from present notions on what is possible and probable. The Futures Clinique approach is thus especially well suited for anticipation on very long time spans.

In the proposed session, the Futures Clinique approach is applied to scenarios produced in a bioeconomy themed Delphi process, providing scenarios on bioeconomy futures up to 2075, focusing especially on the societal effects of biotechnologies in the next ~ 50 years. This is done by questioning the assumptions about the possibilities and threats facing our societies in the time period examined, and the ethical tensions inherent in the different scenarios.

Before the workshop session, there will be a pre-task of familiarising oneself with the topic by

reading through the material sent by the workshop presenters. There will be two reflection questions that the participants are encouraged to answer prior to entering the workshop (ideally via email before the conference).

Using different prompts and methods that make up the Futures Clinique approach, participants are led to think about the effects that biotechnology may have on social systems, and the kinds of decisions the adoption of different technologies and solutions will entail. The hypotheses presented in the form of raw scenarios are subjected to a facilitated debate, where workshop participants are able to present their own, potentially conflicting views and arguments.

The Futures Clinique approach allows for a presentation of competing views as different possibilities for the future. The end result will be futures images with suggestions for steps leading towards the futures, taking the form of decision points. The workshop will conclude with a discussion and reflection among the participants about their experiences participating.

By being a part of this workshop, the participants gain knowledge of this dynamic tool, are able to engage with the future oriented background materials, and can gain insight into futures decisionmaking and the processes making up futures leadership.

For the purposes of the conference, the Clinique is fitted to the 90 minute slot (ideally the minimum duration of the Clinique is half-day). It will be structured as follows:

Part I

Opening words + futures provocation (15 min.)

Futures window (5 mins.)

Part II

Instructions for the futures wheel and futures table (5 mins.)

Futures wheel+ Futures table (20 mins.)

Part III

Moderators instruct the decision points / steps phase during the process

Deciding on the images of the future and designing the steps towards it (25 mins.)

Presentation of the outcomes (20 mins.)

The session will be presented by four experts versed in the Futures Clinique approach. Prof. Wilenius (Futures Studies, University of Turku) is the leader of the research group with extensive experience in workshop processes. Ms. Kurki is a finishing stage PhD candidate in Futures Studies (University of Turku), and researchers Mr. Taylor and Mr. Balcom Raleigh both have completed the master's degree programme in Futures Studies at the University of Turku. Kurki has been developing the Futures Clinique process together with professor Sirkka Heinonen, and Balcom Raleigh has developed game based methodology that can be used in conjunction with the Futures Clinique approach. Taylor's expertise is on creative workshop methods. Kurki, Taylor and Balcom Raleigh all have participated in numerous Futures Clinique processes as presenters.

The presenters will provide basic materials used in the Clinique (posters, pens, post-its). Other technical equipment that will be needed are a projector, a screen, and loudspeakers. The

workshop will require a space where up to 20 participants are able to sit comfortably around tables in groups of 4-5 people.

References:

Glenn, J. (2009) The futures wheel. Chapter 6. In: Futures research methodology V 3.0. Millennium project.

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Seppälä, Y. (1984) 84 000 tulevaisuutta. Helsinki: Gaudeamus.