

SUSTAINABLE ENERGY WEEK

13-17 June 2016

Integrated bioenergy hybrids

more abundant, stable,
affordable renewable
energy?



BUILDING THE ENERGY UNION TOGETHER



SUSTAINABLE
ENERGY WEEK

An initiative of the  European Commission

Why bioenergy hybrids?

- Ongoing changes in the energy system
 - From high-carbon to low-carbon
 - From centralised to decentralised
 - From on-demand energy sources to variable energy sources
- Need for balancing solutions and storages increases
 - Both demand and supply side balancing solutions needed
 - Storage needs span from daily to seasonal
- Bioenergy hybrids address many problems simultaneously
 - On-demand source of RE => secure and available (when you need it)
 - Easily storable form of RE => from hourly to seasonal balancing solutions
 - More efficient use of biomass => hybrid processes allow improved energy and carbon efficiency.



Bioenergy and RES hybrids

- Bioenergy and RES Hybrids
 - Strategic project of IEA Bioenergy Agreement
 - Duration: Jan – Dec 2016
 - Participants: Finland, Germany, Austria, and the EC
- Work Scope
 - Bioenergy RES hybrid solutions for renewable heating, cooling, electricity, fuels and/or chemicals
- Objective
 - Describe state of the art in participating countries (currently being finalised)
 - Assess cost-efficiency and environm. impact of selected hybrid processes (fall 2016)
 - Disseminate results (state-of-art reports in July, final report in December)
- Events
 - State-of-Art results disseminated at EUSEW 2016 on Wed 15 July
 - Final report and workshop on Dec 2016 in Helsinki, Finland



Agenda

9:00 – 10:10 **State-of-Art session**

Session Chair: Kyriakos Maniatis, DG ENER

- Ilkka Hannula, VTT, Welcome and introduction (5 min)
- Adam Brown, IEA, Role of bioenergy in a more integrated energy system (15 min)
- Volker Lenz, DBFZ, [German status report](#) (15 min)
- Elina Hakkarainen, VTT, [Finnish status report](#) (15 min)
- Ernst Höftberger, Bioenergy 2020, [Austrian status report](#) (15 min)

10:10 – 10:25 **Panel Discussion**

Moderator: Kees Kwant, Chair, Executive Committee, IEA Bioenergy

Panellists: Speakers

Topic: “Role of bioenergy hybrids in a low-emission energy system”

10:25 – 10:30 **Conclusions and Recommendations**

10:30 **Closure**

Stay in touch!

- Visit our website:
<http://task41project7.ieabioenergy.com/>
- Join our distribution list by emailing to
ilkka.hannula@vtt.fi
- Feel free to contact us for comments or if you want contribute to our work.



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