

Summer school program 2017

Monday August 14th

11.00–11.30 Introduction

Information about the course and on Energiforsk. Brief presentation of the participants.

11.30–12.30 LUNCH

Session 1: Introduction

12.30–13.10 Facing climate change – Which are the options to act?, Filip Johnsson, Chalmers

13.10–13.50 Sustainability of biogas production, Henrik Wenzel, SDU

13.50–14.30 Biogas from by-products from the forest industry, Karin Granström, KAU

14.30–15.00 COFFEE BREAK

Session 2: The role of gas in the energy system

15.00–15.45 Current production of biogas in Scandinavia, Bruno Sander Nielsen, Danish Agriculture & Food Council

15.45–16.30 System aspects related to the future role of the gas system, Marie Münster, DTU

17.00–18.00 Interviews: Deep interview of your colleague and preparation for presentation of him/her Tuesday afternoon

18.00 DINNER

Tuesday August 15th

Session 3: Gasification

8.30–9.15 Gasification of waste, Tobias Richards, HiB

9.15–10.15 Gasification of biomass, Martin Seemann, Chalmers

10.15–10.45 COFFEE BREAK

10.45–11.45 Gasification of biomass, process concepts, Henrik Kusar, KTH

12.00–13.00 LUNCH

Session 4: Anaerobic digestion

13.00–13.45 Anaerobic digestion, process overview, Anna Schnürer, SLU

13.45–14.30 Anaerobic digestion, microbiology, Anna Schnürer, SLU

14.30–15.00 COFFEE BREAK

Session 5: Ongoing research

15.00–16.30 Presentation of the participants

18.00 DINNER

Wednesday August 16th

8.15 Departure Vara Folkhögskola

9.00 Technical visit Vårgårda Herrljunga Biogas (host: Per-Olof Rosén, Vårgårda Herrljunga Biogas)

11.00 Departure and lunch

13.00 Technical visit Gobigas (host: Ingemar Gunnarsson, Göteborg Energi)

15.00 Technical visit Gasendal (host: Jan Karlsson, Göteborg Energi)

16.30 Departure to Vara Folkhögskola

18.30 DINNER

Thursday August 17th

Session 6: Biogas upgrading and gas quality

08.30–9.15 Biogas upgrading, Åke Nordberg, SLU

9.15–10.00 Gas quality, Jean Schweizer, DGC

10.00–10.30 COFFEE BREAK

Session 7: Gas motors

10.30–11.15 Internal combustion engines for gaseous fuels, Per Tunestål, LU

11.15–12.00 Gas turbines and combined cycles for flexible power production, Magnus Genrup, LU

12.00–13.00 LUNCH

Session 8: Implementation of gas projects

13.00–13.45 Gas regulation, Poul Erik Morthorst, DTU

13.45–14.30 Challenges with working locally to improve the biogas market, Marie Mattsson, HH

14.30–15.00 COFFEE BREAK

15.00–16.30 Interactive activity

18.00 DINNER

Friday August 18th

Session 9: Power-to-gas and smart grids

08.30–9.15 Power-to-gas, an overview, Lars Ditlev Mørck Ottosen, AU

9.15–10.00 Catalytic and biological methanation – do not waste valuable CO₂, Lars Ditlev Mørck Ottosen, AU

10.00–10.30 COFFEE BREAK

10.30–11.15 Resource-efficiency assessment of feedstocks for biogas production – a multi-criteria approach, Jonas Ammenberg, LiU

11.15–12.00 Life-cycle assessment and uncertainty analysis of biogas production, Roozbeh Feiz, LiU

12.00–13.00 LUNCH

13.00–14.00 Key-note: Commercial Green – An energy company's strategy towards a future of sustainable gas, Morten Gyllenborg, Nature Energy

14:00–15:00 Evaluation

Sponsors:

Energigas Sverige, EON, Dansk Gasteknisk Center DGC and Aarhus University AU, Chalmers, Halmstad University HH, Högskolan i Borås HiB, Karlstad university KaU, Lund university LU, Linköping university LiU, Royal Institute of Technology KTH, Swedish University of Agricultural Sciences SLU, Technical University of Denmark DTU and University of Southern Denmark SDU.