

P4EU Workshop on Eukaryotic protein expression platforms

Programme:

November 30th

11:00 **Arrival and coffee**

11:15-11:20 Opening Remarks (**Bjørn Voldborg**; Protein Production Unit; The Novo Nordisk Foundation Center for Protein Research)

11:20-11:45 **HEK293: lower costs for higher yields - pocket guide for an eukaryotic adventurer** (**Ondrej Vanek**; Department of Biochemistry; Charles University in Prague)

11:45-12:10 **High-throughput recombinant protein expression using a combination of ligation-independent cloning (LIC) and transient transfection in suspension growing HEK293-EBNA cells.** (**Giuseppe Cazzamali**; Protein Production Unit; The Novo Nordisk Foundation Center for Protein Research)

12:10-12:30 **Protein expression using HEK cells in the OPPF-UK – Transients, stables and ideas for the future.** (**Jo Nettleship**; Structural Biology OPPF-UK, Oxford University)

12:30-13:30 **Lunch at the CPR**

13:30-13:50 **The vet in the village – making proteins at CR-UK, London Research Institute** (**Svend Kjær** Protein Purification Facility, Cancer Research UK)

13:50-14:10 **Protein expression platforms at the NKI Protein Facility** (**Patrick Celie**; NKI Protein Facility - Division of Biochemistry, Netherlands Cancer Institute (NKI))

14:10-14:30 **Recombinant protein expression in eukaryotic systems: The ISPC experience** (**Tamar Unger**; The Israel Structural Proteomics Center, The Weizmann Institute of Science)

14:30-14:45 **Establishing a eukaryotic expression facility at the Vienna Biocenter** (**Peggy Stolt-Bergner**; Structural Biology facility, Campus Science Support Facilities (CSF))

14:45-15:00 **NorStruct - a more eukaryotic future?** (**Gro Bjerga**; Department of Chemistry, NorStruct , University of Tromsø)

15:00-15:30 **Coffee**

15:30-17:00 **Open discussion on relevant topics** (e.g. Purification challenges, Tags, Optimising expression levels, Cell types, Transfection reagents and modes (stable/transient), Expression routes (intracellular/secreted/membrane), “Tricky” proteins, Metabolic Engineering, Co-expression, Promoters and enhancers, etc.....)

17:00-18:30 **Tour at CPR, followed by Drinks and Snacks**

18:30-?? **Dinner and socialising at the CPR**

December 1st

9.00-9:30 **Arrival and morning coffee**

9:30-9:45 **Protein production using a non-viral, Drosophila S2 insect cell expression system** (**Wian de Jongh**; Product Development, ExpreS2ion Biotechnologies)

9:45-10:10 **Baculovirus Expression of Human Proteins at the SGC** (**Nicola Burgess-Brown**; SGC, University of Oxford)

10:10-10:30 **Cell-free expression of eukaryotic membrane proteins** (**Frank Bernhard**; Institute of Biophysical Chemistry, Goethe University Frankfurt)

- 10:30-10:50 **Protein production in insect and HEK cells: streamlining the protocols** (Sabine Suppmann; Microchemistry Core Facility, Max-Planck-Institute of Biochemistry)
- 10:50-11:10 **Production of glycoproteins for biomedical research in CHO cells.** (Malin Bäckström; Mammalian Protein Expression Core Facility, University of Gothenburg)
- 11:10-11:40 **Coffee**
- 11:40-12:00 **Production of therapeutically relevant proteases for drug discovery using eukaryotic expression systems** (Rene Assenberg; Expertise Platform Proteases, Novartis)
- 12:00-12:20 **Great Expectations, Small Facility : The HUJI Expression Facility as a developing and training center for baculovirus based technologies** (Tsafi Danieli; Protein Expression Facility, Wolfson Centre for Applied structural Biology, Hebrew University)
- 12:20-12:40 **Engineering the baculovirus genome by counter-selection recombineering** (David Drechsel; Protein Expression and Purification, Max Planck Institute of Molecular Cell Biology and Genetics)
- 12:40-13:40 **Lunch at the CPR**
- 13:40-15:00 **Discussions on possible collaborations** (e.g. methods development, possible sharing of cell lines/vectors/expression constructs/expression strains etc..), **funding opportunities** etc..
- 15:00 Departure