### Possible sessions + time

- nnbar (Dave + Anca ?)
- nn' (Yuri + Zurab)
- Hadronic parity violation (Mike + ?)
- Beta decay (Torsten + )
- nEDM (Florian + ?)
- New ideas (Albert + ?)
- Total time: ~3.5 days

## nnbar session

- Bound vs free searches
  - theoretical uncertainties (apples vs pears ?)
  - How does the experimental landscape look now and in the future.
- Baryogenesis
- Complementarity with the LHC.
- Complementarity with the neutrino sector.

#### Possible structure

Monday	Tuesday	Wednesday	Thursday	Friday
Nnbar (Dave + Anca ?)	nn' (Zurab+Yuri)	Nnbar/HIBEAM collaboration	Hadronic parity violation (Mike +)	Overflow – reviews Discussion sessions Conclusions for proceedings ?
nEDM (Florian +)	Beta decay (Torsten+)		New ideas (?)	
Some sessions to take a full day. Depends on speakers.				

From Yuri:

Connection of neutron physics to cosmology;

Connection of neutron physics to Quantum Mechanics;

Do we want these separate or absorbed into the different sessions ?

Format: 5-6 talks + discussions per day, excluding nnbar Convenor: at least one exp + one theorist for each day.

# Bulletin

Workshop on Particle Physics at the European Spallation Source Nordita, Stockholm, Dec. 10-14<sup>th</sup> 2018

Presently under construction, the European Spallation Source (ESS) will be the world's most powerful neutron source. This Nordita workshop which will take place in Stockholm will study the capability of the ESS to develop a unique program of experimental particle physics at the intensity and precision frontiers. Experiments at the ESS can address central open questions in modern physics such as the mechanism of baryogenesis, the strong CP problem, and the nature of dark matter. The experiments have sensitivity to particles and processes beyond the Standard Model at mass scales beyond that available at colliders.

All covered topics will be studied in the context of studying the technical potential of the ESS, the optimization of signatures and experimental search strategies, and the complementarity with the existing and planned collider and non-collider programs. In addition, there will be a dedicated day for the NNBAR experiment which is focused on the first two items

#### **Organising committee**

David Milstead (Stockholms Universitet, co-chair) Anca Tureanu (University of Helsinki, co-chair) Zurab Berezhiani (Univ. L'Aquila and LNGS/INFN) Gustaaf Brooijmans (Columbia University) Gabriele Feretti (Chalmers University) Yuri Kamyshkov (Tenneseee University) Valentina Santoro (European Spallation Source) Mike Snow (Indiana University) Torsten Soldner (Institut Laue Langevin) Albert Young (North Carolina State University)

# Admin

- Accommodation info.
- Fine-tuning of registration form.
- Mailing list.
  - Everyone on initial spreadsheet.
  - Spires
  - ???
- Budget