



EUROPEAN  
SPALLATION  
SOURCE



# Overview of the ESS DMSC

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- Acting Head of DMSC*

DTU (& UCPH) meets ESS-DMSC





# ESS facility

ESS is a pan-European project (ESFRI & ERIC)



13 European member states

ESFRI = European Strategy Forum on  
Research Infrastructures

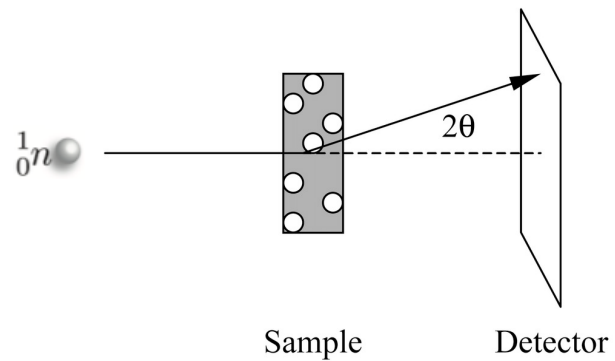
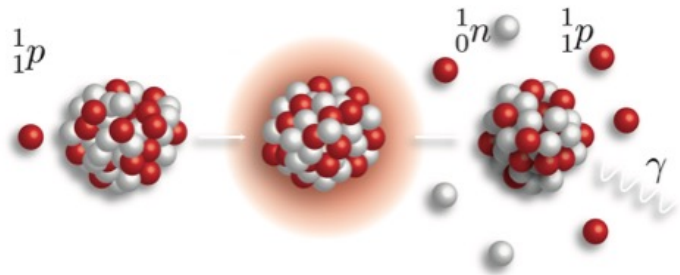
ERIC = European Research  
Infrastructure Consortium





# ESS facility

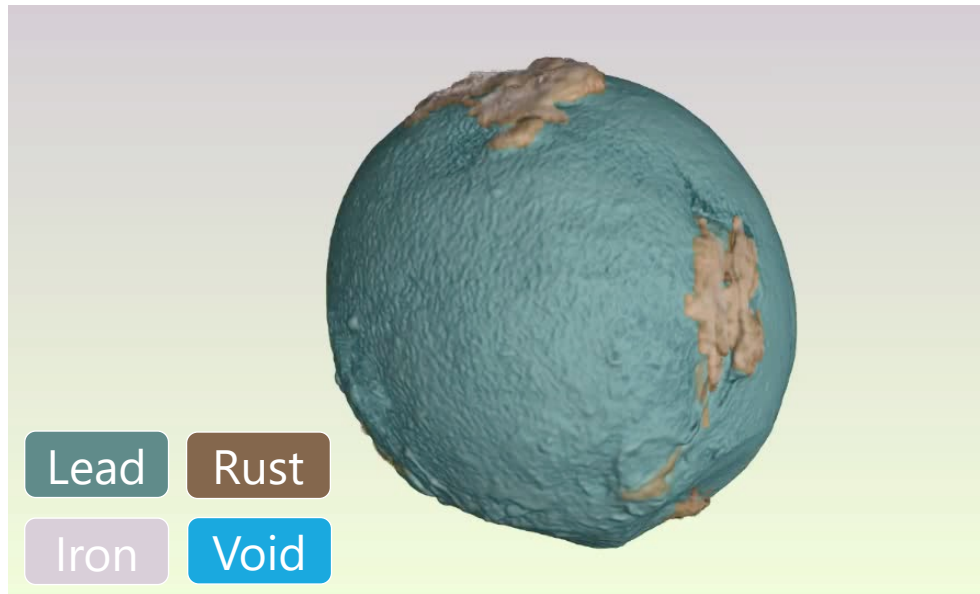
ESS is a spallation neutron source



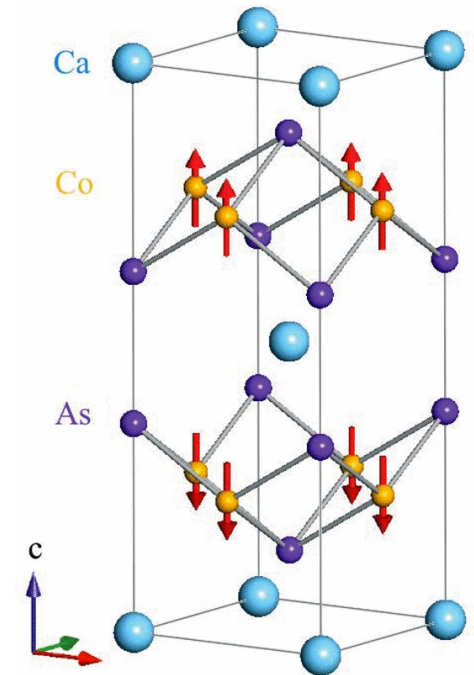
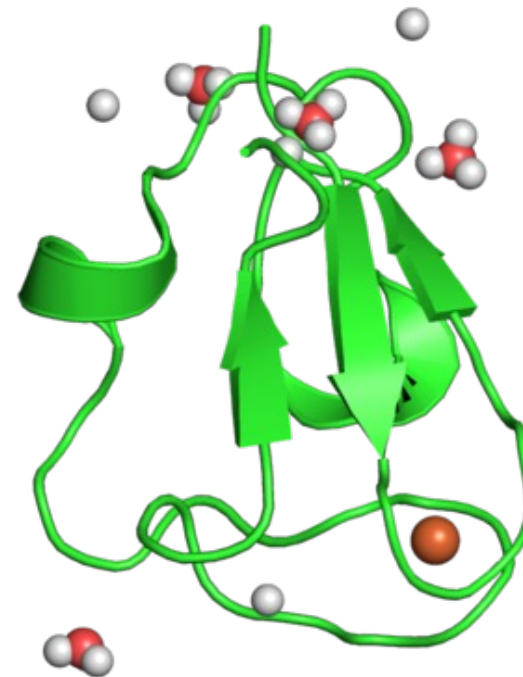
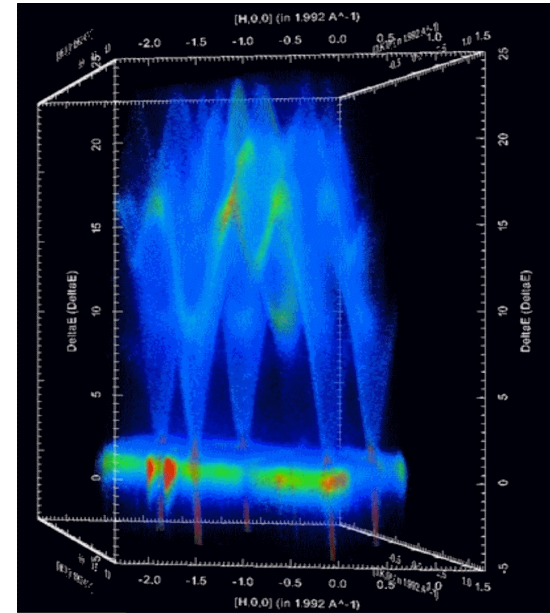


# ESS facility

Experiments at many length and time scales



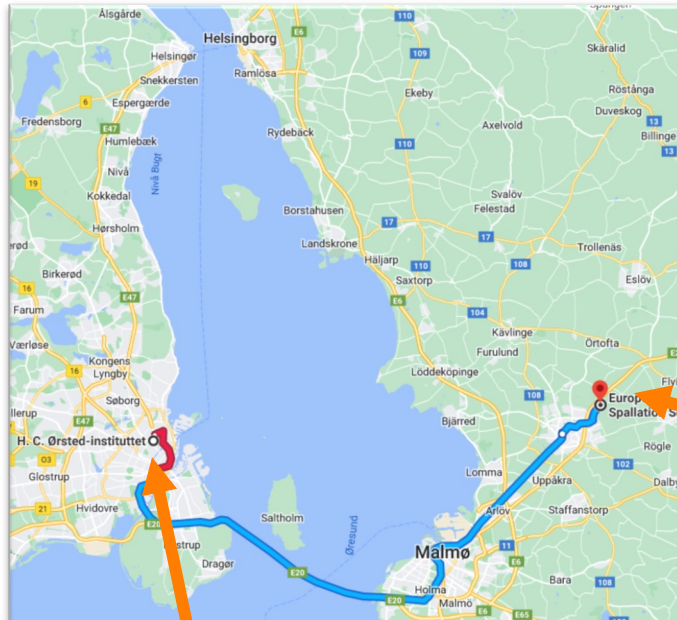
Credit: Anders Kaestner, PSI





# ESS facility

Both Sweden and Denmark are host nations



+35 staff members  
+15 nationalities





# DMSC Scope



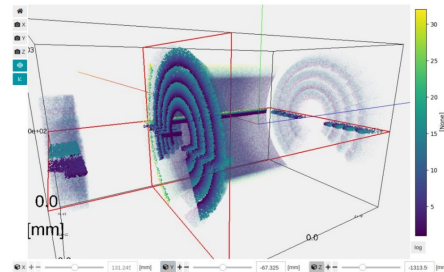
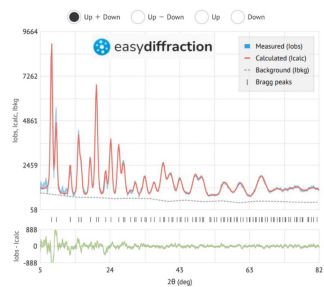
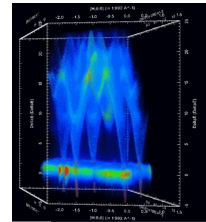
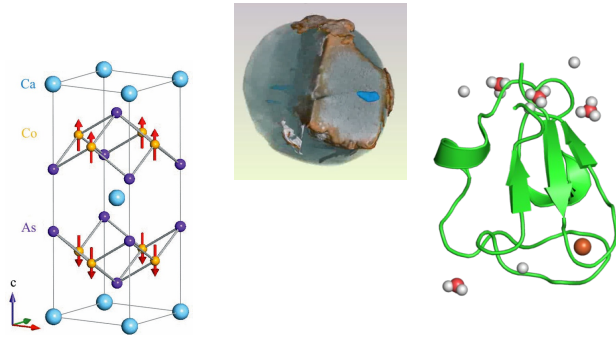
To Do:

Scientific  
computing  
for this

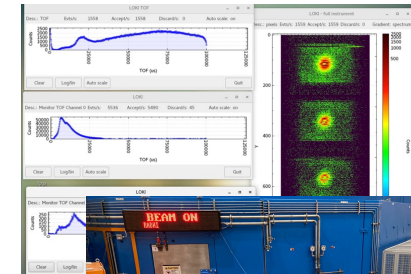
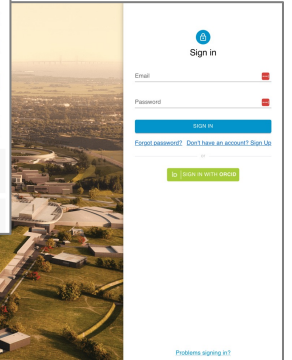
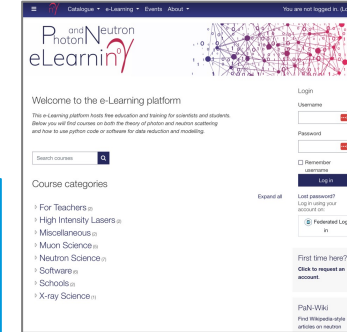
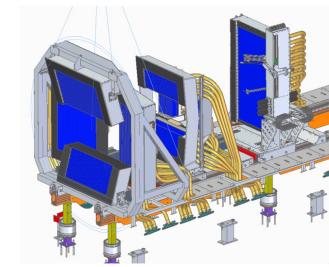
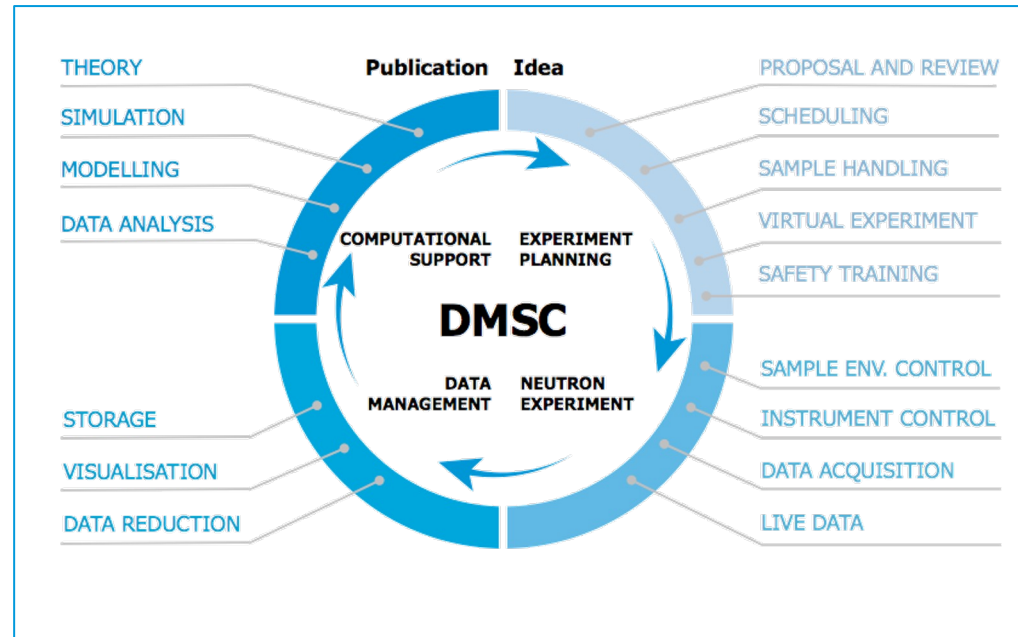


# DMSC Scope for user perspective

Support user from idea to publication with scientific computing tools and services



Search	Results	Details	Actions
Search	10 results found	10 results found	10 results found
1	10 results found	10 results found	10 results found
2	10 results found	10 results found	10 results found
3	10 results found	10 results found	10 results found
4	10 results found	10 results found	10 results found
5	10 results found	10 results found	10 results found
6	10 results found	10 results found	10 results found
7	10 results found	10 results found	10 results found
8	10 results found	10 results found	10 results found
9	10 results found	10 results found	10 results found
10	10 results found	10 results found	10 results found





# Why us?

We have many opportunities for student or other joint projects

## What we do:

- ✓ Material research (soft and hard)
- ✓ Data science (ML and some AI)
- ✓ Scientific computing
- ✓ Software engineering
- ✓ Testing on real equipment
- ✓ Training

## But we can also offer:

- ✓ Interface to ESS instrument teams / scientists
- ✓ Interface to rest of ESS (accelerator physics, nuclear physics, etc)
- ✓ Interface to other research infrastructures (primarily photon and neutron sources)

We welcome collaboration and student projects



# Technology & Science Groups @ DMSC

for supporting users with scientific computing tools and services



Max

Morten

Mads

Max







# Technology & Science Groups @ DMSC

for supporting users with scientific computing tools and services

Greg



Instrument Data Scientists



User office  
software /  
Proposal system

Experiment  
control & data  
acquisition

Data processing  
& analysis

FAIR data  
management

Brian



Data Systems & Technologies







# Questions

