



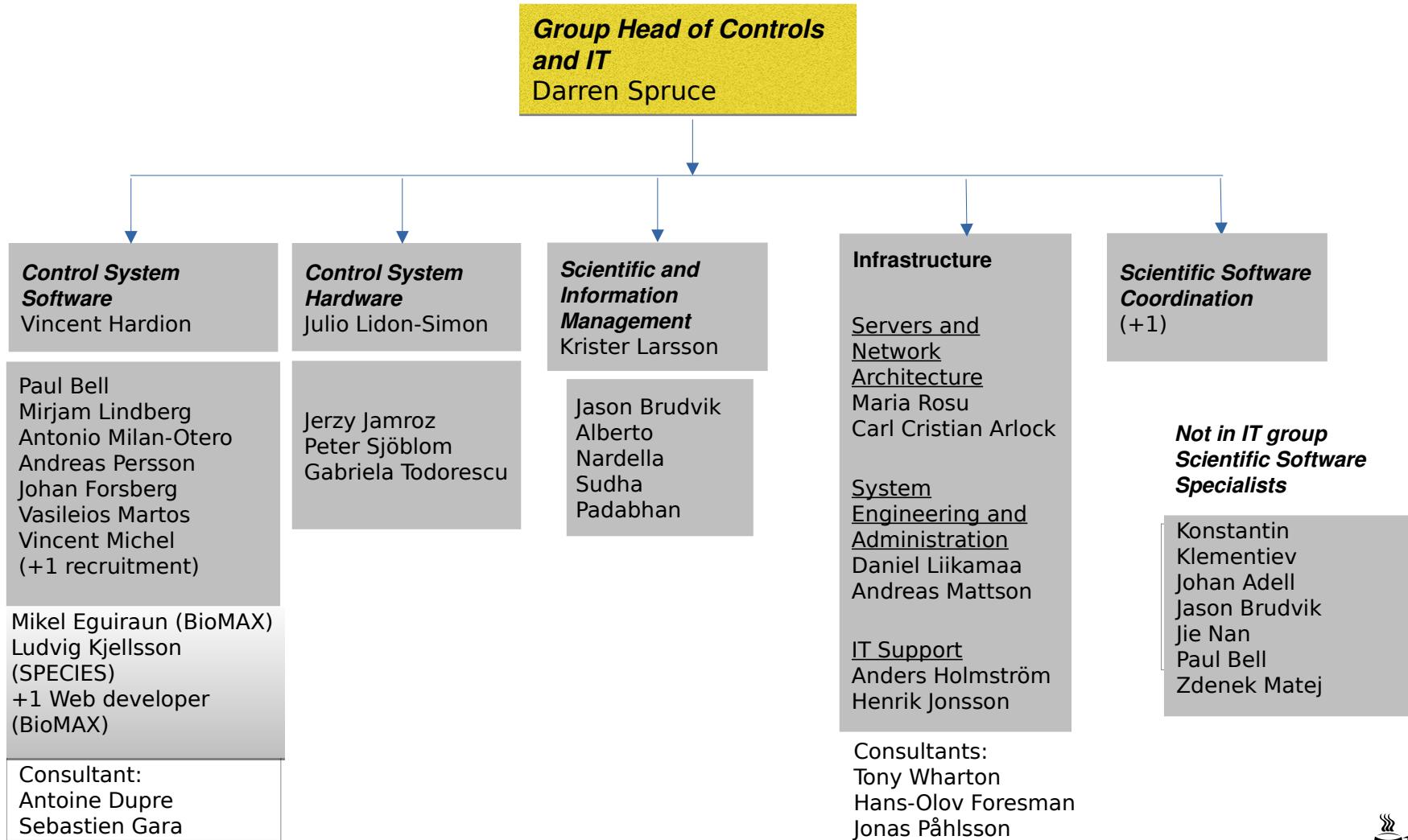
# Status Report

Antonio Milán Otero  
Kontrols & IT services (KITS)

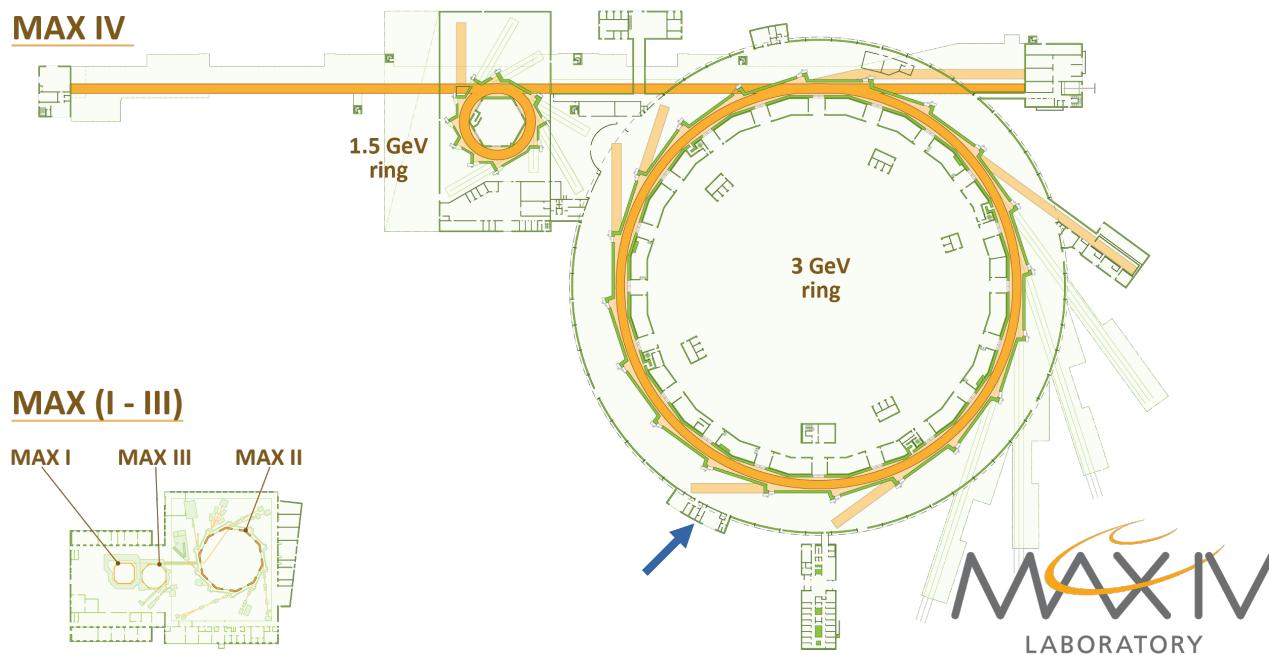
# Agenda

- KITS group overview
- MAX IV Overview
- Beamlines overview
- Sardana @MAXIV
- Configuration

# KITS - MAX IV Kontrols & IT



# MAX IV overview



<b><i>linac</i></b>	<b>1.5 GeV</b>	<b>3 GeV</b>
<b>250m</b>	<b>96m</b>	<b>528m</b>

# MAX IV latest milestone

- On going commissioning for the 3GeV ring.
- Tuesday 15 September, stored beam!

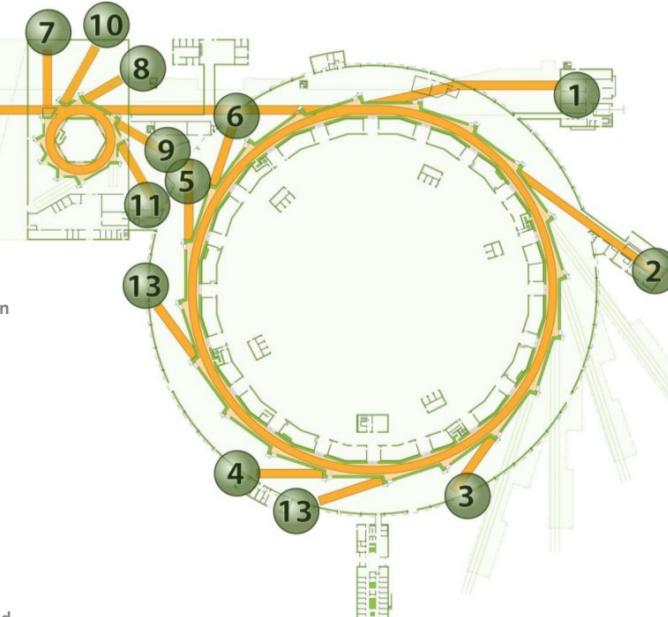


# Beamlines overview

## The 13 funded Beamlines

1. **FemtoMAX**  
Studies of ultra-fast processes in materials
2. **NanoMAX**  
Imaging, spectroscopic & scattering techniques with nanometer resolution
3. **BALDER**  
(Hard) X-ray absorption spectroscopy with emphasis on *in-situ* and time resolved studies.
4. **BioMAX**  
Macromolecular crystallography with a high degree of automation and remote access
5. **VERITAS**  
RIXS combining a unique resolving power with high spatial resolution.
6. **HIPPIE**  
High-pressure photoelectron spectroscopy
7. **ARPES**  
Angle resolved photoelectron spectroscopy for detailed studies of the electronic structure.
8. **FinEstBeaMS**  
Estonian-Finnish Beamline for Materials Science
9. **SPECIES (Transfer)**  
VUV High-pressure photoelectron spectroscopy and RIXS

15/01/2014



10. **FlexPES (Transfer)**  
Photoelectron Spectroscopy and NEXAFS
11. **MAXPeem (Transfer)**
12. **CoSAXS**
13. **SoftiMAX**

Coherent Soft X-Ray Scattering, Holography...

MAXIV



MAXIV

# Sardana @MAXIV - challenges

- @Linac: motorisation
- @3GeV Ring: motorisation
- @BL's:
  - Species: Specific acq gui, online analysis
  - BioMax: Sardana with MxCUBE
  - Hippie, Veritas, Arpes: connection with Prevac
  - Balder: Continuous acquisition
  - FemtoMax: Event acquisition
  - NanoMax: End station integration

# Sardana @MAXIV

- @Linac: motorisation
- @3GeV Ring: motorisation

	Controllers	Motors	IOR	TangoAttrCtrl	CtExpChannels
Linac	16	68	4	1	3
3GeV ring	6	11	-	-	1

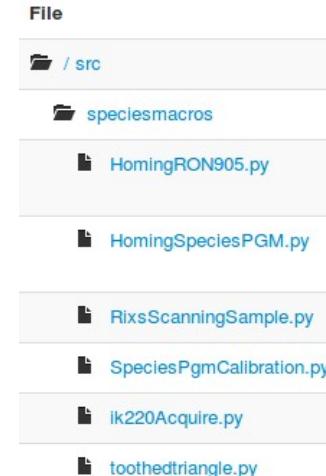
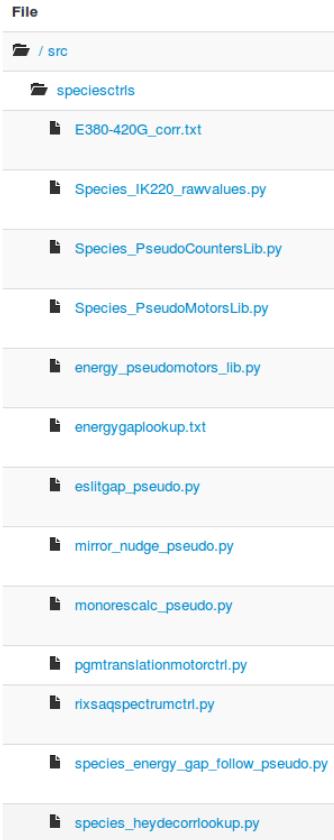
# Sardana @MAXIV

- Species:
  - Some numbers

	#
Controllers	37
Motors	54
IOR	1
PseudoMotors	46
CTExpChan	8
PseudoCounters	28
OneDExpChan	1

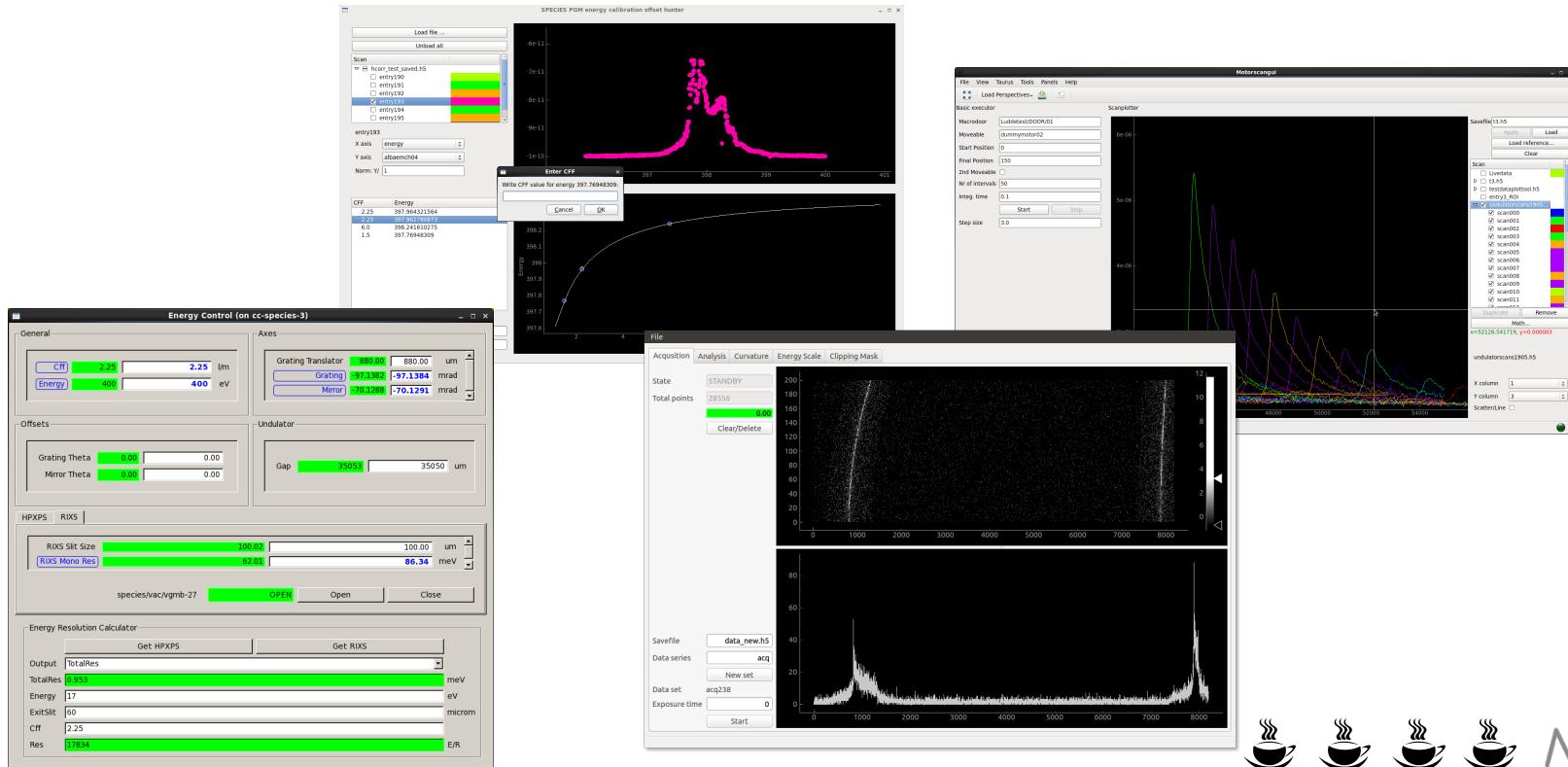
# Sardana @MAXIV

- Species:
  - Set of controllers and macros developed.  
(to be committed to sardana repo @sf)



# Sardana @MAXIV

- Species:
  - Specific GUIs for data acquisition and online analysis.



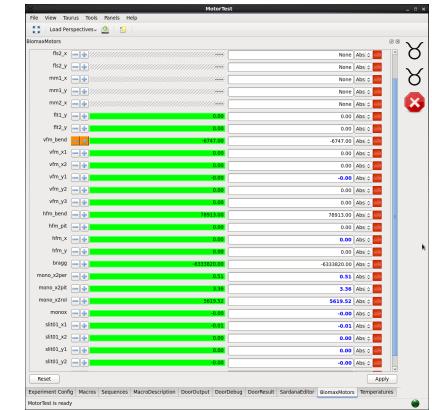
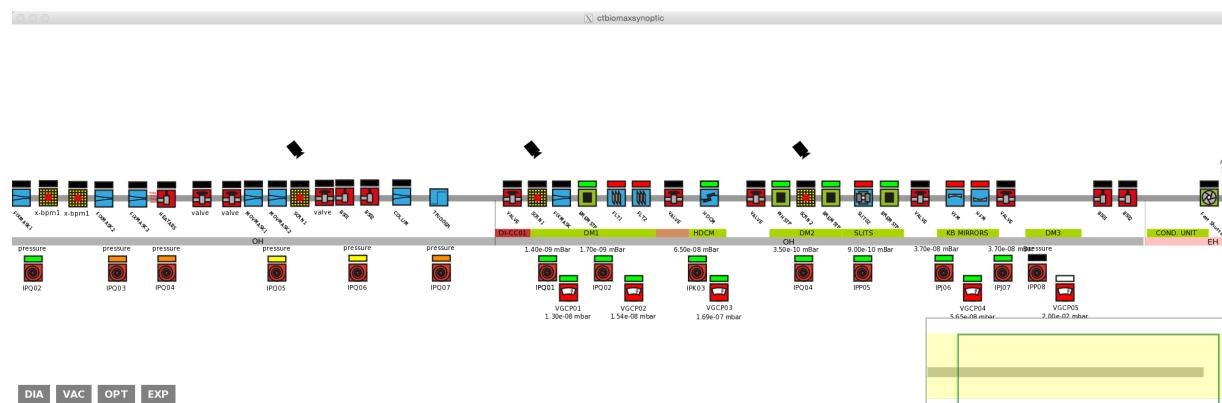
# Sardana @MAXIV

- BioMax:
  - Some numbers

	#
Controllers	11
Motors	29
PseudoMotors	11
CTExpChannels	5

# Sardana @MAXIV

- BioMax:
    - Pseudomotors.
    - Few macros for SATs.
    - Beamline GUIs and synoptic.



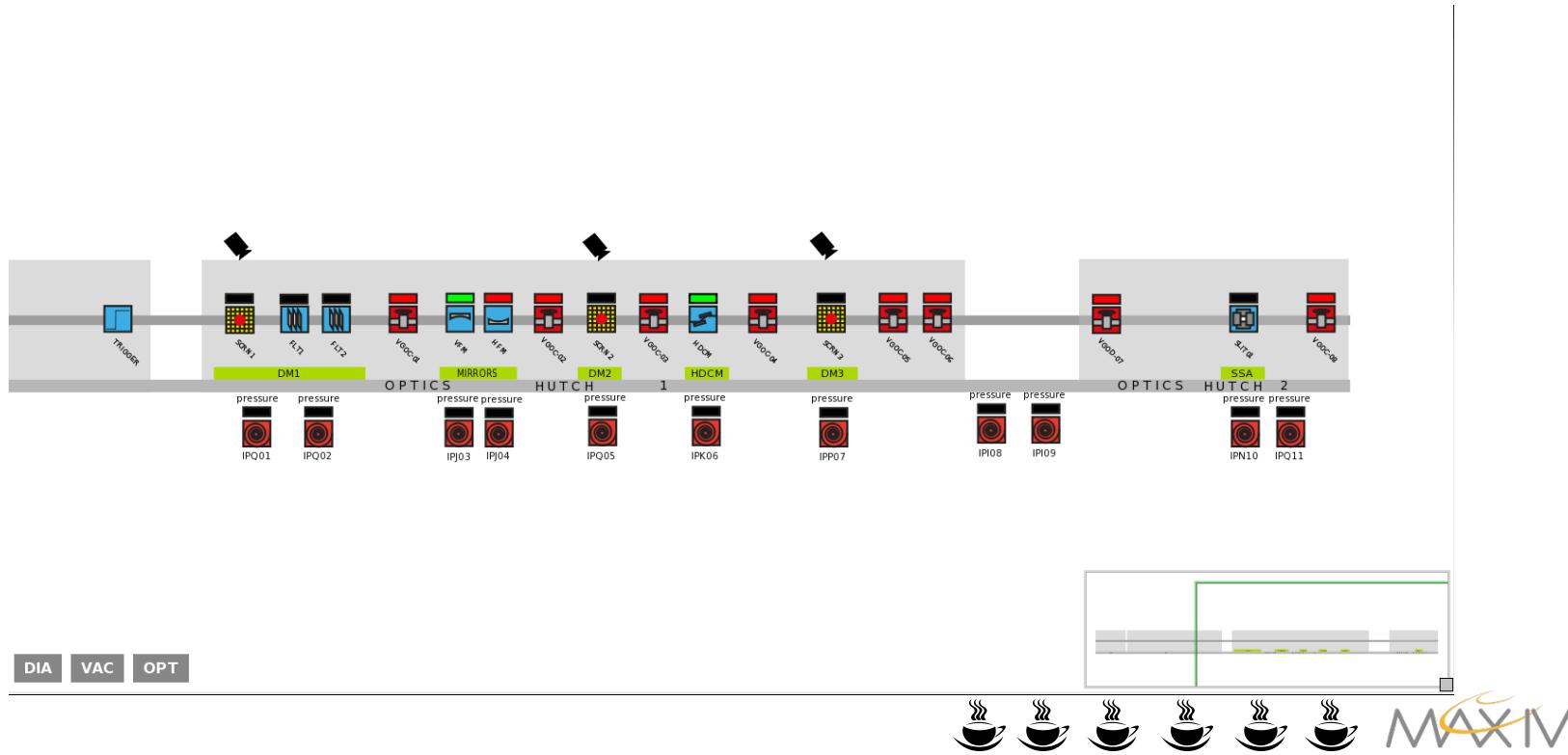
# Sardana @MAXIV

- NanoMax:
  - Some numbers

	#
Controllers	7
Motors	28
PseudoMotors	2
ExpChannels	5

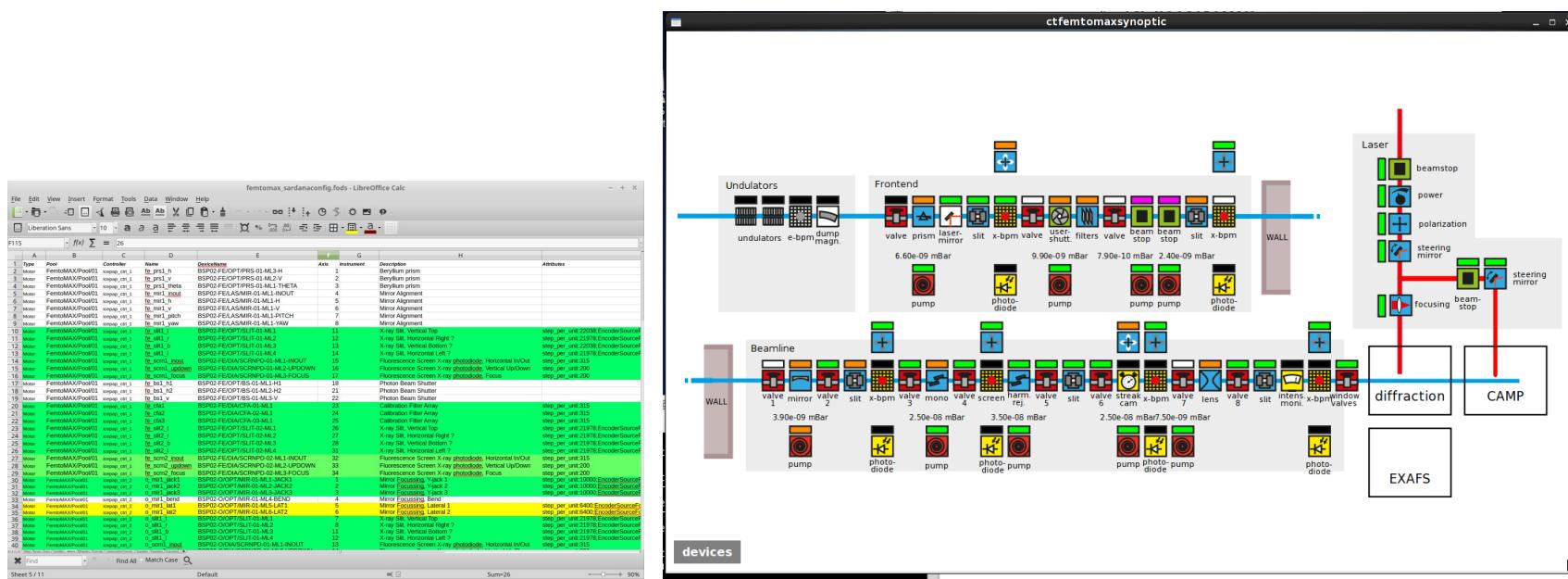
# Sardana @MAXIV

- NanoMax:
    - Motor configuration.
    - Beamline GUIs and synoptic



# Sardana @MAXIV

- Femtomax:
    - ~ 200 motors configured.
    - Synoptic (BL GUI?)



# Sardana @MAXIV

- Hippie, Veritas, Arpes, Balder:
  - Preparing motorisation.

# Installation & configuration

## Control System Installation



## Sardana configuration



MAXIV DSCONFIG



SARDANA config script



# Topics for the near future

- Authentification
- Data management

# Thanks for your attention

