Beamtime!

A general user call for proposals in the September 2019 – February 2020 period is now open for these beamlines:

- BioMAX macromolecular crystallography
- FinEstBeAMS photoemission in gas-phase and photoluminescence spectroscopy
- HIPPIE ambient pressure X-ray photoemission spectroscopy
- NanoMAX hard X-ray nano-diffraction and imaging
- Balder hard X-ray absorption
- Veritas side branch
- MAXPEEM photoelectron microscopy
- Bloch angle-resolved photoemission spectroscopy

Detailed information about these calls are available <u>at the user</u> <u>website</u>. The **deadline for proposal submission is CET 23:59**, **Tuesday 19 March 2019**.

Heavy milestone for SoftiMAX



At SoftiMAX, users will have access to methods for X-ray imaging and microscopy for investigation of everything from cells and viruses to how pollutants move through an ecosystem. An important step in the construction process for the beamline was taken recently when the fourteen tonnes insertion device was installed <u>www.maxiv.se/softimax</u>.

MAX IV Biolab officially open



The biological laboratory at MAX IV is the central laboratory facility to support life science related experiments at various beamlines and also a platform to carry out in-house life science research. The lab complements those beamline-attached sample preparation units and is designed to offer extended instrumentation access and top-notch supports with continuous upgrading possibility.



Nanoribbons for electronics

Two-dimensional sheets of graphene in the form of ribbons a few tens of nanometers across have unique properties that are highly interesting for use in future electronics. Researchers have now for the first time fully characterised nanoribbons grown in both the two possible configurations on the same wafer with a clear route towards upscaling the production.



The nanoribbons were grown in two directions along ridges on the substrate. This way both the zigzag- and armchair-edge varieties form and can be studied at the same time.

The positions of the atoms in the graphene layer as well as the zig zag edge can be seen from the scanning tunneling microscopy image.

The measurements performed at the MAXPEEM beamline was done with a technique not requiring X-rays. MAXPEEM has just begun commissioning with undulator x-rays from the 1.5 GeV ring at MAX IV. <u>www.maxiv.se/maxpeem</u>

New home for luminescence spectroscopy

In 2012, the last dedicated luminescence spectroscopy end station closed its doors at the DESY synchrotron in Hamburg. Since then, the user community has been scattered looking for a place to continue their important research on everything from medical imaging to dark matter detectors.



This month, the FinEstBeAMS team showed the world that they are open for business by publishing their initial findings in the journal Radiation Measurements. <u>www.maxiv.se/finestbeams</u>

