


Experiment Report Form

	Micro X-ray diffraction of crystalline myelin dom	Experiment number:
Beamline:	Date of experiment: from: 26/11/2010 to: 27/11/2010	Date of report: 17/11/2011
Shifts:	Local contact(s): Emanuela di Cola	<i>Received at ESRF:</i>
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In this proposal we have investigated the spatial heterogeneity of myelin structure distribution in the frog sciatic nerve of the XENOPOUS species, at the micron scale. Using the unique capabilities of high-resolution synchrotron micro X-ray diffraction we have mapped the distribution of crystalline myelin domains at 5 pH concentration: 4, 5.5., 6.5, 7.3, 8. We have also monitored the progressive denaturation of the nerve at pH 7.3 after 12 hours, and checked the differences in the microstructure rearrangement. Here below we report the 20'300 images of diffraction averaged of the fresh 7.3 nerves. Further analysis are currently been done.

