

W0283

FASTSHUT: Flash-annealing of Cryo-protected Samples. A. Lenhard, Z. Lin, B. Clay, J. Jakoncic, A. Vahedi-Faridi and V. Stojanoff. National Synchrotron Light Source, Brookhaven National Laboratory, Upton, NY 11973, Brown Univ., Dept. of Molecular Biology, Providence, RI 02912.

Poorly diffracting crystals is one of many bottlenecks affecting bio-molecular X-ray crystallography. Different groups have reported on the development of procedures and techniques to improve the diffraction quality of bio-molecular crystals. These procedures, generally labeled as “annealing”, remain mostly subjective and anecdotal. At the National Institute of General Medical Sciences facility at the National Synchrotron Light Source we developed a small device to allow the systematic “annealing” of cryo-protected samples at the X6A beam line. This device build from of-the-shelf components can be activated through a VME and EPICS based software compatible with the beam line control software.

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