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Enhanced self-seeding - first experiments

Monday 2 June 2025 16:00 (2 hours)

Enhanced self-seeding (proposed in Phys. Rev. Lett. 125, 044801, 2020) is a concept for more stable, laser-like XFEL operation. The principle of enhanced self-seeding lies in strong lasing on the current spike in the SASE section, and picking the seed pulse with the flat, lower current portion of the beam. Recently, we performed experimental studies of this scheme with the existing hard x-ray self-seeding (HXRSS) at LCLS. We report on our findings and possible new self-seeding schemes.

Footnotes

Paper preparation format

LaTeX

Region represented

America

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