

2021A, Performed Proposals

K	SACL	A 2021A, Perform					1S	hift =12Hours
S/ N	Proposal No.	Proposal Title	Project Leader	Affiliation	Country	Type of Proposal	Beamline	Performed Shift
1	2021A8001	Searching for Au(CN)2– oligomers with time-resolved x-ray liquidography	Hyotcherl lhee	Korea Advanced Institute of Science and Technology	Korea	SACLA General Proposal (Non-proprietary)	BL3	5
2	2021A8002 ²⁾	Signal generation in Bacteriophytochromes studied by Serial Femtosecond Crystallography	Sebastian Westenhoff	University of Gothenburg	Sweden	SACLA General Proposal (Non-proprietary)	BL3	5.5
3	2021A8003 ¹⁾	High-resolution structure of photosystem II in the intermediate state of the water-splitting reaction using fixed-target protein crystallography	Michihiro Suga	Okayama University	Japan	SACLA General Proposal (Non-proprietary)	BL2	7
4	2021A8004	Understanding instabilities in supernovae remnants in the laboratory with ultra-high resolution X-ray diagnostics.	Michel Koenig	Centre National de la Recherche Scientifique	France	SACLA General Proposal (Non-proprietary)	BL3	3
5	2021A8006	Optical control of ultrafast photoisomerization with pathway-selective observation	Jasper vanThor	Imperial College London	UK	SACLA General Proposal (Non-proprietary)	BL3	5
6	2021A8007	Study of redox state in metal protein crystal by simultaneous measurements of X-ray spectroscopy and SFX	Yasufumi Umena	Nagoya University	Japan	SACLA General Proposal (Non-proprietary)	BL2	5
7	2021A8009	Rapid structure determination system for drug-target proteins using the X-ray free electron laser	So Iwata	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL2	4
8	2021A8010 ¹⁾	Damage-free imaging of catalyst layer nano-structure of polymer electrolyte fuel cell (PEFC)	Hideto Imai	NISSAN ARC, LTD.	Japan	SACLA General Proposal (Non-proprietary)	BL2	4
9	2021A8011 ²⁾	Developing pump-probe small unit-cell serial-femtosecond crystallography	Bo Iversen	University of Aarhus	Denmark	SACLA General Proposal (Non-proprietary)	BL3	5.417
10	2021A8012	Resubmission - Unraveling the symmetry-breaking second order phase transition in polar metal lithium osmate at the lithium K-edge with soft X-ray second harmonic generation	Walter Drisdell	Lawrence Berkeley National Laboratory	USA	SACLA General Proposal (Non-proprietary)	BL1	11
11	2021A8013 ¹⁾	Time-resolved SFX analysis of structural changes in the copper amine oxidase reaction	Takeshi Murakawa	Osaka Medical and Pharmaceutical University	Japan	SACLA General Proposal (Non-proprietary)	BL2	4
12	2021A8014 ²⁾	C-H bond activation and C-C bond formation in a photosensitizer protein captured by XFEL	Jiangyun Wang	Institute of Biophysics	China	SACLA General Proposal (Non-proprietary)	BL2	5.5
13	2021A8015	Development of versatile methods for protein structural dynamics analysis using X-ray free electron lasers	Eriko Nango	Tohoku University	Japan	SACLA General Proposal (Non-proprietary)	BL2	3
14	2021A8016	Observation of Bioluminescence Process by Serial Femtosecond Crystallography	Toru Nakatsu	Wakayama Medical University	Japan	SACLA General Proposal (Non-proprietary)	BL2	3
15	2021A8017	Observation of structure of high-density liquid carbon	Norimasa Ozaki	Osaka University	Japan	SACLA General Proposal (Non-proprietary)	BL3	7
16	2021A8018	Study of electronic state of manganese compounds	Kenji Tamasaku	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
17	2021A8020	Observation of OH radical in water and temperature dependence of their lifetime by soft x-ray absorption spectroscopy in transmission mode	Hiroshi lwayama	National Institutes of Natural Sciences	Japan	SACLA General Proposal (Non-proprietary)	BL1	8
18	2021A8021	Study on atomic-scale dynamics in liquids via duration-controlled X-ray speckle visibility spectroscopy	Taito Osaka	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
19	2021A8022 ¹⁾	Properties of shock-generated magmas at extreme conditions as afunction of time III	Takuo Okuchi	Kyoto University	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
20	2021A8024	Investigation of LO crystal and reference crystal using soft-X-ray Second Harmonic Generation	Masafumi Horio	The University of Tokyo	Japan	SACLA General Proposal (Non-proprietary)	BL1	4
21	2021A8025	All-optical magnetization switching of ferromagnetic metals by circularly polarized X-ray pulses	Kihiro Yamada	Tokyo Institute of Technology	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
22	2021A8026	Is long range magnetic ordering a metastable state in the antiferromagnetic to ferromagnetic phase transition in FeRh?	Valerio Scagnoli	Paul Scherrer Institute	Switzerland	SACLA General Proposal (Non-proprietary)	BL3	5
23	2021A8027	Development of wavelength-scale focusing system for soft x-ray free-electron laser pulses	Hiroto Motoyama	The University of Tokyo	Japan	SACLA General Proposal (Non-proprietary)	BL1	7
24	2021A8028 ¹⁾	Molecular-level imaging using 100-nm Focused XFEL	Yoshinori Nishino	Hokkaido University	Japan	SACLA General Proposal (Non-proprietary)	BL2	7
25	2021A8030	Bio-imaging, apodization, darkfield imaging, and spectroscopic imaging with a soft X-ray transmission microscope using soft X-ray free-electron laser and Wolter mirrors	Satoru Egawa	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL1	11
26	2021A8031	High throughput and time-resolved fixed target SFX of metalloproteins	Michael Hough	University of Essex	UK	SACLA General Proposal (Non-proprietary)	BL2	5
27	2021A8032	Ultra-fast diagnostics of ionization states of matter irradiated by high-intensity optical laser via XFEL- induced K-shell X-ray spectroscopy	Toshinori Yabuuchi	Japan Synchrotron Radiation Research Institute	Japan	SACLA General Proposal (Non-proprietary)	BL2	7.583
28	2021A8033	Direct detection of ultrafast nonthermal charge-density wave switching in 1T-TaS2	Jan Ravnik	Paul Scherrer Institute	Switzerland	SACLA General Proposal (Non-proprietary)	BL3	5
29	2021A8034	Visualization of the reaction pathway in the covalent bond formation process of transition metal aggregates using femtosecond X-ray solution scattering	Shunsuke Nozawa	High Energy Accelerator Research Organization	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
30	2021A8035 ²⁾	Time-resolved crystallography of uttrafast light driven DNA repair by photolyases	Yoshitaka Bessho	Academia Sinica	Taiwan, ROC	SACLA General Proposal (Non-proprietary)	BL2	5.5
31	2021A8036	Exploring Laser Astrophysics with coherent x-ray: Basic experiment for the realization of collisionless Weibel shock generation and particle acceleration (III)	Youichi Sakawa	Osaka University	Japan	SACLA General Proposal (Non-proprietary)	BL2	7
32	2021A8037	CDW phase modes and axion field in the Weyl semimetal (TaSe4)2I	Mariano Trigo	SLAC National Accelerator Laboratory	USA	SACLA General Proposal (Non-proprietary)	BL3	7
33	2021A8038	Time-resolved Coulomb explosion imaging of the competition between ring-opening and direct dissociation in halo-cyclopropanes	Ruaridh Forbes	SLAC National Accelerator Laboratory	USA	SACLA General Proposal (Non-proprietary)	BL1	7
34	2021A8039	Characterization of Non-Thermal Phase Transitions in Diamond and Silicon with Two-color X-ray Pulses	Philip Heimann	SLAC National Accelerator Laboratory	USA	SACLA General Proposal (Non-proprietary)	BL3	5
35	2021A8041	Elucidation of the mechanism of oxygen activation in metalloenzymes by using caged oxygen	Takehiko Tosha	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL2	3
36	2021A8047	Research on nonlinear effects in strong electronic excitation state and development of advanced nano- fabrications	Thanh-Hung Dinh	National Institutes for Quantum Science and Technology	Japan	SACLA General Proposal (Non-proprietary)	BL1	9
37	2021A8049	Formation of stable sub-10 nm XFEL beam using imaging mirror optics	Kazuto Yamauchi	Osaka University	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
38	2021A8051	Developing All X-ray Transient Grating spectroscopy: in a first application to resolve the ballistic regime of thermal carrier scattering	Cristian Svetina	Paul Scherrer Institute	Switzerland	SACLA General Proposal (Non-proprietary)	BL3	5
39	2021A8052	Time-resolved electron-ion coincidence spectroscopy of doubly-excited-state dynamics of He in EUV laser fields	Mizuho Fushitani	Nagoya University	Japan	SACLA General Proposal (Non-proprietary)	BL1	7
40	2021A8055	Coherent vibration of orbital order in perovskite-type cobalt oxides revealed by femtosecond time-resolved resonant x-ray diffraction	Ryo Fukaya	High Energy Accelerator Research Organization	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
41	2021A8057	Feasibility study of X-ray structure determination with sub-10 nm focused XFEL beam	Ichiro Inoue	RIKEN	Japan	SACLA General Proposal (Non-proprietary)	BL3	5
42	2021A8060	Development of texture-stress analyses of polycrystalline material under laser-induced shock-compressed state	Yusuke Seto	Kobe University	Japan	(Non-proprietary) SACLA General Proposal (Non-proprietary)	BL3	3
43	2021A8061	state Investigation of photo-induced lattice distortions in Fe-based superconductors	Yuya Kubota	RIKEN	Japan	(Non-proprietary) SACLA General Proposal (Non-proprietary)	BL3	7
44	2021A8063	Single shot XRD study of the magnetic field induced phase transition of Bismuth manganite up to 70 T	Akihiko Ikeda	The University of Tokyo	Japan	SACLA General Proposal	BL3	5
		Proposals for Complementary Use with SPring-8. J-PARC/MLE or HPCI including the K computer / the		, , ,	· ·	(Non-proprietary)		L

¹⁾ SACLA Research Proposals for Complementary Use with SPring-8, J-PARC/MLF or HPCI including the K computer / the supercomputer Fugaku. ²⁾ Including the feasibility check beamtime (FCBT) of 0.5 shifts in performed shift.