Taketo Handa

List of Publications by Citations

22 papers	745 citations	15 h-index	27 g-index
27 ext. papers	953 ext. citations	7.9 avg, IF	4.41 L-index

#	Paper	IF	Citations
22	Sn(IV)-free tin perovskite films realized by in situ Sn(0) nanoparticle treatment of the precursor solution. *Nature Communications*, **2020**, 11, 3008	17.4	114
21	Lead-Free Solar Cells based on Tin Halide Perovskite Films with High Coverage and Improved Aggregation. *Angewandte Chemie - International Edition*, **2018**, 57, 13221-13225	16.4	89
20	Charge Injection Mechanism at Heterointerfaces in CHNHPbI Perovskite Solar Cells Revealed by Simultaneous Time-Resolved Photoluminescence and Photocurrent Measurements. *Journal of Physical Chemistry Letters*, **2017**, 8, 954-960	6.4	72
19	Solvent-Coordinated Tin Halide Complexes as Purified Precursors for Tin-Based Perovskites. *ACS Omega*, **2017**, 2, 7016-7021	3.9	61
18	Photocarrier Recombination and Injection Dynamics in Long-Term Stable Lead-Free CH3NH3SnI3 Perovskite Thin Films and Solar Cells. *Journal of Physical Chemistry C*, **2017**, 121, 16158-16165	3.8	61
17	One-step solution synthesis of white-light-emitting films via dimensionality control of the Cs□u□ system. *APL Materials*, **2019**, 7, 111113	5.7	43
16	Photophysics of metal halide perovskites: From materials to devices. *Japanese Journal of Applied Physics*, **2018**, 57, 090101	1.4	42
15	Large negative thermo-optic coefficients of a lead halide perovskite. *Science Advances*, **2019**, 5, eaax0786	14.3	29
14	Radiative recombination and electron-phonon coupling in lead-free CH3NH3SnI3 perovskite thin films. *Physical Review Materials*, **2018**, 2,	3.2	29
13	Charge Injection at the Heterointerface in Perovskite CH3NH3PbI3 Solar Cells Studied by Simultaneous Microscopic Photoluminescence and Photocurrent Imaging Spectroscopy. *Journal of Physical Chemistry Letters*, **2016**, 7, 3186-91	6.4	29
12	Lead-Free Solar Cells based on Tin Halide Perovskite Films with High Coverage and Improved Aggregation. *Angewandte Chemie*, **2018**, 130, 13405-13409	3.6	24
11	Photophysics of lead-free tin halide perovskite films and solar cells. *APL Materials*, **2019**, 7, 080903	5.7	24
10	Optical characterization of voltage-accelerated degradation in CH3NH3PbI3 perovskite solar cells. *Optics Express*, **2016**, 24, A917-24	3.3	18
9	Structure□roperty relations in Ag□i□compounds: potential Pb-free absorbers in solar cells. *Journal of Materials Chemistry A*, **2019**, 7, 5583-5588	13	15
8	Materials Chemistry Approach for Efficient Lead-Free Tin Halide Perovskite Solar Cells. *ACS Applied Electronic Materials*, **2020**, 2, 3794-3804	4	14
7	Phonon, thermal, and thermo-optical properties of halide perovskites. *Physical Chemistry Chemical Physics*, **2020**, 22, 26069-26087	3.6	11
6	Light emission from halide perovskite semiconductors: bulk crystals, thin films, and nanocrystals. *Journal Physics D: Applied Physics*, **2021**, 54, 383001	3	9

List of Publications

5	Mixed lead-tin perovskite films with >7 μs charge carrier lifetimes realized by maltol post-treatment. *Chemical Science*, **2021**, 12, 13513-13519	9.4	7
4	Large thermal expansion leads to negative thermo-optic coefficient of halide perovskite CH3NH3PbCl3. *Physical Review Materials*, **2020**, 4,	3.2	6
3	Optical responses of lead halide perovskite semiconductors. *Semiconductor Science and Technology*, **2020**, 35, 093001	1.8	5
2	Optimized Carrier Extraction at Interfaces for 23.6% Efficient Tin–Lead Perovskite Solar Cells		2
1	Near-Ultraviolet Transparent Organic Hole-Transporting Materials Containing Partially Oxygen-Bridged Triphenylamine Skeletons for Efficient Perovskite Solar Cells. *ACS Applied Energy Materials*, **2021**, 4, 1484-1495	6.1	1