

# Siyuan Dai

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/1081388/publications.pdf>

Version: 2024-02-01

24  
papers

1,440  
citations

393982

19  
h-index

580395

25  
g-index

26  
all docs

26  
docs citations

26  
times ranked

1829  
citing authors

#	ARTICLE	IF	CITATIONS
1	Ultralow-loss polaritons in isotopically pure boron nitride. Nature Materials, 2018, 17, 134-139.	13.3	291
2	Configurable phonon polaritons in twisted $\pm$ -MoO <sub>3</sub> . Nature Materials, 2020, 19, 1307-1311.	13.3	180
3	Imaging of Anomalous Internal Reflections of Hyperbolic Phonon-Polaritons in Hexagonal Boron Nitride. Nano Letters, 2016, 16, 3858-3865.	4.5	106
4	Phase transition in bulk single crystals and thin films of $\sqrt{V}O_2$ by nanoscale infrared spectroscopy and imaging. Physical Review B, 2015, 91, .	1.1	88
5	Phonon Polaritons and Hyperbolic Response in van der Waals Materials. Advanced Optical Materials, 2020, 8, 1901393.	3.6	87
6	Efficiency of Launching Highly Confined Polaritons by Infrared Light Incident on a Hyperbolic Material. Nano Letters, 2017, 17, 5285-5290.	4.5	79
7	Phonon Polaritons in Monolayers of Hexagonal Boron Nitride. Advanced Materials, 2019, 31, e1806603.	11.1	73
8	Hyperbolic Phonon Polaritons in Suspended Hexagonal Boron Nitride. Nano Letters, 2019, 19, 1009-1014.	4.5	64
9	Manipulation and Steering of Hyperbolic Surface Polaritons in Hexagonal Boron Nitride. Advanced Materials, 2018, 30, e1706358.	11.1	63
10	Imaging the Localized Plasmon Resonance Modes in Graphene Nanoribbons. Nano Letters, 2017, 17, 5423-5428.	4.5	51
11	Mechanical Detection and Imaging of Hyperbolic Phonon Polaritons in Hexagonal Boron Nitride. ACS Nano, 2017, 11, 8741-8746.	7.3	48
12	Phase Change Hyperbolic Heterostructures for Nanopolaritonics: A Case Study of hBN/VO <sub>2</sub> . Advanced Materials, 2019, 31, e1900251.	11.1	43
13	Intrinsic Plasmon-Phonon Interactions in Highly Doped Graphene: A Near-Field Imaging Study. Nano Letters, 2017, 17, 5908-5913.	4.5	42
14	Symmetry breaking and geometric confinement in VO <sub>2</sub> : Results from a three-dimensional infrared nano-imaging. Applied Physics Letters, 2014, 104, 121905.	1.5	36
15	Nanoplasmonic Sandwich Immunoassay for Tumor-Derived Exosome Detection and Exosomal PD-L1 Profiling. ACS Sensors, 2021, 6, 3308-3319.	4.0	35
16	Machine-Learning-Assisted Microfluidic Nanoplasmonic Digital Immunoassay for Cytokine Storm Profiling in COVID-19 Patients. ACS Nano, 2021, 15, 18023-18036.	7.3	33
17	Internal Nanostructure Diagnosis with Hyperbolic Phonon Polaritons in Hexagonal Boron Nitride. Nano Letters, 2018, 18, 5205-5210.	4.5	29
18	A perspective of twisted photonic structures. Applied Physics Letters, 2021, 119, .	1.5	23

#	ARTICLE	IF	CITATIONS
19	Faraday Rotation Due to Surface States in the Topological Insulator (Bi <sub>1-x</sub> Sb <sub>x</sub> ) <sub>2</sub> Te <sub>3</sub> . Nano Letters, 2017, 17, 980-984.	4.5	21
20	Hyperbolic phonon polaritons with positive and negative phase velocities in suspended <i>h</i> -MoO <sub>3</sub> . Applied Physics Letters, 2022, 120, .	1.5	15
21	Large Photothermal Effect in Sub-40 nm <i>h</i> -BN Nanostructures Patterned Via High-Resolution Ion Beam. Small, 2018, 14, 1800072.	5.2	12
22	Quantum Control of Graphene Plasmon Excitation and Propagation at Heaviside Potential Steps. Nano Letters, 2018, 18, 1373-1378.	4.5	10
23	Altering the Reflection Phase for Nano-Polaritons: A Case Study of Hyperbolic Surface Polaritons in Hexagonal Boron Nitride. Advanced Optical Materials, 2022, 10, .	3.6	6
24	Photothermal Effect: Large Photothermal Effect in Sub-40 nm <i>h</i> -BN Nanostructures Patterned Via High-Resolution Ion Beam (Small 22/2018). Small, 2018, 14, 1870101.	5.2	1