Alexandra A Suvorova

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/1902350/publications.pdf

Version: 2024-02-01

96 papers 3,679 citations

28 h-index 59 g-index

96 all docs 96 docs citations

96 times ranked 4790 citing authors

#	Article	IF	CITATIONS
1	Large area van der Waals epitaxy of II–VI CdSe thin films for flexible optoelectronics and full-color imaging. Nano Research, 2022, 15, 368-376.	5.8	14
2	Gallium Plasmonic Nanoantennas Unveiling Multiple Kinetics of Hydrogen Sensing, Storage, and Spillover. Advanced Materials, 2021, 33, e2100500.	11.1	18
3	Ultrathin High-Quality SnTe Nanoplates for Fabricating Flexible Near-Infrared Photodetectors. ACS Applied Materials & Samp; Interfaces, 2020, 12, 31810-31822.	4.0	49
4	Colloidal Single‣ayer Photocatalysts for Methanolâ€Storable Solar H ₂ Fuel. Advanced Materials, 2019, 31, e1905540.	11.1	39
5	Colloidal quasi-one-dimensional dual semiconductor core/shell nanorod couple heterostructures with blue fluorescence. Nanoscale, 2019, 11, 10190-10197.	2.8	12
6	Photocatalysts: Colloidal Singleâ€Layer Photocatalysts for Methanolâ€Storable Solar H ₂ Fuel (Adv. Mater. 49/2019). Advanced Materials, 2019, 31, 1970348.	11.1	0
7	A FIB-STEM Study of Strontium Segregation and Interface Formation of Directly Assembled La _{0.6} Sr _{0.4} Co _{0.2} Fe _{0.8} O _{3-Î} Cathode on Y _{O₃Sub>3} Electrolyte of Solid Oxide Fuel Cells. Journal of the Electrochemical Society, 2018, 165, F417-F429.	1.3	41
8	Nanoscale partitioning of Ru, Ir, and Pt in base-metal sulfides from the Caridad chromite deposit, Cuba. American Mineralogist, 2018, 103, 1208-1220.	0.9	14
9	Nanogeochemistry of hydrothermal magnetite. Contributions To Mineralogy and Petrology, 2018, 173, 1.	1.2	63
10	Greenalite precipitation linked to the deposition of banded iron formations downslope from a late Archean carbonate platform. Precambrian Research, 2017, 290, 49-62.	1.2	72
11	Evidence and origin of different types of sedimentary organic matter from a Paleoproterozoic orogenic Au deposit. Precambrian Research, 2017, 299, 319-338.	1.2	20
12	Porous Carbon: Heteroatom (N or N-S)-Doping Induced Layered and Honeycomb Microstructures of Porous Carbons for CO2 Capture and Energy Applications (Adv. Funct. Mater. 47/2016). Advanced Functional Materials, 2016, 26, 8650-8650.	7.8	7
13	Surface-tailored nanodiamonds as excellent metal-free catalysts for organic oxidation. Carbon, 2016, 103, 404-411.	5.4	164
14	Surface controlled generation of reactive radicals from persulfate by carbocatalysis on nanodiamonds. Applied Catalysis B: Environmental, 2016, 194, 7-15.	10.8	390
15	Dust to dust: Evidence for the formation of "primary―hematite dust in banded iron formations via oxidation of iron silicate nanoparticles. Precambrian Research, 2016, 284, 49-63.	1.2	54
16	Thermally stable coexistence of liquid and solid phases in gallium nanoparticles. Nature Materials, 2016, 15, 995-1002.	13.3	124
17	Heteroatom (N or Nâ€S)â€Doping Induced Layered and Honeycomb Microstructures of Porous Carbons for CO ₂ Capture and Energy Applications. Advanced Functional Materials, 2016, 26, 8651-8661.	7.8	182
18	In situ assembled La _{0.8} Sr _{0.2} MnO ₃ cathodes on a Y ₂ O ₃ â€"ZrO ₂ electrolyte of solid oxide fuel cells â€" interface and electrochemical activity. RSC Advances, 2016, 6, 99211-99219.	1.7	25

#	Article	IF	Citations
19	Precipitation of iron silicate nanoparticles in early Precambrian oceans marks Earth's first iron age. Geology, 2015, 43, 303-306.	2.0	83
20	Enhancing Properties of Highâ€Temperature Superconducting Stepâ€Edge Josephson Junctions by Nanoâ€Multilayers with a Small Mismatch. Advanced Materials Interfaces, 2014, 1, 1300112.	1.9	5
21	The occurrence and composition of chevkinite-(Ce) and perrierite-(Ce) in tholeiitic intrusive rocks and lunar mare basalt. American Mineralogist, 2014, 99, 1911-1921.	0.9	12
22	Processing and Properties of BioCeramic Coatings onto 3D Tiâ€Mesh by DipCasting Method. International Journal of Applied Ceramic Technology, 2014, 11, 1030-1038.	1.1	2
23	Catalytic oxidation of organic pollutants on pristine and surface nitrogen-modified carbon nanotubes with sulfate radicals. Applied Catalysis B: Environmental, 2014, 154-155, 134-141.	10.8	437
24	Effect of Interface energy and electron transfer on shape, plasmon resonance and SERS activity of supported surfactant-free gold nanoparticles. RSC Advances, 2014, 4, 29660.	1.7	2
25	The formation of fluvio-lacustrine ferruginous pisoliths in the extensive palaeochannels of the Yilgarn Craton, Western Australia. Sedimentary Geology, 2014, 313, 32-44.	1.0	12
26	A New Metal-Free Carbon Hybrid for Enhanced Photocatalysis. ACS Applied Materials & Samp; Interfaces, 2014, 6, 16745-16754.	4.0	167
27	Cubic Phase Sn-Rich GeSn Nanocrystals in a Ge Matrix. Crystal Growth and Design, 2014, 14, 1617-1622.	1.4	33
28	Demonstrating the Capability of the High-Performance Plasmonic Gallium–Graphene Couple. ACS Nano, 2014, 8, 3031-3041.	7.3	48
29	Transformation of YSZ under high fluence argon ion implantation. Nuclear Instruments & Methods in Physics Research B, 2014, 326, 283-288.	0.6	9
30	One-pot hydrothermal synthesis of ZnO-reduced graphene oxide composites using Zn powders for enhanced photocatalysis. Chemical Engineering Journal, 2013, 229, 533-539.	6.6	137
31	Correlation between microstructural and magnetic properties of Tb implanted ZnO. AIP Conference Proceedings, 2013, , .	0.3	7
32	The Iron Distribution and Magnetic Properties of Schistosome Eggshells: Implications for Improved Diagnostics. PLoS Neglected Tropical Diseases, 2013, 7, e2219.	1.3	22
33	Effects of Ad-atom Diffusivity Throughout Sb-Mediated Formation of Ge/Si Nanoislands. Materials Research Society Symposia Proceedings, 2012, 1411, 45.	0.1	0
34	Tranquillityite: The last lunar mineral comes down to Earth. Geology, 2012, 40, 83-86.	2.0	14
35	Characterization of plasmonic nanostructures by analytical TEM. Journal of Physics: Conference Series, 2012, 371, 012078.	0.3	2
36	Optical Properties of Silicon Semiconductor-Supported Gold Nanoparticles Obtained by Sputtering. Journal of Nanoscience and Nanotechnology, 2012, 12, 8594-8599.	0.9	1

#	Article	IF	CITATIONS
37	Spin-related Effects in Scattering of Spin-Polarized Low-energy Electrons from Magnetic and Nonmagnetic Surfaces. Journal of Physics: Conference Series, 2012, 388, 132026.	0.3	O
38	Structural and compositional complexity of nitrogen implantation in silicon carbide. Nuclear Instruments & Methods in Physics Research B, 2012, 272, 462-465.	0.6	3
39	Effect of annealing on the structural, electrical and magnetic properties of Gd-implanted ZnO thin films. Journal of Materials Science, 2012, 47, 1119-1126.	1.7	69
40	Ion implantation in diamond using 30keV Ga+ focused ion beam. Diamond and Related Materials, 2011, 20, 1160-1164.	1.8	35
41	Spin-orbit effects in the (e,2e) scattering from a $W(110)$ surface and thin gold layer. Journal of Physics: Conference Series, 2011, 288, 012015.	0.3	1
42	GaMg Alloy Nanoparticles for Broadly Tunable Plasmonics. Small, 2011, 7, 751-756.	5.2	37
43	Size dependence of the dielectric function of silicon-supported plasmonic gold nanoparticles. Physical Review B, 2010, 82, .	1.1	38
44	Fabrication of Si–C–N compounds in silicon carbide by ion implantation. Nuclear Instruments & Methods in Physics Research B, 2009, 267, 1294-1298.	0.6	8
45	Structural and optical properties of ZnO thin films by rf magnetron sputtering with rapid thermal annealing. Applied Physics Letters, 2008, 92, . Magnetization reversal in exchange-biased <mml:math< td=""><td>1.5</td><td>37</td></mml:math<>	1.5	37
46	xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"> <mml:mrow><mml:mi mathvariant="normal">Ni<mml:mo>â^•</mml:mo><mml:mi mathvariant="normal">Ni<mml:mi mathvariant="normal">O</mml:mi </mml:mi </mml:mi </mml:mrow> layered structures. Physical Review B,	1.1	20
47	2007, 76, . Er2O3 as a high-K dielectric candidate. Applied Physics Letters, 2007, 91, 091914.	1.5	49
48	Multifunctional Nanocrystalline Thin Films of Er ₂ O ₃ : Interplay between Nucleation Kinetics and Film Characteristics. Advanced Functional Materials, 2007, 17, 3607-3612.	7.8	22
49	Secondary electron imaging of SiC-based structures in secondary electron microscope. Surface Science, 2007, 601, 4428-4432.	0.8	15
50	Application of two-electron spectroscopy in reflection for studying electronic structure of surfaces and thin films. Journal of Electron Spectroscopy and Related Phenomena, 2007, 161, 147-149.	0.8	2
51	Synthesis of buried silicon nitride layer in SiC by nitrogen implantation. Nuclear Instruments & Methods in Physics Research B, 2007, 257, 217-221.	0.6	1
52	Influence of Nanowire Density on the Shape and Optical Properties of Ternary InGaAs Nanowires. Nano Letters, 2006, 6, 599-604.	4.5	222
53	Effect of deposition conditions on mechanical properties of low-temperature PECVD silicon nitride films. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2006, 435-436, 453-459.	2.6	161
54	Magnesium oxide as a candidate high-lº gate dielectric. Applied Physics Letters, 2006, 88, 142901.	1.5	83

#	Article	IF	CITATIONS
55	Experimental evidence for the role of nonuniform modes in the asymmetric magnetization reversal of aNiâ^•NiOsystem. Physical Review B, 2006, 74, .	1.1	19
56	Structural Materials for NEMS/MEMS Devices. , 2006, , .		O
57	CHARACTERISTICS OF LOW TEMPERATURE PECVD SILICON NITRIDE FOR MEMS STRUCTURAL MATERIALS. International Journal of Modern Physics B, 2006, 20, 3799-3804.	1.0	4
58	ZrO2 film interfaces with Si and SiO2. Journal of Applied Physics, 2005, 98, 033506.	1.1	25
59	Diffusion of boron in 6H and 4H SiC coimplanted with boron and nitrogen ions. Journal of Applied Physics, 2004, 96, 4960-4964.	1.1	12
60	Effect of Implantation Temperature on Redistribution of Al in SiC during Annealing. Materials Science Forum, 2004, 457-460, 897-900.	0.3	3
61	Measurements of insulator band parameters using combination of single-electron and two-electron spectroscopy. Solid State Communications, 2004, 129, 389-393.	0.9	17
62	Secondary-electron emission mechanism of LiF film by (e,2e) spectroscopy. Surface Science, 2004, 548, 187-199.	0.8	23
63	Comparison of interfaces for (Ba,Sr)TiO3 films deposited on Si and SiO2/Si substrates. Journal of Applied Physics, 2004, 95, 2672-2675.	1.1	7
64	Charge-Related Problems Associated with X-Ray Microanalysis in the Variable Pressure Scanning Electron Microscope at Low Pressures. Microscopy and Microanalysis, 2003, 9, 155-165.	0.2	11
65	Local stresses induced by nanoscale As–Sb clusters in GaAs matrix. Applied Physics Letters, 2002, 80, 377-379.	1.5	32
66	Study of interface formation of (Ba,Sr)TiO3 thin films grown by rf sputter deposition on bare Si and thermal SiO2/Si substrates Materials Research Society Symposia Proceedings, 2002, 745, 9121/T7.12.1.	0.1	0
67	Anisotropy of the spatial distribution of In(Ga)As quantum dots in In(Ga)As-GaAs multilayer heterostructures studied by X-ray and synchrotron diffraction and transmission electron microscopy. Semiconductors, 2001, 35, 932-940.	0.2	5
68	Structural transformations in low-temperature grown GaAs:Sb. Journal Physics D: Applied Physics, 2001, 34, A15-A18.	1.3	13
69	Enhanced As–Sb intermixing of GaSb monolayer superlattices in low-temperature grown GaAs. Applied Physics Letters, 2001, 79, 1294-1296.	1.5	26
70	Long-wavelength emission from self-organized InAs quantum dots on GaAs substrates. Microelectronics Journal, 2000, 31, 1-7.	1.1	17
71	Stacked InAs/InGaAs quantum dot heterostructures for optical sources emitting in the 1.3 µm wavelength range. Semiconductors, 2000, 34, 594-597.	0.2	6
72	Accumulation of majority charge carriers in GaAs layers containing arsenic nanoclusters. Semiconductors, 2000, 34, 1068-1072.	0.2	4

#	Article	IF	Citations
73	Transient enhanced diffusion of aluminum in SiC during high temperature ion implantation. Journal of Applied Physics, 1999, 86, 6039-6042.	1.1	31
74	In–Ga intermixing in low-temperature grown GaAs delta doped with In. Applied Physics Letters, 1999, 74, 1442-1444.	1.5	28
7 5	Enhanced precipitation of excess As on antimony delta layers in low-temperature-grown GaAs. Applied Physics Letters, 1999, 74, 1588-1590.	1.5	28
76	Long-wavelength emission in structures with quantum dots formed in the stimulated decomposition of a solid solution at strained islands. Semiconductors, 1999, 33, 901-905.	0.2	57
77	MBE Growth and Characterization of Composite InAlAs/In(Ga)As Vertically Aligned Quantum Dots. Materials Research Society Symposia Proceedings, 1999, 571, 109.	0.1	3
78	Indium layers in low-temperature gallium arsenide: Structure and how it changes under annealing in the temperature range 500–700 °C. Semiconductors, 1998, 32, 683-688.	0.2	10
79	Accumulation of electrons in GaAs layers grown at low temperatures and containing arsenic clusters. Semiconductors, 1998, 32, 1044-1047.	0.2	2
80	Capacitance-voltage profiling of Au/n-GaAs Schottky barrier structures containing a layer of self-organized InAs quantum dots. Semiconductors, 1998, 32, 1096-1100.	0.2	25
81	Lateral association of vertically-coupled quantum dots. Microelectronic Engineering, 1998, 43-44, 37-43.	1.1	19
82	Formation of InSb quantum dots in a GaSb matrix using molecular-beam epitaxy. Microelectronic Engineering, 1998, 43-44, 85-90.	1.1	15
83	Formation of InSb quantum dots in a GaSb matrix. Journal of Electronic Materials, 1998, 27, 414-417.	1.0	12
84	Electron escape from self-assembled InAs/GaAs quantum dot stacks. Physica B: Condensed Matter, 1998, 249-251, 267-270.	1.3	8
85	Optical properties of InAlAs quantum dots in an AlGaAs matrix. Applied Surface Science, 1998, 123-124, 381-384.	3.1	21
86	TEM and cathodoluminescence studies of porous SiC. Semiconductor Science and Technology, 1998, 13, 1111-1116.	1.0	21
87	Bistability of charge accumulated in low-temperature-grown GaAs. Applied Physics Letters, 1998, 73, 2796-2798.	1.5	8
88	Capacitance Spectroscopy of Thin GaAs Layers Grown by Molecular Beam Epitaxy at Low Temperatures. Solid State Phenomena, 1997, 57-58, 495-500.	0.3	0
89	HREM study of ion implantation in 6H-SiC at high temperatures. Journal of Electron Microscopy, 1997, 46, 271-279.	0.9	8
90	Diamond nanocrystals in hydrogenated amorphous carbon grown by ion sputtering of graphite. The Philosophical Magazine: Physics of Condensed Matter B, Statistical Mechanics, Electronic, Optical and Magnetic Properties, 1997, 76, 973-978.	0.6	18

#	Article	IF	CITATIONS
91	Arrays of strained InAs quantum dots in an (In Ga)As matrix, grown on InP substrates by molecular-beam epitaxy. Semiconductors, 1997, 31, 1080-1083.	0.2	24
92	Modulation of a quantum well potential by a quantum-dot array. Semiconductors, 1997, 31, 88-91.	0.2	6
93	Lateral association of vertically coupled quantum dots. Semiconductors, 1997, 31, 722-725.	0.2	13
94	Defect characterization in high temperature implanted 6Hî—,SiC using TEM. Nuclear Instruments & Methods in Physics Research B, 1997, 127-128, 347-349.	0.6	14
95	Majority carrier accumulation in low-temperature-grown GaAs layer inserted into n-and p-type matrices. , 0, , .		O
96	Enhanced intermixing in anion and cation sublattices of low-temperature grown GaAs. , 0, , .		0