Vasily A Bautin

List of Publications by Year in descending order

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	759233	501196
799	12	28
citations	h-index	g-index
34	34	819
docs citations	times ranked	citing authors
	citations 34	799 12 citations h-index 34 34

#	Article	IF	CITATIONS
1	Residual quenching stresses in glass-coated amorphous ferromagnetic microwires. Journal Physics D: Applied Physics, 2000, 33, 1161-1168.	2.8	220
2	Low frequency hysteresis loops of superparamagnetic nanoparticles with uniaxial anisotropy. Journal of Applied Physics, $2010,107,.$	2.5	114
3	Model concepts on the mechanism of microarc oxidation of metal materials and the control over this process. Protection of Metals, 2006, 42, 158-169.	0.2	62
4	Magnetic Vortices as Efficient Nano Heaters in Magnetic Nanoparticle Hyperthermia. Scientific Reports, 2018, 8, 1224.	3.3	60
5	Magnetic nanoparticles with combined anisotropy. Journal of Applied Physics, 2012, 112, .	2.5	37
6	Gallium-containing magnesium alloy for potential use as temporary implants in osteosynthesis. Journal of Magnesium and Alloys, 2020, 8, 352-363.	11.9	33
7	Design of Mg Zn Si Ca casting magnesium alloy with high thermal conductivity. Journal of Magnesium and Alloys, 2020, 8, 184-191.	11.9	31
8	Giant magneto-impedance effect in amorphous ferromagnetic wire with a weak helical anisotropy: Theory and experiment. Journal of Applied Physics, 2013, 113, .	2.5	29
9	Magnetic properties of polycrystalline cobalt nanoparticles. AIP Advances, 2017, 7, .	1.3	28
10	Effects of small additions of Zn on the microstructure, mechanical properties and corrosion resistance of WE43B Mg alloys. International Journal of Minerals, Metallurgy and Materials, 2019, 26, 858-868.	4.9	20
11	Magnetostatic interactions in various magnetosome clusters. Journal of Applied Physics, 2013, 113, 023907.	2.5	17
12	Properties of assembly of superparamagnetic nanoparticles in viscous liquid. Scientific Reports, 2021, 11, 6999.	3.3	17
13	Universal behavior of dense clusters of magnetic nanoparticles. AIP Advances, 2016, 6, .	1.3	13
14	Magnetostatic properties of Coâ€rich amorphous microwires: theory and experiment. Physica Status Solidi (A) Applications and Materials Science, 2008, 205, 1800-1804.	1.8	12
15	Nucleation field of a soft magnetic nanotube with uniaxial anisotropy. Journal of Applied Physics, 2008, 104, .	2.5	12
16	Measurement of weak magnetic field of corrosion current of isolated corrosion center. AIP Advances, 2015, 5, .	1.3	12
17	Effective magnetic anisotropy of annealed FePt nanoparticles. Applied Physics Letters, 2012, 101, 172402.	3.3	8
18	Influence of surface anisotropy on magnetization distribution in thin magnetic films. Journal of Applied Physics, 2017, 121, 133905.	2.5	8

#	Article	IF	CITATIONS
19	Effect of Heat Treatment on the Mechanical and Corrosion Properties of Mg–Zn–Ga Biodegradable Mg Alloys. Materials, 2021, 14, 7847.	2.9	8
20	Effective single-domain diameter of a fine non-ellipsoidal particle. Journal Physics D: Applied Physics, 2002, 35, 2081-2085.	2.8	7
21	Investigation of quasi-stationary magnetic fields of corrosion currents of zinc-copper cells using giant magneto-impedance magnetometer. Corrosion Science, 2016, 109, 257-262.	6.6	7
22	Glass shell etching to control residual quenching stress in Co-rich amorphous ferromagnetic microwires. Journal of Alloys and Compounds, 2018, 731, 18-23.	5.5	7
23	Co-rich Amorphous Microwires with Improved Giant Magnetoimpedance Characteristics Due to Glass Coating Etching. Jom, 2019, 71, 3113-3118.	1.9	7
24	Dynamics of superparamagnetic nanoparticles in viscous liquids in rotating magnetic fields. Beilstein Journal of Nanotechnology, 2019, 10, 2294-2303.	2.8	7
25	Properties of polycrystalline nanoparticles with uniaxial and cubic types of magnetic anisotropy of individual grains. Journal of Magnetism and Magnetic Materials, 2018, 460, 278-284.	2.3	5
26	A high-sensitivity scanning magnetometer based on the giant magneto-impedance effect for measuring local magnetic fields of corrosion currents. Technical Physics Letters, 2016, 42, 520-523.	0.7	4
27	Chemically Synthesized FeCo Powder for Advanced Applications. Journal of Superconductivity and Novel Magnetism, 2018, 31, 3371-3378.	1.8	3
28	Highly oriented ferromagnetic polymers based on Co- and Fe-rich amorphous microwires. Composites Communications, 2020, 22, 100459.	6.3	3
29	Microstructure and Magnetic Properties of Bulk FeCo Alloys Fabricated from Mechanically Alloying and Chemically Synthesized Powders. Journal of Superconductivity and Novel Magnetism, 2017, 30, 1281-1286.	1.8	2
30	Magnetostatic properties of assembly of magnetic vortices. Physica B: Condensed Matter, 2020, 582, 411964.	2.7	2
31	Development of selective laser melting irregular open-cell titanium lattice structure to mimic the human cancellous bone. Progress in Additive Manufacturing, 2022, 7, 1287-1295.	4.8	2
32	Soliton collisions in soft magnetic nanotube with uniaxial anisotropy. AIP Advances, 2016, 6, 055009.	1.3	1
33	In situ giant- magnetoimpedance magnetometer measurement of weak magnetic fields produced by pitting corrosion on AISI 304 stainless steel surface. Surfaces and Interfaces, 2021, 23, 100993.	3.0	1
34	Cavitation Assisted Production of Assemblies of Magnetic Nanoparticles of High Chemical Purity. Jom, 2020, 72, 509-516.	1.9	0