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List of Publications by Year
in descending order

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237	12,096	20817	32842
papers	citations	60 h-index	100 g-index

242	242	242	9080
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	MgZnCa glasses without clinically observable hydrogen evolution for biodegradable implants. Nature Materials, 2009, 8, 887-891.	27.5	775
2	Magnesium alloys for temporary implants in osteosynthesis: In vivo studies of their degradation and interaction with bone. Acta Biomaterialia, 2012, 8, 1230-1238.	8.3	506
3	Bulk metallic glasses. Intermetallics, 2003, 11, 529-540.	3.9	501
4	Design strategy for biodegradable Fe-based alloys for medical applicationsâ˜†. Acta Biomaterialia, 2010, 6, 1705-1713.	8.3	432
5	On the in vitro and in vivo degradation performance and biological response of new biodegradable Mgâ€“Yâ€“Zn alloysâ˜†. Acta Biomaterialia, 2010, 6, 1824-1833.	8.3	304
6	Biodegradable Fe-based alloys for use in osteosynthesis: Outcome of an in vivo study after 52weeks. Acta Biomaterialia, 2014, 10, 3346-3353.	8.3	211
7	Plasmon resonances of aluminum nanoparticles and nanorods. Journal of Applied Physics, 2008, 104, .	2.5	209
8	Deep-UV Surface-Enhanced Resonance Raman Scattering of Adenine on Aluminum Nanoparticle Arrays. Journal of the American Chemical Society, 2012, 134, 1966-1969.	13.7	207
9	In vivo degradation performance of micro-arc-oxidized magnesium implants: A micro-CT study in rats. Acta Biomaterialia, 2013, 9, 5411-5420.	8.3	193
10	Shearâ€Band Dynamics in Metallic Glasses. Advanced Functional Materials, 2015, 25, 2353-2368.	14.9	190
11	Propagation dynamics of individual shear bands during inhomogeneous flow in a Zr-based bulk metallic glass. Acta Materialia, 2011, 59, 3205-3213.	7.9	181
12	Random and exchange anisotropy in consolidated nanostructured Fe and Ni: Role of grain size and trace oxides on the magnetic properties. Physical Review B, 1998, 57, 2915-2924.	3.2	171
13	Magnetic Correlations in Nanostructured Ferromagnets. Physical Review Letters, 2000, 85, 1990-1993.	7.8	171
14	Aluminium carbide formation in interpenetrating graphite/aluminium composites. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2007, 448, 1-6.	5.6	161
15	Thermodynamics, enthalpy relaxation and fragility of the bulk metallic glass-forming liquid Pd43Ni10Cu27P20. Acta Materialia, 2004, 52, 667-674.	7.9	150
16	Probing Shear-Band Initiation in Metallic Glasses. Physical Review Letters, 2011, 107, 185502.	7.8	135
17	Diffusion on Demand to Control Precipitation Aging: Application to Al-Mg-Si Alloys. Physical Review Letters, 2014, 112, 225701.	7.8	132
18	Processing and microstructureâ€“property relations of high-strength low-alloy (HSLA) Mgâ€“Znâ€“Ca alloys. Acta Materialia, 2015, 98, 423-432.	7.9	126

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19	Model for decomposition and nanocrystallization of deeply undercooled Zr41.2Ti13.8Cu12.5Ni10Be22.5. Applied Physics Letters, 2000, 76, 3394-3396.	3.3	121
20	Room-temperature creep and structural relaxation of Mgâ€“Cuâ€“Y metallic glasses. Acta Materialia, 2008, 56, 3777-3785.	7.9	118
21	Degradation performance of biodegradable FeMnC(Pd) alloys. Materials Science and Engineering C, 2013, 33, 1882-1893.	7.3	118
22	High-Strength Low-Alloy (HSLA) Mgâ€“Znâ€“Ca Alloys with Excellent Biodegradation Performance. Jom, 2014, 66, 566-572.	1.9	115
23	Bulk metallic glass formation in Zrâ€“Cuâ€“Feâ€“Al alloys. Applied Physics Letters, 2005, 86, 241909.	3.3	113
24	Stickâ€“slip behavior of serrated flow during inhomogeneous deformation of bulk metallic glasses. Acta Materialia, 2010, 58, 3742-3750.	7.9	110
25	Constitutive model for inhomogeneous flow in bulk metallic glasses. Acta Materialia, 2009, 57, 881-892.	7.9	109
26	Cytotoxicity of Zr-based bulk metallic glasses. Intermetallics, 2006, 14, 729-734.	3.9	107
27	Assessing the degradation performance of ultrahigh-purity magnesium in vitro and in vivo. Corrosion Science, 2015, 91, 29-36.	6.6	106
28	Interface formation in aluminiumâ€“aluminium compound casting. Acta Materialia, 2008, 56, 3036-3043.	7.9	105
29	Stick-slip dynamics and recent insights into shear banding in metallic glasses. Journal of Materials Research, 2011, 26, 1453-1463.	2.6	105
30	Grain-boundary atomic structure in nanocrystalline palladium from x-ray atomic distribution functions. Physical Review B, 1995, 52, 7076-7093.	3.2	104
31	Laser additive manufacturing of biodegradable magnesium alloy WE43: A detailed microstructure analysis. Acta Biomaterialia, 2019, 98, 36-49.	8.3	103
32	Shear striations and deformation kinetics in highly deformed Zr-based bulk metallic glasses. Acta Materialia, 2008, 56, 4635-4646.	7.9	101
33	Non-linear alignment dynamics in suspensions of platelets under rotating magnetic fields. Soft Matter, 2012, 8, 7604-7609.	2.7	101
34	Formation of Bulk Metallic Glasses and Their Composites. MRS Bulletin, 2007, 32, 624-628.	3.5	100
35	Timeâ€“temperatureâ€“transformation diagram and microstructures of bulk glass forming Pd40Cu30Ni10P20. Applied Physics Letters, 2000, 77, 681-683.	3.3	96
36	Microstructural studies of crystallization of a Zr-based bulk metallic glass. Acta Materialia, 2003, 51, 4045-4057.	7.9	96

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37	Tensile properties of glassy MgZnCa wires and reliability analysis using Weibull statistics. Acta Materialia, 2009, 57, 3223-3231.	7.9	93
38	Long-term in vivo degradation behavior and near-implant distribution of resorbed elements for magnesium alloys WZ21 and ZX50. Acta Biomaterialia, 2016, 42, 440-450.	8.3	82
39	High Aspect Ratio Plasmonic Nanostructures for Sensing Applications. ACS Nano, 2011, 5, 6374-6382.	14.6	80
40	The influence of biodegradable magnesium implants on the growth plate. Acta Biomaterialia, 2018, 66, 109-117.	8.3	80
41	Design strategy for microalloyed ultra-ductile magnesium alloys. Philosophical Magazine Letters, 2009, 89, 377-390.	1.2	78
42	Experimental investigation and thermodynamic assessment of the Cuâ€“Snâ€“Ti ternary system. Calphad: Computer Coupling of Phase Diagrams and Thermochemistry, 2011, 35, 82-94.	1.6	76
43	Rational design of a lean magnesium-based alloy with high age-hardening response. Acta Materialia, 2018, 158, 214-229.	7.9	76
44	Existence of multiple critical cooling rates which generate different types of monolithic metallic glass. Nature Communications, 2019, 10, 1337.	12.8	76
45	Ferromagnetic resonance and magnetic characteristics of intact magnetosome chains in Magnetospirillum gryphiswaldense. Earth and Planetary Science Letters, 2008, 270, 200-208.	4.4	75
46	Atomic structure of nanocrystalline metals studied by diffraction techniques and EXAFS. Scripta Materialia, 1995, 6, 105-114.	0.5	74
47	Structure and properties of a hypoeutectic chromium steel processed in the semi-solid state. Acta Materialia, 2006, 54, 2727-2734.	7.9	74
48	Negative strain rate sensitivity in bulk metallic glass and its similarities with the dynamic strain aging effect during deformation. Applied Physics Letters, 2006, 89, 091918.	3.3	73
49	In-situ probing of metallic glass formation and crystallization upon heating and cooling via fast differential scanning calorimetry. Applied Physics Letters, 2014, 104, .	3.3	73
50	Magnesium from bioresorbable implants: Distribution and impact on the nano- and mineral structure of bone. Biomaterials, 2016, 76, 250-260.	11.4	73
51	Recrystallization behavior, microstructure evolution and mechanical properties of biodegradable Feâ€“Mnâ€“C(â€“Pd) TWIP alloys. Acta Materialia, 2012, 60, 2746-2756.	7.9	71
52	Ultrafast artificial aging of Alâ€“Mgâ€“Si alloys. Scripta Materialia, 2016, 112, 148-151.	5.2	70
53	Solidâ€“solid phase transitions via melting in metals. Nature Communications, 2016, 7, 11113.	12.8	69
54	Influence of trace impurities on the in vitro and in vivo degradation of biodegradable Mgâ€“5Znâ€“0.3Ca alloys. Acta Biomaterialia, 2015, 23, 347-353.	8.3	67

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55	Stress corrosion cracking and corrosion fatigue characterisation of MgZn1Ca0.3 (ZX10) in a simulated physiological environment. Journal of the Mechanical Behavior of Biomedical Materials, 2017, 65, 634-643.	3.1	66
56	Temperature-dependent shear band dynamics in a Zr-based bulk metallic glass. Applied Physics Letters, 2010, 96, .	3.3	65
57	Crystallization of bulk amorphous Zrâ€“Ti(Nb)â€“Cuâ€“Niâ€“Al. Applied Physics Letters, 2000, 77, 525-527.	3.3	64
58	Deformation kinetics in Zr-based bulk metallic glasses and its dependence on temperature and strain-rate sensitivity. Philosophical Magazine Letters, 2007, 87, 695-704.	1.2	63
59	On the microstructure and properties of 100Cr6 steel processed in the semi-solid state. Acta Materialia, 2007, 55, 6553-6560.	7.9	63
60	Electric and magnetic resonances in arrays of coupled gold nanoparticle in-tandem pairs. Optics Express, 2008, 16, 13287.	3.4	63
61	On the origin of primary Â½ a0 <111> and a0 <100> loops in irradiated Fe(Cr) alloys. Acta Materialia, 2017, 133, 427-439.	7.9	63
62	The role of zinc in the biocorrosion behavior of resorbable Mgâ€’Znâ€’Ca alloys. Acta Biomaterialia, 2019, 100, 398-414.	8.3	63
63	Structured nanoscale metallic glass fibres with extreme aspect ratios. Nature Nanotechnology, 2020, 15, 875-882.	31.5	59
64	Crystallization of amorphous Cu[sub 47]Ti[sub 34]Zr[sub 11]Ni[sub 8]. Journal of Applied Physics, 2001, 89, 1573.	2.5	58
65	Single shear-band plasticity in a bulk metallic glass at cryogenic temperatures. Scripta Materialia, 2012, 66, 231-234.	5.2	57
66	Size-dependent diffusion controls natural aging in aluminium alloys. Nature Communications, 2019, 10, 4746.	12.8	57
67	Deformation behavior of silver submicrometer-pillars prepared by nanoimprinting. Philosophical Magazine, 2009, 89, 869-884.	1.6	56
68	The Boson peak of model glass systems and its relation to atomic structure. European Physical Journal B, 2012, 85, 1.	1.5	52
69	Shear-band arrest and stress overshoots during inhomogeneous flow in a metallic glass. Applied Physics Letters, 2012, 100, .	3.3	52
70	Comparison of a resorbable magnesium implant in small and large growing-animal models. Acta Biomaterialia, 2018, 78, 378-386.	8.3	52
71	3D Printing of Salt as a Template for Magnesium with Structured Porosity. Advanced Materials, 2019, 31, e1903783.	21.0	52
72	Metal direct nanoimprinting for photonics. Microelectronic Engineering, 2008, 85, 419-424.	2.4	51

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73	Thermodynamic Assessment of the Snâ€“Ti System. Monatshefte FÃ¼r Chemie, 2005, 136, 1921-1930.	1.8	49
74	Influence of grain size and oxidation on the magnetic properties of nanostructured Fe and Ni. Scripta Materialia, 1997, 9, 523-526.	0.5	48
75	Devitrification of the Zr41.2Ti13.8Cu12.5Ni10.0Be22.5 bulk metallic glass studied by XRD, SANS, and NMR. Journal of Non-Crystalline Solids, 2003, 317, 118-122.	3.1	47
76	Experimental study of the Feâ€“Niâ€“Ti system. Intermetallics, 2010, 18, 374-384.	3.9	47
77	Magnetization processes in nanostructured metals and small-angle neutron scattering. Physical Review B, 2005, 71, .	3.2	45
78	Critical Poisson ratio for room-temperature embrittlement of amorphous Mg85Cu5Y10. Philosophical Magazine Letters, 2007, 87, 383-392.	1.2	45
79	Bulk metallic glassâ€“graphite composites. Scripta Materialia, 2007, 56, 1079-1082.	5.2	43
80	Deformation behavior of gold nano-pillars prepared by nanoimprinting and focused ion-beam milling. Acta Materialia, 2011, 59, 2180-2192.	7.9	43
81	A lean magnesiumâ€“zincâ€“calcium alloy ZX00 used for bone fracture stabilization in a large growing-animal model. Acta Biomaterialia, 2020, 113, 646-659.	8.3	43
82	Crossover in the magnetic properties of nanostructured metals. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2001, 304-306, 1050-1054.	5.6	42
83	Interface formation between liquid and solid Mg alloysâ€”An approach to continuously metallurgic joining of magnesium parts. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2010, 527, 2274-2279.	5.6	42
84	Process-controlled suppression of natural aging in an Alâ€“Mgâ€“Si alloy. Scripta Materialia, 2014, 89, 53-56.	5.2	42
85	Microstructural development during final-stage sintering of nanostructured zirconia based ceramics. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2000, 281, 68-74.	5.6	41
86	Icosahedral superclusters in<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML"><mml:mrow><mml:msub><mml:mi>Cu</mml:mi><mml:mn>64</mml:mn></mml:msub></mml:mrow></mml:math> glass. Physical Review B, 2014, 90, .	3.2	38
87	Surface-induced vacancy loops and damage dispersion in irradiated Fe thin films. Acta Materialia, 2015, 101, 22-30.	7.9	38
88	Time-resolved measurement of shear-band temperature during serrated flow in a Zr-based metallic glass. Acta Materialia, 2016, 115, 468-474.	7.9	38
89	Characterization, mechanical properties and dimensional accuracy of a Zr-based bulk metallic glass manufactured via laser powder-bed fusion. Materials and Design, 2021, 199, 109400.	7.0	38
90	Magnetoelastic coupling in the triangular lattice antiferromagnet<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:mrow><mml:msub><mml:mrow><mml:mtext>CuCrS</mml:mtext></mml:mrow><mml:mn>2</mml:mn></mml:msub></mml:mrow></mml:math> Physical Review B, 2009, 80, .	3.2	37

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91	Fluxing of Pdâ€“Siâ€“Cu bulk metallic glass and the role of cooling rate and purification. Acta Materialia, 2014, 71, 145-152.	7.9	37
92	On the understanding of the effects of sample size on the variability in fracture toughness of bulk metallic glasses. Acta Materialia, 2017, 126, 494-506.	7.9	37
93	Metastable quasicrystal-induced nucleation in a bulk glass-forming liquid. Proceedings of the National Academy of Sciences of the United States of America, 2018, 115, 6123-6128.	7.1	37
94	Precipitation hardening of biodegradable Feâ€“Mnâ€“Pd alloys. Acta Materialia, 2011, 59, 981-991.	7.9	36
95	Reverse Î±â€²â†’Î³ transformation mechanisms of martensitic Feâ€“Mn and age-hardenable Feâ€“Mnâ€“Pd alloys upon fast and slow continuous heating. Acta Materialia, 2014, 72, 99-109.	7.9	35
96	Towards refining microstructures of biodegradable magnesium alloy WE43 by spark plasma sintering. Acta Biomaterialia, 2019, 98, 67-80.	8.3	35
97	On the Immersion Testing of Degradable Implant Materials in Simulated Body Fluid: Active pH Regulation Using CO₂. Advanced Engineering Materials, 2013, 15, 434-441.	3.5	34
98	Local structural excitations in model glasses. Physical Review B, 2014, 89, .	3.2	34
99	Influence of decomposition on the thermal stability of undercooled Zr-Ti-Cu-Ni-Al alloys. Scripta Materialia, 2001, 44, 1269-1273.	5.2	33
100	Discrete deformation in amorphous metals: anin situSEM indentation study. Philosophical Magazine, 2006, 86, 5715-5728.	1.6	33
101	Characterization of bulk metallic glasses via fast differential scanning calorimetry. Thermochimica Acta, 2014, 590, 84-90.	2.7	33
102	Crystal-Like Rearrangements of Icosahedra in Simulated Copper-Zirconium Metallic Glasses and their Effect on Mechanical Properties. Physical Review Letters, 2015, 115, 165501.	7.8	32
103	Alloy design strategies for sustained ductility in Mg-based amorphous alloys â€“ Tackling structural relaxation. Acta Materialia, 2016, 103, 735-745.	7.9	32
104	Monopole-Induced Emergent Electric Fields in Ferromagnetic Nanowires. Physical Review Letters, 2018, 121, 097202.	7.8	32
105	Structural analysis of rapidly solidified Mgâ€“Cuâ€“Y glasses during room-temperature embrittlement. Philosophical Magazine, 2009, 89, 233-248.	1.6	30
106	Tribological properties of graphite- and ZrC-reinforced bulk metallic glass composites. Intermetallics, 2007, 15, 1228-1236.	3.9	29
107	Reaction of bone nanostructure to a biodegrading Magnesium WZ21 implant â€“ A scanning small-angle X-ray scattering time study. Acta Biomaterialia, 2016, 31, 448-457.	8.3	29
108	Biocorrosion Zoomed In: Evidence for Dealloying of Nanometric Intermetallic Particles in Magnesium Alloys. Advanced Materials, 2019, 31, e1903080.	21.0	29

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109	Magnetic correlations in nanostructured metals and an extended random-anisotropy model. Journal of Applied Physics, 1999, 85, 5187-5189.	2.5	28
110	Concentration and temperature dependence of decomposition in supercooled liquid alloys. Journal of Applied Crystallography, 2000, 33, 500-503.	4.5	28
111	Experimental investigation of the Cuâ€“Tiâ€“Zr system at 800Â°C. Intermetallics, 2007, 15, 1666-1671.	3.9	28
112	Biodegradable wound-closing devices for gastrointestinal interventions: Degradation performance of the magnesium tip. Materials Science and Engineering C, 2011, 31, 1098-1103.	7.3	28
113	Compositional dependence of shear-band dynamics in the Zrâ€“Cuâ€“Al bulk metallic glass system. Applied Physics Letters, 2014, 104, 101910.	3.3	28
114	Dynamic properties of major shear bands in Zrâ€“Cuâ€“Al bulk metallic glasses. Acta Materialia, 2015, 96, 428-436.	7.9	28
115	Enhancement of the intrinsic fluorescence of adenine using aluminum nanoparticle arrays. Optics Express, 2015, 23, 24719.	3.4	28
116	Critical crystallization properties of an industrial-grade Zr-based metallic glass used in additive manufacturing. Scripta Materialia, 2021, 199, 113861.	5.2	28
117	Immunological Response to Biodegradable Magnesium Implants. Jom, 2014, 66, 573-579.	1.9	27
118	Exceptional Strengthening of Biodegradable Mg-Zn-Ca Alloys through High Pressure Torsion and Subsequent Heat Treatment. Materials, 2019, 12, 2460.	2.9	26
119	Stacking-fault mediated plasticity and strengthening in lean, rare-earth free magnesium alloys. Acta Materialia, 2021, 211, 116877.	7.9	26
120	Silver high-aspect-ratio micro- and nanoimprinting for optical applications. Applied Physics Letters, 2009, 94, .	3.3	25
121	Large-scale synthesis of defined cobalt nanoparticles and magnetic metalâ€“polymer composites. Nanoscale, 2009, 1, 374.	5.6	25
122	Segregation-driven exceptional twin-boundary strengthening in lean Mgâ€“Znâ€“Ca alloys. Acta Materialia, 2022, 229, 117746.	7.9	25
123	Characterization of nanocrystalline palladium by x-ray atomic density distribution functions. Scripta Materialia, 1995, 6, 567-570.	0.5	24
124	Crystallization of Mgâ€“Al and Al-based metallic liquids under ultra-high gravity. Intermetallics, 2002, 10, 1167-1175.	3.9	24
125	Crystallization of metallic glasses under the influence of high density dc currents. Journal of Applied Physics, 2004, 95, 2896-2899.	2.5	24
126	Structure and mechanical properties of bulk glass-forming Niâ€“Nbâ€“Sn alloys. Scripta Materialia, 2006, 54, 187-190.	5.2	24

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127	Metallic foams from nanoparticle-stabilized wet foams and emulsions. Journal of Materials Chemistry, 2012, 22, 820-823.	6.7	24
128	Towards deep-UV surface-enhanced resonance Raman spectroscopy of explosives: ultrasensitive, real-time and reproducible detection of TNT. Analyst, The, 2015, 140, 5671-5677.	3.5	24
129	Skyrmion oscillations in magnetic nanorods with chiral interactions. Physical Review B, 2017, 95, .	3.2	24
130	Crystallization pathways of deeply undercooled Zr-Ti-Cu-Ni-Be melts. Scripta Materialia, 2001, 44, 1251-1255.	5.2	23
131	Random anisotropy and domain-wall pinning process in the magnetic properties of rapidly quenched Nd60Fe30Al10. Applied Physics Letters, 2003, 82, 721-723.	3.3	23
132	Metallic glass/polymer composites by co-processing at similar viscosities. Scripta Materialia, 2007, 56, 289-292.	5.2	23
133	Free-volume dependent pressure sensitivity of Zr-based bulk metallic glass. Journal of Materials Research, 2009, 24, 2697-2704.	2.6	23
134	Magnetic metamaterials in the blue range using aluminum nanostructures. Optics Letters, 2010, 35, 1656.	3.3	23
135	In Vivo Performance and Structural Relaxation of Biodegradable Bone Implants Made from Mgï£¿Znï£¿Ca Bulk Metallic Glasses. Advanced Engineering Materials, 2012, 14, B357.	3.5	23
136	Effectiveness of hydrogen microalloying in bulk metallic glass design. Acta Materialia, 2015, 99, 415-421.	7.9	23
137	Local structural excitations in model glass systems under applied load. Physical Review B, 2016, 93, .	3.2	23
138	Development of magnetic Fe-based metallic glasses without metalloids. Journal of Applied Physics, 2006, 99, 023908.	2.5	22
139	Comparison of the Decomposition and Crystallization Behavior of Zr and Pd Based Bulk Amorphous Alloys. Materials Science Forum, 2000, 343-346, 179-184.	0.3	21
140	Thermodynamics of polymorphism in a bulk metallic glass: Heat capacity measurements by fast differential scanning calorimetry. Thermochimica Acta, 2020, 685, 178518.	2.7	21
141	Corrosion properties of glassy Mg70Al15Ga15 in 0.1M NaCl solution. Intermetallics, 2009, 17, 811-817.	3.9	20
142	Magneto-electronic coupling in modulated defect-structures of natural Fe1â^'xS. Journal of Applied Physics, 2015, 118, .	2.5	20
143	Positron annihilation study of nanocrystalline iron. Scripta Materialia, 1999, 12, 1059-1062.	0.5	19
144	Abrasive waterjet machining of three-dimensional structures from bulk metallic glasses and comparison with other techniques. Journal of Materials Research, 2012, 27, 1187-1192.	2.6	19

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145	Model for decomposition and crystallization of Zr-based bulk amorphous alloys near the glass transition. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2001, 304-306, 670-673.	5.6	18
146	Hydrogen microalloying as a viable strategy for enhancing the glass-forming ability of Zr-based bulk metallic glasses. Scripta Materialia, 2015, 103, 53-56.	5.2	18
147	Additive manufacturing of a precious bulk metallic glass. Applied Materials Today, 2021, 24, 101080.	4.3	18
148	Nanoscale characterization of magnetic properties in nanostructured Fe, Ni and Co by small-angle neutron scattering. Scripta Materialia, 1997, 9, 331-334.	0.5	17
149	Effective temperature dynamics of shear bands in metallic glasses. Physical Review E, 2014, 90, 062405.	2.1	17
150	Exceptionally broad bulk metallic glass formation in the Mgâ€“Cuâ€“Yb system. Acta Materialia, 2017, 128, 188-196.	7.9	17
151	Atom Probe Tomography Study of Asâ€Quenched Alâ€“Mgâ€“Si Alloys. Advanced Engineering Materials, 2017, 19, 1600668.	3.5	17
152	Bulk metallic glass casting investigated using high-speed infrared monitoring and complementary fast scanning calorimetry. Acta Materialia, 2018, 151, 416-423.	7.9	17
153	Recent progress in the area of bulk metallic glasses. International Journal of Materials Research, 2006, 97, 225-233.	0.8	16
154	The influence of two common sterilization techniques on the corrosion of Mg and its alloys for biomedical applications. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2018, 106, 1907-1917.	3.4	16
155	Implant degradation of low-alloyed Mgâ€“Znâ€“Ca in osteoporotic, old and juvenile rats. Acta Biomaterialia, 2022, 147, 427-438.	8.3	16
156	Interaction-Induced Partitioning and Magnetization Jumps in the Mixed-Spin Oxide<mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" display="inline"><mml:msub><mml:mi>FeTiO</mml:mi><mml:mn>3</mml:mn></mml:msub><mml:mtext mathvariant="normal">â^’</mml:mtext><mml:msub><mml:mi>Fe</mml:mi><mml:mn>2</mml:mn></mml:msub><mml:msub><mml:mi mathvariant="normal">O</mml:mi><mml:mn>3</mml:mn></mml:msub></mml:math>. Physical Review Letters, 2011, 107, 057202.	7.8	15
157	Domain-wall dynamics in 4C pyrrhotite at low temperature. Geophysical Journal International, 2013, 195, 192-199.	2.4	15
158	Atomic-scale characterization of prior austenite grain boundaries in Feâ€“Mn-based maraging steel using site-specific atom probe tomography. Acta Materialia, 2014, 73, 215-226.	7.9	15
159	The detrimental effect of flux-induced boron alloying in Pdâ€“Siâ€“Cu bulk metallic glasses. Applied Physics Letters, 2015, 106, .	3.3	15
160	Grain-size dependence of intergranular magnetic correlations in nanostructured metals. Journal of Applied Crystallography, 2000, 33, 451-455.	4.5	14
161	Structural properties of determined from high-resolution synchrotron powder diffraction. Journal of Solid State Chemistry, 2009, 182, 1188-1192.	2.9	14
162	Variable defect structures cause the magnetic low-temperature transition in natural monoclinic pyrrhotite. Geophysical Journal International, 2016, 204, 961-967.	2.4	14

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163	Unconventional magnetization textures and domain-wall pinning in Smâ€“Co magnets. Scientific Reports, 2020, 10, 21209.	3.3	14
164	3D nanoscale analysis of bone healing around degrading Mg implants evaluated by X-ray scattering tensor tomography. Acta Biomaterialia, 2021, 134, 804-817.	8.3	14
165	Structural influence on atomic hopping and electronic states of Pd-based bulk metallic glasses. Applied Physics Letters, 2005, 86, 072104.	3.3	13
166	Shear-band propagation in fully amorphous and partially crystallized Mg-based alloys studied by nanoindentation and transmission electron microscopy. Journal of Alloys and Compounds, 2007, 434-435, 48-51.	5.5	13
167	Slow dynamics and field-induced transitions in a mixed-valence oxide solid solution. Physical Review B, 2011, 83, .	3.2	13
168	Tunable terahertz oscillation arising from Bloch-point dynamics in chiral magnets. Physical Review Research, 2020, 2, .	3.6	13
169	High-temperature centrifugation: a tool for finding eutectic compositions in multicomponent alloys. Applied Physics Letters, 2002, 81, 4159-4161.	3.3	12
170	Interface Reactions of Al and Binary Al-Alloys on Mild Steel Substrates in Controlled Atmosphere. Materials Science Forum, 2006, 519-521, 1157-1162.	0.3	12
171	High-purity amorphous Zr52.5Cu17.9Ni14.6Al10Ti5 powders via mechanical amorphization of crystalline pre-alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2006, 418, 236-240.	5.6	12
172	Effect of microalloying on the glass-forming ability of Cu60Zr30Ti10 bulk metallic glass. Journal of Non-Crystalline Solids, 2007, 353, 4218-4222.	3.1	12
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