Chun-xiang Cui

List of Publications by Year
in descending order

Source: https://exaly.com/author-pdf/4606216/publications.pdf

Version: 2024-02-01

114 papers	2,100 citations	361296 20 h-index	276775 41 g-index
114 all docs	114 docs citations	114 times ranked	1867 citing authors

#	Article	IF	Citations
1	Titanium alloy production technology, market prospects and industry development. Materials & Design, 2011, 32, 1684-1691.	5.1	591
2	Growth characteristics and corrosion resistance of micro-arc oxidation coating on pure magnesium for biomedical applications. Corrosion Science, 2010, 52, 2228-2234.	3.0	194
3	Mechanical properties and in vitro biodegradation of newly developed porous Zn scaffolds for biomedical applications. Materials and Design, 2016, 108, 136-144.	3.3	82
4	Interfacial electronic modulation of Ni3S2 nanosheet arrays decorated with Au nanoparticles boosts overall water splitting. Applied Catalysis B: Environmental, 2022, 304, 120935.	10.8	80
5	Fabrication and biocompatibility of nano-TiO2/titanium alloys biomaterials. Materials Letters, 2005, 59, 3144-3148.	1.3	60
6	Microstructure evolution and enhanced mechanical properties of eutectic Alâ€“Si die cast alloy by combined alloying Mg and La. Materials and Design, 2016, 90, 820-828.	3.3	55
7	Fabrication and properties of porous Zn-Ag alloy scaffolds as biodegradable materials. Materials Chemistry and Physics, 2018, 219, 433-443.	2.0	47
8	The microstructure and formation mechanism of coreâ€“shell-like TiAl3/Ti2Al20Ce in melt-spun Alâ€“Tiâ€“Bâ€“Re grain refiner. Materials Letters, 2012, 85, 153-156.	1.3	41
9	Preparation of in situ Al3Nb-NbB2-NbC/Al inoculant and its effect on microstructures and properties of weldable Al-Cu-Mn alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2018, 738, 273-282.	2.6	30
10	Mechanical properties and biodegradation of porous Zn-1Al alloy scaffolds. Materials Letters, 2019, 247, 75-78.	1.3	30
11	Carbon fibers coated with graphene reinforced TiAl alloy composite with high strength and toughness. Scientific Reports, 2018, 8, 2364.	1.6	27
12	Tiâ€“Zrâ€“Feâ€“Si system amorphous alloys with excellent biocompatibility. Journal of Non-Crystalline Solids, 2008, 354, 3935-3938.	1.5	26
13	Fabrication, microstructure and refining mechanism of in situ CeB6/Al inoculant in aluminum. Materials & Design, 2015, 65, 432-437.	5.1	26
14	Significantly improved particle strengthening of Alâ€“Sc alloy by high Sc composition design and rapid solidification. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2021, 800, 140304.	2.6	26
15	Corrosion resistance and calciumâ€“phosphorus precipitation of micro-arc oxidized magnesium for biomedical applications. Applied Surface Science, 2015, 330, 431-438.	3.1	25
16	Enhanced grain refinement of in situ CeB6/Al composite inoculant on pure aluminum by microstructure control. Journal of Alloys and Compounds, 2017, 701, 926-934.	2.8	24
17	Enhanced corrosion resistance of 5083 aluminum alloy by refining with nano-CeB6/Al inoculant. Applied Surface Science, 2019, 484, 403-408.	3.1	24
18	Fabrication and magnetic properties of Sm2Co17 and Sm2Co17/Fe7Co3 magnetic nanowires via AAO templates. Journal of Crystal Growth, 2014, 399, 1-6.	0.7	22

#	Article	IF	Citations
19	Fabrication and properties of novel porous CuAlMn shape memory alloys and polymer/CuAlMn composites. Composites Part A: Applied Science and Manufacturing, 2018, 107, 21-30.	3.8	22
20	Fabrication of in situ AlN-TiN/Al inoculant and its refining efficiency and reinforcing effect on pure aluminum. Journal of Alloys and Compounds, 2013, 547, 5-10.	2.8	21
21	Microstructure of Al-5Ti-1B-1RE nanoribbon and its refining efficiency on as-cast A356 alloys. Journal of Rare Earths, 2013, 31, 313-318.	2.5	21
22	Effect of Mo, Zr, and Y on the high-temperature properties of Alâ€“Cuâ€“Mn alloy. Journal of Materials Research, 2019, 34, 3853-3861.	1.2	21
23	Effect of combined addition of Cu51Zr14 inoculant and Ti element on the microstructure and damping behavior of a Cu-Al-Ni shape memory alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 743, 606-610.	2.6	21
24	Particleâ€“matrix interface microstructure of in situ TiCpâ€“AlNp/Al composite. Composites Science and Technology, 2012, 72, 1423-1429.	3.8	19
25	Structure and properties of GCr15 modified by multiphase ceramic nanoparticles /Fe-C composite inoculants. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2018, 738, 63-74.	2.6	19
26	Effects of multi-stage aging on the microstructure, domain structure and magnetic properties of Fe-24Cr-12Co-1.5Si ribbon magnets. Journal of Alloys and Compounds, 2017, 694, 103-110.	2.8	18
27	Microstructures and mechanical properties of in-situ CaB6 ceramic particles reinforced Al-Cu-Mn composite. Ceramics International, 2019, 45, 21668-21675.	2.3	17
28	Preparation of in-situ NdB6 nanoparticles and their reinforcement effect on Alâ€“Cuâ€“Mn alloy. Journal of Alloys and Compounds, 2019, 806, 393-400.	2.8	16
29	Microstructural, Mechanical, and Damping Properties of a Cu-Based Shape Memory Alloy Refined by an In Situ LaB6/Al Inoculant. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2019, 50, 2310-2321.	1.1	16
30	Nanoparticles of the superconductor MgB2: structural characterization and in situ study of synthesis kinetics. Acta Materialia, 2004, 52, 5757-5760.	3.8	15
31	Fabrication and magnetic properties of Fe3Co7 alloy nanowire arrays. Journal of Materials Science, 2010, 45, 1523-1527.	1.7	15
32	Microstructure and mechanical properties of TC4 alloy modified and reinforced by TiB+TiN/Ti inoculants ribbons. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2016, 663, 8-16.	2.6	15
33	Interfacial microstructure and nucleating mechanism of melt-spun CeB 6 /Al composite inoculant. Applied Surface Science, 2018, 431, 202-206.	3.1	15
34	Fabrication and properties of biodegradable ZnO nano-rods/porous Zn scaffolds. Materials Characterization, 2018, 144, 227-238.	1.9	15
35	Electrochemical fabrication and magnetic properties of Fe7Co3 alloy nanowire array. Journal of Materials Science, 2011, 46, 2379-2383.	1.7	14
36	The microstructures and mechanical properties of hybrid in-situ AlN-TiC-TiN-Al3Ti/Al reinforced Al-Cu-Mn-Ti alloy matrix composites. Journal of Alloys and Compounds, 2022, 903, 163902.	2.8	14

#	Article	IF	Citations
37	Microstructure and mechanical properties of in-situ dual morphology Ti8C5/TiB2 reinforced TiAl composite. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 840, 142918.	2.6	14
38	Fabrication and internal friction behaviors of novel porous CuAlMn shape memory alloy filled with polystyrene. Materials Letters, 2013, 92, 82-85.	1.3	13
39	Effect of Cooling Rate on Microstructure and Grain Refining Behavior of In Situ CeB6/Al Composite Inoculant in Aluminum. Metals, 2017, 7, 204.	1.0	13
40	Simultaneously improving strength and ductility of hybrid Alâ€“Si matrix composite with polyphasic and multi-scale ceramic particles. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2021, 804, 140517.	2.6	13
41	Rapid Degradation of Azo Dyes by Melt-Spun Mg-Zn-Ca Metallic Glass in Artificial Seawater. Metals, 2017, 7, 485.	1.0	12
42	Preparation of nanocrystalline porous titania films on titanium substrates by a solâ€“gel method with polyethylene glycol as a template. Journal of Sol-Gel Science and Technology, 2007, 43, 151-159.	1.1	11
43	Electrochemical fabrication, microstructure and magnetic properties of Sm2Co17/Fe7Co3 dual phase nanocomposite. Materials Chemistry and Physics, 2015, 160, 315-320.	2.0	11
44	Microstructure and Mechanical Properties of Ti6Al4V Alloy Modified and Reinforced by In Situ Ti5Si3/Ti Composite Ribbon Inoculants. Metals, 2017, 7, 267.	1.0	11
45	Microstructure and mechanical properties of hybrid in-situ Ti2AlCw/ Mo2B5p reinforced TiAl alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 829, 142182.	2.6	11
46	Preparation of in-situ AlN-TiC nanoparticles and their refinement and reinforcement effects on Al-Zn-Mn-Cu alloy. Journal of Alloys and Compounds, 2021, 881, 160504.	2.8	10
47	Fabrication and Mechanical Behavior of Ex Situ Mg-Based Bulk Metallic Glass Matrix Composite Reinforced with Electroless Cu-Coated SiC Particles. Materials, 2017, 10, 1371.	1.3	9
48	Fabrication and damping behaviors of novel polyurethane/TiNiCu composites. Physica B: Condensed Matter, 2020, 582, 411911.	1.3	9
49	Tiâ€“46Alâ€“4Nb alloy refined and reinforced by in-situ TiC nanoparticles and TiB2 whiskers. Journal of Alloys and Compounds, 2022, 892, 162195.	2.8	9
50	Effects of macroscopic graphite particulates on the damping behavior of CuAlMn shape memory alloy. Journal of Materials Science, 2007, 42, 5029-5035.	1.7	8
51	Effects of cobalt addition on microstructure and magnetic properties of PrNdFeB/Fe 7 Co 3 nanocomposite. Journal of Rare Earths, 2017, 35, 468-473.	2.5	8
52	A new Sm(Co,Fe,Cu) 4 B/Sm 2 (Co,Fe,Cu) 7 cell structure with the coercivity of up to 5.01â€¯T. Journal of Magnetism and Magnetic Materials, 2018, 458, 66-74.	1.0	8
53	Preparation and Microstructure of In Situ CaB₆â€“Al₄Ca/Al Composite Inoculant Ribbon and Its Refining and Modifying Effect on Alâ€“10Siâ€“0.3Mg Alloy. Advanced Engineering Materials, 2018, 20, 1800687.	1.6	8
54	Effects of magnetic field and annealing on the structure and magnetic properties of Alnico ribbons. Journal of Alloys and Compounds, 2019, 785, 715-724.	2.8	8

#	Article	IF	Citations
55	Preparation of in situ NbCâ€“TiC@Graphene/Fe composite inoculant and its effect on microstructures and properties of GCr15. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 772, 138737.	2.6	8
56	Enhanced Photocatalytic and Antibacterial Activities of K2Ti6O13 Nanowires Induced by Copper Doping. Crystals, 2020, 10, 400.	1.0	8
57	Microstructure evolution and mechanical properties of Tiâ€“46Alâ€“4Nb alloy modified by in-situ Si3N4-graphene core-shell nanoparticles. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 785, 139349.	2.6	8
58	Refining and modification effects of (Al, Zr, Si)â€“Al4Sr on Alâ€“7Siâ€“0.5ÂMg alloy. Journal of Materials Research and Technology, 2021, 15, 1604-1612.	2.6	8
59	Fabrication and magnetic properties of Sm-Co/Fe-Co and Sm-Co/Fe-Co-Dy magnetic nanowires. Superlattices and Microstructures, 2017, 107, 246-253.	1.4	7
60	Effects of Parent Phase Aging and Nb Element on the Microstructure, Martensitic Transformation, and Damping Behaviors of a Cuâ€“Alâ€“Mn Shape Memory Alloy. Physica Status Solidi (A) Applications and Materials Science, 2020, 217, 1900923.	0.8	7
61	A new Smâ€“Co-type hard magnetic alloy with an amorphous based nanocrystalline microstructure. Intermetallics, 2013, 35, 82-89.	1.8	6
62	The effect of amorphous nanocrystalline inoculants on structures and properties of high speed steel. Materials Research Express, 2017, 4, 066507.	0.8	6
63	Microstructures and magnetic properties of Tb-Fe-Co magnetic nanowire arrays prepared by electrochemical deposition. Superlattices and Microstructures, 2019, 128, 298-306.	1.4	6
64	Study on the Tbâ€“Dyâ€“Feâ€“Co magnetic nanowires prepared by AAO template. Materials Letters, 2019, 237, 314-318.	1.3	6
65	The properties and microstructure of Nd-Fe-B nanowires fabricated by electrochemical deposition using porous Alumina templates. Materials Chemistry and Physics, 2020, 242, 122470.	2.0	6
66	Effect of Cooling Rate on the Microstructure Evolution and Mechanical Properties of Iron-Rich Alâ€“Si Alloy. Materials, 2022, 15, 411.	1.3	6
67	Preparation of nanocrystal modificator and its modification mechanism. Transactions of Nonferrous Metals Society of China, 2007, 17, 823-827.	1.7	5
68	Fabrication and damping behavior of a novel Mg/TiNiCu composite. Materials Letters, 2018, 217, 206-210.	1.3	5
69	Fabrication, microstructure and mechanical properties of Al2O3 whiskers reinforced Ti-46Al-4Nb alloy. Materials Letters, 2020, 259, 126902.	1.3	5
70	Microstructure evolution and the mechanical properties of in-situ Ti2AlCw-NbC@TiBx/TiAlNb composite with high performance. Composites Part B: Engineering, 2022, 234, 109689.	5.9	5
71	Study on the microstructure and magnetic properties of Smâ€“Feâ€“Ti alloys and their nitrides. Physica B: Condensed Matter, 2004, 351, 151-157.	1.3	4
72	Structural and magnetic properties of Sm2Fe17â^'xNbx (x = 0â^'4) alloys prepared by HDDR processes and their nitrides. Rare Metals, 2006, 25, 129-137.	3.6	4

#	Article	IF	Citations
73	Fabrication and biocompatibility in vitro of potassium titanate biological thin film/titanium alloy biological composite. Frontiers of Materials Science in China, 2007, 1, 252-257.	0.5	4
74	Fabrication of the Ti5Si3/Ti composite inoculants and its refining mechanism on pure titanium. Metals and Materials International, 2017, 23, 397-404.	1.8	4
75	Electrochemical synthesis and magnetic properties of Nd-Fe-B-Tb nanowires. Materials Science and Engineering B: Solid-State Materials for Advanced Technology, 2020, 261, 114668.	1.7	4
76	Microstructures and magnetic properties of PrFeB/Fe7Co3 nanocomposite magnets. Materials Letters, 2020, 265, 127441.	1.3	4
77	Ti3Al matrix alloy refined and reinforced by in-situ synthesized SiCw/Nb4C3 core-shell structure. Journal of Alloys and Compounds, 2021, 860, 158423.	2.8	4
78	Refining effect of an intermetallic inoculant on a Cuâ€“Alâ€“Mn shape memory alloy. Materials Chemistry and Physics, 2022, 280, 125835.	2.0	4
79	Electrodepositing fabrication and microstructures of the Fe nanowires with a preferred orientation. Superlattices and Microstructures, 2011, 50, 628-633.	1.4	3
80	In vitro hemolytic propertiesâ€™ assessment of K₂Ti₆O₁₃ nanowires. Proceedings of the Institution of Mechanical Engineers, Part N: Journal of Nanoengineering and Nanosystems, 2015, 229, 201-205.	0.1	3
81	Effect of Preparation Parameter on Microstructure and Grain Refining Behavior of In Situ AlN-TiN-TiB2/Al Composite Inoculants on Pure Aluminum. Metals, 2017, 7, 56.	1.0	3
82	Enhanced grain refinement of in-situ AlN-TiN/Al composite inoculant on aluminum assisted by ultrasonic treatment. Materials Letters, 2019, 255, 126592.	1.3	3
83	Interface microstructure and magnetic properties of Î±-Sm2Co17/Î²-Sm2Co17 dual phase nanowire magnetic composite. Intermetallics, 2019, 111, 106494.	1.8	3
84	The effect of the in-situ hybrid Ti5Si3p/Ti2AlNw on the microstructure and mechanical properties of TiAl. Materials Letters, 2021, 304, 130678.	1.3	3
85	Fabrication and Properties of Zn-3Mg-1Ti Alloy as a Potential Biodegradable Implant Material. Materials, 2022, 15, 940.	1.3	3
86	Strain Amplitude Dependence of Internal Friction in a Cuâ€“Alâ€“Mn Shape Memory Alloy. Physica Status Solidi (A) Applications and Materials Science, 2022, 219, .	0.8	3
87	Interaction Mechanism of <I>in-situ</I> Nano-TiN-AlN Particles and Solid/Liquid Interface during Solidification. Journal of Nanoscience and Nanotechnology, 2003, 3, 410-412.	0.9	2
88	Structural and nitrogenation of Sm2Fe16Ti1 alloy prepared by HDDR process. Materials Chemistry and Physics, 2006, 97, 116-120.	2.0	2
89	Fabrication of Ti-based amorphous composite and biocompatibility research. Journal Wuhan University of Technology, Materials Science Edition, 2010, 25, 8-11.	0.4	2
90	Effects of the Nanostructured Fe-V-Nb Modificators on the Microstructure and Mechanical Properties of Si-Mn Steel. Journal of Nanomaterials, 2012, 2012, 1-6.	1.5	2

#	Article	IF	Citations
91	Studies on the structure and magnetic properties of Sm8Co73.2Fe8.8B10 ribbons. Physica B: Condensed Matter, 2018, 550, 60-67.	1.3	2
92	Effect of Al-5Ti-B4C-Y refiner on the microstructure and properties of Al-Cu-Mn alloy. Materials Research Express, 2019, 6, 016542.	0.8	2
93	Interfacial Characterization and Highâ€Temperature Property of NbB 2 +NbC Nanoparticlesâ€Reinforced 2219Al Matrix Composite Synthesized by Melt Spinning. Advanced Engineering Materials, 2020, 22, 2000248.	1.6	2
94	The effect of Tb doping on the magnetic properties and microstructure of a TbNdFeCoB/Fe₇Co₃ nanocomposite permanent magnet. Materials Research Express, 2020, 7, 016112.	0.8	2
95	Electrochemical synthesis, structure characterization and magnetic properties of Tb Fe7Co3 (x=0, 0.6,) Tj ETQq1 1 0.784314 rgBT /Ov	2.5	2
96	Preparation of in situ Cr@Graphene/Fe nanocomposite inoculant and its refining effect on microstructure and properties of W₁₈Cr₄V high-speed steel. Materials Science and Technology, 2021, 37, 224-236.	0.8	2
97	Fabrication and magnetic properties of Tb-doped multiphase Pr-Tb-Fe-B magnetic nanowire arrays. Materials Chemistry and Physics, 2021, 262, 124299.	2.0	2
98	Integrated design modeling of miniature syringe for drug delivery. , 2008, , .		1
99	Histological and Mechanical Evaluation of the in vivo Bone-bonding Ability on the K2TinO2n+1/Î²-Ti Alloy as a Novel Bioactive Material. Materials Research Society Symposia Proceedings, 2009, 1187, 152.	0.1	1
100	Fabrication and characterization of in situ AlNâ€“TiN/Al composite ribbons. Rare Metals, 2015, 34, 645-649.	3.6	1
101	Microstructure and Propertiesâ€™ Evaluation of W18Cr4V Modified by Feâ€“Zrâ€“Nbâ€“Nâ€“B Nanoâ€Powder Inoculants. Steel Research International, 2017, 88, 1600318.	1.0	1
102	Thermodynamic calculation and thermal stability of Al-Y-Ce-Ni metallic glass. Materials Research Express, 2018, 5, 025205.	0.8	1
103	Grapheneâ€Assisted Preparation of In Situ TiCâ€“TiB 2 /Al Composite Inoculant for Alâ€“Si Alloy. Advanced Engineering Materials, 2019, 21, 1900378.	1.6	1
104	Fabrication and magnetic properties of Tbâ€“Feâ€“B nanotubes prepared by electrochemical deposition. Journal of Materials Science: Materials in Electronics, 2020, 31, 3976-3985.	1.1	1
105	Enhanced Grain Refinement of W18Cr4V Highâ€Speed Steel Using in Situ TiNâ^'Nbâ^'Cr@Graphene/Fe Nanocomposite Inoculant. Steel Research International, 2021, 92, 2100094.	1.0	1
106	The microstructure and magnetic behaviors of Pr Fe B/Fe7Co3 dual phase nanowires: As a perpendicular magnetic recording candidate. Materials Characterization, 2021, 180, 111410.	1.9	1
107	Refining and reinforcing effects of TiC-Al₂O₃/Al ribbons inoculant on Alâ€“Siâ€“Mgâ€“Ti alloy. Materials Research Express, 2022, 9, 036516.	0.8	1
108	Fabrication and magnetic properties of Sm3(Fe, Ti)29N x /Î±-Fe dual-phase nanocomposite permanent magnetic material. Science in China Series D: Earth Sciences, 2007, 50, 184-189.	0.9	0

#	Article	IF	Citations
109	Preparation of submicrocrystal Al-Ti-B master alloy and its influence on microstructure and properties of AZ91D. China Foundry, 2017, 14, 513-518.	0.5	0
110	Use of B4C powder for preparing in situ Alâ€“Tiâ€“Bâ€“C inoculant in Alâ€“Ti melt and its refining effect on A356 alloy. Materials Research Express, 2018, 5, 016509.	0.8	0
111	Microstructures and Properties of T1 Highâ€Speed Steel Modified by In Situ Feâ€“Crâ€“Tiâ€“Câ€“N Nanocomposite Inoculants. Steel Research International, 2021, 92, 2000367.	1.0	0
112	Mechanism of magnetic field annealing on increasing both coercivity and magnetization of Sm(Co0.9Cu0.1)5 ribbons. Materials Today Communications, 2021, 26, 102052.	0.9	0
113	Preparation of in situ TiC@TiN coreâ€“shell and Ti2Nâ€“Al4C3 nanoparticles and their effects on Alâ€“Znâ€“Mgâ€“Cu alloy. Journal of Materials Science, 2021, 56, 17011-17027.	1.7	0
114	Effects of Cooling Rate on Particle Size, Morphology, and Refining Effect of In-Situ NdB6-Al11Nd3/Al Inoculants. Journal of Materials Engineering and Performance, 0, , 1.	1.2	0