David C Dunand

List of Publications by Year
in descending order

366 papers	19,539 citations	12303 69 h-index	17055 122 g-index
372 all docs	372 docs citations	372 times ranked	10599 citing authors

#	Article	IF	Citations
1	Finite element modeling of creep deformation in dendritic alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 831, 142171.	2.6	3
2	Microstructure and creep properties of cast near-eutectic Alâ€“Ceâ€“Ni alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 833, 142551.	2.6	22
3	Cavitation-resistant intergranular precipitates enhance creep performance of Î¸â€²-strengthened Al-Cu based alloys. Acta Materialia, 2022, 228, 117788.	3.8	38
4	Comparing evolution of precipitates and strength upon aging of cast and laser-remelted Alâ€“8Ce-0.2Sc-0.1Zr (wt.%). Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 840, 142990.	2.6	14
5	Operando X-ray diffraction study of thermal and phase evolution during laser powder bed fusion of Al-Sc-Zr elemental powder blends. Additive Manufacturing, 2022, 55, 102806.	1.7	3
6	Criteria for developing castable, creep-resistant aluminum-based alloys â€“ A review. International Journal of Materials Research, 2022, 97, 246-265.	0.1	105
7	Creep properties and microstructure evolution at 260â€“300ÂÂ°C of AlSi10Mg manufactured via laser powder-bed fusion. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 843, 143075.	2.6	14
8	Solidification microstructure, aging evolution and creep resistance of laser powder-bed fused Al-7Ce-8Mg (wt%). Additive Manufacturing, 2022, 55, 102862.	1.7	9
9	Evolution of lamellar architecture and microstructure during redox cycling of Fe-Co and Fe-Cu foams. Journal of Alloys and Compounds, 2022, 918, 165606.	2.8	5
10	Effect of oxide dispersoids on precipitation-strengthened Al-1.7Zr (wt %) alloys produced by laser powder-bed fusion. Additive Manufacturing, 2022, 56, 102933.	1.7	2
11	Effect of Y2O3 dispersoids on microstructure and creep properties of Hastelloy X processed by laser powder-bed fusion. Additive Manufacturing Letters, 2022, 3, 100069.	0.9	5
12	Microstructure and thermomechanical properties of Al11Ce3. Intermetallics, 2022, 148, 107636.	1.8	9
13	Microstructure and mechanical properties of 3D ink-extruded CoCrCuFeNi microlattices. Acta Materialia, 2022, 238, 118187.	3.8	4
14	Effects of Ni and Cr additions on Î³ + Î³â€™ microstructure and mechanical properties of W-free Coâ€“Alâ€“Vâ€“Nbâ€“Ta-based superalloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2022, 849, 143401.	2.6	5
15	Microstructural evolution of lamellar Fe-25Ni foams during steam-hydrogen redox cycling. Acta Materialia, 2022, 237, 118148.	3.8	5
16	Sustainability through alloy design: Challenges and opportunities. Progress in Materials Science, 2021, 117, 100722.	16.0	58
17	Creep behavior and post-creep thermoelectric performance of the n-type Skutterudite alloy Yb0.3Co4Sb12. Journal of Materiomics, 2021, 7, 89-97.	2.8	9
18	Individual and synergistic effects of Mn and Mo micro-additions on precipitation and strengthening of a dilute Alâ€“Zr-Sc-Er-Si alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2021, 800, 140288.	2.6	14

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19	Effects of W micro-additions on precipitation kinetics and mechanical properties of an Alâ€“Mnâ€“Moâ€“Siâ€“Zrâ€“Scâ€“Er alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2021, 803, 140550.	2.6	5
20	Microstructure and Mechanical Properties of a Precipitation-Hardened Alâ€“Mnâ€“Zrâ€“Er Alloy. Minerals, Metals and Materials Series, 2021, , 239-244.	0.3	0
21	Microstructure and defects in a Ni-Cr-Al-Ti Î³/Î³â€™ model superalloy processed by laser powder bed fusion. Materials and Design, 2021, 201, 109531.	3.3	32
22	Increasing Î³â€™ volume fraction in Coâ€“Nbâ€“V- and Coâ€“Taâ€“V-based superalloys. Journal of Materials Research and Technology, 2021, 11, 2305-2313.	2.6	10
23	Microstructure and compressive properties of 3D-extrusion-printed, aluminized cobalt-based superalloy microlattices. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2021, 815, 141262.	2.6	3
24	Bulk Nanostructured Metal from Multiply-Twinned Nanowires. Nano Letters, 2021, 21, 5627-5632.	4.5	0
25	Kirkendall pore evolution during interdiffusion and homogenization of titanium-coated nickel microwires. Intermetallics, 2021, 134, 107199.	1.8	3
26	Thermal stability and influence of Y2O3 dispersoids on the heat treatment response of an additively manufactured ODS Niâ€“Crâ€“Alâ€“Ti Î³/Î³â€² superalloy. Journal of Materials Research and Technology, 2021, 15, 2883-2898.	2.6	9
27	Bi2Te3 filaments via extrusion and pressureless sintering of Bi2Te3-based inks. MRS Communications, 2021, 11, 818-824.	0.8	1
28	Solute-induced strengthening during creep of an aged-hardened Al-Mn-Zr alloy. Acta Materialia, 2021, 219, 117268.	3.8	15
29	Evolution of Y2O3 dispersoids during laser powder bed fusion of oxide dispersion strengthened Ni-Cr-Al-Ti Î³/Î³â€™ superalloy. Additive Manufacturing, 2021, 47, 102224.	1.7	7
30	Mechanical properties of meteoritic Feâ€“Ni alloys for in-situ extraterrestrial structures. Acta Astronautica, 2021, 189, 465-475.	1.7	3
31	Evolution of directionally freeze-cast Fe2O3 and Fe2O3+NiO green bodies during reduction and sintering to create lamellar Fe and Fe-20Ni foams. Journal of Alloys and Compounds, 2021, 889, 161707.	2.8	2
32	Microstructure and properties of additively-manufactured WC-Co microlattices and WC-Cu composites. Acta Materialia, 2021, 221, 117420.	3.8	13
33	Microstructure evolution during reduction and sintering of 3D-extrusion-printed Bi2O3+TeO2 inks to form Bi2Te3. Acta Materialia, 2021, 221, 117422.	3.8	6
34	Complex-shaped, finely-featured ZrC/W composites via shape-preserving reactive melt infiltration of porous WC structures fabricated by 3D ink extrusion. Additive Manufacturing Letters, 2021, 1, 100018.	0.9	5
35	A fully coupled diffusional-mechanical finite element modeling for tin oxide-coated copper anode system in lithium-ion batteries. Computational Materials Science, 2020, 172, 109343.	1.4	10
36	Tungsten solubility in L12-ordered Al3Er and Al3Zr nanoprecipitates formed by aging in an aluminum matrix. Journal of Alloys and Compounds, 2020, 820, 153383.	2.8	16

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37	In operando tomography reveals degradation mechanisms in lamellar iron foams during redox cycling at 800ÂÂ°C. Journal of Power Sources, 2020, 448, 227463.	4.0	21
38	3D-printed tungsten sheet-gyroids via reduction and sintering of extruded WO3-nanopowder inks. Additive Manufacturing, 2020, 36, 101613.	1.7	4
39	SnO2-Ag composites with high thermal cycling stability created by Ag infiltration of 3D ink-extruded SnO2 microlattices. Applied Materials Today, 2020, 21, 100794.	2.3	4
40	Synthesis of precipitation-strengthened Al-Sc, Al-Zr and Al-Sc-Zr alloys via selective laser melting of elemental powder blends. Additive Manufacturing, 2020, 36, 101461.	1.7	15
41	Effects of pore morphology on the cyclical oxidation/reduction of iron foams created via camphene-based freeze casting. Journal of Alloys and Compounds, 2020, 845, 156278.	2.8	17
42	Introduction - Porous Metals: From Nano to Macro. Journal of Materials Research, 2020, 35, 2529-2534.	1.2	4
43	Effects of W and Si microadditions on microstructure and the strength of dilute precipitation-strengthened Alâ€“Zrâ€“Er alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 798, 140159.	2.6	17
44	Low-density, W-free Coâ€“Nbâ€“Vâ€“Al-based superalloys with Î³/Î³â€™ microstructure. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 796, 139977.	2.6	13
45	High-temperature mechanical properties of Î³/Î³â€² Coâ€“Niâ€“Wâ€“Al superalloy microlattices. Scripta Materialia, 2020, 188, 146-150.	2.6	13
46	Microstructural stability and mechanical behavior of a Coâ€“20Niâ€“7Alâ€“7Wâ€“4Ti at.% superalloy. Journal of Alloys and Compounds, 2020, 848, 156378.	2.8	4
47	Feâ€“Ni foams self-heal during redox cycling via reversible formation/homogenization of a ductile Ni scaffold. Journal of Materials Chemistry A, 2020, 8, 19375-19386.	5.2	13
48	Kinetics of alloy formation and densification in Fe-Ni-Mo microfilaments extruded from oxide- or metal-powder inks. Acta Materialia, 2020, 193, 51-60.	3.8	11
49	Integrated porous cobalt oxide/cobalt anode with micro- and nano-pores for lithium ion battery. Applied Surface Science, 2020, 525, 146592.	3.1	19
50	Hierarchical Structural Changes During Redox Cycling of Fe-Based Lamellar Foams Containing YSZ, CeO₂, or ZrO₂. ACS Applied Materials & Interfaces, 2020, 12, 27190-27201.	4.0	10
51	Finite Element Model for Coupled Diffusion and Elastoplastic Deformation during High-Temperature Oxidation of Fe to FeO. Journal of the Electrochemical Society, 2020, 167, 080532.	1.3	6
52	3D ink-extrusion printing and sintering of Ti, Ti-TiB and Ti-TiC microlattices. Additive Manufacturing, 2020, 35, 101412.	1.7	12
53	Ultrafine-grained Al-Mg-Zr alloy processed by shear-assisted extrusion with high thermal stability. Scripta Materialia, 2020, 186, 326-330.	2.6	21
54	Effect of Cr additions on a Î³-Î³â€™ microstructure and creep behavior of a Co-based superalloy with low W content. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 778, 139108.	2.6	21

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55	Effect of aging on coarsening- and creep resistance of a Ti-modified Feâ€“Niâ€“Alâ€“Crâ€“Mo ferritic steel with L21/B2 composite precipitates. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 776, 138987.	2.6	8
56	Aging- and creep-resistance of a cast hypoeutectic Al-6.9Ce-9.3Mg (wt.%) alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2020, 786, 139398.	2.6	34
57	Effects of Cr on the properties of multicomponent cobalt-based superalloys with ultra high <mml:math xmlns:mml="http://www.w3.org/1998/Math/MathML" altimg="si1.svg"><mml:mrow><mml:mi>Î³</mml:mi><mml:mo>â€™</mml:mo></mml:mrow></mml:math> volume fraction. Journal of Alloys and Compounds, 2020, 832, 154790.	2.8	35
58	Mn and Mo additions to a dilute Al-Zr-Sc-Er-Si-based alloy to improve creep resistance through solid-solution- and precipitation-strengthening. Acta Materialia, 2020, 194, 60-67.	3.8	34
59	Influence of Î³â€²-raft orientation on creep resistance of monocrystalline Co-based superalloys. Materialia, 2020, 12, 100678.	1.3	9
60	Porous Titanium Cylinders Obtained by the Freeze-Casting Technique: Influence of Process Parameters on Porosity and Mechanical Behavior. Metals, 2020, 10, 188.	1.0	22
61	Creep behavior and postcreep thermoelectric performance of the n-type half-Heusler alloy Hf0.3Zr0.7NiSn0.98Sb0.02. Materials Today Physics, 2019, 9, 100134.	2.9	20
62	Effects of Zn and Cr additions on precipitation and creep behavior of a dilute Alâ€“Zrâ€“Erâ€“Si alloy. Acta Materialia, 2019, 181, 249-261.	3.8	35
63	Cast near-eutectic Al-12.5â€¯wt.% Ce alloy with high coarsening and creep resistance. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 767, 138440.	2.6	61
64	Ice-Templated W-Cu Composites with High Anisotropy. Scientific Reports, 2019, 9, 476.	1.6	18
65	Microstructural evolution and high-temperature strength of a Î³(f.c.c.)/Î³â€™(L12) Coâ€“Alâ€“Wâ€“Tiâ€“B superalloy. Acta Materialia, 2019, 174, 427-438.	3.8	40
66	Ambient- and elevated-temperature strengthening by Al3Zr-Nanoprecipitates and Al3Ni-Microfibers in a cast Al-2.9Ni-0.11Zr-0.02Si-0.005Er (at.%) alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 759, 78-89.	2.6	39
67	Effect of Al, Ti and Cr additions on the Î³-Î³â€™ microstructure of W-free Co-Ta-V-Based superalloys. Acta Materialia, 2019, 172, 44-54.	3.8	49
68	Improving coarsening resistance of dilute Al-Sc-Zr-Si alloys with Sr or Zn additions. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 754, 447-456.	2.6	13
69	The effect of solidification direction with respect to gravity on ice-templated TiO2 microstructures. Journal of the European Ceramic Society, 2019, 39, 3180-3193.	2.8	11
70	3D ink-extrusion additive manufacturing of CoCrFeNi high-entropy alloy micro-lattices. Nature Communications, 2019, 10, 904.	5.8	104
71	Microstructure and Mechanical Properties of an Al-Zr-Er High Temperature Alloy Microalloyed with Tungsten. Minerals, Metals and Materials Series, 2019, , 379-383.	0.3	1
72	Effects of Zr Additions on Structure and Microhardness Evolution of Eutectic Al-6Ni Alloy. Minerals, Metals and Materials Series, 2019, , 373-377.	0.3	0

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73	Ni-Al2O3 nacre-like composites through hot-pressing of freeze-cast foams. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 743, 190-196.	2.6	23
74	Effects of Si and Fe micro-additions on the aging response of a dilute Al-0.08Zr-0.08Hf-0.045Erâ€¯at.% alloy. Materials Characterization, 2019, 147, 72-83.	1.9	26
75	Microstructure and porosity evolution during sintering of Ni-Mn-Ga wires printed from inks containing elemental powders. Intermetallics, 2019, 104, 113-123.	1.8	26
76	Effect of diffusion distance on evolution of Kirkendall pores in titanium-coated nickel wires. Intermetallics, 2019, 104, 124-132.	1.8	10
77	Effects of Mo and Mn microadditions on strengthening and over-aging resistance of nanoprecipitation-strengthened Al-Zr-Sc-Er-Si alloys. Acta Materialia, 2019, 165, 1-14.	3.8	58
78	Î³â€™-(L12) precipitate evolution during isothermal aging of a Co Al W Ni superalloy. Acta Materialia, 2019, 164, 654-662.	3.8	30
79	Effect of U and Th trace additions on the precipitation strengthening of Alâ€“0.09Sc (at.%) alloy. Journal of Materials Science, 2019, 54, 3485-3495.	1.7	7
80	Effect of micro-additions of Ge, In or Sn on precipitation in dilute Al-Sc-Zr alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2019, 739, 427-436.	2.6	23
81	Structure and growth of coreâ€“shell nanoprecipitates in Alâ€“Erâ€“Scâ€“Zrâ€“Vâ€“Si high-temperature alloys. Journal of Materials Science, 2019, 54, 1857-1871.	1.7	12
82	Structural evolution of directionally freeze-cast iron foams during oxidation/reduction cycles. Acta Materialia, 2019, 162, 90-102.	3.8	33
83	Compressive creep behavior of hot-pressed Mg1.96Al0.04Si0.97Bi0.03. Scripta Materialia, 2018, 148, 10-14.	2.6	10
84	Processing and Characterization of Liquid-Phase Sintered NiTi Woven Structures. Shape Memory and Superelasticity, 2018, 4, 70-76.	1.1	3
85	Scandium-Enriched Nanoprecipitates in Aluminum Providing Enhanced Coarsening and Creep Resistance. Minerals, Metals and Materials Series, 2018, , 1589-1594.	0.3	3
86	Multicomponent Î³â€™-strengthened Co-based superalloys with increased solvus temperatures and reduced mass densities. Acta Materialia, 2018, 147, 284-295.	3.8	100
87	Equal Channel Angular Pressing of a Newly Developed Precipitation Hardenable Scandium Containing Aluminum Alloy. Minerals, Metals and Materials Series, 2018, , 423-429.	0.3	0
88	Mechanical Behavior of Three-Dimensional Braided Nickel-Based Superalloys Synthesized via Pack Cementation. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2018, 49, 817-821.	1.1	0
89	Development of High-Strength and High-Electrical-Conductivity Aluminum Alloys for Power Transmission Conductors. Minerals, Metals and Materials Series, 2018, , 247-251.	0.3	6
90	Dislocation-based modeling of long-term creep behaviors of Grade 91 steels. Acta Materialia, 2018, 149, 19-28.	3.8	42

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91	Freeze casting â€“ A review of processing, microstructure and properties via the open data repository, FreezeCasting.net. Progress in Materials Science, 2018, 94, 243-305.	16.0	269
92	Effects of Nb and Ta additions on the strength and coarsening resistance of precipitation-strengthened Al-Zr-Sc-Er-Si alloys. Materials Characterization, 2018, 141, 260-266.	1.9	25
93	Effect of hafnium micro-addition on precipitate microstructure and creep properties of a Fe-Ni-Al-Cr-Ti ferritic superalloy. Acta Materialia, 2018, 153, 126-135.	3.8	21
94	Microstructure and mechanical properties of Al-Mg-Zr alloys processed by selective laser melting. Acta Materialia, 2018, 153, 35-44.	3.8	315
95	Effect of laser rescanning on the grain microstructure of a selective laser melted Al-Mg-Zr alloy. Materials Characterization, 2018, 143, 34-42.	1.9	156
96	Î³+Î³â€² microstructures in the Co-Ta-V and Co-Nb-V ternary systems. Acta Materialia, 2018, 151, 137-148.	3.8	56
97	Ni-Mn-Ga micro-trusses via sintering of 3D-printed inks containing elemental powders. Acta Materialia, 2018, 143, 20-29.	3.8	66
98	Surface-oxidized, freeze-cast cobalt foams: Microstructure, mechanical properties and electrochemical performance. Acta Materialia, 2018, 142, 213-225.	3.8	23
99	Microstructure and mechanical properties of a precipitation-strengthened Al-Zr-Sc-Er-Si alloy with a very small Sc content. Acta Materialia, 2018, 144, 80-91.	3.8	115
100	Sintering of micro-trusses created by extrusion-3D-printing of lunar regolith inks. Acta Astronautica, 2018, 143, 1-8.	1.7	64
101	Atom probe tomography study of Fe-Ni-Al-Cr-Ti ferritic steels with hierarchically-structured precipitates. Acta Materialia, 2018, 144, 707-715.	3.8	26
102	Effect of Yb microadditions on creep resistance of a dilute Al-Er-Sc-Zr alloy. Materialia, 2018, 4, 65-69.	1.3	24
103	NiTi-Nb micro-trusses fabricated via extrusion-based 3D-printing of powders and transient-liquid-phase sintering. Acta Biomaterialia, 2018, 76, 359-370.	4.1	36
104	Increasing the creep resistance of Fe-Ni-Al-Cr superalloys via Ti additions by optimizing the B2/L21 ratio in composite nano-precipitates. Acta Materialia, 2018, 157, 142-154.	3.8	51
105	Effect of Si micro-addition on creep resistance of a dilute Al-Sc-Zr-Er alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2018, 734, 27-33.	2.6	23
106	Microstructure and Processing of 3D Printed Tungsten Microlattices and Infiltrated Wâ€“Cu Composites. Advanced Engineering Materials, 2018, 20, 1800354.	1.6	33
107	Dislocation dynamics simulations of precipitation-strengthened Ni- and Co-based superalloys. Materialia, 2018, 1, 211-220.	1.3	9
108	Experimental and modeling study of compressive creep in 3D-woven Ni-based superalloys. Acta Materialia, 2018, 155, 236-244.	3.8	3

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109	Iron foams created by directional freeze casting of iron oxide, reduction and sintering. Materials Letters, 2017, 191, 112-115.	1.3	29
110	Effect of titanium additions upon microstructure and properties of precipitation-strengthened Fe-Ni-Al-Cr ferritic alloys. Acta Materialia, 2017, 128, 103-112.	3.8	46
111	Evolution of dealloying induced strain in nanoporous gold crystals. Nanoscale, 2017, 9, 5686-5693.	2.8	25
112	Rafting and elastoplastic deformation of superalloys studied by neutronÂdiffraction. Scripta Materialia, 2017, 134, 110-114.	2.6	28
113	Iron Oxide Photoelectrode with Multidimensional Architecture for Highly Efficient Photoelectrochemical Water Splitting. Angewandte Chemie, 2017, 129, 6683-6688.	1.6	51
114	Modeling of Stresses and Strains during (De)Lithiation of Ni₃Sn₂-Coated Nickel Inverse-Opal Anodes. ACS Applied Materials & Interfaces, 2017, 9, 15433-15438.	4.0	15
115	Iron Oxide Photoelectrode with Multidimensional Architecture for Highly Efficient Photoelectrochemical Water Splitting. Angewandte Chemie - International Edition, 2017, 56, 6583-6588.	7.2	66
116	Lattice strain evolution and load partitioning during creep of a Ni-based superalloy single crystal with rafted Î³â€² microstructure. Acta Materialia, 2017, 135, 77-87.	3.8	45
117	Lattice parameter misfit evolution during creep of a cobalt-based superalloy single crystal with cuboidal and rafted gamma-prime microstructures. Acta Materialia, 2017, 136, 118-125.	3.8	44
118	Deposition-based synthesis of nickel-based superalloy microlattices. Scripta Materialia, 2017, 138, 28-31.	2.6	12
119	Directional solidification of aqueous TiO2 suspensions under reduced gravity. Acta Materialia, 2017, 124, 608-619.	3.8	22
120	In operando X-ray diffraction strain measurement in Ni3Sn2 â€“ Coated inverse opal nanoscaffold anodes for Li-ion batteries. Journal of Power Sources, 2017, 367, 80-89.	4.0	5
121	Dislocation dynamics modeling of precipitation strengthening in Feâ€“Niâ€“Alâ€“Cr ferritic superalloys. Journal of Materials Research, 2017, 32, 4241-4253.	1.2	9
122	Effect of machined feature size relative to the microstructural size on the superelastic performance in polycrystalline NiTi shape memory alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 706, 227-235.	2.6	18
123	Multidimensional Anodized Titanium Foam Photoelectrode for Efficient Utilization of Photons in Mesoscopic Solar Cells. Small, 2017, 13, 1701458.	5.2	12
124	Effects of titanium substitutions for aluminum and tungsten in Co-10Ni-9Al-9W (at%) superalloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 705, 122-132.	2.6	60
125	Ice-templated silicon foams with aligned lamellar channels. MRS Communications, 2017, 7, 928-932.	0.8	3
126	Effect of tungsten concentration on microstructures of Co-10Ni-6Al-(0,2,4,6)W-6Ti (at%) cobalt-based superalloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 700, 481-486.	2.6	33

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127	Effects of Sb micro-alloying on precipitate evolution and mechanical properties of a dilute Al-Sc-Zr alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 680, 64-74.	2.6	27
128	Microstructural and creep properties of boron- and zirconium-containing cobalt-based superalloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 682, 260-269.	2.6	52
129	Microstructure and compressive behavior of ice-templated copper foams with directional, lamellar pores. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 679, 435-445.	2.6	36
130	Effect of vanadium micro-alloying on the microstructural evolution and creep behavior of Al-Er-Sc-Zr-Si alloys. Acta Materialia, 2017, 124, 501-512.	3.8	61
131	Iron and Nickel Cellular Structures by Sintering of 3Dâ€Printed Oxide or Metallic Particle Inks. Advanced Engineering Materials, 2017, 19, 1600365.	1.6	68
132	Precipitate Evolution and Creep Behavior of a W-Free Co-based Superalloy. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 6090-6096.	1.1	26
133	Development of a Precipitation-Strengthened Matrix for Non-quenchable Aluminum Metal Matrix Composites. Jom, 2016, 68, 1915-1924.	0.9	8
134	Influence of ruthenium on microstructural evolution in a model Co Al W superalloy. Acta Materialia, 2016, 117, 135-145.	3.8	54
135	Mechanical properties and optimization of the aging of a dilute Al-Sc-Er-Zr-Si alloy with a high Zr/Sc ratio. Acta Materialia, 2016, 119, 35-42.	3.8	71
136	Role of silicon in the precipitation kinetics of dilute Al-Sc-Er-Zr alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2016, 677, 485-495.	2.6	63
137	3D macroporous electrode and high-performance in lithium-ion batteries using SnO2 coated on Cu foam. Scientific Reports, 2016, 6, 18626.	1.6	48
138	Porous shape-memory NiTi-Nb with microchannel arrays. Acta Materialia, 2016, 115, 83-93.	3.8	20
139	Synthesis, structure and mechanical properties of ice-templated tungsten foams. Journal of Materials Research, 2016, 31, 753-764.	1.2	33
140	Finite element analysis of mechanical stability of coarsened nanoporous gold. Scripta Materialia, 2016, 115, 96-99.	2.6	12
141	Morphological Study of Directionally Freeze-Cast Nickel Foams. Metallurgical and Materials Transactions E, 2016, 3, 46-54.	0.5	9
142	Numerical and experimental investigation of (de)lithiation-induced strains in bicontinuous silicon-coated nickel inverse opal anodes. Acta Materialia, 2016, 107, 289-297.	3.8	19
143	Ferritic Alloys with Extreme Creep Resistance via Coherent Hierarchical Precipitates. Scientific Reports, 2015, 5, 16327.	1.6	80
144	Metallic Architectures from 3Dâ€Printed Powderâ€Based Liquid Inks. Advanced Functional Materials, 2015, 25, 6985-6995.	7.8	164

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145	In Operando Strain Measurement of Bicontinuous Siliconâ€Coated Nickel Inverse Opal Anodes for Liâ€Ion Batteries. Advanced Energy Materials, 2015, 5, 1500466.	10.2	30
146	Metallic Printing: Metallic Architectures from 3D-Printed Powder-Based Liquid Inks (Adv. Funct.) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 70	7.8	3
147	Effect of directional solidification on texture and magnetic-field-induced strain in Niâ€“Mnâ€“Ga foams with coarse grains. Acta Materialia, 2015, 86, 95-101.	3.8	40
148	Microstructure and mechanical properties of as-cast quasibinary NiTiâ€“Nb eutectic alloy. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2015, 627, 360-368.	2.6	26
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