Noé Cheung

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/7717496/publications.pdf

Version: 2024-02-01

164 papers 2,920 citations

30 h-index 243296 44 g-index

167 all docs

167
docs citations

167 times ranked 1260 citing authors

#	Article	IF	CITATIONS
1	Solidification thermal parameters affecting the columnar-to-equiaxed transition. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2002, 33, 2107-2118.	1.1	112
2	Microstructural and hardness investigation of an aluminum–copper alloy processed by laser surface melting. Materials Characterization, 2003, 50, 249-253.	1.9	89
3	Cellular growth during transient directional solidification of hypoeutectic Al–Fe alloys. Journal of Alloys and Compounds, 2009, 470, 589-599.	2.8	86
4	The effects of cell spacing and distribution of intermetallic fibers on the mechanical properties of hypoeutectic Al–Fe alloys. Materials Chemistry and Physics, 2010, 119, 272-278.	2.0	84
5	Interfacial heat transfer coefficients and solidification of an aluminum alloy in a rotary continuous caster. International Journal of Heat and Mass Transfer, 2009, 52, 451-459.	2.5	74
6	The correlation between dendritic microstructure and mechanical properties of directionally solidified hypoeutectic Al-Ni alloys. Metals and Materials International, 2010, 16, 39-49.	1.8	70
7	Relationship between spacing of eutectic colonies and tensile properties of transient directionally solidified Al-Ni eutectic alloy. Journal of Alloys and Compounds, 2018, 733, 59-68.	2.8	66
8	The columnar to equiaxed transition during solidification of Sn–Pb alloys. Journal of Alloys and Compounds, 2003, 351, 126-134.	2.8	61
9	Secondary dendrite arm spacing and solute redistribution effects on the corrosion resistance of Al–10wt% Sn and Al–20wt% Zn alloys. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2006, 420, 179-186.	2.6	61
10	Cellular/dendritic arrays and intermetallic phases affecting corrosion and mechanical resistances of an Al–Mg–Si alloy. Journal of Alloys and Compounds, 2016, 673, 220-230.	2.8	61
11	The use of a heuristic search technique for the optimization of quality of steel billets produced by continuous casting. Engineering Applications of Artificial Intelligence, 2001, 14, 229-238.	4.3	59
12	Microstructure, tensile properties and wear resistance correlations on directionally solidified Al-Sn-(Cu; Si) alloys. Journal of Alloys and Compounds, 2017, 695, 3621-3631.	2.8	58
13	The effects of a eutectic modifier on microstructure and surface corrosion behavior of Al-Si hypoeutectic alloys. Journal of Solid State Electrochemistry, 2007, 11, 1421-1427.	1.2	56
14	Tensile properties and related microstructural aspects of hypereutectic Al-Si alloys directionally solidified under different melt superheats and transient heat flow conditions. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 685, 235-243.	2.6	54
15	Microstructural Development in Al-Ni Alloys Directionally Solidified under Unsteady-State Conditions. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2008, 39, 1712-1726.	1.1	53
16	Cooling thermal parameters, microstructure, segregation and hardness in directionally solidified Al–Sn-(Si;Cu) alloys. Materials & Design, 2015, 72, 31-42.	5.1	50
17	Design of mechanical properties of Al-alloys chill castings based on the metal/mold interfacial heat transfer coefficient. International Journal of Thermal Sciences, 2012, 51, 145-154.	2.6	48
18	High cooling rate cells, dendrites, microstructural spacings and microhardness in a directionally solidified Al–Mg–Si alloy. Journal of Alloys and Compounds, 2015, 636, 145-149.	2.8	48

#	Article	IF	CITATIONS
19	Thermal Parameters, Microstructure, and Mechanical Properties of Directionally Solidified Sn-0.7Âwt.%Cu Solder Alloys Containing OÂppm to 1000Âppm Ni. Journal of Electronic Materials, 2013, 42, 179-191.	1.0	44
20	Characterization of Dendritic Microstructure, Intermetallic Phases, and Hardness of Directionally Solidified Al-Mg and Al-Mg-Si Alloys. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2015, 46, 3342-3355.	1,1	44
21	Investigation of intermetallics in hypoeutectic Al–Fe alloys by dissolution of the Al matrix. Intermetallics, 2009, 17, 753-761.	1.8	43
22	The effects of Zn segregation and microstructure length scale on the corrosion behavior of a directionally solidified Mg-25Âwt.%Zn alloy. Journal of Alloys and Compounds, 2017, 723, 649-660.	2.8	43
23	Cellular to dendritic transition during transient solidification of a eutectic Sn–0.7wt%Cu solder alloy. Materials Chemistry and Physics, 2012, 132, 203-209.	2.0	40
24	Microstructural modification by laser surface remelting and its effect on the corrosion resistance of an Al–9wt%Si casting alloy. Applied Surface Science, 2008, 254, 2763-2770.	3.1	38
25	Melt characteristics and solidification growth direction with respect to gravity affecting the interfacial heat transfer coefficient of chill castings. Materials & Design, 2009, 30, 3592-3601.	5.1	37
26	On array models theoretical predictions versus measurements for the growth of cells and dendrites in the transient solidification of binary alloys. Philosophical Magazine, 2011, 91, 1705-1723.	0.7	37
27	Sn–0.7 wt%Cu–(xNi) alloys: Microstructure–mechanical properties correlations with solder/substrate interfacial heat transfer coefficient. Journal of Alloys and Compounds, 2015, 632, 274-285.	2.8	37
28	Interconnection of thermal parameters, microstructure and mechanical properties in directionally solidified Sn–Sb lead-free solder alloys. Materials Characterization, 2015, 106, 52-61.	1.9	36
29	Evaluation of solder/substrate thermal conductance and wetting angle of Sn–0.7 wt%Cu–(0–0.1) Tj ETQq1	1.9.78431 1.9	14 rgBT /O\
30	Experimental analysis of the columnar-to-equiaxed transition in directionally solidified Al–Ni and Al–Sn alloys. Materials Letters, 2007, 61, 2135-2138.	1.3	33
31	Laser remelting of Al–1.5 wt%Fe alloy surfaces: Numerical and experimental analyses. Optics and Lasers in Engineering, 2011, 49, 490-497.	2.0	33
32	Application of a heuristic search technique for the improvement of spray zones cooling conditions in continuously cast steel billets. Applied Mathematical Modelling, 2006, 30, 104-115.	2.2	32
33	Application of a Solidification Mathematical Model and a Genetic Algorithm in the Optimization of Strand Thermal Profile Along the Continuous Casting of Steel. Materials and Manufacturing Processes, 2005, 20, 421-434.	2.7	31
34	Monotectic Al–Bi–Sn alloys directionally solidified: Effects of Bi content, growth rate and cooling rate on the microstructural evolution and hardness. Journal of Alloys and Compounds, 2015, 653, 243-254.	2.8	31
35	Microstructure and Tensile/Corrosion Properties Relationships of Directionally Solidified Al–Cu–Ni Alloys. Metals and Materials International, 2018, 24, 1058-1076.	1.8	30
36	Electrochemical Corrosion Behavior of as-cast Zn-rich Zn-Mg Alloys in a 0.06M NaCl Solution. International Journal of Electrochemical Science, 2017, 12, 5264-5283.	0.5	29

#	Article	IF	CITATIONS
37	Investigation of nonmetallic inclusions in continuously cast carbon steel by dissolution of the ferritic matrix. Materials Characterization, 2002, 48, 255-261.	1.9	28
38	Influence of refining time on nonmetallic inclusions in a low-carbon, silicon-killed steel. Materials Characterization, 2003, 51, 301-308.	1.9	27
39	Experimental impurity segregation and numerical analysis based on variable solute distribution coefficients during multi-pass zone refining of aluminum. Journal of Crystal Growth, 2008, 310, 1274-1280.	0.7	27
40	The effect of the growth rate on microsegregation: Experimental investigation in hypoeutectic Al–Fe and Al–Cu alloys directionally solidified. Journal of Alloys and Compounds, 2013, 561, 193-200.	2.8	27
41	Interconnection of Zn content, macrosegregation, dendritic growth, nature of intermetallics and hardness in directionally solidified Mg–Zn alloys. Journal of Alloys and Compounds, 2016, 662, 1-10.	2.8	26
42	A comparative analysis of microstructural features, tensile properties and wettability of hypoperitectic and peritectic Sn-Sb solder alloys. Microelectronics Reliability, 2018, 81, 150-158.	0.9	26
43	Microstructural development in Al–Sn alloys directionally solidified under transient heat flow conditions. Materials Chemistry and Physics, 2008, 109, 87-98.	2.0	25
44	Near-eutectic Zn-Mg alloys: Interrelations of solidification thermal parameters, microstructure length scale and tensile/corrosion properties. Current Applied Physics, 2019, 19, 582-598.	1.1	24
45	Al–Fe hypoeutectic alloys directionally solidified under steady-state and unsteady-state conditions. Journal of Alloys and Compounds, 2010, 504, 205-210.	2.8	23
46	Cooling thermal parameters, microstructural spacing and mechanical properties in a directionally solidified hypereutectic Al–Si alloy. Philosophical Magazine Letters, 2016, 96, 228-237.	0.5	23
47	Transient directional solidification of a eutectic Al–Si–Ni alloy: Macrostructure, microstructure, dendritic growth and hardness. Materialia, 2019, 7, 100358.	1.3	23
48	Horizontally Solidified Al–3Âwt%Cu–(0.5Âwt%Mg) Alloys: Tailoring Thermal Parameters, Microstructure, Microhardness, and Corrosion Behavior. Acta Metallurgica Sinica (English Letters), 2019, 32, 695-709.	1.5	22
49	The use of a directional solidification technique to investigate the interrelationship of thermal parameters, microstructure and microhardness of Bi–Ag solder alloys. Materials Characterization, 2014, 96, 115-125.	1.9	20
50	An alternative thermal approach to evaluate the wettability of solder alloys. Applied Thermal Engineering, 2016, 107, 431-440.	3.0	19
51	Thermal analysis during solidification of an Al–Cu eutectic alloy: interrelation of thermal parameters, microstructure and hardness. Journal of Thermal Analysis and Calorimetry, 2019, 137, 983-996.	2.0	19
52	Thermal Parameters and Microstructural Development in Directionally Solidified Zn-Rich Zn-Mg Alloys. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 3052-3064.	1.1	18
53	Directional solidification of a Sn-0.2Ni solder alloy in water-cooled copper and steel molds: Related effects on the matrix micromorphology, nature of intermetallics and tensile properties. Journal of Alloys and Compounds, 2017, 723, 1039-1052.	2.8	18
54	Numerical and experimental analysis of an approach based on variable solute distribution coefficients during purification by zone refining. Separation and Purification Technology, 2007, 52, 504-511.	3.9	17

#	Article	IF	CITATIONS
55	Effects of solidification thermal parameters and Bi doping on silicon size, morphology and mechanical properties of Al-15wt.% Si-3.2wt.% Bi and Al-18wt.% Si-3.2wt.% Bi alloys. Journal of Materials Research and Technology, 2020, 9, 3460-3470.	2.6	17
56	Factors affecting solidification thermal variables along the cross-section of horizontal cylindrical ingots. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2005, 397, 239-248.	2.6	15
57	The correlation between thermal variables and secondary dendrite arm spacing during solidification of horizontal cylinders of Sn–Pb alloys. Journal of Alloys and Compounds, 2005, 399, 110-117.	2.8	15
58	Inverse segregation during transient directional solidification of an Al–Sn alloy: Numerical and experimental analysis. Materials Chemistry and Physics, 2009, 115, 116-121.	2.0	15
59	Application of a Genetic Algorithm to Optimize Purification in the Zone Refining Process. Materials and Manufacturing Processes, 2011, 26, 493-500.	2.7	15
60	Solder/substrate interfacial thermal conductance and wetting angles of Bi–Ag solder alloys. Journal of Materials Science: Materials in Electronics, 2016, 27, 1994-2003.	1.1	15
61	Directionally solidified dilute Zn-Mg alloys: Correlation between microstructure and corrosion properties. Journal of Alloys and Compounds, 2017, 723, 536-547.	2.8	15
62	An Effective Inverse Heat Transfer Procedure Based on Evolutionary Algorithms to Determine Cooling Conditions of a Steel Continuous Casting Machine. Materials and Manufacturing Processes, 2015, 30, 414-424.	2.7	14
63	Slow and rapid cooling of Al–Cu–Si ultrafine eutectic composites: Interplay of cooling rate and microstructure in mechanical properties. Journal of Materials Research, 2019, 34, 1381-1394.	1.2	14
64	Effects of Melt Superheating on the Microstructure and Tensile Properties of a Ternary Al-15 Wt Pct Si-1.5 Wt Pct Mg Alloy. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2019, 50, 1308-1322.	1.1	14
65	Microstructure characterization of a directionally solidified Mg-12wt.%Zn alloy: Equiaxed dendrites, eutectic mixture and type/ morphology of intermetallics. Materials Chemistry and Physics, 2018, 204, 105-131.	2.0	13
66	Tailoring microstructure, tensile properties and fracture process via transient directional solidification of Zn-Sn alloys. Materials Science & Digineering A: Structural Materials: Properties, Microstructure and Processing, 2018, 712, 127-132.	2.6	13
67	Investigation of the chemical composition of nonmetallic inclusions utilizing ternary phase diagrams. Materials Characterization, 2002, 49, 437-443.	1.9	12
68	Mathematical modeling and experimental analysis of the hardened zone in laser treatment of a 1045 AISI steel. Materials Research, 2004, 7, 349-354.	0.6	12
69	Numerical and experimental modelling of two-dimensional unsteady heat transfer during inward solidification of square billets. Applied Thermal Engineering, 2016, 96, 454-462.	3.0	12
70	An artificial immune system algorithm applied to the solution of an inverse problem in unsteady inward solidification. Advances in Engineering Software, 2018, 121, 178-187.	1.8	12
71	Correlation between microstructure and corrosion behaviour of Bi-Zn solder alloys. Corrosion Engineering Science and Technology, 2019, 54, 362-368.	0.7	12
72	Corrosion behavior of an Al–Sn–Zn alloy: Effects of solidification microstructure characteristics. Journal of Materials Research and Technology, 2021, 12, 257-263.	2.6	12

#	Article	IF	CITATIONS
73	Microstructure features and mechanical/electrochemical behavior of directionally solidified Alâ^'6wt.%Cuâ^'5wt.%Ni alloy. Transactions of Nonferrous Metals Society of China, 2021, 31, 1529-1549.	1.7	12
74	Interrelationship of thermal parameters, microstructure and microhardness of directionally solidified Bi–Zn solder alloys. Microelectronics Reliability, 2017, 78, 100-110.	0.9	11
75	An Alternative to the Recycling of Fe-Contaminated Al. Journal of Sustainable Metallurgy, 2018, 4, 412-426.	1.1	11
76	Measurement and interrelation of length scale of dendritic microstructures, tensile properties, and machinability of Al-9 wt% Si-(1 wt% Bi) alloys. International Journal of Advanced Manufacturing Technology, 2019, 105, 1391-1410.	1.5	11
77	Cellular-to-Dendritic and Dendritic-to-Cellular Morphological Transitions in a Ternary Al-Mg-Si Alloy. IOP Conference Series: Materials Science and Engineering, 2019, 529, 012018.	0.3	11
78	The application of an analytical model to solve an inverse heat conduction problem: Transient solidification of a Sn-Sb peritectic solder alloy on distinct substrates. Journal of Manufacturing Processes, 2019, 48, 164-173.	2.8	11
79	Plate-like growth in a eutectic Bi–Ni alloy: effects of morphological microstructure evolution and Bi3Ni intermetallic phase on tensile properties. Journal of Materials Research and Technology, 2020, 9, 4940-4950.	2.6	11
80	Length scale of solidification microstructure tailoring corrosion resistance and microhardness in T6 heat treatment of an Al–Cu–Mg alloy. Corrosion Engineering Science and Technology, 2020, 55, 471-479.	0.7	11
81	Improvement of water resistance in magnesia cements with renewable source silica. Construction and Building Materials, 2021, 272, 121650.	3.2	11
82	Inward and outward solidification of cylindrical castings: The role of the metal/mold heat transfer coefficient. Materials Chemistry and Physics, 2012, 136, 545-554.	2.0	10
83	Inward solidification of cylinders: Reversal in the growth rate and microstructure evolution. Applied Thermal Engineering, 2013, 61, 577-582.	3.0	10
84	Evaluation of thermophysical properties of Alâ \in Snâ \in Si alloys based on computational thermodynamics and validation by numerical and experimental simulation of solidification. Journal of Chemical Thermodynamics, 2016, 98, 9-20.	1.0	10
85	Microstructure Growth Morphologies, Macrosegregation, and Microhardness in Bi–Sb Thermal Interface Alloys. Advanced Engineering Materials, 2020, 22, 1901592.	1.6	10
86	Steady and unsteady state peritectic solidification. Materials Science and Technology, 2015, 31, 105-114.	0.8	9
87	Effects of cobalt and solidification cooling rate on intermetallic phases and tensile properties of a -Cu, -Zn, -Fe containing Al-Si alloy. International Journal of Advanced Manufacturing Technology, 2020, 107, 717-730.	1.5	9
88	Tailoring microstructure and microhardness of Znâ^'1wt.%Mgâ^'(0.5wt.%Mn, 0.5wt.%Ca) alloys by solidification cooling rate. Transactions of Nonferrous Metals Society of China, 2021, 31, 1031-1048.	1.7	9
89	Multiple linear regression approach to predict tensile properties of Sn-Ag-Cu (SAC) alloys. Materials Letters, 2021, 304, 130587.	1.3	9
90	The variation of the metal/mold heat transfer coefficient along the cross section of cylindrical shaped castings. Inverse Problems in Science and Engineering, 2006, 14, 467-481.	1.2	8

#	Article	IF	Citations
91	Length scale of the dendritic microstructure affecting tensile properties of Al–(Ag)–(Cu) alloys. International Journal of Modern Physics B, 2016, 30, 1550261.	1.0	8
92	Effects of Macrosegregation and Microstructure on the Corrosion Resistance and Hardness of a Directionally Solidified Zn-5.0wt.%Mg Alloy. Materials Research, 2019, 22, .	0.6	8
93	The Roles of Mn and Ni Additions to Fe-Contaminated Al in Neutralizing Fe and Stabilizing the Cellular α-Al Microstructure. Journal of Sustainable Metallurgy, 2019, 5, 561-580.	1.1	8
94	Correlation between unsteady-state solidification thermal parameters and microstructural growth of Zn–8Âmass%ÂAl and Zn–8Âmass%ÂAl–XBi tribological alloys. Journal of Thermal Analysis and Calorimetry, 2020, 139, 1741-1761.	2.0	8
95	Transition from high cooling rate cells to dendrites in directionally solidified Al-Sn-(Pb) alloys. Materials Today Communications, 2020, 25, 101490.	0.9	8
96	Microstructure, phase morphology, eutectic coupled zone and hardness of Al Co alloys. Materials Characterization, 2020, 169, 110617.	1.9	8
97	Effect of cooling rate on microstructure and microhardness of hypereutectic Al–Ni alloy. Archives of Civil and Mechanical Engineering, 2021, 21, 1.	1.9	8
98	Application of an Artificial Intelligence Technique to Improve Purification in the Zone Refining Process. Journal of Electronic Materials, 2010, 39, 49-55.	1.0	7
99	Interplay of Wettability, Interfacial Reaction and Interfacial Thermal Conductance in Sn-0.7Cu Solder Alloy/Substrate Couples. Journal of Electronic Materials, 2020, 49, 173-187.	1.0	7
100	Morphology of Intermetallics Tailoring Tensile Properties and Quality Index of a Eutectic Al–Si–Ni Alloy. Advanced Engineering Materials, 2020, 22, 2000503.	1.6	7
101	Mechanical Properties, Microstructural Features, and Correlations with Solidification Rates of Al–Cu–Si Ultrafine Eutectic Alloys. Advanced Engineering Materials, 2021, 23, 2001177.	1.6	7
102	Effects of cooling rate and microstructure scale on wear resistance of unidirectionally solidified Al-3.2wt.%Bi-(1; 3) wt.%Pb alloys. Materials Today Communications, 2020, 25, 101659.	0.9	7
103	Assessing Microstructure Tensile Properties Relationships in Al-7Si-Mg Alloys via Multiple Regression. Metals, 2022, 12, 1040.	1.0	7
104	Numerical and experimental analysis of laser surface remelting of Al–15Cu alloy samples. Surface Engineering, 2005, 21, 473-479.	1.1	6
105	The effect of solidification thermal variables on surface quality of Al–Cu ingots. Journal of Alloys and Compounds, 2007, 428, 130-138.	2.8	6
106	Zone Refining of Tin: Optimization of Zone Length by a Genetic Algorithm. Materials and Manufacturing Processes, 2013, 28, 746-752.	2.7	6
107	Transient Unidirectional Solidification, Microstructure and Intermetallics in Sn-Ni Alloys. Materials Research, 2018, 21, .	0.6	6
108	Effect of Microstructure Features on the Corrosion Behavior of the Sn-2.1Âwt%Mg Solder Alloy. Electronic Materials Letters, 2020, 16, 276-292.	1.0	6

7

#	Article	IF	Citations
109	Electrochemical corrosion behaviour of Sn–Sb solder alloys: the roles of alloy Sb content and type of intermetallic compound. Corrosion Engineering Science and Technology, 2021, 56, 11-21.	0.7	6
110	Solidification microstructure-dependent hydrogen generation behavior of Al–Sn and Al–Fe alloys in alkaline medium. International Journal of Hydrogen Energy, 2021, 46, 12654-12671.	3.8	6
111	Thermal conductance at Sn-0.5mass%Al solder alloy/substrate interface as a factor for tailoring cellular/dendritic growth. Journal of Thermal Analysis and Calorimetry, 2022, 147, 4945-4958.	2.0	6
112	The Effects of Solidification Cooling and Growth Rates on Microstructure and Hardness of Supersaturated Al-7%Si-x%Zn Alloys. Journal of Materials Engineering and Performance, 2022, 31, 1956-1970.	1.2	6
113	Influência na microestrutura e na microdureza decorrente da adição de 4%Ag na liga Al-4%Cu solidificada unidirecionalmente. Revista Materia, 2015, 20, 992-1007.	0.1	5
114	Tailoring Morphology and Size of Microstructure and Tensile Properties of Sn-5.5Awt.%Sb-1Awt.%(Cu,Ag) Solder Alloys. Journal of Electronic Materials, 2018, 47, 1647-1657.	1.0	5
115	Metal/mold thermal conductance affecting ultrafine scale microstructures in aluminum eutectic alloys. Case Studies in Thermal Engineering, 2021, 26, 101144.	2.8	5
116	Fatigue Failure Analysis of a Speed Reduction Shaft. Metals, 2021, 11, 856.	1.0	4
117	Two-Phase Dendrite and Bimodal Structure in an Al-Cu-Ni Alloy: Their Roles in Hardness. Journal of Materials Engineering and Performance, 2022, 31, 3704-3715.	1.2	4
118	Hypereutectic Zn–Al Alloys: Microstructural Development under Unsteady-State Solidification Conditions, Eutectic Coupled Zone and Hardness. Metals, 2022, 12, 1076.	1.0	4
119	Numerical and experimental analysis of rapidly solidified laser remelted Al 5wt pct Ni surfaces. International Journal of Microstructure and Materials Properties, 2010, 5, 193.	0.1	3
120	SEM Characterization of Al ₃ Ni Intermetallics and its Influence on Mechanical Properties of Directionally Solidified Hypoeutectic Al-Ni Alloys. Materials Science Forum, 0, 636-637, 465-470.	0.3	3
121	Sn-0.5Cu(-x)Al Solder Alloys: Microstructure-Related Aspects and Tensile Properties Responses. Metals, 2019, 9, 241.	1.0	3
122	Purification of naphthalene by zone refining: Mathematical modelling and optimization by swarm intelligence-based techniques. Separation and Purification Technology, 2020, 234, 116089.	3.9	3
123	Interface evaluation of a Bi–Zn eutectic solder alloy: Effects of different substrate materials on thermal contact conductance. International Journal of Thermal Sciences, 2021, 160, 106685.	2.6	3
124	Modifications on solidification thermal parameters, microstructure and hardness induced by Cu additions to a hypereutectic Zn 8Al alloy. Materials Characterization, 2021, 174, 110936.	1.9	3
125	Dendritic Spacing and Macrosegregation Affecting Microhardness of an Al-Si-Mg Alloy Solidified Under Unsteady State Conditions. Materials Research, 2019, 22, .	0.6	3
126	Analysis of extensive wetting angle vs. cooling rate data in Bi-, Zn- and Sn-based solder alloys. Microelectronics Reliability, 2022, 135, 114593.	0.9	3

#	Article	IF	CITATIONS
127	Microstructural and segregation effects affecting the corrosion behavior of a highâ€temperature Biâ€Ag solder alloy in dilute chloride solution. Journal of Applied Electrochemistry, 2021, 51, 769-780.	1.5	2
128	Local solidification thermal parameters affecting the eutectic extent in Sn-Cu and Sn-Bi solder alloys. Soldering and Surface Mount Technology, 2021, ahead-of-print, .	0.9	2
129	PARÃ,METROS TÉRMICOS, MACROESTRUTURA E MICROESTRUTURA NA SOLIDIFICAÇÃO DIRECIONAL DA LIC Al-20%Sn. Tecnologia Em Metalurgia E Materiais, 2008, 4, 21-26.	GA 0.1	2
130	Experimental investigation of factors affecting surface quality of Al–Cu alloys ingots. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2006, 431, 201-205.	2.6	1
131	Numerical and Experimental Analysis of Laser Surface Remelting of Al 9wt% Si Alloy Samples. Materials Science Forum, 2008, 587-588, 721-725.	0.3	1
132	Corrosion Resistances of As-Cast and Quenched Samples of a Zn-22Al Eutectoid Alloy. Materials Science Forum, 0, 587-588, 355-359.	0.3	1
133	Numerical Simulation and Experimental Analysis of Laser Surface Remelting of AISI 304 Stainless Steel Samples. Materials Science Forum, 0, 636-637, 1119-1124.	0.3	1
134	Cellular Microstructure and Mechanical Properties of a Directionally Solidified Al-1.0wt%Fe Alloy. Materials Science Forum, 0, 636-637, 564-570.	0.3	1
135	Heat Transfer Characteristics of Inward, Outward and Upward Solidification of an Al-1.5wt%Fe Alloy in Cylindrical Chill Molds. Materials Science Forum, 0, 730-732, 805-810.	0.3	1
136	Effect of Mold Surface Roughness on the Interfacial Heat Transfer Coefficient During Solidification of Solder Alloys. Materials Science Forum, 2012, 730-732, 751-756.	0.3	1
137	Microstructure and Mechanical Properties of Directionally Solidified Unmodified and Ni-Modified Sn-0.7wt%Cu Lead-Free Solder Alloy. Defect and Diffusion Forum, 0, 333, 107-115.	0.4	1
138	Dendritic and eutectic growth of Sn–0.5 wt.%Cu solders with low alloying Al levels. Proceedings of the Institution of Mechanical Engineers, Part L: Journal of Materials: Design and Applications, 2019, 233, 1733-1737.	0.7	1
139	Sn-Mg lead-free solder alloy: Effect of solidification thermal parameters on microstructural features and microhardness. Materials Research Express, 2019, 6, 126562.	0.8	1
140	Interfacial heat transfer and microstructural analyses of a Bi- 5% Sb lead-free alloy solidified against Cu, Ni and low-C steel substrates. Journal of Alloys and Compounds, 2021, 860, 158553.	2.8	1
141	Effect of Bi content on microstructure and corrosion behaviour of Zn–8Al–(Bi) alloys. Corrosion Engineering Science and Technology, 2021, 56, 461-472.	0.7	1
142	CORRELAÇÃO ENTRE MICROESTRUTURA, RESISTÊNCIAS MECÃ,NICA E À CORROSÃO DA LIGA DE SOLDAGE LIVRE DE CHUMBO Sn-0,7%Cu*. Tecnologia Em Metalurgia, Materiais E Mineracao, 2014, 11, 277-286.	^{EM} 0.1	1
143	Nature inspired algorithms for the solution of inverse heat transfer problems applied to distinct unsteady heat flux orientations in cylindrical castings. Journal of Intelligent Manufacturing, 0 , 1 .	4.4	1
144	Development and Experimental Validation of a Numerical Thermal Model for the Evaluation of the Depth of Laser Treated Zone in the Laser Transformation Hardening Process. Materials Science Forum, 2003, 423-425, 707-712.	0.3	O

#	Article	IF	Citations
145	Numerical Simulation and Experimental Analysis of Laser Surface Remelting of AISI 420 Stainless Steel Samples. Advanced Materials Research, 0, 59, 265-268.	0.3	0
146	Assessment of Cooling Conditions of a Continuous Casting Machine for Steel Billets Based on Surface Temperature Measurements. Materials Science Forum, 2012, 730-732, 841-846.	0.3	0
147	Unsteady-State Directional Solidification of a Hypoperitectic Pb-9.5wt%Bi Alloy. Materials Science Forum, 2012, 730-732, 889-894.	0.3	0
148	Experimental and numerical analyses of laser remelted Sn–0.7Âwt%Cu solder surfaces. Journal of Materials Science: Materials in Electronics, 2015, 26, 3100-3107.	1.1	0
149	Upward and downward unsteady-state directional solidification of a hypoeutectic Al-3wt.%Mg alloy. Ciência & Tecnologia Dos Materiais, 2017, 29, e65-e70.	0.5	0
150	Galvanic corrosion analysis of a Bi–Zn solder alloy coupled to Ni and Cu substrates. Corrosion Engineering Science and Technology, 2020, 55, 729-738.	0.7	0
151	Microstructural Refinement and Improvement of Microhardness of a Hypoeutectic Al–Fe Alloy Treated by Laser Surface Remelting. , 0, , .		0
152	Influence of Solidification Microstructure on the Wear Resistance of Al-Si and Al-Sn Alloys Directionally Solidified under Unsteady State Conditions, 0, , 595-603.		0
153	Microstructure and mechanical properties of hypoeutectic Al-Si alloy modified with Sb solidified under unsteady-state conditions. , 0, , .		0
154	Interrelationship of thermal parameters and microstructure of Bi-Zn solder alloys. , 0, , .		0
155	Microstructural characterization of an eutectic Al-Si-Ni alloy treated by laser surface remelt. , 0, , .		0
156	Influence of Al addition on thermal parameters, microstructure and hardness of a Sn-Cu eutectic alloy. , 0, , .		0
157	Correlation between microstructure, thermal parameters and mechanical properties of a directionally solidified Al-1%wt Mn alloy. Revista Dos Trabalhos De Iniciação CientÃfica Da UNICAMP, 2019, , .	0.0	0
158	Caracterização microestrutural e avaliação da microdureza da liga hipereutética Al-8%Ni solidificada unidirecionalmente. , 0, , .		0
159	Hypoeutectic Al–Fe Alloys: Formation and Characterization of Intermetallics by Dissolution of the Al Matrix. , 2019, , .		0
160	Influence of cooling rate on microstructure of an eutectic Al-Ni alloy. Revista Dos Trabalhos De Inicia \tilde{A} § \tilde{A} £o Cient \tilde{A} fica Da UNICAMP, 2019, , .	0.0	0
161	LIGA EUTÉTICA BI-0,28%NI COMO MATERIAL DE INTERFACE TÉRMICA (TIM): MICROESTRUTURA E PROPRIEDADES EM TRAÇÃ f O. , 0, , .		0
162	MICROESTRUTURA DE SOLIDIFICAÇÃ f O E COMPORTAMENTO DE CORROSÃ f O DA LIGA TERNÃRIA AL-9%SN-5%ZN. , 0, , .		0

#	Article	IF	CITATIONS
163	Evolução da microestrutura e propriedades mecânicas de ligas Al-Bi-Zn solidificadas em regime transitório de extração de calor. , 0, , .		O
164	Modelagem numérica da transferência de calor do processo de lingotamento contÃnuo de tarugo oco de cobre em uma planta industrial. Tecnologia Em Metalurgia, Materiais E Mineracao, 2021, 18, e2402.	0.1	0