Zhang Lifeng

List of Publications by Year in descending order

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		109264	114418
211	5,473	35	63
papers	citations	h-index	g-index
225	225	225	1005
235	235	235	1235
all docs	docs citations	times ranked	citing authors

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#	Article	IF	CITATIONS
1	State of the Art in Evaluation and Control of Steel Cleanliness ISIJ International, 2003, 43, 271-291.	0.6	513
2	State of the art in the control of inclusions during steel ingot casting. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2006, 37, 733-761.	1.0	218
3	Mathematical Modeling of Iron and Steel Making Processes. Mathematical Modeling of Fluid Flow in Continuous Casting ISIJ International, 2001, 41, 1181-1193.	0.6	208
4	Fluid flow and inclusion removal in continuous casting tundish. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2000, 31, 253-266.	1.0	183
5	Inclusion removal by bubble flotation in a continuous casting mold. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2006, 37, 361-379.	1.0	158
6	Investigation of Fluid Flow and Steel Cleanliness in the Continuous Casting Strand. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2007, 38, 63-83.	1.0	154
7	Formation and Modification of MgO·Al2O3-Based Inclusions in Alloy Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2012, 43, 731-750.	1.0	154
8	Removal of Iron From Aluminum: A Review. Mineral Processing and Extractive Metallurgy Review, 2012, 33, 99-157.	2.6	150
9	Flow Transport and Inclusion Motion in Steel Continuous-Casting Mold under Submerged Entry Nozzle Clogging Condition. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2008, 39, 534-550.	1.0	124
10	Fluid Flow-Related Transport Phenomena in Steel Slab Continuous Casting Strands under Electromagnetic Brake. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2011, 42, 1319-1351.	1.0	93
11	Effect of Cerium Content on Inclusions in an Ultra-Low-Carbon Aluminum-Killed Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2020, 51, 589-600.	1.0	86
12	Transient Evolution of Inclusions during Calcium Modification in Linepipe Steels. ISIJ International, 2014, 54, 2772-2779.	0.6	85
13	Nucleation, Growth, Transport, and Entrapment of Inclusions During Steel Casting. Jom, 2013, 65, 1138-1144.	0.9	81
14	Transformation of Oxide Inclusions in Type 304 Stainless Steels during Heat Treatment. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 2281-2292.	1.0	79
15	Removal of Inclusions from Aluminum Through Filtration. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2010, 41, 886-907.	1.0	76
16	Extraction, Thermodynamic Analysis, and Precipitation Mechanism of MnS-TiN Complex Inclusions in Low-Sulfur Steels. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 3015-3025.	1.1	75
17	Detection of Non-metallic Inclusions in Steel Continuous Casting Billets. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2014, 45, 1291-1303.	1.0	73
18	Removal of Impurity Elements from Molten Aluminum: A Review. Mineral Processing and Extractive Metallurgy Review, 2011, 32, 150-228.	2.6	58

#	Article	IF	CITATIONS
19	Mathematical Modeling on the Growth and Removal of Non-metallic Inclusions in the Molten Steel in a Two-Strand Continuous Casting Tundish. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 2991-3012.	1.0	58
20	Effect of Slag Composition on Inclusions in Si-Deoxidized 18Cr-8Ni Stainless Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 1024-1034.	1.0	57
21	Investigation on the Effect of Nozzle Number on the Recirculation Rate and Mixing Time in the RH Process Using VOFÂ+ÂDPM Model. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 1950-1961.	1.0	57
22	Modeling the Entrapment of Nonmetallic Inclusions in Steel Continuous-Casting Billets. Jom, 2012, 64, 1063-1074.	0.9	56
23	State of the Art in the Control of Inclusions in Tire Cord Steels - a Review. Steel Research International, 2006, 77, 158-169.	1.0	55
24	Formation and Thermodynamics of Mg-Al-Ti-O Complex Inclusions in Mg-Al-Ti-Deoxidized Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2014, 45, 2057-2071.	1.0	54
25	Stability Diagram of Mg-Al-O System Inclusions in Molten Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2015, 46, 1809-1825.	1.0	54
26	Deformability of Oxide Inclusions in Tire Cord Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 803-811.	1.0	52
27	Investigation on the Fluid Flow and Mixing Phenomena in a Ruhrstahl-Heraeus (RH) Steel Degasser Using Physical Modeling. Jom, 2014, 66, 1227-1240.	0.9	49
28	Fluid Flow, Heat Transfer and Inclusion Motion in a Four‣trand Billet Continuous Casting Tundish. Steel Research International, 2005, 76, 784-796.	1.0	47
29	Kinetic Modeling on Nozzle Clogging During Steel Billet Continuous Casting. ISIJ International, 2010, 50, 712-720.	0.6	45
30	Numerical Simulation of Steel and Argon Gas Two-Phase Flow in Continuous Casting Using LES + VOF + DPM Model. Jom, 2019, 71, 1158-1168.	0.9	45
31	Cleanliness of Low Carbon Aluminumâ€Killed Steels during Secondary Refining Processes. Steel Research International, 2013, 84, 473-489.	1.0	43
32	Transformation of Inclusions in Linepipe Steels During Heat Treatment. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 2047-2062.	1.0	42
33	Transient Evolution of Nonmetallic Inclusions During Calcium Treatment of Molten Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 1841-1859.	1.0	41
34	Kinetic Modeling of Nonmetallic Inclusions Behavior in Molten Steel: A Review. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2020, 51, 2453-2482.	1.0	41
35	Evolution of Oxide Inclusions in Si-Mn Killed Steels During Hot-Rolling Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 2717-2730.	1.0	39
36	Numerical Simulation of the Growth and Removal of Inclusions in the Molten Steel of a Two-Strand Tundish. Jom, 2013, 65, 1155-1163.	0.9	36

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37	Transformation of Inclusions in Pipeline Steels During Solidification and Cooling. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 2267-2273.	1.0	36
38	Transient Fluid Flow Phenomena during Continuous Casting: Part Il—Cast Speed Change, Temperature Fluctuation, and Steel Grade Mixing. ISIJ International, 2010, 50, 1783-1791.	0.6	35
39	Beneficial and technological analysis for the recycling of solar grade silicon wastes. Jom, 2011, 63, 23-27.	0.9	35
40	Application of Electromagnetic (EM) Separation Technology to Metal Refining Processes: A Review. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2014, 45, 2153-2185.	1.0	35
41	Effect of Sulfur in Steel on Transient Evolution of Inclusions During Calcium Treatment. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 610-626.	1.0	35
42	Transient Behavior of Inclusions during Reoxidation of Si-killed Stainless Steels in Continuous Casting Tundish. ISIJ International, 2016, 56, 584-593.	0.6	34
43	Fluid Flow, Dissolution, and Mixing Phenomena in Argon-Stirred Steel Ladles. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 2722-2743.	1.0	34
44	Large Eddy Simulation on the Fluid Flow, Solidification and Entrapment of Inclusions in the Steel Along the Full Continuous Casting Slab Strand. Jom, 2018, 70, 2968-2979.	0.9	33
45	Effects of Interphase Forces on Fluid Flow in Gas-Stirred Steel Ladles Using the Eulerian–Lagrangian Multiphase Approach. Jom, 2018, 70, 2128-2138.	0.9	32
46	Transient Fluid Flow Phenomena during Continuous Casting: Part l—Cast Start. ISIJ International, 2010, 50, 1777-1782.	0.6	31
47	Kinetic Modeling for the Dissolution of MgO Lining Refractory in Al-Killed Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 2195-2206.	1.0	31
48	Influence of FC-Mold on the Full Solidification of Continuous Casting Slab. Jom, 2016, 68, 2170-2179.	0.9	29
49	Thermodynamic Model for Prediction of Slag-Steel-Inclusion Reactions of 304 Stainless Steels. ISIJ International, 2017, 57, 68-75.	0.6	29
50	Characterization of MnS Particles in Heavy Rail Steels Using Different Methods. Steel Research International, 2017, 88, 1600080.	1.0	27
51	Nucleation, Growth, and Aggregation of Alumina Inclusions in Steel. Jom, 2013, 65, 1173-1180.	0.9	26
52	Control of Transverse Corner Cracks on Low-Carbon Steel Slabs. Jom, 2014, 66, 1711-1720.	0.9	26
53	Separation of Non-metallic Inclusions from Molten Steel Using High Frequency Electromagnetic Fields. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2014, 45, 1915-1935.	1.0	26
54	Characterization of the Three-Dimensional Morphology and Formation Mechanism of Inclusions in Linepipe Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 701-712.	1.0	26

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55	Effect of non-metallic precipitates and grain size on core loss of non-oriented electrical silicon steels. Journal of Magnetism and Magnetic Materials, 2018, 451, 454-462.	1.0	26
56	Effect of Mold Electromagnetic Stirring and Final Electromagnetic Stirring on the Solidification Structure and Macrosegregation in Bloom Continuous Casting. Steel Research International, 2021, 92, 2000661.	1.0	26
57	A Reaction Model for Prediction of Inclusion Evolution During Reoxidation of Ca-Treated Al-Killed Steels in Tundish. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 1433-1438.	1.0	24
58	Effect of Oxide Inclusions on the Magnetic Properties of Nonâ€Oriented Electrical Steel. Steel Research International, 2018, 89, 1800047.	1.0	24
59	Structure Optimization of Horizontal Continuous Casting Tundishes Using Mathematical Modeling and Water Modeling. ISIJ International, 2009, 49, 1551-1560.	0.6	22
60	Water Modeling of Self-Braking Submerged Entry Nozzle Used for Steel Continuous Casting Mold. Jom, 2012, 64, 1080-1086.	0.9	22
61	Effects of Interphase Forces on Multiphase Flow and Bubble Distribution in Continuous Casting Strands. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 528-547.	1.0	22
62	Large Eddy Simulation on the Twoâ€Phase Flow in a Water Model of Continuous Casting Strand with Gas Injection. Steel Research International, 2019, 90, 1800287.	1.0	21
63	Effect of interactions between Fe–Al alloy and MgO-based refractory on the generation of MgO·Al ₂ O ₃ spinel. Ironmaking and Steelmaking, 2020, 47, 424-431.	1.1	21
64	Deformation and fracture of non-metallic inclusions in steel at different temperatures. Journal of Materials Research and Technology, 2020, 9, 15016-15022.	2.6	21
65	Characteristics of Aluminaâ€Based Inclusions in Low Carbon Alâ€Killed Steel under Noâ€Stirring Condition. Steel Research International, 2013, 84, 878-891.	1.0	20
66	Effect of Superheat, Cooling Rate, and Refractory Composition on the Formation of Non-metallic Inclusions in Non-oriented Electrical Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2015, 46, 2348-2360.	1.0	20
67	Analysis on the Deflection Angle of Columnar Dendrites of Continuous Casting Steel Billets Under the Influence of Mold Electromagnetic Stirring. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 5496-5509.	1.1	20
68	Modeling on the Fluid Flow and Mixing Phenomena in a RH Steel Degasser with Oval Down‣eg Snorkel. Steel Research International, 2018, 89, 1800048.	1.0	20
69	Thermodynamic and Kinetic Analysis for Transformation of Oxide Inclusions in Solid 304 Stainless Steels. Steel Research International, 2019, 90, 1800600.	1.0	20
70	Entrapment of Inclusions by Solidified Hooks at the Subsurface of Ultra-Low-Carbon Steel Slab. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 3186-3199.	1.0	19
71	Mathematical Modeling on the Influence of Casting Parameters on Initial Solidification at the Meniscus of Slab Continuous Casting. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 1444-1460.	1.0	19
72	Agglomeration of Solid Inclusions in Molten Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 36-41.	1.0	19

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73	Effect of the Gap Between Copper Mold and Solidified Shell on the Fluid Flow in the Continuous Casting Strand with Mold Electromagnetic Stirring. Steel Research International, 2020, 91, 1900470.	1.0	19
74	Effect of cerium on the wettability between 304 stainless steel and MgO–Al2O3-based lining refractory. Ceramics International, 2020, 46, 15674-15685.	2.3	19
75	Detection of Non-metallic Inclusions in Centrifugal Continuous Casting Steel Billets. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 1594-1612.	1.0	18
76	Effect of Cooling Rate on Oxide Inclusions During Solidification of 304 Stainless Steel. Steel Research International, 2019, 90, 1900027.	1.0	18
77	Simulation of the Fluid Flow-Related Phenomena in the Electrolyte of an Aluminum Electrolysis Cell. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2011, 42, 1051-1064.	1.0	17
78	Relationship Between Dissolved Calcium and Total Calcium in Al-Killed Steels After Calcium Treatment. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 1624-1631.	1.0	17
79	Influence of Casting Parameters on Hooks and Entrapped Inclusions at the Subsurface of Continuous Casting Slabs. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2018, 49, 5469-5477.	1.1	17
80	Initial agglomeration of non-wetted solid particles in high temperature melt. Chemical Engineering Science, 2019, 196, 14-24.	1.9	17
81	Mathematical Modeling of Initial Solidification and Slag Infiltration at the Meniscus of Slab Continuous Casting Mold. Jom, 2019, 71, 78-87.	0.9	17
82	Formation and Deformation Mechanism of Al2O3-CaS Inclusions in Ca-Treated Non-Oriented Electrical Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2020, 51, 200-212.	1.0	17
83	Formation and Control of Transverse Corner Cracks in the Continuous Casting Slab of a Microalloyed Steel. Steel Research International, 2021, 92, 2000649.	1.0	17
84	Numerical Simulation of Solidification Behavior and Solute Transport in Slab Continuous Casting with S-EMS. Metals, 2019, 9, 452.	1.0	16
85	Fluid Flow, Thermal Stratification, and Inclusion Motion During Holding Period in Steel Ladles. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 1476-1489.	1.0	16
86	Characterization and evolution of non-metallic inclusions in GCr15 bearing steels during cooling and solidification. Ironmaking and Steelmaking, 2020, 47, 1217-1225.	1.1	16
87	Three-Dimensional Macrosegregation Model of Bloom in Curved Continuous Casting Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2796-2805.	1.0	16
88	Boron Removal from Metallurgical-Grade Silicon by Slag Refining and Gas Blowing Techniques: Experiments and Simulations. Journal of Electronic Materials, 2021, 50, 1386-1396.	1.0	16
89	Determination for the Entrapment Criterion of Non-metallic Inclusions by the Solidification Front During Steel Centrifugal Continuous Casting. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 1933-1949.	1.0	15
90	A Method to Control the Transverse Corner Cracks on a Continuous Casting Slab by Combining Microstructure Analysis with Numerical Simulation of the Slab Temperature Field. Steel Research International, 2018, 89, 1700480.	1.0	15

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91	Effect of calcium treatment on magnetic properties of non-oriented electrical steels. Journal of Magnetism and Magnetic Materials, 2020, 494, 165803.	1.0	15
92	Clogging Behavior of a Submerged Entry Nozzle for the Casting of Ca-Treated Al-Killed Ti-Bearing Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 1186-1193.	1.0	15
93	Prediction of Calcium Yield During Calcium Treatment Process Performed in Steelmaking Using Neural Network. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1-7.	1.0	15
94	Transient influence of cerium on inclusions in an Al-killed non-oriented electrical steel. Ironmaking and Steelmaking, 2021, 48, 191-199.	1.1	14
95	Application of Si-Based Solvents to the Purification of Metallurgical Grade-Silicon. Separation and Purification Reviews, 2021, 50, 115-138.	2.8	14
96	Mathematical simulation of two-phase flow and slag entrainment during steel bloom continuous casting. Powder Technology, 2021, 390, 539-554.	2.1	14
97	Modelling inclusion evolution in Al–Ti-killed steels during ladle mixing process. Ironmaking and Steelmaking, 2018, 45, 585-591.	1.1	13
98	Inclusion Capture Probability Prediction Model for Bubble Floatation in Turbulent Steel Flow. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 16-21.	1.0	13
99	Kinetic Prediction for the Composition of Inclusions in the Molten Steel During the Electroslag Remelting. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 1521-1531.	1.0	13
100	Effect of Yttrium Content on the Transformation of Inclusions in a Si–Mn-Killed Stainless Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2659-2675.	1.0	13
101	In Situ Observation of the Dissolution of Al2O3 Particles in CaO-Al2O3-SiO2 Slags. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 3288-3301.	1.0	13
102	Wettability between molten slag and dolomitic refractory. Ceramics International, 2016, 42, 16040-16048.	2.3	12
103	The effect of Al content on the wettability between liquid iron and MgO Al2O3 binary substrate. Ceramics International, 2019, 45, 11287-11295.	2.3	12
104	Modification of inclusions in linepipe steels by Ca-containing ferrosilicon during ladle refining. Ironmaking and Steelmaking, 2020, 47, 6-12.	1.1	12
105	Numerical Simulation of the Thermal Process in a W-Shape Radiant Tube Burner. Jom, 2014, 66, 1253-1264.	0.9	11
106	High-Frequency Electromagnetic Purification of Silicon. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2015, 46, 2514-2528.	1.0	11
107	Mechanism and Control of Sulfide Inclusion Accumulation in CET Zone of 37Mn5 Round Billet. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2017, 48, 1004-1013.	1.0	11
108	Measurements of surface velocity and level fluctuation in an actual continuous wide slab casting mold. Metallurgical Research and Technology, 2018, 115, 102.	0.4	11

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109	A Mathematical Model for Prediction of Carbon Concentration During RH Refining Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 2963-2968.	1.0	11
110	Effect of Al2O3–SiO2–MnO inclusions on precipitation of MnS in Si–Mn-killed 304 stainless steels. Ironmaking and Steelmaking, 2019, 46, 558-563.	1.1	11
111	Dependence of the Clogging Possibility of the Submerged Entry Nozzle during Steel Continuous Casting Process on the Liquid Fraction of Non-Metallic Inclusions in the Molten Al-Killed Ca-Treated Steel. Metals, 2020, 10, 1205.	1.0	11
112	Large Eddy Simulation on Four-Phase Flow and Slag Entrainment in the Slab Continuous Casting Mold. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1446-1461.	1.0	11
113	Motion of Single Bubble and Interactions between Two Bubbles in Liquid Steel. ISIJ International, 2017, 57, 805-813.	0.6	10
114	Numerical Simulation on the Oxidation of Lanthanum During the Electroslag Remelting Process. Jom, 2018, 70, 2157-2168.	0.9	10
115	Three-Dimensional Distribution of Hooks in Al-Killed Low-Carbon Continuous Casting Steel Slabs. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 2533-2549.	1.0	10
116	Influence of Electromagnetic Brake on Hook Growth and Inclusion Entrapment Beneath the Surface of Lowâ€Carbon Continuous Casting Slabs. Steel Research International, 2018, 89, 1800263.	1.0	10
117	Fluid Flow and Inclusion Behavior Around Spherical-Cap Bubbles. Jom, 2019, 71, 69-77.	0.9	10
118	Modification of inclusions by Al and Ca in ferrosilicon during alloying process of 18Cr–8Ni stainless steels. Ironmaking and Steelmaking, 2020, 47, 40-46.	1.1	10
119	Formation Mechanism of MgO Containing Inclusions in the Molten Steel Refined in MgO Refractory Crucibles. Metals, 2020, 10, 444.	1.0	10
120	Cloggingâ€induced Asymmetrical and Transient Flow Pattern in a Steel Continuous Casting Slab Strand Measured Using Nail Boards. Steel Research International, 2021, 92, 2000547.	1.0	10
121	Effect of Electromagnetic Stirring on Inclusions in Continuous Casting Blooms of a Gear Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2341-2354.	1.0	10
122	Influence of Cooling Parameters on the Microstructure and Primary Carbide Precipitation in GCr15 Steel. Steel Research International, 2021, 92, 2100208.	1.0	10
123	Interaction Between Liquid Steel and AlN Substrate Containing Al-Y-Oxides. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 2459-2470.	1.0	9
124	Effect of Melt Superheat and Alloy Size on the Mixing Phenomena in Argon‧tirred Steel Ladles. Steel Research International, 2019, 90, 1800288.	1.0	9
125	Effect of Temperature and Multichannel Stopper Rod on Bubbles in Water Model of a Steel Continuous Caster. Steel Research International, 2021, 92, 2100067.	1.0	9
126	Three-Dimensional Characterization of Defects in Continuous Casting Blooms of Heavy Rail Steel Using X-ray Computed Tomography. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2327-2340.	1.0	9

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127	Dissolution Behavior of Mg and Ca from Dolomite Refractory into Al-killed Molten Steel. ISIJ International, 2021, 61, 2391-2399.	0.6	9
128	A Simple Model to Calculate Dendrite Growth Rate during Steel Continuous Casting Process. ISIJ International, 2010, 50, 1792-1796.	0.6	8
129	Modeling on Fluid Flow and Inclusion Motion in Centrifugal Continuous Casting Strands. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2016, 47, 2623-2642.	1.0	8
130	Evolution of Non-metallic Inclusions and Precipitates in Oriented Silicon Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 926-932.	1.0	8
131	Investigation on Fluid Flow inside a Continuous Slab Casting Mold Using Particle Image Velocimetry. Steel Research International, 2019, 90, 1900209.	1.0	8
132	Precipitation of nitrides in non-oriented silicon steel. Ironmaking and Steelmaking, 2019, 46, 359-367.	1.1	8
133	Transformation of Inclusions in a Complicatedâ€Deoxidized Heavy Rail Steels During Heating. Steel Research International, 2020, 91, 2000120.	1.0	8
134	Evolution of Nonmetallic Inclusions during the Electroslag Remelting Process. Steel Research International, 2021, 92, 2000629.	1.0	8
135	Effect of Diameter and Contact Angle on Initial Aggregation of Solid Inclusions in Molten Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2831-2836.	1.0	8
136	Influence of Inclusions on the Nucleation of Acicular Ferrites in a Ti–Zrâ€Bearing Steel. Steel Research International, 2022, 93, 2100468.	1.0	8
137	Waste Heat Recovery from Metal Industries. Jom, 2012, 64, 982-984.	0.9	7
138	Modeling of Turbulent Flow around Bubbles in Molten Steel. Steel Research International, 2019, 90, 1800576.	1.0	7
139	Effect of Slag Modification on Inclusions in Si–Mnâ€Killed 304 Stainless Steels. Steel Research International, 2021, 92, 2000506.	1.0	7
140	Prediction of Spatial Composition Distribution of Inclusions in the Continuous Casting Bloom of a Bearing Steel under Unsteady Casting. ISIJ International, 2021, 61, 824-833.	0.6	7
141	On the Limits of the Geometric Scale Ratio Using Water Modeling in Ladles. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2263-2274.	1.0	7
142	Atomistic Nucleation Mechanism of Titanium Oxides in Steel Based on Homogeneous and Heterogeneous Modes. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 3315-3331.	1.0	7
143	Dissolution of SiO2 Inclusions in CaO-SiO2-Based Slags In Situ Observed Using High-Temperature Confocal Scanning Laser Microscopy. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 682-692.	1.0	7
144	In Situ Observation and Prediction of the Transformation of Acicular Ferrites in Ti-Containing HLSA Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1827-1840.	1.0	7

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145	Mathematical simulation of hot metal desulfurization during KR process coupled with an unreacted core model. International Journal of Minerals, Metallurgy and Materials, 2022, 29, 758-766.	2.4	7
146	Mathematical Modeling on the Removal of Impurity Elements from Molten Aluminum. Mineral Processing and Extractive Metallurgy Review, 2012, 33, 1-54.	2.6	6
147	Computational Fluid Dynamics Modeling: Application to Transport Phenomena During the Casting Process. Jom, 2012, 64, 1059-1062.	0.9	6
148	Bubble Motion and Gas-Liquid Mixing in Metallurgical Reactor with a Top Submerged Lance. International Journal of Chemical Reactor Engineering, 2017, 15, .	0.6	6
149	Formation Mechanism of Complex Oxide Inclusions in 55SiCr Spring Steels. Steel Research International, 2018, 89, 1700277.	1.0	6
150	Efficient Recovery of Copper and Cobalt from the Matte–Slag Mixture of ISA Furnace by Injection of Coke and Pyrite. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 3118-3126.	1.0	6
151	Effect of Selenium on the Interaction Between Refractory and Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2019, 50, 1115-1123.	1.0	6
152	Determination of Transient Flow Pattern in Steel Continuous Casting Molds Using Nail Board Measurement and Onsite Top Flux Observation. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 1106-1117.	1.0	6
153	Initial Solidification and Heat Transfer at Different Locations of Slab Continuous Casting Mold through 3D Coupled Model. Steel Research International, 2021, 92, 2000714.	1.0	6
154	Simulation of Solidification Structure During Vacuum Arc Remelting Using Cellular Automatonâ^'Finite Element Method. Steel Research International, 2022, 93, 2100408.	1.0	6
155	Effect of Casting Parameters on the Flow Pattern in a Steel Continuous Casting Slab Mold: Numerical Simulation and Industrial Trials. Steel Research International, 2022, 93, 2100350.	1.0	6
156	Center Segregation Evolution in Slab Continuous Casting with Mechanical Reduction: A 3D Simulation. Steel Research International, 2022, 93, 2100569.	1.0	6
157	Transient Evolution of Nonmetallic Inclusions in a Si–Mnâ€Killed Stainless Steel with Cerium Addition. Steel Research International, 2022, 93, .	1.0	6
158	Numerical Simulation of Decarburization Reaction with Oxygen Blowing During RH Refining Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 2004-2017.	1.0	6
159	Modeling on the solidification structure of Fe-Ni-based alloys using cellular automaton method. Metallurgical Research and Technology, 2016, 113, 410.	0.4	5
160	Evolution of Nonmetallic Inclusions with Varied Argon Stirring Condition during Vacuum Degassing Refining of a Bearing Steel. Steel Research International, 2021, 92, 2000364.	1.0	5
161	Effect of Total Calcium in Heavy Rail Steels on the Transformation of Inclusions during Heat Treatment at 1473 K. Steel Research International, 2021, 92, 2000605.	1.0	5
162	Three-Dimensional Spatial Distribution of Non-metallic Inclusions on the Entire Cross Section of a Steel Continuous Casting Slab. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 3497-3514.	1.0	5

#	Article	IF	CITATIONS
163	Interfacial Phenomena and Inclusion Formation at Early Melting Stages of Lanthanum Ferroalloys in a Non-Oriented Electrical Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 662-669.	1.0	5
164	The Effect of Aluminum Addition on the Evolution of Inclusions in an Aluminum-Killed Calcium-Treated Steel. Metals, 2022, 12, 181.	1.0	5
165	Inclusion Evolution in Al-Killed Ca-Treated Steels at Heat Treatment Temperature In Situ Observed Using Confocal Scanning Laser Microscope. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1323-1328.	1.0	5
166	Effect of Types of Calciumâ€Containing Cored Wires on the Inclusion Modification by Calcium Treatment. Steel Research International, 2022, 93, .	1.0	5
167	Modeling on the Solidification of 1J51 Fe-Ni-Based Alloy Ingot Under Vacuum Conditions. Jom, 2014, 66, 1175-1183.	0.9	4
168	A Thermodynamic Model to Estimate the Formation of Complex Nitrides of Al x Mg(1–x)N in Silicon Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2018, 49, 894-901.	1.0	4
169	Pinning Effect of Oxide Particles on Grain Boundaries of a Low Aluminum Nonâ€oriented Electrical Steel. Steel Research International, 2020, 91, 1900303.	1.0	4
170	Modelling of non-metallic inclusions in steel. Mineral Processing and Extractive Metallurgy: Transactions of the Institute of Mining and Metallurgy, 2020, 129, 184-206.	0.1	4
171	Mathematical Modeling on Slag Consumption and Lubrication in a Slab Continuous Casting Mold. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 322-338.	1.0	4
172	Mathematical Modeling on the Effect of the Interfacial Tension on the Droplets during Electroslag Remelting. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 3167-3182.	1.0	4
173	Water Modeling on Circulating Flow and Mixing Time in a Ruhrstahl–Heraeus Vacuum Degasser. Steel Research International, 2021, 92, 2000608.	1.0	4
174	Effect of Sulfur Content on Evolution of Nonmetallic Inclusions in Low Sulfur Alâ€Killed Steels during Heat Treatment. Steel Research International, 2022, 93, 2100526.	1.0	4
175	Transformation of inclusions in Al-killed steels with different calcium contents during the heat treatment. Ironmaking and Steelmaking, 2022, 49, 472-483.	1.1	4
176	Detachment Mechanism of Inclusions From the Interface Between Molten Steel and Slag. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1339-1343.	1.0	4
177	Measurement and Calculation of Magnetic Flux Density During Mold Electromagnetic Stirring on a Continuous Casting Bloom Mold. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 0, , .	1.0	4
178	Experimental Study on Scale-Up of Solid–Liquid Stirred Tank with an Intermig Impeller. Jom, 2017, 69, 301-306.	0.9	3
179	Thermodynamic insight into the growth of nanoscale inclusion of Al-deoxidation in Fe–O–Al melt. Scientific Reports, 2020, 10, 16909.	1.6	3
180	New insights into the structural evolution of TiO2–Ti3O5–Ti2O3–TiO–TixOyCz–TiC systems at the nanoscale during the reduction process. Physical Chemistry Chemical Physics, 2021, 23, 4796-4804.	1.3	3

#	Article	IF	CITATIONS
181	Effect of Thermal History on the Deformation of Non-metallic Inclusions During Plain Strain Compression. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 1200-1206.	1.0	3
182	Intervening Interfacial Reaction Between Refractory and Rare Earth-Bearing Molten Steel by Pulsed Electric Current to Inhibit the Clogging of Submerged Entry Nozzle. Jom, 2021, 73, 3910-3919.	0.9	3
183	Study on the Spatial Distribution of Argon Bubbles in a Steel Slab Continuous Casting Strand. Steel Research International, 2022, 93, .	1.0	3
184	Large Eddy Simulation on the Transient Decarburization of the Molten Steel During RH Refining Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 670-681.	1.0	3
185	A New Method to Reduce the Shielding Effect of Copper Mold in the Bloom Continuous Casting with M-EMS. Jom, 2022, 74, 1601-1609.	0.9	3
186	Characterization of SiC and Si3N4 inclusions in solar cell Si scraps and their motion at the Si/slag interface. Journal of Materials Research and Technology, 2022, 17, 2220-2228.	2.6	3
187	Effect of the La2O3 Content in Slag on Inclusions in Al-Killed Steels. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 2088-2103.	1.0	3
188	Effect of the grain size and cooling rate on the martensite start temperature of the stainless steel. Steel Research International, 0, , .	1.0	3
189	Dependency of Flow Pattern in the Mold on the Distribution of Inclusions Along the Thickness of Continuous Casting Slabs. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 2536.	1.0	2
190	Mathematical Modeling on the Initial Melting of the Consumable Electrode During Electroslag Remelting Process. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2021, 52, 4033-4045.	1.0	2
191	Kinetic Prediction for Isothermal Transformation of Inclusions in a Bearing Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 394-406.	1.0	2
192	Transformation of LaAlO3 Inclusions During Heating in a Solid Non-oriented Electrical Steel. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 637-649.	1.0	2
193	Three-Dimensional Evaluation of Internal Quality of the Continuous Casting Billet of a High Carbon Steel Using X-ray Computed Tomography. Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science, 2022, 53, 1603-1616.	1.0	2
194	Optimization of Metallurgical Reactors Using Mathematical and Physical Modeling. Jom, 2014, 66, 1151-1152.	0.9	1
195	Fluid Flow, Alloy Dispersion and Inclusion Motion in Argonstirred Steel Ladles. , 2014, , 659-666.		1
196	Evolution of Sulfides in Nonoriented Silicon Steels during Heating Process. Steel Research International, 2021, 92, 2000489.	1.0	1
197	Effect of Compression Reduction on Deformation of CaO–CaS–Al 2 O 3 –MgO Inclusions in Solid and Semiâ€Solid Steel. Steel Research International, 2021, 92, 2000609.	1.0	1
198	Effect of Al on the Solid Reaction between 3CaO·Al 2 O 3 Oxide and Fe–S–O–Al Alloy at 1373 K. Steel Research International, 2021, 92, 2100049.	1.0	1

#	Article	IF	CITATIONS
199	Effect of Oxygen at Basic Oxygen Furnace Endpoint on Control of Inclusions in a Si–Mn Killed Steel. Steel Research International, 2022, 93, 2100411.	1.0	1
200	Removal of SiC and Si ₃ N ₄ inclusions in solar cell Si scraps through slag refining. High Temperature Materials and Processes, 2022, 41, 132-136.	0.6	1
201	Water modelling on particle dispersion during KR desulphurization process. Ironmaking and Steelmaking, 2022, 49, 707-715.	1.1	1
202	A Three-Dimensional Comprehensive Numerical Model of Ion Transport during Electro-Refining Process for Scrap-Metal Recycling. Materials, 2022, 15, 2789.	1.3	1
203	Effect of Cerium on the Interaction between a Siâ€Mnâ€killed Steel and a MgOâ€based Refractory. Steel Research International, 0, , .	1.0	1
204	Fluid Flow, Solidification and Inclusion Entrapment during Steel Centrifugal Casting Process. , 2012, , 1-16.		0
205	Experimental Study on the Production of Nitrogen-Bearing Stainless Steel by Injecting Nitrogen Gas. , 2012, , 858-866.		0
206	Interaction between Molten Steel, Alumina Lining Refractory and Slag Phase. Journal for Manufacturing Science and Production, 2013, 13, 133-143.	0.1	0
207	Removel of Non-Metallic Inclusions from Molten Steel Using a High Frequency Magnetic Field. , 0, , 651-658.		0
208	History, Future, and Research Activities in Metallurgical Engineering at University of Science and Technology Beijing (USTB). Steel Research International, 2018, 89, 1800539.	1.0	0
209	3D Mathematics Model of Formation and Motion of Metal Droplets during Electro-Slag Remelting Process. , 0, , 1263-1270.		0
210	Wettability Between Si–Mnâ€Killed Steel and MgOâ€Based Refractory Containing SiO ₂ Impurities. Steel Research International, 2022, 93, .	1.0	0
211	Effect of initial aluminium-oxygen concentration product on alumina-based inclusions in high carbon Al-killed steels during the ladle refining process. Ironmaking and Steelmaking, 0, , 1-8.	1.1	0