

motomichi koyama

List of Publications by Year in descending order

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207
papers

6,111
citations

101543

36
h-index

88630

70
g-index

208
all docs

208
docs citations

208
times ranked

2683
citing authors

#	ARTICLE	IF	CITATIONS
1	Pre-straining alters hydrogen-assisted cracking site and local hydrogen diffusivity in a nitrogen-doped duplex steel. <i>Scripta Materialia</i> , 2022, 207, 114272.	5.2	9
2	Real-time Visualization of Hydrogen Distribution in Metals Using Polyaniline: An Ultrasensitive Hydrogenochromic Sensor. <i>Advanced Materials Interfaces</i> , 2022, 9, .	3.7	5
3	Synergistic effects of hydrogen and deformation temperature on mechanical properties of TRIP-aided bainitic ferrite steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2022, 842, 143070.	5.6	6
4	Hydrogen-accelerated fatigue crack growth of equiatomic Fe-Cr-Ni-Mn-Co high-entropy alloy evaluated by compact tension testing. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2022, 848, 143394.	5.6	5
5	Transition mechanism of cycle- to time-dependent acceleration of fatigue crack-growth in 0.4%C Cr-Mo steel in a pressurized gaseous hydrogen environment. <i>International Journal of Fatigue</i> , 2022, 163, 107039.	5.7	14
6	Three-dimensional characterization of low-cycle fatigue crack morphology in TRIP-maraging steel: Crack closure, geometrical uncertainty and wear. <i>International Journal of Fatigue</i> , 2021, 143, 106032.	5.7	1
7	Hydrogen-assisted damage evolution in nitrogen-doped duplex stainless steel. <i>International Journal of Hydrogen Energy</i> , 2021, 46, 2716-2728.	7.1	7
8	Novel ~75°C SEM cooling stage: application for martensitic transformation in steel. <i>Microscopy (Oxford, England)</i> , 2021, 70, 250-254.	1.5	1
9	Effects of Matrix Structure and Nitrogen Content on Fatigue Properties of Ultrahigh-Strength Low Alloy TRIP-Aided Steels. <i>ISIJ International</i> , 2021, 61, 591-598.	1.4	2
10	Fatigue Crack Growth at Different Frequencies and Temperatures in an Fe-based Metastable High-entropy Alloy. <i>ISIJ International</i> , 2021, 61, 641-647.	1.4	7
11	Stacking fault aggregation during cooling composing FCC-HCP martensitic transformation revealed by <i>in-situ</i> electron channeling contrast imaging in an Fe-high Mn alloy. <i>Science and Technology of Advanced Materials</i> , 2021, 22, 135-140.	6.1	5
12	Microstructure Refinement by Low-Temperature Ausforming in an Fe-Based Metastable High-Entropy Alloy. <i>Metals</i> , 2021, 11, 742.	2.3	2
13	Effect of austempering treatment on the microstructure and mechanical properties of 0.4C-1.5Si-1.5Mn TRIP-aided bainitic ferrite steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2021, 819, 141479.	5.6	17
14	Strain rate sensitivity of hydrogen-assisted μ -martensitic transformation and associated hydrogen embrittlement in high-Mn steel. <i>International Journal of Hydrogen Energy</i> , 2021, 46, 27221-27233.	7.1	13
15	Hierarchical Characteristics of Hydrogen-Assisted Crack Growth and Microstructural Strain Evolution in Tempered Martensitic Steels: Case of Quasi-cleavage Fracture. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2021, 52, 4703-4713.	2.2	11
16	Hydrogenation treatment under several gigapascals assists diffusionless transformation in a face-centered cubic steel. <i>Scientific Reports</i> , 2021, 11, 19384.	3.3	4
17	Hydrogen embrittlement and associated surface crack growth in fine-grained equiatomic CoCrFeMnNi high-entropy alloys with different annealing temperatures evaluated by tensile testing under in situ hydrogen charging. <i>International Journal of Hydrogen Energy</i> , 2021, 46, 33028-33038.	7.1	16
18	Depressurization-induced diffusionless transformation in pure iron hydrogenated under several gigapascals. <i>Materials Letters: X</i> , 2021, 11, 100078.	0.7	1

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19	Notch shape dependence of fatigue crack extension in equiatomic CrMnFeCoNi high-entropy alloy. <i>International Journal of Fatigue</i> , 2021, 153, 106481.	5.7	7
20	Quantification and Characterization of Microdamage Resistance in Metals for Designing High-Strength Ductile Microstructures. <i>Accounts of Materials Research</i> , 2021, 2, 1167-1176.	11.7	7
21	Planar slip-driven fatigue crack initiation and propagation in an equiatomic CrMnFeCoNi high-entropy alloy. <i>International Journal of Fatigue</i> , 2020, 133, 105418.	5.7	55
22	Strain rate and hydrogen effects on crack growth from a notch in a Fe-high-Mn steel containing 1.1Åwt% solute carbon. <i>International Journal of Hydrogen Energy</i> , 2020, 45, 1125-1139.	7.1	19
23	Plastic deformation sequence and strain gradient characteristics of hydrogen-induced delayed crack propagation in single-crystalline Feâ€“Si alloy. <i>Scripta Materialia</i> , 2020, 178, 99-103.	5.2	7
24	Quantitative Evaluation of Hydrogen Effects on Evolutions of Deformation-Induced Îµ-Martensite and Damage in a High-Mn Steel. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2020, 51, 6184-6194.	2.2	14
25	Shallow crack effect on evaluation of residual tensile strength: Harmless and stable cracks in finite-sized structure made of ductile metals. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 109, 102734.	4.7	4
26	Pre-strain effects on critical stress and hydrogen content for hydrogen-induced quasi-cleavage fracture in a TRIP-aided bainitic ferrite steel: Martensitic transformation, matrix damage, and strain aging. <i>International Journal of Hydrogen Energy</i> , 2020, 45, 27920-27928.	7.1	17
27	Effects of Mn Content and Grain Size on Hydrogen Embrittlement Susceptibility of Face-Centered Cubic High-Entropy Alloys. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2020, 51, 5612-5616.	2.2	30
28	Application of an iridium complex for detecting hydrogen permeation through pure iron. <i>International Journal of Hydrogen Energy</i> , 2020, 45, 25580-25586.	7.1	12
29	Distinguishing geometric and metallurgic hydrogen-embrittlement susceptibilities in pre-cracked structures made of interstitial-free steel under monotonic tension. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 108, 102574.	4.7	1
30	Hydrogen Enhances Shape Memory Effect of a Ferrous Face-Centered Cubic Alloy. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2020, 51, 4439-4441.	2.2	6
31	Effects of hydrogen content that alters damage evolution mechanisms in SUH 660 precipitation-strengthened Feâ€“Crâ€“Ni steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2020, 791, 139750.	5.6	4
32	Origin of micrometer-scale dislocation motion during hydrogen desorption. <i>Science Advances</i> , 2020, 6, eaaz1187.	10.3	29
33	Hydrogen embrittlement resistance of pre-strained ultra-high-strength low alloy TRIP-aided steel. <i>International Journal of Fracture</i> , 2020, 224, 253-260.	2.2	18
34	Simplified stress field determination for an inclined crack and interaction between two cracks under tension. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 107, 102561.	4.7	8
35	Understanding the damage initiation mechanism of precipitation-strengthened Fe-Ni-Cr based austenitic steel. <i>Materials Today: Proceedings</i> , 2020, 26, 3081-3084.	1.8	0
36	Gaseous hydrogen embrittlement of a Ni-free austenitic stainless steel containing 1 mass% nitrogen: Effects of nitrogen-enhanced dislocation planarity. <i>International Journal of Hydrogen Energy</i> , 2020, 45, 10209-10218.	7.1	30

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37	Fundamental criterion K_{trans} for failure analysis of hydrogen-assisted cracks in notched specimens of pure Ni. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 107, 102556.	4.7	4
38	Fatigue crack propagation modes: plastic deformation mode and damage accumulation mode. <i>International Journal of Fracture</i> , 2020, 222, 111-122.	2.2	14
39	Equivalence between shallow notch and shallow crack in structural failure caused by plastic instability. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 108, 102577.	4.7	0
40	Growth Behavior of a Mechanically Long Fatigue Crack in an FeCrNiMnCo High Entropy Alloy: A Comparison with an Austenitic Stainless Steel. <i>ISIJ International</i> , 2020, 60, 175-181.	1.4	13
41	Multiple damage mechanisms facilitated by planar dislocation glide in a commercial-grade precipitation-strengthened Fe-Ni-Cr-based steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2020, 782, 139250.	5.6	8
42	Influence of dynamic-strain aging due to excess Mg on fatigue crack growth rate scatter in Al6061-T6 alloy. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 108, 102617.	4.7	2
43	Data of dynamic microscale strain distributions of Ti-6Al-4V alloys in dwell fatigue tests. <i>Data in Brief</i> , 2019, 25, 104338.	1.0	3
44	Crystallographic selection rule for the propagation mode of microstructurally small fatigue crack in a laminated Ti-6Al-4V alloy: Roles of basal and pyramidal slips. <i>International Journal of Fatigue</i> , 2019, 128, 105200.	5.7	25
45	Dislocation motion at a fatigue crack tip in a high-nitrogen steel clarified through in situ electron channeling contrast imaging. <i>Materials Characterization</i> , 2019, 158, 109930.	4.4	16
46	A patient-specific numerical modeling of the spontaneous coronary artery dissection in relation to atherosclerosis. <i>Computer Methods and Programs in Biomedicine</i> , 2019, 182, 105060.	4.7	7
47	Mode I fatigue crack growth induced by strain-aging in precipitation-hardened aluminum alloys. <i>Theoretical and Applied Fracture Mechanics</i> , 2019, 104, 102340.	4.7	11
48	Transformation-assisted hydrogen desorption during deformation in steels: Examples of ϵ - and μ -Martensite. <i>International Journal of Hydrogen Energy</i> , 2019, 44, 30472-30477.	7.1	23
49	Effect analysis of stress-intensity-factor-range decreasing rate for obtaining threshold stress-intensity-factor-range. <i>Theoretical and Applied Fracture Mechanics</i> , 2019, 104, 102377.	4.7	1
50	Detection of hydrogen effusion before, during, and after martensitic transformation: Example of multiphase transformation-induced plasticity steel. <i>International Journal of Hydrogen Energy</i> , 2019, 44, 26028-26035.	7.1	12
51	EBSD and ECCI Based Assessments of Inhomogeneous Plastic Strain Evolution Coupled with Digital Image Correlation. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2019, 105, 222-230.	0.4	10
52	Fatigue Behavior in an Fe-N Binary Ferritic Steel: Similarity and Difference between Carbon and Nitrogen. <i>ISIJ International</i> , 2019, 59, 186-191.	1.4	3
53	Strain-rate sensitivity of hydrogen-assisted damage evolution and failure in dual-phase steel: From vacancy to micrometer-scale void growth. <i>Engineering Fracture Mechanics</i> , 2019, 216, 106513.	4.3	10
54	Grain refinement effect on hydrogen embrittlement resistance of an equiatomic CoCrFeMnNi high-entropy alloy. <i>International Journal of Hydrogen Energy</i> , 2019, 44, 17163-17167.	7.1	51

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55	Revisiting the effects of hydrogen on deformation-induced β - β' martensitic transformation. <i>Materials Letters</i> , 2019, 249, 197-200.	2.6	22
56	1-second-resolved strain mapping in Ti-6Al-4V alloys during dwell fatigue in SEM by video sampling moiré. <i>Mechanics of Materials</i> , 2019, 133, 63-70.	3.2	9
57	Enhancement of hydrogen embrittlement resistance of Fe-Mn-C twinning-induced plasticity steel by partial recrystallization technique. <i>Materials Characterization</i> , 2019, 151, 221-226.	4.4	8
58	Overview of metastability and compositional complexity effects for hydrogen-resistant iron alloys: Inverse austenite stability effects. <i>Engineering Fracture Mechanics</i> , 2019, 214, 123-133.	4.3	33
59	Growth Behavior of a Mechanically Long Fatigue Crack in an FeCrNiMnCo High Entropy Alloy: A Comparison with an Austenitic Stainless Steel. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2019, 105, 215-221.	0.4	7
60	Influence of Stress Re-distribution on Hydrogen-induced Fatigue Crack Propagation. <i>ISIJ International</i> , 2019, 59, 1683-1690.	1.4	3
61	EBSD- and ECCI-based Assessments of Inhomogeneous Plastic Strain Evolution Coupled with Digital Image Correlation. <i>ISIJ International</i> , 2019, 59, 2334-2342.	1.4	14
62	Resistance to mechanically small fatigue crack growth in ultrafine grained interstitial-free steel fabricated by accumulative roll-bonding. <i>International Journal of Fatigue</i> , 2019, 118, 117-125.	5.7	13
63	Phase Stability Effects on Hydrogen Embrittlement Resistance in Martensite- ϵ -Reverted Austenite Steels. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2019, 50, 29-34.	2.2	12
64	Lowering Strain Rate Simultaneously Enhances Carbon- and Hydrogen-Induced Mechanical Degradation in an Fe-33Mn-1.1C Steel. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2019, 50, 1137-1141.	2.2	12
65	Fatigue Resistance of Laminated and Non-laminated TRIP-maraging Steels: Crack Roughness vs Tensile Strength. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2019, 50, 1142-1145.	2.2	8
66	ECCI Characterization of Dislocation Structures at a Non-propagating Fatigue Crack Tip: Toward Understanding the Effects of Mn-C and Cr-N Couples on Crack Growth Resistance. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2019, 50, 426-435.	2.2	9
67	Microstructural mechanisms of fatigue crack non-propagation in TRIP-maraging steels. <i>International Journal of Fatigue</i> , 2018, 113, 126-136.	5.7	23
68	High-concentration carbon assists plasticity-driven hydrogen embrittlement in a Fe-high Mn steel with a relatively high stacking fault energy. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2018, 717, 78-84.	5.6	18
69	Interstitial Carbon Enhanced Corrosion Resistance of Fe-33Mn-xC Austenitic Steels: Inhibition of Anodic Dissolution. <i>Journal of the Electrochemical Society</i> , 2018, 165, C19-C26.	2.9	16
70	On the Utility of Crystal Plasticity Modeling to Uncover the Individual Roles of Microdeformation Mechanisms on the Work Hardening Response of Fe-23Mn-0.5C TWIP Steel in the Presence of Hydrogen. <i>Journal of Engineering Materials and Technology, Transactions of the ASME</i> , 2018, 140, .	1.4	4
71	Hydrogen-assisted failure in a bimodal twinning-induced plasticity steel: Delamination events and damage evolution. <i>International Journal of Hydrogen Energy</i> , 2018, 43, 2492-2502.	7.1	15
72	Temperature dependence of transgranular fatigue crack resistance in interstitial-free steel and Fe-C steels with supersaturated carbon: Effects of dynamic strain aging and dynamic precipitation. <i>International Journal of Fatigue</i> , 2018, 110, 1-9.	5.7	12

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73	Non-propagating fatigue cracks in austenitic steels with a micro-notch: Effects of dynamic strain aging, martensitic transformation, and microstructural hardness heterogeneity. <i>International Journal of Fatigue</i> , 2018, 113, 359-366.	5.7	12
74	Comparative study of hydrogen embrittlement in stable and metastable high-entropy alloys. <i>Scripta Materialia</i> , 2018, 150, 74-77.	5.2	84
75	Micrographic Digital Image Correlation Coupled with Microlithography: Case Study of Strain Localization and Subsequent Cracking at an FIB Notch Tip in a Laminated Ti-6Al-4V Alloy. <i>Experimental Mechanics</i> , 2018, 58, 381-386.	2.0	12
76	Visualization of dislocations through electron channeling contrast imaging at fatigue crack tip, interacting with pre-existing dislocations. <i>Materials Research Letters</i> , 2018, 6, 61-66.	8.7	19
77	Microstructural hardness heterogeneity triggers fatigue crack non-propagation in as-hot-rolled Fe-30Mn-3Si-3Al twinning-induced plasticity steel. <i>International Journal of Fatigue</i> , 2018, 108, 18-24.	5.7	12
78	Fatigue Behavior of Fe-Cr-Ni-based Metastable Austenitic Steels with an Identical Tensile Strength and Different Solute Carbon Contents. <i>ISIJ International</i> , 2018, 58, 1910-1919.	1.4	5
79	Fatigue Behavior of Fe-Cr-Ni-based Metastable Austenitic Steels with an Identical Tensile Strength and Different Solute Carbon Contents. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2018, 104, 88-97.	0.4	1
80	A new design concept for prevention of hydrogen-induced mechanical degradation: viewpoints of metastability and high entropy. <i>Procedia Structural Integrity</i> , 2018, 13, 292-297.	0.8	8
81	Crystallographic orientation-dependent growth mode of microstructurally fatigue small crack in a laminated Ti-6Al-4V alloy. <i>Procedia Structural Integrity</i> , 2018, 13, 694-699.	0.8	5
82	Localized Plasticity and Associated Cracking in Stable and Metastable High-Entropy Alloys Pre-Charged with Hydrogen. <i>Procedia Structural Integrity</i> , 2018, 13, 716-721.	0.8	12
83	Fatigue Crack Growth Behavior and Associated Microstructure in a Metastable High-Entropy Alloy. <i>Procedia Structural Integrity</i> , 2018, 13, 831-836.	0.8	15
84	Re-examination of fatigue crack propagation mechanism under cyclic Mode II loading. <i>Procedia Structural Integrity</i> , 2018, 13, 1026-1031.	0.8	4
85	Effect of Si on temperature dependence of non-propagation limit of small fatigue crack in a Fe-C alloy. <i>Procedia Structural Integrity</i> , 2018, 13, 1032-1036.	0.8	3
86	Small fatigue crack growth in a high entropy alloy. <i>Procedia Structural Integrity</i> , 2018, 13, 1065-1070.	0.8	11
87	Quantification method for parameters affecting multi-scale roughness-induced fatigue crack closure. <i>Procedia Structural Integrity</i> , 2018, 13, 1071-1075.	0.8	2
88	Proposal of fractographic analysis method coupled with EBSD and ECCI. <i>Procedia Structural Integrity</i> , 2018, 13, 1076-1081.	0.8	3
89	Analysis of fatigue crack configuration influence on fatigue life. <i>Procedia Structural Integrity</i> , 2018, 13, 1148-1153.	0.8	2
90	Strain Rate Sensitivity of Microstructural Damage Evolution in a Dual-Phase Steel Pre-Charged with Hydrogen. <i>Procedia Structural Integrity</i> , 2018, 13, 710-715.	0.8	4

#	ARTICLE	IF	CITATIONS
91	The influence of fracture surface contact in fatigue crack propagation of material having texture under Mode II loading. <i>Procedia Structural Integrity</i> , 2018, 13, 1088-1092.	0.8	0
92	Proposal and verification of novel fatigue crack propagation simulation method by finite element method.. <i>Procedia Structural Integrity</i> , 2018, 13, 1154-1158.	0.8	1
93	Influence of shear-affected-zone due to punching on tensile characteristics of steel plate. <i>Procedia Structural Integrity</i> , 2018, 13, 1047-1052.	0.8	0
94	Overview of Dynamic Strain Aging and Associated Phenomena in Fe-Mn-C Austenitic Steels. <i>ISIJ International</i> , 2018, 58, 1383-1395.	1.4	47
95	Split and Shift of μ -martensite Peak in an X-ray Diffraction Profile during Hydrogen Desorption: A Geometric Effect of Atomic Sequence. <i>ISIJ International</i> , 2018, 58, 1745-1747.	1.4	3
96	An unconventional hydrogen effect that suppresses thermal formation of the hcp phase in fcc steels. <i>Scientific Reports</i> , 2018, 8, 16136.	3.3	15
97	Overview of Dynamic Strain Aging and Associated Phenomena in Fe-Mn-C Austenitic Steels. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2018, 104, 187-200.	0.4	6
98	Optical Microscopy-Based Damage Quantification: an Example of Cryogenic Deformation of a Dual-Phase Steel. <i>ISIJ International</i> , 2018, 58, 179-185.	1.4	12
99	Optical full-field strain measurement method from wrapped sampling Moiré phase to minimize the influence of defects and its applications. <i>Optics and Lasers in Engineering</i> , 2018, 110, 155-162.	3.8	27
100	Effect of state of carbon on fatigue properties and dislocation structure of Fe-0.017mass%C alloy. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2018, 732, 212-219.	5.6	6
101	First-Principles Study on Hydrogen Diffusivity in BCC, FCC, and HCP Iron. <i>Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science</i> , 2018, 49, 5015-5022.	2.2	63
102	Influence of Stress Re-distribution on Hydrogen-induced Fatigue Crack Propagation. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2018, 104, 46-53.	0.4	0
103	Microstructural damage evolution and arrest in binary Fe-high-Mn alloys with different deformation temperatures. <i>International Journal of Fracture</i> , 2018, 213, 193-206.	2.2	9
104	Ductile-to-brittle transition in tensile failure due to shear-affected zone with a stress-concentration source: a comparative study on punched-plate tensile-failure characteristics of precipitation-hardened and dual-phase steels. <i>International Journal of Fracture</i> , 2018, 212, 237-248.	2.2	9
105	Effect of shear-affected zone on fatigue crack propagation mode. <i>International Journal of Fatigue</i> , 2018, 116, 36-47.	5.7	8
106	Surface orientation dependence of hydrogen flux in lenticular martensite of an Fe-Ni-C alloy clarified through in situ silver decoration technique. <i>Materials Letters</i> , 2018, 228, 273-276.	2.6	5
107	Roughness-induced stress shielding effect in fatigue crack propagation under Mode II loading. <i>International Journal of Fatigue</i> , 2018, 116, 245-256.	5.7	12
108	Underlying interstitial carbon concentration dependence of transgranular fatigue crack resistance in Fe-C ferritic steels: The kinetic effect viewpoint. <i>International Journal of Fatigue</i> , 2017, 98, 101-110.	5.7	23

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109	Bone-like crack resistance in hierarchical metastable nanolaminate steels. <i>Science</i> , 2017, 355, 1055-1057.	12.6	297
110	Impact of Mn–C couples on fatigue crack growth in austenitic steels: Is the attractive atomic interaction negative or positive?. <i>International Journal of Fatigue</i> , 2017, 99, 1-12.	5.7	21
111	Multiscale in situ deformation experiments: A sequential process from strain localization to failure in a laminated Ti-6Al-4V alloy. <i>Materials Characterization</i> , 2017, 128, 217-225.	4.4	14
112	Effects of martensitic transformability and dynamic strain age hardenability on plasticity in metastable austenitic steels containing carbon. <i>Journal of Materials Science</i> , 2017, 52, 7868-7882.	3.7	38
113	Material property controlling non-propagating fatigue crack length of mechanically and physically short-crack based on Dugdale-model analysis. <i>Theoretical and Applied Fracture Mechanics</i> , 2017, 90, 193-202.	4.7	8
114	Mechanical-probabilistic evaluation of size effect of fatigue life using data obtained from single smooth specimen: An example using Fe-30Mn-4Si-2Al seismic damper alloy. <i>Engineering Failure Analysis</i> , 2017, 72, 34-47.	4.0	11
115	Recent progress in microstructural hydrogen mapping in steels: Quantification, kinetic analysis, and multi-scale characterisation. <i>Materials Science and Technology</i> , 2017, 33, 1481-1496.	1.6	125
116	Characteristics of hydrogen-assisted intergranular fatigue crack growth in interstitial-free steel: role of plastic strain localization. <i>International Journal of Fracture</i> , 2017, 206, 123-130.	2.2	19
117	Effects of lamella size and connectivity on fatigue crack resistance of TRIP-maraging steel. <i>International Journal of Fatigue</i> , 2017, 100, 176-186.	5.7	19
118	Overview of hydrogen embrittlement in high-Mn steels. <i>International Journal of Hydrogen Energy</i> , 2017, 42, 12706-12723.	7.1	228
119	Hydrogen desorption and cracking associated with martensitic transformation in Fe-Cr-Ni-Based austenitic steels with different carbon contents. <i>International Journal of Hydrogen Energy</i> , 2017, 42, 26423-26435.	7.1	39
120	Fatigue crack non-propagation assisted by nitrogen-enhanced dislocation planarity in austenitic stainless steels. <i>International Journal of Fatigue</i> , 2017, 104, 158-170.	5.7	13
121	Room-temperature blue brittleness of Fe-Mn-C austenitic steels. <i>Scripta Materialia</i> , 2017, 141, 20-23.	5.2	37
122	Reply to comments on the paper "In situ observations of silver-decoration evolution under hydrogen permeation: Effects of grain boundary misorientation on hydrogen flux in pure iron" by Gavriljuk and Teus. <i>Scripta Materialia</i> , 2017, 140, 91-92.	5.2	5
123	Threshold stress intensity factor range of a mechanically-long and microstructurally-short crack perpendicular to an interface with plastic mismatch. <i>Engineering Fracture Mechanics</i> , 2017, 182, 287-302.	4.3	11
124	Effects of β -martensitic transformation on crack tip deformation, plastic damage accumulation, and slip plane cracking associated with low-cycle fatigue crack growth. <i>International Journal of Fatigue</i> , 2017, 103, 533-545.	5.7	27
125	Effect of the state of carbon on ductility in Fe-0.017mass%C ferritic steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2017, 701, 120-128.	5.6	9
126	In situ observations of silver-decoration evolution under hydrogen permeation: Effects of grain boundary misorientation on hydrogen flux in pure iron. <i>Scripta Materialia</i> , 2017, 129, 48-51.	5.2	66

#	ARTICLE	IF	CITATIONS
127	Generalized evaluation method for determining transition crack length for microstructurally small to microstructurally large fatigue crack growth: Experimental definition, facilitation, and validation. <i>International Journal of Fatigue</i> , 2017, 95, 38-44.	5.7	14
128	Comparative study on small fatigue crack propagation between Fe-30Mn-3Si-3Al and Fe-23Mn-0.5C twinning-induced plasticity steels: Aspects of non-propagation of small fatigue cracks. <i>International Journal of Fatigue</i> , 2017, 94, 1-5.	5.7	27
129	Interfacial hydrogen localization in austenite/martensite dual-phase steel visualized through optimized silver decoration and scanning Kelvin probe force microscopy. <i>Materials and Corrosion - Werkstoffe Und Korrosion</i> , 2017, 68, 306-310.	1.5	20
130	Two-dimensional Moiré phase analysis for accurate strain distribution measurement and application in crack prediction. <i>Optics Express</i> , 2017, 25, 13465.	3.4	38
131	Intrinsic Factors that Trigger the Coaxing Effect in Binary Fe-C Ferritic Alloys with a Focus on Strain Aging. <i>ISIJ International</i> , 2017, 57, 358-364.	1.4	10
132	Intrinsic Factors That Trigger the Coaxing Effect in Binary Fe-C Ferritic Alloys with a Focus on Strain Aging. <i>Tetsu-To-Hagane/Journal of the Iron and Steel Institute of Japan</i> , 2017, 103, 660-666.	0.4	3
133	Characteristic Fatigue Crack Growth Behavior of Low Carbon Steel under Low-pressure Hydrogen Gas Atmosphere in an Ultra-low Frequency. <i>ISIJ International</i> , 2016, 56, 855-860.	1.4	8
134	Suppression Mechanism of Strain-age-hardening in Carbon Steel Associated with Hydrogen Uptake. <i>ISIJ International</i> , 2016, 56, 1656-1661.	1.4	6
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