

Jaroslav Polak

List of Publications by Year in descending order

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222
papers

4,850
citations

71102

41
h-index

138484

58
g-index

229
all docs

229
docs citations

229
times ranked

1557
citing authors

#	ARTICLE	IF	CITATIONS
1	On the mechanism of fatigue crack initiation in high-angle grain boundaries. <i>International Journal of Fatigue</i> , 2022, 158, 106721.	5.7	27
2	The shape of extrusions and intrusions produced by cyclic straining. <i>International Journal of Materials Research</i> , 2022, 94, 1327-1330.	0.3	0
3	Intergranular fatigue crack initiation in polycrystalline copper. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2022, 848, 143357.	5.6	12
4	The effect of dwell on thermomechanical fatigue in superaustenitic steel Sanicro 25. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 2021, 44, 673-688.	3.4	14
5	Advantageous Description of Short Fatigue Crack Growth Rates in Austenitic Stainless Steels with Distinct Properties. <i>Metals</i> , 2021, 11, 475.	2.3	4
6	Frequency-dependent fatigue damage in polycrystalline copper analyzed by FIB tomography. <i>Acta Materialia</i> , 2021, 211, 116859.	7.9	6
7	Surface relief evolution and fatigue crack initiation in RenÅ© 41 superalloy cycled at room temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2021, 819, 141520.	5.6	12
8	Role of deformation twinning in fatigue of CrCoNi medium-entropy alloy at room temperature. <i>Scripta Materialia</i> , 2021, 202, 113985.	5.2	27
9	Production, annihilation and migration of point defects in cyclic straining. <i>Materialia</i> , 2020, 14, 100938.	2.7	7
10	SEM & STEM Multi-scale Characterization of Fatigue Damage in CrCoNi Medium-entropy Alloy with Fully Recrystallized Microstructure. <i>Microscopy and Microanalysis</i> , 2020, 26, 2224-2225.	0.4	1
11	Cyclic plastic response and damage mechanisms in superaustenitic steel Sanicro 25 in high temperature cycling – Effect of tensile dwells and thermomechanical cycling. <i>Theoretical and Applied Fracture Mechanics</i> , 2020, 108, 102641.	4.7	9
12	Microstructure and martensitic transformation in 316L austenitic steel during multiaxial low cycle fatigue at room temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2019, 767, 138407.	5.6	19
13	Effective and internal stresses in 713LC and Rene 41 superalloys using analysis of the hysteresis loop shape. <i>Procedia Structural Integrity</i> , 2019, 23, 523-528.	0.8	2
14	Cyclic plastic response and damage in superaustenitic steel in high temperature cycling with dwells and in thermomechanical cycling. <i>Procedia Structural Integrity</i> , 2019, 23, 275-280.	0.8	0
15	Initiation and Early Growth of Fatigue Cracks. <i>Minerals, Metals and Materials Series</i> , 2019, , 1125-1135.	0.4	0
16	Damage mechanism in austenitic steel during high temperature cyclic loading with dwells. <i>International Journal of Fatigue</i> , 2018, 113, 335-344.	5.7	30
17	Initiation and growth of short fatigue cracks in austenitic Sanicro 25 steel. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 2018, 41, 1529-1545.	3.4	20
18	Atomic resolution characterization of strengthening nanoparticles in a new high-temperature-capable 43Fe-25Ni-22.5Cr austenitic stainless steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2018, 719, 49-60.	5.6	38

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19	Fatigue crack initiation and growth in 43Fe-25Ni-22.5Cr austenitic steel at a temperature of 700°C. International Journal of Fatigue, 2018, 114, 11-21.	5.7	32
20	Early damage and fatigue crack initiation at ambient and elevated temperatures in heat resistant austenitic steel. MATEC Web of Conferences, 2018, 165, 04008.	0.2	0
21	Fracture and Damage Behavior in an Advanced Heat Resistant Austenitic Stainless Steel During LCF, TMF and CF. Procedia Structural Integrity, 2018, 13, 843-848.	0.8	7
22	Cyclic deformation behaviour and stability of grain-refined 301LN austenitic stainless structure. MATEC Web of Conferences, 2018, 165, 06005.	0.2	4
23	Profiles of persistent slip markings and internal structure of underlying persistent slip bands. Fatigue and Fracture of Engineering Materials and Structures, 2017, 40, 1101-1116.	3.4	42
24	Effect of metallurgical variables on the austenite stability in fatigued AISI 304 type steels. Engineering Fracture Mechanics, 2017, 185, 139-159.	4.3	26
25	Short fatigue crack behaviour under low cycle fatigue regime. International Journal of Fatigue, 2017, 103, 207-215.	5.7	14
26	The role of extrusions and intrusions in fatigue crack initiation. Engineering Fracture Mechanics, 2017, 185, 46-60.	4.3	60
27	Microstructure and dislocation arrangements in Sanicro 25 steel fatigued at ambient and elevated temperatures. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2017, 680, 168-181.	5.6	47
28	On the origin of extraordinary cyclic strengthening of the austenitic stainless steel Sanicro 25 during fatigue at 700 °C. Journal of Materials Research, 2017, 32, 4342-4353.	2.6	18
29	Cyclic response and early damage evolution in multiaxial cyclic loading of 316L austenitic steel. International Journal of Fatigue, 2017, 100, 466-476.	5.7	27
30	Multiaxial elastoplastic cyclic loading of austenitic 316L steel. Frattura Ed Integrita Strutturale, 2017, 11, 162-169.	0.9	2
31	Fatigue of Steels. , 2016, , .		0
32	Formation and Dissolution of γ' Precipitates in IN792 Superalloy at Elevated Temperatures. Metals, 2016, 6, 37.	2.3	6
33	Cyclic Deformation, Crack Initiation, and Low-Cycle Fatigue. , 2016, , .		5
34	Microstructural changes during deformation of AISI 300 grade austenitic stainless steels: Impact of chemical heterogeneity. Procedia Structural Integrity, 2016, 2, 2299-2306.	0.8	23
35	Damage Evolution in Thermomechanical Loading of Stainless Steel. Procedia Structural Integrity, 2016, 2, 3407-3414.	0.8	3
36	Surface Relief and Internal Structure in Fatigued Stainless Sanicro 25 Steel. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 1907-1911.	2.2	20

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37	Surface profile evolution and fatigue crack initiation in Sanicro 25 steel at room temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2016, 658, 221-228.	5.6	18
38	Evolution of the cyclic plastic response of Sanicro 25 steel cycled at ambient and elevated temperatures. <i>International Journal of Fatigue</i> , 2016, 83, 75-83.	5.7	26
39	Thermomechanical fatigue and damage mechanisms in Sanicro 25 steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2016, 650, 52-62.	5.6	46
40	Basic Mechanisms Leading to Fatigue Failure of Structural Materials. <i>Transactions of the Indian Institute of Metals</i> , 2016, 69, 289-294.	1.5	7
41	Mechanical properties of high niobium TiAl alloys doped with Mo and C. <i>Materials and Design</i> , 2016, 99, 284-292.	7.0	44
42	Behaviour of ODS Steels in Cyclic Loading. <i>Transactions of the Indian Institute of Metals</i> , 2016, 69, 309-313.	1.5	3
43	Experimental evidence and physical models of fatigue crack initiation. <i>International Journal of Fatigue</i> , 2016, 91, 294-303.	5.7	49
44	Microstructural stability of ODS steels in cyclic loading. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 2015, 38, 936-947.	3.4	22
45	Influence of dwell times on the thermomechanical fatigue behavior of a directionally solidified Ni-base superalloy. <i>International Journal of Fatigue</i> , 2015, 80, 426-433.	5.7	24
46	Initiation of Stage I Fatigue Cracks – Experiments and Models. <i>Procedia Engineering</i> , 2015, 101, 386-394.	1.2	11
47	AFM and SEM-FEG study on fundamental mechanisms leading to fatigue crack initiation. <i>International Journal of Fatigue</i> , 2015, 76, 11-18.	5.7	35
48	Hysteresis Loop Analysis in Cyclically Strained Materials. <i>Advanced Structured Materials</i> , 2015, , 185-205.	0.5	2
49	Cyclic plastic response of nickel-based superalloy at room and at elevated temperatures*. <i>Materialpruefung/Materials Testing</i> , 2015, 57, 119-125.	2.2	1
50	Quantitative Model of the Surface Relief Formation in Cyclic Straining. <i>Acta Physica Polonica A</i> , 2015, 128, 675-681.	0.5	1
51	Cyclic Plastic Response and Damage in Materials for High Temperature Applications*. <i>Strength of Materials</i> , 2014, 46, 601-607.	0.5	1
52	Analysis of Cyclic Plastic Response of Heat Resistant Sanicro 25 Steel at Ambient and Elevated Temperatures. <i>Procedia Engineering</i> , 2014, 74, 68-73.	1.2	8
53	Monotonic and Cyclic Properties of TiAl Alloys Doped with Nb, Mo and C. <i>Procedia Engineering</i> , 2014, 74, 405-408.	1.2	7
54	LCF Behaviour of Ultrafine Grained 301LN Stainless Steel. <i>Procedia Engineering</i> , 2014, 74, 147-150.	1.2	10

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55	A Comparison of Microstructure Evolution due to Fatigue Loading in Eurofer 97 and ODS Eurofer Steels. <i>Procedia Engineering</i> , 2014, 74, 401-404.	1.2	9
56	Low cycle fatigue behavior of Sanicro25 steel at room and at elevated temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2014, 615, 175-182.	5.6	56
57	Precipitate microstructure evolution in exposed IN738LC superalloy. <i>Journal of Alloys and Compounds</i> , 2014, 589, 462-471.	5.5	12
58	Mechanisms of extrusion and intrusion formation in fatigued crystalline materials. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2014, 596, 15-24.	5.6	79
59	Fatigue crack initiation – The role of point defects. <i>International Journal of Fatigue</i> , 2014, 65, 18-27.	5.7	53
60	Analysis of cyclic plastic response of nickel based IN738LC superalloy. <i>International Journal of Fatigue</i> , 2014, 65, 44-50.	5.7	10
61	Mechanisms of High Temperature Damage in Elastoplastic Cyclic Loading of Nickel Superalloys and TiAl Intermetallics. <i>Procedia Engineering</i> , 2013, 55, 114-122.	1.2	3
62	The shape of early persistent slip markings in fatigued 316L steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2013, 564, 8-12.	5.6	19
63	Misfit in Inconel-Type Superalloy. <i>Advances in Materials Science and Engineering</i> , 2013, 2013, 1-7.	1.8	9
64	Damage Evolution During Fatigue in Structural Materials. , 2012, 1, 3-12.		4
65	Initiation and short crack growth in austenitic–ferritic duplex steel – effect of positive mean stress. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 2012, 35, 257-268.	3.4	11
66	Fatigue behavior of ferritic–pearlitic–bainitic steel in loading with positive mean stress. <i>International Journal of Fatigue</i> , 2012, 39, 103-108.	5.7	13
67	Study of cyclic strain localization and fatigue crack initiation using FIB technique. <i>International Journal of Fatigue</i> , 2012, 39, 44-53.	5.7	77
68	Fatigue behavior of coated and uncoated cast Inconel 713LC at 800°C. <i>International Journal of Fatigue</i> , 2012, 41, 101-106.	5.7	21
69	Cyclic plasticity, cyclic creep and fatigue life of duplex stainless steel in cyclic loading with positive mean stress. <i>Metallic Materials</i> , 2011, 49, 347-354.	0.3	1
70	Microstructure of austenitic stainless steels of various phase stabilities after cyclic and tensile deformation. <i>International Journal of Materials Research</i> , 2011, 102, 1374-1377.	0.3	14
71	Fatigue cracks in Eurofer 97 steel: Part I. Nucleation and small crack growth kinetics. <i>Journal of Nuclear Materials</i> , 2011, 412, 2-6.	2.7	13
72	Fatigue cracks in Eurofer 97 steel: Part II. Comparison of small and long fatigue crack growth. <i>Journal of Nuclear Materials</i> , 2011, 412, 7-12.	2.7	9

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73	Cyclic plastic response and fatigue life in symmetric and asymmetric cyclic loading. <i>Procedia Engineering</i> , 2011, 10, 568-577.	1.2	13
74	Stability of austenitic 316L steel against martensite formation during cyclic straining. <i>Procedia Engineering</i> , 2011, 10, 1279-1284.	1.2	39
75	Effect of Al and Al-Si diffusion coating on the low cycle fatigue behavior of Inconel 713LC. <i>Procedia Engineering</i> , 2011, 10, 1360-1365.	1.2	2
76	Cyclic plasticity and strain localization in cast $\hat{\text{T}}^3\text{-TiAl}$ based alloy. <i>Procedia Engineering</i> , 2011, 10, 1390-1395.	1.2	6
77	Fatigue behaviour and surface relief in ODS steels. <i>Procedia Engineering</i> , 2011, 10, 1685-1690.	1.2	6
78	Cyclic plasticity and internal dislocation structure in two-phase alloy. <i>Journal of Physics: Conference Series</i> , 2010, 240, 012045.	0.4	0
79	Application of FIB technique to study of early fatigue damage in polycrystals. <i>Journal of Physics: Conference Series</i> , 2010, 240, 012058.	0.4	0
80	Extrusion and intrusion evolution in cyclically strained cast superalloy Inconel 738LC using confocal laser scanning microscope and AFM. <i>Journal of Physics: Conference Series</i> , 2010, 240, 012054.	0.4	3
81	Fatigue properties of high Nb TiAl alloy. <i>Journal of Physics: Conference Series</i> , 2010, 240, 012057.	0.4	1
82	Fatigue behaviour of ODS ferritic-martensitic Eurofer steel. <i>Procedia Engineering</i> , 2010, 2, 717-724.	1.2	16
83	Short crack growth in polycrystalline materials. <i>Procedia Engineering</i> , 2010, 2, 883-892.	1.2	31
84	AFM study of surface relief evolution in 316L steel fatigued at low and high temperatures. <i>Procedia Engineering</i> , 2010, 2, 1625-1633.	1.2	15
85	Effect of Al-Si diffusion coating on the fatigue behavior of cast Inconel 713LC at $\hat{\text{T}}^3\text{-TiAl}$ based alloy. <i>Procedia Engineering</i> , 2011, 10, 1360-1365.	1.2	8
86	Influence of niobium alloying on the low cycle fatigue of cast TiAl alloys at room and high temperatures. <i>Procedia Engineering</i> , 2010, 2, 2297-2305.	1.2	18
87	Cyclic plastic response and fatigue life in superduplex 2507 stainless steel. <i>International Journal of Fatigue</i> , 2010, 32, 279-287.	5.7	19
88	Small fatigue crack growth in aluminium alloy EN-AW 6082/T6. <i>International Journal of Fatigue</i> , 2010, 32, 1913-1920.	5.7	34
89	The shape of extrusions and intrusions and initiation of stage I fatigue cracks. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2009, 517, 204-211.	5.6	63
90	Isothermal fatigue behavior of cast superalloy Inconel 792-5A at 23 and 900 $\hat{\text{A}}^\circ\text{C}$. <i>Journal of Materials Science</i> , 2009, 44, 3305-3314.	3.7	19

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91	Growth of extrusions in localized cyclic plastic straining. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2009, 500, 122-129.	5.6	55
92	Extrusions and intrusions in fatigued metals. Part 1. State of the art and history. Philosophical Magazine, 2009, 89, 1295-1336.	1.6	154
93	Extrusions and intrusions in fatigued metals. Part 2. AFM and EBSD study of the early growth of extrusions and intrusions in 316L steel fatigued at room temperature. Philosophical Magazine, 2009, 89, 1337-1372.	1.6	77
94	Low-cycle fatigue properties of TiAl alloy with high Nb content. International Journal of Materials Research, 2009, 100, 349-352.	0.3	12
95	Dislocation Structures in Nickel Based Superalloy Inconel 792-5A Fatigued at Room Temperature and 700°C. Materials Science Forum, 2008, 567-568, 429-432.	0.3	5
96	Cyclic Stress in 316L Austenitic Stainless Steel at Low Temperatures. Materials Science Forum, 2008, 567-568, 401-404.	0.3	2
97	Half-cycle slip activity of persistent slip bands at different stages of fatigue life of polycrystalline nickel. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2008, 492, 118-127.	5.6	35
98	Cyclic Plastic Response and Fatigue Life of Materials. Key Engineering Materials, 2007, 348-349, 113-116.	0.4	3
99	Growth of Short Fatigue Cracks Emanating from Notches in an Austenitic-Ferritic Stainless Steel. Key Engineering Materials, 2007, 348-349, 117-120.	0.4	1
100	Effect of Temperature on the Low Cycle Fatigue of Cast Inconel 792-5A. Key Engineering Materials, 2007, 345-346, 383-386.	0.4	6
101	Fatigue Crack Initiation in Crystalline Materials – Experimental Evidence and Models. Key Engineering Materials, 2007, 345-346, 379-382.	0.4	6
102	Fatigue of Steels. , 2007, , 504-537.		8
103	High Temperature Low Cycle Fatigue of Superalloys Inconel 713LC and Inconel 792-5A. Key Engineering Materials, 2007, 348-349, 101-104.	0.4	12
104	Mechanisms and kinetics of the early fatigue damage in crystalline materials. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2007, 468-470, 33-39.	5.6	30
105	Effect of Plasma Nitriding on Fatigue Behavior of 316L Stainless Steel. , 2006, , 224-228.		0
106	Dislocation structures in cyclically strained X10CrAl24 ferritic steel. Acta Materialia, 2006, 54, 3429-3443.	7.9	51
107	In situ neutron diffraction study of the low cycle fatigue of the γ/α duplex stainless steel. Physica B: Condensed Matter, 2006, 385-386, 597-599.	2.7	8
108	Dislocation Arrangements in Cyclically Strained Inconel 713LC. , 2006, , 883-884.		1

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109	Mechanisms of the Early Fatigue Damage in Metallic Materials. Communications - Scientific Letters of the University of Zilina, 2006, 8, 5-9.	0.6	0
110	Plastic strain-controlled short crack growth and fatigue life. International Journal of Fatigue, 2005, 27, 1192-1201.	5.7	47
111	Dislocation structure and surface relief in fatigued metals. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2005, 400-401, 405-408.	5.6	10
112	Short crack growth and fatigue life in austenitic-ferritic duplex stainless steel. Fatigue and Fracture of Engineering Materials and Structures, 2005, 28, 923-935.	3.4	77
113	Inhomogeneous dislocation structure in fatigued INCONEL 713 LC superalloy at room and elevated temperatures. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2005, 400-401, 485-488.	5.6	58
114	Dislocation Structures of Duplex Stainless Steel in Uniaxial and Biaxial Cyclic Loading. Materials Science Forum, 2005, 482, 179-182.	0.3	2
115	Atomic Force Microscopy Study of the Early Fatigue Damage. Materials Science Forum, 2005, 482, 45-50.	0.3	6
116	AFM and TEM study of cyclic slip localization in fatigued ferritic X10CrAl24 stainless steel. Acta Materialia, 2004, 52, 5551-5561.	7.9	80
117	Cyclic Deformation, Crack Initiation, and Low-cycle Fatigue. , 2003, , 1-39.		36
118	AFM evidence of surface relief formation and models of fatigue crack nucleation. International Journal of Fatigue, 2003, 25, 1027-1036.	5.7	86
119	Study of surface relief evolution in fatigued 316L austenitic stainless steel by AFM. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2003, 351, 123-132.	5.6	104
120	OS05W0314 Atomic force microscopy and high resolution scanning electron microscopy evidence concerning fatigue crack nucleation. The Abstracts of ATEM International Conference on Advanced Technology in Experimental Mechanics Asian Conference on Experimental Mechanics, 2003, 2003.2, OS05W0314- OS05W0314.	0.0	1
121	The shape of extrusions and intrusions produced by cyclic straining. International Journal of Materials Research, 2003, 94, 1327-1330.	0.8	22
122	OS5(3)-10(OS05W0314) Atomic Force Microscopy and High Resolution Scanning Electron Microscopy Evidence Concerning Fatigue Crack Nucleation. The Abstracts of ATEM International Conference on Advanced Technology in Experimental Mechanics Asian Conference on Experimental Mechanics, 2003, 2003, 96.	0.0	0
123	On the analysis of the hysteresis loop of ferritic steel in cyclic straining. Scripta Materialia, 2002, 47, 731-736.	5.2	11
124	Atomic force microscopy of surface relief in individual grains of fatigued 316L austenitic stainless steel. Acta Materialia, 2002, 50, 3767-3780.	7.9	129
125	Analysis of the hysteresis loop in stainless steels I. Austenitic and ferritic steels. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2001, 297, 144-153.	5.6	47
126	Fatigue softening of X10CrAl24 ferritic steel. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 2001, 319-321, 564-568.	5.6	46

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127	Analysis of the hysteresis loop in stainless steels II. Austenitic-ferritic duplex steel and the effect of nitrogen. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2001, 297, 154-161.	5.6	30
128	Microstructure in 316LN stainless steel fatigued at low temperature. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2000, 293, 275-280.	5.6	43
129	Effect Of Hardcor Surface Treatment On Fatigue Behaviour of 316L Austenitic Stainless Steel. <i>Journal of the Mechanical Behavior of Materials</i> , 1999, 10, 311-324.	1.8	0
130	TENSILE AND LCF PROPERTIES OF AISI 316LN SS AT 300 AND 77 K. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 1998, 21, 651-660.	3.4	38
131	Low cycle fatigue of superalloy single crystals CMSX-4. , 1998, , 33-38.		5
132	Topography of the crack nuclei at the emerging persistent slip band in austenitic 316L steel. , 1998, , 559-564.		6
133	Cyclic strain localisation, crack nucleation and short crack growth. , 1998, , 493-504.		0
134	Low-cycle fatigue behaviour of A 316LN stainless steel at 77 K and associated structural transformation. , 1998, , 309-314.		0
135	Fatigue life curves of materials and the growth of short cracks. , 1998, , 529-534.		1
136	The evaluation of internal and effective stresses during low cycle fatigue in stainless steels. , 1998, , 81-86.		0
137	Short fatigue crack behaviour in 316L stainless steel. <i>International Journal of Fatigue</i> , 1997, 19, 471-475.	5.7	74
138	Dislocation structures in the bands of localised cyclic plastic strain in austenitic 316L and austenitic-ferritic duplex stainless steels. <i>Acta Materialia</i> , 1997, 45, 5145-5151.	7.9	94
139	Fatigue crack initiation in fibre-metal laminate glare 2. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 1997, 234-236, 621-624.	5.6	24
140	Internal and effective stress analysis in stainless steels using the statistical approach method. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 1997, 234-236, 456-458.	5.6	10
141	Short crack growth kinetics and fatigue life of materials. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 1997, 234-236, 970-973.	5.6	15
142	Orientation dependence of surface relief topography in fatigued copper single crystals. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 1997, 234-236, 727-730.	5.6	13
143	Effective and internal stresses in cyclic straining of 316 stainless steel. <i>Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 1996, 215, 104-112.	5.6	37
144	FATIGUE DAMAGE IN TWO STEP LOADING OF 316L STEEL I. EVOLUTION OF PERSISTENT SLIP BANDS. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 1996, 19, 147-155.	3.4	23

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145	FATIGUE DAMAGE IN TWO-STEP LOADING OF 316L STEEL II. SHORT CRACK GROWTH. Fatigue and Fracture of Engineering Materials and Structures, 1996, 19, 157-163.	3.4	24
146	Short Crack Growth in 1441 and 1450 Al-Li Alloys. Materials Science Forum, 1996, 217-222, 1429-1434.	0.3	0
147	FATIGUE DAMAGE IN AUSTENITIC-FERRITIC DUPLEX STAINLESS STEELS. Fatigue and Fracture of Engineering Materials and Structures, 1995, 18, 65-77.	3.4	44
148	Dislocation structures in 316L stainless steel cycled with plastic strain amplitudes over a wide interval. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1994, 187, 1-9.	5.6	112
149	Fatigue damage in polycrystalline copper below the fatigue limit. International Journal of Fatigue, 1994, 16, 403-408.	5.7	17
150	CYCLIC PLASTICITY IN TYPE 316L AUSTENITIC STAINLESS STEEL. Fatigue and Fracture of Engineering Materials and Structures, 1994, 17, 773-782.	3.4	70
151	Dislocation structures in polycrystalline copper cycled at low plastic strain amplitudes. Scripta Metallurgica Et Materialia, 1993, 28, 495-499.	1.0	8
152	Dislocation substructure in fatigued duplex stainless steel. Scripta Metallurgica Et Materialia, 1993, 29, 1553-1558.	1.0	20
153	Lattice Defects in the Process of Fatigue in Crystalline Materials. Solid State Phenomena, 1993, 35-36, 405-410.	0.3	3
154	The role of cyclic slip localization in fatigue damage of materials. European Physical Journal Special Topics, 1993, 03, C7-679-C7-684.	0.2	2
155	Cyclic softening in annealed polycrystalline copper. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1992, 154, L15-L18.	5.6	5
156	Cyclic stress-strain response of polycrystalline copper in a wide range of plastic strain amplitudes. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1992, 151, 19-27.	5.6	57
157	ANALYSIS OF THE CYCLIC STRESS-STRAIN RESPONSE IN VARIABLE AMPLITUDE LOADING USING THE RAIN-FLOW METHOD. , 1992, , 123-131.		0
158	Dynamics of Cyclic Plastic Straining in Copper Single Crystals. , 1992, , 172-177.		0
159	Cyclic strain localization in polycrystalline copper at room temperature and low temperatures. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1991, 132, 67-76.	5.6	31
160	Cyclic stress-strain curve evaluation using incremental step test procedure. International Journal of Fatigue, 1991, 13, 216-222.	5.7	18
161	LOW CYCLE FATIGUE DAMAGE ACCUMULATION IN ARMCO-IRON. Fatigue and Fracture of Engineering Materials and Structures, 1991, 14, 193-204.	3.4	37
162	NUCLEATION AND SHORT CRACK GROWTH IN FATIGUED POLYCRYSTALLINE COPPER. Fatigue and Fracture of Engineering Materials and Structures, 1990, 13, 119-133.	3.4	74

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163	Hardness of fatigued copper polycrystals and their relation to their dislocation structure. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1990, 124, L7-L10.	5.6	3
164	Cyclic strain localization in copper single crystals and polycrystals. Scripta Metallurgica Et Materialia, 1990, 24, 415-419.	1.0	17
165	Method of calculating the endurance of specimens with a stress raiser. 2. Strength of Materials, 1989, 21, 1245-1248.	0.5	2
166	Surface Relief and Dislocation Structure in Fatigued Copper Single Crystal. , 1989, , 761-766.		1
167	Nucleation stress for persistent slip bands in fatigued copper single crystals. Materials Science & Engineering A: Structural Materials: Properties, Microstructure and Processing, 1988, 101, 7-12.	5.6	47
168	Nucleation stress for persistent slip bands in fatigued copper single crystals. Materials Science and Engineering, 1988, 101, 7-12.	0.1	1
169	Resistivity of fatigued copper single crystals. Materials Science and Engineering, 1987, 89, 35-43.	0.1	47
170	On the role of point defects in fatigue crack initiation. Materials Science and Engineering, 1987, 92, 71-80.	0.1	131
171	CYCLIC STRESS-STRAIN RESPONSE OF 2 1/4Cr-1 Mo STEEL AT ELEVATED TEMPERATURES. Fatigue and Fracture of Engineering Materials and Structures, 1986, 9, 185-194.	3.4	5
172	FATIGUE GROWTH OF SURFACE CRACKS IN THE ELASTIC-PLASTIC REGION. Fatigue and Fracture of Engineering Materials and Structures, 1985, 8, 23-31.	3.4	13
173	Surface topography and crack initiation in emerging persistent slip bands in copper single crystals. Materials Science and Engineering, 1985, 74, 85-91.	0.1	70
174	Cyclic stress-strain response and dislocation structures in polycrystalline copper. Materials Science and Engineering, 1984, 63, 189-196.	0.1	62
175	Short crack growth close to the fatigue limit in low carbon steel. Scripta Metallurgica, 1984, 18, 1231-1234.	1.2	14
176	Stress and strain concentration factor evaluation using the equivalent energy concept. Materials Science and Engineering, 1983, 61, 195-200.	0.1	21
177	On the cyclic stress-strain response of copper at low stress amplitudes. Scripta Metallurgica, 1982, 16, 1235-1238.	1.2	7
178	THE HYSTERESIS LOOP 1. A STATISTICAL THEORY. Fatigue and Fracture of Engineering Materials and Structures, 1982, 5, 19-32.	3.4	67
179	THE HYSTERESIS LOOP 2. AN ANALYSIS OF THE LOOP SHAPE. Fatigue and Fracture of Engineering Materials and Structures, 1982, 5, 33-44.	3.4	41
180	THE HYSTERESIS LOOP 3. STRESS-DIP EXPERIMENTS. Fatigue and Fracture of Engineering Materials and Structures, 1982, 5, 45-56.	3.4	14

#	ARTICLE	IF	CITATIONS
181	CYCLIC PLASTICITY AND LOW CYCLE FATIGUE LIFE IN VARIABLE AMPLITUDE LOADING. <i>Fatigue and Fracture of Engineering Materials and Structures</i> , 1979, 1, 123-133.	3.4	17
182	Stress dip technique for effective stress determination in cyclic straining. <i>Scripta Metallurgica</i> , 1979, 13, 847-850.	1.2	14
183	On the cyclic stress-strain curve evaluation in low cycle fatigue. <i>Materials Science and Engineering</i> , 1977, 28, 109-117.	0.1	47
184	The dynamics of cyclic plastic deformation and fatigue life of low carbon steel at low temperatures. <i>Materials Science and Engineering</i> , 1976, 26, 157-166.	0.1	28
185	On the fatigue crack growth rate evaluation from experimental data. <i>International Journal of Fracture</i> , 1975, 11, 693-696.	2.2	9
186	High cycle plastic stress-strain response of metals. <i>Materials Science and Engineering</i> , 1974, 15, 231-237.	0.1	50
187	High cycle fatigue life of metals. <i>Materials Science and Engineering</i> , 1974, 15, 239-245.	0.1	85
188	Anihilation of positrons in cold-worked copper polycrystals. <i>European Physical Journal D</i> , 1974, 24, 825-826.	0.4	1
189	The effect of the strain amplitude changes on the stress amplitude and resistivity of torsionally fatigued copper. <i>European Physical Journal D</i> , 1973, 23, 322-330.	0.4	13
190	Change of electrical resistivity of polycrystalline copper during tensile deformation. <i>European Physical Journal D</i> , 1972, 22, 476-484.	0.4	5
191	Electrical resistance of platinum wires during annealing and quenching in air and helium. <i>European Physical Journal D</i> , 1971, 21, 269-274.	0.4	10
192	Stage III Recovery of Copper Heavily Deformed in Torsion. <i>Physica Status Solidi (B): Basic Research</i> , 1970, 40, 677-685.	1.5	11
193	The effect of intermediate annealing on the electrical resistivity and shear stress of fatigued copper. <i>Scripta Metallurgica</i> , 1970, 4, 761-764.	1.2	41
194	Electrical resistivity of cyclically deformed copper. <i>European Physical Journal D</i> , 1969, 19, 315-322.	0.4	88
195	Quenched-in vacancies in nickel. <i>European Physical Journal D</i> , 1969, 19, 133-135.	0.4	1
196	Thermal Quasi-Equilibrium of Vacancies, Divacancies, and Impurities in Platinum. <i>Physica Status Solidi (B): Basic Research</i> , 1968, 28, 773-782.	1.5	2
197	Least-square determination of the binding energy of a divacancy in platinum from the isothermal annealing curves. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 1967, 24, 649-650.	2.1	7
198	Kinetics of Quenched-in Vacancies in Pure Platinum. <i>Physica Status Solidi (B): Basic Research</i> , 1967, 21, 581-591.	1.5	23

#	ARTICLE	IF	CITATIONS
199	Calculation of the electrical resistivity and the thermoelectric power of vacancies in copper and gold. European Physical Journal D, 1967, 17, 171-177.	0.4	7
200	Electrical Resistivity and Thermoelectric Power of Stacking Faults in Gold. Physica Status Solidi (B): Basic Research, 1965, 11, 673-681.	1.5	5
201	Change of absolute thermoelectric power of gold and platinum due to lattice defects. European Physical Journal D, 1964, 14, 176-188.	0.4	9
202	Influence of lattice imperfections on thermoelectric power of pure gold. European Physical Journal D, 1963, 13, 616-618.	0.4	5
203	Thermoelectric power of quenched platinum. European Physical Journal D, 1962, 12, 492-493.	0.4	2
204	Low Cycle Fatigue of Cast Superalloy Inconel 738LC at High Temperature. Key Engineering Materials, 0, 385-387, 581-584.	0.4	15
205	Cyclic Response and Fatigue Life of TiAl Alloys at High Temperatures. Key Engineering Materials, 0, 417-418, 585-588.	0.4	3
206	Fatigue Behavior of Ferritic-Pearlitic-Bainitic Steel " Effect of Positive Mean Stress. Key Engineering Materials, 0, 417-418, 577-580.	0.4	0
207	Fatigue Crack Propagation Rate in EUROFER 97 Estimated Using Small Specimens. Key Engineering Materials, 0, 452-453, 325-328.	0.4	2
208	Low Cycle Fatigue Behavior of Cast Superalloy Inconel 713LC with Al Coating at 800 °C. Key Engineering Materials, 0, 452-453, 265-268.	0.4	1
209	Low Cycle Fatigue of Cast $\hat{3}$ -TiAl Based Alloys at High Temperature. Key Engineering Materials, 0, 452-453, 421-424.	0.4	4
210	Low Cycle Fatigue Behaviour of ODS Steels for Nuclear Application. Key Engineering Materials, 0, 465, 556-559.	0.4	6
211	Influence of Al-Si Diffusion Coating on Low Cycle Fatigue Properties of Cast Superalloy Inconel 738LC at 800 °C. Key Engineering Materials, 0, 488-489, 307-310.	0.4	0
212	Effect of Temperature on the Cyclic Stress Components of Gamma - TiAl Based Alloy with Niobium Alloying. Key Engineering Materials, 0, 465, 447-450.	0.4	2
213	Analysis of the Effective and Internal Cyclic Stress Components in the Inconel Superalloy Fatigued at Elevated Temperature. Advanced Materials Research, 0, 278, 393-398.	0.3	6
214	Cyclic Plasticity and Cyclic Creep in Austenitic-Ferritic Duplex Steel. Key Engineering Materials, 0, 465, 431-434.	0.4	0
215	Effect of Tensile Dwell on Low Cycle Fatigue of Cast Superalloy Inconel 792-5A at 800°C. Key Engineering Materials, 0, 488-489, 735-738.	0.4	0
216	Slip Activity of Persistent Slip Bands in early Stages of Fatigue Life of Austenitic 316L Steel. Key Engineering Materials, 0, 592-593, 785-788.	0.4	0

#	ARTICLE	IF	CITATIONS
217	The True Shape of Persistent Slip Markings in Fatigued Metals. Key Engineering Materials, 0, 592-593, 781-784.	0.4	2
218	Cyclic Slip Localization and Crack Initiation in Crystalline Materials. Advanced Materials Research, 0, 891-892, 452-457.	0.3	1
219	AFM and FIB Study of Cyclic Strain Localization and Surface Relief Evolution in Fatigued f.c.c. Polycrystals. Advanced Materials Research, 0, 891-892, 524-529.	0.3	4
220	<i>In Situ&/i> Study of the Mechanisms of High Temperature Damage in Elastic-Plastic Cyclic Loading of Nickel Superalloy. Advanced Materials Research, 0, 891-892, 530-535.	0.3	5
221	Surface Relief Formation in Relation to the Underlying Dislocation Arrangement. Solid State Phenomena, 0, 258, 526-529.	0.3	2
222	High Temperature Low Cycle Fatigue of Superalloys Inconel 713LC and Inconel 792-5A. Key Engineering Materials, 0, , 101-104.	0.4	1