

Herwig Peterlik

List of Publications by Year in Descending Order

Source: <https://exaly.com/author-pdf/3407647/herwig-peterlik-publications-by-year.pdf>

Version: 2024-04-25

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

200
papers

5,537
citations

39
h-index

68
g-index

209
ext. papers

6,073
ext. citations

5.4
avg, IF

5.5
L-index

#	Paper	IF	Citations
200	Grasping the Lithium hype: Insights into modern dental Lithium Silicate glass-ceramics.. <i>Dental Materials</i> , 2021 ,	5.7	8
199	Carbon Nano-onions: Potassium Intercalation and Reductive Covalent Functionalization. <i>Journal of the American Chemical Society</i> , 2021 , 143, 18997-19007	16.4	0
198	Controlling the Formation of Sodium/Black Phosphorus Intercalation Compounds Towards High Sodium Content. <i>Batteries and Supercaps</i> , 2021 , 4, 1304-1309	5.6	1
197	Influence of DVB as linker molecule on the micropore formation in polymer-derived SiCN ceramics. <i>Journal of the European Ceramic Society</i> , 2021 , 41, 3292-3302	6	3
196	Relationships between fracture toughness, Y2O3 fraction and phases content in modern dental Yttria-doped zirconias. <i>Journal of the European Ceramic Society</i> , 2021 ,	6	4
195	In-situ small angle X-ray scattering (SAXS) A versatile tool for clarifying the evolution of microporosity in polymer-derived ceramics. <i>Microporous and Mesoporous Materials</i> , 2021 , 324, 111268	5.3	1
194	Toughening by revitrification of LiSiO crystals in Obsidian dental glass-ceramic. <i>Journal of the Mechanical Behavior of Biomedical Materials</i> , 2021 , 124, 104739	4.1	3
193	Epoxy Resin Nanocomposites: The Influence of Interface Modification on the Dispersion Structure A Small-Angle-X-ray-Scattering Study. <i>Surfaces</i> , 2020 , 3, 664-682	2.9	4
192	Porosity at Different Structural Levels in Human and Yak Belly Hair and Its Effect on Hair Dyeing. <i>Molecules</i> , 2020 , 25,	4.8	3
191	Ageing bone fractures: The case of a ductile to brittle transition that shifts with age. <i>Bone</i> , 2020 , 131, 115176	4.7	9
190	Gitteröffnung durch reduktive kovalente Volumen-Funktionalisierung von schwarzem Phosphor. <i>Angewandte Chemie</i> , 2019 , 131, 5820-5826	3.6	10
189	Lattice Opening upon Bulk Reductive Covalent Functionalization of Black Phosphorus. <i>Angewandte Chemie - International Edition</i> , 2019 , 58, 5763-5768	16.4	42
188	Exchange coupling in a frustrated trimetric molecular magnet reversed by a 1D nano-confinement. <i>Nanoscale</i> , 2019 , 11, 10615-10621	7.7	9
187	Crystalline meso-/macroporous magnesium oxide prepared by a nanocasting route. <i>Journal of Supercritical Fluids</i> , 2019 , 152, 104549	4.2	1
186	Biphenyl-Bridged Organosilica as a Precursor for Mesoporous Silicon Oxycarbide and Its Application in Lithium and Sodium Ion Batteries. <i>Nanomaterials</i> , 2019 , 9,	5.4	8
185	Ni ²⁺ /Fe ³⁺ cyanometallate structures covalently embedded in silica: Influence of the blocking ligand at Ni ²⁺ . <i>Inorganica Chimica Acta</i> , 2019 , 487, 456-464	2.7	1
184	Hamilton Receptor-Mediated Self-Assembly of Orthogonally Functionalized Au and TiO ₂ Nanoparticles. <i>Helvetica Chimica Acta</i> , 2019 , 102, e1900015	2	5

183	Surface-Active Ionic Liquids in Catalytic Water Splitting. <i>Australian Journal of Chemistry</i> , 2019 , 72, 34	1.2	7
182	Ovalbumin Epitope SIINFEKL Self-Assembles into a Supramolecular Hydrogel. <i>Scientific Reports</i> , 2019 , 9, 2696	4.9	1
181	Pitfalls of determining the elastic properties of stabilized zirconia with indentation methods. <i>Ceramics International</i> , 2019 , 45, 9491-9496	5.1	2
180	Fracture anisotropy in texturized lithium disilicate glass-ceramics. <i>Journal of Non-Crystalline Solids</i> , 2018 , 481, 457-469	3.9	30
179	Calcium Doping Facilitates Water Dissociation in Magnesium Oxide. <i>Advanced Sustainable Systems</i> , 2018 , 2, 1700096	5.9	12
178	Cycle Stability and Hydration Behavior of Magnesium Oxide and Its Dependence on the Precursor-Related Particle Morphology. <i>Nanomaterials</i> , 2018 , 8,	5.4	11
177	Silaffin-Inspired Peptide Assemblies Template Silica Particles with Variable Morphologies. <i>ChemNanoMat</i> , 2018 , 4, 1209-1213	3.5	4
176	Thermochemical Energy Storage: Calcium Doping Facilitates Water Dissociation in Magnesium Oxide (Adv. Sustainable Syst. 1/2018). <i>Advanced Sustainable Systems</i> , 2018 , 2, 1870004	5.9	
175	Precise determination of graphene functionalization by in situ Raman spectroscopy. <i>Nature Communications</i> , 2017 , 8, 15192	17.4	105
174	Chairside CAD/CAM materials. Part 1: Measurement of elastic constants and microstructural characterization. <i>Dental Materials</i> , 2017 , 33, 84-98	5.7	190
173	Doping of metal-organic frameworks towards resistive sensing. <i>Scientific Reports</i> , 2017 , 7, 2439	4.9	34
172	Unifying Principles of the Reductive Covalent Graphene Functionalization. <i>Journal of the American Chemical Society</i> , 2017 , 139, 5175-5182	16.4	48
171	Exploring the Formation of Black Phosphorus Intercalation Compounds with Alkali Metals. <i>Angewandte Chemie</i> , 2017 , 129, 15469-15475	3.6	12
170	Exploring the Formation of Black Phosphorus Intercalation Compounds with Alkali Metals. <i>Angewandte Chemie - International Edition</i> , 2017 , 56, 15267-15273	16.4	53
169	Micro-/Mesoporous Polymer-Derived Ceramic Structures Using Molecular Porogens. <i>Key Engineering Materials</i> , 2017 , 742, 310-316	0.4	1
168	Solvent-driven electron trapping and mass transport in reduced graphites to access perfect graphene. <i>Nature Communications</i> , 2016 , 7, 12411	17.4	45
167	Hierarchically Mesostructured Polyisobutylene-Based Ionic Liquids. <i>Macromolecular Rapid Communications</i> , 2016 , 37, 1175-80	4.8	3
166	Reaction of bone nanostructure to a biodegrading Magnesium WZ21 implant - A scanning small-angle X-ray scattering time study. <i>Acta Biomaterialia</i> , 2016 , 31, 448-457	10.8	21

165	Self-supporting hierarchically organized silicon networks via magnesiothermic reduction. <i>Monatshefte für Chemie</i> , 2016 , 147, 269-278	1.4	7
164	Single Carbon Fibres: Structure from X-ray Diffraction and Nanomechanical Properties. <i>CISM International Centre for Mechanical Sciences, Courses and Lectures</i> , 2016 , 1-28	0.6	
163	Asymmetric polysilazane-derived ceramic structures with multiscalar porosity for membrane applications. <i>Microporous and Mesoporous Materials</i> , 2016 , 232, 196-204	5.3	19
162	Confined linear carbon chains as a route to bulk-carbyne. <i>Nature Materials</i> , 2016 , 15, 634-9	27	250
161	Potassium intercalated multiwalled carbon nanotubes. <i>Carbon</i> , 2016 , 105, 90-95	10.4	14
160	Surface-active ionic liquids in micellar catalysis: impact of anion selection on reaction rates in nucleophilic substitutions. <i>Physical Chemistry Chemical Physics</i> , 2016 , 18, 13375-84	3.6	59
159	Hierarchically organized silica monoliths: influence of different acids on macro- and mesoporous formation. <i>Journal of Sol-Gel Science and Technology</i> , 2015 , 73, 103-111	2.3	7
158	Structural transformations of heat-treated bacterial iron oxide. <i>Materials Chemistry and Physics</i> , 2015 , 155, 67-75	4.4	12
157	Investigation of microemulsion microstructure and its impact on skin delivery of flufenamic acid. <i>International Journal of Pharmaceutics</i> , 2015 , 490, 292-7	6.5	19
156	Ordered meso-/macroporous silica and titania films by breath figure templating in combination with non-hydrolytic sol-gel processing. <i>Microporous and Mesoporous Materials</i> , 2015 , 217, 233-243	5.3	5
155	Formation of RuO ₂ nanoparticles by thermal decomposition of Ru(NO)(NO ₃) ₃ . <i>Ceramics International</i> , 2015 , 41, 7811-7815	5.1	13
154	Different synthesis protocols for Co ₃ O ₄ -CeO ₂ catalysts--part 1: influence on the morphology on the nanoscale. <i>Chemistry - A European Journal</i> , 2015 , 21, 885-92	4.8	24
153	SAXS and in-situ SAXS to follow the structural evolution in hybrid materials. <i>Materials Research Society Symposia Proceedings</i> , 2015 , 1754, 3-11		1
152	Nucleophilic substitution on silica surfaces: Comparison of the reactivity of α - versus γ -chlorosubstituted silanes in the reaction with sodium azide. <i>Journal of the Ceramic Society of Japan</i> , 2015 , 123, 764-769	1	5
151	Nickel clusters embedded in carbon nanotubes as high performance magnets. <i>Scientific Reports</i> , 2015 , 5, 15033	4.9	16
150	Variation of the crosslinking density in cluster-reinforced polymers. <i>Materials Today Communications</i> , 2015 , 5, 10-17	2.5	10
149	Crystallization in segregated supramolecular pseudoblock copolymers. <i>European Polymer Journal</i> , 2015 , 64, 138-146	5.2	7
148	A dual crosslinked self-healing system: Supramolecular and covalent network formation of four-arm star polymers. <i>Polymer</i> , 2015 , 69, 264-273	3.9	61

147	The formation of ZnO nanoparticles from zinc gluconate. <i>Ceramics International</i> , 2015 , 41, 4975-4981	5.1	5
146	Porous titanium and zirconium oxo carboxylates at the interface between sol-gel and metal-organic framework structures. <i>Dalton Transactions</i> , 2014 , 43, 950-7	4.3	7
145	Effect of hot stretching graphitization on the structure and mechanical properties of rayon-based carbon fibers. <i>Journal of Materials Science</i> , 2014 , 49, 673-684	4.3	25
144	Covalent embedding of Ni ²⁺ /Fe ³⁺ cyanometallate structures in silica by sol-gel processing. <i>Chemistry - A European Journal</i> , 2014 , 20, 9212-5	4.8	2
143	SAXS studies on silica nanoparticle aggregation in a humid atmosphere. <i>Journal of Nanoparticle Research</i> , 2014 , 16, 1	2.3	5
142	Hierarchically organized silica-titania monoliths prepared under purely aqueous conditions. <i>Chemistry - A European Journal</i> , 2014 , 20, 17409-19	4.8	8
141	The structural evolution of multi-layer graphene stacks in carbon fibers under load at high temperature [A synchrotron radiation study. <i>Carbon</i> , 2014 , 80, 373-381	10.4	11
140	Characterizing the Cell Surface Structure and Antibody Recognition Forces on Intact Microbial Cells using Scanning Probe Microscopy. <i>Biophysical Journal</i> , 2014 , 106, 511a-512a	2.9	
139	Timescales of self-healing in human bone tissue and polymeric ionic liquids. <i>Bioinspired, Biomimetic and Nanobiomaterials</i> , 2014 , 3, 123-130	1.3	13
138	Carbon Fibers 2014 , 27-39		
137	Toward Synthesis and Characterization of Unconventional C66 and C68 Fullerenes inside Carbon Nanotubes. <i>Journal of Physical Chemistry C</i> , 2014 , 118, 30260-30268	3.8	6
136	Tailoring photoluminescence properties in ionic nanoparticle networks. <i>Chemistry - A European Journal</i> , 2014 , 20, 10763-74	4.8	3
135	Irreversible thermochromism in copper chloride Imidazolium Nanoparticle Networks. <i>Physical Chemistry Chemical Physics</i> , 2013 , 15, 12717-23	3.6	5
134	Surface modification of MoS ₂ nanoparticles with ionic liquid-ligands: towards highly dispersed nanoparticles. <i>Chemical Communications</i> , 2013 , 49, 9311-3	5.8	19
133	Designing melt flow of poly(isobutylene)-based ionic liquids. <i>Journal of Materials Chemistry A</i> , 2013 , 1, 12159	13	19
132	Synthesis and properties of highly dispersed ionic silica-poly(ethylene oxide) nanohybrids. <i>ACS Nano</i> , 2013 , 7, 1265-71	16.7	36
131	Various three-dimensional structures connected by Al-O/OH/acetate-Al bonds. <i>Inorganic Chemistry</i> , 2013 , 52, 13238-43	5.1	5
130	Small-angle X-ray scattering for imaging of surface layers on intact bacteria in the native environment. <i>Journal of Bacteriology</i> , 2013 , 195, 2408-14	3.5	8

129	Characterizing the S-layer structure and anti-S-layer antibody recognition on intact <i>Tannerella forsythia</i> cells by scanning probe microscopy and small angle X-ray scattering. <i>Journal of Molecular Recognition</i> , 2013 , 26, 542-9	2.6	11
128	Tuning the Pore Size in Ionic Nanoparticle Networks. <i>Journal of Nanoparticles</i> , 2013 , 2013, 1-9		
127	Effect of interparticle interactions on size determination of zirconia and silica based systems [A comparison of SAXS, DLS, BET, XRD and TEM. <i>Chemical Physics Letters</i> , 2012 , 521, 91-97	2.5	105
126	Microcracks and osteoclast resorption activity in vitro. <i>Calcified Tissue International</i> , 2012 , 90, 230-8	3.9	15
125	Engineering molecular chains in carbon nanotubes. <i>Nanoscale</i> , 2012 , 4, 7540-8	7.7	3
124	Ferromagnetic decoration in metal/semiconductor separated and ferrocene functionalized single-walled carbon nanotubes. <i>Physica Status Solidi (B): Basic Research</i> , 2012 , 249, 2323-2327	1.3	4
123	Hierarchically Nanostructured Polyisobutylene-Based Ionic Liquids. <i>Macromolecules</i> , 2012 , 45, 2074-2084	4.5	47
122	Nanoparticle assemblies as probes for self-assembled monolayer characterization: correlation between surface functionalization and agglomeration behavior. <i>Langmuir</i> , 2012 , 28, 741-50	4	13
121	Novel sol-gel precursors for thin mesoporous eu(3+)-doped silica coatings as efficient luminescent materials. <i>Chemistry of Materials</i> , 2012 , 24, 3674-83	9.6	18
120	Sol-gel synthesis of ZnTiO ₃ using a single-source precursor based on p-carboxybenzaldehyde oxime as a linker. <i>Journal of Materials Chemistry</i> , 2012 , 22, 24034		17
119	Study of the effect of the concentration, size and surface chemistry of zirconia and silica nanoparticle fillers within an epoxy resin on the bulk properties of the resulting nanocomposites. <i>Polymer International</i> , 2012 , 61, 274-285	3.3	17
118	Polyester Preparation in the Presence of Pristine and Phosphonic-Acid-Modified Zirconia Nanopowders. <i>Macromolecular Materials and Engineering</i> , 2012 , 297, 219-227	3.9	6
117	Porous Silica-Based Mixed Oxides with Basic Organic Sites. <i>European Journal of Inorganic Chemistry</i> , 2012 , 2012, 5207-5215	2.3	1
116	Liquid-phase syntheses of cobalt ferrite nanoparticles. <i>Journal of Nanoparticle Research</i> , 2012 , 14, 1	2.3	27
115	Structural flexibility of RNA as molecular basis for Hfq chaperone function. <i>Nucleic Acids Research</i> , 2012 , 40, 8072-84	20.1	27
114	Inorganic-organic hybrid materials through post-synthesis modification: Impact of the treatment with azides on the mesopore structure. <i>Beilstein Journal of Nanotechnology</i> , 2011 , 2, 486-98	3	14
113	Atomistic structure of monomolecular surface layer self-assemblies: toward functionalized nanostructures. <i>ACS Nano</i> , 2011 , 5, 2288-97	16.7	26
112	Batch-wise adsorption, saxs and microscopic studies of zeolite pelletized with biopolymeric alginate. <i>Brazilian Journal of Chemical Engineering</i> , 2011 , 28, 63-71	1.7	7

111	Porous titania ionic nanoparticle networks. <i>Langmuir</i> , 2011 , 27, 4110-6	4	8
110	Strategies for the covalent conjugation of a bifunctional chelating agent to albumin: synthesis and characterization of potential MRI contrast agents. <i>Journal of Inorganic Biochemistry</i> , 2011 , 105, 250-5	4.2	8
109	Surface layer protein characterization by small angle x-ray scattering and a fractal mean force concept: from protein structure to nanodisk assemblies. <i>Journal of Chemical Physics</i> , 2010 , 133, 175102	3.9	17
108	Photoluminescence as Complementary Evidence for Short-Range Order in Ionic Silica Nanoparticle Networks. <i>Journal of Physical Chemistry C</i> , 2010 , 114, 21342-21347	3.8	16
107	Controlling intermolecular spin interactions of La@C(82) in empty fullerene matrices. <i>Physical Chemistry Chemical Physics</i> , 2010 , 12, 1618-23	3.6	15
106	Preparation of mesoporous titania by surfactant-assisted sol-gel processing of acetaldoxime-modified titanium alkoxides. <i>Journal of Non-Crystalline Solids</i> , 2010 , 356, 1217-1227	3.9	27
105	Keratin homogeneity in the tail feathers of Pavo cristatus and Pavo cristatus mut. alba. <i>Journal of Structural Biology</i> , 2010 , 172, 270-5	3.4	19
104	Structural characterization of gel-derived calcium silicate systems. <i>Journal of Physical Chemistry A</i> , 2010 , 114, 10403-11	2.8	66
103	Sol-gel Processing of a Glycolated Cyclic Organosilane and Its Pyrolysis to Silicon Oxycarbide Monoliths with Multiscale Porosity and Large Surface Areas. <i>Chemistry of Materials</i> , 2010 , 22, 1509-1520	9.6	40
102	Anion metathesis in ionic silica nanoparticle networks. <i>Journal of Materials Chemistry</i> , 2010 , 20, 1269-1276		24
101	Titanium alkoxo oximates, with surfactant-like properties of the oximate ligands, as precursors for porous TiO ₂ and mixed oxide sol-gel films. <i>Journal of Materials Chemistry</i> , 2010 , 20, 5527		6
100	Meso-scale mechanical testing methods for diamond composite materials. <i>International Journal of Refractory Metals and Hard Materials</i> , 2010 , 28, 508-515	4.1	7
99	Studies on the Formation of CdS Nanoparticles from Solutions of (NMe ₄) ₄ [Cd ₁₀ S ₄ (SPh) ₁₆]. <i>European Journal of Inorganic Chemistry</i> , 2010 , 2010, 2266-2275	2.3	13
98	Supported and Free-Standing Sulfonic Acid Functionalized Mesostructured Silica Films with High Proton Conductivity. <i>European Journal of Inorganic Chemistry</i> , 2010 , 2010, 3993-3999	2.3	10
97	A new approach to control the dispersion of platinum nanoparticles in a metal oxide coating. <i>Polyhedron</i> , 2010 , 29, 569-573	2.7	2
96	Structural development of PAN-based carbon fibers studied by in situ X-ray scattering at high temperatures under load. <i>Carbon</i> , 2010 , 48, 964-971	10.4	56
95	Electron spin resonance from semiconductor-metal separated SWCNTs. <i>Physica Status Solidi (B): Basic Research</i> , 2010 , 247, 2851-2854	1.3	9
94	Raman response from double-wall carbon nanotubes based on metallicity selected host SWCNTs. <i>Physica Status Solidi (B): Basic Research</i> , 2010 , 247, 2880-2883	1.3	2

93	Efficient air-stable organometallic low-molecular-mass gelators for ionic liquids: synthesis, aggregation and application of pyridine-bridged bis(benzimidazolylidene)-palladium complexes. <i>Chemistry - A European Journal</i> , 2009 , 15, 1853-61	4.8	115
92	Organosilica Monoliths with Multiscale Porosity: Detailed Investigation of the Influence of the Surfactant on Structure Formation. <i>Silicon</i> , 2009 , 1, 19-28	2.4	10
91	FT-Raman characterization of the antipodal bis-adduct of C60 and anthracene. <i>Physica Status Solidi (B): Basic Research</i> , 2009 , 246, 2794-2797	1.3	5
90	Identifying the electron spin resonance of conduction electrons in alkali doped SWCNTs. <i>Physica Status Solidi (B): Basic Research</i> , 2009 , 246, 2760-2763	1.3	15
89	Structural Investigations on Hybrid Polymers Suitable as a Nanoparticle Precipitation Environment. <i>Chemistry of Materials</i> , 2009 , 21, 695-705	9.6	15
88	Nanoparticles/Ionic Linkers of Different Lengths: Short-Range Order Evidenced by Small-Angle X-ray Scattering. <i>Journal of Physical Chemistry C</i> , 2009 , 113, 6547-6552	3.8	20
87	Uniformly oriented, ellipsoidal nanovoids in glass created by electric-field-assisted dissolution of metallic nanoparticles. <i>Physical Review B</i> , 2009 , 79,	3.3	7
86	Crosslinked hybrid polymer matrices with nanostructure directing abilities for lanthanum hydroxide growth. <i>Chemical Communications</i> , 2009 , 5564-6	5.8	2
85	Organically modified mixed-oxide sol-gel films with complex compositions and pore structures. <i>Journal of Materials Chemistry</i> , 2009 , 19, 75-81		9
84	The structure of carbon fibres 2009 , 353-377		4
83	Mesoporous dendrimer silica monoliths studied by small-angle X-ray scattering. <i>Journal of Materials Chemistry</i> , 2008 , 18, 4783		11
82	Atom Transfer Radical Polymerizations of Complexes Based on Ti and Zr Alkoxides Modified with β -Keto Ester Ligands and Transformation of the Resulting Polymers in Nanocomposites. <i>Macromolecules</i> , 2008 , 41, 1131-1139	5.5	10
81	Nanostructure of gel-derived aluminosilicate materials. <i>Langmuir</i> , 2008 , 24, 949-56	4	10
80	Experimental Investigation of Mechanical Properties of Metallic Hollow Sphere Structures. <i>Metallurgical and Materials Transactions B: Process Metallurgy and Materials Processing Science</i> , 2008 , 39, 135-146	2.5	56
79	Polyarene-functionalized fullerenes in carbon nanotubes: towards controlled geometry of molecular chains. <i>Small</i> , 2008 , 4, 2262-70	11	19
78	A detailed comparison of CVD grown and precursor based DWCNTs. <i>Physica Status Solidi (B): Basic Research</i> , 2008 , 245, 1943-1946	1.3	9
77	Pyridine-bridged benzimidazolium salts: synthesis, aggregation, and application as phase-transfer catalysts. <i>Angewandte Chemie - International Edition</i> , 2008 , 47, 7127-31	16.4	74
76	Pyridin-verbrückte Benzimidazoliumsalze: Synthese, Aggregation und Anwendung als Phasentransferkatalysatoren. <i>Angewandte Chemie</i> , 2008 , 120, 7236-7240	3.6	13

75	Dynamics of carbon nanotube growth from fullerenes. <i>Nano Letters</i> , 2007 , 7, 2428-34	11.5	67
74	An air-stable organometallic low-molecular-mass gelator: synthesis, aggregation, and catalytic application of a palladium pincer complex. <i>Angewandte Chemie - International Edition</i> , 2007 , 46, 6368-71	16.4	180
73	Ein luftstabiler metallorganischer niedermolekularer Gelbildner: Synthese, Aggregation und katalytische Anwendung eines Palladium-Pinzettenkomplexes. <i>Angewandte Chemie</i> , 2007 , 119, 6486-6490	3.6	49
72	Suppression of Crazing in Polystyrene Crosslinked with a Multifunctional Zirconium Oxo Cluster Observed In Situ during Tensile Tests. <i>Macromolecular Rapid Communications</i> , 2007 , 28, 2145-2150	4.8	4
71	Fullerene release from the inside of carbon nanotubes: A possible route toward drug delivery. <i>Chemical Physics Letters</i> , 2007 , 445, 288-292	2.5	42
70	Skin-core structure and bimodal Weibull distribution of the strength of carbon fibers. <i>Carbon</i> , 2007 , 45, 2801-2805	10.4	50
69	The dependence of the elastic moduli of reaction bonded alumina on porosity. <i>Journal of the European Ceramic Society</i> , 2007 , 27, 35-39	6	13
68	Growth mechanisms of inner-shell tubes in double-wall carbon nanotubes. <i>Physica Status Solidi (B): Basic Research</i> , 2007 , 244, 4097-4101	1.3	6
67	The effects of inhomogeneous isotope distribution on the vibrational properties of isotope enriched double walled carbon nanotubes. <i>Physica Status Solidi (B): Basic Research</i> , 2007 , 244, 4257-4260 ¹⁻³		
66	Mechanical, thermomechanical, and thermal properties of polystyrene crosslinked with a multifunctional zirconium oxo cluster. <i>Journal of Polymer Science, Part B: Polymer Physics</i> , 2007 , 45, 2215-2231 ^{2,6}	2.6	23
65	Inhomogeneity of C13 isotope distribution in isotope engineered carbon nanotubes: Experiment and theory. <i>Physical Review B</i> , 2007 , 75,	3.3	20
64	Structural investigation of alumina silica mixed oxide gels prepared from organically modified precursors. <i>Journal of Non-Crystalline Solids</i> , 2007 , 353, 1635-1644	3.9	16
63	Determination of Elastic Modules in Dependence on Orientation by the Resonant Beam Technique. <i>Materials Science Forum</i> , 2006 , 514-516, 815-824	0.4	
62	Ring-opening metathesis polymerizations with norbornene carboxylate-substituted metal oxo clusters. <i>Journal of Materials Chemistry</i> , 2006 , 16, 3268		37
61	Changing poisson's ratio of mesoporous silica monoliths with high temperature treatment. <i>Journal of Non-Crystalline Solids</i> , 2006 , 352, 5251-5256	3.9	6
60	Facile self-assembly processes to phenylene-bridged silica monoliths with four levels of hierarchy. <i>Small</i> , 2006 , 2, 503-6	11	53
59	From brittle to ductile fracture of bone. <i>Nature Materials</i> , 2006 , 5, 52-5	27	356
58	A reconsideration of the relationship between the crystallite size La of carbons determined by X-ray diffraction and Raman spectroscopy. <i>Carbon</i> , 2006 , 44, 3239-3246	10.4	381

57	Structural investigation of carbon/carbon composites by neutron scattering. <i>Physica B: Condensed Matter</i> , 2006 , 385-386, 538-541	2.8	2
56	Orientation dependent fracture toughness of lamellar bone. <i>International Journal of Fracture</i> , 2006 , 139, 395-405	2.3	29
55	Small-Angle X-Ray Scattering to Characterize Nanostructures in Inorganic and Hybrid Materials Chemistry. <i>Monatshefte Für Chemie</i> , 2006 , 137, 529-543	1.4	37
54	Direct observation of nanocrystallite buckling in carbon fibers under bending load. <i>Physical Review Letters</i> , 2005 , 95, 225501	7.4	54
53	Simultaneous drying and chemical modification of hierarchically organized silica monoliths with organofunctional silanes. <i>Journal of Materials Chemistry</i> , 2005 , 15, 3896		46
52	Cellular mesoscopically organized silica monoliths with tailored surface chemistry by one-step drying/extraction/surface modification processes. <i>Journal of Materials Chemistry</i> , 2005 , 15, 1801		38
51	Glycol-Modified Silanes in the Synthesis of Mesoscopically Organized Silica Monoliths with Hierarchical Porosity. <i>Chemistry of Materials</i> , 2005 , 17, 4262-4271	9.6	125
50	Mixed Silica Titania Materials Prepared from a Single-Source Sol-Gel Precursor: A Time-Resolved SAXS Study of the Gelation, Aging, Supercritical Drying, and Calcination Processes. <i>Chemistry of Materials</i> , 2005 , 17, 3146-3153	9.6	46
49	Extension of the resonant beam technique to highly anisotropic materials. <i>Journal of Sound and Vibration</i> , 2005 , 279, 1121-1129	3.9	6
48	Effect of surface roughness on friction in fibre-bundle pull-out tests. <i>Composites Science and Technology</i> , 2005 , 65, 981-988	8.6	21
47	Structure and mechanical properties of carbon fibres: a review of recent microbeam diffraction studies with synchrotron radiation. <i>Journal of Synchrotron Radiation</i> , 2005 , 12, 758-64	2.4	17
46	Structure of Post-Creep Carbon Fibres. <i>Key Engineering Materials</i> , 2005 , 290, 268-271	0.4	
45	Size independence of the strength of snow. <i>Physical Review E</i> , 2004 , 69, 011306	2.4	11
44	Comment on Relationship between the Estimated Weibull Modulus and the Coefficient of Variation of the Measured Strength for Ceramics. <i>Journal of the American Ceramic Society</i> , 2004 , 83, 1013-1014	3.8	1
43	Small-angle X-ray scattering investigation of the cluster distribution in inorganic-organic hybrid polymers prepared from organically substituted metal oxide clusters. <i>Comptes Rendus Chimie</i> , 2004 , 7, 495-502	2.7	14
42	Measurement of shear lag parameter for a fibre bundle pull-out geometry. <i>Composites Science and Technology</i> , 2004 , 64, 65-70	8.6	3
41	Elastic Moduli of Porous and Anisotropic Composites at High Temperatures. <i>Advanced Engineering Materials</i> , 2004 , 6, 138-142	3.5	7
40	Low temperature fullerene encapsulation in single wall carbon nanotubes: synthesis of N@C60@SWCNT. <i>Chemical Physics Letters</i> , 2004 , 383, 362-367	2.5	109

39	Magnetic behaviour of a hybrid polymer obtained from ethyl acrylate and the magnetic cluster Mn ₁₂ O ₁₂ (acrylate) ₁₆ . <i>Journal of Materials Chemistry</i> , 2004 , 14, 1873-1878		47
38	Inorganic-Organic Hybrid Hierarchically Structured Methyl-modified Silica Monoliths. <i>Materials Research Society Symposia Proceedings</i> , 2004 , 847, 320		1
37	ON THE DETERMINATION OF ELASTIC MODULI WITH BRITTLE MATRIX COMPOSITES 2003 , 389-400		1
36	Elastic moduli of nanocrystallites in carbon fibers measured by in-situ X-ray microbeam diffraction. <i>Carbon</i> , 2003 , 41, 563-570	10.4	67
35	Experimental validation of the shear correction factor. <i>Journal of Sound and Vibration</i> , 2003 , 261, 177-184	9.9	24
34	Hutchinson's shear coefficient for anisotropic beams. <i>Journal of Sound and Vibration</i> , 2003 , 266, 207-216	3.9	13
33	A new fibre-bundle pull-out test to determine interface properties of a 2D-woven carbon/carbon composite. <i>Composites Science and Technology</i> , 2003 , 63, 653-660	8.6	12
32	Periodically Mesostructured Silica Monoliths from Diol-Modified Silanes. <i>Chemistry of Materials</i> , 2003 , 15, 2690-2692	9.6	79
31	Non-contacting strain measurements of ceramic and carbon single fibres by using the laser-speckle method. <i>Composites Part A: Applied Science and Manufacturing</i> , 2003 , 34, 1029-1033	8.4	18
30	Texture of PAN- and pitch-based carbon fibers. <i>Carbon</i> , 2002 , 40, 551-555	10.4	78
29	Evaluation of Surface Preparation Techniques, SFG: Swing Frame Grinding and LPG: Low-Temperature Precision Grinding, by Comparison of Results on Alumina and Silicon Carbide Model Materials. <i>Key Engineering Materials</i> , 2002 , 223, 139-148	0.4	3
28	Inorganic/Organic Hybrid Polymers by Polymerization of Methacrylate- or Acrylate-Substituted Oxotitanium Clusters with Methyl Methacrylate or Methacrylic Acid. <i>Chemistry of Materials</i> , 2002 , 14, 2732-2740	9.6	88
27	Determination of SWCNT diameters from the Raman response of the radial breathing mode. <i>European Physical Journal B</i> , 2001 , 22, 307-320	1.2	231
26	Cross-sectional texture of carbon fibres analysed by scanning microbeam X-ray diffraction. <i>Journal of Applied Crystallography</i> , 2001 , 34, 473-479	3.8	19
25	Bimodal strength distributions and flaw populations of ceramics and fibres. <i>Engineering Fracture Mechanics</i> , 2001 , 68, 253-261	4.2	29
24	Crack bridging stresses in alumina during crack extension. <i>Journal of Materials Science Letters</i> , 2001 , 20, 1703-1705		2
23	Age- and genotype-dependence of bone material properties in the osteogenesis imperfecta murine model (oim). <i>Bone</i> , 2001 , 29, 453-7	4.7	112
22	Microcracks in Carbon/Carbon Composites: A Microtomography Investigation using Synchrotron Radiation. <i>Materials Research Society Symposia Proceedings</i> , 2001 , 678, 381		2

21	Relationship of Strength and Defects of Ceramic Materials and Their Treatment by Weibull Theory.. <i>Journal of the Ceramic Society of Japan</i> , 2001 , 109, S121-S126		7
20	The internal structure of single carbon fibers determined by simultaneous small- and wide-angle scattering. <i>Journal of Applied Crystallography</i> , 2000 , 33, 695-699	3.8	28
19	Structure investigation of intelligent aerogels. <i>Physica B: Condensed Matter</i> , 2000 , 276-278, 392-393	2.8	8
18	Prediction of strength of recrystallized siliconcarbide from pore size measurement Part I The bimodality of the distribution. <i>Journal of Materials Science</i> , 2000 , 35, 699-705	4.3	24
17	Prediction of strength of recrystallized siliconcarbide from pore size measurement Part II The reliability of the prediction. <i>Journal of Materials Science</i> , 2000 , 35, 707-711	4.3	12
16	A novel resonant beam technique to determine the elastic moduli in dependence on orientation and temperature up to 2000 °C. <i>Review of Scientific Instruments</i> , 1999 , 70, 3052-3058	1.7	47
15	Determination of interface parameters for carbon/carbon composites by the fibre-bundle pull-out test. <i>Composites Science and Technology</i> , 1996 , 56, 1017-1029	8.6	30
14	The validity of Weibull estimators. <i>Journal of Materials Science</i> , 1995 , 30, 1972-1976	4.3	38
13	Coating of Carbon Fibers—The Strength of the Fibers. <i>Journal of the American Ceramic Society</i> , 1995 , 78, 133-136	3.8	59
12	Elastic moduli and interlaminar shear strength of a bidirectional carbon/carbon composite after heat treatment. <i>Composites Science and Technology</i> , 1995 , 53, 7-12	8.6	15
11	Comparison of evaluation procedures for the subcritical crack growth parameter n. <i>Journal of the European Ceramic Society</i> , 1994 , 13, 509-519	6	16
10	Viscoelasticity of ceramics at high temperatures. <i>Journal of Materials Science</i> , 1994 , 29, 2401-2405	4.3	3
9	Pore structure of carbon/carbon composites studied by small-angle X-ray scattering. <i>Carbon</i> , 1994 , 32, 939-945	10.4	34
8	Viscoelastic effects in testing of an Al ₂ O ₃ ceramic containing a glassy phase. <i>Journal of Materials Science</i> , 1993 , 28, 4341-4346	4.3	5
7	Crack motion and hydrodynamic flow. <i>International Journal of Fracture</i> , 1992 , 54, 101-116	2.3	
6	Transverse expansion of 2-D carbon/carbon laminates as a consequence of delamination. <i>Composites Science and Technology</i> , 1992 , 45, 65-72	8.6	6
5	Ejection velocities of brittle materials fracturing during the ultrasonic fatigue test. <i>Applied Acoustics</i> , 1991 , 32, 243-251	3.1	1
4	Brittle fracture of samples cycled in the ultrasonic test system. Part II Experimental results. <i>Applied Acoustics</i> , 1989 , 26, 85-98	3.1	3

- | | | | |
|---|---|-----|---|
| 3 | Brittle fracture of samples cycled in the ultrasonic test system. Part I: A basic model. <i>Applied Acoustics</i> , 1989 , 26, 9-24 | 3.1 | 2 |
| 2 | Electrochromic 2,5-Dihydroxyterephthalic Acid Linker in Metal-Organic Frameworks. <i>Advanced Photonics Research</i> , 2100219 | 1.9 | |
| 1 | High Temperature Behaviour of Ceramic Foams from Si/SiC-Filled Pre-ceramic Polymers. <i>Ceramic Engineering and Science Proceedings</i> , 465-470 | 0.1 | |