Denis Damidot

List of Publications by Year
in descending order

85 papers	4,739 citations	87888 38 h-index	98798 67 g-index
85 all docs	85 docs citations	85 times ranked	3869 citing authors

#	Article	IF	Citations
1	Determination by nanoindentation of elastic modulus and hardness of pure constituents of Portland cement clinker. Cement and Concrete Research, 2001, 31, 555-561.	11.0	394
2	Investigation of the hydration and bioactivity of radiopacified tricalcium silicate cement, Biodentine and MTA Angelus. Dental Materials, 2013, 29, 580-593.	3.5	323
3	Thermodynamics and cement science. Cement and Concrete Research, 2011, 41, 679-695.	11.0	204
4	Influence of fine recycled concrete aggregates on the properties of mortars. Construction and Building Materials, 2015, 81, 179-186.	7.2	203
5	Characterization and quantification of self-healing behaviors of microcracks due to further hydration in cement paste. Cement and Concrete Research, 2013, 52, 71-81.	11.0	198
6	Thermodynamic investigation of the CaOî—¸Al2O3î—¸CaSO4î—¸H2O system at 25Â°C and the influence of Na2O. Cement and Concrete Research, 1993, 23, 221-238.	11.0	191
7	Effect of blast furnace slag on self-healing of microcracks in cementitious materials. Cement and Concrete Research, 2014, 60, 68-82.	11.0	148
8	Chemical and mineralogical characterizations of LD converter steel slags: A multi-analytical techniques approach. Materials Characterization, 2010, 61, 39-48.	4.4	140
9	Thermodynamic investigation of the CaOî—¸Al2O3î—¸CaSO4î—¸H2O system at 50Â°C and 85Â°C. Cement and Concrete Research, 1992, 22, 1179-1191.	11.0	136
10	Influence of a thermal cycle at early age on the hydration of calcium sulphoaluminate cements with variable gypsum contents. Cement and Concrete Research, 2011, 41, 149-160.	11.0	135
11	Managing trace elements in Portland cement â€“ Part I: Interactions between cement paste and heavy metals added during mixing as soluble salts. Cement and Concrete Composites, 2010, 32, 563-570.	10.7	114
12	Comparison of a bioremediation process of PAHs in a PAH-contaminated soil at field and laboratory scales. Environmental Pollution, 2012, 165, 11-17.	7.5	113
13	Improved evidence for the existence of an intermediate phase during hydration of tricalcium silicate. Cement and Concrete Research, 2010, 40, 875-884.	11.0	100
14	In Situ Assessment of the Setting of Tricalcium Silicateâ€“based Sealers Using a Dentin Pressure Model. Journal of Endodontics, 2015, 41, 111-124.	3.1	99
15	Thermodynamic investigation of the CaOî—¸Al2O3î—¸CaCO3î—¸H2O closed system at 25Â°C and the influence of Na2O. Cement and Concrete Research, 1994, 24, 563-572.	11.0	89
16	Evolution of bacterial community during bioremediation of PAHs in a coal tar contaminated soil. Chemosphere, 2010, 81, 1263-1271.	8.2	85
17	Investigation of the CaO-Al2O3-SiO2-H2O system at 25 Â°C by thermodynamic calculations. Cement and Concrete Research, 1995, 25, 22-28.	11.0	84
18	Kinetics of Tricalcium Silicate Hydration in Diluted Suspensions by Microcalorimetric Measurements. Journal of the American Ceramic Society, 1990, 73, 3319-3322.	3.8	82

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19	The setting characteristics of <scp>MTA</scp> Plus in different environmental conditions. International Endodontic Journal, 2013, 46, 831-840.	5.0	78
20	Porosity and root dentine to material interface assessment of calcium silicate-based root-end filling materials. Clinical Oral Investigations, 2014, 18, 1437-1446.	3.0	75
21	Incorporation of trace elements in Portland cement clinker: Thresholds limits for Cu, Ni, Sn or Zn. Cement and Concrete Research, 2011, 41, 1177-1184.	11.0	74
22	Influence of sodium borate on the early age hydration of calcium sulfoaluminate cement. Cement and Concrete Research, 2015, 70, 83-93.	11.0	74
23	Use of uncontaminated marine sediments in mortar and concrete by partial substitution of cement. Cement and Concrete Composites, 2018, 93, 155-162.	10.7	62
24	Combined effects of lithium and borate ions on the hydration of calcium sulfoaluminate cement. Cement and Concrete Research, 2017, 97, 50-60.	11.0	60
25	Influence of the intrinsic characteristics of mortars on biofouling by Klebsormidium flaccidum. International Biodeterioration and Biodegradation, 2012, 70, 31-39.	3.9	58
26	Physico-chemical mechanisms involved in the acceleration of the hydration of calcium sulfoaluminate cement by lithium ions. Cement and Concrete Research, 2017, 96, 42-51.	11.0	57
27	Microbiologically induced calcium carbonate precipitation to repair microcracks remaining after autogenous healing of mortars. Construction and Building Materials, 2017, 141, 461-469.	7.2	57
28	Characterisation of iron inclusion during the formation of calcium sulfoaluminate phase. Cement and Concrete Research, 2010, 40, 1314-1319.	11.0	56
29	Influence of hardened cement paste content on the water absorption of fine recycled concrete aggregates. Journal of Sustainable Cement-Based Materials, 2013, 2, 186-203.	3.1	51
30	Impact of unrestrained Delayed Ettringite Formation-induced expansion on concrete mechanical properties. Cement and Concrete Research, 2008, 38, 1343-1348.	11.0	48
31	Valorisation of sediments in self-consolidating concrete: Mix-design and microstructure. Construction and Building Materials, 2015, 81, 1-10.	7.2	48
32	Dissolution rates during the early hydration of tricalcium silicate. Cement and Concrete Research, 2015, 72, 108-116.	11.0	46
33	Hydration of calcium sulfoaluminate cement by a ZnCl2 solution: Investigation at early age. Cement and Concrete Research, 2009, 39, 1180-1187.	11.0	45
34	Effect of curing conditions and concrete mix design on the expansion generated by delayed ettringite formation. Materials and Structures/Materiaux Et Constructions, 2007, 40, 567-578.	3.1	44
35	Leaching of calcium sulfoaluminate cement pastes by water at regulated pH and temperature: Experimental investigation and modeling. Cement and Concrete Research, 2013, 53, 211-220.	11.0	44
36	Managing trace elements in Portland cement â€“ Part II: Comparison of two methods to incorporate Zn in a cement. Cement and Concrete Composites, 2011, 33, 629-636.	10.7	41

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37	Thermodynamic investigation of the CaOî—¸Al2O3î—¸CaSO4î—¸K2Oî—¸H2O system at 25Â°C. Cement and Concrete Research, 1993, 23, 1195-1204.	11.0	40
38	Characterization of un-hydrated and hydrated BioAggregateâ„¢ and MTA Angelusâ„¢. Clinical Oral Investigations, 2015, 19, 689-698.	3.0	40
39	Leaching of lead metallurgical slags and pollutant mobility far from equilibrium conditions. Applied Geochemistry, 2008, 23, 3699-3711.	3.0	38
40	Influence of the intrinsic characteristics of mortars on their biofouling by pigmented organisms: Comparison between laboratory and field-scale experiments. International Biodeterioration and Biodegradation, 2014, 86, 334-342.	3.9	38
41	Comparison of solid-phase bioassays and ecoscores to evaluate the toxicity of contaminated soils. Environmental Pollution, 2010, 158, 2640-2647.	7.5	35
42	Crystal structures of Boro-AFm and sBoro-AFt phases. Cement and Concrete Research, 2012, 42, 1362-1370.	11.0	34
43	Colour and chemical stability of bismuth oxide in dental materials with solutions used in routine clinical practice. PLoS ONE, 2020, 15, e0240634.	2.5	34
44	Interactions between municipal solid waste incinerator bottom ash and bacteria (Pseudomonas) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 4	8.0	33
45	Comparison of solid and liquid-phase bioassays using ecoscores to assess contaminated soils. Environmental Pollution, 2011, 159, 2974-2981.	7.5	33
46	Avrami's law based kinetic modeling of colonization of mortar surface by alga Klebsormidium flaccidum. International Biodeterioration and Biodegradation, 2013, 79, 73-80.	3.9	31
47	Effect of calcium gluconate, calcium lactate, and urea on the kinetics of self-healing in mortars. Construction and Building Materials, 2017, 157, 489-497.	7.2	31
48	Effect of Pb-rich and Fe-rich entities during alteration of a partially vitrified metallurgical waste. Journal of Hazardous Materials, 2007, 149, 418-431.	12.4	30
49	Stabilization of ZnCl2-containing wastes using calcium sulfoaluminate cement: Leaching behaviour of the solidified waste form, mechanisms of zinc retention. Journal of Hazardous Materials, 2011, 194, 268-276.	12.4	29
50	Sulphate attack on concrete: limits of the AFt stability domain. Cement and Concrete Research, 1992, 22, 229-234.	11.0	27
51	Analysis of the surface of tricalcium silicate during the induction period by X-ray photoelectron spectroscopy. Cement and Concrete Research, 2012, 42, 1189-1198.	11.0	27
52	Water chemical potential: A key parameter to determine the thermodynamic stability of some hydrated cement phases in concrete?. Cement and Concrete Research, 2006, 36, 783-790.	11.0	24
53	pH variations during growth of Acidithiobacillus thiooxidans in buffered media designed for an assay to evaluate concrete biodeterioration. International Biodeterioration and Biodegradation, 2009, 63, 880-883.	3.9	23
54	Thermodynamic modelling: state of knowledge and challenges. Advances in Cement Research, 2010, 22, 211-223.	1.6	23

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55	New insights into tricalcium silicate hydration in paste. Journal of the American Ceramic Society, 2019, 102, 2965-2976.	3.8	22
56	Stabilization of ZnCl2-containing wastes using calcium sulfoaluminate cement: Cement hydration, strength development and volume stability. Journal of Hazardous Materials, 2011, 194, 256-267.	12.4	21
57	Beneficial use of a cell coupling rheometry, conductimetry, and calorimetry to investigate the early age hydration of calcium sulfoaluminate cement. Rheologica Acta, 2013, 52, 177-187.	2.4	19
58	Formulation of mortars based on thermally treated sediments. Journal of Material Cycles and Waste Management, 2018, 20, 592-603.	3.0	19
59	Improving the properties of recycled concrete aggregates by accelerated carbonation. Proceedings of Institution of Civil Engineers: Construction Materials, 2018, 171, 126-132.	1.1	19
60	Effect of curing conditions on oilwell cement paste behaviour during leaching: Experimental and modelling approaches. Comptes Rendus Chimie, 2009, 12, 511-520.	0.5	18
61	Influence of granular fraction and origin of recycled concrete aggregates on their properties. European Journal of Environmental and Civil Engineering, 2018, 22, 1457-1467.	2.1	17
62	Interactions between Halothiobacillus neapolitanus and mortars: Comparison of the biodeterioration between Portland cement and calcium aluminate cement. International Biodeterioration and Biodegradation, 2017, 121, 19-25.	3.9	16
63	Effect of the clinker composition on the threshold limits for Cu, Sn or Zn. Cement and Concrete Research, 2012, 42, 1088-1093.	11.0	14
64	Mercury Intrusion Porosimetry and Assessment of Cement-dentin Interface of Antiâ€“washout-type Mineral Trioxide Aggregate. Journal of Endodontics, 2014, 40, 958-963.	3.1	14
65	Development of novel tricalcium silicate-based endodontic cements with sintered radiopacifier phase. Clinical Oral Investigations, 2016, 20, 967-982.	3.0	14
66	Biodeterioration of mortars exposed to sewers in relation to microbial diversity of biofilms formed on the mortars surface. International Biodeterioration and Biodegradation, 2018, 130, 23-31.	3.9	14
67	Methodology of Management of Dredging Operations I. Conceptual Developments. Environmental Technology (United Kingdom), 2006, 27, 411-429.	2.2	13
68	Bioprecipitation of a calcium carbonate â€“ Biofilm composite on the surface of concrete for the maintenance of nuclear reactor enclosures. Construction and Building Materials, 2020, 237, 117618.	7.2	11
69	Optimization of the formulation of an original hydrogel-based bone cement using a mixture design. Journal of the Mechanical Behavior of Biomedical Materials, 2020, 110, 103886.	3.1	11
70	Analysis of disorder in tricalcium silicate by 29Si NMR spectroscopy and additional methods. Cement and Concrete Research, 2014, 57, 105-116.	11.0	10
71	Weathering of metallurgical slag heaps: multi-experimental approach of the chemical behaviours of lead and zinc. WIT Transactions on Ecology and the Environment, 2006, , .	0.0	10
72	Methodology of Management of Dredging Operations II. Applications. Environmental Technology (United Kingdom), 2006, 27, 431-446.	2.2	6

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73	Innovative Leaching Tests of an Oilwell Cement Paste for CO2 Storage: Effect of the Pressure at 80Â°C. Energy Procedia, 2012, 23, 472-479.	1.8	6
74	Mise au point d'un milieu de culture pour l'Ã©tude de l'altÃ©ration de silicates en prÃ©sence de Pseudomonas aeruginosa. Comptes Rendus - Geoscience, 2005, 337, 1340-1347.	1.2	5
75	Hydration behavior of iron doped calcium sulfoaluminate phase at room temperature. MATEC Web of Conferences, 2012, 2, 01005.	0.2	5
76	On shrinkage and structure changes of pure and blended Portland concretes. Journal of the American Ceramic Society, 2017, 100, 4131-4152.	3.8	5
77	Environmental hazard assessment by the Ecoscore system to discriminate PAH-polluted soils. Environmental Science and Pollution Research, 2018, 25, 26747-26756.	5.3	5
78	Quantification of the Hardened Cement Paste Content in Fine Recycled Concrete Aggregates by Means of Salicylic Acid Dissolution. Materials, 2022, 15, 3384.	2.9	5
79	Leaching of CEM III paste by demineralised or mineralised water at pHÂ7 in relation with aluminium release in drinking water network. Cement and Concrete Research, 2021, 143, 106399.	11.0	4
80	Biocicatrisation : application Ã la rÃ©paration de mortiers Ã¢gÃ©s. Materiaux Et Techniques, 2015, 103, 207.	0.9	4
81	Microscopy in addition to chemical analyses and ecotoxicological assays for the environmental hazard assessment of coal tar-polluted soils. Environmental Science and Pollution Research, 2018, 25, 2594-2602.	5.3	2
82	Mise au point dâ€™un test accÃ©lÃ©rÃ© de biodÃ©tÃ©rioration de mortiers mettant en jeu une succession de bactÃ©ries sulfo-oxydantes. Materiaux Et Techniques, 2011, 99, 555-563.	0.9	2
83	Traitement de mortiers fissurÃ©s par biocicatrisation : vers une Ã©valuation quantitative de lâ€™efficacitÃ© bactÃ©rienne. Materiaux Et Techniques, 2014, 102, 105.	0.9	1
84	Investigation of the CaOâ€“Al2O3â€“SiO2â€“CaSO4â€“CaCO3â€“H2O system at 25oC by thermodynamic calculation. Advances in Cement Research, 2004, 16, 69-76.	1.6	1
85	Application de la biocicatrisation Ã la rÃ©paration des micro-fissures au sein dâ€™enceintes de rÃ©acteurs nuclÃ©aires. Materiaux Et Techniques, 2020, 108, 303.	0.9	0