

# Radim Cajka

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/3518692/publications.pdf>

Version: 2024-02-01

87  
papers

679  
citations

933447

10  
h-index

940533

16  
g-index

91  
all docs

91  
docs citations

91  
times ranked

219  
citing authors

#	ARTICLE	IF	CITATIONS
1	Design and Development of a Testing Device for Experimental Measurements of Foundation Slabs on the Subsoil. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2011, XI, 1-5.	0.3	43
2	Determination of Mechanical Characteristics for Fiber-Reinforced Concrete with Straight and Hooked Fibers. Crystals, 2020, 10, 545.	2.2	43
3	Using DOProC Method in Structural Reliability Assessment. Applied Mechanics and Materials, 0, 300-301, 860-869.	0.2	37
4	Foundation Slab in Interaction with Subsoil. Advanced Materials Research, 0, 838-841, 375-380.	0.3	31
5	Punching Shear Failure of Concrete Ground Supported Slab. International Journal of Concrete Structures and Materials, 2018, 12, .	3.2	31
6	Development of Temperature and Stress during Foundation Slab Concreting of National Supercomputer Centre IT4. Procedia Engineering, 2013, 65, 230-235.	1.2	28
7	Experimental Soil - Concrete Plate Interaction Test and Numerical Models. Key Engineering Materials, 0, 577-578, 33-36.	0.4	25
8	Experiments on Fiber Concrete Foundation Slabs in Interaction with the Subsoil. Sustainability, 2020, 12, 3939.	3.2	25
9	Numerical Modeling and Analysis of Concrete Slabs in Interaction with Subsoil. Sustainability, 2020, 12, 9868.	3.2	21
10	Bitumen Sliding Joints for Friction Elimination in Footing Bottom. Applied Mechanics and Materials, 0, 188, 247-252.	0.2	20
11	Analysis of Stress in Half-Space Using Jacobian of Transformation and Gauss Numerical Integration. Advanced Materials Research, 0, 818, 178-186.	0.3	19
12	Comparative Evaluation of Mechanical Properties of Fibre-Reinforced Concrete and Approach to Modelling of Bearing Capacity Ground Slab. Periodica Polytechnica: Civil Engineering, 0, , .	0.6	18
13	Measurement and Utilization of Acoustic Emission for the Analysis and Monitoring of Concrete Slabs on the Subsoil. Periodica Polytechnica: Civil Engineering, 0, , .	0.6	17
14	Accuracy of Stress Analysis Using Numerical Integration of Elastic Half-Space. Applied Mechanics and Materials, 2013, 300-301, 1127-1135.	0.2	16
15	Measured Data Processing in Civil Structure Using the DOProC Method. Advanced Materials Research, 2013, 859, 114-121.	0.3	15
16	Fibre Concrete Foundation Slab Experiment and FEM Analysis. Key Engineering Materials, 0, 627, 441-444.	0.4	15
17	Laboratory Testing of Asphalt Belts Rheological Properties Exposed to Shear Loads / LaboratornM™en-Reologick½ch VlastnostAsfaltov½ch Ps P™i Smykovm Zat¾en. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2012, 12, 59-66.	0.3	15
18	Soilstructure interaction in case of exceptional mining and flood actions. , 2005, , 369-376.		13

#	ARTICLE	IF	CITATIONS
19	Determination of Mechanical Properties of Fiber Reinforced Concrete for Numerical Modelling. Civil and Environmental Engineering, 2020, 16, 86-106.	1.2	13
20	Comparison of the Calculated and Experimentally Measured Values of Settlement and Stress State of Concrete Slab on Subsoil. Applied Mechanics and Materials, 0, 501-504, 867-876.	0.2	12
21	Validating a Computational Model of a Rooflight Steel Structure by Means of a Load Test. Applied Mechanics and Materials, 0, 501-504, 592-598.	0.2	12
22	EXPERIMENTAL MEASUREMENT OF SOIL-PRESTRESSED FOUNDATION INTERACTION. International Journal of GEOMATE, 2016, , .	0.3	11
23	Comparison of tensile strength fiber reinforced concrete with different types of fibers. Procedia Structural Integrity, 2020, 28, 950-956.	0.8	11
24	Horizontal Friction Parameters in Soil – Structure Interaction Tasks. Advanced Materials Research, 0, 818, 197-205.	0.3	9
25	Modelling of Foundation Structures with Slide Joints of Temperature Dependant Characteristics. , 0, , .		9
26	Different Types of Pre-Stressed Hollow Core Panels and Their Fire Resistance According to Eurocodes. Journal of Structural Fire Engineering, 2010, 1, 243-248.	0.8	8
27	Comparison of Measured Displacement of the Plate in Interaction with the Subsoil and the Results of 3D Numerical Model. Advanced Materials Research, 0, 1020, 204-209.	0.3	8
28	3D NUMERICAL MODEL IN NONLINEAR ANALYSIS OF THE INTERACTION BETWEEN SUBSOIL AND SFCR SLAB. International Journal of GEOMATE, 2017, 13, .	0.3	8
29	Laboratory Testing of Asphalt Belts with the Influence of Temperature. Transactions of the VAB: Technical University of Ostrava, Civil Engineering Series, 2011, XI, 1-6.	0.3	7
30	Comparison of the Results from Analysis of Nonlinear Homogeneous and Nonlinear Inhomogeneous Half-Space. Procedia Engineering, 2015, 114, 522-529.	1.2	7
31	Numerical Modeling of the Subsoil-Structure Interaction. Key Engineering Materials, 0, 691, 333-343.	0.4	7
32	Comparison of material properties of steel fiber reinforced concrete with two types of steel fiber. IOP Conference Series: Materials Science and Engineering, 2019, 549, 012039.	0.6	7
33	Modeling of Foundation Structures with Sliding Joint Using Results of Asphalt Belts Laboratory Tests. Transactions of the VAB: Technical University of Ostrava, Civil Engineering Series, 2012, XII, 1-7.	0.3	7
34	Finite Element Analysis of a Structure with a Sliding Joint Affected by Deformation Loading. , 0, , .		7
35	Fire Resistance of Ceiling Slab Concreted in Trapezoidal Sheet. Procedia Engineering, 2013, 65, 393-396.	1.2	6
36	Numerical Solution of Temperature Field for Stress Analysis of Plate Structures. Applied Mechanics and Materials, 0, 470, 177-187.	0.2	6

#	ARTICLE	IF	CITATIONS
37	Coupled Timber – Concrete Ceiling Using Bonded Shear Connectors. Advanced Materials Research, 2013, 772, 130-135.	0.3	6
38	Structural Failures of Buildings Caused by Volume Changes of Steel Slag. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2011, 11, 1-9.	0.3	5
39	Experimental Testing of Shear Resistance on SFRC Slab Structures. Materials Science Forum, 0, 893, 363-368.	0.3	4
40	Numerical Analyses of Subsoil-structure Interaction in Original Non-commercial Software based on FEM. IOP Conference Series: Earth and Environmental Science, 2018, 143, 012003.	0.3	4
41	Mechanical properties of concrete with small fibre for numerical modelling. IOP Conference Series: Materials Science and Engineering, 2019, 596, 012036.	0.6	4
42	Experimental Tests of Fiber-Reinforced Concrete Slabs and Comparison of Deformations Using 3D Graphs. Civil and Environmental Engineering, 2021, 17, 96-106.	1.2	4
43	INTERACTION OF NONLINEAR NUMERICAL MODEL OF SFRC SLAB AND NONLINEAR NUMERICAL SUBSOIL MODEL. International Journal of GEOMATE, 2018, 15, .	0.3	4
44	TESTS OF FIBER REINFORCED CONCRETE COMPOSITE SLABS ON THE SUBSOIL WITH HORIZONTAL LOAD. International Journal of GEOMATE, 2020, 18, .	0.3	4
45	Physical and Finite Element Shear Load Response Modelling of Viscoelasticity Materials. , 0, , .		4
46	Modelling and Analysis of Post-Tensioned Masonry. , 0, , .		4
47	Laboratory Measurement of Prestressed Masonry. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2012, XII, 1-6.	0.3	3
48	Experimental measurements of subsoil–structure interaction and 3D numerical models. Perspectives in Science, 2016, 7, 240-246.	0.6	3
49	Thermal changes of the environment and their influence on reinforced concrete structures. IOP Conference Series: Earth and Environmental Science, 2018, 143, 012007.	0.3	3
50	Analysis of Fiber-Reinforced Concrete Slabs under Centric and Eccentric Load. Materials, 2021, 14, 7152.	2.9	3
51	Experimental Measurement of Ground Base Plate / ExperimentInMenZkladovDesky Na Podlo. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2012, 12, 26-31.	0.3	2
52	Analysis of Prestressed Concrete Tower for Wind Turbine Generator. Advanced Materials Research, 2013, 772, 622-629.	0.3	2
53	Comparison of Results of Analyses the Foundation Slab Calculated by Two FEM Programs. Advanced Materials Research, 0, 1065-1069, 1052-1056.	0.3	2
54	Comparison of Experimentally Measured Deformation of the Plate on the Subsoil and the Results of 3D Numerical Model. Transactions of the VB: Technical University of Ostrava, Civil Engineering Series, 2014, 14, 57-66.	0.3	2

#	ARTICLE	IF	CITATIONS
55	Crack Control in Reinforced Concrete Liquid Retaining Structures. Materials Science Forum, 0, 893, 410-415.	0.3	2
56	3D Numerical Model of the Subsoil-Structure Interaction and Comparison of the Results with Experimentally Measured Values. Key Engineering Materials, 0, 738, 298-309.	0.4	2
57	Monitoring of Excessive Deformation of Steel Structure Extra-High Voltage Pylons. Periodica Polytechnica: Civil Engineering, 2017, , .	0.6	2
58	Constitutive Models for Design of Sustainable Concrete Structures. IOP Conference Series: Earth and Environmental Science, 2018, 143, 012036.	0.3	2
59	Measurement of Volume Changes of Cement Concrete in Large-Dimensional Samples. Solid State Phenomena, 2018, 272, 102-106.	0.3	2
60	Finite element analysis of foundation slabs using numerical integration of Boussinesq solution. AIP Conference Proceedings, 2018, , .	0.4	2
61	Numerical Solution of Prestressed Foundation - Subsoil Interaction Using FEM. Key Engineering Materials, 0, 832, 81-88.	0.4	2
62	Approach to numerical modelling of fiber reinforced concrete. Procedia Structural Integrity, 2020, 25, 27-32.	0.8	2
63	Experimental Test of Brick Corner. Transactions of the VAB: Technical University of Ostrava, Civil Engineering Series, 2011, XI, 1-6.	0.3	2
64	Numerical analyses of interaction of steel-fibre reinforced concrete slab model with subsoil. Frattura Ed Integrita Strutturale, 2017, 11, 47-55.	0.9	2
65	Study of Input Parameters of Layered Half-Space used for Soil Modelling. WSEAS Transactions on Applied and Theoretical Mechanics, 2020, 15, 194-205.	1.1	2
66	Reinforced Concrete Structure of the Puppet Theatre in Ostrava. Applied Mechanics and Materials, 0, 744-746, 217-221.	0.2	1
67	COMPARING THE RIGIDITY OF THE PRESTRESSED AND NON-PRESTRESSED FOUNDATION. Jurnal Teknologi (Sciences and Engineering), 2016, 78, .	0.4	1
68	Parallel Code Execution as a Tool for Enhancement of the Sustainable Design of Foundation Structures. Sustainability, 2021, 13, 1145.	3.2	1
69	Parametric Study for Influence of Input Parameters for Analysis of Fibre Reinforced Concrete Slab-Soil Interaction. Transactions of the VAB: Technical University of Ostrava, Civil Engineering Series, 2019, 18, .	0.3	1
70	Diagnostic and Analysis of Specific Soil with Ground Water Level and Plain Concrete Slab Interaction. Acta Montanistica Slovaca, 2020, 25, 427-443.	0.4	1
71	Numerical Modeling and Diagnostic of FRC Slab under Centric and Eccentric Load. Civil and Environmental Engineering, 2022, 18, 17-28.	1.2	1
72	Interaction of Historical Structures with Undermined Territory. IABSE Symposium Report, 2013, , .	0.0	0

#	ARTICLE	IF	CITATIONS
73	Reconstruction of the Municipal Bath House. Advanced Materials Research, 2015, 1122, 115-120.	0.3	0
74	Numerical Modeling of the Interaction of Subsoil and Reinforced Concrete Slab. Solid State Phenomena, 0, 249, 290-295.	0.3	0
75	Design of Bitumen Asphalt Belt Sliding Joint Based on Experiment Results. Key Engineering Materials, 0, 738, 185-194.	0.4	0
76	Frequent Failures of FRC Industrial Floors. Key Engineering Materials, 0, 738, 217-226.	0.4	0
77	Developing of Hydration Heat of the Massive Foundation in the Trávníček-Zlínělezařny. Solid State Phenomena, 2018, 272, 325-330.	0.3	0
78	Parametric Study of Subsoil Based on Elastic Half-Space Theory. , 2018, , .		0
79	2nd International Conference on Sustainable Development in Civil, Urban and Transportation Engineering (CUTE 2018). IOP Conference Series: Earth and Environmental Science, 2018, 143, 011001.	0.3	0
80	Experimental Measurement of Volume Changes on Cement Concrete Depending on the Subsoil. IOP Conference Series: Earth and Environmental Science, 2019, 283, 012008.	0.3	0
81	Efficient application of numerical integration in settlement calculation for iterative coupled analysis of foundation slab interaction. AIP Conference Proceedings, 2019, , .	0.4	0
82	Experimental Measurement, Modeling and Calculation of Volume Changes of Cement Concrete. Key Engineering Materials, 2020, 832, 51-62.	0.4	0
83	SUBSOIL-STRUCTURE INTERACTION SOLVED IN DIFFERENT FEM PROGRAMS. , 2017, , .		0
84	Volume changes of concrete in interaction with sliding joint. , 0, , .		0
85	CONCRETE STRUCTURES INTERACTING WITH SUBSOIL DEPENDING ON THE USE OF SLIDING JOINT. International Journal of GEOMATE, 2020, 18, .	0.3	0
86	REINFORCED CONCRETE SLAB WITH SUBSOIL: NUMERICAL MODELLING AND EXPERIMENT. , 2020, , .		0
87	Numerical modeling of a beam with a hole for verification of the tensile strength. AIP Conference Proceedings, 2022, , .	0.4	0