

# Václav Ranc

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/415294/publications.pdf>

Version: 2024-02-01

72  
papers

2,585  
citations

236612

25  
h-index

197535

49  
g-index

75  
all docs

75  
docs citations

75  
times ranked

4955  
citing authors

#	ARTICLE	IF	CITATIONS
1	Ultrathin Hierarchical Porous Carbon Nanosheets for High-Performance Supercapacitors and Redox Electrolyte Energy Storage. <i>Advanced Materials</i> , 2018, 30, e1705789.	11.1	309
2	Nanoporous Nitrogen-Doped Graphene Oxide/Nickel Sulfide Composite Sheets Derived from a Metal-Organic Framework as an Efficient Electrocatalyst for Hydrogen and Oxygen Evolution. <i>Advanced Functional Materials</i> , 2017, 27, 1700451.	7.8	198
3	Cyanographene and Graphene Acid: Emerging Derivatives Enabling High-Yield and Selective Functionalization of Graphene. <i>ACS Nano</i> , 2017, 11, 2982-2991.	7.3	133
4	Covalent Graphene-MOF Hybrids for High-Performance Asymmetric Supercapacitors. <i>Advanced Materials</i> , 2021, 33, e2004560.	11.1	121
5	Shape-Assisted 2D MOF/Graphene Derived Hybrids as Exceptional Lithium-Ion Battery Electrodes. <i>Advanced Functional Materials</i> , 2019, 29, 1902539.	7.8	118
6	Surfactant-Derived Amphiphilic Carbon Dots with Tunable Photoluminescence. <i>Journal of Physical Chemistry C</i> , 2013, 117, 24991-24996.	1.5	117
7	Room temperature organic magnets derived from sp <sup>3</sup> functionalized graphene. <i>Nature Communications</i> , 2017, 8, 14525.	5.8	112
8	Ultrathin 2D Cobalt Zeolite-Imidazole Framework Nanosheets for Electrocatalytic Oxygen Evolution. <i>Advanced Science</i> , 2018, 5, 1801029.	5.6	92
9	Quaternized carbon dot-modified graphene oxide for selective cell labelling - controlled nucleus and cytoplasm imaging. <i>Chemical Communications</i> , 2014, 50, 10782.	2.2	82
10	Magnetically Assisted Surface-Enhanced Raman Scattering Selective Determination of Dopamine in an Artificial Cerebrospinal Fluid and a Mouse Striatum Using Fe <sub>3</sub> O <sub>4</sub> /Ag Nanocomposite. <i>Analytical Chemistry</i> , 2014, 86, 2939-2946.	3.2	77
11	Fluorinated graphenes as advanced biosensors - effect of fluorine coverage on electron transfer properties and adsorption of biomolecules. <i>Nanoscale</i> , 2016, 8, 12134-12142.	2.8	60
12	Gold nanoparticle-decorated graphene oxide: Synthesis and application in oxidation reactions under benign conditions. <i>Journal of Molecular Catalysis A</i> , 2016, 424, 121-127.	4.8	57
13	Functional Nanosheet Synthons by Covalent Modification of Transition-Metal Dichalcogenides. <i>Chemistry of Materials</i> , 2017, 29, 2066-2073.	3.2	56
14	Magnetically-Assisted Surface Enhanced Raman Spectroscopy (MA-SERS) for Label-Free Determination of Human Immunoglobulin G (IgG) in Blood Using Fe <sub>3</sub> O <sub>4</sub> @Ag Nanocomposite. <i>Analytical Chemistry</i> , 2014, 86, 11107-11114.	3.2	55
15	Mice lacking circadian clock components display different mood-related behaviors and do not respond uniformly to chronic lithium treatment. <i>Chronobiology International</i> , 2015, 32, 1075-1089.	0.9	46
16	Reproducible discrimination between Gram-positive and Gram-negative bacteria using surface enhanced Raman spectroscopy with infrared excitation. <i>Analyst</i> , 2012, 137, 2866.	1.7	45
17	Continuous flow hydrogenation of nitroarenes, azides and alkenes using maghemite-Pd nanocomposites. <i>Catalysis Science and Technology</i> , 2016, 6, 152-160.	2.1	45
18	Base-Free Transfer Hydrogenation of Nitroarenes Catalyzed by Micro-Mesoporous Iron Oxide. <i>ChemCatChem</i> , 2016, 8, 2351-2355.	1.8	44

#	ARTICLE	IF	CITATIONS
19	Synthesis of flower-like magnetite nanoassembly: Application in the efficient reduction of nitroarenes. <i>Scientific Reports</i> , 2017, 7, 11585.	1.6	44
20	Microâ€mesoporous iron oxides with record efficiency for the decomposition of hydrogen peroxide: morphology driven catalysis for the degradation of organic contaminants. <i>Journal of Materials Chemistry A</i> , 2016, 4, 596-604.	5.2	42
21	Fast profiling of anthocyanins in wine by desorption nano-electrospray ionization mass spectrometry. <i>Journal of Chromatography A</i> , 2010, 1217, 4223-4228.	1.8	41
22	Oxidative degradation of triazine- and sulfonyleurea-based herbicides using Fe(VI): The case study of atrazine and iodosulfuron with kinetics and degradation products. <i>Separation and Purification Technology</i> , 2015, 156, 1041-1046.	3.9	37
23	Study on the use of boromycin as a chiral selector in capillary electrophoresis. <i>Journal of Chromatography A</i> , 2012, 1237, 128-132.	1.8	30
24	Re-crystallization of silver nanoparticles in a highly concentrated NaCl environmentâ€a new substrate for surface enhanced IR-visible Raman spectroscopy. <i>CrystEngComm</i> , 2011, 13, 2242.	1.3	27
25	An in situ porous cuprous oxide/nitrogen-rich graphitic carbon nanocomposite derived from a metalâ€organic framework for visible light driven hydrogen evolution. <i>Journal of Materials Chemistry A</i> , 2016, 4, 18037-18042.	5.2	27
26	Nano-Desorption Electrospray and Kinetic Method in Chiral Analysis of Drugs in Whole Human Blood Samples. <i>European Journal of Mass Spectrometry</i> , 2008, 14, 411-417.	0.5	25
27	Pd@Pt Coreâ€Shell Nanoparticles with Branched Dandelionâ€like Morphology as Highly Efficient Catalysts for Olefin Reduction. <i>Chemistry - A European Journal</i> , 2016, 22, 1577-1581.	1.7	24
28	Determination of Some Phenolic Acids in <i>Majorana hortensis</i> by Capillary Electrophoresis with Online Electrokinetic Preconcentration. <i>Journal of Agricultural and Food Chemistry</i> , 2008, 56, 3940-3944.	2.4	23
29	Discrimination of circulating tumor cells of breast cancer and colorectal cancer from normal human mononuclear cells using Raman spectroscopy. <i>Analyst</i> , The, 2013, 138, 5983.	1.7	23
30	Preparation, characterization and antimicrobial efficiency of Ag/PDDA-diatomite nanocomposite. <i>Colloids and Surfaces B: Biointerfaces</i> , 2013, 110, 191-198.	2.5	23
31	Onâ€line preconcentration of perfluorooctanoic acid and perfluorooctanesulfonic acid by nonaqueous capillary electrophoresis. <i>Electrophoresis</i> , 2012, 33, 2159-2166.	1.3	22
32	Study of phenolic profile and antioxidant activity in selected Moravian wines during winemaking process by FT-IR spectroscopy. <i>Journal of Food Science and Technology</i> , 2015, 52, 6405-6414.	1.4	22
33	Chiral analysis by mass spectrometry using the kinetic method in flow systems. <i>Journal of Mass Spectrometry</i> , 2006, 41, 499-506.	0.7	21
34	Electrochemical oxidation of berberine and mass spectrometric identification of its oxidation products. <i>Bioelectrochemistry</i> , 2012, 87, 15-20.	2.4	20
35	Influence of various chloride ion concentrations on silver nanoparticle transformations and effectiveness in surface enhanced Raman scattering for different excitation wavelengths. <i>RSC Advances</i> , 2015, 5, 9737-9744.	1.7	20
36	Polymer-Based Graphene Derivatives and Microwave-Assisted Silver Nanoparticles Decoration as a Potential Antibacterial Agent. <i>Nanomaterials</i> , 2020, 10, 2269.	1.9	20

#	ARTICLE	IF	CITATIONS
37	New Limits for Stability of Supercapacitor Electrode Material Based on Graphene Derivative. <i>Nanomaterials</i> , 2020, 10, 1731.	1.9	20
38	Two-dimensional MOF-based liquid marbles: surface energy calculations and efficient oil-water separation using a ZIF-9-III@PVDF membrane. <i>Journal of Materials Chemistry A</i> , 2021, 9, 23651-23659.	5.2	20
39	Label-free determination of prostate specific membrane antigen in human whole blood at nanomolar levels by magnetically assisted surface enhanced Raman spectroscopy. <i>Analytica Chimica Acta</i> , 2018, 997, 44-51.	2.6	18
40	Detection of Prosthetic Joint Infection Based on Magnetically Assisted Surface Enhanced Raman Spectroscopy. <i>Analytical Chemistry</i> , 2017, 89, 6598-6607.	3.2	17
41	Colloidal Surface Active Maghemite Nanoparticles for Biologically Safe Cr(VI) Remediation: from Core-Shell Nanostructures to Pilot Plant Development. <i>Chemistry - A European Journal</i> , 2016, 22, 14219-14226.	1.7	16
42	Nonenzymatic Oligomerization of 3,5-Cyclic CMP Induced by Proton and UV Irradiation Hints at a Nonfastidious Origin of RNA. <i>ChemBioChem</i> , 2017, 18, 1535-1543.	1.3	16
43	Thermally reduced fluorographenes as efficient electrode materials for supercapacitors. <i>Nanoscale</i> , 2019, 11, 21364-21375.	2.8	15
44	Formic Acid, a Ubiquitous but Overlooked Component of the Early Earth Atmosphere. <i>Chemistry - A European Journal</i> , 2020, 26, 12075-12080.	1.7	15
45	Assessment of CE for the identification of microorganisms. <i>Electrophoresis</i> , 2009, 30, 444-449.	1.3	14
46	Analysis of buserelin in urine by online combination of capillary zone electrophoresis with electrospray mass spectrometry. <i>Electrophoresis</i> , 2010, 31, 1234-1240.	1.3	14
47	Determination of rosiglitazone and metformin in human serum by CE-ESI-MS. <i>Journal of Separation Science</i> , 2011, 34, 1167-1173.	1.3	14
48	Carboxymethylcellulose-based magnetic Au or Ag nanosystems: Eminent candidates in catalysis, sensing applications based on SERS, and electrochemistry. <i>Applied Materials Today</i> , 2019, 14, 143-150.	2.3	13
49	Broad characterization of endogenous peptides in the tree shrew visual system. <i>Journal of Proteomics</i> , 2012, 75, 2526-2535.	1.2	12
50	Preparative isotachopheresis with surface enhanced Raman scattering as a promising tool for clinical samples analysis. <i>Journal of Chromatography A</i> , 2011, 1218, 205-210.	1.8	11
51	Graphene Oxide Nanoplatfoms to Enhance Cisplatin-Based Drug Delivery in Anticancer Therapy. <i>Nanomaterials</i> , 2022, 12, 2372.	1.9	11
52	Multiplex competitive analysis of HER2 and EpCAM cancer markers in whole human blood using Fe <sub>2</sub> O <sub>3</sub> @Ag nanocomposite. <i>Applied Materials Today</i> , 2018, 13, 166-173.	2.3	10
53	Altered neurochemical levels in the rat brain following chronic nicotine treatment. <i>Journal of Chemical Neuroanatomy</i> , 2014, 59-60, 29-35.	1.0	9
54	Imaging of growth factors on a human tooth root canal by surface-enhanced Raman spectroscopy. <i>Analytical and Bioanalytical Chemistry</i> , 2018, 410, 7113-7120.	1.9	9

#	ARTICLE	IF	CITATIONS
55	High frequency acoustic emission monitoring in nano-impact of alumina and partially stabilised zirconia. <i>Materials Science &amp; Engineering A: Structural Materials: Properties, Microstructure and Processing</i> , 2020, 780, 139159.	2.6	8
56	Asymmetric Supercapacitors: Covalent Graphene-MOF Hybrids for High-Performance Asymmetric Supercapacitors ( <i>Adv. Mater.</i> 4/2021). <i>Advanced Materials</i> , 2021, 33, 2170028.	11.1	8
57	Ultrafine TiO <sub>2</sub> Nanoparticle Supported Nitrogen-Rich Graphitic Porous Carbon as an Efficient Anode Material for Potassium-Ion Batteries. <i>Advanced Energy and Sustainability Research</i> , 2021, 2, 2100042.	2.8	8
58	Quantification of purine basis in their mixtures at femtomolar concentration levels using FT-SERS. <i>Journal of Raman Spectroscopy</i> , 2012, 43, 971-976.	1.2	7
59	Preparation of silver particles and its application for surface enhanced Raman scattering with near-infrared excitation. <i>Materials Research Bulletin</i> , 2014, 50, 63-67.	2.7	6
60	Discrimination of Cheese Products for Authenticity Control by Infrared Spectroscopy. <i>Journal of Agricultural and Food Chemistry</i> , 2012, 60, 1845-1849.	2.4	5
61	Secondary processes in atmospheric pressure chemical ionization-ion trap mass spectrometry: a case study of orotic acid. <i>Journal of Mass Spectrometry</i> , 2012, 47, 720-726.	0.7	4
62	Nanoindentation-Induced Phase Transformation in Silicon Thin Films. <i>Key Engineering Materials</i> , 0, 586, 112-115.	0.4	4
63	Chiral discrimination of amino acids using phosphorene assisted graphene-enhanced Raman spectroscopy. <i>Analytica Chimica Acta</i> , 2020, 1129, 69-75.	2.6	4
64	Magnesium interference and different efficiencies of diastereoisomeric cluster formation in phenylalanine enantiomeric discrimination by the kinetic method. <i>International Journal of Mass Spectrometry</i> , 2009, 280, 213-217.	0.7	3
65	A fast determination of yohimbine in pharmaceuticals by micellar electrokinetic chromatography. <i>Open Chemistry</i> , 2010, 8, 273-277.	1.0	3
66	Base-free Transfer Hydrogenation of Nitroarenes Catalyzed by Micro-mesoporous Iron Oxide. <i>ChemCatChem</i> , 2016, 8, 2298-2298.	1.8	3
67	Perspectives of DCDR-GERS in the analysis of amino acids. <i>Analyst, The</i> , 2020, 145, 7701-7708.	1.7	3
68	Nanoelectrospray versus electrospray in chiral analysis by the kinetic method. <i>Collection of Czechoslovak Chemical Communications</i> , 2009, 74, 313-322.	1.0	3
69	2D Metal-Organic Frameworks: Ultrathin 2D Cobalt Zeolite-Imidazole Framework Nanosheets for Electrocatalytic Oxygen Evolution ( <i>Adv. Sci.</i> 11/2018). <i>Advanced Science</i> , 2018, 5, 1870072.	5.6	1
70	Electrocatalysis: Nanoporous Nitrogen-Doped Graphene Oxide/Nickel Sulfide Composite Sheets Derived from a Metal-Organic Framework as an Efficient Electrocatalyst for Hydrogen and Oxygen Evolution ( <i>Adv. Funct. Mater.</i> 33/2017). <i>Advanced Functional Materials</i> , 2017, 27, .	7.8	1
71	How to Preserve Documents: A Short Meditation on Three Themes. <i>Challenges</i> , 2011, 2, 37-42.	0.9	0
72	Label-free determination and multiplex analysis of DNA and RNA in tumor tissues. <i>Applied Materials Today</i> , 2018, 12, 85-91.	2.3	0