# ValericÄ Raicu

## List of Publications by Year in descending order



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|---|---|---|---|
| 51 papers | 1,478 citations | 304743 22 h-index | 330143 37 g-index |
| 56 all docs | 56 docs citations | 56 times ranked | 1376 citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Potentials induced by applied electrical fields in and around particles comprised of four dielectric layers. Bioelectrochemistry, 2022, 144, 108039. | 4.6 | 0 |
| 2 | Fluorescence Intensity Fluctuation Analysis of Protein Oligomerization in Cell Membranes. Current Protocols, 2022, 2, e384. | 2.9 | 2 |
| 3 | The M <sub>1</sub> muscarinic receptor is present in situ as a ligand-regulated mixture of monomers and oligomeric complexes. Proceedings of the National Academy of Sciences of the United States of America, 2022, 119, . | 7.1 | 4 |
| 4 | Chemokine receptor CXCR4 oligomerization is disrupted selectively by the antagonist ligand IT1t. Journal of Biological Chemistry, 2021, 296, 100139. | 3.4 | 15 |
| 5 | Real time monitoring of the evolution of an epidemic regarded as a physical relaxation process. Physics Letters, Section A: General, Atomic and Solid State Physics, 2021, 388, 127074. | 2.1 | 0 |
| 6 | Dielectric Spectroscopy Based Detection of Specific and Nonspecific Cellular Mechanisms. Sensors, 2021, 21, 3177. | 3.8 | 3 |
| 7 | Fluorescence intensity fluctuation analysis of receptor oligomerization in membrane domains. Biophysical Journal, 2021, 120, 3028-3039. | 0.5 | 5 |
| 8 | Comparative photophysical properties of some widely used fluorescent proteins under two-photon excitation conditions. Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy, 2021, 262, 120133. | 3.9 | 10 |
| 9 | In-Cell Detection of Conformational Substates of a G Protein-Coupled Receptor Quaternary Structure: Modulation of Substate Probability by Cognate Ligand Binding. Journal of Physical Chemistry B, 2020, 124, 10062-10076. | 2.6 | 10 |
| 10 | Tissue Factor Oligomerization in Living Cells Using FÃ¶rster Resonance Energy Transfer. Microscopy and Microanalysis, 2020, 26, 828-829. | 0.4 | 2 |
| 11 | Proposal for simultaneous analysis of fluorescence intensity fluctuations and resonance energy transfer (IFRET) measurements. Methods and Applications in Fluorescence, 2020, 8, 035011. | 2.3 | 4 |
| 12 | Reply to: Spatial heterogeneity in molecular brightness. Nature Methods, 2020, 17, 276-278. | 19.0 | 6 |
| 13 | Fluorescence-based Methods for the Study of Protein-Protein Interactions Modulated by Ligand Binding. Current Pharmaceutical Design, 2020, 26, 5668-5683. | 1.9 | 10 |
| 14 | A general method to quantify ligand-driven oligomerization from fluorescence-based images. Nature Methods, 2019, 16, 493-496. | 19.0 | 47 |
| 15 | Ab Initio Derivation of the FRET Equations Resolves Old Puzzles and Suggests Measurement Strategies. Biophysical Journal, 2019, 116, 1313-1327. | 0.5 | 6 |
| 16 | Relaxation in systems with hierarchical organization: Analytical derivation of the relaxation and dispersion functions. Physics Letters, Section A: General, Atomic and Solid State Physics, 2019, 383, 1063-1070. | 2.1 | 2 |
| 17 | Extraction of information on macromolecular interactions from fluorescence micro-spectroscopy measurements in the presence and absence of FRET. Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy, 2018, 199, 340-348. | 3.9 | 6 |
| 18 | New Techniques to Study Intracellular Receptors in Living Cells: Insights Into RIG-I-Like Receptor Signaling. Advances in Experimental Medicine and Biology, 2018, 1111, 219-240. | 1.6 | 1 |

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|---|---|---|---|
| 19 | Adaptation to Endoplasmic Reticulum Stress Requires Transphosphorylation within the Activation Loop of Protein Kinases Kin1 and Kin2, Orthologs of Human Microtubule Affinity-Regulating Kinase. Molecular and Cellular Biology, 2018, 38, . | 2.3 | 4 |
| 20 | Investigation of dielectric relaxation in systems with hierarchical organization: From time to frequency domain and back again. Physics Letters, Section A: General, Atomic and Solid State Physics, 2017, 381, 1981-1988. | 2.1 | 5 |
| 21 | Quantitative microspectroscopic imaging reveals viral and cellular RNA helicase interactions in live cells. Journal of Biological Chemistry, 2017, 292, 11165-11177. | 3.4 | 9 |
| 22 | Two SERK Receptor-Like Kinases Interact with EMS1 to Control Anther Cell Fate Determination. Plant Physiology, 2017, 173, 326-337. | 4.8 | 72 |
| 23 | Carbonic Anhydrases Function in Anther Cell Differentiation Downstream of the Receptor-Like Kinase EMS1. Plant Cell, 2017, 29, 1335-1356. | 6.6 | 52 |
| 24 | Blue/violet laser inactivates methicillin-resistant Staphylococcus aureus by altering its transmembrane potential. Journal of Photochemistry and Photobiology B: Biology, 2017, 170, 118-124. | 3.8 | 55 |
| 25 | Understanding the FRET Signatures of Interacting Membrane Proteins. Journal of Biological Chemistry, 2017, 292, 5291-5310. | 3.4 | 62 |
| 26 | Quaternary structure of the yeast pheromone receptor Ste2 in living cells. Biochimica Et Biophysica Acta - Biomembranes, 2017, 1859, 1456-1464. | 2.6 | 28 |
| 27 | Advanced Microscopy Techniques. , 2017, , 39-75. | | 4 |
| 28 | Quaternary structures of opsin in live cells revealed by FRET spectrometry. Biochemical Journal, 2016, 473, 3819-3836. | 3.7 | 48 |
| 29 | Fully quantified spectral imaging revealsin vivomembrane protein interactions. Integrative Biology (United Kingdom), 2016, 8, 216-229. | 1.3 | 82 |
| 30 | Crossâ€talk between a regulatory small <scp>RNA</scp>, cyclicâ€diâ€<scp>GMP</scp> signalling and flagellar regulator <scp>FlhDC</scp> for virulence and bacterial behaviours. Environmental Microbiology, 2015, 17, 4745-4763. | 3.8 | 34 |
| 31 | The sigma-1 receptors are present in monomeric and oligomeric forms in living cells in the presence and absence of ligands. Biochemical Journal, 2015, 466, 263-271. | 3.7 | 101 |
| 32 | Experimental Verification of the Kinetic Theory of FRET Using Optical Microspectroscopy and Obligate Oligomers. Biophysical Journal, 2015, 108, 1613-1622. | 0.5 | 19 |
| 33 | The relative antimicrobial effect of blue 405Ânm LED and blue 405Ânm laser on methicillin-resistant Staphylococcus aureus in vitro. Lasers in Medical Science, 2015, 30, 2265-2271. | 2.1 | 43 |
| 34 | Development and Experimental Testing of an Optical Micro-Spectroscopic Technique Incorporating True Line-Scan Excitation. International Journal of Molecular Sciences, 2014, 15, 261-276. | 4.1 | 57 |
| 35 | FRET Spectrometry: A New Tool for the Determination of Protein Quaternary Structure in Living Cells. Biophysical Journal, 2013, 105, 1937-1945. | 0.5 | 54 |
| 36 | Determination of the quaternary structure of a bacterial ATP-binding cassette (ABC) transporter in living cells. Integrative Biology (United Kingdom), 2013, 5, 312-323. | 1.3 | 31 |

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|---|---|---|---|
| 37 | An Ire1â€“Phk1 Chimera Reveals a Dispensable Role of Autokinase Activity in Endoplasmic Reticulum Stress Response. Journal of Molecular Biology, 2013, 425, 2083-2099. | 4.2 | 17 |
| 38 | The muscarinic M3 acetylcholine receptor exists as two differently sized complexes at the plasma membrane. Biochemical Journal, 2013, 452, 303-312. | 3.7 | 72 |
| 39 | Quantifying the efficiency of various FRET constructs using OptiMiSâ„¢. BioTechniques, 2012, 52, 191-195. | 1.8 | 3 |
| 40 | In vivo Quantification of G Protein Coupled Receptor Interactions using Spectrally Resolved Two-photon Microscopy. Journal of Visualized Experiments, 2011, , . | 0.3 | 3 |
| 41 | Oligomeric Size of the M2 Muscarinic Receptor in Live Cells as Determined by Quantitative Fluorescence Resonance Energy Transfer. Journal of Biological Chemistry, 2010, 285, 16723-16738. | 3.4 | 63 |
| 42 | Comparison between Whole Distribution- and Average-Based Approaches to the Determination of Fluorescence Resonance Energy Transfer Efficiency in Ensembles of Proteins in Living Cells. Biophysical Journal, 2010, 98, 2127-2135. | 0.5 | 28 |
| 43 | Determination of supramolecular structure and spatial distribution of protein complexes in living cells. Nature Photonics, 2009, 3, 107-113. | 31.4 | 102 |
| 44 | Real-time monitoring of two-photon photopolymerization for use in fabrication of microfluidic devices. Lab on A Chip, 2009, 9, 819-827. | 6.0 | 38 |
| 45 | Determination of two-photon excitation and emission spectra of fluorescent molecules in single living cells. , 2008, , . | | 2 |
| 46 | Combined spectrally-resolved multiphoton microscopy and transmission microscopy employing a high-sensitivity electron-multiplying CCD camera. , 2007, , . | | 3 |
| 47 | Efficiency of Resonance Energy Transfer in Homo-Oligomeric Complexes of Proteins. Journal of Biological Physics, 2007, 33, 109-127. | 1.5 | 71 |
| 48 | Protein interaction quantified in vivo by spectrally resolved fluorescence resonance energy transfer. Biochemical Journal, 2005, 385, 265-277. | 3.7 | 77 |
| 49 | Determination of the Feâ”CO Bond Energy in Myoglobin Using Heterodyne-Detected Transient Thermal Phase Grating Spectroscopy. Journal of Physical Chemistry B, 2005, 109, 20605-20611. | 2.6 | 20 |
| 50 | Non-Debye dielectric relaxation in biological structures arises from their fractal nature. Physical Review E, 2001, 64, 021916. | 2.1 | 19 |
| 51 | Dielectric properties of yeast cells as simulated by the two-shell model. Biochimica Et Biophysica Acta - Bioenergetics, 1996, 1274, 143-148. | 1.0 | 65 |