

Giovanni Longo

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/8346396/publications.pdf>

Version: 2024-02-01

71
papers

2,220
citations

257357

24
h-index

243529

44
g-index

72
all docs

72
docs citations

72
times ranked

3325
citing authors

| # | ARTICLE | IF | CITATIONS |
|----|---|------|-----------|
| 1 | Rapid detection of bacterial resistance to antibiotics using AFM cantilevers as nanomechanical sensors. <i>Nature Nanotechnology</i> , 2013, 8, 522-526. | 15.6 | 296 |
| 2 | Infrared nanospectroscopy characterization of oligomeric and fibrillar aggregates during amyloid formation. <i>Nature Communications</i> , 2015, 6, 7831. | 5.8 | 245 |
| 3 | Nanoscale studies link amyloid maturity with polyglutamine diseases onset. <i>Scientific Reports</i> , 2016, 6, 31155. | 1.6 | 130 |
| 4 | Detecting nanoscale vibrations as signature of life. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015, 112, 378-381. | 3.3 | 118 |
| 5 | Mechanical properties of biological specimens explored by atomic force microscopy. <i>Journal Physics D: Applied Physics</i> , 2013, 46, 133001. | 1.3 | 113 |
| 6 | The role of oxidative stress in Friedreich's ataxia. <i>FEBS Letters</i> , 2018, 592, 718-727. | 1.3 | 76 |
| 7 | The how, when, and why of the aging signals appearing on the human erythrocyte membrane: an atomic force microscopy study of surface roughness. <i>Nanomedicine: Nanotechnology, Biology, and Medicine</i> , 2010, 6, 760-768. | 1.7 | 68 |
| 8 | Investigation of resins suitable for the preparation of biological sample for 3-D electron microscopy. <i>Journal of Structural Biology</i> , 2015, 189, 135-146. | 1.3 | 61 |
| 9 | Nanomechanical sensor applied to blood culture pellets: a fast approach to determine the antibiotic susceptibility against agents of bloodstream infections. <i>Clinical Microbiology and Infection</i> , 2017, 23, 400-405. | 2.8 | 54 |
| 10 | Carboxylic acid terminated monolayer formation on crystalline silicon and silicon nitride surfaces. A surface coverage determination with a fluorescent probe in solution. Electronic Supplementary Information (ESI) available: analytical data of the new compounds and general information on the instruments used for their characterization. See http://www.rsc.org/suppdata/jm/b3/b312273e/ . <i>Journal of Materials Chemistry</i> , 2004, 14, 1461. | 6.7 | 50 |
| 11 | Force volume and stiffness tomography investigation on the dynamics of stiff material under bacterial membranes. <i>Journal of Molecular Recognition</i> , 2012, 25, 278-284. | 1.1 | 47 |
| 12 | Antibiotic-induced modifications of the stiffness of bacterial membranes. <i>Journal of Microbiological Methods</i> , 2013, 93, 80-84. | 0.7 | 46 |
| 13 | Identification of Oxidative Stress in Red Blood Cells with Nanoscale Chemical Resolution by Infrared Nanospectroscopy. <i>International Journal of Molecular Sciences</i> , 2018, 19, 2582. | 1.8 | 46 |
| 14 | Direct-write nanoscale printing of nanogranular tunnelling strain sensors for sub-micrometre cantilevers. <i>Nature Communications</i> , 2016, 7, 12487. | 5.8 | 40 |
| 15 | Osseointegration is improved by coating titanium implants with a nanostructured thin film with titanium carbide and titanium oxides clustered around graphitic carbon. <i>Materials Science and Engineering C</i> , 2017, 70, 264-271. | 3.8 | 39 |
| 16 | Combination of fluorescence microscopy and nanomotion detection to characterize bacteria. <i>Journal of Molecular Recognition</i> , 2013, 26, 590-595. | 1.1 | 34 |
| 17 | Effects of antibacterial agents and drugs monitored by atomic force microscopy. <i>Wiley Interdisciplinary Reviews: Nanomedicine and Nanobiotechnology</i> , 2014, 6, 230-244. | 3.3 | 34 |
| 18 | Hyperplectonemes: A Higher Order Compact and Dynamic DNA Self-Organization. <i>Nano Letters</i> , 2017, 17, 1938-1948. | 4.5 | 34 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 19 | Stiffness tomography exploration of living and fixed macrophages. <i>Journal of Molecular Recognition</i> , 2012, 25, 241-246. | 1.1 | 33 |
| 20 | Erythrocyteâ€™s aging in microgravity highlights how environmental stimuli shape metabolism and morphology. <i>Scientific Reports</i> , 2018, 8, 5277. | 1.6 | 31 |
| 21 | Controlled loading of oligodeoxyribonucleotide monolayers onto unoxidized crystalline silicon; fluorescence-based determination of the surface coverage and of the hybridization efficiency; parallel imaging of the process by Atomic Force Microscopy. <i>Nucleic Acids Research</i> , 2006, 34, e32-e32. | 6.5 | 30 |
| 22 | Time-Lapse AFM Imaging of DNA Conformational Changes Induced by Daunorubicin. <i>Nano Letters</i> , 2013, 13, 5679-5684. | 4.5 | 27 |
| 23 | Nanomotion detection based on atomic force microscopy cantilevers. <i>Cell Surface</i> , 2019, 5, 100021. | 1.5 | 27 |
| 24 | The response of giant phospholipid vesicles to millimeter waves radiation. <i>Biochimica Et Biophysica Acta - Biomembranes</i> , 2009, 1788, 1497-1507. | 1.4 | 26 |
| 25 | Real-Time Monitoring of Protein Conformational Changes Using a Nano-Mechanical Sensor. <i>PLoS ONE</i> , 2014, 9, e103674. | 1.1 | 26 |
| 26 | A Rapid Unraveling of the Activity and Antibiotic Susceptibility of Mycobacteria. <i>Antimicrobial Agents and Chemotherapy</i> , 2019, 63, . | 1.4 | 23 |
| 27 | A perspective view on the nanomotion detection of living organisms and its features. <i>Journal of Molecular Recognition</i> , 2020, 33, e2849. | 1.1 | 23 |
| 28 | Improving Osteoblast Response In Vitro by a Nanostructured Thin Film with Titanium Carbide and Titanium Oxides Clustered around Graphitic Carbon. <i>PLoS ONE</i> , 2016, 11, e0152566. | 1.1 | 21 |
| 29 | Modelling the pathogenesis of Myotonic Dystrophy type 1 cardiac phenotype through human iPSC-derived cardiomyocytes. <i>Journal of Molecular and Cellular Cardiology</i> , 2018, 118, 95-109. | 0.9 | 21 |
| 30 | Nanotools and molecular techniques to rapidly identify and fight bacterial infections. <i>Journal of Microbiological Methods</i> , 2017, 138, 72-81. | 0.7 | 20 |
| 31 | Amyloid single-cell cytotoxicity assays by nanomotion detection. <i>Cell Death Discovery</i> , 2017, 3, 17053. | 2.0 | 20 |
| 32 | Different membrane modifications revealed by atomic force/lateral force microscopy after doping of human pancreatic cells with Cd, Zn, or Pb. <i>Microscopy Research and Technique</i> , 2007, 70, 912-917. | 1.2 | 19 |
| 33 | Localization of adhesins on the surface of a pathogenic bacterial envelope through atomic force microscopy. <i>Nanoscale</i> , 2015, 7, 17563-17572. | 2.8 | 19 |
| 34 | Effects of sedimentation, microgravity, hydrodynamic mixing and airâ€™water interface on Î±-synuclein amyloid formation. <i>Chemical Science</i> , 2020, 11, 3687-3693. | 3.7 | 18 |
| 35 | Effect of titanium carbide coating by ion plating plasma-assisted deposition on osteoblast response: A chemical, morphological and gene expression investigation. <i>Surface and Coatings Technology</i> , 2010, 204, 2605-2612. | 2.2 | 16 |
| 36 | A universal fluid cell for the imaging of biological specimens in the atomic force microscope. <i>Microscopy Research and Technique</i> , 2013, 76, 357-363. | 1.2 | 16 |

| # | ARTICLE | IF | CITATIONS |
|----|---|------|-----------|
| 37 | Study of ageing effects in aerogel. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2004, 527, 319-328. | 0.7 | 15 |
| 38 | Insights into the morphological pattern of erythrocytes' aging: Coupling quantitative AFM data to microcalorimetry and Raman spectroscopy. Journal of Molecular Recognition, 2018, 31, e2732. | 1.1 | 15 |
| 39 | AFM and SNOM characterization of carboxylic acid terminated silicon and silicon nitride surfaces. Surface Science, 2003, 544, 51-57. | 0.8 | 14 |
| 40 | Implementation of a bimorph-based aperture tapping-SNOM with an incubator to study the evolution of cultured living cells. Journal of Microscopy, 2008, 229, 433-439. | 0.8 | 14 |
| 41 | Graphitic carbon in a nanostructured titanium oxycarbide thin film to improve implant osseointegration. Materials Science and Engineering C, 2015, 46, 409-416. | 3.8 | 14 |
| 42 | FC_analysis: a tool for investigating atomic force microscopy maps of force curves. BMC Bioinformatics, 2018, 19, 258. | 1.2 | 14 |
| 43 | Infrared near-field microscopy with the Vanderbilt free electron laser: overview and perspectives. Infrared Physics and Technology, 2004, 45, 409-416. | 1.3 | 13 |
| 44 | Morphological characterization of innovative electroconductive polymers in early stages of growth. Surface and Coatings Technology, 2012, 207, 286-292. | 2.2 | 13 |
| 45 | Environmental Control of Amyloid Polymorphism by Modulation of Hydrodynamic Stress. ACS Nano, 2021, 15, 944-953. | 7.3 | 13 |
| 46 | Pd layer on cube-textured substrates for MOD-TFA and PLD YBCO coated conductors. Superconductor Science and Technology, 2008, 21, 015003. | 1.8 | 11 |
| 47 | Detection of Nanostructured Metal in Meteorites: Implications for the Reddening of Asteroids. Astrophysical Journal, 2005, 634, L117-L120. | 1.6 | 10 |
| 48 | Scanning probe microscopy in material science and biology. Journal Physics D: Applied Physics, 2011, 44, 464008. | 1.3 | 10 |
| 49 | An Alternative Tapping Scanning Near-Field Optical Microscope Setup Enabling the Study of Biological Systems in Liquid Environment. Japanese Journal of Applied Physics, 2006, 45, 2333-2336. | 0.8 | 8 |
| 50 | Detected twice for good measure. Nature Nanotechnology, 2014, 9, 959-960. | 15.6 | 8 |
| 51 | Methods for Atomic Force Microscopy of Biological and Living Specimens. Methods in Molecular Biology, 2018, 1814, 529-539. | 0.4 | 8 |
| 52 | A new tool to determine the cellular metabolic landscape: nanotechnology to the study of Friedreich's ataxia. Scientific Reports, 2019, 9, 19282. | 1.6 | 8 |
| 53 | An inverted/scanning near-field optical microscope for applications in materials science and biology. Physica Status Solidi (B): Basic Research, 2010, 247, 2051-2055. | 0.7 | 7 |
| 54 | AFM nano-mechanical study of the beating profile of hiPSC-derived cardiomyocytes beating bodies WT and DM1. Journal of Molecular Recognition, 2018, 31, e2725. | 1.1 | 6 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 55 | A Review of the Effect of a Nanostructured Thin Film Formed by Titanium Carbide and Titanium Oxides Clustered around Carbon in Graphitic Form on Osseointegration. <i>Nanomaterials</i> , 2020, 10, 1233. | 1.9 | 6 |
| 56 | Nanomotion Spectroscopy as a New Approach to Characterize Bacterial Virulence. <i>Microorganisms</i> , 2021, 9, 1545. | 1.6 | 6 |
| 57 | Measuring Cytoskeleton and Cellular Membrane Mechanical Properties by Atomic Force Microscopy. <i>Methods in Molecular Biology</i> , 2015, 1232, 153-159. | 0.4 | 6 |
| 58 | IR-SNOM on lithium fluoride films with regular arrays based on colour centres. <i>Physica Status Solidi C: Current Topics in Solid State Physics</i> , 2003, 0, 3075-3080. | 0.8 | 5 |
| 59 | A novel tapping SNOM: Specifications and performances. <i>Physica Status Solidi (B): Basic Research</i> , 2005, 242, 3070-3074. | 0.7 | 5 |
| 60 | AFM for diagnosis of nanocrystallization of steels in hardening processes. <i>Journal of Microscopy</i> , 2008, 230, 218-223. | 0.8 | 5 |
| 61 | Nanostructured TiC Layer is Highly Suitable Surface for Adhesion, Proliferation and Spreading of Cells. <i>Condensed Matter</i> , 2020, 5, 29. | 0.8 | 5 |
| 62 | An AFM investigation of oligonucleotides anchored on unoxidized crystalline silicon surfaces. <i>New Biotechnology</i> , 2007, 24, 53-58. | 2.7 | 4 |
| 63 | A multipurpose hybrid conventional/scanning near-field optical microscope for applications in materials science and biology. <i>Measurement Science and Technology</i> , 2010, 21, 045502. | 1.4 | 4 |
| 64 | Multivariate analysis of mean Raman spectra of erythrocytes for a fast analysis of the biochemical signature of ageing. <i>Talanta</i> , 2021, 221, 121442. | 2.9 | 4 |
| 65 | Optical super-resolution using higher harmonics and different acquisition modes in an aperture tapping SNOM. <i>Physica Status Solidi (B): Basic Research</i> , 2010, 247, 2056-2060. | 0.7 | 3 |
| 66 | Metal-based micro and nanosized pollutant in marine organisms: What can we learn from a combined atomic force microscopy & scanning electron microscopy study. <i>Journal of Molecular Recognition</i> , 2020, 33, e2851. | 1.1 | 3 |
| 67 | Optical nanospectroscopy applications in material science. <i>Applied Surface Science</i> , 2004, 234, 374-386. | 3.1 | 2 |
| 68 | AFM and SNOM characterization of ordinary chondrites: A contribution to solving the problem of asteroid reddening. <i>Physica Status Solidi (B): Basic Research</i> , 2010, 247, 2061-2066. | 0.7 | 2 |
| 69 | AFM AND SNOM TECHNIQUES AT ISM: AN OVERVIEW. , 2009, , . | | 0 |
| 70 | CHARACTERISATION OF POLYANILINE CONDUCTIVE COMPOSITES. , 2001, , . | | 0 |
| 71 | AN AFM INVESTIGATION OF OLIGONUCLEOTIDES ANCHORED ON AN UNOXIDIZED CRYSTALLINE SILICON SURFACE. , 2006, , . | | 0 |