

Maarten B J Roeffaers

List of Publications by Year in descending order

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209
papers

12,654
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22153

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224
all docs

224
docs citations

224
times ranked

14930
citing authors

| # | ARTICLE | IF | CITATIONS |
|----|--|------|-----------|
| 1 | State of the Art and Prospects for Halide Perovskite Nanocrystals. ACS Nano, 2021, 15, 10775-10981. | 14.6 | 705 |
| 2 | Iron(III)-Based Metal-Organic Frameworks As Visible Light Photocatalysts. Journal of the American Chemical Society, 2013, 135, 14488-14491. | 13.7 | 502 |
| 3 | Interfacial synthesis of hollow metal-organic framework capsules demonstrating selective permeability. Nature Chemistry, 2011, 3, 382-387. | 13.6 | 483 |
| 4 | Thermal nonequilibrium of strained black CsPbI ₃ thin films. Science, 2019, 365, 679-684. | 12.6 | 444 |
| 5 | Spatially resolved observation of crystal-face-dependent catalysis by single turnover counting. Nature, 2006, 439, 572-575. | 27.8 | 434 |
| 6 | Solar-Driven Metal Halide Perovskite Photocatalysis: Design, Stability, and Performance. ACS Energy Letters, 2020, 5, 1107-1123. | 17.4 | 400 |
| 7 | Ambient black carbon particles reach the fetal side of human placenta. Nature Communications, 2019, 10, 3866. | 12.8 | 383 |
| 8 | It's a trap! On the nature of localised states and charge trapping in lead halide perovskites. Materials Horizons, 2020, 7, 397-410. | 12.2 | 345 |
| 9 | Degradation of Methylammonium Lead Iodide Perovskite Structures through Light and Electron Beam Driven Ion Migration. Journal of Physical Chemistry Letters, 2016, 7, 561-566. | 4.6 | 234 |
| 10 | Efficient and Selective Photocatalytic Oxidation of Benzylic Alcohols with Hybrid Organic-Inorganic Perovskite Materials. ACS Energy Letters, 2018, 3, 755-759. | 17.4 | 222 |
| 11 | Giant Electron-Phonon Coupling and Deep Conduction Band Resonance in Metal Halide Double Perovskite. ACS Nano, 2018, 12, 8081-8090. | 14.6 | 190 |
| 12 | Super-Resolution Reactivity Mapping of Nanostructured Catalyst Particles. Angewandte Chemie - International Edition, 2009, 48, 9285-9289. | 13.8 | 175 |
| 13 | Photophysical Pathways in Highly Sensitive Cs ₂ AgBiBr ₆ Double-Perovskite Single-Crystal X-ray Detectors. Advanced Materials, 2018, 30, e1804450. | 21.0 | 173 |
| 14 | Characterization of Fluorescence in Heat-Treated Silver-Exchanged Zeolites. Journal of the American Chemical Society, 2009, 131, 3049-3056. | 13.7 | 170 |
| 15 | Direct Z-Scheme Heterojunction of Semicoherent FAPbBr ₃ /Bi ₂ WO ₆ Interface for Photoredox Reaction with Large Driving Force. ACS Nano, 2020, 14, 16689-16697. | 14.6 | 167 |
| 16 | Small molecule perimeter defense in entomopathogenic bacteria. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 10821-10826. | 7.1 | 165 |
| 17 | <i>p</i> -Xylene-Selective Metal-Organic Frameworks: A Case of Topology-Directed Selectivity. Journal of the American Chemical Society, 2011, 133, 18526-18529. | 13.7 | 159 |
| 18 | Tuning the energetics and tailoring the optical properties of silver clusters confined in zeolites. Nature Materials, 2016, 15, 1017-1022. | 27.5 | 153 |

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|----|---|------|-----------|
| 19 | Fluorescence micro(spectro)scopy as a tool to study catalytic materials in action. Chemical Society Reviews, 2010, 39, 4703. | 38.1 | 150 |
| 20 | Morphology of Large ZSM-5 Crystals Unraveled by Fluorescence Microscopy. Journal of the American Chemical Society, 2008, 130, 5763-5772. | 13.7 | 147 |
| 21 | Edge stabilization in reduced-dimensional perovskites. Nature Communications, 2020, 11, 170. | 12.8 | 147 |
| 22 | Single-molecule fluorescence spectroscopy in (bio)catalysis. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 12603-12609. | 7.1 | 138 |
| 23 | Hot Electron Tunneling of Metal-Insulator-COF Nanostructures for Efficient Hydrogen Production. Angewandte Chemie - International Edition, 2019, 58, 18290-18294. | 13.8 | 138 |
| 24 | Subsurface Defect Engineering in Single-Unit-Cell Bi ₂ WO ₆ Monolayers Boosts Solar-Driven Photocatalytic Performance. ACS Catalysis, 2020, 10, 1439-1443. | 11.2 | 138 |
| 25 | Origin of the bright photoluminescence of few-atom silver clusters confined in LTA zeolites. Science, 2018, 361, 686-690. | 12.6 | 134 |
| 26 | Label-Free Live-Cell Imaging of Nucleic Acids Using Stimulated Raman Scattering Microscopy. ChemPhysChem, 2012, 13, 1054-1059. | 2.1 | 133 |
| 27 | Subdiffraction Imaging through the Selective Donut-Mode Depletion of Thermally Stable Photoswitchable Fluorophores: Numerical Analysis and Application to the Fluorescent Protein Dronpa. Journal of the American Chemical Society, 2007, 129, 16132-16141. | 13.7 | 130 |
| 28 | High-Resolution Single-Turnover Mapping Reveals Intraparticle Diffusion Limitation in Ti-MCM-41 Catalyzed Epoxidation. Angewandte Chemie - International Edition, 2010, 49, 908-911. | 13.8 | 128 |
| 29 | Three-Dimensional Visualization of Defects Formed during the Synthesis of Metal-Organic Frameworks: A Fluorescence Microscopy Study. Angewandte Chemie - International Edition, 2013, 52, 401-405. | 13.8 | 121 |
| 30 | Space- and Time-Resolved Visualization of Acid Catalysis in ZSM-5 Crystals by Fluorescence Microscopy. Angewandte Chemie - International Edition, 2007, 46, 1706-1709. | 13.8 | 119 |
| 31 | Optical Encoding of Silver Zeolite Microcarriers. Advanced Materials, 2010, 22, 957-960. | 21.0 | 115 |
| 32 | Single molecule methods for the study of catalysis: from enzymes to heterogeneous catalysts. Chemical Society Reviews, 2014, 43, 990-1006. | 38.1 | 115 |
| 33 | C(sp ³)-H Bond Activation by Perovskite Solar Photocatalyst Cell. ACS Energy Letters, 2019, 4, 203-208. | 17.4 | 114 |
| 34 | Metal-Organic Framework Single Crystals as Photoactive Matrices for the Generation of Metallic Microstructures. Advanced Materials, 2011, 23, 1788-1791. | 21.0 | 100 |
| 35 | The 2018 correlative microscopy techniques roadmap. Journal Physics D: Applied Physics, 2018, 51, 443001. | 2.8 | 99 |
| 36 | A Titanium(IV)-Based Metal-Organic Framework Featuring Defect-Rich TiO Sheets as an Oxidative Desulfurization Catalyst. Angewandte Chemie - International Edition, 2019, 58, 9160-9165. | 13.8 | 99 |

| # | ARTICLE | IF | CITATIONS |
|----|---|------|-----------|
| 37 | Photoactivation of Silver-Exchanged Zeolite...A. <i>Angewandte Chemie - International Edition</i> , 2008, 47, 2813-2816. | 13.8 | 95 |
| 38 | Children's Urinary Environmental Carbon Load. A Novel Marker Reflecting Residential Ambient Air Pollution Exposure?. <i>American Journal of Respiratory and Critical Care Medicine</i> , 2017, 196, 873-881. | 5.6 | 94 |
| 39 | Unravelling the Redox-catalytic Behavior of Ce ⁴⁺ Metal-Organic Frameworks by X-ray Absorption Spectroscopy. <i>ChemPhysChem</i> , 2018, 19, 373-378. | 2.1 | 89 |
| 40 | Indirect tail states formation by thermal-induced polar fluctuations in halide perovskites. <i>Nature Communications</i> , 2019, 10, 484. | 12.8 | 88 |
| 41 | Tracking Structural Phase Transitions in Lead-Halide Perovskites by Means of Thermal Expansion. <i>Advanced Materials</i> , 2019, 31, e1900521. | 21.0 | 88 |
| 42 | A Facet-Specific Quantum Dot Passivation Strategy for Colloid Management and Efficient Infrared Photovoltaics. <i>Advanced Materials</i> , 2019, 31, e1805580. | 21.0 | 87 |
| 43 | High-Resolution Single-Molecule Fluorescence Imaging of Zeolite Aggregates within Real-Life Fluid Catalytic Cracking Particles. <i>Angewandte Chemie - International Edition</i> , 2015, 54, 1836-1840. | 13.8 | 85 |
| 44 | S-scheme CoTiO ₃ /Cd _{0.51} Zn _{0.49} S ₁₀ heterostructures for visible-light driven photocatalytic CO ₂ reduction. <i>Journal of Materials Science and Technology</i> , 2022, 124, 164-170. | 10.7 | 83 |
| 45 | Challenges and Opportunities for CsPbBr ₃ Perovskites in Low- and High-Energy Radiation Detection. <i>ACS Energy Letters</i> , 2021, 6, 1290-1314. | 17.4 | 80 |
| 46 | Photoluminescence Blinking of Single-Crystal Methylammonium Lead Iodide Perovskite Nanorods Induced by Surface Traps. <i>ACS Omega</i> , 2016, 1, 148-159. | 3.5 | 76 |
| 47 | Silver Clusters in Zeolites: From Self-Assembly to Ground-Breaking Luminescent Properties. <i>Accounts of Chemical Research</i> , 2017, 50, 2353-2361. | 15.6 | 72 |
| 48 | Tuning the Structural and Optoelectronic Properties of Cs ₂ AgBiBr ₆ Double-Perovskite Single Crystals through Alkali-Metal Substitution. <i>Advanced Materials</i> , 2020, 32, e2001878. | 21.0 | 72 |
| 49 | Single Molecule Nanospectroscopy Visualizes Proton-Transfer Processes within a Zeolite Crystal. <i>Journal of the American Chemical Society</i> , 2016, 138, 13586-13596. | 13.7 | 71 |
| 50 | Thermally activated LTA(Li)-Ag zeolites with water-responsive photoluminescence properties. <i>Journal of Materials Chemistry C</i> , 2015, 3, 11857-11867. | 5.5 | 70 |
| 51 | Single-Molecule Fluorescence Microscopy Reveals Local Diffusion Coefficients in the Pore Network of an Individual Catalyst Particle. <i>Journal of the American Chemical Society</i> , 2017, 139, 13632-13635. | 13.7 | 70 |
| 52 | Quantitative 3D Fluorescence Imaging of Single Catalytic Turnovers Reveals Spatiotemporal Gradients in Reactivity of Zeolite H-ZSM-5 Crystals upon Steaming. <i>Journal of the American Chemical Society</i> , 2015, 137, 6559-6568. | 13.7 | 69 |
| 53 | Synergistic Redox Reaction for Value-Added Organic Transformation via Dual-Functional Photocatalytic Systems. <i>ACS Catalysis</i> , 2021, 11, 4613-4632. | 11.2 | 69 |
| 54 | Phase Transitions and Anion Exchange in All-Inorganic Halide Perovskites. <i>Accounts of Materials Research</i> , 2020, 1, 3-15. | 11.7 | 67 |

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|----|--|------|-----------|
| 55 | Chemoselective reduction of $\hat{1}\pm, \hat{1}^2$ -unsaturated carbonyl compounds with UiO-66 materials. <i>Journal of Catalysis</i> , 2016, 340, 136-143. | 6.2 | 66 |
| 56 | Direct Laser Writing of $\hat{1}^-$ to $\hat{1}\pm$ -Phase Transformation in Formamidinium Lead Iodide. <i>ACS Nano</i> , 2017, 11, 8072-8083. | 14.6 | 66 |
| 57 | Determination and Optimization of the Luminescence External Quantum Efficiency of Silver-Clusters Zeolite Composites. <i>Journal of Physical Chemistry C</i> , 2013, 117, 6998-7004. | 3.1 | 64 |
| 58 | Relating Pore Structure to Activity at the Subcrystal Level for ZSM-5: An Electron Backscattering Diffraction and Fluorescence Microscopy Study. <i>Journal of the American Chemical Society</i> , 2008, 130, 13516-13517. | 13.7 | 62 |
| 59 | Dynamic Disorder and Stepwise Deactivation in a Chymotrypsin Catalyzed Hydrolysis Reaction. <i>Journal of the American Chemical Society</i> , 2007, 129, 15458-15459. | 13.7 | 61 |
| 60 | Exploration of Atmospheric Pressure Plasma Nanofilm Technology for Straightforward Bioactive Coating Deposition: Enzymes, Plasmas and Polymers, an Elegant Synergy. <i>Plasma Processes and Polymers</i> , 2011, 8, 965-974. | 3.0 | 61 |
| 61 | Base catalytic activity of alkaline earth MOFs: a (micro)spectroscopic study of active site formation by the controlled transformation of structural anions. <i>Chemical Science</i> , 2014, 5, 4517-4524. | 7.4 | 58 |
| 62 | Visualization of molecular fluorescence point spread functions via remote excitation switching fluorescence microscopy. <i>Nature Communications</i> , 2015, 6, 6287. | 12.8 | 58 |
| 63 | Direct Observation of Luminescent Silver Clusters Confined in Faujasite Zeolites. <i>ACS Nano</i> , 2016, 10, 7604-7611. | 14.6 | 58 |
| 64 | Role of Electron-Phonon Coupling in the Thermal Evolution of Bulk Rashba-Like Spin-Split Lead Halide Perovskites Exhibiting Dual-Band Photoluminescence. <i>ACS Energy Letters</i> , 2019, 4, 2205-2212. | 17.4 | 58 |
| 65 | Exploration of Single Molecule Events in a Haloperoxidase and Its Biomimic: Localization of Halogenation Activity. <i>Journal of the American Chemical Society</i> , 2008, 130, 13192-13193. | 13.7 | 57 |
| 66 | Manipulating crystallization dynamics through chelating molecules for bright perovskite emitters. <i>Nature Communications</i> , 2021, 12, 4831. | 12.8 | 56 |
| 67 | In Situ Space- and Time-Resolved Sorption Kinetics of Anionic Dyes on Individual LDH Crystals. <i>ChemPhysChem</i> , 2005, 6, 2295-2299. | 2.1 | 52 |
| 68 | Fluorescence microscopy: Bridging the phase gap in catalysis. <i>Catalysis Today</i> , 2007, 126, 44-53. | 4.4 | 52 |
| 69 | In Situ Observation of the Emission Characteristics of Zeolite-Hosted Silver Species During Heat Treatment. <i>ChemPhysChem</i> , 2010, 11, 1627-1631. | 2.1 | 52 |
| 70 | Zr-Based MOF-808 as Meerwein-Ponndorf-Verley Reduction Catalyst for Challenging Carbonyl Compounds. <i>Catalysts</i> , 2016, 6, 104. | 3.5 | 52 |
| 71 | Silica gel solid nanocomposite electrolytes with interfacial conductivity promotion exceeding the bulk Li-ion conductivity of the ionic liquid electrolyte filler. <i>Science Advances</i> , 2020, 6, eaav3400. | 10.3 | 51 |
| 72 | Protein Immobilization Using Atmospheric-Pressure Dielectric-Barrier Discharges: A Route to a Straightforward Manufacture of Bioactive Films. <i>Plasma Processes and Polymers</i> , 2008, 5, 186-191. | 3.0 | 49 |

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|----|---|------|-----------|
| 73 | X-ray irradiation-induced formation of luminescent silver clusters in nanoporous matrices. <i>Chemical Communications</i> , 2014, 50, 1350-1352. | 4.1 | 49 |
| 74 | Metal Halide Perovskite Based Heterojunction Photocatalysts. <i>Angewandte Chemie - International Edition</i> , 2022, 61, . | 13.8 | 48 |
| 75 | Delayed electron-hole pair recombination in iron(III)-oxo metal-organic frameworks. <i>Physical Chemistry Chemical Physics</i> , 2014, 16, 5044-5047. | 2.8 | 46 |
| 76 | Air-based photoelectrochemical cell capturing water molecules from ambient air for hydrogen production. <i>RSC Advances</i> , 2014, 4, 29286-29290. | 3.6 | 45 |
| 77 | Biocompatible Label-Free Detection of Carbon Black Particles by Femtosecond Pulsed Laser Microscopy. <i>Nano Letters</i> , 2016, 16, 3173-3178. | 9.1 | 44 |
| 78 | Rationalizing Inter- and Intracrystal Heterogeneities in Dealuminated Acid Mordenite Zeolites by Stimulated Raman Scattering Microscopy Correlated with Super-resolution Fluorescence Microscopy. <i>ACS Nano</i> , 2014, 8, 12650-12659. | 14.6 | 43 |
| 79 | Active Role of Methanol in Post-Synthetic Linker Exchange in the Metal-Organic Framework UiO-66. <i>Chemistry of Materials</i> , 2019, 31, 1359-1369. | 6.7 | 43 |
| 80 | Facet-Dependent Photoreduction on Single ZnO Crystals. <i>Journal of Physical Chemistry Letters</i> , 2017, 8, 340-346. | 4.6 | 42 |
| 81 | Vapor-Phase Linker Exchange of the Metal-Organic Framework ZIF-8: A Solvent-Free Approach to Post-synthetic Modification. <i>Angewandte Chemie - International Edition</i> , 2019, 58, 18471-18475. | 13.8 | 42 |
| 82 | Label-free imaging of biomolecules in food products using stimulated Raman microscopy. <i>Journal of Biomedical Optics</i> , 2011, 16, 021118. | 2.6 | 41 |
| 83 | Towards direct monitoring of discrete events in a catalytic cycle at the single molecule level. <i>Photochemical and Photobiological Sciences</i> , 2009, 8, 453-456. | 2.9 | 40 |
| 84 | Molecular organization of hydrophobic molecules and co-adsorbed water in SBA-15 ordered mesoporous silica material. <i>Physical Chemistry Chemical Physics</i> , 2011, 13, 2706-2713. | 2.8 | 40 |
| 85 | Parts per Million Detection of Alcohol Vapors via Metal Organic Framework Functionalized Surface Plasmon Resonance Sensors. <i>Analytical Chemistry</i> , 2017, 89, 4480-4487. | 6.5 | 40 |
| 86 | Atomic scale reversible opto-structural switching of few atom luminescent silver clusters confined in LTA zeolites. <i>Nanoscale</i> , 2018, 10, 11467-11476. | 5.6 | 40 |
| 87 | Ultrathin 2D/2D Ti ₃ C ₂ T _x /semiconductor dual-functional photocatalysts for simultaneous imine production and H ₂ evolution. <i>Journal of Materials Chemistry A</i> , 2021, 9, 19984-19993. | 10.3 | 40 |
| 88 | Highly Mobile Large Polarons in Black Phase CsPb ₃ . <i>ACS Energy Letters</i> , 2021, 6, 568-573. | 17.4 | 40 |
| 89 | Matrix deformations around angiogenic sprouts correlate to sprout dynamics and suggest pulling activity. <i>Angiogenesis</i> , 2020, 23, 315-324. | 7.2 | 40 |
| 90 | Photocatalytic growth of dendritic silver nanostructures as SERS substrates. <i>Chemical Communications</i> , 2012, 48, 1559-1561. | 4.1 | 38 |

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| 91 | Optical Heterodyne-Detected Raman-Induced Kerr Effect (OHD-RIKE) Microscopy. <i>Journal of Physical Chemistry B</i> , 2011, 115, 5574-5581. | 2.6 | 37 |
| 92 | A Titanium(IV)-Based Metal-Organic Framework Featuring Defect-Rich TiO Sheets as an Oxidative Desulfurization Catalyst. <i>Angewandte Chemie</i> , 2019, 131, 9258-9263. | 2.0 | 37 |
| 93 | The Hole-Tunneling Heterojunction of Hematite-Based Photoanodes Accelerates Photosynthetic Reaction. <i>Angewandte Chemie - International Edition</i> , 2021, 60, 16009-16018. | 13.8 | 37 |
| 94 | Noninvasive Nanoscopy Uncovers the Impact of the Hierarchical Porous Structure on the Catalytic Activity of Single Dealuminated Mordenite Crystals. <i>ChemCatChem</i> , 2015, 7, 3646-3650. | 3.7 | 35 |
| 95 | Adsorption and Separation of Aromatic Amino Acids from Aqueous Solutions Using Metal-Organic Frameworks. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 30064-30073. | 8.0 | 35 |
| 96 | Trojans That Flip the Black Phase: Impurity-Driven Stabilization and Spontaneous Strain Suppression in FAPbI_3 Perovskite. <i>Journal of the American Chemical Society</i> , 2021, 143, 10500-10508. | 13.7 | 33 |
| 97 | Planar heterojunction boosts solar-driven photocatalytic performance and stability of halide perovskite solar photocatalyst cell. <i>Applied Catalysis B: Environmental</i> , 2022, 301, 120760. | 20.2 | 33 |
| 98 | Silver Zeolite Composites-Based LEDs: A Novel Solid-State Lighting Approach. <i>Advanced Functional Materials</i> , 2017, 27, 1606411. | 14.9 | 30 |
| 99 | Solar Photocatalytic Oxidation of Methane to Methanol with Water over $\text{RuO}_4/\text{ZnO}/\text{CeO}_2$ Nanorods. <i>ACS Sustainable Chemistry and Engineering</i> , 2022, 10, 16-22. | 6.7 | 30 |
| 100 | The influence of diffusion phenomena on catalysis: A study at the single particle level using fluorescence microscopy. <i>Catalysis Today</i> , 2010, 157, 236-242. | 4.4 | 29 |
| 101 | Energy-Efficient Ammonia Production from Air and Water Using Electrocatalysts with Limited Faradaic Efficiency. <i>ACS Energy Letters</i> , 2020, 5, 1124-1127. | 17.4 | 29 |
| 102 | Reshaping anisotropic gold nanoparticles through oxidative etching: the role of the surfactant and nanoparticle surface curvature. <i>RSC Advances</i> , 2015, 5, 6829-6833. | 3.6 | 28 |
| 103 | Imaging Heterogeneously Distributed Photo-Active Traps in Perovskite Single Crystals. <i>Advanced Materials</i> , 2018, 30, e1705494. | 21.0 | 28 |
| 104 | Shaping the Optical Properties of Silver Clusters Inside Zeolite A via Guest-Host-Guest Interactions. <i>Journal of Physical Chemistry Letters</i> , 2018, 9, 5344-5350. | 4.6 | 28 |
| 105 | Incorporation of Cesium Lead Halide Perovskites into $\text{g-C}_3\text{N}_4$ for Photocatalytic CO_2 Reduction. <i>ACS Omega</i> , 2020, 5, 24495-24503. | 3.5 | 28 |
| 106 | Single-Step Synthesis of Dual Phase Bright Blue-Green Emitting Lead Halide Perovskite Nanocrystal Thin Films. <i>Chemistry of Materials</i> , 2019, 31, 6824-6832. | 6.7 | 26 |
| 107 | Superconducting Ferromagnetic Nanodiamond. <i>ACS Nano</i> , 2017, 11, 5358-5366. | 14.6 | 25 |
| 108 | Form Follows Function: Warming White LEDs Using Metal Cluster-Loaded Zeolites as Phosphors. <i>ACS Energy Letters</i> , 2017, 2, 2491-2497. | 17.4 | 25 |

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|-----|---|------|-----------|
| 109 | Structural and Photophysical Characterization of Ag Clusters in LTA Zeolites. <i>Journal of Physical Chemistry C</i> , 2019, 123, 10630-10638. | 3.1 | 25 |
| 110 | Fluorescent oxygen sensitive microbead incorporation for measuring oxygen tension in cell aggregates. <i>Biomaterials</i> , 2013, 34, 922-929. | 11.4 | 24 |
| 111 | 3D full-field quantification of cell-induced large deformations in fibrillar biomaterials by combining non-rigid image registration with label-free second harmonic generation. <i>Biomaterials</i> , 2017, 136, 86-97. | 11.4 | 24 |
| 112 | Solvent Polarity-Induced Pore Selectivity in H-ZSM-5 Catalysis. <i>ACS Catalysis</i> , 2017, 7, 4248-4252. | 11.2 | 24 |
| 113 | Confinement of Highly Luminescent Lead Clusters in Zeolite A. <i>Journal of Physical Chemistry C</i> , 2018, 122, 13953-13961. | 3.1 | 24 |
| 114 | Visualizing light-induced dynamic structural transformations of Au clusters-based photocatalyst via in situ TEM. <i>Nano Research</i> , 2021, 14, 2805-2809. | 10.4 | 24 |
| 115 | Fibrin structural and diffusional analysis suggests that fibers are permeable to solute transport. <i>Acta Biomaterialia</i> , 2017, 47, 25-39. | 8.3 | 23 |
| 116 | Efficient Photocatalytic CO ₂ Reduction with MIL-100(Fe)-CsPbBr ₃ Composites. <i>Catalysts</i> , 2020, 10, 1352. | 3.5 | 23 |
| 117 | Photothermal Suzuki Coupling Over a Metal Halide Perovskite/Pd Nanocube Composite Catalyst. <i>ACS Applied Materials & Interfaces</i> , 2022, 14, 17185-17194. | 8.0 | 23 |
| 118 | A non-invasive fluorescent staining procedure allows Confocal Laser Scanning Microscopy based imaging of Mycobacterium in multispecies biofilms colonizing and degrading polycyclic aromatic hydrocarbons. <i>Journal of Microbiological Methods</i> , 2010, 83, 317-325. | 1.6 | 22 |
| 119 | Resolving Interparticle Heterogeneities in Composition and Hydrogenation Performance between Individual Supported Silver on Silica Catalysts. <i>ACS Catalysis</i> , 2015, 5, 6690-6695. | 11.2 | 22 |
| 120 | Silver-induced reconstruction of an adeninate-based metal-organic framework for encapsulation of luminescent adenine-stabilized silver clusters. <i>Journal of Materials Chemistry C</i> , 2016, 4, 4259-4268. | 5.5 | 22 |
| 121 | Reversible and Site-Dependent Proton-Transfer in Zeolites Uncovered at the Single-Molecule Level. <i>Journal of the American Chemical Society</i> , 2018, 140, 14195-14205. | 13.7 | 22 |
| 122 | Arabinoxylan, β -glucan and pectin in barley and malt endosperm cell walls: a microstructure study using CLSM and cryo-SEM. <i>Plant Journal</i> , 2020, 103, 1477-1489. | 5.7 | 22 |
| 123 | Alternating Current Electrophoretic Deposition for the Immobilization of Antimicrobial Agents on Titanium Implant Surfaces. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 8533-8546. | 8.0 | 21 |
| 124 | Photocatalysis assisted simultaneous carbon oxidation and NO _x reduction. <i>Applied Catalysis B: Environmental</i> , 2017, 202, 381-387. | 20.2 | 21 |
| 125 | Surface acid-base catalytic activity of ZIF-8 revealed by super-resolution fluorescence microscopy. <i>CrystEngComm</i> , 2017, 19, 4162-4165. | 2.6 | 20 |
| 126 | Probing the Influence of SSZ-13 Zeolite Pore Hierarchy in Methanol-to-Olefins Catalysis by Using Nanometer Accuracy by Stochastic Chemical Reactions Fluorescence Microscopy and Positron Emission Profiling. <i>ChemCatChem</i> , 2017, 9, 3470-3477. | 3.7 | 19 |

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|-----|---|------|-----------|
| 127 | Rationalizing Acid Zeolite Performance on the Nanoscale by Correlative Fluorescence and Electron Microscopy. <i>ACS Catalysis</i> , 2017, 7, 5234-5242. | 11.2 | 19 |
| 128 | Dual-Channel Charge Carrier Transfer in CsPbX ₃ Perovskite/W ₁₈ O ₄₉ Composites for Selective Photocatalytic Benzyl Alcohol Oxidation. <i>ACS Applied Energy Materials</i> , 2021, 4, 3460-3468. | 5.1 | 19 |
| 129 | Facile Morphology-Controlled Synthesis of Organolead Iodide Perovskite Nanocrystals Using Binary Capping Agents. <i>ChemNanoMat</i> , 2017, 3, 223-227. | 2.8 | 18 |
| 130 | Texture Formation in Polycrystalline Thin Films of All-Inorganic Lead Halide Perovskite. <i>Advanced Materials</i> , 2021, 33, e2007224. | 21.0 | 18 |
| 131 | Luminescent silver-lithium-zeolite phosphors for near-ultraviolet LED applications. <i>Journal of Materials Chemistry C</i> , 2019, 7, 14366-14374. | 5.5 | 17 |
| 132 | Two-dimensional perovskites with alternating cations in the interlayer space for stable light-emitting diodes. <i>Nanophotonics</i> , 2021, 10, 2145-2156. | 6.0 | 17 |
| 133 | Light- and Temperature-Modulated Magneto-Transport in Organic-Inorganic Lead Halide Perovskites. <i>ACS Energy Letters</i> , 2018, 3, 39-45. | 17.4 | 15 |
| 134 | A Causal Relation between Bioluminescence and Oxygen to Quantify the Cell Niche. <i>PLoS ONE</i> , 2014, 9, e97572. | 2.5 | 15 |
| 135 | Assessing Photocatalytic Activity at the Nanoscale Using Integrated Optical and Electron Microscopy. <i>Particle and Particle Systems Characterization</i> , 2016, 33, 412-418. | 2.3 | 14 |
| 136 | Resolving the Framework Position of Organic Structure-Directing Agents in Hierarchical Zeolites via Polarized Stimulated Raman Scattering. <i>Journal of Physical Chemistry Letters</i> , 2018, 9, 1778-1782. | 4.6 | 14 |
| 137 | Low-temperature activation of carbon black by selective photocatalytic oxidation. <i>Nanoscale Advances</i> , 2019, 1, 2873-2880. | 4.6 | 14 |
| 138 | Vapor-Phase Linker Exchange of the Metal-Organic Framework ZIF-8: A Solvent-Free Approach to Post-synthetic Modification. <i>Angewandte Chemie</i> , 2019, 131, 18642-18646. | 2.0 | 14 |
| 139 | Polyvinylnorbornene Gas Separation Membranes. <i>Polymers</i> , 2019, 11, 704. | 4.5 | 14 |
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