Yasushige Kuroda

List of Publications by Year
in descending order

50 papers	1,143 citations	361413 20 h-index	414414 32 g-index
51 all docs	51 docs citations	51 times ranked	1254 citing authors

#	Article	IF	Citations
1	Preparation of Visible-Light-Responsive TiO2-xNx Photocatalyst by a Solâˆ'Gel Method:â€‰ Analysis of the Active Center on TiO2 that Reacts with NH3. Langmuir, 2005, 21, 8026-8034.	3.5	100
2	X-ray Diffraction Study of Water Confined in Mesoporous MCM-41 Materials over a Temperature Range of 223âˆ'298 K. Journal of Physical Chemistry B, 2000, 104, 5498-5504.	2.6	98
3	Specific Feature of Copper Ion-Exchanged Mordenite for Dinitrogen Adsorption at Room Temperature. The Journal of Physical Chemistry, 1995, 99, 10621-10628.	2.9	96
4	Effects of ZSM-5 Zeolite Confinement on Reaction Intermediates during Dioxygen Activation by Enclosed Dicopper Cations. Inorganic Chemistry, 2009, 48, 508-517.	4.0	68
5	Roles of Water Molecules in Modulating the Reactivity of Dioxygen-Bound Cu-ZSM-5 toward Methane: A Theoretical Prediction. ACS Catalysis, 2016, 6, 2487-2495.	11.2	54
6	Neutron Scattering Study on Dynamics of Water Molecules Confined in MCM-41. Adsorption, 2005, 11, 479-483.	3.0	52
7	Unprecedented Reversible Redox Process in the ZnMFIâ€"H₂ System Involving Formation of Stable Atomic Zn⁰. Angewandte Chemie - International Edition, 2012, 51, 7719-7723.	13.8	44
8	An Important Factor in CH₄ Activation by Zn Ion in Comparison with Mg Ion in MFI: The Superior Electron-Accepting Nature of Zn²⁺. Journal of Physical Chemistry C, 2014, 118, 15234-15241.	3.1	37
9	Potential for Câˆ'H Activation in CH₄ Utilizing a CuMFI-Type Zeolite as a Catalyst. Journal of Physical Chemistry C, 2009, 113, 7213-7222.	3.1	32
10	Site-specific Xe additions into Cuâ€"ZSM-5 zeolite. Physical Chemistry Chemical Physics, 2010, 12, 2392.	2.8	32
11	Success in Making Zn⁺ from Atomic Zn⁰ Encapsulated in an MFI-Type Zeolite with UV Light Irradiation. Journal of the American Chemical Society, 2013, 135, 18481-18489.	13.7	30
12	In situ sample cell for EXAFS measurements on materials treated at elevated temperatures in vacuo. Review of Scientific Instruments, 1989, 60, 3083-3085.	1.3	25
13	Existence of dual species composed of Cu+ in CuMFI being bridged by C2H2. Physical Chemistry Chemical Physics, 2010, 12, 6455.	2.8	25
14	Synthesis of an unexpected [Zn2]2+ species utilizing an MFI-type zeolite as a nano-reaction pot and its manipulation with light and heat. Dalton Transactions, 2015, 44, 10038-10047.	3.3	25
15	Room-Temperature Activation of the Câ€"H Bond in Methane over Terminal Zn^{II}â€"Oxyl Species in an MFI Zeolite: A Combined Spectroscopic and Computational Study of the Reactive Frontier Molecular Orbitals and Their Origins. Inorganic Chemistry, 2019, 58, 327-338.	4.0	25
16	Behavior of Ag₃ Clusters Inside a Nanometer-Sized Space of ZSM-5 Zeolite. Inorganic Chemistry, 2011, 50, 6533-6542.	4.0	24
17	A New Strategy for the Improvement of the N₂Adsorption Properties of Copper-Ion-Exchanged MFI-Type Zeolites at Room Temperature. Journal of Physical Chemistry C, 2007, 111, 12011-12023.	3.1	23
18	Combined Experimental and Computational Approaches To Elucidate the Structures of Silver Clusters inside the ZSM-5 Cavity. Journal of Physical Chemistry C, 2014, 118, 23874-23887.	3.1	23

#	Article	IF	Citations
19	Utilizing super-atom orbital ideas to understand properties of silver clusters inside ZSM-5 zeolite. RSC Advances, 2017, 7, 4950-4959.	3.6	21
20	Characteristics of Silver Ions Exchanged in ZSM-5-Type Zeolite, Aluminosilicate, and SiO2Samples:Â In Comparison with the Properties of Copper Ions Exchanged in These Materials. Journal of Physical Chemistry B, 2002, 106, 8976-8987.	2.6	20
21	Direct Information on Structure and Energetic Features of Cu+â^'Xe Species Formed in MFI-Type Zeolite at Room Temperature. Journal of Physical Chemistry Letters, 2010, 1, 2642-2650.	4.6	20
22	Actual Structure of Dissolved Zinc Ion Restricted in Less Than 1 Nanometer Micropores of Carbon. Journal of Physical Chemistry C, 2011, 115, 14954-14959.	3.1	17
23	Identification of a Stable Zn II â€"Oxyl Species Produced in an MFI Zeolite and Its Reversible Reactivity with O 2 at Room Temperature. Angewandte Chemie - International Edition, 2017, 56, 9715-9718.	13.8	17
24	Mechanism of CH₄Activation on a Monomeric Zn²⁺-Ion Exchanged in MFI-Type Zeolite with a Specific Al Arrangement: Similarity to the Activation Site for H₂. Journal of Physical Chemistry C, 0, , 130917083323008.	3.1	16
25	The Variety of Carbon-Metal Bonds inside Cu-ZSM-5 Zeolites: A Density Functional Theory Study. Materials, 2010, 3, 2516-2535.	2.9	15
26	Material Exhibiting Efficient CO₂ Adsorption at Room Temperature for Concentrations Lower Than 1000 ppm: Elucidation of the State of Barium Ion Exchanged in an MFI-Type Zeolite. ACS Applied Materials & Interfaces, 2016, 8, 8821-8833.	8.0	15
27	Interlayer Water Molecules in Vanadium Pentoxide Hydrate, V2O5Â·nH2O. 7. Quasi-elastic Neutron Scattering Study. Langmuir, 2000, 16, 10559-10563.	3.5	14
28	Dual-Copper Catalytic Site Formed in CuMFI Zeolite Makes Effective Activation of Ethane Possible Even at Room Temperature. Journal of Physical Chemistry C, 2012, 116, 10680-10691.	3.1	14
29	Visible-Light-Derived Photocatalyst Based on TiO_{2â^'Î´}N_{Î´} with a Tubular Structure. Inorganic Chemistry, 2011, 50, 9948-9957.	4.0	13
30	EXAFS Studies on Y1-xBaxCuO3-Î´Superconductors. Journal of the Physical Society of Japan, 1987, 56, 3413-3416.	1.6	12
31	Possibility of Copper-Ion-Exchanged MFI-Type Zeolite as Câ€"H Bond Activation Material for Propane and the Driving Force for Activation. Journal of Physical Chemistry C, 2015, 119, 21483-21496.	3.1	12
32	Unprecedented CO₂ adsorption behaviour by 5A-type zeolite discovered in lower pressure region and at 300 K. Journal of Materials Chemistry A, 2021, 9, 7531-7545.	10.3	12
33	Why do zeolites induce an unprecedented electronic state on exchanged metal ions?. Physical Chemistry Chemical Physics, 2017, 19, 25105-25114.	2.8	11
34	Surplus adsorption of bromide ion into Ï€-conjugated carbon nanospaces assisted by proton coadsorption. Journal of Colloid and Interface Science, 2017, 508, 415-418.	9.4	10
35	Spectroscopic Determination of the Site in MFI Zeolite where Cobalt(I) Performs Two-Electron Reduction of O₂ at Room Temperature. Journal of Physical Chemistry C, 2019, 123, 17842-17854.	3.1	10
36	Improvement in the surface acidity of Al2O3Â·SiO2 due to a high Al dispersion. Chemical Communications, 2001, , 1006-1007.	4.1	9

#	Article	IF	Citations
37	Development of a new analysis method evaluating adsorption energies for the respective ion-exchanged sites on alkali-metal ion-exchanged ZSM-5 utilizing CO as a probe molecule: IR-spectroscopic and calorimetric studies combined with a DFT method. Physical Chemistry Chemical Physics, 2009, 11, 5041.	2.8	9
38	Nanospace-enhanced photoreduction for the synthesis of copper(I) oxide nanoparticles under visible-light irradiation. Journal of Colloid and Interface Science, 2014, 421, 165-169.	9.4	9
39	Tubular nitrogen-doped TiO₂ samples with efficient photocatalytic properties based on long-lived charge separation under visible-light irradiation: synthesis, characterization and reactivity. Dalton Transactions, 2017, 46, 4435-4451.	3.3	9
40	Further Evidence for the Existence of a Dual-Cu⁺ Site in MFI Working as the Efficient Site for C₂H₆ Adsorption at Room Temperature. Langmuir, 2013, 29, 9727-9733.	3.5	8
41	Experimental Information on the Adsorbed Phase of Water Formed in the Inner Pore of Single-Walled Carbon Nanotube Itself. Langmuir, 2016, 32, 1058-1064.	3.5	8
42	Experimental Description of Biomimetic NiIIâ€"Superoxo Î´-Bond: Franckâ€"Condon Analyses on Its Vibronically-Resolved Spectrum. Journal of Physical Chemistry C, 2020, 124, 11544-11557.	3.1	6
43	A low-temperature oxyl transfer to carbon monoxide from the ZnIIâ€"oxyl site in a zeolite catalyst. Inorganic Chemistry Frontiers, 2021, 8, 319-328.	6.0	6
44	Orbital Trap of Xenon: Driving Force Distinguishing between Xe and Kr Found at a Single Ag(I) Site in MFI Zeolite at Room Temperature. Journal of Physical Chemistry C, 2022, 126, 8312-8326.	3.1	5
45	Identification of a Stable Zn II â€"Oxyl Species Produced in an MFI Zeolite and Its Reversible Reactivity with O 2 at Room Temperature. Angewandte Chemie, 2017, 129, 9847-9850.	2.0	3
46	Room temperature O transfer from N₂O to CO mediated by the nearest Cd(<scp>i</scp>) ions in MFI zeolite cavities. Dalton Transactions, 2019, 48, 2308-2317.	3.3	2
47	Adsorption enhancement of nitrogen gas by atomically heterogeneous nanospace of boron nitride. RSC Advances, 2021, 11, 838-846.	3.6	2
48	¹⁷O-ESR Evidence for Zeolite Matrix Isolation of a Square Planar ZnO₃ Ring Radical with <i>C</i>_{2v} Symmetry. Journal of Physical Chemistry C, 2021, 125, 5136-5145.	3.1	2
49	Identification of a Stable Ozonide Ion Bound to a Single Cadmium Site within the Zeolite Cavity. Journal of Physical Chemistry C, 0, , .	3.1	1
50	Calorimetric and Spectroscopic Studies of Water Adsorption onto Alkaline Earth Fluorides. Adsorption Science and Technology, 2005, 23, 425-436.	3.2	0