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## Methane storage in metal-organic frameworks

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1040	Exploration of MOF nanoparticle sizes using various physical characterization methods   s what you measure what you get?. <b>2016</b> , 18, 4359-4368	79
1039	A New Set of Isorecticular, Homochiral Metal-Organic Frameworks with ucp Topology. <b>2016</b> , 28, 519-528	21

1038	Reticular Synthesis of HKUST-like tbo-MOFs with Enhanced CH <sub>4</sub> Storage. <b>2016</b> , 138, 1568-74	164
1037	40-Fold Enhanced Intrinsic Proton Conductivity in Coordination Polymers with the Same Proton-Conducting Pathway by Tuning Metal Cation Nodes. <b>2016</b> , 55, 983-6	56
1036	Unprecedented performance of N-doped activated hydrothermal carbon towards C <sub>2</sub> H <sub>6</sub> /CH <sub>4</sub> , CO <sub>2</sub> /CH <sub>4</sub> , and CO <sub>2</sub> /H <sub>2</sub> separation. <b>2016</b> , 4, 2263-2276	50
1035	Understanding and solving disorder in the substitution pattern of amino functionalized MIL-47(V). <b>2016</b> , 45, 4309-15	4
1034	Adsorption, separation, and catalytic properties of densified metal-organic frameworks. <b>2016</b> , 311, 38-52	222
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1031	Palladium nanoparticles stabilized with N-doped porous carbons derived from metal-organic frameworks for selective catalysis in biofuel upgrade: the role of catalyst wettability. <b>2016</b> , 18, 1212-1217	118
1030	Modulating the electrical conductivity of metal-organic framework films with intercalated guest systems. <b>2016</b> , 4, 894-899	66
1029	High acetylene/ethylene separation in a microporous zinc(II) metal-organic framework with low binding energy. <b>2016</b> , 52, 1166-9	57
1028	CO <sub>2</sub> adsorption of three isostructural metal-organic frameworks depending on the incorporated highly polarized heterocyclic moieties. <b>2016</b> , 45, 190-7	40
1027	Computational screening of MOFs for C <sub>2</sub> H <sub>6</sub> /C <sub>2</sub> H <sub>4</sub> and C <sub>2</sub> H <sub>6</sub> /CH <sub>4</sub> separations. <b>2016</b> , 139, 49-60	47
1026	Improved synthesis of trigone trimer cluster metal organic framework MIL-100Al by a later entry of methyl groups. <b>2016</b> , 52, 725-8	12
1025	Efficient and selective aerobic oxidation of alcohols catalysed by MOF-derived Co catalysts. <b>2016</b> , 18, 1061-1069	156
1024	A novel porous anionic metal-organic framework with pillared double-layer structure for selective adsorption of dyes. <b>2016</b> , 233, 143-149	20
1023	Two new luminescent Zn(II) compounds constructed from guanazole and aromatic polycarboxylate ligands. <b>2016</b> , 1105, 112-117	4
1022	Continuous microreactor synthesis of ZIF-8 with high space-time-yield and tunable particle size. <b>2016</b> , 283, 971-977	72
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1020	Encapsulation of dyes in metal-organic frameworks and their tunable nonlinear optical properties. <b>2016</b> , 45, 4218-23	36
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1012	Sol-Gel Processing of Metal-Organic Frameworks. <b>2017</b> , 29, 2626-2645	88
1011	Adsorbate-induced lattice deformation in IRMOF-74 series. <b>2017</b> , 8, 13945	23
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1009	Indium-Based Heterometal-Organic Frameworks with Different Nanoscale Cages: Syntheses, Structures, and Gas Adsorption Properties. <b>2017</b> , 17, 1159-1165	26
1008	Two microporous Fe-based MOFs with multiple active sites for selective gas adsorption. <b>2017</b> , 53, 2394-2397	58
1007	Removal of non-CO <sub>2</sub> greenhouse gases by large-scale atmospheric solar photocatalysis. <b>2017</b> , 60, 68-96	72
1006	Synthesis and Structures of 1D and 2D Zn/Gd Coordination Polymers: [ZnGd(L)(NO <sub>3</sub> ) <sub>2</sub> (4-ppa)(EtOH)] and [ZnGd(L)(NO <sub>3</sub> ) <sub>2</sub> (4-pca)] (H <sub>2</sub> L = 1,3-bis((3-methoxysalicylidene)amino)propane); 4-Hppa = 4-pyridinepropionic acid; 4-Hpca = 4-pyridinecarboxylic acid. <b>2017</b> , 38, 177-182	4
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1004	A mesoporous (3,36)-connected txt-type metal-organic framework constructed by using a naphthyl-embedded ligand exhibiting high CO <sub>2</sub> storage and selectivity. <b>2017</b> , 4, 736-740	16
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981	Solvent-Assisted Metal Metathesis: A Highly Efficient and Versatile Route towards Synthetically Demanding Chromium Metal-Organic Frameworks. <b>2017</b> , 129, 6578-6582	3
980	Syntheses, structures and properties of two coordination polymers based on 3,5-di(4H-1,2,4-triazol-4-yl)benzoic acid with multicarboxylates as mixed ligands. <b>2017</b> , 129, 208-213	
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967	Metal-Organic Frameworks for Carbon Dioxide Capture and Methane Storage. <b>2017</b> , 7, 1601296	260



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964	Solid-state NMR Studies of Host-Guest Interaction between UiO-67 and Light Alkane at Room Temperature. <b>2017</b> , 121, 14261-14268	19
963	Two threefold Interpenetrating 3D Supramolecular Networks Based on 1D Chains and Hydrogen-bond Interactions. <b>2017</b> , 643, 864-869	1
962	Metal-Organic Frameworks as Heterogeneous Catalysts in Hydrogen Production from Lightweight Inorganic Hydrides. <b>2017</b> , 7, 5035-5045	68
961	A microporous metal-organic framework for selective C <sub>2</sub> H <sub>2</sub> and CO <sub>2</sub> separation. <b>2017</b> , 252, 138-141	24
960	A review on synthesis, crystal structure and functionality of naphthalenedicarboxylate ligated metal-organic frameworks. <b>2017</b> , 466, 308-323	22
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931	Cation dependent charge transport in linear dicarboxylate based isotypical 1D coordination polymers. <b>2017</b> , 7, 10369-10375	32

930	A porous the-type metal-organic framework based on [Mn <sub>4</sub> Cl] <sub>7</sub> + clusters for selective gas sorption. <b>2017</b> , 79, 46-49	5
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920	High-Pressure Methane Adsorption in Two Isoreticular Zr-Based Metal-Organic Frameworks Constructed from C <sub>3</sub> -Symmetrical Tricarboxylates. <b>2017</b> , 17, 248-254	5
919	An efficient ratiometric fluorescence sensor based on metal-organic frameworks and quantum dots for highly selective detection of 6-mercaptopurine. <b>2017</b> , 91, 162-168	85
918	1D-2D-3D Transformation Synthesis of Hierarchical Metal-Organic Framework Adsorbent for Multicomponent Alkane Separation. <b>2017</b> , 139, 819-828	54
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913	Selectivity and Desorption Free Energies for Methane-Ethane Mixtures in Covalent Organic Frameworks. <b>2017</b> , 121, 24692-24700	11

912	Selective Gas Adsorption in Highly Porous Chromium(II)-Based Metal-Organic Polyhedra. <b>2017</b> , 29, 8583-8587	52
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888	Water-Stable Luminescent Zn(II) Metal-Organic Framework as Rare Multifunctional Sensor for Cr(VI) and TNP. <b>2017</b> , 2, 7465-7473	11
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786	Metal coordination and metal activation abilities of commonly unreactive chloromethanes toward metal-organic frameworks. <b>2018</b> , 54, 6458-6471	33
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769	A CuII-based Metal-Organic Framework as an Efficient Photocatalyst for Direct Hydroxylation of Benzene to Phenol in Aqueous Solution. <b>2018</b> , 7, 165-170	18

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740	The Effects of Methane Storage Capacity Using Upgraded Activated Carbon by KOH. <b>2018</b> , 8, 1596	16
739	Impact of Alkali-Metal Impregnation on MIL-101 (Cr) Metal-Organic Frameworks for CH <sub>4</sub> and CO Adsorption Studies. <b>2018</b> , 19, 3158-3165	6
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733	Surface Morphology and Electrical Properties of CuBTC Thin Films Before and After Reaction with TCNQ. <b>2018</b> , 10, 39400-39410	25

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729	Trapped Photons Induced Ultrahigh External Quantum Efficiency and Photoresponsivity in Hybrid Graphene/Metal-Organic Framework Broadband Wearable Photodetectors. <b>2018</b> , 28, 1804802	38
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715	Host-Guest Interaction Optimization through Cavity Functionalization for Ultra-Fast and Efficient Water Purification by a Metal-Organic Framework. <b>2018</b> , 57, 11578-11587	23

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