

Lucjan Chmielarz

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102
papers

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35
h-index

51
g-index

104
ext. papers

3,473
ext. citations

6.8
avg, IF

5.2
L-index

| # | Paper | IF | Citations |
|-----|--|------|-----------|
| 102 | Influence of thermal treatment conditions on the activity of hydrotalcite-derived MgAl oxides in the aldol condensation of acetone. <i>Microporous and Mesoporous Materials</i> , 2005 , 78, 11-22 | 5.3 | 131 |
| 101 | Advances in selective catalytic oxidation of ammonia to dinitrogen: a review. <i>RSC Advances</i> , 2015 , 5, 43408-43430 | 4.9 | 4305 |
| 100 | Catalytic activity of Co-Mg-Al, Cu-Mg-Al and Cu-Co-Mg-Al mixed oxides derived from hydrotalcites in SCR of NO with ammonia. <i>Applied Catalysis B: Environmental</i> , 2002 , 35, 195-210 | 21.8 | 98 |
| 99 | Acidity and basicity of hydrotalcite derived mixed MgAl oxides studied by test reaction of MBOH conversion and temperature programmed desorption of NH ₃ and CO ₂ . <i>Materials Research Bulletin</i> , 2004 , 39, 263-281 | 5.1 | 96 |
| 98 | Influence of Cu, Co and Ni cations incorporated in brucite-type layers on thermal behaviour of hydrotalcites and reducibility of the derived mixed oxide systems. <i>Thermochimica Acta</i> , 2002 , 395, 225-236 | 2.9 | 95 |
| 97 | Chromium oxide supported on MCM-41 as a highly active and selective catalyst for dehydrogenation of propane with CO ₂ . <i>Applied Catalysis A: General</i> , 2008 , 349, 62-69 | 5.1 | 91 |
| 96 | Selective oxidation of ammonia to nitrogen on transition metal containing mixed metal oxides. <i>Applied Catalysis B: Environmental</i> , 2005 , 58, 235-244 | 21.8 | 89 |
| 95 | Influence of iron state and acidity of zeolites on the catalytic activity of FeHBEA, FeHZSM-5 and FeHMOR in SCR of NO with NH ₃ and N ₂ O decomposition. <i>Microporous and Mesoporous Materials</i> , 2015 , 203, 73-85 | 5.3 | 77 |
| 94 | Modification of MCM-48-, SBA-15-, MCF-, and MSU-type mesoporous silicas with transition metal oxides using the molecular designed dispersion method. <i>Journal of Physical Chemistry B</i> , 2005 , 109, 11552-11557 | 2.8 | 76 |
| 93 | SCR of NO by NH ₃ on alumina or titania-pillared montmorillonite various modified with Cu or Co: Part I. General characterization and catalysts screening. <i>Applied Catalysis B: Environmental</i> , 2003 , 45, 103-116 | 21.8 | 71 |
| 92 | Zeolite Y modified with palladium as effective catalyst for selective catalytic oxidation of ammonia to nitrogen. <i>Journal of Catalysis</i> , 2014 , 316, 36-46 | 7.3 | 69 |
| 91 | Selective catalytic oxidation of ammonia to nitrogen over Mg-Al, Cu-Mg-Al and Fe-Mg-Al mixed metal oxides doped with noble metals. <i>Applied Catalysis B: Environmental</i> , 2013 , 130-131, 152-162 | 21.8 | 68 |
| 90 | Montmorillonite-based porous clay heterostructures (PCHs) intercalated with silica/titania pillars: Synthesis and characterization. <i>Journal of Solid State Chemistry</i> , 2009 , 182, 1094-1104 | 3.3 | 68 |
| 89 | IR studies of Fe modified ZSM-5 zeolites of diverse mesopore topologies in the terms of their catalytic performance in NH ₃ -SCR and NH ₃ -SCO processes. <i>Applied Catalysis B: Environmental</i> , 2015 , 179, 589-598 | 21.8 | 67 |
| 88 | Selective Catalytic Oxidation (SCO) of Ammonia to Nitrogen over Hydrotalcite Originated MgCuFe Mixed Metal Oxides. <i>Catalysis Letters</i> , 2011 , 141, 1345-1354 | 2.8 | 60 |
| 87 | Acid-base treated vermiculite as high performance adsorbent: Insights into the mechanism of cationic dyes adsorption, regeneration, recyclability and stability studies. <i>Chemosphere</i> , 2017 , 173, 107-115 | 8.4 | 57 |
| 86 | Comparison study of titania pillared interlayered clays and porous clay heterostructures modified with copper and iron as catalysts of the DeNO _x process. <i>Applied Clay Science</i> , 2011 , 53, 164-173 | 5.2 | 57 |

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| 85 | Montmorillonite, vermiculite and saponite based porous clay heterostructures modified with transition metals as catalysts for the DeNOx process. <i>Applied Catalysis B: Environmental</i> , 2009 , 88, 331-340 | 21.8 | 55 |
| 84 | Selective reduction of NO with NH ₃ over pillared clays modified with transition metals. <i>Catalysis Today</i> , 2004 , 90, 43-49 | 5.3 | 55 |
| 83 | Simultaneous removal of dyes and metal cations using an acid, acid-base and base modified vermiculite as a sustainable and recyclable adsorbent. <i>Science of the Total Environment</i> , 2017 , 576, 398-408 | 10.2 | 51 |
| 82 | SBA-15 mesoporous silica modified with metal oxides by MDD method in the role of DeNOx catalysts. <i>Microporous and Mesoporous Materials</i> , 2010 , 127, 133-141 | 5.3 | 50 |
| 81 | Influence of redox properties on the activity of iron oxide catalysts in dehydrogenation of propane with CO ₂ . <i>Reaction Kinetics and Catalysis Letters</i> , 2004 , 82, 121-130 | | 49 |
| 80 | Porous clay heterostructures (PCHs) intercalated with silica-titania pillars and modified with transition metals as catalysts for the DeNOx process. <i>Applied Catalysis B: Environmental</i> , 2009 , 91, 449-459 | 21.8 | 48 |
| 79 | Selective catalytic reduction of NO with ammonia over porous clay heterostructures modified with copper and iron species. <i>Catalysis Today</i> , 2007 , 119, 181-186 | 5.3 | 46 |
| 78 | VOx supported SBA-15 catalysts for the oxidative dehydrogenation of ethylbenzene to styrene in the presence of N ₂ O. <i>Catalysis Today</i> , 2006 , 114, 307-313 | 5.3 | 46 |
| 77 | Characterisation and reactivity of vanadia/titania supported SBA-15 in the SCR of NO with ammonia. <i>Applied Catalysis B: Environmental</i> , 2005 , 61, 69-78 | 21.8 | 46 |
| 76 | Selective catalytic oxidation of ammonia into nitrogen over PCH modified with copper and iron species. <i>Catalysis Today</i> , 2006 , 114, 319-325 | 5.3 | 44 |
| 75 | The influence of the preparation procedures on the catalytic activity of Fe-BEA zeolites in SCR of NO with ammonia and N ₂ O decomposition. <i>Catalysis Today</i> , 2014 , 235, 210-225 | 5.3 | 43 |
| 74 | Acid-activated vermiculites as catalysts of the DeNOx process. <i>Catalysis Today</i> , 2012 , 191, 25-31 | 5.3 | 43 |
| 73 | Zeolites Y modified with palladium as effective catalysts for low-temperature methanol incineration. <i>Applied Catalysis B: Environmental</i> , 2015 , 166-167, 353-365 | 21.8 | 41 |
| 72 | Acid-activated vermiculites and phlogophites as catalysts for the DeNOx process. <i>Applied Clay Science</i> , 2010 , 49, 156-162 | 5.2 | 40 |
| 71 | The influence of acid treatments over vermiculite based material as adsorbent for cationic textile dyestuffs. <i>Chemosphere</i> , 2016 , 153, 115-29 | 8.4 | 38 |
| 70 | BEA zeolite modified with iron as effective catalyst for N ₂ O decomposition and selective reduction of NO with ammonia. <i>Applied Catalysis B: Environmental</i> , 2013 , 138-139, 434-445 | 21.8 | 37 |
| 69 | An influence of thermal treatment conditions of hydrotalcite-like materials on their catalytic activity in the process of N ₂ O decomposition. <i>Journal of Thermal Analysis and Calorimetry</i> , 2011 , 105, 161-170 | 4.1 | 37 |
| 68 | MCM-41 modified with transition metals by template ion-exchange method as catalysts for selective catalytic oxidation of ammonia to dinitrogen. <i>Microporous and Mesoporous Materials</i> , 2017 , 240, 9-21 | 5.3 | 36 |

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| 67 | Mesoporous silica materials modified with alumina polycations as catalysts for the synthesis of dimethyl ether from methanol. <i>Materials Research Bulletin</i> , 2016 , 74, 425-435 | 5.1 | 31 |
| 66 | Thermal transformations of CuMg (Zn)Al(Fe) hydrotalcite-like materials into metal oxide systems and their catalytic activity in selective oxidation of ammonia to dinitrogen. <i>Journal of Thermal Analysis and Calorimetry</i> , 2013 , 114, 731-747 | 4.1 | 31 |
| 65 | Dehydrogenation of ethylbenzene with nitrous oxide in the presence of mesoporous silica materials modified with transition metal oxides. <i>Journal of Physical Chemistry A</i> , 2005 , 109, 330-6 | 2.8 | 30 |
| 64 | Ag-loaded zeolites Y and USY as catalysts for selective ammonia oxidation. <i>Catalysis Science and Technology</i> , 2016 , 6, 1651-1660 | 5.5 | 29 |
| 63 | Influence of Cu on the catalytic activity of FeBEA zeolites in SCR of NO with NH ₃ . <i>Applied Catalysis B: Environmental</i> , 2015 , 168-169, 377-384 | 21.8 | 28 |
| 62 | Aldol condensation of citral and acetone over mesoporous catalysts obtained by thermal and chemical activation of magnesiumaluminum hydrotalcite-like precursors. <i>Applied Catalysis A: General</i> , 2006 , 302, 317-324 | 5.1 | 28 |
| 61 | Cu-Mg-Al hydrotalcite-like materials as precursors of effective catalysts for selective oxidation of ammonia to dinitrogen – The influence of Mg/Al ratio and calcination temperature. <i>Applied Clay Science</i> , 2016 , 129, 122-130 | 5.2 | 28 |
| 60 | Effective catalysts for the low-temperature NH ₃ -SCR process based on MCM-41 modified with copper by template ion-exchange (TIE) method. <i>Applied Catalysis B: Environmental</i> , 2018 , 237, 927-937 | 21.8 | 28 |
| 59 | SBA-15 mesoporous silica modified with rhodium by MDD method and its catalytic role for N ₂ O decomposition reaction. <i>Journal of Porous Materials</i> , 2011 , 18, 483-491 | 2.4 | 27 |
| 58 | Hydrotalcite derived (Cu, Mn)MgAl metal oxide systems doped with palladium as catalysts for low-temperature methanol incineration. <i>Applied Clay Science</i> , 2015 , 114, 273-282 | 5.2 | 26 |
| 57 | Total oxidation of selected mono-carbon VOCs over hydrotalcite originated metal oxide catalysts. <i>Catalysis Communications</i> , 2012 , 17, 118-125 | 3.2 | 26 |
| 56 | Pillared smectite modified with carbon and manganese as catalyst for SCR of NO _x with NH ₃ . Part I. General characterization and catalyst screening. <i>Catalysis Letters</i> , 2000 , 68, 95-100 | 2.8 | 26 |
| 55 | SBA-15 loaded with iron by various methods as catalyst for DeNO _x process. <i>Materials Research Bulletin</i> , 2016 , 78, 72-82 | 5.1 | 25 |
| 54 | Determination of the pore size distribution of mesoporous silicas by means of quasi-equilibrated thermodesorption of n-nonane. <i>Microporous and Mesoporous Materials</i> , 2009 , 120, 257-262 | 5.3 | 25 |
| 53 | Porous clay heterostructures intercalated with multicomponent pillars as catalysts for dehydration of alcohols. <i>Applied Clay Science</i> , 2018 , 160, 116-125 | 5.2 | 25 |
| 52 | Catalytic activity of MCM-48-, SBA-15-, MCF-, and MSU-type mesoporous silicas modified with Fe ³⁺ species in the oxidative dehydrogenation of ethylbenzene in the presence of N ₂ O. <i>Journal of Physical Chemistry A</i> , 2005 , 109, 9808-15 | 2.8 | 24 |
| 51 | MCM-41 modified with iron by template ion-exchange method as effective catalyst for DeNO _x and NH ₃ -SCO processes. <i>Chemical Engineering Journal</i> , 2016 , 295, 167-180 | 14.7 | 22 |
| 50 | A novel stir bar sorptive-dispersive microextraction in combination with magnetically modified graphene for isolation of seven pesticides from water samples. <i>Microchemical Journal</i> , 2019 , 147, 962-971 ⁸ | 4.8 | 21 |

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| 49 | Effect of Co content on the catalytic activity of CoSiBEA zeolites in N ₂ O decomposition and SCR of NO with ammonia. <i>Catalysis Today</i> , 2015 , 258, 507-517 | 5.3 | 21 |
| 48 | Vermiculites intercalated with Al ₂ O ₃ pillars and modified with transition metals as catalysts of DeNO _x process. <i>Catalysis Today</i> , 2008 , 137, 242-246 | 5.3 | 20 |
| 47 | Nanostructured Co ₂ Te-O systems for catalytic decomposition of N ₂ O. <i>Catalysis Today</i> , 2012 , 191, 121-124 | 5.3 | 19 |
| 46 | TG study on real role of active carbon support in propane dehydrogenation with CO ₂ . <i>Thermochimica Acta</i> , 2008 , 471, 26-32 | 2.9 | 18 |
| 45 | Dual-function hydrotalcite-derived adsorbents with sulfur storage properties: Dyes and hydrotalcite fate in adsorption-regeneration cycles. <i>Microporous and Mesoporous Materials</i> , 2017 , 250, 72-87 | 5.3 | 17 |
| 44 | Experimental evidence of NO SCR mechanism in the presence of the BEA zeolite with framework and extra-framework cobalt species. <i>Applied Catalysis B: Environmental</i> , 2016 , 198, 457-470 | 21.8 | 16 |
| 43 | Acid-treated vermiculites as effective catalysts of high-temperature N ₂ O decomposition. <i>Applied Clay Science</i> , 2014 , 101, 237-245 | 5.2 | 16 |
| 42 | Nitrous Oxide Reduction with Ammonia and Methane Over Mesoporous Silica Materials Modified with Transition Metal Oxides. <i>Journal of Porous Materials</i> , 2005 , 12, 183-191 | 2.4 | 15 |
| 41 | Characterization of Co and Fe-MCM-56 catalysts for NH-SCR and NO decomposition: An in situ FTIR study. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 2018 , 196, 281-288 | 4.4 | 14 |
| 40 | Influence of textural and structural properties of MgAl and MgZnAl containing hydrotalcite derived oxides on Cr(VI) adsorption capacity. <i>Materials Chemistry and Physics</i> , 2012 , 132, 929-936 | 4.4 | 14 |
| 39 | DeNO _x Abatement Modelling over Sonically Prepared Copper USY and ZSM5 Structured Catalysts. <i>Catalysts</i> , 2017 , 7, 205 | 4 | 13 |
| 38 | Enhancement of Electrochemical Performance of LiMn ₂ O ₄ Spinel Cathode Material by Synergetic Substitution with Ni and S. <i>Materials</i> , 2016 , 9, | 3.5 | 13 |
| 37 | Activating effect of cerium in hydrotalcite derived CuMgAl catalysts for selective ammonia oxidation and the selective reduction of NO with ammonia. <i>Reaction Kinetics, Mechanisms and Catalysis</i> , 2017 , 121, 225-240 | 1.6 | 12 |
| 36 | Ferrierite and Its Delaminated and Silica-Intercalated Forms Modified with Copper as Effective Catalysts for NH ₃ -SCR Process. <i>Catalysts</i> , 2020 , 10, 734 | 4 | 12 |
| 35 | Modified vermiculites as effective catalysts for dehydration of methanol and ethanol. <i>Catalysis Today</i> , 2020 , 355, 466-475 | 5.3 | 12 |
| 34 | Catalytic oxidation of organic sulfides by H ₂ O ₂ in the presence of titanosilicate zeolites. <i>Microporous and Mesoporous Materials</i> , 2020 , 302, 110219 | 5.3 | 11 |
| 33 | Montmorillonite intercalated with SiO ₂ , SiO ₂ -Al ₂ O ₃ or SiO ₂ -TiO ₂ pillars by surfactant-directed method as catalytic supports for DeNO _x process. <i>Chemical Papers</i> , 2014 , 68, | 1.9 | 11 |
| 32 | Coprecipitated CoAl and CuAl oxide catalysts for toluene total oxidation. <i>Catalysis Today</i> , 2011 , 176, 413-416 | 5.3 | 11 |

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| 31 | Oxydehydrogenation of ethylbenzene to styrene in the presence of CO ₂ on the catalysts obtained from [Li(Fe,Al) ₂ (OH) ₆]CO ₃ ·xH ₂ O precursors. <i>Applied Catalysis A: General</i> , 2003 , 255, 35-43 | 5.1 | 11 |
| 30 | Hydrotalcite-derived Co-containing mixed metal oxide catalysts for methanol incineration. <i>Journal of Thermal Analysis and Calorimetry</i> , 2017 , 129, 1301-1311 | 4.1 | 10 |
| 29 | MCM-22, MCM-36, and ITQ-2 Zeolites with Different Si/Al Molar Ratios as Effective Catalysts of Methanol and Ethanol Dehydration. <i>Materials</i> , 2020 , 13, | 3.5 | 10 |
| 28 | DeNO Abatement over Sonically Prepared Iron-Substituted Y, USY and MFI Zeolite Catalysts in Lean Exhaust Gas Conditions. <i>Nanomaterials</i> , 2018 , 8, | 5.4 | 10 |
| 27 | Natural Micas Intercalated with Al ₂ O ₃ and Modified with Transition Metals as Catalysts of the Selective Oxidation of Ammonia to Nitrogen. <i>Topics in Catalysis</i> , 2009 , 52, 1017-1022 | 2.3 | 10 |
| 26 | Reactive and morphological trends on porous anodic TiO ₂ substrates obtained at different annealing temperatures. <i>International Journal of Hydrogen Energy</i> , 2020 , 45, 4376-4389 | 6.7 | 10 |
| 25 | Experimental Evidence of the Mechanism of Selective Catalytic Reduction of NO with NH ₃ over Fe-Containing BEA Zeolites. <i>ChemSusChem</i> , 2019 , 12, 692-705 | 8.3 | 10 |
| 24 | Enhanced catalytic performance in low-temperature NH ₃ -SCR process of spherical MCM-41 modified with Cu by template ion-exchange and ammonia treatment. <i>Microporous and Mesoporous Materials</i> , 2021 , 315, 110920 | 5.3 | 10 |
| 23 | Acid-treated Clay Minerals as Catalysts for Dehydration of Methanol and Ethanol. <i>Clays and Clay Minerals</i> , 2020 , 68, 23-37 | 2.1 | 9 |
| 22 | Catalytic and photocatalytic oxidation of diphenyl sulphide to diphenyl sulfoxide over titanium dioxide doped with vanadium, zinc, and tin.. <i>RSC Advances</i> , 2020 , 10, 4023-4031 | 3.7 | 9 |
| 21 | Catalytic reduction of N ₂ O by ethylbenzene over novel hydrotalcite-derived MgCrBeD as an alternative route for simultaneous N ₂ O abatement and styrene production. <i>Catalysis Communications</i> , 2006 , 7, 1047-1052 | 3.2 | 9 |
| 20 | Titanium dioxide doped with vanadium as effective catalyst for selective oxidation of diphenyl sulfide to diphenyl sulfonate. <i>Journal of Thermal Analysis and Calorimetry</i> , 2018 , 132, 1471-1480 | 4.1 | 7 |
| 19 | Tuning of textural properties of mixed metal oxides by changes in anionic composition of hydrotalcite-like precursors. <i>Materials Chemistry and Physics</i> , 2009 , 115, 775-782 | 4.4 | 6 |
| 18 | Phlogophites intercalated with Al ₂ O ₃ pillars and modified with transition metals as catalysts of the DeNO _x process. <i>Reaction Kinetics and Catalysis Letters</i> , 2007 , 91, 369-378 | | 6 |
| 17 | Adsorption properties of carbonized polyacrylonitrile deposited on alumina and silica gel by precipitation polymerization. <i>Materials Research Bulletin</i> , 2010 , 45, 787-793 | 5.1 | 5 |
| 16 | Silica and silicaitania intercalated MCM-36 modified with iron as catalysts for selective reduction of nitrogen oxides The role of associated reactions. <i>Catalysis Science and Technology</i> , 2020 , 10, 7940-7954 | 5.5 | 5 |
| 15 | Catalytic Performance of Spherical MCM-41 Modified with Copper and Iron as Catalysts of NH-SCR Process. <i>Molecules</i> , 2020 , 25, | 4.8 | 4 |
| 14 | Advances in Functionalization of Inorganic Porous Materials for Environmental Catalysis. <i>Advances in Inorganic Chemistry</i> , 2018 , 72, 323-383 | 2.1 | 4 |

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| 13 | Effect of rehydration conditions on the catalytic activity of hydrotalcite-derived Mg-Al oxides in aldolization of acetone. <i>Reaction Kinetics and Catalysis Letters</i> , 2005 , 85, 383-390 | | 4 |
| 12 | Ferrierite and Its Delaminated Forms Modified with Copper as Effective Catalysts for NH-SCO Process. <i>Materials</i> , 2020 , 13, | 3-5 | 4 |
| 11 | Hierarchical materials originated from mesoporous MCF material and Beta zeolite nanoparticles □ synthesis and catalytic activity in N2O decomposition. <i>Journal of the Chinese Advanced Materials Society</i> , 2013 , 1, 48-55 | | 3 |
| 10 | Titanium-silicon ferrierites and their delaminated forms modified with copper as effective catalysts for low-temperature NH-SCR.. <i>RSC Advances</i> , 2021 , 11, 10847-10859 | 3-7 | 3 |
| 9 | Experimental and Theoretical Studies of Sonically Prepared Cu□, Cu□SY and Cu□SM-5 Catalysts for SCR deNOx. <i>Catalysts</i> , 2021 , 11, 824 | 4 | 3 |
| 8 | Key Parameters of Fly Ashes Generated from the Industrial Energy Sector Decisive for Their Pro-ecological Applications. <i>Energy & Fuels</i> , 2020 , 34, 6229-6238 | 4-1 | 2 |
| 7 | INFLUENCE OF DEFECT STRUCTURE ON CATALYTIC ACTIVITY OF NANOMETRIC MATERIALS BASED ON CERIA-DOPED COPPER. <i>Functional Materials Letters</i> , 2011 , 04, 165-169 | 1-2 | 2 |
| 6 | Modified Layered Silicas as Catalysts for Conversion of Nitrogen Pollutants in Flue Gases□ Review. <i>Catalysts</i> , 2021 , 11, 644 | 4 | 2 |
| 5 | Selective and efficient catalytic and photocatalytic oxidation of diphenyl sulphide to sulfoxide and sulfone: the role of hydrogen peroxide and TiO polymorph.. <i>RSC Advances</i> , 2022 , 12, 1862-1870 | 3-7 | 1 |
| 4 | Mesoporous silicas of MCM-41 type modified with iron species by template ion-exchange method as catalysts for the high-temperature NH3-SCR process □Role of iron species aggregation, silica morphology and associated reactions. <i>Catalysis Today</i> , 2021 , | 5-3 | 1 |
| 3 | Modification of MCM-22 Zeolite and Its Derivatives with Iron for the Application in N2O Decomposition. <i>Catalysts</i> , 2020 , 10, 1139 | 4 | 0 |
| 2 | Mesoporous silica-based catalysts for selective catalytic reduction of NOx with ammonia□Recent advances. <i>Advances in Inorganic Chemistry</i> , 2022 , | 2-1 | 0 |
| 1 | Dehydration of methanol and ethanol over ferrierite originated layered zeolites - the role of acidity and porous structure.. <i>RSC Advances</i> , 2022 , 12, 9395-9403 | 3-7 | |