Jiri Dybal

List of Publications by Year
in descending order

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210 papers	4,326 citations	145106 33 h-index	190340 53 g-index
213 all docs	213 docs citations	213 times ranked	4218 citing authors

#	Article	IF	Citations
1	Biodegradation of LDPE_TPS blends under controlled composting conditions. Polymer Bulletin, 2023, 80, 3331-3357.	1.7	3
2	Selfâ€Healing Epoxy and Reversible Dielsâ€Alder Based Interpenetrating Networks. Macromolecular Materials and Engineering, 2021, 306, 2000474.	1.7	16
3	Enhanced Ordering of Block Copolymer Thin Films upon Addition of Magnetic Nanoparticles. ACS Applied Materials & Interfaces, 2021, 13, 9195-9205.	4.0	10
4	Formation of graphene oxide-based ordered structures in epoxy: effect of grafted polymer chains. Polymer-Plastics Technology and Materials, 2021, 60, 1084-1097.	0.6	2
5	Pro-oxidant activity of biocompatible catechin stabilizer during photooxidation of polyolefins. Polymer Degradation and Stability, 2021, 193, 109735.	2.7	2
6	Monolithic nanocomposite hydrogels with fast dual T- and pH- stimuli responsiveness combined with high mechanical properties. Journal of Materials Research and Technology, 2021, 15, 6079-6097.	2.6	6
7	Non-covalent interactions of imidazolium-based ionic liquids with model pyrrolidones revealed by FTIR spectroscopy and quantum chemical model calculations. Journal of Molecular Liquids, 2020, 312, 113445.	2.3	2
8	Thermoplastic Starch Composites With Titanium Dioxide and Vancomycin Antibiotic: Preparation, Morphology, Thermomechanical Properties, and Antimicrobial Susceptibility Testing. Frontiers in Materials, 2020, 7, .	1.2	10
9	Synergistic effects in Methylcellulose/Hydroxyethylcellulose blend: Influence of components ratio and graphene oxide. Carbohydrate Polymers, 2020, 236, 116077.	5.1	3
10	Ductile/brittle PA6/PS system: Effect of carbon nanoplateletsâ€modified interface on performance. Journal of Applied Polymer Science, 2020, 137, 49100.	1.3	2
11	Impact of Cellulose Dissolution on 1-Butyl-3-Methylimidazolium Chloride Crystallization Studied by Raman Spectroscopy, Wide-Angle X-ray Scattering, and Solid-State NMR. Crystal Growth and Design, 2020, 20, 1706-1715.	1.4	7
12	Nano-modified epoxy: the effect of GO-based complex structures on mechanical performance. RSC Advances, 2020, 10, 11357-11364.	1.7	6
13	Prooxidant activity of phenolic stabilizers in polyolefins during accelerated photooxidation. Polymer Degradation and Stability, 2019, 166, 307-324.	2.7	10
14	Control of Gelation and Properties of Reversible Dielsâ€“Alder Networks: Design of a Self-Healing Network. Polymers, 2019, 11, 930.	2.0	17
15	Role of p-Benzoquinone in the Synthesis of a Conducting Polymer, Polyaniline. ACS Omega, 2019, 4, 7128-7139.	1.6	22
16	Non-covalent interactions in bmimCl/co-solvent mixtures: A FTIR spectroscopy and computational study. Journal of Molecular Liquids, 2019, 285, 688-696.	2.3	9
17	Nanoâ€modified HDPE/PA6 microfibrillar composites: Effect of aminated graphite platelets coupling. Journal of Applied Polymer Science, 2019, 136, 47660.	1.3	3
18	Thermoplastic Starch Composites Filled With Isometric and Elongated TiO2-Based Nanoparticles. Frontiers in Materials, 2019, 6, .	1.2	6

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19	Biodegradability of blends based on aliphatic polyester and thermoplastic starch. Chemical Papers, 2019, 73, 1121-1134.	1.0	15
20	Structure evolution during orderâ€“disorder transitions in aliphatic polycarbonate based polyurethanes. Self-healing polymer. Chemical Engineering Journal, 2019, 357, 611-624.	6.6	23
21	Solvent-free, catalyst-free aza-Michael addition of cyclohexylamine to diethyl maleate: Reaction mechanism and kinetics. Tetrahedron, 2018, 74, 58-67.	1.0	33
22	Thermally Induced Protonation of Conducting Polyaniline Film by Dibutyl Phosphite Conversion to Phosphate. Journal of Physical Chemistry A, 2018, 122, 9492-9497.	1.1	2
23	The interaction of thin polyaniline films with various Hâ€phosphonates: Spectroscopy and quantum chemical calculations. Journal of Applied Polymer Science, 2018, 135, 46728.	1.3	10
24	Intermolecular Interactions in N,N-Dimethylacetamide without and with LiCl Studied by Infrared Spectroscopy and Quantum Chemical Model Calculations. Journal of Physical Chemistry B, 2018, 122, 8921-8930.	1.2	14
25	UV degradation of styrene-butadiene rubber versus high density poly(ethylene) in marine conditions studied by infrared spectroscopy, micro indentation, and electron spin resonance imaging. Polymer Degradation and Stability, 2018, 156, 132-143.	2.7	15
26	Facile preparation of biocompatible poly (lactic acid)-reinforced poly(Îµ-caprolactone) fibers via graphite nanoplatelets -aided melt spinning. Journal of the Mechanical Behavior of Biomedical Materials, 2018, 84, 108-115.	1.5	9
27	Pro-oxidant activity of Î±-tocopherol during photooxidative degradation of polyolefins. ESRI and IR microspectroscopy studies. Polymer Degradation and Stability, 2017, 138, 55-71.	2.7	19
28	1,3-Alternate-25,27-bis(1-octyloxy)calix[4]arene-crown-6 as an extraordinarily strong receptor for the univalent silver cation. Monatshefte FÃ¼r Chemie, 2017, 148, 1379-1383.	0.9	0
29	Thermoresponsive behavior of block copolymers of PEO and PNIPAm with different architecture in aqueous solutions: A study by NMR, FTIR, DSC and quantum-chemical calculations. European Polymer Journal, 2017, 94, 471-483.	2.6	16
30	Improvement of performance of a ductile/brittle polymer system by graphite nanoplatelets: effect of component coupling. RSC Advances, 2017, 7, 37331-37339.	1.7	4
31	In Vitro Bioactivity Test of Real Dental Implants According to ISO 23317. International Journal of Oral and Maxillofacial Implants, 2017, 32, 1221-1230.	0.6	6
32	Temperatureâ€Induced Phase Transition in Aqueous Solutions of Poly(Nâ€isopropylacrylamide)â€Based Block Copolymer. Macromolecular Symposia, 2016, 369, 92-96.	0.4	1
33	New type of gel polymer electrolytes based on selected methacrylates and their characteristics. Part II. Fluorinated Co-polymers. Electrochimica Acta, 2016, 208, 211-224.	2.6	3
34	Interaction of polyaniline film with dibutyl phosphonate versus phosphite: Enhanced thermal stability. Polymer Degradation and Stability, 2016, 134, 357-365.	2.7	12
35	Structural Transitions of 1-Butyl-3-methylimidazolium Chloride/Water Mixtures Studied by Raman and FTIR Spectroscopy and WAXS. Crystal Growth and Design, 2016, 16, 1958-1967.	1.4	28
36	Additive Effects on Phase Transition and Interactions in Poly(vinyl methyl ether) Solutions. Polymers, 2015, 7, 2572-2583.	2.0	13

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37	The effect of urea and urea-modified halloysite on performance of PCL. Journal of Thermal Analysis and Calorimetry, 2015, 120, 1283-1291.	2.0	14
38	Poly(N-isopropylacrylamide)â€“clay based hydrogels controlled by the initiating conditions: evolution of structure and gel formation. Soft Matter, 2015, 11, 9291-9306.	1.2	58
39	Fractional complexation in a miscible polymer blend. Calorimetry and size exclusion chromatography. Polymer International, 2014, 63, 1406-1413.	1.6	1
40	Heterogeneity of accelerated photooxidation in commodity polymers stabilized by HAS: ESRI, IR, and MH study. Polymer Degradation and Stability, 2014, 103, 11-25.	2.7	24
41	The effect of micellization-induced deprotonation on the associative behavior of a carboxyl modified Pluronic P85. Soft Matter, 2014, 10, 8011-8022.	1.2	2
42	Temperatureâ€Induced Phase Separation and Hydration in Aqueous Polymer Solutions Studied by NMR and IR Spectroscopy: Comparison of Poly(Nâ€vinylcaprolactam) and Acrylamideâ€Based Polymers. Macromolecular Symposia, 2014, 336, 39-46.	0.4	18
43	The material combining conducting polymer and ionic liquid: Hydrogen bonding interactions between polyaniline and imidazolium salt. Synthetic Metals, 2014, 197, 168-174.	2.1	34
44	Quantification of structural changes of UHMWPE components in total joint replacements. BMC Musculoskeletal Disorders, 2014, 15, 109.	0.8	15
45	Fourier-transform infrared spectroscopic study of a fractional-complexed polymer blend. European Polymer Journal, 2014, 59, 200-207.	2.6	4
46	Detection of Aniline Oligomers on Polyanilineâ€“Gold Interface using Resonance Raman Scattering. ACS Applied Materials & Interfaces, 2014, 6, 942-950.	4.0	44
47	NMR, FTIR and DFT study of the interaction of the benzoate anion with meso-octamethylcalix[4]pyrrole. Chemical Physics Letters, 2013, 561-562, 42-45.	1.2	3
48	Interaction of the thallium cation with 1,3-alternate-25,27-bis(1-octyloxy)calix[4]arene-crown-6: Experimental and theoretical study. Journal of Molecular Structure, 2013, 1042, 73-77.	1.8	5
49	The effect of halloysite modification combined with in situ matrix modifications on the structure and properties of polypropylene/halloysite nanocomposites. EXPRESS Polymer Letters, 2013, 7, 471-479.	1.1	50
50	Effect of an organoclay on the reaction-induced phase-separation in a dynamically asymmetric epoxy/PCL system. EXPRESS Polymer Letters, 2013, 7, 1012-1019.	1.1	8
51	Premicellar interaction of PEOâ€“PPOâ€“PEO triblock copolymers with partially hydrophobic alcohols: NMR study. Magnetic Resonance in Chemistry, 2013, 51, 275-282.	1.1	2
52	Interaction of cesium ions with calix[2]furan[4]pyrrole and its fluoride complex. Chemical Physics Letters, 2012, 541, 27-31.	1.2	1
53	Activation of cellulose by 1,4-dioxane for dissolution in N,N-dimethylacetamide/LiCl. Cellulose, 2012, 19, 1893-1906.	2.4	17
54	Temperature-induced phase separation and hydration in poly(N-vinylcaprolactam) aqueous solutions: a study by NMR and IR spectroscopy, SAXS, and quantum-chemical calculations. Soft Matter, 2012, 8, 6110.	1.2	84

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55	Ion vs. ion pair receptor: NMR and DFT study of the interaction of Thallium and Cesium ions and ion pairs with meso-octamethylcalix[4]pyrrole. Chemical Physics, 2012, 400, 19-28.	0.9	13
56	Interaction of Cesium Ions with Calix[4]arene-bis(t-octylbenzo-18-crown-6): NMR and Theoretical Study. Journal of Physical Chemistry B, 2011, 115, 7578-7587.	1.2	131
57	Micellization-induced deprotonation of thermoresponsive surfactant CAE-85 â€" the telechelic carboxylic group derivative of Pluronic P85. Vibrational Spectroscopy, 2011, 57, 300-305.	1.2	5
58	Celluloseâ€based graft copolymers with controlled architecture prepared in a homogeneous phase. Journal of Polymer Science Part A, 2011, 49, 4353-4367.	2.5	25
59	Interactions in a blend of two polymers greatly differing in glass transition temperature. Journal of Polymer Science, Part B: Polymer Physics, 2011, 49, 1031-1040.	2.4	4
60	Interaction of hydrated protons with octylâ€phenylâ€N,Nâ€diisobutylcarbamoylmethyl phosphine oxide (CMPO): NMR and theoretical study. Magnetic Resonance in Chemistry, 2011, 49, 617-626.	1.1	1
61	Hydration modes of an amphiphilic molecule 2: NMR, FTIR and theoretical study of the interactions in the system waterâ€"1,2-dimethoxyethane. Chemical Physics, 2011, 382, 104-112.	0.9	13
62	Stimuliâ€Responsive Polymers in Solution Investigated by NMR and Infrared Spectroscopy. Macromolecular Symposia, 2011, 303, 17-25.	0.4	7
63	Extraction and DFT study on the complexation of Mg2+ with valinomycin. Monatshefte FÃ¼r Chemie, 2010, 141, 15-18.	0.9	31
64	Protonation of electroneutral p-tert-butylcalix[4]arenetetraacetic acid. Monatshefte FÃ¼r Chemie, 2010, 141, 19-22.	0.9	16
65	Solvent extraction of silver trifluoromethanesulfonate from water into nitrobenzene in the presence of silver ionophoreÂIV. Monatshefte FÃ¼r Chemie, 2010, 141, 507-510.	0.9	2
66	A combined experimental and theoretical study on the complexation of the ammonium cation with valinomycin. Monatshefte FÃ¼r Chemie, 2010, 141, 1191-1194.	0.9	26
67	Role of hydration and water coordination in micellization of Pluronic block copolymers. Journal of Colloid and Interface Science, 2010, 352, 415-423.	5.0	27
68	Lowâ€band gap copolymers containing thienothiadiazole units: Synthesis, optical, and electrochemical properties. Journal of Polymer Science Part A, 2010, 48, 2743-2756.	2.5	31
69	Cooperative Preassociation Stages of PEOâ"PPOâ"PEO Triblock Copolymers: NMR and Theoretical Study. Journal of Physical Chemistry B, 2010, 114, 3140-3151.	1.2	21
70	Experimental and DFT Study on the Complexation of Zn2+ with Valinomycin. Zeitschrift Fur Physikalische Chemie, 2009, 223, 869-875.	1.4	6
71	Capillary electrophoretic and computational study of the complexation of valinomycin with rubidium cation. Electrophoresis, 2009, 30, 883-889.	1.3	12
72	Capillary affinity electrophoresis and ab initio calculation studies of valinomycin complexation with Na⁺ion. Journal of Separation Science, 2009, 32, 597-604.	1.3	23

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73	A combined experimental and theoretical study on the complexation of Li+ with valinomycin. Monatshefte FÃ¼r Chemie, 2009, 140, 251-254.	0.9	29
74	Contribution to protonated tetraethyl p-tert-butylcalix[4]arene tetraacetate: stability and DFT calculated structure. Monatshefte FÃ¼r Chemie, 2009, 140, 29-32.	0.9	22
75	Experimental evidence, stability, and the most probable structure of protonated p-tert-butylcalix[4]arenetetrakis(N,N-dimethylacetamide). Monatshefte FÃ¼r Chemie, 2009, 140, 1155-1158.	0.9	19
76	A combined extraction and DFT study on the complexation of K+ with valinomycin. Monatshefte FÃ¼r Chemie, 2009, 140, 1289-1292.	0.9	26
77	Extraction and ab initio calculation studies on the complexation of Ca2+ with valinomycin. Journal of Radioanalytical and Nuclear Chemistry, 2009, 279, 553-559.	0.7	15
78	The role of water in structural changes of poly(N-isopropylacrylamide) and poly(N-isopropylmethacrylamide) studied by FTIR, Raman spectroscopy and quantum chemical calculations. Vibrational Spectroscopy, 2009, 51, 44-51.	1.2	81
79	Nanometer size wear debris generated from ultra high molecular weight polyethylene in vivo. Wear, 2009, 266, 349-355.	1.5	41
80	ATR FTIR investigation of interactions and temperature transitions of poly(ethylene oxide), poly(propylene oxide) and ethylene oxideâ€“propylene oxideâ€“ethylene oxide tri-block copolymers in water media. Vibrational Spectroscopy, 2009, 50, 218-225.	1.2	28
81	Application of capillary affinity electrophoresis and density functional theory to the investigation of valinomycinâ€“lithium complex. Journal of Chromatography A, 2009, 1216, 3660-3665.	1.8	14
82	Note on the glass transition temperature of Poly(vinylphenol). European Polymer Journal, 2009, 45, 1851-1856.	2.6	9
83	Hydration Modes of an Amphiphilic Molecule: NMR, FTIR, and Theoretical Study of the Interactions in the Waterâ^'Lutidine System. Journal of Physical Chemistry B, 2009, 113, 11950-11958.	1.2	10
84	Interaction of Hydrated Protons with Trioctylphosphine Oxide: NMR and Theoretical Study. Journal of Physical Chemistry A, 2009, 113, 5896-5905.	1.1	103
85	Heat-Set Poly(ethylacrylic acid) Nanoparticles: Combined Light Scattering, Calorimetric, and FTIR Study. Macromolecules, 2009, 42, 7439-7446.	2.2	13
86	Stability and Probable Structure of Protonated p-tert-Butylcalix[4]arene-tetrakis(N,N-dimethylthioacetamide). Zeitschrift Fur Physikalische Chemie, 2009, 223, 713-718.	1.4	25
87	Protonation of 25,27-bis(1-octyloxy)calix[4]arene-crown-6 in the 1,3-alternate conformation. Monatshefte FÃ¼r Chemie, 2008, 139, 1175-1178.	0.9	51
88	Solvent extraction of univalent cations into nitrobenzene using sodium dicarbollylcobaltate and tetraphenyl p-tert-butylcalix[4]arene tetraketone. Monatshefte FÃ¼r Chemie, 2008, 139, 1349-1351.	0.9	7
89	DFT-calculated structure of protonated tetraphenyl p-tert-butylcalix[4]arene tetraketone. Monatshefte FÃ¼r Chemie, 2008, 139, 1353-1355.	0.9	24
90	Bottlebrushâ€shaped copolymers with cellulose diacetate backbone by a combination of ring opening polymerization and ATRP. Journal of Polymer Science Part A, 2008, 46, 564-573.	2.5	37

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91	Cooperative interaction of H₃O⁺ with 1,3â€alternate tetrapropoxycalix[4]arene: NMR and theoretical study. Magnetic Resonance in Chemistry, 2008, 46, 235-243.	1.1	10
92	Cooperative interaction of nâ€butylammonium ion with 1,3â€alternate tetrapropoxycalix [4]arene: NMR and theoretical study. Magnetic Resonance in Chemistry, 2008, 46, 399-407.	1.1	6
93	NMR and theoretical study of the cooperative interaction of hydrated proton with dibenzoâ€24â€crownâ€8. Magnetic Resonance in Chemistry, 2008, 46, 1015-1024.	1.1	3
94	Backâ€Biting Termination in Methyl Methacrylate/tertâ€Butyl Acrylate Anionic Block Copolymerization. Macromolecular Chemistry and Physics, 2008, 209, 1657-1665.	1.1	6
95	Theoretical and experimental study of the complexation of valinomycin with ammonium cation. Biopolymers, 2008, 89, 1055-1060.	1.2	12
96	Interaction of Hydronium Ion with Dibenzo-18-crown-6: NMR, IR, and Theoretical Study. Journal of Physical Chemistry A, 2008, 112, 10236-10243.	1.1	104
97	Quantification of UHMWPE wear in periprosthetic tissues of hip arthroplasty: Description of a new method based on IR and comparison with radiographic appearance. Wear, 2008, 265, 674-684.	1.5	24
98	Crystal Structures, Thermal Behaviors, and Câ”HÂ·Â·Â·Oâ•C Hydrogen Bondings of Poly(3-hydroxyvalerate) and Poly(3-hydroxybutyrate) Studied by Infrared Spectroscopy and X-ray Diffraction. Macromolecules, 2008, 41, 4305-4312.	2.2	85
99	Protonation of Tetrapropoxy-4-tert-butylcalix[4]arene: NMR Study of Interaction and Probable Structures of the Product. Supramolecular Chemistry, 2008, 20, 487-494.	1.5	78
100	Experimental Evidence for Unusual Protonation of Tetraethyl p-tert-Butylcalix[4]arene Tetraacetate and the Most Probable Structure of the Resulting Complex. Supramolecular Chemistry, 2008, 20, 387-395.	1.5	71
101	Interactions and Temperature Transitions of Ethylene Oxide â€“ Propylene Oxide â€“ Ethylene Oxide triâ€block Copolymers in Water Media. Macromolecular Symposia, 2008, 265, 241-248.	0.4	2
102	Indirect Measurement of the Cooperative Hydrogen Bonding of Polymers Using NMR Quadrupole Relaxation and PFG Methods. Macromolecular Symposia, 2008, 265, 225-232.	0.4	3
103	A Proton Complex of p-tert-Butylcalix[4]arene-tetrakis(N,N-dimethylthioacetamide): NMR Evidence and Probable Structure. Supramolecular Chemistry, 2007, 19, 419-424.	1.5	75
104	A Combined Experimental and Theoretical Study on the Complexation of H3O+ with Hexaethyl Calix[6]arene Hexaacetate. Zeitschrift Fur Physikalische Chemie, 2007, 221, 519-525.	1.4	8
105	<title>Experiments of MAPLE thin film technology</title>. , 2007, , .		0
106	Matrix assisted pulsed laser evaporation of pullulan tailor-made biomaterial thin films for controlled drug delivery systems. Journal of Physics: Conference Series, 2007, 59, 144-149.	0.3	8
107	Cooperative Hydrogen Bonds of Macromolecules. 3. A Model Study of the Proximity Effect. Journal of Physical Chemistry B, 2007, 111, 6118-6126.	1.2	27
108	Thermal Behavior of Tetrahydropyran-Intercalated VOPO4: Structural and Dynamics Study. European Journal of Inorganic Chemistry, 2007, 2007, 444-451.	1.0	2

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109	Matrix assisted pulsed laser evaporation of cinnamate-pullulan and tosylate-pullulan polysaccharide derivative thin films for pharmaceutical applications. Applied Surface Science, 2007, 253, 7755-7760.	3.1	16
110	Extraction and DFT study on the complexation of H3O+ with hexaethyl p-tert-butylcalix[6]arene hexaacetate. Journal of Molecular Structure, 2007, 846, 157-160.	1.8	7
111	Synthesis and characterization of new strontium 4-carboxyphenylphosphonates. Journal of Solid State Chemistry, 2007, 180, 929-939.	1.4	26
112	Formation and stability of Î²-structure in biodegradable ultra-high-molecular-weight poly(3-hydroxybutyrate) by infrared, Raman, andÂquantum chemical calculation studies. Polymer, 2007, 48, 2672-2680.	1.8	44
113	Intercalation of 1,2-Alkanediols into Î±-Zirconium Hydrogenphosphate. Journal of Inclusion Phenomena and Macrocyclic Chemistry, 2007, 58, 95-101.	1.6	1
114	Contribution to the Protonation of a Calix[4]arene: DFT Calculated Structure of Protonated p-tert-Butylcalix[4]arenetetrakis(N,N-diethylacetamide). Monatshefte FÃ¼r Chemie, 2007, 138, 541-543.	0.9	30
115	Protonated Tetramethyl p-tert-Butylcalix[4]arene Tetraketone: NMR Evidence and Probable Structures. Monatshefte FÃ¼r Chemie, 2007, 138, 735-740.	0.9	35
116	Stability and DFT Calculated Structure of Protonated Tetraethyl p-tert-Butyltetrathiacalix[4]arenetetraacetate in the cone Conformation. Monatshefte FÃ¼r Chemie, 2007, 138, 1239-1242.	0.9	30
117	Surface-Deposited Acid/Base on Glass Microfibers in Formation of (3-Aminopropyl)triethoxysilane-[2-(3,4-epoxycyclohexyl)ethyl]heptaisobutyl- octasilsesquioxane Bioverlay. Langmuir, 2006, 22, 3633-3639.	1.6	4
118	Cooperative Hydrogen Bonds of Macromolecules. 2. Two-Dimensional Cooperativity in the Binding of Poly(4-vinylpyridine) to Poly(4-vinylphenol). Journal of Physical Chemistry B, 2006, 110, 18338-18346.	1.2	35
119	Solid Polymer Electrolytes Studied by NMR Spectroscopy and DFT Calculations. Macromolecular Symposia, 2006, 235, 57-63.	0.4	3
120	A near-infrared study of thermally induced structural changes in polyethylene crystal. Polymer, 2006, 47, 2010-2017.	1.8	22
121	Investigations of the hydrophobic and hydrophilic interactions in polymerâ€“water systems by ATR FTIR and Raman spectroscopy. Vibrational Spectroscopy, 2006, 42, 278-283.	1.2	104
122	Valinomycin-proton interaction in low-polarity media. Biopolymers, 2006, 82, 536-548.	1.2	90
123	Infrared and Raman spectroscopy and quantum chemistry calculation studies of Câ€“Hâ‹¯O hydrogen bondings and thermal behavior of biodegradable polyhydroxyalkanoate. Journal of Molecular Structure, 2005, 744-747, 35-46.	1.8	133
124	Solid state NMR and DFT study of polymer electrolyte poly(ethylene oxide)/LiCFSO. Solid State Ionics, 2005, 176, 163-167.	1.3	19
125	Intercalation of cyclic ketones into vanadyl phosphate. Journal of Solid State Chemistry, 2005, 178, 314-320.	1.4	4
126	Solid-State13C NMR and DFT Quantum-Chemical Study of Polymer Electrolyte Poly(2-ethyl-2-oxazoline)/AgCF3SO3. Macromolecules, 2005, 38, 5083-5087.	2.2	6

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127	Role of Water in Structural Changes of Poly(AVGVP) and Poly(GVGVP) Studied by FTIR and Raman Spectroscopy and ab Initio Calculations. Biomacromolecules, 2005, 6, 697-706.	2.6	64
128	Cooperative H-Bonds of Macromolecules. 1. Binding of Low-Molecular-Weight Ligands to Polymers. Journal of Physical Chemistry B, 2005, 109, 13436-13444.	1.2	13
129	Intercalation ofÎ³-Butyrolactone into Vanadyl Phosphate and Niobyl Arsenate. European Journal of Inorganic Chemistry, 2004, 2004, 570-574.	1.0	9
130	Vanadyl Phosphate Intercalated with Diethyl Ether. European Journal of Inorganic Chemistry, 2004, 2004, 2493-2497.	1.0	4
131	Simple and Cooperative Electrostatic Binding of Ammonium Ions to Phosphate Polyions:Â NMR, Infrared, and Theoretical Study. Journal of Physical Chemistry B, 2004, 108, 9306-9314.	1.2	5
132	Role of hydration in the phase transition of polypeptides investigated by NMR and Raman spectroscopy. Macromolecular Symposia, 2004, 205, 143-150.	0.4	5
133	Intercalates of Vanadyl Phosphate with Benzonitrile and Tolunitrile. European Journal of Inorganic Chemistry, 2003, 2003, 3662-3667.	1.0	3
134	Influence of local molecular motions on the determination of 1Hâ€“1H internuclear distances measured by 2D 1H spin-exchange experiments. Solid State Nuclear Magnetic Resonance, 2003, 23, 183-197.	1.5	15
135	Cooperativity in Macromolecular Interactions as a Proximity Effect:Â NMR and Theoretical Study of Electrostatic Coupling of Weakly Charged Complementary Polyions. Journal of Physical Chemistry B, 2003, 107, 12165-12174.	1.2	9
136	Structure and Dynamics of Two Elastin-like Polypentapeptides Studied by NMR Spectroscopy. Biomacromolecules, 2003, 4, 589-601.	2.6	47
137	Structure of polypropylene/polyethylene blends assessed by polarised PA-FTIR spectroscopy, polarised FT raman spectroscopy and confocal Raman microscopy. Macromolecular Symposia, 2002, 184, 107-122.	0.4	13
138	Cooperative Counterionâ˜Polyion Interactions in Polyelectrolyte Chain Dynamics:Â NMR and Quantum-Chemical Study of Locally Collapsed State in Dilute Poly(N-diallyldimethylammonium) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 29	1.0	16
139	Mobility, Structure, and Domain Size in Polyimideâ˜Poly(dimethylsiloxane) Networks Studied by Solid-State NMR Spectroscopy. Macromolecules, 2002, 35, 1253-1261.	2.2	28
140	Energy versus Entropy in Cooperative Electrostatic Interactions:â€‰ Comparative Study of Binding of Sodium Poly(Styrenesulfonate), Dodecylbenzenesulfonate, and Methylbenzenesulfonate to Polycations. Journal of Physical Chemistry B, 2002, 106, 2175-2185.	1.2	12
141	Hydrogen-Bond Interactions in Organically-Modified Polysiloxane Networks Studied by 1D and 2D CRAMPS and Double-Quantum1H MAS NMR. Macromolecules, 2002, 35, 10038-10047.	2.2	37
142	Competitive/Cooperative Electrostatic Interactions in Macromolecular Complexes:Â Multinuclear NMR Study of PDADMACâ˜PMANa Complexes in the Presence of Al3+Ions. Langmuir, 2002, 18, 9594-9599.	1.6	15
143	Temperature Induced Conformational Transitions of Elastin-Like Polypentapeptides Studied by Raman and NMR Spectroscopy. Spectroscopy, 2002, 16, 251-255.	0.8	6
144	Potential and Limitations of 2D 1 H- 1 H Spin-Exchange CRAMPS Experiments to Characterize Structures of Organic Solids. Monatshefte FÃ¼r Chemie, 2002, 133, 1587-1612.	0.9	8

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145	Electrical resistance and diffusion permeability of microporous polyethylene membranes modified with polypyrrole and polyaniline in solutions of electrolytes. Journal of Membrane Science, 2002, 196, 279-287.	4.1	27
146	Purification of the specific immunoglobulin G1 by immobilized metal ion affinity chromatography using nickel complexes of chelating porous and nonporous polymeric sorbents based on poly(methacrylic esters). Journal of Chromatography A, 2002, 954, 115-126.	1.8	55
147	Cooperative Interactions of Unlike Macromolecules:â€‰ 3. NMR and Theoretical Study of the Electrostatic Coupling of Sodium Polyphosphates with Diallyl(dimethyl)ammonium Chlorideâ˜Acrylamide Copolymers. Journal of Physical Chemistry A, 2001, 105, 7486-7493.	1.1	23
148	Supramolecular Structures of Low-Molecular-Weight Polybutadienes, as Studied by Dynamic Light Scattering, NMR and Infrared Spectroscopy. Macromolecules, 2001, 34, 9023-9031.	2.2	11
149	Raman spectroscopy of secondary structure of elastinlike polymer poly(GVGVP). Biopolymers, 2001, 62, 150-157.	1.2	8
150	Molecular Structure of the Complex of Hexano-6-lactam with Magnesium Bromide. Macromolecular Chemistry and Physics, 2001, 202, 1194-1199.	1.1	13
151	Molecular Structure of the Complex of Octano-8-lactam with Magnesium Bromide. Macromolecular Chemistry and Physics, 2001, 202, 3371-3378.	1.1	2
152	Structural transformation of polyethylene phase in oriented polyethylene/polypropylene blends: a hierarchical structure approach. Polymer, 2001, 42, 5321-5326.	1.8	24
153	Crystallization behaviour of poly(N -methyldodecano-12-lactam) Part 2. Recrystallization. Polymer, 2000, 41, 7667-7679.	1.8	8
154	Crystallization behaviour of poly(N -methyldodecano-12-lactam) Part 1. Isothermal crystallization. Polymer, 2000, 41, 7653-7666.	1.8	11
155	Phase structure, composition and orientation of PC/PSAN blends studied by Raman spectroscopy, confocal Raman imaging spectroscopy and polarised PA-FTIR spectroscopy. Polymer, 2000, 41, 4267-4279.	1.8	19
156	Solid-state NMR study of structure, size and dynamics of domains in hybrid siloxane networks. Polymer, 2000, 41, 5269-5282.	1.8	32
157	Order and Mobility in Polycarbonateâ˜Poly(ethylene oxide) Blends Studied by Solid-State NMR and Other Techniques. Macromolecules, 2000, 33, 6448-6459.	2.2	49
158	Cooperative Interactions of Unlike Macromolecules:Â NMR Study of Ionic Coupling of Poly[2-(trimethylammonio)ethyl Methacrylate Chloride]-block-Poly(N-(2-hydroxypropyl)) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 222 Td (M 10972-10985.	1.1	19
159	Polymer Dynamics in an Interface-Confined Space:Â NMR Study of Poly(hexyl) Tj ETQq1 1 0.784314 rgBT /Overlock 10 Tf 50 187 Td (eth in D2Oâ€. Macromolecules, 2000, 33, 4108-4115.	2.2	11
160	Copolymerization of tetraethoxysilane and dimethyl(diethoxy)silane studied by 29 Si NMR and ab initio calculations of 29 Si NMR chemical shifts. Polymer, 1999, 40, 6933-6945.	1.8	33
161	Polymer electrolyte poly(ethylene oxide)/LiCF3SO3 studied by solid-state13C NMR spectroscopy andab initio calculations. Macromolecular Rapid Communications, 1999, 20, 435-439.	2.0	9
162	Study of the Propagation Center in the Anionic Polymerization of (Meth)acrylic Monomers: NMR Study of Di-tert-butyl 2-Lithio-2,4,4â€˜-trimethylglutarate and Living Poly(tert-butyl methacrylate) Oligomers in THF/Toluene Mixtures. Macromolecules, 1999, 32, 5477-5486.	2.2	5

#	Article	IF	Citations
163	Nature and Dynamics of Lithium Ion Coordination in Oligo(ethylene glycol) Dimethacrylate-Solvent Systems:â€‰ NMR, Raman, and Quantum Mechanical Study. Journal of Physical Chemistry A, 1999, 103, 8505-8515.	1.1	16
164	NMR and vibrational spectroscopic study of the order and mobility in polycarbonate and polycarbonate â€” poly(ethylene oxide) blends. Macromolecular Symposia, 1999, 146, 17-23.	0.4	3
165	Study of the Propagation Center in the Anionic Polymerization of (Meth)acrylic Monomers:Â NMR and MNDO Study of the Complexes of Di-tert-butyl 2-Lithio-2,4,4-trimethylglutarate and of the Living Poly(tert-butyl methacrylate) Oligomers with Lithium Chloride. Macromolecules, 1998, 31, 2744-2755.	2.2	20
166	Study of the Propagation Center in the Anionic Polymerization of (Meth)acrylic Monomers:Â NMR and MO LCAO Study of the Interaction of Di-tert-butyl 2-Lithio-2,4,4-trimethylglutarate and the Living Poly(tert-butyl methacrylate) Oligomers with Lithium 2-(2-Methoxyethoxy)ethoxide in Tetrahydrofuran. Macromolecules, 1998, 31, 2731-2743.	2.2	15
167	Ordered Structures in Polycarbonate Studied by Infrared and Raman Spectroscopy, Wide-Angle X-ray Scattering, and Differential Scanning Calorimetry. Macromolecules, 1998, 31, 6611-6619.	2.2	68
168	NMR Study of the Shell Dynamics and Ionization States of Sodium and Lithium Salts of Poly(methyl) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 5	2.2	14
169	Nylon 6 with a short rigid central block. European Polymer Journal, 1997, 33, 587-593.	2.6	8
170	Spectral and structural characterization of a cyclic trimeric model of poly(6-hexanelactam). Polymer, 1997, 38, 2483-2491.	1.8	4
171	Stereoselectivity of an early propagation step in the anionic polymerization of methyl methacrylate â€“ ab initio SCF, MNDO and AM1 study. Macromolecular Theory and Simulations, 1997, 6, 437-450.	0.6	7
172	NMR and AM1 Quantum Chemical Study of the Regioselectivity of the Reaction of 2-Hydroxyethyl Methacrylate with 3-Nitrophthalic Anhydride. Collection of Czechoslovak Chemical Communications, 1997, 62, 69-82.	1.0	3
173	Study of the propagation centre in the anionic polymerization of lactams, 1. Spectroscopic and theoretical study of the activated monomer in dimethyl sulfoxide. Macromolecular Chemistry and Physics, 1996, 197, 467-482.	1.1	1
174	Study of the propagation centre in the anionic polymerization of lactams, 2. Model study of the interaction between an activated monomer and N-acyllactam in dimethyl sulfoxide. Macromolecular Chemistry and Physics, 1996, 197, 483-495.	1.1	2
175	Study of the propagation centre in the anionic polymerization of (meth)acrylic monomers, 7. Study of the interaction of the living dimer with lithium tert-butoxide in tetrahydrofuran. Macromolecular Chemistry and Physics, 1996, 197, 1889-1907.	1.1	13
176	Study of the propagation centre in the anionic polymerization of (meth)acrylic monomers, 5. Nuclear magnetic resonance study of the model dimer in tetrahydrofuran. Macromolecular Chemistry and Physics, 1995, 196, 3005-3014.	1.1	14
177	Study of the propagation centre in the anionic polymerization of (meth)acrylic monomers, 4 NMR and quantum chemical study of the initiation systems containing tert-butyl 2-lithioisobutyrate and lithium tert-butoxide or lithium 3-methylpentan-3-olate. Macromolecular Chemistry and Physics, 1995, 196, 3117-3132.	1.1	14
178	Cis-trans isomerism and conformational structure of N-methyldodecanelactam as studied by NMR, IR and Raman spectroscopy and by theoretical calculations. Journal of Molecular Structure, 1995, 350, 9-18.	1.8	3
179	Vibrational and n.m.r. study of poly(N-methyllaurolactam) and of poly(N-methyllaurolactam)-poly(4-vinylphenol) blends. Polymer, 1995, 36, 4011-4021.	1.8	14
180	Blends of poly(ethylene oxide)/poly(methyl methacrylate). An i.r. and n.m.r. study. Polymer, 1995, 36, 1147-1155.	1.8	55

#	Article	IF	Citations
181	Influence of silane addition on the electrorheological behavior of calcium carbonate-polypropylene oil suspensions. Langmuir, 1995, 11, 3601-3602.	1.6	2
182	Structure and interactions in homopolymers and blends as studied by the methods of vibrational and nmr spectroscopy. Macromolecular Symposia, 1995, 94, 19-31.	0.4	1
183	Study of the Growth Centres of the Anionic Polymerization of (Meth)acrylates. VI. MO LCAO SCF Study of the Model Dimer, Its Solvation and Aggregation States. Collection of Czechoslovak Chemical Communications, 1995, 60, 1609-1620.	1.0	6
184	Conformational Structure of N-Methyl-8-octanelactam and Poly(N-methyl-8-octanelactam) as Studied by NMR, Infrared and Raman Spectroscopy and by Theoretical Calculations. Collection of Czechoslovak Chemical Communications, 1995, 60, 1798-1808.	1.0	0
185	Spectroscopic study of 1-decene oligomers obtained with AlCl3 as catalyst. Macromolecular Chemistry and Physics, 1994, 195, 2747-2758.	1.1	6
186	Study of the propagation centre in the anionic polymerization of acrylic monomers, 1. Spectroscopic study of methyl 2-lithioisobutyrate, an initiator for the anionic polymerization of acrylic monomers. Macromolecular Chemistry and Physics, 1994, 195, 3039-3056.	1.1	24
187	MNDO and ab initio Calculations of Methyl 2-Lithioisobutyrate and Its Solvates and Aggregates. Collection of Czechoslovak Chemical Communications, 1994, 59, 1699-1708.	1.0	21
188	Title is missing!. Die Makromolekulare Chemie, 1993, 194, 1757-1763.	1.1	10
189	Molecular Structure of a Cyclic Dimeric Model of Poly(6-hexanelactam). Collection of Czechoslovak Chemical Communications, 1993, 58, 2403-2414.	1.0	4
190	Characterization of the conformational structure of t-butyl acrylate oligomers and polymers by infrared and NMR spectroscopy and computational methods. European Polymer Journal, 1992, 28, 1331-1338.	2.6	2
191	Title is missing!. Die Makromolekulare Chemie, 1992, 193, 101-112.	1.1	54
192	Normal coordinate analysis of infrared and Raman spectra of syndiotactic poly(methyl methacrylate). Collection of Czechoslovak Chemical Communications, 1991, 56, 1653-1661.	1.0	6
193	Conformational structure of bisphenol A polycarbonate studied by infra-red spectroscopy. Polymer, 1991, 32, 1862-1866.	1.8	36
194	Normal-mode analysis of infrared and Raman spectra of crystalline isotactic poly(methyl) Tj ETQq0 0 0 rgBT /Overlock 10 Tf 50 222 Td (r	2.2	71
195	Title is missing!. Die Makromolekulare Chemie, 1988, 189, 2099-2105.	1.1	9
196	Dipole derivatives and infrared intensities of the ester group. An ab initio and force field study of methyl acetate. Journal of Molecular Structure, 1988, 189, 383-392.	1.8	26
197	Cî—»O stretch mode splitting in the formic acid dimer: Electrostatic models of the intermonomer interaction. Journal of Molecular Structure, 1987, 159, 183-194.	1.8	26
198	Ordered structures of syndiotactic poly(methyl methacrylates) studied by a combination of infrared, Raman, and NMR spectroscopy.. Journal of Polymer Science, Part B: Polymer Physics, 1986, 24, 657-674.	2.4	44

#	Article	IF	Citations
199	The UV-VIS spectroscopic study of the interaction between WCl6 and esters of carboxylic acids. Reaction Kinetics and Catalysis Letters, 1986, 30, 17-22.	0.6	4
200	Raman spectroscopic study of the intermolecular coupling of Cî—»O stretching vibrations in liquid methyl acetate and acetone. Spectrochimica Acta Part A: Molecular Spectroscopy, 1985, 41, 691-695.	0.1	21
201	Motional restrictions and chain conformation in various swollen crosslinked polystyrene gels from 1H n.m.r. line-shape analysis. Polymer, 1985, 26, 253-258.	1.8	24
202	Study of ordered structures of syndiotactic poly(methyl methacrylate) in solution and in the solid state. Journal of Polymer Science, Polymer Physics Edition, 1984, 22, 617-635.	1.0	39
203	Study of the effect of aggregation on the structure of syndiotactic poly(methyl methacrylate) by infrared spectra of its deuterated analogues. Collection of Czechoslovak Chemical Communications, 1984, 49, 2259-2268.	1.0	6
204	Solvent induced crystallization of syndiotactic poly(methyl methacrylate) relation to the formation of polymer aggregates in solution. Polymer Bulletin, 1983, 9, 495-501.	1.7	15
205	Vibrational spectra and structure of stereoregular poly(methyl methacrylates) and of the stereocomplex. Polymer, 1983, 24, 971-980.	1.8	71
206	Raman and infrared spectra and the structure of the dimethyl ester of 2,2,4,4-tetramethylglutaric acid. Collection of Czechoslovak Chemical Communications, 1983, 48, 2072-2078.	1.0	9
207	C=O Stretching vibrations in Raman and infrared spectra of simple esters. Collection of Czechoslovak Chemical Communications, 1982, 47, 2027-2036.	1.0	11
208	NMR study of cis3Ì„trans isomerism in N-methylated lactams with 11- and 13-membered rings. Journal of Molecular Structure, 1980, 66, 301-308.	1.8	5
209	NMR and Raman spectroscopic study of complex formation between 2-methyl-2-azabicyclo-[2,2,2] -octa-3-one and TiCl4. Journal of Molecular Structure, 1980, 68, 119-136.	1.8	4
210	Polyhedral oligomeric silsesquioxane (POSS)-based epoxy nanocomposite involving a reversible Dielsâ€“Alder-type network as a self-healing material. Journal of Adhesion Science and Technology, 0, , 1-22.	1.4	3