Antje Potthast

List of Publications by Citations

348 papers	7,727 citations	45 h-index	71 g-index
375 ext. papers	9,038 ext. citations	5.3 avg, IF	6.1 L-index

#	Paper	IF	Citations
348	The chemistry of side reactions and byproduct formation in the system NMMO/cellulose (Lyocell process). *Progress in Polymer Science*, **2001**, 26, 1763-1837	29.6	367
347	Bacterial cellulose as a material for wound treatment: Properties and modifications. A review. *Biotechnology Advances*, **2015**, 33, 1547-71	17.8	247
346	Side reaction of cellulose with common 1-alkyl-3-methylimidazolium-based ionic liquids. *Tetrahedron Letters*, **2008**, 49, 7322-7324	2	202
345	Periodate oxidation of polysaccharides for modification of chemical and physical properties. *Carbohydrate Research*, **2010**, 345, 1264-71	2.9	196
344	Effects of ball milling on the structure of cotton cellulose. *Cellulose*, **2019**, 26, 305-328	5.5	162
343	Aerogels from unaltered bacterial cellulose: application of scCO2 drying for the preparation of shaped, ultra-lightweight cellulosic aerogels. *Macromolecular Bioscience*, **2010**, 10, 349-52	5.5	148
342	A novel method for the determination of carbonyl groups in cellulosics by fluorescence labeling. 1. Method development. *Biomacromolecules*, **2002**, 3, 959-68	6.9	145
341	Cellulose solutions in N-methylmorpholine-N-oxide (NMMO) degradation processes and stabilizers. *Cellulose*, **2002**, 9, 283-291	5.5	138
340	A novel method for the determination of carbonyl groups in cellulosics by fluorescence labeling. 2. Validation and applications. *Biomacromolecules*, **2002**, 3, 969-75	6.9	122
339	A novel method for the determination of carbonyl groups in cellulosics by fluorescence labeling. 3. Monitoring oxidative processes. *Biomacromolecules*, **2003**, 4, 743-9	6.9	116
338	The cellulose solvent system N,N-dimethylacetamide/lithium chloride revisited: the effect of water on physicochemical properties and chemical stability. *Cellulose*, **2002**, 9, 41-53	5.5	113
337	Selective Enzymic Oxidation of Aromatic Methyl Groups to Aldehydes. *Journal of Organic Chemistry*, **1995**, 60, 4320-4321	4.2	111
336	A novel method for conversion of benzyl alcohols to benzaldehydes by laccase-catalysed oxidation. *Journal of Molecular Catalysis A*, **1996**, 108, 5-9		93
335	Degradation of cellulosic materials by heating in DMAc/LiCl. *Tetrahedron Letters*, **2002**, 43, 7757-7759	2	89
334	Comparison testing of methods for gel permeation chromatography of cellulose: coming closer to a standard protocol. *Cellulose*, **2015**, 22, 1591-1613	5.5	83
333	Degradation and Crystallization of Cellulose in Hydrogen Chloride Vapor for High-Yield Isolation of Cellulose Nanocrystals. *Angewandte Chemie - International Edition*, **2016**, 55, 14455-14458	16.4	83
332	Cellulose aerogels: Highly porous, ultra-lightweight materials. *Holzforschung*, **2008**, 62, 129-135	2	83

331	Studies on oxidative modifications of cellulose in the periodate system: Molecular weight distribution and carbonyl group profiles. *Holzforschung*, **2007**, 61, 662-667	2	81
330	Steam explosion pretreatment for enhancing biogas production of late harvested hay. *Bioresource Technology*, **2014**, 166, 403-10	11	80
329	The FDAM method: determination of carboxyl profiles in cellulosic materials by combining group-selective fluorescence labeling with GPC. *Biomacromolecules*, **2006**, 7, 1743-50	6.9	77
328	Overview of Methods for the Direct Molar Mass Determination of Cellulose. *Molecules*, **2015**, 20, 10313-418	4.8	68
327	On the conformation of the cellulose solvent N-methylmorpholine-N-oxide (NMMO) in solution. *Polymer*, **2003**, 44, 6153-6158	3.9	68
326	Analysis of Oxidized Functionalities in Cellulose **2006**, 1-48		67
325	Biogas production from reed biomass: Effect of pretreatment using different steam explosion conditions. *Biomass and Bioenergy*, **2016**, 95, 84-91	5.3	61
324	Sorption properties of TEMPO-oxidized natural and man-made cellulose fibers. *Carbohydrate Polymers*, **2009**, 77, 791-798	10.3	59
323	Loading of Bacterial Cellulose Aerogels with Bioactive Compounds by Antisolvent Precipitation with Supercritical Carbon Dioxide. *Macromolecular Symposia*, **2010**, 294, 64-74	0.8	58
322	Transparent, Flexible, and Strong 2,3-Dialdehyde Cellulose Films with High Oxygen Barrier Properties. *Biomacromolecules*, **2018**, 19, 2969-2978	6.9	58
321	Effects of periodate oxidation on cellulose polymorphs. *Cellulose*, **2015**, 22, 2245-2261	5.5	57
320	Hydrolytic processes and condensation reactions in the cellulose solvent system N,N-dimethylacetamide/lithium chloride. Part 2: degradation of cellulose. *Polymer*, **2003**, 44, 7-17	3.9	57
319	Corn stover for biogas production: Effect of steam explosion pretreatment on the gas yields and on the biodegradation kinetics of the primary structural compounds. *Bioresource Technology*, **2017**, 244, 949-956	11	56
318	Electron Beam Irradiation of Cellulosic Materials-Opportunities and Limitations. *Materials*, **2013**, 6, 1584-1598	3.5	54
317	Cellulosic aerogels as ultra-lightweight materials. Part 2: Synthesis and properties 2nd ICC 2007, Tokyo, Japan, October 25–29, 2007. *Holzforschung*, **2009**, 63,	2	54
316	Iron gall ink-induced corrosion of cellulose: aging, degradation and stabilization. Part 1: model paper studies. *Cellulose*, **2008**, 15, 849-859	5.5	53
315	Synthesis and Characterization of Periodate-Oxidized Polysaccharides: Dialdehyde Xylan (DAX). *Biomacromolecules*, **2016**, 17, 2972-80	6.9	52
314	Changes in the intra- and inter-fibrillar structure of lyocell (TENCEL®) fibers caused by NaOH treatment. *Cellulose*, **2009**, 16, 37-52	5.5	51

313	Dissolution behavior of different celluloses. *Biomacromolecules*, **2011**, 12, 871-9	6.9	50
312	Oxidative modifications of cellulose in the periodate system Reduction and beta-elimination reactions 2nd ICC 2007, Tokyo, Japan, October 25 29, 2007. *Holzforschung*, **2009**, 63,	2	50
311	Autocatalytic Decomposition of N-Methylmorpholine N-Oxide Induced by Mannich Intermediates. *Journal of Organic Chemistry*, **1999**, 64, 2166-2167	4.2	49
310	Characterization of technical lignins by NMR spectroscopy: optimization of functional group analysis by 31P NMR spectroscopy. *Holzforschung*, **2015**, 69, 807-814	2	48
309	Isolation and identification of residual chromophores in cellulosic materials. *Polymer*, **2004**, 45, 6437-6443	3.9	48
308	Thermal aging of 1-alkyl-3-methylimidazolium ionic liquids and its effect on dissolved cellulose. *Holzforschung*, **2010**, 64,	2	47
307	The investigation of the influence of water and temperature on the LiCl/DMAc/cellulose system. *Physical Chemistry Chemical Physics*, **2003**, 5, 1842-1847	3.6	46
306	On the Nature of Carbonyl Groups in Cellulosic Pulps. *Cellulose*, **2005**, 12, 43-50	5.5	46
305	Discoloration of cellulose solutions in N-methylmorpholine-N-oxide (Lyocell). Part 2: Isolation and identification of chromophores. *Cellulose*, **2005**, 12, 197-208	5.5	46
304	Lignocellulose Nanofiber-Reinforced Polystyrene Produced from Composite Microspheres Obtained in Suspension Polymerization Shows Superior Mechanical Performance. *ACS Applied Materials & Interfaces*, **2016**, 8, 13520-5	9.5	46
303	Oxidation of oat glucan in aqueous solutions during processing. *Carbohydrate Polymers*, **2012**, 87, 589-597	7.3	45
302	A general, selective, high-yield N-demethylation procedure for tertiary amines by solid reagents in a convenient column chromatography-like setup. *Organic Letters*, **2004**, 6, 541-4	6.2	45
301	Chemical Pulping Processe: Sections 4.1 4.2.5109-229		44
300	Getting Closer to Absolute Molar Masses of Technical Lignins. *ChemSusChem*, **2018**, 11, 3259-3268	8.3	43
299	Silica modified cellulosic aerogels. *Cellulose*, **2011**, 18, 143-149	5.5	43
298	Chromophores in cellulosics, VI. First isolation and identification of residual chromophores from aged cotton linters. *Cellulose*, **2011**, 18, 1623-1633	5.5	43
297	Compatibility of Kraft Lignin, Organosolv Lignin and Lignosulfonate With PLA in 3D Printing. *Journal of Wood Chemistry and Technology*, **2019**, 39, 14-30	2	42
296	Isolation and identification of residual chromophores from aged bleached pulp samples. *Holzforschung*, **2007**, 61, 656-661	2	41

295	Irradiation of cellulosic pulps: understanding its impact on cellulose oxidation. *Biomacromolecules*, **2012**, 13, 4171-8	6.9	40
294	Evaluation of different derivatisation approaches for gas chromatographic-mass spectrometric analysis of carbohydrates in complex matrices of biological and synthetic origin. *Journal of Chromatography A*, **2013**, 1281, 115-26	4.5	39
293	Iron gall ink-induced corrosion of cellulose: aging, degradation and stabilization. Part 2: application on historic sample material. *Cellulose*, **2008**, 15, 861-870	5.5	39
292	Regeneration of Aqueous Periodate Solutions by Ozone Treatment: A Sustainable Approach for Dialdehyde Cellulose Production. *ChemSusChem*, **2016**, 9, 825-33	8.3	37
291	Chromophores in lignin-free cellulosic materials belong to three compound classes. Chromophores in cellulosics, XII. *Cellulose*, **2015**, 22, 1053-1062	5.5	35
290	Upgrading of paper grade pulps to dissolving pulps by nitren extraction: yields, molecular and supramolecular structures of nitren extracted pulps. *Cellulose*, **2008**, 15, 739-750	5.5	35
289	Fast track for quantitative isolation of lignosulfonates from spent sulfite liquors. *RSC Advances*, **2015**, 5, 92732-92742	3.7	34
288	Stabilization and first direct spectroscopic evidence of the o-quinone methide derived from vitamin E. *Organic Letters*, **2002**, 4, 4285-8	6.2	34
287	Fabrication of bacterial cellulose-based wound dressings with improved performance by impregnation with alginate. *Materials Science and Engineering C*, **2020**, 110, 110619	8.3	34
286	Properties of Cellulosic Material after Cationization in Different Solvents. *ACS Sustainable Chemistry and Engineering*, **2016**, 4, 2295-2301	8.3	33
285	Formation of carbonyl groups on cellulose during ozone treatment of pulp: consequences for pulp bleaching. *Carbohydrate Polymers*, **2014**, 109, 85-91	10.3	33
284	Superbase ionic liquids for effective cellulose processing from dissolution to carbonisation. *Green Chemistry*, **2017**, 19, 5949-5957	10	33
283	Investigation on metastable solution of cellulose dissolved in NaOH/urea aqueous system at low temperature. *Journal of Physical Chemistry B*, **2011**, 115, 12801-8	3.4	33
282	Drying of a cellulose II gel: effect of physical modification and redispersibility in water. *Cellulose*, **2017**, 24, 1199-1209	5.5	32
281	Soaking of pine wood chips with ionic liquids for reduced energy input during grinding. *Green Chemistry*, **2012**, 14, 1079	10	32
280	AKD-Modification of bacterial cellulose aerogels in supercritical CO2. *Cellulose*, **2012**, 19, 1337-1349	5.5	32
279	Ethoximation-silylation approach for mono- and disaccharide analysis and characterization of their identification parameters by GC/MS. *Talanta*, **2013**, 115, 642-51	6.2	31
278	Yellowing and brightness reversion of celluloses: CO or COOH, who is the culprit?. *Cellulose*, **2019**, 26, 429-444	5.5	31

277	New Opportunities in the Valorization of Technical Lignins. *ChemSusChem*, **2021**, 14, 1016-1036	8.3	31
276	Spruce milled wood lignin: linear, branched or cross-linked?. *Green Chemistry*, **2020**, 22, 3985-4001	10	30
275	Synthesis of redispersible spherical cellulose II nanoparticles decorated with carboxylate groups. *Green Chemistry*, **2016**, 18, 1465-1468	10	30
274	Controlled precipitation and purification of hemicellulose from DMSO and DMSO/water mixtures by carbon dioxide as anti-solvent. *Journal of Supercritical Fluids*, **2010**, 53, 121-130	4.2	30
273	The Reaction of Phenolic Model Compounds in the Laccase-Mediator System (LMS) Investigations by Matrix Assisted Laser Desorption Ionization Time-of-Flight Mass Spectrometry (MALDI-TOF-MS). *Holzforschung*, **1999**, 53, 175-180	2	30
272	Nanostructured Cellulose II Gel Consisting of Spherical Particles. *ACS Sustainable Chemistry and Engineering*, **2016**, 4, 4424-4432	8.3	29
271	Cellulose degradation in alkaline media upon acidic pretreatment and stabilisation. *Carbohydrate Polymers*, **2014**, 100, 185-94	10.3	29
270	Surface properties and porosity of highly porous, nanostructured cellulose II particles. *Cellulose*, **2017**, 24, 435-440	5.5	28
269	Silane meets click chemistry: towards the functionalization of wet bacterial cellulose sheets. *ChemSusChem*, **2015**, 8, 680-7	8.3	28
268	The effect of 1-ethyl-3-methylimidazolium acetate on the enzymatic degradation of cellulose. *Journal of Molecular Catalysis B: Enzymatic*, **2014**, 99, 121-129		26
267	Structural Investigations of N-modified Lignins by 15N-NMR Spectroscopy and Possible Pathways for Formation of Nitrogen Containing Compounds Related to Lignin. *Holzforschung*, **1996**, 50, 554-562	2	26
266	Aqueous Modification of Nano- and Microfibrillar Cellulose with a Click Synthon. *ChemSusChem*, **2016**, 9, 75-9	8.3	25
265	Insights into degradation pathways of oxidized anhydroglucose units in cellulose by β-alkoxy-elimination: a combined theoretical and experimental approach. *Cellulose*, **2018**, 25, 3797-3814	5.5	25
264	Fast Track to Molar-Mass Distributions of Technical Lignins. *ChemSusChem*, **2017**, 10, 629-635	8.3	25
263	Furan Endwise Peeling of Celluloses: Mechanistic Studies and Application Perspectives of a Novel Reaction. *European Journal of Organic Chemistry*, **2008**, 2008, 475-484	3.2	25
262	Cellulosic fines: Properties and effects. *Progress in Materials Science*, **2016**, 83, 574-594	42.2	25
261	The effect of a combined biological and thermo-mechanical pretreatment of wheat straw on energy yields in coupled ethanol and methane generation. *Bioresource Technology*, **2015**, 194, 7-13	11	24
260	Effect of sonochemical treatments on the integrity and oxidation state of cellulose. *Carbohydrate Polymers*, **2013**, 92, 921-7	10.3	24

259	Cationization of cellulose by using N-oxiranylmethyl-N-methylmorpholinium chloride and 2-oxiranylpyridine as etherification agents. *Journal of Applied Polymer Science*, **2009**, 114, 1449-1456	2.9	24
258	Alkaline degradation kinetics and CE-separation of cello- and xylooligomers. Part I. *Carbohydrate Research*, **2003**, 338, 1209-16	2.9	24
257	Chromophores in cellulosics, XI: isolation and identification of residual chromophores from bacterial cellulose. *Cellulose*, **2014**, 21, 2271-2283	5.5	23
256	Studies of the chemoenzymatic modification of cellulosic pulps by the laccase-TEMPO system. *Holzforschung*, **2011**, 65,	2	23
255	Cross-sectional analysis of the polysaccharide composition in cellulosic fiber materials by enzymatic peeling/high-performance capillary zone electrophoresis. *Biomacromolecules*, **2005**, 6, 3146-51	6.9	23
254	On the mechanism of the unwanted acetylation of polysaccharides by 1,3-dialkylimidazolium acetate ionic liquids: part 1 analysis, acetylating agent, influence of water, and mechanistic considerations. *Cellulose*, **2015**, 22, 3583-3596	5.5	22
253	Nano meets the sheet: adhesive-free application of nanocellulosic suspensions in paper conservation. *Heritage Science*, **2017**, 5,	2.5	22
252	Deterioration of ancient cellulose paper, Hanji: evaluation of paper permanence. *Cellulose*, **2014**, 21, 4621-4632	5.5	22
251	A fast track for the accurate determination of methoxyl and ethoxyl groups in lignin. *RSC Advances*, **2017**, 7, 22974-22982	3.7	21
250	Determination of molar mass distributions of highly oxidized dialdehyde cellulose by size exclusion chromatography and asymmetric flow field-flow fractionation. *Cellulose*, **2015**, 22, 3569-3581	5.5	21
249	Self-Standing Nanocellulose Janus-Type Films with Aldehyde and Carboxyl Functionalities. *Biomacromolecules*, **2018**, 19, 973-979	6.9	21
248	A General Aqueous Silanization Protocol to Introduce Vinyl, Mercapto or Azido Functionalities onto Cellulose Fibers and Nanocelluloses. *Molecules*, **2018**, 23,	4.8	21
247	Bacterial Cellulose Aerogels: From Lightweight Dietary Food to Functional Materials. *ACS Symposium Series*, **2012**, 57-74	0.4	21
246	Formation and ecotoxicity of N-heterocyclic compounds on ammoxidation of mono- and polysaccharides. *Journal of Agricultural and Food Chemistry*, **2013**, 61, 9004-14	5.7	20
245	The influence of alkaline reserve on the aging behavior of book papers. *Cellulose*, **2013**, 20, 1989-2001	5.5	20
244	Nano-cellulosic materials: the impact of water on their dissolution in DMAc/LiCl. *Carbohydrate Polymers*, **2013**, 98, 1565-72	10.3	20
243	Polymorphism in the crystal structure of the cellulose fragment analogue methyl 4-O-methyl-beta-D-glucopyranosyl-(1-4)-beta-D-glucopyranoside. *Angewandte Chemie - International Edition*, **2002**, 41, 4277-81	16.4	20
242	Discoloration of cellulose solutions in N-methylmorpholine-N-oxide (Lyocell). Part 1: Studies on model compounds and pulps. *Cellulose*, **2005**, 12, 51-57	5.5	20

241	Instabilities in the System NMMO/Water/Cellulose (Lyocell Process) Caused by Polonowski Type Reactions. *Holzforschung*, **2002**, 56, 199-208	2	20
240	Molar mass-dependent profiles of functional groups and carbohydrates in kraft lignin. *Journal of Wood Chemistry and Technology*, **2017**, 37, 171-183	2	19
239	Finally Dissolved! Activation Procedures to Dissolve Cellulose in DMAc/LiCl Prior to Size Exclusion Chromatography Analysis – A Review. *Current Chromatography*, **2014**, 1, 52-68	0.4	19
238	Studies on DMSO-containing carbanilation mixtures: chemistry, oxidations and cellulose integrity. *Cellulose*, **2007**, 14, 497-511	5.5	19
237	Calixarene-type macrocycles by oxidation of phenols related to vitamin E. *Angewandte Chemie - International Edition*, **2002**, 41, 1171-3	16.4	19
236	Discoloration of cellulose solutions in N-methylmorpholine-N-oxide (Lyocell). Part 1: Studies on model compounds and pulps. *Cellulose*, **2005**, 12, 51-57	5.5	19
235	Synthesis and oxidation behavior of 2,4,5,7,8-pentamethyl-4H-1,3-benzodioxin-6-ol, a multifunctional oxatocopherol-type antioxidant. *Journal of Organic Chemistry*, **2002**, 67, 3607-14	4.2	19
234	A SOLVENT-FREE AND FORMALIN-FREE ESCHWEILER-CLARKE METHYLATION FOR AMINES. *Synthetic Communications*, **2002**, 32, 457-466	1.7	19
233	Laccase-catalyzed oxidation of 1-(3,4-dimethoxyphenyl)-1-propene using ABTS as mediator. *Journal of Molecular Catalysis B: Enzymatic*, **2000**, 8, 213-219		19
232	Wet esterification of never-dried cellulose: a simple process to surface-acetylated cellulose nanofibers. *Green Chemistry*, **2020**, 22, 5605-5609	10	19
231	Chromophores from hexeneuronic acids: identification of HexA-derived chromophores. *Cellulose*, **2017**, 24, 3671-3687	5.5	18
230	Reactivity of dissolving pulps modified by TEMPO-mediated oxidation. *Cellulose*, **2012**, 19, 1125-1134	5.5	18
229	Ionic liquids as media for biomass processing: opportunities and restrictions. *Holzforschung*, **2011**, 65,	2	18
228	Synthesis of oxidized methyl 4-O-methyl-beta-D-glucopyranoside and methyl beta-D-glucopyranosyl-(1-->4)-beta-D-glucopyranoside derivatives as substrates for fluorescence labeling reactions. *Carbohydrate Research*, **2002**, 337, 691-700	2.9	18
227	The effect of water on cellulose solutions in DMAc/LiCl. *Macromolecular Symposia*, **2002**, 190, 151-160	0.8	18
226	Soft cellulose II nanospheres: sol-gel behaviour, swelling and material synthesis. *Nanoscale*, **2019**, 11, 17773-17781	7.7	17
225	Crystal and molecular structure of methyl 4-O-methyl-beta-D-glucopyranosyl-(1-->4)-beta-D-glucopyranoside. *Carbohydrate Research*, **2002**, 337, 161-6	2.9	17
224	Non-woven fabrics of fine regenerated cellulose fibers prepared from ionic-liquid solution via wet type solution blow spinning. *Carbohydrate Polymers*, **2019**, 226, 115258	10.3	16

223	Synthesis, characterization and photo-bactericidal activity of silanized xanthene-modified bacterial cellulose membranes. *Cellulose*, **2015**, 22, 3291-3304	5.5	16
222	Preparation and analytical characterisation of pure fractions of cellooligosaccharides. *Journal of Chromatography A*, **2016**, 1431, 47-54	4.5	16
221	Effect of pretreatment on arabinoxylan distribution in wheat bran. *Carbohydrate Polymers*, **2015**, 121, 18-26	10.3	16
220	Is cellulose degradation due to β-elimination processes a threat in mass deacidification of library books?. *Cellulose*, **2012**, 19, 1149-1159	5.5	16
219	Confirmation of the Presence of Formaldehyde and N-(Methylene)morpholinium Cations as Reactive Species in the Cellulose/NMMO/Water System by Trapping Reactions. *Holzforschung*, **2000**, 54, 101-103	2	16
218	Deterioration of ancient Korean paper (Hanji), treated with beeswax: a mechanistic study. *Carbohydrate Polymers*, **2014**, 101, 1249-54	10.3	15
217	Dissolution of rayon fibers for size exclusion chromatography: a challenge. *Cellulose*, **2014**, 21, 3291-3301	5.5	15
216	Understanding the Impact of Supercritical Carbon Dioxide on the Delignification Mechanism During Organosolv Pulping: A Model Compound Study. *Journal of Wood Chemistry and Technology*, **2012**, 32, 225-237	2	15
215	An evaluation of tritium and fluorescence labelling combined with multi-detector SEC for the detection of carbonyl groups in polysaccharides. *Carbohydrate Polymers*, **2009**, 76, 196-205	10.3	15
214	A fluorescence labeling approach to assess the deterioration state of aged papers. *Cellulose*, **2006**, 13, 421-428	5.5	15
213	Studies on the carbenium-iminium ions derived from N-methylmorpholine-N-oxide (NMMO). *Tetrahedron*, **2004**, 60, 301-306	2.4	15
212	Isolation and Identification of Residual Chromophores in Cellulosic Materials. *Macromolecular Symposia*, **2005**, 223, 239-252	0.8	15
211	Synthesis and Testing of a Novel Fluorescence Label for Carbonyls in Carbohydrates and Cellulosics. *Synlett*, **2001**, 2001, 0682-0684	2.2	15
210	Aging of paper - Ultra-fast quantification of 2,5-dihydroxyacetophenone, as a key chromophore in cellulosics, by reactive paper spray-mass spectrometry. *Talanta*, **2017**, 167, 672-680	6.2	14
209	On the mechanism of the unwanted acetylation of polysaccharides by 1,3-dialkylimidazolium acetate ionic liquids: part 2. The impact of lignin on the kinetics of cellulose acetylation. *Cellulose*, **2017**, 24, 2767-2774	5.5	14
208	Molecular weight distribution and functional group profiles of TEMPO-oxidized lyocell fibers. *Carbohydrate Polymers*, **2013**, 98, 444-50	10.3	14
207	Potential of different Sorghum bicolor (L. moench) varieties for combined ethanol and biogas production in the Pannonian climate of Austria. *Energy*, **2013**, 55, 107-113	7.9	14
206	Wash-dry cycle induced changes in low-ordered parts of regenerated cellulosic fibers. *Journal of Applied Polymer Science*, **2012**, 126, E397-E408	2.9	14

205	Non-destructive determination of cellulose functional groups and molecular weight in pulp hand sheets and historic papers by NIR-PLS-R. *Carbohydrate Polymers*, **2009**, 76, 374-380	10.3	14
204	Precipitation of Hemicelluloses from DMSO/Water Mixtures Using Carbon Dioxide as an Antisolvent. *Journal of Nanomaterials*, **2008**, 2008, 1-5	3.2	14
203	Thermal Reactions of N-Methyl-morpholine-N-oxide (NMMO): A General Method for Separation and Quantification of N-Methyl-morpholine-N-oxide and its Main Degradation Products N-Methylmorpholine and Morpholine by Capillary Electrophoresis (CE). *Holzforschung*, **2000**, 54, 641-646	2	14
202	Unique reactivity of nanoporous cellulosic materials mediated by surface-confined water. *Nature Communications*, **2021**, 12, 2513	17.4	14
201	Knoevenagel Condensation for Modifying the Reducing End Groups of Cellulose Nanocrystals. *ACS Macro Letters*, **2019**, 8, 1642-1647	6.6	14
200	Ball Milling's Effect on Pine Milled Wood Lignin's Structure and Molar Mass. *Molecules*, **2018**, 23,	4.8	14
199	Mechanochemical reactions of cellulose and styrene. *Cellulose*, **2015**, 22, 3217-3224	5.5	13
198	Understanding laccase/HBT-catalyzed grass delignification at the molecular level. *Green Chemistry*, **2020**, 22, 1735-1746	10	13
197	Electrically Conducting Carbon Microparticles by Direct Carbonization of Spent Wood Pulping Liquor. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 3385-3391	8.3	13
196	Synthesis of the perdeuterated cellulose solvents 1-ethyl-3-methylimidazolium acetate (EMIM-OAc-d14) and 1-butyl-3-methylimidazolium acetate (BMIM-OAc-d18) and of 2-13C-butyl-3-methylimidazolium acetate. *Journal of Labelled Compounds and Radiopharmaceuticals* , **2009**, 52, 223-226	1.9	13
195	Shaped hemocompatible aerogels from cellulose phosphates: preparation and properties. *Holzforschung*, **2012**, 66,	2	13
194	Effect of UV radiation on the carbonyl distribution in different pulps. *Holzforschung*, **2004**, 58, 597-602	2	13
193	Radicals derived from N-methylmorpholine-N-oxide (NMMO): structure, trapping and recombination reactions. *Tetrahedron*, **2002**, 58, 3073-3078	2.4	13
192	Stabilization of cellulose solutions in N-methylmorpholine-N-oxide (Lyocell dopes) by addition of an N-oxide as sacrificial substrate. *Holzforschung*, **2005**, 59, 503-506	2	13
191	A precise study on effects that trigger alkaline hemicellulose extraction efficiency. *Bioresource Technology*, **2016**, 214, 460-467	11	13
190	Phytochemical and biological activities of Silene viridiflora extractives. Development and validation of a HPTLC method for quantification of 20-hydroxyecdysone. *Industrial Crops and Products*, **2019**, 129, 542-548	5.9	13
189	Deacidification of Acidic Books and Paper by Means of Non-aqueous Dispersions of Alkaline Particles: A Review Focusing on Completeness of the Reaction. *BioResources*, **2017**, 12,	1.3	12
188	Sulfonic Acid Group Determination in Lignosulfonates by Headspace Gas Chromatography. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 6240-6246	8.3	12

187	Detection of Cellulose-Derived Chromophores by Ambient Ionization-MS. *Analytical Chemistry*, **2016**, 88, 1253-8	7.8	12
186	Investigation of the stabilization of verdigris-containing rag paper by wet chemical treatments. *Heritage Science*, **2014**, 2, 12	2.5	12
185	Accurate analysis of formose reaction products by LC-UV: an analytical challenge. *Journal of Chromatographic Science*, **2014**, 52, 169-75	1.4	12
184	The impact of esterification reactions on physical properties of cellulose thin films. *Soft Matter*, **2010**, 6, 3680	3.6	12
183	Ultralight-Weight Cellulose Aerogels from NBnMO-Stabilized Lyocell Dopes. *Research Letters in Materials Science*, **2007**, 2007, 1-4		12
182	Pulp Bleaching: Sections 7.17.3.5609-708		12
181	Trapping of Reactive Intermediates to Study Reaction Mechanisms in Cellulose Chemistry **2006**, 153-197		12
180	Hydroxymethylfurfural and its Derivatives: Potential Key Reactants in Adhesives. *ChemSusChem*, **2020**, 13, 5408-5422	8.3	12
179	Evaluation of supercritical CO2 dried cellulose aerogels as nano-biomaterials. *Journal of the Korean Physical Society*, **2017**, 71, 483-486	0.6	11
178	Oxidation and structural changes in NMMO-regenerated cellulose films. *Cellulose*, **2016**, 23, 3535-3541	5.5	11
177	Critical evaluation of approaches toward mass deacidification of paper by dispersed particles. *Cellulose*, **2017**, 24, 323-332	5.5	11
176	Effects of tribochemical treatments on the integrity of cellulose. *Carbohydrate Polymers*, **2014**, 111, 688-89	5.3	11
175	Effects of selected key chromophores on cellulose integrity upon bleaching 10th EWLP, Stockholm, Sweden, August 2528, 2008. *Holzforschung*, **2009**, 63,	2	11
174	Solid-state NMR studies of methyl celluloses. Part 1: regioselectively substituted celluloses as standards for establishing an NMR data basis. *Cellulose*, **2009**, 16, 129-137	5.5	11
173	Bleaching Revisited: Impact of Oxidative and Reductive Bleaching Treatments on Cellulose and Paper. *Restaurator*, **2009**, 30,	0	11
172	High performance cellulose fibers regenerated from 1-butyl-3-methylimidazolium chloride solution: Effects of viscosity and molecular weight. *Journal of Applied Polymer Science*, **2020**, 137, 48681	2.9	11
171	Thermal stability of cellulose insulation in electrical power transformers - A review. *Carbohydrate Polymers*, **2021**, 252, 117196	10.3	11
170	Enzymatic pulp upgrade for producing high-value cellulose out of a Kraft paper pulp. *Enzyme and Microbial Technology*, **2017**, 102, 67-73	3.8	10

169	A comparison of methods to quantify cationization of cellulosic pulps. *Journal of Wood Chemistry and Technology*, **2017**, 37, 136-147	2	10
168	Improving molar mass analysis of cellulose samples with limited solubility. *Carbohydrate Polymers*, **2017**, 178, 302-310	10.3	10
167	calibration - Making optimal use of time and space in quantitative high performance thin layer chromatography. *Journal of Chromatography A*, **2018**, 1533, 193-198	4.5	10
166	The museum in a test tube Adding a third dimension to the evaluation of the impact of volatile organic acids on paper. *Polymer Degradation and Stability*, **2016**, 130, 109-117	4.7	10
165	Determination of carbohydrate- and lignin-derived components in complex effluents from cellulose processing by capillary electrophoresis with electrospray ionization-mass spectrometric detection. *Journal of Chromatography A*, **2011**, 1218, 8561-6	4.5	10
164	Side Reactions in the System Cellulose/1-Alkyl-3-methyl-imidazolium Ionic Liquid. *ACS Symposium Series*, **2010**, 149-164	0.4	10
163	A novel, mild and selective methylation of carboxyl groups in cellulosic pulps 10th EWLP, Stockholm, Sweden, August 25 28, 2008. *Holzforschung*, **2009**, 63,	2	10
162	A general approach to cellulosic material with controlled slow release of active substances by derivatization of a cellulosic carrier matrix with trifunctional triazines. *Cellulose*, **2009**, 16, 929-942	5.5	10
161	Novel paper sizing agents from renewables. Part 1: Preparation of a paper sizing agent derived from natural plant oils. *Holzforschung*, **2011**, 65, 3-11	2	10
160	Hydrolytic Processes and Condensation Reactions in the Cellulose Solvent System N,N-Dimethylacetamide/Lithium Chloride. Part 1.. *Holzforschung*, **2001**, 55, 661-666	2	10
159	On a novel chromanone-naphthalenetrione rearrangement related to vitamin E. *Organic Letters*, **2002**, 4, 1257-8	6.2	10
158	Deoxygenation of Amine Oxides by in situ-Generated Formic Pivalic Anhydride. *Synlett*, **1999**, 1999, 623-625	2.2	10
157	A Mild, Simple and General Procedure for the Oxidation of Benzyl Alcohols to Benzaldehydes. *Synthetic Communications*, **1996**, 26, 315-320	1.7	10
156	Lignosulfonate-based polyurethane materials via cyclic carbonates: preparation and characterization. *Holzforschung*, **2020**, 74, 203-211	2	10
155	Lignin-based foams as insulation materials: a review. *Holzforschung*, **2018**, 73, 117-130	2	10
154	Improved quantification of monosaccharides in complex lignocellulosic biomass matrices: A gas chromatography-mass spectrometry based approach. *Carbohydrate Research*, **2017**, 446-447, 7-12	2.9	9
153	Reaction pathways during oxidation of cereal glucans. *Carbohydrate Polymers*, **2017**, 157, 1769-1776	10.3	9
152	How Alkaline Solvents in Viscosity Measurements Affect Data for Oxidatively Damaged Celluloses: Cupri-Ethylenediamine. *Biomacromolecules*, **2019**, 20, 4117-4125	6.9	9

151	Analysis of degradation products in rayon spinning baths. *Holzforschung*, **2015**, 69, 695-702	2	9
150	Hydrophobic Interaction Chromatography in 2 D Liquid Chromatography Characterization of Lignosulfonates. *ChemSusChem*, **2020**, 13, 4595-4604	8.3	9
149	Chromophores from hexeneuronic acids (HexA): synthesis of model compounds and primary degradation intermediates. *Cellulose*, **2017**, 24, 3703-3723	5.5	9
148	Vegetable oils in textile finishing applications: the action mode of wrinkle-reduction sprays and means for analyzing their performance. *Textile Reseach Journal*, **2014**, 84, 449-460	1.7	9
147	Fluorescence labeling of gelatin and methylcellulose: monitoring their penetration behavior into paper. *Cellulose*, **2013**, 20, 919-931	5.5	9
146	Solid-state NMR studies of methyl celluloses. Part 2: Determination of degree of substitution and O-6 vs. O-2/O-3 substituent distribution in commercial methyl cellulose samples. *Cellulose*, **2009**, 16, 1159-1166	5.5	9
145	Cellulose Solubility: Dissolution and Analysis of "Problematic" Cellulose Pulps in the Solvent System DMAc/LiCl. *ACS Symposium Series*, **2010**, 165-177	0.4	9
144	Studies into the Early Degradation Stages of Cellulose by Different Iron Gall Ink Components. *Macromolecular Symposia*, **2008**, 262, 150-161	0.8	9
143	Studies into reactions of N-methylmorpholine-N-oxide (NMMO) and its hydrates with cyanuric chloride. *Tetrahedron*, **2002**, 58, 9809-9815	2.4	9
142	A fast method to measure the degree of oxidation of dialdehyde celluloses using multivariate calibration and infrared spectroscopy.. *Carbohydrate Polymers*, **2022**, 278, 118887	10.3	9
141	Infrared and Raman spectra of lignin substructures: Dibenzodioxocin. *Journal of Raman Spectroscopy*, **2020**, 51, 422-431	2.3	9
140	2D Assignment and quantitative analysis of cellulose and oxidized celluloses using solution-state NMR spectroscopy. *Cellulose*, **2020**, 27, 7929-7953	5.5	9
139	Dialdehyde Cellulose Nanofibers by Electrospinning as Polyvinyl Alcohol Blends: Manufacture and Product Characterization. *Journal of Wood Chemistry and Technology*, **2018**, 38, 96-110	2	9
138	How copper corrosion can be retarded--New ways investigating a chronic problem for cellulose in paper. *Carbohydrate Polymers*, **2015**, 134, 136-43	10.3	8
137	Structural Motifs of Wheat Straw Lignin Differ in Susceptibility to Degradation by the White-Rot Fungus. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 20032-20042	8.3	8
136	Brightness reversion of eucalyptus kraft pulp: Effect of carbonyl groups generated by hypochlorous acid oxidation. *Holzforschung*, **2011**, 65,	2	8
135	A Concise Synthesis of N-(Trideuteromethyl)morpholine-N-oxide Monohydrate. *Synlett*, **1999**, 1999, 1972-1974	2.1	8
134	2,4?:2?,4 Dianhydride of 3-keto-glucoside, a precursor to chromophores of aged, yellow cellulose, and its weak interactions. *Cellulose*, **2017**, 24, 1227-1234	5.5	7

133	The Fate of 4-O-Methyl Glucuronic Acid in Hardwood Xylan during Alkaline Extraction. *ACS Sustainable Chemistry and Engineering*, **2017**, 5, 1818-1823	8.3	7
132	Tailoring Pulp Cellulose with Electron Beam Irradiation: Effects of Lignin and Hemicellulose. *ACS Sustainable Chemistry and Engineering*, **2020**, 8, 7235-7243	8.3	7
131	A novel method to analyze the degree of acetylation in biopolymers. *Journal of Chromatography A*, **2014**, 1372C, 212-220	4.5	7
130	Novel paper sizing agents from renewables. Part 3: Emulsion stability and hydrolysis behavior compared to conventional sizes. *Holzforschung*, **2011**, 65, 21-27	2	7
129	Tools for Bark Biorefineries: Studies toward Improved Characterization of Lipophilic Lignocellulosic Extractives by Combining Supercritical Fluid and Gas Chromatography. *ACS Sustainable Chemistry and Engineering*, **2021**, 9, 1323-1332	8.3	7
128	Stabilization of Verdigris. *Journal of Paper Conservation*, **2016**, 17, 88-99	0	7
127	Molar Mass Characterization of Crude Lignosulfonates by Asymmetric Flow Field-Flow Fractionation. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 216-223	8.3	7
126	How alkaline solvents in viscosity measurements affect data for oxidatively damaged celluloses. Cuoxam and Cadoxen. *Carbohydrate Polymers*, **2020**, 240, 116251	10.3	7
125	Cellulose Nanofibrils: From Hydrogels to Aerogels **2018**, 277-339		7
124	Studies on the Conservation of Verdigris on Paper. *Restaurator*, **2015**, 36,	0	6
123	Synthesis of Methyl 4-O-methyl-β-D-ribo-hex-3-ulopyranoside-1-13C and Methyl 4-O-methyl-β-D-ribo-hex-3-ulopyranoside-3-13C as Fragment Analogues of Oxidized Cellulose Units. *Letters in Organic Chemistry*, **2010**, 7, 186-190	0.6	6
122	Determination of substituent distribution of viscoses by GPC. *Holzforschung*, **2006**, 60, 467-473	2	6
121	Copper Corrosion: Comparison between Naturally Aged Papers and Artificially Aged Model Papers. *Macromolecular Symposia*, **2006**, 244, 194-203	0.8	6
120	A novel approach to determination of carbonyl groups in DMAc/LiCl-insoluble pulps by fluorescence labeling. *Cellulose*, **2006**, 13, 429-435	5.5	6
119	A Novel Method for Analysis of Xanthate Group Distribution in Viscoses. *Macromolecular Symposia*, **2005**, 223, 189-200	0.8	6
118	Cellulosics modified with slow-release reagents. Part I. Synthesis of triazine-anchored reagents for slow release of active substances from cellulosic materials. *Polymer*, **2005**, 46, 1453-1458	3.9	6
117	Novel Tocopherol Compounds XI. Synthesis, Bromination and Oxidation Reactions of 3-(5-Tocopheryl)propionic Acid. *Synlett*, **1999**, 1999, 291-294	2.2	6
116	Flavonoids naringenin chalcone, naringenin, dihydrotricin, and tricin are lignin monomers in papyrus. *Plant Physiology*, **2021**,	6.6	6

115	Pitfalls in the chemistry of cellulosic key chromophores. *Cellulose*, **2019**, 26, 185-204	5.5	6
114	Toward a Better Understanding of Cellulose Swelling, Dissolution, and Regeneration on the Molecular Level **2018**, 99-125		6
113	A cautionary note on thermal runaway reactions in mixtures of 1-alkyl-3-methylimidazolium ionic liquids and N-methylmorpholine-N-oxide. *Cellulose*, **2017**, 24, 1927-1932	5.5	5
112	Uncommon fatty acids, Iridoids and other secondary metabolites from the medicinal plant species Ixora cibdela Craib (Rubiaceae). *Phytochemistry Letters*, **2019**, 33, 77-80	1.9	5
111	Changing the Molecular Structure of Kraft Lignins□Ozone Treatment at Alkaline Conditions. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 15163-15172	8.3	5
110	Quantification of Volatiles from Technical Lignins by Multiple Headspace Sampling-Solid-Phase Microextraction-Gas Chromatography-Mass Spectrometry. *ACS Sustainable Chemistry and Engineering*, **2019**, 7, 9896-9903	8.3	5
109	Colloidal features of softwood galactoglucomannans-rich extract. *Carbohydrate Polymers*, **2020**, 241, 116368	10.3	5
108	A matrix-resistant HPTLC method to quantify monosaccharides in wood-based lignocellulose biorefinery streams. *Holzforschung*, **2018**, 72, 645-652	2	5
107	Filling the gap: Calibration of the low molar-mass range of cellulose in size exclusion chromatography with cello-oligomers. *Journal of Chromatography A*, **2016**, 1471, 87-93	4.5	5
106	Ammoxidation of lignocellulosic materials: formation of nonheterocyclic nitrogenous compounds from monosaccharides. *Journal of Agricultural and Food Chemistry*, **2013**, 61, 9015-26	5.7	5
105	Chromophores from hexeneuronic acids: chemical behavior under peroxide bleaching conditions. *Cellulose*, **2017**, 24, 3689-3702	5.5	5
104	Comparing soluble Trametes pubescens laccase and cross-linked enzyme crystals (CLECs) for enzymatic modification of cellulose 10th EWLP, Stockholm, Sweden, August 25□28, 2008. *Holzforschung*, **2009**, 63,	2	5
103	Reducing the Risks of Hydrogen Peroxide Bleaching in Presence of Iron Ions in Paper. *Restaurator*, **2012**, 33,	0	5
102	Cellulosic Aerogels **2012**, 51-103		5
101	Alkaline degradation of model compounds related to beech xylan. *Holzforschung*, **2004**, 58, 588-596	2	5
100	Isolation, Synthesis and Derivatization of Xylodextrins. *Macromolecular Symposia*, **2005**, 232, 93-97	0.8	5
99	Nonaqueous solution deacidification treatments to prolong the storage life of acidic books: A review of mechanistic and process aspects. *BioResources*, **2018**, 13, 7096-7136	1.3	5
98	Stability of TEMPO-oxidized cotton fibers during natural aging. *Carbohydrate Polymers*, **2020**, 230, 115587	10.3	5

97	Lignin profiling in extracted xylans by size-exclusion chromatography. *Carbohydrate Polymers*, **2016**, 151, 821-826	10.3	5
96	High-performance Lignocellulosic Fibers Spun from Ionic Liquid Solution **2018**, 341-370		5
95	Porous lyocell powders as sound absorbers. *Cellulose*, **2019**, 26, 683-686	5.5	4
94	Preparation and Analysis of Cello- and Xylooligosaccharides. *Advances in Polymer Science*, **2015**, 53-92	1.3	4
93	Degradation of the cellulosic key chromophore 2,5-dihydroxy-[1,4]-benzoquinone (DHBQ) under conditions of chlorine dioxide pulp bleaching: formation of rhodizonate as secondary chromophore□ combined experimental and theoretical study. *Cellulose*, **2020**, 27, 3623-3649	5.5	4
92	Novel paper sizing agents based on renewables. Part 8: on the binding behavior of reactive sizing agents□he question of covalent versus adsorptive binding. *Cellulose*, **2016**, 23, 823-836	5.5	4
91	Fast Approach to the Hydrophobization of Bacterial Cellulose via the Direct Polymerization of Ethyl 2-Cyanoacrylate. *Biomacromolecules*, **2019**, 20, 3142-3146	6.9	4
90	Controversial influence of aqueous treatments on historic textiles. *Polymer Degradation and Stability*, **2011**, 96, 588-594	4.7	4
89	Sustainability of Mass Deacidification. Part I: Concept, Selection of Sample Books and pH-Determination. *Restaurator*, **2011**, 32,	0	4
88	Novel paper sizing agents from renewables. Part 2: Characterization of maleated high oleic sunflower oil (MSOHO). *Holzforschung*, **2011**, 65, 13-19	2	4
87	Phytate treatment of metallo-gallate inks: Investigation of its effectiveness on model and historic paper samples. *Restaurator*, **2008**, 29,	0	4
86	Confirmation of the Presence of Hydroxyl Radicals During Pre-Ripening of Alkali Cellulose. *Journal of Wood Chemistry and Technology*, **2006**, 26, 53-63	2	4
85	Crystal and molecular structure of methyl 4-O-methyl-beta-D-ribo-hex-3-ulopyranoside. *Carbohydrate Research*, **2004**, 339, 795-9	2.9	4
84	Synthesis and Testing of a Novel Fluorescence Label for Carboxyls in Carbohydrates and Cellulosics. *Synlett*, **2005**, 2005, 3087-3090	2.2	4
83	Combining phytate treatment and nanocellulose stabilization for mitigating iron gall ink damage in historic papers. *Heritage Science*, **2020**, 8,	2.5	4
82	Thin Layer Chromatography and the Analysis of Wood Derived Biomass - A Review. *Current Chromatography*, **2016**, 3, 75-85	0.4	4
81	Lignin Quantification of Papyri by TGA-Not a Good Idea. *Molecules*, **2021**, 26,	4.8	4
80	The disastrous copper. Comparing extraction and chelation treatments to face the threat of copper-containing inks on cellulose. *Carbohydrate Polymers*, **2019**, 206, 198-209	10.3	4

79	Evaluation of cellulose paper degradation irradiated by an electron beam for conservation treatment. *Cellulose*, **2021**, 28, 1071-1083	5.5	4
78	Chromophores in cellulosics, XVIII. Degradation of the cellulosic key chromophore 5,8-dihydroxy-[1,4]-naphthoquinone under conditions of chlorine dioxide pulp bleaching: a combined experimental and theoretical study. *Cellulose*, **2018**, 25, 4941-4954	5.5	4
77	Comparative hydrolysis analysis of cellulose samples and aspects of its application in conservation science. *Cellulose*, **2021**, 28, 1-16	5.5	4
76	On the chemical interactions of the biomass processing agents γ-valerolactone (GVL) and N-methylmorpholine-N-oxide (NMMO). *Green Chemistry*, **2021**, 23, 5832-5848	10	4
75	Micro- and Nanoparticles from Hemicelluloses367-386		4
74	Recycling of Analytical Grade Solvents on a Lab Scale with a Purpose-Built Temperature-Controlled Distillation Unit. *Organic Process Research and Development*, **2017**, 21, 578-584	3.9	3
73	Changes in the structure of cellulose aerogels with depolymerization. *Journal of the Korean Physical Society*, **2015**, 67, 742-745	0.6	3
72	Effects of inorganic salts on the degradation of 2,5-dihydroxy-[1,4]-benzoquinone as a key chromophore in pulps by hydrogen peroxide under basic conditions. *Holzforschung*, **2015**, 69, 685-693	2	3
71	Pushing the limits: Quantification of chromophores in real-world paper samples by GC-ECD and EI-GC-MS. *Talanta*, **2018**, 179, 693-699	6.2	3
70	Degradation products of lignocellulosics in pulp mill effluents: comparison and evaluation of different gas chromatographic techniques for a comprehensive analysis. *Holzforschung*, **2012**, 66, 917-925	2	3
69	Sustainability of Mass-Deacidification. Part II: Evaluation of Alkaline Reserve. *Restaurator*, **2012**, 33,	0	3
68	Comparison of Aqueous and Non-Aqueous Treatments of Cellulose to Reduce Copper-Catalyzed Oxidation Processes. *Macromolecular Symposia*, **2005**, 232, 129-136	0.8	3
67	Empty Palm Fruit Bunches: A CO2-Based Biorefinery Concept. *Journal of Biobased Materials and Bioenergy*, **2011**, 5, 225-233	1.4	3
66	A solid-phase extraction method that eliminates matrix effects of complex pulp mill effluents for the analysis of lipophilic wood extractives. *Nordic Pulp and Paper Research Journal*, **2020**, 35, 577-588	1.1	3
65	Xylan Localization on Pulp and Viscose Fiber Surfaces. *BioResources*, **2017**, 12,	1.3	3
64	Mapping of the Hydrophobic Composition of Lignosulfonates. *ACS Sustainable Chemistry and Engineering*,	8.3	3
63	Assembling Native Elementary Cellulose Nanofibrils via a Reversible and Regioselective Surface Functionalization. *Journal of the American Chemical Society*, **2021**, 143, 17040-17046	16.4	3
62	Degradation of cellulosic key chromophores by ozone: a mechanistic and kinetic study. *Cellulose*, **2021**, 28, 6051	5.5	3

61	A General Protocol for Electrospun Non-Woven Fabrics of Dialdehyde Cellulose and Poly(Vinyl Alcohol). *Nanomaterials*, **2020**, 10,	5.4	3
60	Recent Progress on Oxygen Delignification of Softwood Kraft Pulp **2018**, 67-97		3
59	Fire-induced structural changes and long-term stability of burned historical rag papers. *Scientific Reports*, **2018**, 8, 12036	4.9	3
58	Enhanced Antimicrobial Activity of Atmospheric Pressure Plasma Treated and Aged Cotton Fibers. *Journal of Natural Fibers*,1-15	1.8	3
57	Antioxidant properties and qualitative analysis of phenolic constituents in Ephedra spp. by HPTLC together with injection port derivatization GC-MS. *Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences*, **2021**, 1180, 122877	3.2	3
56	Non-productive binding of cellobiohydrolase i investigated by surface plasmon resonance spectroscopy. *Cellulose*, **2021**, 28, 9525-9545	5.5	3
55	Modification of softwood kraft pulp fibres using hydrogen peroxide at acidic conditions. *Cellulose*, **2020**, 27, 7191-7202	5.5	2
54	Novel Paper Sizing Agents Based on Renewables. Part 6: Sizing Properties of Maleated High Oleic Sunflower Oil. *Journal of Wood Chemistry and Technology*, **2012**, 32, 51-65	2	2
53	Stabilisation Treatments with Aerosols: Evaluating the Penetration Behaviour of Gelatine and Methylcellulose. *Restaurator*, **2013**, 34,	0	2
52	Side reactions of 4-acetamido-TEMPO as the catalyst in cellulose oxidation systems. *Holzforschung*, **2010**, 64,	2	2
51	Carbonyl and Carboxyl Profiles as Two Novel Parameters in Advanced Cellulose Analytics. *ACS Symposium Series*, **2007**, 513-530	0.4	2
50	Corrigendum to Crystal and molecular structure of methyl 4-O-methyl-d-glucopyranosyl-(1->4)-d-glucopyranoside[Carbohydr. Res. 2002, 337, 161166]. *Carbohydrate Research*, **2002**, 337, 1065	2.9	2
49	Oxidation of Benzyl Alcohols by the Laccase-Mediator System (LMS) a Comprehensive Kinetic Description. *Holzforschung*, **2001**, 55, 47-56	2	2
48	Analyzing the effects of thermal stress on insulator papers by solid-state 13C NMR spectroscopy. *Cellulose*,1	5.5	2
47	Direct Quantification of Lignin in Liquors by High Performance Thin Layer Chromatography-Densitometry and Multivariate Calibration. *ACS Sustainable Chemistry and Engineering*, **2020**, 8, 16766-16774	8.3	2
46	A cautionary note on exothermic events upon contact of carbodiimide coupling agents and the cellulose solvent N-methylmorpholine-N-oxide. *Cellulose*, **2020**, 27, 7349-7359	5.5	2
45	Fate of Lipophilic Wood Extractives in Oxygen-Based Cellulose Bleaching. *ACS Sustainable Chemistry and Engineering*, **2021**, 9, 4840-4849	8.3	2
44	Gram-scale economical synthesis of trans-coniferyl alcohol and its corresponding thiol. *Holzforschung*, **2020**, 74, 197-202	2	2

43	On nitrogen fixation and "residual nitrogen content" in cellulosic pulps. *Carbohydrate Polymers*, **2021**, 253, 117235	10.3	2
42	Bio-based Aerogels: A New Generation of Thermal Superinsulating Materials **2018**, 371-392		2
41	Acetylation of cellulose - Another pathway of natural cellulose aging during library storage of books and papers.. *Carbohydrate Polymers*, **2022**, 287, 119323	10.3	2
40	Agricultural utilization of lignosulfonates. *Holzforschung*, **2022**, 76, 155-168	2	2
39	Cellulose Degradation by Calcium Thiocyanate. *Polymers*, **2019**, 11,	4.5	1
38	Phytochemical analysis and biological evaluation of Lagochilus species from Uzbekistan. *Industrial Crops and Products*, **2020**, 154, 112715	5.9	1
37	Cyclic peroxides as key intermediates in the degradation of cellulosic key chromophores by alkaline hydrogen peroxide: first direct proof by 17O NMR. *Cellulose*, **2018**, 25, 3197-3203	5.5	1
36	Safe and Ecological Refluxing with a Closed-Loop Air Cooling System. *ChemSusChem*, **2017**, 10, 461-465	8.3	1
35	Chemical Characterization of Polysaccharides **2012**, 65-89		1
34	Novel paper sizing agents based on renewables. Part 4: Application properties in comparison to conventional ASA sizes. *Holzforschung*, **2011**, 65,	2	1
33	On the structure of the active compound in mass deacidification of paper. *Holzforschung*, **2012**, 66,	2	1
32	Warum Papier l□hrig wird. *Nachrichten Aus Der Chemie*, **2008**, 56, 635-639	0.1	1
31	Oxidative modifications of cellulose in the periodate system □Reduction and beta-elimination reactions. *Holzforschung*, **2008**, 090313094857030--	2	1
30	Comparative Synthesis Studies Towards Methyl and Phenyl 4-Deoxy-□L-threo-hex-4-enopyranosiduronic Acid as Model Compounds of Hexenuronic Acid Moieties in Hardwood Pulps. *Macromolecular Symposia*, **2008**, 262, 182-189	0.8	1
29	Differences in the content, composition and structure of the lignins from rind and pith of papyrus (Cyperus papyrus L.) culms. *Industrial Crops and Products*, **2021**, 174, 114226	5.9	1
28	Fourier transform and near infrared dataset of dialdehyde celluloses used to determine the degree of oxidation with chemometric analysis.. *Data in Brief*, **2022**, 40, 107757	1.2	1
27	Characterization of Pretreated Fractions and Cellulosic Ethanol Production from Steam-Exploded Eucalyptus urograndis. *Energy & Fuels*, **2020**, 34, 535-545	4.1	1
26	A general solvent system for the analysis of lignosulfonates by P NMR. *Analytical Methods*, **2021**, 13, 5502-5508	3.2	1

25	Improving the accuracy of estimating paper permanence for accelerated degradation in closed vials. *Cellulose*, **2021**, 28, 4053-4068	5.5	1
24	Chemical and physical interactions of regenerated cellulose yarns and isocyanate-based matrix systems. *Scientific Reports*, **2021**, 11, 11647	4.9	1
23	Adhesive Mixtures as Sacrificial Substrates in Paper Aging **2018**, 175-189		1
22	Solution-state NMR Analysis of Lignocellulosics in Nonderivatizing Solvents **2018**, 191-222		1
21	Degradation of the cellulosic key chromophores 2,5- and 2,6-dihydroxyacetophenone by hydrogen peroxide under alkaline conditions. Chromophores in cellulosics, XVII. *Cellulose*, **2018**, 25, 3815-3826	5.5	1
20	Carbohydrate-hydroxymethylfurfural-amine adhesives: Chemorheological analysis and rheokinetic study. *Polymer*, **2021**, 231, 124128	3.9	1
19	Multistage fractionation of pine bark by liquid and supercritical carbon dioxide. *Bioresource Technology*, **2021**, 341, 125862	11	1
18	Papyrus production revisited: differences between ancient and modern production modes. *Cellulose*,1	5.5	1
17	Inter-laboratory analysis of cereal beta-glucan extracts of nutritional importance: An evaluation of different methods for determining weight-average molecular weight and molecular weight distribution. *Food Hydrocolloids*, **2022**, 127, 107510	10.6	0
16	Assessing Fire-Damage in Historical Papers and Alleviating Damage with Soft Cellulose Nanofibers.. *Small*, **2022**, e2105420	11	0
15	Accelerated Aging of Deacidified and Untreated Book Paper in 1967 Compared with 52 Years of Natural Aging. *Restaurator*, **2020**, 41, 131-152	0	0
14	Ongoing development of a semi-quantitative protocol for assessing the suitability of commercial materials used to store or exhibit cellulose-based artworks. *European Physical Journal Plus*, **2021**, 136, 1	3.1	0
13	Sulfuric Acid-Catalyzed Dehydratization of Carbohydrates for the Production of Adhesive Precursors. *ACS Omega*, **2021**, 6, 16641-16648	3.9	0
12	Lignin Resists High-Intensity Electron Beam Irradiation. *Biomacromolecules*, **2021**, 22, 4365-4372	6.9	0
11	Protocol for characterizing the molar mass distribution and oxidized functionality profiles of aged transformer papers by gel permeation chromatography (GPC). *Cellulose*, **2022**, 29, 2241-2256	5.5	0
10	An improved, less erroneous protocol for the classical □uen□□uoxam□r □adoxen□viscosity measurements of pulps. *Cellulose*,1	5.5	0
9	Janus-faced 5-methyl group in 2-hydroxy-5-methyl-[1,4]-benzoquinone. *Tetrahedron*, **2017**, 73, 6421-6427	2.4	
8	Professor Dr. Mikhail Yakovlevich Zarubin. *Holzforschung*, **2018**, 72, 433-434	2	

7	Professor Dr. Arnis Treimanis. *Holzforschung*, **2015**, 69, 375-376	2
6	Dataset for chemorheological and rheokinetic analysis of carbohydrate-HMF-amine adhesives. *Data in Brief*, **2021**, 39, 107465	1.2
5	Column: Cellulose. *Polymer News*, **2004**, 29, 155-158	
4	Reaction of 2,5-dihydroxy-[1,4]-benzoquinone with nucleophiles - -substitution addition/elimination. *Chemical Communications*, **2020**, 56, 12845-12848	5.8
3	Vertrauen ist gut, Kontrolle ist besser Kriterien f Testpapiere zur Qualit skontrolle in der Mengenents erung nach der neuen ISO / TS 18344. *ABI Technik, Zeitschrift F Automation, Bau Und Technik Im Archiv-, Bibliotheks- Und Informationswesen*, **2016**, 36, 68-77	0.1
2	Partial exchange of ozone by electron beam irradiation shows better viscosity control and less oxidation in cellulose upgrade scenarios. *Carbohydrate Polymers*, **2021**, 265, 118037	10.3
1	On the role of N-methylmorpholine-N-oxide (NMMO) in the generation of elemental transition metal precipitates in cellulosic materials. *Cellulose*, **2021**, 28, 10143	5.5