

Acetylcholinesterase reactivators based on oxime-functionalized biodegradable ionic liquids

Karpichev, Yevgen; Kapitanov, Illia; Gathergood, Nicholas Military medical science letters 2018 / p. 87

https://www.mmsl.cz/artkey/mms-201888-0087_acetylcholinesterase-reactivators-based-on-oxime-functionalized-biodegradable-ionic-liquids.php

Aggregation of phosphate and 1-tetradecyl-3-methylimidazolium chloride background electrolytes during micellar electrokinetic chromatography

Kazarjan, Jana; Vaher, Merike; Kaljurand, Mihkel Electrophoresis 2015 / p. 1040–1042 : ill <https://doi.org/10.1002/elps.201400448>

An optimized capillary electrophoresis method for the simultaneous analysis of biomass degradation products in ionic liquid containing samples

Aid, Tiina; Vaher, Merike 20th International Scientific Conference EcoBalt 2016 : Tartu, Estonia, October 9-12 : book of abstracts 2016 / p. 91 : ill http://akki.ut.ee/wp-content/uploads/2015/01/Abstracts_Book_EcoBalt_2016.pdf

Analytical applications of ionic liquids

2016 http://www.ester.ee/record=b4620895*est

Antibacterial activity of 24 L-phenylalanine derived surface-active ionic liquids (SAILs) towards two clinically relevant pathogens

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; Gathergood, Nicholas; Kahru, Anne Journal of international scientific publications : ecology & safety 2019 / p. 16-28 : ill <https://www.scientific-publications.net/en/article/1001856/>

Antibacterial activity of of L-Phenylalanine derived ionic liquids [Online resource]

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; Kapitanov, Illia; Karpichev, Yevgen; Gathergood, Nicholas; Kahru, Anne Tartu Ülikooli ASTRA projekt PER ASPERA : Funktsionaalsed materjalid ja tehnoloogiad : [7-8 märtsil 2018, Tallinn : teesid] GSFMT Scientific Conference 2018 : Tallinn, March 7-8, 2018 : abstracts 2018 / 1 p <http://fmdtk.ut.ee/teesid-2018/>

Application of 1-alkyl-3-methylimidazolium based ionic liquids in non-aqueous capillary electrophoresis

Vaher, Merike; Koel, Mihkel; Kaljurand, Mihkel 15th International Symposium on Microscale Separations and Analysis HPCE, April 13-18, 2002, Stockholm : abstracts 2002 / p. 127

Application of 1-alkyl-3-methylimidazolium-based ionic liquids in non-aqueous capillary electrophoresis

Vaher, Merike; Koel, Mihkel; Kaljurand, Mihkel Journal of chromatography A 2002 / p. 27-32 : ill

Atom economy, biodegradation, catalysis and green toxicology : tools for the delivery of green chemistry based on ionic liquids [Online resource]

Gathergood, Nicholas Abstracts : ICCE 2017 Oslo : 16th International Conference on Chemistry and the Environment : Oslo, Norway, 18-22 June 2017 2017 / art. 171, p. [155] http://icce2017.org/downloads/Abstraktsamling_16_06_17.pdf

Atom economy, catalysis and green toxicology : tools for the delivery of sustainable chemistry based on ionic liquids

Gathergood, Nicholas 2nd Green and Sustainable Chemistry Conference : 14-17 May 2017, Berlin, Germany : abstracts 2017 / p. [O4.6]

Atom economy, catalysis and green toxicology : tools for the delivery of sustainable chemistry based on ionic liquids

Gathergood, Nicholas 20th International Scientific Conference EcoBalt 2016 : Tartu, Estonia, October 9-12 : book of abstracts 2016 / p. 47 http://akki.ut.ee/wp-content/uploads/2015/01/Abstracts_Book_EcoBalt_2016.pdf

Biodegradation of ionic liquids - a critical review

Jordan, Andrew; **Gathergood, Nicholas** Chemical Society reviews 2015 / p. 8200-8237 : ill <http://dx.doi.org/10.1039/C5CS00444F>

Biodegradation studies of a series of dipeptide based ionic liquids and their transformation products [Online resource]

Raba, Grete; Kapitanov, Illia; Karpichev, Yevgen; Kümmerer, Klaus; Vilu, Raivo; Gathergood, Nicholas Tartu Ülikooli ASTRA projekt PER ASPERA : Funktsionaalsed materjalid ja tehnoloogiad : [7-8 märtsil 2018, Tallinn : teesid] GSFMT Scientific Conference 2018 : Tallinn, March 7-8, 2018 : abstracts 2018 / 1 p <http://fmdtk.ut.ee/teesid-2018/>

Biodegradation studies of a series of dipeptide based ionic liquids and their transformation products

Raba, Grete; Kapitanov, Illia; Karpichev, Yevgen; Kümmerer, Klaus; Vilu, Raivo; Gathergood, Nicholas IUPAC Postgraduate Summer School on Green Chemistry : 7-13 July 2018, Venice - Italy : book of abstracts 2018 / p. 25 https://www.unive.it/pag/fileadmin/user_upload/extra/SSGC/documenti/Book_of_abstracts_per_website_23_July.pdf

Biorefinery : value added chemicals [Online resource]

Gathergood, Nicholas The Bioeconomy in Transition Workshop Gela : 25-27 May 2017, Gela, Sicily, Italy 2017 <http://www.bioeconomy-in-transition.eu/about-workshop/>

Capillary electrophoresis versus HPLC analysis method used for analyzing sugars and sugar derivatives in ionic liquid media obtained from lignocellulosic biomass

Hyväräinen, S.; Mikkola, J.-P.; Murzin, D. Yu.; **Vaher, Merike; Kaljurand, Mihkel; Koel, Mihkel** Book of abstracts : COST Action

Capillary electrophoretic analysis of neutral carbohydrates using ionic liquids as background electrolytes

Vaher, Merike; Koel, Mihkel; Kazarjan, Jana; Kaljurand, Mihkel Electrophoresis 2011 / 9, p. 1068-1073 : ill

Capillary electrophoretic monitoring of hydrothermal pre-treatment and enzymatic hydrolysis of willow : comparison with HPLC and NMR

Vaher, Merike; Helmja, Kati; Käsper, Andres; Kurašin, Mihhail; Väljamäe, Priit; Kudrjašova, Marina; Koel, Mihkel; Kaljurand, Mihkel Catalysis today 2012 / p. 34-41 : ill

Carbon aerogel based electrode material for EAP actuators

Kaasik, Friedrich; Torop, Janno; Peikolainen, Anna-Liisa; Koel, Mihkel; Aabloo, Alvo Proceedings of SPIE 2011 / p. 79760O-1 - 79760O-8 : ill

Catalytic conversion of recalcitrant glycopolymers : investigation of saccharification and isomerisation in ionic liquids = Tõrksate glükopolümeeride katalüütiline konversioon : sahharifikatsiooni ja isomerisatsiooni uurimine ionsetes vedelikes

Kontson, Tiina 2021 https://www.ester.ee/record=b5473795*est <https://digikogu.taltech.ee/et/Item/afdb8f5d-41a6-4bfb-9a66-05653b60c076> <https://doi.org/10.23658/taltech.63/2021>

Cellulose esters : sythesis in ionic liquid and characterization

Tarasova, Elvira; Šumigin, Dmitri; Krumme, Andres; Viikna, Anti Baltic Polymer Symposium 2012 : Liepaja, Latvia, September 19-22 : programme and proceedings 2012 / p. 66

Chiral ionic liquids : effect of symmetry and stereochemistry on toxicity and biodegradation

Gathergood, Nicholas Symmetry : culture and science 2017 / p. 179-182 : ill <http://journal-scs.symmetry.hu/content-pages/volume-28-number-2-pages-161-240-2017/>

Colorimetric determination of total phenolic contents in ionic liquid extracts by paper microzones and digital camera

Aid, Tiina; Kaljurand, Mihkel; Vaher, Merike Analytical methods 2015 / p. 3193-3199 : ill <http://dx.doi.org/10.1039/c5ay00194c>

Correlation of the melting points of potential ionic liquids (Imidazolium Bromides and Benzimidazolium Bromides) using CODESSA program [J.Chem.Inf.Comput.Sci. 42, 225-231 (2002)]

Katritzky, Alan R.; Jain, Ritu; Lomaka, Andre; Petrukhin, Ruslan; Karelson, Mati; Visser, Ann E.; Rodgers, Robin D. Journal of chemical information and modeling 2005 / 2, p. 533-534 <https://pubs.acs.org/doi/10.1021/ci049691z>

Covalent coupling of ionic liquid to carbon nanotubes : preparation and tribological properties

Taaber, Triinu; Põhako-Esko, Kaija; Antonov, Maksim; Veinthal, Renno MRS proceedings 2014 / p. UU06-30 : ill

Degradation of imidazolium-based ionic liquids by pulsed corona discharge and UV photolysis assisted with extrinsic oxidants

Nikitin, Dmitri; Preis, Sergei; Dulova, Niina IOA 26th World Congress & Exhibition Milano 2023 : proceedings 2023 / p. 15.7-1-15.7-3 <https://www.ioa-ea3g.org/congress/technical-programme/information-for-authors/>

Degradation of imidazolium-based ionic liquids by UV photolysis and pulsed corona discharge : The effect of persulfates addition

Nikitin, Dmitri; Preis, Sergei; Dulova, Niina Separation and purification technology 2024 / art. 127235 <https://doi.org/10.1016/j.seppur.2024.127235>

Densities, viscosities, and thermal conductivities of the ionic liquid 7-Methyl-1,5,7-triazabicyclo[4.4.0]dec-5-enium acetate and its mixtures with water

Baird, Zachariah Steven; Uusi-Kyyny, Petri; Dahlberg, Artur; Cederkrantz, Daniel; Alopaeus, Ville International journal of thermophysics 2020 / art. 160, 21 p. : ill <https://doi.org/10.1007/s10765-020-02742-4>

Design rules for environmental biodegradability of phenylalanine alkyl ester linked ionic liquids

Suk, Morten; Haß, Annette; Westphal, Janin; Jordan, Andrew; Kellett, Andrew; Kapitanov, Illia; Karpichev, Yevgen; Gathergood, Nicholas; Kümmerer, Klaus Green chemistry 2020 / p. 4498-4508 <https://doi.org/10.1039/D0GC00918K> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Designing mineralisable building blocks for greener solvents

Raba, Grete; Kapitanov, Illia; Karpichev, Yevgen; Vilu, Raivo; Gathergood, Nicholas 8th IUPAC International Conference of Green Chemistry : Shangri-La Hotel, Bangkok, Thailand, 9-14 Sept 2018 : poster presentation abstracts 2018 / p. 87 http://www.greeniupac2018.com/download/8th%20IUPAC%20ICGC%202018_Program%20&%20Abstract%20Book_Poster%20Abstract.pdf

Directly electrospun electrodes for electrical double-layer capacitors from carbide-derived carbon

Malmberg, Siret; Arulepp, Mati; **Savest, Natalja;** Tarasova, Elvira; **Vassiljeva, Viktoria;** Krasnou, Illia; **Käärik, Maike;** Mikli, Valdek; **Krumme, Andres** Journal of electrostatics 2020 / art. 103396, 7 p. : ill <https://doi.org/10.1016/j.elstat.2019.103396> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

(Eco)toxicological and Antibacterial Effects of 24 L-Phenylalanine Derived Ionic Liquids against Marine and Clinically Relevant Bacteria

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; **Kapitanov, Illia;** **Karpichev, Yevgen;** Kahru, Anne; Gathergood, Nicholas IUPAC Postgraduate Summer School on Green Chemistry : 7-13 July 2018, Venice - Italy : book of abstracts 2018 / p. 74 https://www.unive.it/pag/fileadmin/user_upload/extra/SSGC/documenti/Book_of_abstracts_per_website_23_July.pdf

Ecotoxicological profiling and antibacterial potency of a series of 24 L-phenylalanine based SAILs = 24 L-fenüülalaniini-põhiseioonvedeliku ökotoksikoloogiline ja antibakteriaalne iseloomustamine

Kusumahastuti, Dewi Kurnianingsih Arum 2021 <https://doi.org/10.23658/tallinn.30/2021> https://www.ester.ee/record=b5436547*est <https://digikogu.taltech.ee/et/Item/bae0391e-b57c-476d-acda-6cd147ee55d0>

Effect of different ionic liquids on the conductivity of electrospun polyacrylonitrile membranes

Savest, Natalja; **Krumme, Andres;** **Viirsalu, Mihkel;** **Küppar, Kadi-Anne** Baltic Polymer Symposium 2015 : Sigulda, Latvia, September 16-18 : programme and proceedings 2015 / p. 91

The effect of ionic liquids on the mechanical properties of electrospun polyacrylonitrile membranes

Plamus, Tiia; **Savest, Natalja;** **Viirsalu, Mihkel;** Harz, Patrick; **Tarasova, Elvira;** **Krasnou, Illia;** **Vassiljeva, Viktoria;** **Kallavus, Urve;** **Krumme, Andres** Polymer testing 2018 / p. 335-343 : ill <https://doi.org/10.1016/j.polymertesting.2018.09.003> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Electrochemically driven carbon-based materials as EAPs : fundamentals and device configurations [Online resource]

Torop, Janno; Peikola, Anna-Liisa; Aabloo, Alvo; **Koel, Mihkel;** Asaka, Kinji; Baughman, Ray Electromechanically active polymers : a concise reference 2016 / p. 1-16 http://dx.doi.org/10.1007/978-3-319-31767-0_18-1

Electrospinning of nanofibrous composites with cellulose acetate, ionic liquids and graphene oxide =

Tselluloosatsetaadi, ioonsete vedelike ja grafeenoksiidi nanokiuliste komposiitide elektroketrus

Javed, Kashif 2019 <https://digi.lib.ttu.ee/i/?12424>

Electrospun conductive mats from PANi-ionic liquid blends

Savest, Natalja; **Plamus, Tiia;** Kütt, Kertu; **Kallavus, Urve;** **Viirsalu, Mihkel;** **Tarasova, Elvira;** **Vassiljeva, Viktoria;** **Krasnou, Illia;** **Krumme, Andres** Journal of electrostatics 2018 / p. 40-44 <https://doi.org/10.1016/j.elstat.2018.09.007> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Enantioselective Tsuji-Trost reactions in low toxicity ionic liquids

Ghavre, Mukund; Quilty, Brid; **Gathergood, Nicholas** Current green chemistry 2016 / p. 181-189 : ill <https://doi.org/10.2174/2213346103666160728115628>

EUCHEM2014 : Molten Salts and Ionic Liquids XXV : 6-11 July 2014, Tallinn, Estonia : programme

2014 https://www.ester.ee/record=b4777207*est

An example of green surfactant systems based on inherently biodegradable IL-derived amphiphilic oximes

Pandya, Subhashree Jayesh; **Kapitanov, Illia;** **Usmani, Zeba;** Sahu, Reshma; Sinha, Deepak; **Gathergood, Nicholas;** Ghosh, Kallol K; **Karpichev, Yevgen** Journal of molecular liquids 2020 / art. 112857 <https://doi.org/10.1016/j.molliq.2020.112857> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Extraction of bioactive compounds from Catharanthus roseus and Vinca minor

Koel, Mihkel; **Kuhtinskaja, Maria;** **Vaher, Merike** Separation and purification technology 2020 / art. 117438 ; 5 p. : ill <https://doi.org/10.1016/j.seppur.2020.117438> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Green profiling of aprotic versus protic ionic liquids : synthesis and microbial toxicity of analogous structures

Reid, Joshua E.S.J.; Prydderch, Hannah; Spulak, Marcel; Shimizu, Seishi; Walker, Adam J.; **Gathergood, Nicholas** Sustainable Chemistry and Pharmacy 2018 / p. 17-26 <https://doi.org/10.1016/j.scp.2017.11.001> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

A greener approach to hydrolyse ionic liquids

Sudheer, Surya; **Raba, Grete;** **Kapitanov, Illia;** **Karpichev, Yevgen;** **Vilu, Raivo;** **Gupta, Vijai Kumar;** **Gathergood, Nicholas** Basic & Clinical Pharmacology & Toxicology 2018 International Conference on Biotechnology and Bioengineering (ICBB2018) : 24-26 October 2018, Budapest, Hungary 2018 / p. 21 <https://doi.org/10.1111/bcpt.13165>

Imidasoolil põhinevad ioonised vedelikud kvartskapillaari pinna modifitseerijatena kapillaarelektroforeesis

Borissova, Maria; **Koel, Mihkel** XXIX Eesti keemiapäevad : teaduskonverentsi ettekannete teesid = 29th Estonian Chemistry Days : abstracts of scientific conference 2005 / lk. 7

Impact of 1-butyl-3-methylimidazolium chloride on the electrospinning of cellulose acetate nanofibers

Javed, Kashif; Krumme, Andres; Krasnou, Illia; Mikli, Valdek; Viirsalu, Mihkel; Plamus, Tiia; Vassiljeva, Viktoria; Tarasova, Elvira; Savest, Natalja; Mendez, James D. Journal of macromolecular science, part A : pure and applied chemistry 2018 / p. 142-147 : ill <https://doi.org/10.1080/10601325.2017.1387861> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Ionic liquid-carbon-polymer composite actuator based on carbon aerogel electrodes

Kaasik, Friedrich; Must, Indrek; Torop, Janno; **Peikolainen, Anna-Liisa**; Aabloo, Alvo SustainChem2011 : International Conference on Materials and Technologies for Green Chemistry jointly with Workshop of COST Action CM0903 (UBIOCHEM-II) : September 5-9, 2011, Tallinn, Estonia : abstract book and program 2011 / p. 112 : ill

Ionic liquids - a survey of recent developments and applications : editorial

Koel, Mihkel; Linert, Wolfgang; Gärtner, Peter Monatshefte für Chemie = Chemical monthly 2007 / 11, p. V-VI

Ionic liquids as background electrolyte additives and coating materials in capillary electrophoresis

Vaher, Merike; Borissova, Maria; Koel, Mihkel; Kaljurand, Mihkel Proceedings of the Estonian Academy of Sciences. Chemistry 2007 / 4, p. 187-198 : ill

Ionic liquids as background electrolyte additives in capillary electrophoresis

Vaher, Merike; Kaljurand, Mihkel Ionic liquids in chemical analysis 2008 / p. 185-210 : ill

Ionic liquids as electrolytes for nonaqueous capillary electrophoresis

Vaher, Merike; Koel, Mihkel; Kaljurand, Mihkel Electrophoresis 2002 / p. 426-430 : ill

Ionic liquids as specific additives in separation methods

Koel, Mihkel; Vaher, Merike 20th International Scientific Conference EcoBalt 2016 : Tartu, Estonia, October 9-12 : book of abstracts 2016 / p. 35 http://akki.ut.ee/wp-content/uploads/2015/01/Abstracts_Book_EcoBalt_2016.pdf

Ionic liquids for oil shale treatment

Koel, Mihkel; Hollis, K.; Rubin, J.; Lombardo, T.; Smith, B. Green industrial applications of ionic liquids 2002 / p. 193-208

Ionic liquids for silica modification : assessment by capillary zone electrophoresis

Borissova, Maria; Koel, Mihkel; Kaljurand, Mihkel Ionic liquids. IV, Not just solvents anymore 2007 / p. 35-46 : ill

Ionic liquids in capillary electrophoresis

Vaher, Merike Analytical applications of ionic liquids 2016 / p. 105-136 : ill http://www.ester.ee/record=b4620895*est

Ionic liquids in capillary electrophoresis and liquid chromatography

Vaher, Merike; Koel, Mihkel; Kaljurand, Mihkel Chimica Oggi = Chemistry today 2007 / 6, p. 86-88

Ionic liquids in chemical analysis

Koel, Mihkel 2008 https://www.ester.ee/record=b2442928*est

Ionic liquids in chemical analysis

Koel, Mihkel Critical reviews in analytical chemistry 2005 / 3, p. 177-192

Ionic liquids recycling

Krasnou, Illia; Krumme, Andres Baltic Polymer Symposium, BPS2023 : programme and abstracts 2023 / p. 17

Ioonsed vedelikud neutraalsete suhkru analüüsi kapillaarelektroforeesi meetodil

Kazarjan, Jana; Vaher, Merike XXXII Eesti Keemiapäevad : teaduskonverentsi teesid 2011 / lk. 40

Ioonsele vedelikule seotud bipiperidiini derivaadi süntees ja rakendus organokatalüüsis

Reitel, Kärt; Kudrjašova, Marina; Kanger, Tõnis XXXII Eesti Keemiapäevad : teaduskonverentsi teesid 2011 / lk. 86 : ill

Ioonsete vedelike kasutamine mitte-vesikeskkonnalisel kapillaarelektroforeesil fenoolsete ühendite ja karboksüülhapete analüüsil

Vaher, Merike; Koel, Mihkel; Kaljurand, Mihkel XXVII Eesti keemiapäevad : teaduskonverentsi ettekannete referaadid = 27th Estonian Chemistry Days : abstracts of scientific conference 2001 / lk. 152-153

Lahendus liitiumkriisile, tulevasele liitiumkriisile

Strandberg, Marek Inseneeria 2016 / lk. 8 : fot https://artiklid.elnet.ee/record=b2755207*est

Lignotselluloosse biomassi eeltöötlus ioonsete vedelikega

Aid, Tiina; Koel, Mihkel; Vaher, Merike XXXIII Eesti Keemiapäevad : teaduskonverentsi teesid 2013 / lk. 11

Micellar electrophoresis using ionic liquids

Borissova, Maria; Palk, Klairy; Koel, Mihkel Journal of chromatography A 2008 / 1/2, p. 192-195 : ill

Mixed oxime-functionalized IL/16-s-16 Gemini surfactants system: physicochemical study and structural transitions in the presence of promethazine as a potential chiral pollutant

Pandya, Subhashree Jayesh; **Kapitanov, Illia; Borovkov, Victor**; Ghosh, Kallol K.; **Karpichev, Yevgen** Chemosensors 2022 / art. 46 <https://doi.org/10.3390/chemosensors10020046> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

Molecular spectroscopy and ionic liquids

Koel, Mihkel Ionic liquids in chemical analysis 2008 / p. 295-306

Monitoring biomass degradation, isomerization of glucose to fructose and conversion to 5-HMF in ionic liquids by CE

Aid, Tiina; Lopp, Margus; Vaher, Merike 40th International Symposium on Capillary Chromatography and 13th GC×GC Symposium : May 29 - June 03, 2016, Riva del Garda Fierecongressi, Riva del Garda, Italy : abstract book 2016 / p. 271

Monitoring cellulose degradation and glucose conversion to 5-hydroxymethylfurfural in ionic liquids

Aid, Tiina; Vaher, Merike; Lopp, Margus Balticum Organicum Syntheticum : 3-6 July 2016, Riga, Latvia : program and abstracts 2016 / p. 39 : ill http://boschem.eu/old/public/BOS2016/BOS-2016_Anstract-Book_Final.pdf

Mutual Lewis acid–base interactions of cations and anions in ionic liquids

Holzweber, Markus; **Koel, Mihkel** Chemistry : a European journal 2013 / p. 288-293 : ill

Novel homogeneous gel fibers and capillaries from blend of titanium tetrabutoxide and siloxane functionalized ionic liquid

Tarkanovskaja, Marta; Vålbe, Raul; **Krumme, Andres** Ceramics international 2014 / p. 7729-7735 : ill

A novel route of synthesis of sodium hexafluorosilicate two component cluster crystals using BF₄⁻ containing ionic liquids

Vålbe, Raul; Mäeorg, Uno; Lõhmus, Ants; Reedo, Valter; **Koel, Mihkel; Krumme, Andres**; Kessler, Vadim; Hoop, Andres; Romanov, Alexey Journal of crystal growth 2012 / p. 51-56 : ill <https://www.sciencedirect.com/science/article/pii/S0022024812006069>

On the way to greener ionic liquids : identification of a fully mineralizable phenylalanine-based ionic liquid

Haiss, Annette; Jordan, Andrew; Westphal, Janin; Logunova, Evgenia; **Gathergood, Nicholas**; Kümmerer, Klaus Green chemistry 2016 / p. 4361-4373 : ill <http://dx.doi.org/10.1039/C6GC00417B>

An optimized capillary electrophoresis method for the simultaneous analysis of biomass degradation products in ionic liquid containing samples

Aid, Tiina; Paist, Loore; Lopp, Margus; Kaljurand, Mihkel; Vaher, Merike Journal of chromatography A 2016 / p. 141-147 : ill <http://dx.doi.org/10.1016/j.chroma.2016.04.027>

Oxime-functionalized nanodiamonds as a platform for treatment of organophosphate poisoning

Karpichev, Yevgen; Bondar, Denys; Starkov, Pavel; Heinmaa, Ivo Artificial Intelligence for Material Design, Processing and Characterizations November 21 - November 30, 2020 : SYMPOSIUM S.CT01 : abstract book 2020 / S.NM01.10.06, p. 658 [Meeting abstracts](#)

Persulfate activated by non-thermal plasma for pharmaceuticals degradation

Nikitin, Dmitri; Kattel-Salusoo, Eneliis; Preis, Sergei; Dulova, Niina IOA 26th World Congress & Exhibition Milano 2023 : proceedings 2023 / p. 18.1-1–18.1-5 <https://www.ioa-ea3g.org/congress/technical-programme/information-for-authors/>

Physical properties of 7-Methyl-1,5,7-triazabicyclo[4.4.0]dec-5-ene (mTBD)

Baird, Zachariah Steven; Dahlberg, Artur; Uusi-Kyyny, Petri; Osmanbegovic, Nahla; Witos, Joanna; Helminen, Jussi; Cederkrantz, Daniel; Hyväri, Paulus; Alopaeus, Ville; Kilpeläinen, Ilkka; Wiedmer, Susanne K.; Sixta, Herbert; Uusi-Kyyny, Petri International journal of thermophysics 2019 / art. 71, 23 p. : ill <https://doi.org/10.1007/s10765-019-2540-2>

[Preface]

Koel, Mihkel EUCHEM2014 : Molten Salts and Ionic Liquids XXV : 6-11 July 2014, Tallinn, Estonia : programme 2014 / p. 1 https://www.ester.ee/record=b4777207*est

Preparation of cellulose mix-esters and cellulose esters/MWCNT composites in ionic liquids

Tarasova, Elvira; Kudrjašova, Marina; Krumme, Andres EUPOC-2013 : Polymers and Ionic Liquids, 1-5 September 2013, Gargnano, Italy 2013

Preparation of thermoplastic cellulose esters in [mTBNH][OAC] ionic liquid by transesterification reaction

Tarasova, Elvira; Savale, Nutan; Krasnou, Illia; Kudrjašova, Marina; Rjabovs, Vitalijs; Reile, Indrek; Vares, Lauri; Kallakas,

Heikko; Kers, Jaan; **Krumme, Andres** Polymers 2023 / art. 3979 <https://doi.org/10.3390/polym15193979>

Pretreatment of plant feedstocks and agrofood waste using ionic liquids

Usmani, Zeba; Sharma, Minaxi; **Karpichev, Yevgen;** **Gathergood, Nicholas;** Bhat, Rajeev; Gupta, Vijai Kumar Recent developments in bioenergy research 2020 / p. 393-413 <https://doi.org/10.1016/B978-0-12-819597-0.00021-0>

Rheology and dissolution capacity of cellulose in novel [mTBNH][OAc] ionic liquid mixed with green co-solvents

Tarasova, Elvira; **Savale, Nutan;** **Ausmaa, Peeter;** **Mihkel, Krasnou, Illia;** **Krumme, Andres** Rheologica acta 2024 / p. 167-178 <https://doi.org/10.1007/s00397-024-01433-3>

Saccharification of lignocellulosic biomasses via ionic liquid pretreatment

Aid, Tiina; Hyvärinen, S.; **Vaher, Merike;** **Koel, Mihkel;** Mikkola, J.-P. Industrial crops and products 2016 / p. 336-341 : ill <http://dx.doi.org/10.1016/j.indcrop.2016.08.017>

Safer chemicals : reducing toxicity and improving biodegradability [Online resource]

Gathergood, Nicholas 3rd EuCheMS Congress on Green and Sustainable Chemistry : 3-6 September 2017, University of York : [oral abstracts] 2017 / p. PL4 <https://www.york.ac.uk/chemistry/research/green/events/3eugsc/>

Separation of ionic liquids in non-aqueous capillary electrophoresis using contactless conductivity detector

Vaher, Merike; **Gorbatšova, Jelena;** **Koel, Mihkel;** **Kaljurand, Mihkel** HPLC 2007 Symposium : Ghent, Belgium, June 17-21, 2007 : abstract book 2007 / p. 363

Solvatochromic probes within ionic liquids

Koel, Mihkel Proceedings of the Estonian Academy of Sciences. Chemistry 2005 / 1, p. 3-11 : ill

Study of ionic liquids used for silica surface modification by capillary electrophoresis

Borissova, Maria; **Koel, Mihkel** Conference on Knowledge-based Materials and Technologies for Sustainable Chemistry : 1-5 June 2005, Tallinn, Estonia : abstract book 2005 / p. 78

Sugar and sugar derivatives in ionic liquid media obtained from lignocellulosic biomass

Hyvärinen, S.; Mikkola, J.-P.; Murzin, D. Yu.; **Vaher, Merike;** **Kaljurand, Mihkel;** **Koel, Mihkel** UBIOCHEM IV : 4th International Workshop of COST Action CM0903 : 14-16 October, 2013, Valencia, Spain : book of abstracts 2013 / p. 42

Surface active ionic liquids (SAILs) : to squeeze between biodegradability and toxicity constrains

Karpichev, Yevgen; **Kapitanov, Illia;** **Gathergood, Nicholas** Kyiv-Toulouse : IXth International Chemistry Conference "Kyiv-Toulouse" dedicated to the 100th anniversary of Fedir Babichev = IXth Conference Internationale de Chimie "Kyiv-Toulouse" dédiée au 100ème anniversaire de Fedir Babichev : (Kyiv, 4-9 June 2017) : materials of reports and performances 2017 / p. 30 : ill

Sustainable ionic liquids-based molecular platforms for designing acetylcholinesterase reactivators

Kapitanov, Illia; **Karpichev, Yevgen;** **Gathergood, Nicholas;** Spulak, Marcel; Pour, Milan; Soukup, Ondrej; Marek, Jan; Jun, Daniel; Novak, Martin; Diz de Almeida, Joyce S. F.; Costa Franca, Tanos C.; Kuca, Kamil Chemico-Biological Interactions 2023 / art. 110735 <https://doi.org/10.1016/j.cbi.2023.110735>

Sustainable phenylalanine-derived sails for solubilization of polycyclic aromatic hydrocarbons

Kapitanov, Illia; **Sudheer, Surya;** **Yadav, Toshikee;** Ghosh, Kallol K.; **Gathergood, Nicholas;** **Gupta, Vijai Kumar;** **Karpichev, Yevgen** Molecules 2023 / art. 4185 : ill <https://doi.org/10.3390/molecules28104185>

Süsinikaerogeelid ja nende modifitseerimine ioonsetes vedelikes

Peikolainen, Anna-Liisa; **Lõo, Simo;** **Koel, Mihkel** XXXI Eesti keemiapäevad : [28. aprill 2010, Tallinn] : teaduskonverentsi teesid = 31st Estonian Chemistry Days : abstracts of scientific conference 2010 / lk. 62

Synthesis and antimicrobial activity profiling of library of L-Phenylalanine derived ionic liquids

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; **Kapitanov, Illia;** **Karpichev, Yevgen;** **Gathergood, Nicholas;** Kahru, Anne Encountering global challenges through innovation on science, technology, engineering, and mathematics (STEM), and education 2017 / p. 142 <http://fmipa.undiksha.ac.id/iconmns2017/files/confbookiconmns17.pdf>

Synthesis and biodegradation studies of a series of novel L-phenylalanine derived ionic liquids

Kapitanov, Illia; Jordan, Andrew; Haiss, Annette; Špulak, Marcel; **Karpichev, Yevgen;** **Raba, Grete;** **Gupta, Vijai Kumar;** **Vilu, Raivo;** Kümmerer, Klaus; **Gathergood, Nicholas** 20th European Symposium on Organic Chemistry ESOC 2017 : July 2-6, 2017, Cologne, Germany : abstracts 2017 / p. OMSC009 : ill

Synthesis of a series of amino acid derived ionic liquids and tertiary amines : green chemistry metrics including microbial toxicity and preliminary biodegradation data analysis

Jordan, Andrew; Haiss, Annette; Spulak, Marcel; **Karpichev, Yevgen;** Kümmerer, Klaus; **Gathergood, Nicholas** Green chemistry 2016 / p. 4374-4392 : ill <http://dx.doi.org/10.1039/C6GC00415F>

Synthesis of polymerizable ionic liquid monomer and its characterizations

Sardar, Jagannath; Mäeorg, Uno; Krasnou, Illia; Baddam, Vikram; Gudkova, Viktoria; Krumme, Andres; Savest, Natalja; Tarasova, Elvira; Viirsalu, Mihkel IOP conference series : materials science and engineering 2016 / p. 1-5 : ill
<http://dx.doi.org/10.1088/1757-899X/111/1/012021>

Synthesis of polymerizable ionic liquid monomer and its characterizations

Sardar, Jagannath; Mäeorg, Uno; Krasnou, Illia; Baddam, Vikram; Gudkova, Viktoria; Krumme, Andres; Savest, Natalja; Tarasova, Elvira; Viirsalu, Mihkel Baltic Polymer Symposium 2015 : Sigulda, Latvia, September 16-18 : programme and proceedings 2015 / p. 74 : ill

Synthesis, self-assembly, bacterial and fungal toxicity, and preliminary biodegradation studies of a series of l-phenylalanine-derived surface-active ionic liquids

Kapitanov, Illia; Jordan, Andrew; Karpichev, Yevgen; Gathergood, Nicholas Green chemistry 2019 / p. 1777–1794 : ill
<https://doi.org/10.1039/c9gc00030e> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

The effect of ionic liquid on the properties of electrospun polyacrylonitrile membranes [Online resource]

Plamus, Tiia; Savest, Natalja; Krumme, Andres; Viirsalu, Mihkel Tartu Ülikooli ASTRA projekt PER ASPERA : Funktsionaalsed materjalid ja tehnoloogiad : [7-8 märts 2017, Tartu : teesid] 2017 / [1] p <http://fntdk.ut.ee/teesid/>

The effect of ionic liquids on the conductivity of electrospun polyacrylonitrile membranes

Savest, Natalja; Plamus, Tiia; Tarasova, Elvira; Viirsalu, Mihkel; Krasnou, Illia; Gudkova, Viktoria; Küppar, Kadi-Anne; Krumme, Andres Journal of electrostatics 2016 / p. 63-68 : ill <http://dx.doi.org/10.1016/j.elstat.2016.07.006>

The pretreatment of lignocellulosic biomass with ionic liquids

Aid, Tiina; Hyvärinen, S.; Koel, Mihkel; Vaher, Merike UBIOCHEM IV : 4th International Workshop of COST Action CM0903 : 14-16 October, 2013, Valencia, Spain : book of abstracts 2013 / p. 43

Toxicity and bio-acceptability in the context of biological processes in ionic liquid media

Prydderch, Hannah; Heise, Andreas; Gathergood, Nicholas Ionic liquids in the biorefinery concept : challenges and perspectives 2016 / p. 168-201 <http://dx.doi.org/10.1039/9781782622598-00168>

Toxicity profiling of 24 l-phenylalanine derived ionic liquids based on pyridinium, imidazolium and cholinium cations and varying alkyl chains using rapid screening Vibrio fischeri bioassay

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; Kapitanov, Illia; Karpichev, Yevgen; Gathergood, Nicholas; Kahru, Anne Ecotoxicology and environmental safety 2019 / p. 556-565 : ill <https://doi.org/10.1016/j.ecoenv.2018.12.076> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Toxicological effects of 24 L-Phenylalanine derived ionic liquids against marine and clinically relevant bacteria

Kusumahastuti, Dewi Kurnianingsih Arum; Sihtmäe, Mariliis; Kapitanov, Illia; Karpichev, Yevgen; Gathergood, Nicholas; Kahru, Anne 8th IUPAC International Conference of Green Chemistry : Shangri-La Hotel, Bangkok, Thailand, 9-14 Sept 2018 : poster presentation abstracts 2018 / p. 13
http://www.greeniupac2018.com/download/8th%20IUPAC%20ICGC%202018_Program%20&%20Abstract%20Book_Poster%20Abstract.pdf

Tselluloosi hüdroolüüs ioonses vedelikus

Helmja, Kati; Vaher, Merike XXXII Eesti Keemiapäevad : teaduskonverentsi teesid 2011 / lk. 25

TTÜ teadlased arendavad kosmosetehnika jaoks vajalikke supekondensaatoreid [Võrguväljaanne]

Vähi, Kersti novaator.err.ee 2020 / fot [TTÜ teadlased arendavad kosmosetehnika jaoks vajalikke supekondensaatoreid](#)

Use of ionic liquids in oil shale processing

Koel, Mihkel Ionic liquids IIIB : fundamentals, progress, challenges, and opportunities : transformations and processes 2005 / p. 72-82

Use of neoteric solvents in biomass treatment

Vaher, Merike; Saar-Reismaa, Piret; Kuhtinskaja, Maria; Koel, Mihkel Proceedings 2023 / art. 39
<https://doi.org/10.3390/proceedings2023092039>

Utilization of capillary electrophoresis technique to analyse sugars in ionic liquid

da Costa Lopes, A. M.; Aid, Tiina; Vaher, Merike; Bogel-Lukasik, R.; Koel, Mihkel UBIOCHEM IV : 4th International Workshop of COST Action CM0903 : 14-16 October, 2013, Valencia, Spain : book of abstracts 2013 / p. 98

Vapor–liquid equilibrium of ionic liquid 7-methyl-1,5,7-triazabicyclo[4.4.0]dec-5-enium acetate and its mixtures with water

Baird, Zachariah Steven; Uusi-Kyyny, Petri; Witos, Joanna; Rantamäki, Antti H.; Sixta, Herbert; Wiedmer, Susanne K.; Alopaeus, Ville Journal of Chemical & Engineering Data 2020 / p. 2405–2421 <https://doi.org/10.1021/acs.jced.9b01039>

Vedelate soolade kasutamine kapillaarelektroforeesil

Vaher, Merike; Koel, Mihkel; **Kaljurand, Mihkel** XXVI Eesti keemiapäevad : teaduskonverentsi ettekannete referaadid = 26th Estonian Chemistry Days : abstracts of scientific conference 2000 / lk. 154

Vedelatest sooladest

Koel, Mihkel Horisont 2009 / 1, lk. 8 : portr https://artiklid.elnet.ee/record=b1068892*est

When can ionic liquids be considered readily biodegradable? Biodegradation pathways of pyridinium, pyrrolidinium and ammonium-based ionic liquids

Deng, Y.; Beadham, I.; Ghavre, Mukund; Costa Gomes, M. F.; **Gathergood, Nicholas** Green chemistry 2015 / p. 1479-1491 : ill <http://dx.doi.org/10.1039/C4GC01904K>