

Formation of corrosion products on zinc in wet supercritical and subcritical CO₂ : In-situ spectroscopic study. / Kaleva, A.; Tassaing, T.; Saarimaa, V.; Le Bourdon, G.; Väisänen, P.; Markkula, A.; Levänen, E.
In: Corrosion Science, Vol. 174, 01.09.2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Optimization of photogenerated charge carrier lifetimes in ald grown tio₂ for photonic applications. / Khan, Ramsha; Ali-Löyty, Harri; Saari, Jesse; Valden, Mika; Tukiainen, Antti; Lahtonen, Kimmo; Tkachenko, Nikolai V.
In: Nanomaterials, Vol. 10, No. 8, 1567, 10.08.2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Nucleation and growth behavior of Er³⁺ doped oxyfluorophosphate glasses. / Ojha, N.; Szczodra, A.; Boetti, N. G.; Massera, J.; Petit, L.

In: RSC Advances, Vol. 10, No. 43, 07.07.2020, p. 25703-25716.

Research output: Contribution to journal › Article › Scientific › peer-review

Additive manufacturing of monolithic supercapacitors with biopolymer separator. / Arvani, Maedeh; Keskinen, Jari; Railanmaa, Anna; Siljander, Sanna; Björkqvist, Tomas; Tuukkanen, Sampo; Lupo, Donald.

In: Journal of Applied Electrochemistry, Vol. 50, No. 6, 01.06.2020, p. 689-697.

Research output: Contribution to journal › Article › Scientific › peer-review

Utilizing Gelatinized Starchy Waste from Rice Noodle Factory as Substrate for L(+)-Lactic Acid Production by Amyolytic Lactic Acid Bacterium Enterococcus faecium K-1. / Unban, Kridsada; Khanongnuch, Ramita; Kanpiengjai, Apinun; Shetty, Kalidas; Khanongnuch, Chartchai.

In: Applied Biochemistry and Biotechnology, 05.2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Evaluation of scaffold microstructure and comparison of cell seeding methods using micro-computed tomography-based tools. / Palmroth, Aleks; Pitkänen, Sanna; Hannula, Markus; Paakinaho, Kaarlo; Hyttinen, Jari; Miettinen, Susanna; Kellomäki, Minna.

In: Journal of the Royal Society. Interface, Vol. 17, No. 165, 20200102, 01.04.2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Utilizing Neurons for Digital Logic Circuits : A Molecular Communications Analysis. / Adonias, Geoffly L.; Yastrebova, Anastasia; Barros, Michael Taynnan; Koucheryavy, Yevgeni; Cleary, Frances; Balasubramaniam, Sasitharan.

In: IEEE Transactions on Nanobioscience, Vol. 19, No. 2, 01.04.2020, p. 224-236.

Research output: Contribution to journal › Article › Scientific › peer-review

Transparent Yb³⁺ doped phosphate glass-ceramics. / Hongisto, M.; Veber, A.; Boetti, N. G.; Danto, S.; Jubera, V.; Petit, L.

In: Ceramics International, 01.01.2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Investigation of well-defined pinholes in TiO₂ electron selective layers used in planar heterojunction perovskite solar cells. / Masood, Muhammad Talha; Qudsiya, Syeda; Hadadian, Mahboubeh; Weinberger, Christian; Nyman, Mathias; Ahläng, Christian; Dahlström, Staffan; Liu, Maning; Vivo, Paola; Österbacka, Ronald; Smätt, Jan Henrik.

In: Nanomaterials, Vol. 10, No. 1, 181, 2020.

Research output: Contribution to journal › Article › Scientific › peer-review

The thermal contact resistance of a steel-ceramic interface with oxide intermediates. / Silvonen, Jussi; Levänen, Erkki; Uusitalo, Mikko.

In: Cogent Engineering, Vol. 7, No. 1, 1720057, 2020.

Research output: Contribution to journal › Article › Scientific › peer-review

In-flight wind field identification and prediction of parafoil systems. / Gao, Haitao; Tao, Jin; Dehmer, Matthias; Emmert-Streib, Frank; Sun, Qinglin; Chen, Zengqiang; Xie, Guangming; Zhou, Quan.

In: Applied Sciences (Switzerland), Vol. 10, No. 6, 1958, 2020.

Research output: Contribution to journal › Article › Scientific › peer-review

Efficient Conversion of Light to Chemical Energy : Directional, Chiral Photoswitches with Very High Quantum Yields. / Moormann, Widukind; Tellkamp, Tobias; Stadler, Eduard; Röhricht, Fynn; Näther, Christian; Puttreddy, Rakesh; Rissanen, Kari; Gescheidt, Georg; Herges, Rainer.
In: *Angewandte Chemie - International Edition*, Vol. 59, No. 35, 2020, p. 15081-15086.
Research output: Contribution to journal › Article › Scientific › peer-review

Modelling of a pressure swing adsorption unit by deep learning and artificial intelligence tools. / Oliveira, Luís Miguel Cunha; Koivisto, Hannu; Iwakiri, Igor G.I.; Loureiro, José M.; Ribeiro, Ana M.; Nogueira, Idelfonso B.R.
In: *Chemical Engineering Science*, Vol. 224, 115801, 2020.
Research output: Contribution to journal › Article › Scientific › peer-review

CFD modeling the diffusional losses of nanocluster-sized particles and condensing vapors in 90° bends of circular tubes. / Olin, Miska; Dal Maso, Miikka.
In: *Journal of Aerosol Science*, Vol. 150, 105618, 2020.
Research output: Contribution to journal › Article › Scientific › peer-review

Kinetics and modelling of thiosulphate biotransformations by haloalkaliphilic *Thioalkalivibrio versutus*. / Hajdu-Rahkama, Réka; Özkaya, Bestamin; Lakaniemi, Aino Maija; Puhakka, Jaakko A.
In: *Chemical Engineering Journal*, Vol. 401, 126047, 2020.
Research output: Contribution to journal › Article › Scientific › peer-review

Power production and microbial community composition in thermophilic acetate-fed up-flow and flow-through microbial fuel cells. / Dessì, Paolo; Chatterjee, Pritha; Mills, Simon; Kokko, Marika; Lakaniemi, Aino-Maija; Collins, Gavin; Lens, Piet N.L.
In: *Bioresource Technology*, Vol. 294, 122115, 01.12.2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Transcription closed and open complex formation coordinate expression of genes with a shared promoter region. / Häkkinen, Antti; Oliveira, Samuel M.D.; Neeli-Venkata, Ramakanth; Ribeiro, Andre S.
In: *Journal of the Royal Society Interface*, Vol. 16, No. 161, 20190507, 01.12.2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Effects of elevated pressures on the activity of acidophilic bioleaching microorganisms. / Hajdu-Rahkama, Réka; Ahoranta, Sarita; Lakaniemi, Aino-Maija; Puhakka, Jaakko A.
In: *Biochemical Engineering Journal*, Vol. 150, 107286, 15.10.2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Controlled Orientations of Neighboring Tetracene Units by Mixed Self-Assembled Monolayers on Gold Nanoclusters for High-Yield and Long-Lived Triplet Excited States through Singlet Fission. / Saegusa, Toshiyuki; Sakai, Hayato; Nagashima, Hiroki; Kobori, Yasuhiro; Tkachenko, Nikolai V.; Hasobe, Taku.
In: *Journal of the American Chemical Society*, Vol. 141, No. 37, 18.09.2019, p. 14720-14727.
Research output: Contribution to journal › Article › Scientific › peer-review

Effects of anode materials on electricity production from xylose and treatability of TMP wastewater in an up-flow microbial fuel cell. / Haavisto, Johanna; Dessì, Paolo; Chatterjee, Pritha; Honkanen, Mari; Noori, Md Tabish; Kokko, Marika; Lakaniemi, Aino Maija; Lens, Piet N.L.; Puhakka, Jaakko A.
In: *Chemical Engineering Journal*, Vol. 372, 15.09.2019, p. 141-150.
Research output: Contribution to journal › Article › Scientific › peer-review

Multiresonant High-Q Plasmonic Metasurfaces. / Reshef, Orad; Saad-Bin-Alam, Md; Huttunen, Mikko J.; Carlow, Graham; Sullivan, Brian T.; Ménard, Jean Michel; Dolgaleva, Ksenia; Boyd, Robert W.
In: *Nano Letters*, Vol. 19, No. 9, 11.09.2019, p. 6429-6434.
Research output: Contribution to journal › Article › Scientific › peer-review

Shedding frequency in cavitation erosion evolution tracking. / Ylönen, Markku; Franc, Jean Pierre; Miettinen, Juha; Saarenrinne, Pentti; Fivel, Marc.

In: *International Journal of Multiphase Flow*, Vol. 118, 01.09.2019, p. 141-149.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Influence of ions to modulate hydrazone and oxime reaction kinetics to obtain dynamically cross-linked hyaluronic acid hydrogels. / Wang, Shujiang; Nawale, Ganesh N.; Oommen, Oommen P.; Hilborn, Jöns; Varghese, Oommen P.

In: *Polymer Chemistry*, Vol. 10, No. 31, 21.08.2019, p. 4322-4327.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Chlorine induced high-temperature corrosion mechanisms in HVOF and HVOF sprayed Cr₃C₂-based hardmetal coatings. / Fantozzi, Davide; Matikainen, Ville; Uusitalo, Mikko; Koivuluoto, Heli; Vuoristo, Petri.

In: *Corrosion Science*, 14.08.2019.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Characterisation and in vitro and in vivo evaluation of supercritical-CO₂-foamed β-TCP/PLCL composites for bone applications. / Pitkänen, S.; Paakinaho, K.; Pihlman, H.; Ahola, N.; Hannula, M.; Asikainen, S.; Manninen, M.; Morelius, M.; Keränen, P.; Hyttinen, J.; Kellomäki, M.; Laitinen-Vapaavuori, O.; Miettinen, S.

In: *European cells & materials*, Vol. 38, 05.08.2019, p. 35-50.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Photochemistry of dithiophosphate Ni(S₂P(i-Bu)₂)₂ complex in CCl₄. Transient species and TD-DFT calculations. / Solovyev, Aleksey I.; Mikheyli, Aleksandr V.; Plyushin, Victor F.; Shubin, Aleksandr A.; Grivin, Vjacheslav P.; Larionov, Stanislav V.; Tkachenko, Nikolai V.; Lemmetyinen, Helge.

In: *Journal of Photochemistry and Photobiology A: Chemistry*, Vol. 381, 111857, 01.08.2019.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Alkane and wax ester production from lignin-related aromatic compounds. / Salmela, Milla; Lehtinen, Tapio; Efimova, Elena; Santala, Suvi; Santala, Ville.

In: *Biotechnology and Bioengineering*, Vol. 116, No. 8, 01.08.2019, p. 1934-1945.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Observation of Coexistence of Yu-Shiba-Rusinov States and Spin-Flip Excitations. / Kezilebieke, Shawulienu; Žitko, Rok; Dvorak, Marc; Ojanen, Teemu; Liljeroth, Peter.

In: *Nano Letters*, Vol. 19, No. 7, 10.07.2019, p. 4614-4619.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

An architectural understanding of natural sway frequencies in trees. / Jackson, T.; Shenkin, A.; Moore, J.; Bunce, A.; van Emmerik, T.; Kane, B.; Burcham, D.; James, K.; Selker, J.; Calders, K.; Origo, N.; Disney, M.; Burt, A.; Wilkes, P.; Raunonen, P.; Gonzalez de Tanago Menaca, J.; Lau, A.; Herold, M.; Goodman, R. C.; Fourcaud, T.; Malhi, Y.

In: *Journal of the Royal Society. Interface*, Vol. 16, No. 155, 28.06.2019.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Tailoring Second-Harmonic Emission from (111)-GaAs Nanoantennas. / Sautter, Jürgen D.; Xu, Lei; Miroshnichenko, Andrey E.; Lysevych, Mykhaylo; Volkovskaya, Irina; Smirnova, Daria A.; Camacho-Morales, Rocio; Zangeneh Kamali, Khosro; Karouta, Fouad; Vora, Kaushal; Tan, Hoe H.; Kauranen, Martti; Staude, Isabelle; Jagadish, Chennupati; Neshev, Dragomir N.; Rahmani, Mohsen.

In: *Nano Letters*, Vol. 19, No. 6, 12.06.2019, p. 3905-3911.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Synthetic metabolic pathway for the production of 1-alkenes from lignin-derived molecules. / Luo, Jin; Lehtinen, Tapio; Efimova, Elena; Santala, Ville; Santala, Suvi.

In: *Microbial Cell Factories*, Vol. 18, No. 1, 48, 11.03.2019.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Mining tailings as raw materials for reaction-sintered aluminosilicate ceramics : Effect of mineralogical composition on microstructure and properties. / Karhu, Marjaana; Lagerbom, Juha; Solismaa, Soili; Honkanen, Mari; Ismailov, Arnold; Räsänen, Marja Liisa; Huttunen-Saarivirta, Elina; Levänen, Erkki; Kivikytö-Reponen, Päivi.

In: *Ceramics International*, Vol. 45, No. 4, 03.2019, p. 4840-4848.
Research output: Contribution to journal › Article › Scientific › peer-review

Solvent Welding and Imprinting Cellulose Nanofiber Films Using Ionic Liquids. / Reyes, Guillermo; Borghei, Maryam; King, Alistair W. T.; Lahti, Johanna; Rojas, Orlando J.
In: *Biomacromolecules*, Vol. 20, No. 1, 14.01.2019, p. 502-514.
Research output: Contribution to journal › Article › Scientific › peer-review

Kinetics and thermochemistry of the reaction of 3-methylpropargyl radical with molecular oxygen. / Pekkanen, Timo T.; Timonen, Raimo S.; Lendvay, György; Rissanen, Matti P.; Eskola, Arkke J.
In: *PROCEEDINGS OF THE COMBUSTION INSTITUTE*, Vol. 37, No. 1, 01.01.2019, p. 299-306.
Research output: Contribution to journal › Article › Scientific › peer-review

A Pentacene-based Nanotube Displaying Enriched Electrochemical and Photochemical Activities. / Kuroda, Kiyonori; Yazaki, Kohei; Tanaka, Yuya; Akita, Munetaka; Sakai, Hayato; Hasobe, Taku; Tkachenko, Nikolai V.; Yoshizawa, Michito.
In: *Angewandte Chemie - International Edition*, Vol. 58, No. 4, 01.2019, p. 1115-1119.
Research output: Contribution to journal › Article › Scientific › peer-review

Cost-optimal energy performance measures in a new daycare building in cold climate. / Sankelo, Paula; Jokisalo, Juha; Nyman, Jonathan; Vinha, Juha; Sirén, Kai.
In: *International Journal of Sustainable Energy*, Vol. 38, No. 2, 2019, p. 104-122.
Research output: Contribution to journal › Article › Scientific › peer-review

Textile-integrated three-dimensional printed and embroidered structures for wearable wireless platforms. / He, Han; Chen, Xiaochen; Ukkonen, Leena; Virkki, Johanna.
In: *Textile Research Journal*, Vol. 89, No. 4, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Reliability evaluation of wearable radio frequency identification tags : Design and fabrication of a two-part textile antenna. / Chen, Xiaochen; Ukkonen, Leena; Virkki, Johanna.
In: *Textile Research Journal*, Vol. 89, No. 4, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Towards the EU emissions targets of 2050 : optimal energy renovation measures of Finnish apartment buildings. / Hirvonen, Janne; Jokisalo, Juha; Heljo, Juhani; Kosonen, Risto.
In: *International Journal of Sustainable Energy*, Vol. 38, No. 7, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Effect of apartment building energy renovation on hourly power demand. / Hirvonen, Janne; Jokisalo, Juha; Heljo, Juhani; Kosonen, Risto.
In: *International Journal of Sustainable Energy*, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Volatile fatty acid adsorption on anion exchange resins : kinetics and selective recovery of acetic acid. / Eregowda, Tejaswini; Rene, Eldon R.; Rintala, Jukka; Lens, Piet N.L.
In: *Separation Science and Technology (Philadelphia)*, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

Quality and Capacity Analysis of Molecular Communications in Bacterial Synthetic Logic Circuits. / Martins, Daniel P.; Barros, Michael Taynnan; Balasubramaniam, Sasitharan.
In: *IEEE Transactions on Nanobioscience*, 2019.
Research output: Contribution to journal › Article › Scientific › peer-review

High-speed production of antibacterial fabrics using liquid flame spray. / Brobbey, Kofi Jocelyn; Haapanen, Janne; Tuominen, Mikko; Mäkelä, Jyrki; Gunell, Marianne; Eerola, Erkki; Saarinen, Jarkko J.; Toivakka, Martti.
In: *Textile Research Journal*, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

Activity Level and Body Mass Index as Predictors of Physical Workload During Working Career. / Mänttari, Satu K.; Oksa, Juha A.H.; Virkkala, Jussi; Pietilä, Julia A.K.

In: Safety and Health at Work, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

Structure and Dynamics of Thermosensitive pDNA Polyplexes Studied by Time-Resolved Fluorescence Spectroscopy. /

Fliervoet, Lies A.L.; Lisitsyna, Ekaterina S.; Durandin, Nikita A.; Kotsis, Ilias; Maas-Bakker, Roel F.M.; Yliperttula, Marjo; Hennink, Wim E.; Vuorimaa-Laukkanen, Elina; Vermonden, Tina.

In: Biomacromolecules, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

Large-scale efficient water harvesting using bioinspired micro-patterned copper oxide nanoneedle surfaces and guided droplet transport. / Sharma, Vipul; Yiannacou, Kyriacos; Karjalainen, Markus; Lahtonen, Kimmo; Valden, Mika; Sariola, Veikko.

In: Nanoscale Advances, Vol. 1, No. 10, 2019, p. 4025-4040.

Research output: Contribution to journal › Article › Scientific › peer-review

Mechanical impact stimulation platform tailored for high-resolution light microscopy. / Halonen, Heidi T.; Hyttinen, Jari A.K.; Ihalainen, Teemu O.

In: HEALTH AND TECHNOLOGY, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

Deposition of dry particles on a fin-and-tube heat exchanger by a coupled soft-sphere DEM and CFD. / Välikangas, Turo; Hærvig, Jakob; Kuuluvainen, Heino; Dal Maso, Miikka; Peltonen, Petteri; Vuorinen, Ville.

In: International Journal of Heat and Mass Transfer, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

Synergistic Computational-Experimental Discovery of Highly Selective PtCu Nanocluster Catalysts for Acetylene Semihydrogenation. / Ayodele, Olumide Bolarinwa; Cai, Rongsheng; Wang, Jianguang; Ziouani, Yasmine; Liang, Zhifu; Spadaro, Maria Chiara; Kovnir, Kirill; Arbiol, Jordi; Akola, Jaakko; Palmer, Richard E.; Kolen'Ko, Yury V.

In: ACS CATALYSIS, 2019, p. 451-457.

Research output: Contribution to journal › Article › Scientific › peer-review

Characterization of the anisotropic deformation of the right ventricle during open heart surgery. / Soltani, A.; Lahti, J.; Järvelä, K.; Laurikka, J.; Kuokkala, V. T.; Hokka, M.

In: COMPUTER METHODS IN BIOMECHANICS AND BIOMEDICAL ENGINEERING, 2019.

Research output: Contribution to journal › Article › Scientific › peer-review

How well can we predict cluster fragmentation inside a mass spectrometer? / Passananti, Monica; Zapadinsky, Evgeni; Zanca, Tommaso; Kangasluoma, Juha; Mylly, Nanna; Rissanen, Matti P.; Kurtén, Theo; Ehn, Mikael; Attoui, Michel; Vehkamäki, Hanna.

In: Chemical Communications, Vol. 55, No. 42, 2019, p. 5946-5949.

Research output: Contribution to journal › Article › Scientific › peer-review

Less Is More : Enhancement of Second-Harmonic Generation from Metasurfaces by Reduced Nanoparticle Density. /

Czaplicki, Robert; Kiviniemi, Antti; Huttunen, Mikko J.; Zang, Xiaorun; Stolt, Timo; Vartiainen, Ismo; Butet, Jérémy; Kuitinen, Markku; Martin, Olivier J.F.; Kauranen, Martti.

In: Nano Letters, Vol. 18, No. 12, 12.12.2018, p. 7709-7714.

Research output: Contribution to journal › Article › Scientific › peer-review

Dynamic decoupling of biomass and wax ester biosynthesis in *Acinetobacter baylyi* by an autonomously regulated switch. / Santala, Suvu; Efimova, Elena; Santala, Ville.

In: Metabolic Engineering Communications, Vol. 7, e00078, 01.12.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

The importance of controlled mismatch of biomechanical compliances of implantable scaffolds and native tissue for articular cartilage regeneration. / Gasik, Michael; Zühlke, Alexandra; Haaparanta, Anne-Marie; Muhonen, Virpi; Laine, Kaisa; Bilotsky, Yevgen; Kellomäki, Minna; Kiviranta, Ilkka.

In: *Frontiers in Bioengineering and Biotechnology*, Vol. 6, No. NOV, 187, 30.11.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Aminobenzylated 4-Nitrophenols as Antibacterial Agents Obtained from 5-Nitrosalicylaldehyde through a Petasis Borono-Mannich Reaction. / Rimpiläinen, Tatu; Andrade, Joana; Nunes, Alexandra; Ntungwe, Epole; Fernandes, Ana S.; Vale, Joao R.; Rodrigues, Joao; Gomes, Joao Paulo; Rijo, Patricia; Candeias, Nuno R.

In: *ACS Omega*, Vol. 3, No. 11, 29.11.2018, p. 16191-16202.

Research output: Contribution to journal › Article › Scientific › peer-review

High-Yield Generation of Triplet Excited States by an Efficient Sequential Photoinduced Process from Energy Transfer to Singlet Fission in Pentacene-Modified CdSe/ZnS Quantum Dots. / Sakai, Hayato; Inaya, Ryutarō; Tkachenko, Nikolai V.; Hasobe, Taku.

In: *Chemistry - A European Journal*, Vol. 24, No. 64, 16.11.2018, p. 17062-17071.

Research output: Contribution to journal › Article › Scientific › peer-review

Molecular-Scale Ligand Effects in Small Gold-Thiolate Nanoclusters. / Chevrier, Daniel M.; Raich, Luís; Rovira, Carme; Das, Anindita; Luo, Zhentao; Yao, Qiaofeng; Chatt, Amares; Xie, Jianping; Jin, Rongchao; Akola, Jaakko; Zhang, Peng.

In: *Journal of the American Chemical Society*, Vol. 140, No. 45, 14.11.2018, p. 15430-15436.

Research output: Contribution to journal › Article › Scientific › peer-review

Chromatographic studies of n-Propyl Propionate : Adsorption equilibrium, modelling and uncertainties determination. / Nogueira, Idelfonso B.R.; Faria, Rui P.V.; Requião, Reiner; Koivisto, Hannu; Martins, Márcio A.F.; Rodrigues, Alírio E.; Loureiro, José M.; Ribeiro, Ana M.

In: *Computers and Chemical Engineering*, Vol. 119, 02.11.2018, p. 371-382.

Research output: Contribution to journal › Article › Scientific › peer-review

Tribocorrosion behaviour of aluminium bronze in 3.5 wt.% NaCl solution. / Huttunen-Saarivirta, E.; Isotahdon, E.; Metsäjoki, J.; Salminen, T.; Carpén, L.; Ronkainen, H.

In: *Corrosion Science*, Vol. 144, 01.11.2018, p. 207-223.

Research output: Contribution to journal › Article › Scientific › peer-review

Novel osteoconductive β -tricalcium phosphate/poly(L-lactide-co-e-caprolactone) scaffold for bone regeneration : a study in a rabbit calvarial defect. / Pihlman, Hanna; Keränen, Pauli; Paakinaho, Kaarlo; Linden, Jere; Hannula, Markus; Manninen, Iida Kaisa; Hyttinen, Jari; Manninen, Mikko; Laitinen-Vapaavuori, Outi.

In: *Journal of Materials Science: Materials in Medicine*, Vol. 29, No. 10, 156, 01.10.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Molecular Communications Pulse-based Jamming Model for Bacterial Biofilm Suppression. / Martins, Daniel P.; Leetanasaksakul, Kantinan; Barros, Michael Taynnan; Thamchaipenet, Arinthip; Donnelly, William; Balasubramaniam, Sasitharan.

In: *IEEE Transactions on Nanobioscience*, Vol. 17, No. 4, 10.2018, p. 533-542.

Research output: Contribution to journal › Article › Scientific › peer-review

Temperature control as key factor for optimal biohydrogen production from thermomechanical pulping wastewater. / Dessì, Paolo; Porca, Estefania; Lakaniemi, Aino-Maija; Collins, Gavin; Lens, Piet N.L.

In: *Biochemical Engineering Journal*, Vol. 137, 15.09.2018, p. 214-221.

Research output: Contribution to journal › Article › Scientific › peer-review

Electro-concentration for chemical-free nitrogen capture as solid ammonium bicarbonate. / Jermakka, Johannes; Thompson Brewster, Emma; Ledezma, Pablo; Freguia, Stefano.

In: *Separation and Purification Technology*, Vol. 203, 12.09.2018, p. 48-55.

Research output: Contribution to journal › Article › Scientific › peer-review

Performance of a biotrickling filter for the anaerobic utilization of gas-phase methanol coupled to thiosulphate reduction and resource recovery through volatile fatty acids production. / Eregowda, Tejaswini; Matanhike, Luck; Rene, Eldon R.; Lens, Piet N.L.

In: *Bioresource Technology*, Vol. 263, 01.09.2018, p. 591-600.

Research output: Contribution to journal › Article › Scientific › peer-review

Effects of pyrolysis temperature on the hydrologically relevant porosity of willow biochar. / Hyväluoma, Jari; Hannula, Markus; Arstila, Kai; Wang, Hailong; Kulju, Sampo; Rasa, Kimmo.

In: *Journal of Analytical and Applied Pyrolysis*, Vol. 134, 09.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Photoinduced Energy Transfer in ZnCdSeS Quantum Dot-Phthalocyanines Hybrids. / Mandal, Sadananda; Garcia Iglesias, Miguel; Ince, Mine; Torres, Tomás; Tkachenko, Nikolai V.

In: *ACS Omega*, Vol. 3, No. 8, 31.08.2018, p. 10048-10057.

Research output: Contribution to journal › Article › Scientific › peer-review

A new method to optimize natural convection heat sinks. / Lampio, K.; Karvinen, R.

In: *Heat and Mass Transfer/Waerme- und Stoffuebertragung*, Vol. 54, No. 8, 08.2018, p. 2571-2580.

Research output: Contribution to journal › Article › Scientific › peer-review

Selenate removal in biofilm systems : Effect of nitrate and sulfate on selenium removal efficiency, biofilm structure and microbial community. / Tan, Lea Chua; Espinosa-Ortiz, Erika J.; Nancharaiah, Yarlagadda V.; van Hullebusch, Eric D.; Gerlach, Robin; Lens, Piet Nl.

In: *Journal of Chemical Technology and Biotechnology*, Vol. 93, No. 8, 08.2018, p. 2380-2389.

Research output: Contribution to journal › Article › Scientific › peer-review

High Bending-Mode Sensitivity of Printed Piezoelectric Poly(vinylidene fluoride- co-trifluoroethylene) Sensors. / Rajala, Satu; Schouten, Martijn; Krijnen, Gijs; Tuukkanen, Sampo.

In: *ACS Omega*, Vol. 3, No. 7, 23.07.2018, p. 8067-8073.

Research output: Contribution to journal › Article › Scientific › peer-review

Fluid flow simulations meet high-speed video : Computer vision comparison of droplet dynamics. / Kulju, S.; Riegger, L.; Koltay, P.; Mattila, K.; Hyväluoma, J.

In: *Journal of Colloid and Interface Science*, Vol. 522, 15.07.2018, p. 48-56.

Research output: Contribution to journal › Article › Scientific › peer-review

Effect of surfactant type and sonication energy on the electrical conductivity properties of nanocellulose-CNT nanocomposite films. / Siljander, Sanna; Keinänen, Pasi; Rätty, Anna; Ramakrishnan, Karthik Ram; Tuukkanen, Sampo; Kunnari, Vesa; Harlin, Ali; Vuorinen, Jyrki; Kanerva, Mikko.

In: *International Journal of Molecular Sciences*, Vol. 19, No. 6, 1819, 20.06.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

The effect of carbon and nickel additions on the precursor synthesis of Cr₃C₂-Ni nanopowder. / Kaunisto, Kimmo; Kotilainen, Minna; Karhu, Marjaana; Lagerbom, Juha; Vuorinen, Tommi; Honkanen, Mari; Vippola, Minnamari; Turunen, Erja.

In: *Ceramics International*, Vol. 44, No. 8, 01.06.2018, p. 9338-9346.

Research output: Contribution to journal › Article › Scientific › peer-review

The effects of laser patterning 10CeTZP-Al₂O₃ nanocomposite disc surfaces : Osseous differentiation and cellular arrangement in vitro. / Goyos-Ball, Lidia; Prádo, Catuxa; Díaz, Raquel; Fernández, Elisa; Ismailov, Arnold; Kumpulainen, Tero; Levänen, Erkki; Torrecillas, Ramón; Fernández, Adolfo.

In: *Ceramics International*, Vol. 44, No. 8, 06.2018, p. 9472-9478.

Research output: Contribution to journal › Article › Scientific › peer-review

Influence of the phosphate glass melt on the corrosion of functional particles occurring during the preparation of glass-ceramics. / Ojha, N.; Laihin, T.; Salminen, T.; Lastusaari, M.; Petit, L.

In: *Ceramics International*, Vol. 44, No. 10, 06.2018, p. 11807-11811.

Research output: Contribution to journal › Article › Scientific › peer-review

Effect of Co-Adsorbate and Hole Transporting Layer on the Photoinduced Charge Separation at the TiO₂-Phthalocyanine Interface. / Virkki, Kirsi; Tervola, Essi; Medel, Maria; Torres, Tomás; Tkachenko, Nikolai V.

In: *ACS Omega*, Vol. 3, No. 5, 31.05.2018, p. 4947-4958.

Research output: Contribution to journal › Article › Scientific › peer-review

A Ceramide-Regulated Element in the Late Endosomal Protein LAPT4B Controls Amino Acid Transporter Interaction. / Zhou, Kecheng; Dichlberger, Andrea; Martinez-Seara, Hector; Nyholm, Thomas K.M.; Li, Shiqian; Kim, Young Ah; Vattulainen, Ilpo; Ikonen, Elina; Blom, Tomas.

In: *ACS Central Science*, Vol. 4, No. 5, 23.05.2018, p. 548-558.

Research output: Contribution to journal › Article › Scientific › peer-review

Wet etching of dilute nitride GaInNAs, GaInNAsSb, and GaNAsSb alloys lattice-matched to GaAs. / Raappana, Marianna; Polojärvi, Ville; Aho, Arto; Mäkelä, Jaakko; Aho, Timo; Tukiainen, Antti; Laukkanen, Pekka; Guina, Mircea.

In: *Corrosion Science*, Vol. 136, 15.05.2018, p. 268-274.

Research output: Contribution to journal › Article › Scientific › peer-review

Switchable light reflectance in dilute magneto-optical colloids based on nickel ferrite nanowires. / Sutka, Andris; Timusk, Martin; Joost, Urmis; Ignatans, Reinis; Maiorov, Mikhail.

In: *e-Journal of Surface Science and Nanotechnology*, Vol. 16, 02.05.2018, p. 119-121.

Research output: Contribution to journal › Article › Scientific › peer-review

Characteristics of nFOG, an aerosol-based wet thin film coating technique. / Harra, Juha; Tuominen, Mikko; Juuti, Paxton; Rissler, Jenny; Koivuluoto, Heli; Haapanen, Janne; Niemelä-Anttonen, Henna; Stenroos, Christian; Teisala, Hannu; Lahti, Johanna; Kuusipalo, Jurkka; Vuoristo, Petri; Mäkelä, Jyrki M.

In: *Journal of Coatings Technology Research*, Vol. 15, No. 3, 05.2018, p. 623-632.

Research output: Contribution to journal › Article › Scientific › peer-review

Membrane bound COMT isoform is an interfacial enzyme : General mechanism and new drug design paradigm. /

Magarkar, Aniket; Parkkila, Petteri; Viitala, Tapani; Lajunen, Tatu; Mobarak, Edouard; Licari, Giuseppe; Cramariuc, Oana; Vauthey, Eric; Róg, Tomasz; Bunker, Alex.

In: *Chemical Communications*, Vol. 54, No. 28, 11.04.2018, p. 3440-3443.

Research output: Contribution to journal › Article › Scientific › peer-review

Uncertainty in multispectral lidar signals caused by incidence angle effects. / Kaasalainen, Sanna; Åkerblom, Markku; Nevalainen, Olli; Hakala, Teemu; Kaasalainen, Mikko.

In: *Interface Focus*, Vol. 8, No. 2, 20170033, 06.04.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Non-intersecting leaf insertion algorithm for tree structure models. / Åkerblom, Markku; Raunonen, Pasi; Casella, Eric; Disney, Mathias I.; Danson, F. Mark; Gaulton, Rachel; Schofield, Lucy A.; Kaasalainen, Mikko.

In: *Interface Focus*, Vol. 8, No. 2, 20170045, 06.04.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Weighing trees with lasers : Advances, challenges and opportunities. / Disney, M. I.; Boni Vicari, M.; Burt, A.; Calders, K.; Lewis, S. L.; Raunonen, P.; Wilkes, P.

In: *Interface Focus*, Vol. 8, No. 2, 20170048, 06.04.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Aqueous synthesis of Z-scheme photocatalyst powders and thin-film photoanodes from earth abundant elements. / Šutka, A.; Vanags, M.; Joost, U.; Šmits, K.; Ruža, J.; Ločs, J.; Kleperis, J.; Juhna, T.

In: *Journal of Environmental Chemical Engineering*, Vol. 6, No. 2, 01.04.2018, p. 2606-2615.

Research output: Contribution to journal › Article › Scientific › peer-review

Soft hydrazone crosslinked hyaluronan- and alginate-based hydrogels as 3D supportive matrices for human pluripotent stem cell-derived neuronal cells. / Karvinen, Jennika; Joki, Tiina; Ylä-Outinen, Laura; Koivisto, Janne T.; Narkilahti, Susanna; Kellomäki, Minna.

In: *Reactive and Functional Polymers*, Vol. 124, 01.03.2018, p. 29-39.

Research output: Contribution to journal › Article › Scientific › peer-review

Improved Stability of Atomic Layer Deposited Amorphous TiO₂ Photoelectrode Coatings by Thermally Induced Oxygen Defects. / Hannula, Markku; Ali-Löytty, Harri; Lahtonen, Kimmö; Sarlin, Essi; Saari, Jesse; Valden, Mika.

In: *Chemistry of Materials*, Vol. 30, No. 4, 27.02.2018, p. 1199-1208.

Research output: Contribution to journal › Article › Scientific › peer-review

Improved fatty aldehyde and wax ester production by overexpression of fatty acyl-CoA reductases. / Lehtinen, Tapio; Efimova, Elena; Santala, Suvi; Santala, Ville.

In: *Microbial Cell Factories*, Vol. 17, No. 1, 19, 08.02.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Design, synthesis, and structure-property relationships of Er³⁺-doped TiO₂ luminescent particles synthesized by sol-gel. / Lopez-Iscoa, Pablo; Pugliese, Diego; Boetti, Nadia G.; Janner, Davide; Baldi, Giovanni; Petit, Laetitia; Milanese, Daniel.

In: *Nanomaterials*, Vol. 8, No. 1, 20, 02.01.2018.

Research output: Contribution to journal › Article › Scientific › peer-review

Upconversion from fluorophosphate glasses prepared with NaYF₄:Er³⁺,Yb³⁺ nanocrystals. / Ojha, N.; Tuomisto, M.; Lastusaari, M.; Petit, L.

In: *RSC Advances*, Vol. 8, No. 34, 01.01.2018, p. 19226-19236.

Research output: Contribution to journal › Article › Scientific › peer-review

Conjugated Heat Transfer Simulation of a Fin-and-Tube Heat Exchanger. / Välikangas, Turo; Karvinen, Reijo.

In: *Heat Transfer Engineering*, Vol. 39, No. 13-14, 2018, p. 1192-1200.

Research output: Contribution to journal › Article › Scientific › peer-review

Adsorption of furfural from torrefaction condensate using torrefied biomass. / Doddapaneni, Tharaka Rama Krishna C.; Jain, Rohan; Praveenkumar, Ramasamy; Rintala, Jukka; Romar, Henrik; Kontinen, Jukka.

In: *Chemical Engineering Journal*, Vol. 334, 2018, p. 558-568.

Research output: Contribution to journal › Article › Scientific › peer-review

Fin-and-tube heat exchanger enhancement with a combined herringbone and vortex generator design. / Välikangas, Turo; Singh, Shobhana; Sørensen, Kim; Condra, Thomas.

In: *International Journal of Heat and Mass Transfer*, Vol. 118, 2018, p. 602-616.

Research output: Contribution to journal › Article › Scientific › peer-review

Regeneration of sulfur-poisoned Pd-based catalyst for natural gas oxidation. / Honkanen, Mari; Wang, Jianguang; Kärkkäinen, Marja; Huuhtanen, Mika; Jiang, Hua; Kallinen, Kauko; Keiski, Riitta L.; Akola, Jaakko; Vippola, Minnamari.

In: *Journal of Catalysis*, Vol. 358, 2018, p. 253-265.

Research output: Contribution to journal › Article › Scientific › peer-review

Composition and role of the attached and planktonic microbial communities in mesophilic and thermophilic xylose-fed microbial fuel cells. / Dessi, Paolo; Porca, Estefania; Haavisto, Johanna; Lakaniemi, Aino-Maija; Collins, Gavin; Lens, Piet N.L.

In: *RSC Advances*, Vol. 8, No. 6, 2018, p. 3069-3080.

Research output: Contribution to journal › Article › Scientific › peer-review

Decomposition of persistent luminescent microparticles in corrosive phosphate glass melt. / Ojha, N.; Nguyen, H.; Laihin, T.; Salminen, T.; Lastusaari, M.; Petit, L.

In: *Corrosion Science*, Vol. 135, 2018, p. 207-214.

Research output: Contribution to journal › Article › Scientific › peer-review

Effect of N/S ratio on anoxic thiosulfate oxidation in a fluidized bed reactor : Experimental and artificial neural network model analysis. / Khanongnuch, Ramita; Di Capua, Francesco; Lakaniemi, Aino-Maija; Rene, Eldon R.; Lens, Piet N.L.
In: Process Biochemistry, Vol. 68, 2018, p. 171-181.

Research output: Contribution to journal > Article > Scientific > peer-review

Efficient photon upconversion at remarkably low annihilator concentrations in a liquid polymer matrix: when less is more. / Durandin, Nikita A.; Isokuortti, Jussi; Efimov, Alexander; Vuorimaa-Laukkanen, Elina; Tkachenko, Nikolai V.; Laaksonen, Timo.

In: Chemical Communications, Vol. 54, No. 99, 2018, p. 14029-14032.

Research output: Contribution to journal > Article > Scientific > peer-review

Bioactive glass induced osteogenic differentiation of human adipose stem cells is dependent on cell attachment mechanism and mitogen-activated protein kinases. / Ojansivu, M.; Wang, X.; Hyväri, L.; Kellomäki, M.; Hupa, L.; Vanhatupa, S.; Miettinen, S.

In: European Cells and Materials, Vol. 35, 2018, p. 53-71.

Research output: Contribution to journal > Article > Scientific > peer-review

Deactivation of Pt/SiO₂-ZrO₂ diesel oxidation catalysts by sulphur, phosphorus and their combinations. / Väliheikki, Ari; Kärkkäinen, Marja; Honkanen, Mari; Heikkinen, Olli; Kolli, Tanja; Kallinen, Kauko; Huuhtanen, Mika; Vippola, Minnamari; Lahtinen, Jouko; Keiski, Riitta L.

In: Applied Catalysis B-Environmental, Vol. 218, 05.12.2017, p. 409-419.

Research output: Contribution to journal > Article > Scientific > peer-review

Photodynamic self-disinfecting surface using pyridinium phthalocyanine. / George, Lijo; Müller, Alexander; Röder, Beate; Santala, Ville; Efimov, Alexander.

In: Dyes and Pigments, Vol. 147, 01.12.2017, p. 334-342.

Research output: Contribution to journal > Article > Scientific > peer-review

Oxygen and water vapor transmission rates of starch-poly(vinyl alcohol) barrier coatings for flexible packaging paper. / Christophliemk, Hanna; Johansson, Caisa; Ullsten, Henrik; Järnström, Lars.

In: Progress in Organic Coatings, Vol. 113, 01.12.2017, p. 218-224.

Research output: Contribution to journal > Article > Scientific > peer-review

Production of long chain alkyl esters from carbon dioxide and electricity by a two-stage bacterial process. / Lehtinen, Tapio; Efimova, Elena; Tremblay, Pier Luc; Santala, Suvi; Zhang, Tian; Santala, Ville.

In: Bioresource Technology, Vol. 243, 01.11.2017, p. 30-36.

Research output: Contribution to journal > Article > Scientific > peer-review

DoGlycans-Tools for Preparing Carbohydrate Structures for Atomistic Simulations of Glycoproteins, Glycolipids, and Carbohydrate Polymers for GROMACS. / Danne, Reinis; Poojari, Chetan; Martinez-Seara, Hector; Rissanen, Sami; Lolicato, Fabio; Róg, Tomasz; Vattulainen, Ilpo.

In: Journal of Chemical Information and Modeling, Vol. 57, No. 10, 23.10.2017, p. 2401-2406.

Research output: Contribution to journal > Article > Scientific > peer-review

Starch-poly(vinyl alcohol) barrier coatings for flexible packaging paper and their effects of phase interactions. /

Christophliemk, Hanna; Ullsten, Henrik; Johansson, Caisa; Järnström, Lars.

In: Progress in Organic Coatings, Vol. 111, 01.10.2017, p. 13-22.

Research output: Contribution to journal > Article > Scientific > peer-review

New Evidence for the Mechanism of Action of a Type-2 Diabetes Drug Using a Magnetic Bead-Based Automated Biosensing Platform. / Uddin, Rokon; Nur-E-Habiba, N.; Rena, Graham; Hwu, En Te; Boisen, Anja.

In: ACS Sensors, Vol. 2, No. 9, 22.09.2017, p. 1329-1336.

Research output: Contribution to journal > Article > Scientific > peer-review

Membrane Binding of Recoverin : From Mechanistic Understanding to Biological Functionality. / Timr, Štěpán; Pleskot, Roman; Kadlec, Jan; Kohagen, Miriam; Magarkar, Aniket; Jungwirth, Pavel.
In: ACS Central Science, Vol. 3, No. 8, 23.08.2017, p. 868-874.
Research output: Contribution to journal › Article › Scientific › peer-review

Exhaust emissions of non-road mobile machine : Real-world and laboratory studies with diesel and HVO fuels. / Pirjola, L.; Rönkkö, T.; Saukko, E.; Parviainen, H.; Malinen, A.; Alanen, J.; Saveljeff, H.
In: Fuel, Vol. 202, 15.08.2017, p. 154-164.
Research output: Contribution to journal › Article › Scientific › peer-review

Effects of different nickel species on autotrophic denitrification driven by thiosulfate in batch tests and a fluidized-bed reactor. / Di Capua, Francesco; Milone, Ivana; Lakaniemi, Aino-Maija; Hullebusch, Eric D.van; Lens, Piet N.L.; Esposito, Giovanni.
In: Bioresource Technology, Vol. 238, 01.08.2017, p. 534-541.
Research output: Contribution to journal › Article › Scientific › peer-review

Dissolution-induced nanowire synthesis on hot-dip galvanized surface in supercritical carbon dioxide. / Kaleva, Aaretti; Saarimaa, Ville; Heinonen, Saara; Nikkanen, Juha-Pekka; Markkula, Antti; Väisänen, Pasi; Levänen, Erkki.
In: Nanomaterials, Vol. 7, No. 7, 181, 11.07.2017.
Research output: Contribution to journal › Article › Scientific › peer-review

The effects of calcium and potassium on CO₂ gasification of birch wood in a fluidized bed. / Kramb, Jason; Gómez-Barea, Alberto; DeMartini, Nikolai; Romar, Henrik; Doddapaneni, Tharaka Rama K. C.; Konttinen, Jukka.
In: Fuel, Vol. 196, 15.05.2017, p. 398-407.
Research output: Contribution to journal › Article › Scientific › peer-review

Electron microscopic studies of natural gas oxidation catalyst – Effects of thermally accelerated aging on catalyst microstructure. / Honkanen, Mari; Hansen, Thomas W.; Jiang, Hua; Kärkkäinen, Marja; Huuhtanen, Mika; Heikkinen, Olli; Kallinen, Kauko; Lahtinen, Jouko; Keiski, Riitta L.; Wagner, Jakob B.; Vippola, Minnamari.
In: Journal of Catalysis, Vol. 349, 01.05.2017, p. 19-29.
Research output: Contribution to journal › Article › Scientific › peer-review

Bioamine-crosslinked gellan gum hydrogel for neural tissue engineering. / Koivisto, Janne T.; Joki, Tiina; Parraga, Jenny E.; Paakkönen, Rami; Ylä-Outinen, Laura; Salonen, Laura; Jönkkäri, Ilari; Peltola, Marja; Ihalainen, Teemu O.; Narkilahti, Susanna; Kellomäki, Minna.
In: Biomedical Materials, Vol. 12, No. 2, 025014, 24.03.2017.
Research output: Contribution to journal › Article › Scientific › peer-review

Calcium Directly Regulates Phosphatidylinositol 4,5-Bisphosphate Headgroup Conformation and Recognition. / Bilkova, Eva; Pleskot, Roman; Rissanen, Sami; Sun, Simou; Czogalla, Aleksander; Cwiklik, Lukasz; Róg, Tomasz; Vattulainen, Ilpo; Cremer, Paul S.; Jungwirth, Pavel; Coskun, Ünal.
In: Journal of the American Chemical Society, Vol. 139, No. 11, 22.03.2017, p. 4019-4024.
Research output: Contribution to journal › Article › Scientific › peer-review

Hierarchical Self-Assembly of Halogen-Bonded Block Copolymer Complexes into Upright Cylindrical Domains. / Milani, Roberto; Houbenov, Nikolay; Fernandez-Palacio, Francisco; Cavallo, Gabriella; Luzio, Alessandro; Haataja, Johannes; Giancane, Gabriele; Saccone, Marco; Priimägi, Arri; Metrangolo, Pierangelo; Ikkala, Olli.
In: Chem, Vol. 2, No. 3, 09.03.2017, p. 417-426.
Research output: Contribution to journal › Article › Scientific › peer-review

Benchmarking DFT methods with small basis sets for the calculation of halogen-bond strengths. / Siiskonen, Antti; Priimägi, Arri.
In: Journal of Molecular Modeling, Vol. 23, No. 2, 50, 01.02.2017.
Research output: Contribution to journal › Article › Scientific › peer-review

Biological removal of selenate and ammonium by activated sludge in a sequencing batch reactor. / Mal, J.; Nancharaiah, Y. V.; van Hullebusch, E. D.; Lens, P. N.L.

In: Bioresource Technology, Vol. 229, 2017, p. 11-19.

Research output: Contribution to journal > Article > Scientific > peer-review

Aligned Poly(ϵ -caprolactone) Nanofibers Guide the Orientation and Migration of Human Pluripotent Stem Cell-Derived Neurons, Astrocytes, and Oligodendrocyte Precursor Cells In Vitro. / Hyysalo, Anu; Ristola, Mervi; Joki, Tiina; Honkanen, Mari; Vippola, Minnamari; Narkilahti, Susanna.

In: MACROMOLECULAR BIOSCIENCE, Vol. 17, No. 7, 1600517, 2017.

Research output: Contribution to journal > Article > Scientific > peer-review

Two cations, two mechanisms : Interactions of sodium and calcium with zwitterionic lipid membranes. / Javanainen, Matti; Melcrová, Adéla; Magarkar, Aniket; Jurkiewicz, Piotr; Hof, Martin; Jungwirth, Pavel; Martinez-Seara, Hector.

In: Chemical Communications, Vol. 53, No. 39, 2017, p. 5380-5383.

Research output: Contribution to journal > Article > Scientific > peer-review

Supramolecular control of liquid crystals by doping with halogen-bonding dyes. / Vapaavuori, Jaana; Siiskonen, Antti; Dichiarante, Valentina; Forni, Alessandra; Saccone, Marco; Pilati, Tullio; Pellerin, Christian; Shishido, Atsushi; Metrangolo, Pierangelo; Priimagi, Arri.

In: RSC Advances, Vol. 7, No. 64, 2017, p. 40237-40242.

Research output: Contribution to journal > Article > Scientific > peer-review

Cultivation of *Scenedesmus acuminatus* in different liquid digestates from anaerobic digestion of pulp and paper industry biosludge. / Tao, Ran; Lakaniemi, Aino-Maija; Rintala, Jukka A.

In: Bioresource Technology, Vol. 245, No. A, 2017, p. 706-713.

Research output: Contribution to journal > Article > Scientific > peer-review

Dynamic response to process disturbances—A comparison between TMB/SMB models in transient regime. / Nogueira, Idelfonso B.R.; Ribeiro, Ana M.; Rodrigues, Alirio E.; Loureiro, José M.

In: Computers and Chemical Engineering, Vol. 99, 2017, p. 230-244.

Research output: Contribution to journal > Article > Scientific > peer-review

Particle emissions characterization from a medium-speed marine diesel engine with two fuels at different sampling conditions. / Ntziachristos, L.; Saukko, E.; Lehtoranta, K.; Rönkkö, T.; Timonen, H.; Simonen, P.; Karjalainen, P.; Keskinen, J.

In: Fuel, Vol. 186, 15.12.2016, p. 456-465.

Research output: Contribution to journal > Article > Scientific > peer-review

The effect of low-temperature pretreatment on the solubilization and biomethane potential of microalgae biomass grown in synthetic and wastewater media. / Kinnunen, V.; Rintala, J.

In: Bioresource Technology, Vol. 221, 01.12.2016, p. 78-84.

Research output: Contribution to journal > Article > Scientific > peer-review

Magnesium aminoclay enhances lipid production of mixotrophic *Chlorella* sp. KR-1 while reducing bacterial populations. / Kim, Bohwa; Praveenkumar, Ramasamy; Lee, Jiye; Nam, Bora; Kim, Dong Myung; Lee, Kyubock; Lee, Young Chul; Oh, You Kwan.

In: Bioresource Technology, Vol. 219, 01.11.2016, p. 608-613.

Research output: Contribution to journal > Article > Scientific > peer-review

Mild pressure induces rapid accumulation of neutral lipid (triacylglycerol) in *Chlorella* spp. / Ramasamy, Praveen; Kim, Bohwa; Lee, Jiye; Vijayan, Durairaj; Lee, Kyubock; Nam, Bora; Jeon, Sang Goo; Kim, Dong Myung; Oh, You Kwan.

In: Bioresource Technology, Vol. 220, 01.11.2016, p. 661-665.

Research output: Contribution to journal > Article > Scientific > peer-review

Grain orientation dependent Nb-Ti microalloying mediated surface segregation on ferritic stainless steel. / Ali-Löytty, Harri; Hannula, Markku; Honkanen, Mari; Östman, Kauko; Lahtonen, Kimmo; Valden, Mika.

In: Corrosion Science, Vol. 112, 11.2016, p. 204-213.

Research output: Contribution to journal > Article > Scientific > peer-review

Increased survival rate by local release of diclofenac in a murine model of recurrent oral carcinoma. / Will, Olga Maria; Purcz, Nicolai; Chalaris, Athena; Heneweer, Carola; Boretius, Susann; Purcz, Larissa; Nikkola, Lila; Ashammakhi, Nureddin; Kalthoff, Holger; Glüer, Claus Christian; Wiltfang, Jörg; Açil, Yahya; Tiwari, Sanjay.
In: International Journal of Nanomedicine, Vol. 11, 12.10.2016, p. 5311-5321.
Research output: Contribution to journal > Article > Scientific > peer-review

Elimination of arsenic-containing emissions from gasification of chromated copper arsenate wood. / Kramb, Jason; Konttinen, Jukka; Backman, Rainer; Salo, Kari; Roberts, Michael.
In: Fuel, Vol. 181, 01.10.2016, p. 319-324.
Research output: Contribution to journal > Article > Scientific > peer-review

Long-term stability of bioelectricity generation coupled with tetrathionate disproportionation. / Sulonen, Mira L K; Lakaniemi, Aino Maija; Kokko, Marika E.; Puhakka, Jaakko A.
In: Bioresource Technology, Vol. 216, 01.09.2016, p. 876-882.
Research output: Contribution to journal > Article > Scientific > peer-review

3D micro-nano structured hybrid scaffolds : An investigation into the role of nanofiber coating on viability, proliferation and differentiation of seeded mesenchymal stem cells. / Pilehrood, Mohammad Kazemi; Atashi, Amir; Sadeghi-Aliabadi, Hojjat; Nousiainen, Pertti; Harlin, Ali.
In: Journal Nanoscience and Nanotechnology, Vol. 16, No. 9, 01.09.2016, p. 9000-9007.
Research output: Contribution to journal > Article > Scientific > peer-review

Modeling of the catalytic effects of potassium and calcium on spruce wood gasification in CO₂. / Kramb, Jason; DeMartini, Nikolai; Perander, Magnus; Moilanen, Antero; Konttinen, Jukka.
In: Fuel Processing Technology, Vol. 148, 01.07.2016, p. 50-59.
Research output: Contribution to journal > Article > Scientific > peer-review

Hydrothermal carbonization of pulp mill streams. / Wikberg, Hanne; Ohra-aho, Taina; Honkanen, Mari; Kanerva, Heimo; Harlin, Ali; Vippola, Minnamari; Laine, Christiane.
In: Bioresource Technology, Vol. 212, 01.07.2016, p. 236-244.
Research output: Contribution to journal > Article > Scientific > peer-review

The influence of high-temperature sulfuric acid solution ageing on the properties of laminated vinyl-ester joints. / Lindgren, M.; Wallin, M.; Kakkonen, M.; Saarela, O.; Vuorinen, J.
In: International Journal of Adhesion and Adhesives, Vol. 68, 01.07.2016, p. 298-304.
Research output: Contribution to journal > Article > Scientific > peer-review

Spontaneous formation of three-dimensionally ordered Bi-rich nanostructures within GaAs_{1-x}Bi_x/GaAs quantum wells. / Luna, E.; Wu, M.; Hanke, M.; Puustinen, J.; Guina, M.; Trampert, A.
In: Nanotechnology, Vol. 27, No. 32, 325603, 01.07.2016.
Research output: Contribution to journal > Article > Scientific > peer-review

The Influence of Phosphorus Exposure on a Natural-Gas-Oxidation Catalyst. / Kärkkäinen, M.; Kolli, T.; Honkanen, M.; Heikkinen, O.; Väliheikki, A.; Huuhtanen, M.; Kallinen, K.; Lahtinen, J.; Vippola, M.; Keiski, R. L.
In: Topics in Catalysis, Vol. 59, No. 10-12, 01.07.2016, p. 1044-1048.
Research output: Contribution to journal > Article > Scientific > peer-review

Development of Magnetic Losses During Accelerated Corrosion Tests for Nd-Fe-B Magnets Used in Permanent Magnet Generators. / Isotahdon, Elisa; Huttunen-Saarivirta, Elina; Kuokkala, Veli-Tapani.
In: Corrosion, Vol. 72, No. 6, 01.06.2016, p. 732-741.
Research output: Contribution to journal > Article > Scientific > peer-review

Wetting hysteresis induced by temperature changes : Supercooled water on hydrophobic surfaces. / Heydari, Golrokh; Sedighi Moghaddam, Maziar; Tuominen, Mikko; Fielden, Matthew; Haapanen, Janne; Mäkelä, Jyrki M.; Claesson, Per M.
In: Journal of Colloid and Interface Science, Vol. 468, 15.04.2016, p. 21-33.

Research output: Contribution to journal › Article › Scientific › peer-review

Effect of heavy metal co-contaminants on selenite bioreduction by anaerobic granular sludge. / Mal, J.; Nancharaiah, Y. V.; van Hullebusch, E. D.; Lens, P. N. L.

In: *Bioresource Technology*, Vol. 206, 01.04.2016, p. 1-8.

Research output: Contribution to journal › Article › Scientific › peer-review

Metal chalcogenide quantum dots : Biotechnological synthesis and applications. / Mal, J.; Nancharaiah, Y. V.; Van Hullebusch, E. D.; Lens, P. N. L.

In: *RSC Advances*, Vol. 6, No. 47, 04.2016, p. 41477-41495.

Research output: Contribution to journal › Article › Scientific › peer-review

Human Adipose Stem Cells Differentiated on Braided Polylactide Scaffolds is a Potential Approach for Tendon Tissue Engineering. / Vuornos, Kaisa; Björninen, Miina; Talvitie, Elina; Paakinaho, Kaarlo; Kellomäki, Minna; Huhtala, Heini; Miettinen, Susanna; Seppänen-Kaijansinkko, Riitta; Haimi, Suvi.

In: *Tissue Engineering Part A*, Vol. 22, No. 5-6, 01.03.2016, p. 513-523.

Research output: Contribution to journal › Article › Scientific › peer-review

Importance of maintenance data quality in extended warranty simulation. / Mahlamäki, Katrine; Niemi, Arto; Jokinen, Juuso; Borgman, Jukka.

In: *International Journal of COMADEM*, Vol. 19, No. 1, 01.01.2016, p. 3-10.

Research output: Contribution to journal › Article › Scientific › peer-review

Accelerated deactivation studies of the natural-gas oxidation catalyst-Verifying the role of sulfur and elevated temperature in catalyst aging. / Honkanen, Mari; Kärkkäinen, Marja; Kolli, Tanja; Heikkinen, Olli; Viitanen, Ville; Zeng, Lunjie; Jiang, Hua; Kallinen, Kauko; Huuhtanen, Mika; Keiski, Riitta L.; Lahtinen, Jouko; Olsson, Eva; Vippola, Minnamari.

In: *Applied Catalysis B-Environmental*, 2016, p. 439-448.

Research output: Contribution to journal › Article › Scientific › peer-review

Cell-wall disruption and lipid/astaxanthin extraction from microalgae : Chlorella and Haematococcus. / Kim, Dong Yeon; Vijayan, Durairaj; Praveenkumar, Ramasamy; Han, Jong In; Lee, Kyubock; Park, Ji Yeon; Chang, Won Seok; Lee, Jin Suk; Oh, You Kwan.

In: *Bioresource Technology*, Vol. 199, 2016, p. 300-310.

Research output: Contribution to journal › Article › Scientific › peer-review

Remarkable Dependence of the Final Charge Separation Efficiency on the Donor-Acceptor Interaction in Photoinduced Electron Transfer. / Higashino, Tomohiro; Yamada, Tomoki; Yamamoto, Masanori; Furube, Akihiro; Tkachenko, Nikolai V.; Miura, Taku; Kobori, Yasuhiro; Jono, Ryota; Yamashita, Koichi; Imahori, Hiroshi.

In: *Angewandte Chemie (International Edition)*, Vol. 55, No. 2, 2016, p. 629-633.

Research output: Contribution to journal › Article › Scientific › peer-review

Preferential adsorption of Cu in a multi-metal mixture onto biogenic elemental selenium nanoparticles. / Jain, Rohan; Dominic, Domician; Jordan, Norbert; Rene, Eldon R.; Weiss, Stephan; van Hullebusch, Eric D.; Hübner, René; Lens, Piet N. L.

In: *Chemical Engineering Journal*, Vol. 284, 2016, p. 917-925.

Research output: Contribution to journal › Article › Scientific › peer-review

Composites of high-temperature thermomechanical pulps and polylactic acid. / Solala, Iina; Koistinen, Antti; Siljander, Sanna; Vuorinen, Jyrki; Vuorinen, Tapani.

In: *BioResources*, Vol. 11, No. 1, 2016, p. 1125-1140.

Research output: Contribution to journal › Article › Scientific › peer-review

Biological and Bioelectrochemical Recovery of Critical and Scarce Metals. / Nancharaiah, Y. V.; Mohan, S. Venkata; Lens, P. N. L.

In: *Trends in Biotechnology*, Vol. 34, No. 2, 2016, p. 137-155.

Research output: Contribution to journal › Article › Scientific › peer-review

High-Yield Excited Triplet States in Pentacene Self-Assembled Monolayers on Gold Nanoparticles through Singlet Exciton Fission. / Kato, Daiki; Sakai, Hayato; Tkachenko, Nikolai V.; Hasobe, Taku.

In: *Angewandte Chemie (International Edition)*, Vol. 55, No. 17, 2016, p. 5230-5234.

Research output: Contribution to journal > Article > Scientific > peer-review

Superfluorinated Ionic Liquid Crystals Based on Supramolecular, Halogen-Bonded Anions. / Cavallo, Gabriella; Terraneo, Giancarlo; Monfredini, Alessandro; Saccone, Marco; Priimägi, Arri; Pilati, Tullio; Resnati, Giuseppe; Metrangolo, Pierangelo; Bruce, Duncan W.

In: *Angewandte Chemie (International Edition)*, Vol. 55, No. 21, 2016, p. 6300-6304.

Research output: Contribution to journal > Article > Scientific > peer-review

Fire-safe and environmentally friendly nanocomposites based on layered double hydroxides and ethylene propylene diene elastomer. / Basu, Debdipta; Das, Amit; Wang, De Yi; George, Jinu Jacob; Stöckelhuber, Klaus Werner; Boldt, Regine; Leuteritz, Andreas; Heinrich, Gert.

In: *RSC Advances*, Vol. 6, No. 31, 2016, p. 26425-26436.

Research output: Contribution to journal > Article > Scientific > peer-review

Metrics for polyphonic sound event detection. / Mesaros, Annamaria; Heittola, Toni; Virtanen, Tuomas.

In: *Applied Sciences*, Vol. 6, No. 6, 162, 2016.

Research output: Contribution to journal > Article > Scientific > peer-review

Decoding the Morphological Diversity in Two Dimensional Crystalline Porous Polymers by Core Planarity Modulation. /

Halder, Arjun; Kandambeth, Sharath; Biswal, Bishnu P.; Kaur, Gagandeep; Roy, Neha Chaki; Addicoat, Matthew; Salunke, Jagadish K.; Banerjee, Subhrashis; Vanka, Kumar; Heine, Thomas; Verma, Sandeep; Banerjee, Rahul.

In: *Angewandte Chemie (International Edition)*, Vol. 55, No. 27, 2016, p. 7806-7810.

Research output: Contribution to journal > Article > Scientific > peer-review

Enhanced adsorption of orthophosphate and copper onto hydrochar derived from sewage sludge by KOH activation. /

Spataru, Ana; Jain, Rohan; Chung, Jae Wook; Gerner, Gabriel; Krebs, Rolf; Lens, Piet N. L.

In: *RSC Advances*, Vol. 6, No. 104, 2016, p. 101827-101834.

Research output: Contribution to journal > Article > Scientific > peer-review

Nonlinear transmittance and optical power limiting in magnesium ferrite nanoparticles : effects of laser pulsewidth and particle size. / Perumbilavil, Sreekanth; Sridharan, Kishore; Abraham, Ann Rose; Janardhanan, Harsha P.; Kalarikkal, Nandakumar; Philip, Reji.

In: *RSC Advances*, Vol. 6, No. 108, 2016, p. 106754-106761.

Research output: Contribution to journal > Article > Scientific > peer-review

The formation and physical properties of the particle emissions from a natural gas engine. / Alanen, Jenni; Saukko, Erkka; Lehtoranta, Kati; Murtonen, Timo; Timonen, Hilikka; Hillamo, Risto; Karjalainen, Panu; Kuuluvainen, Heino; Harra, Juha; Keskinen, Jorma; Rönkkö, Topi.

In: *Fuel*, Vol. 162, 15.12.2015, p. 155-161.

Research output: Contribution to journal > Article > Scientific > peer-review

Modeling carbon dioxide transport in PDMS-based microfluidic cell culture devices. / Mäki, A. J.; Peltokangas, M.; Kreutzer, J.; Auvinen, S.; Kallio, P.

In: *Chemical Engineering Science*, Vol. 137, 01.12.2015, p. 515-524.

Research output: Contribution to journal > Article > Scientific > peer-review

Polypyrrole coating on poly-(lactide/glycolide)- β -tricalcium phosphate screws enhances new bone formation in rabbits. / Zhao, Ming Dong; Björninen, Miina; Cao, Lu; Wang, Hui Ren; Pelto, Jani; Li, Xiang Qian; Hyttinen, Jari; Jiang, Yun Qi; Kellomäki, Minna; Miettinen, Susanna; Sándor, George K.; Seppänen, Riitta; Haimi, Suvi; Dong, Jian.

In: *Biomedical Materials*, Vol. 10, No. 6, 065016, 27.11.2015.

Research output: Contribution to journal > Article > Scientific > peer-review

Graphene-intercalated Fe₂O₃/TiO₂ heterojunctions for efficient photoelectrolysis of water. / Kaouk, A.; Ruoko, T. P.; Gönüllü, Y.; Kaunisto, K.; Mettenböcker, A.; Gurevich, E.; Lemmetyinen, H.; Ostendorf, A.; Mathur, S.
In: RSC Advances, Vol. 5, No. 123, 13.11.2015, p. 101401-101407.
Research output: Contribution to journal > Article > Scientific > peer-review

Simultaneous nutrient removal and lipid production with *Chlorella vulgaris* on sterilized and non-sterilized anaerobically pretreated piggyery wastewater. / Marjakangas, Jatta M.; Chen, Chun Yen; Lakaniemi, Aino Maija; Puhakka, Jaakko A.; Whang, Liang Ming; Chang, Jo Shu.
In: Biochemical Engineering Journal, Vol. 103, 05.11.2015, p. 177-184.
Research output: Contribution to journal > Article > Scientific > peer-review

Tri-functionality of Fe₃O₄-embedded carbon microparticles in microalgae harvesting. / Seo, Jung Yoon; Lee, Kyubock; Ramasamy, Praveenkumar; Kim, Bohwa; Lee, So Yeun; Oh, You Kwan; Park, Seung Bin.
In: Chemical Engineering Journal, Vol. 280, 05.11.2015, p. 206-214.
Research output: Contribution to journal > Article > Scientific > peer-review

Effect of rubber polarity on selective wetting of carbon nanotubes in ternary blends. / Le, H. H.; Parsaker, M.; Sriharish, M. N.; Henning, S.; Menzel, M.; Wießner, S.; Das, A.; Do, Q. K.; Heinrich, G.; Radosch, H. J.
In: Express Polymer Letters, Vol. 9, No. 11, 01.11.2015, p. 960-971.
Research output: Contribution to journal > Article > Scientific > peer-review

Comparison of different cationized proteins as biomaterials for nanoparticle-based ocular gene delivery. / Zorzi, Giovanni K.; Párraga, Jenny E.; Seijo, Begoña; Sanchez, Alejandro.
In: Colloids and Surfaces B: Biointerfaces, Vol. 135, 01.11.2015, p. 533-541.
Research output: Contribution to journal > Article > Scientific > peer-review

Submolecular Plasticization Induced by Photons in Azobenzene Materials. / Vapaavuori, Jaana; Laventure, Audrey; Bazuin, C. Geraldine; Lebel, Olivier; Pellerin, Christian.
In: Journal of the American Chemical Society, Vol. 137, No. 42, 28.10.2015, p. 13510-13517.
Research output: Contribution to journal > Article > Scientific > peer-review

Cultivation of *Nannochloropsis* for eicosapentaenoic acid production in wastewaters of pulp and paper industry. / Polishchuk, Anna; Valev, Dimitar; Tarvainen, Marko; Mishra, Sujata; Kinnunen, Viljami; Antal, Taras; Yang, Baoru; Rintala, Jukka; Tyystjärvi, Esa.
In: Bioresource Technology, Vol. 193, 01.10.2015, p. 469-476.
Research output: Contribution to journal > Article > Scientific > peer-review

Molecular Design of Light-Responsive Hydrogels, for in Situ Generation of Fast and Reversible Valves for Microfluidic Applications. / Ter Schiphorst, Jeroen; Coleman, Simon; Stumpel, Jelle E.; Ben Azouz, Aymen; Diamond, Dermot; Schenning, Albertus P. H. J.
In: Chemistry of Materials, Vol. 27, No. 17, 08.09.2015, p. 5925-5931.
Research output: Contribution to journal > Article > Scientific > peer-review

Effects of anode potentials on bioelectrogenic conversion of xylose and microbial community compositions. / Kokko, Marika E.; Mäkinen, Annukka E.; Sulonen, Mira L K; Puhakka, Jaakko A.
In: Biochemical Engineering Journal, Vol. 101, 05.09.2015, p. 248-252.
Research output: Contribution to journal > Article > Scientific > peer-review

Enhanced photoactive and photoelectrochemical properties of TiO₂ sol-gel coated steel by the application of SiO₂ intermediate layer. / Nikkanen, Juha Pekka; Huttunen-Saarivirta, Elina; Salminen, Turkka; Hyvärinen, Leo; Honkanen, Mari; Isotahdon, Elisa; Heinonen, Saara; Levänen, Erkki.
In: Applied Catalysis B-Environmental, Vol. 174-175, 01.09.2015, p. 533-543.
Research output: Contribution to journal > Article > Scientific > peer-review

Searching for a robust strategy for minimizing alkali chlorides in fluidized bed boilers during burning of high SRF-energy-share fuel. / Bajamundi, Cyril Jose E; Vainikka, Pasi; Hedman, Merja; Silvennoinen, Jaani; Heinanen, Teemu; Taipale, Raili; Konttinen, Jukka.

In: Fuel, Vol. 155, 01.09.2015, p. 25-36.

Research output: Contribution to journal › Article › Scientific › peer-review

Surface Modified Biodegradable Electrospun Membranes as a Carrier for Human Embryonic Stem Cell-Derived Retinal Pigment Epithelial Cells. / Sorkio, Anni; Porter, Patrick J.; Juuti-Uusitalo, Kati; Meenan, Brian J.; Skottman, Heli; Burke, George A.

In: Tissue Engineering Part A, Vol. 21, No. 17-18, 01.09.2015, p. 2301-2314.

Research output: Contribution to journal › Article › Scientific › peer-review

Influence of relative humidity and physical load during storage on dustiness of inorganic nanomaterials : implications for testing and risk assessment. / Levin, Marcus; Rojas, Elena; Vanhala, Esa; Vippola, Minnamari; Liguori, Biase; Kling, Kirsten I.; Koponen, Ismo K.; Mølhave, Kristian; Tuomi, Timo; Gregurec, Danijela; Moya, Sergio; Jensen, Keld A.

In: Journal of Nanoparticle Research, Vol. 17, No. 8, 337, 14.08.2015.

Research output: Contribution to journal › Article › Scientific › peer-review

Evaluation of crushing strength of spray-dried MgAl₂O₄ granule beds. / Kanerva, Ulla; Suhonen, Tomi; Lagerbom, Juha; Levänen, Erkki.

In: Ceramics International, Vol. 41, No. 7, 01.08.2015, p. 8494-8500.

Research output: Contribution to journal › Article › Scientific › peer-review

Sol-gel synthesis of quaternary (P₂O₅)₅₅-(CaO)₂₅-(Na₂O)_(20-x)-(TiO₂)_x bioresorbable glasses for bone tissue engineering applications (x = 0, 5, 10, or 15). / Foroutan, Farzad; Walters, Nick J.; Owens, Gareth J.; Mordan, Nicola J.; Kim, Hae Won; de Leeuw, Nora H.; Knowles, Jonathan C.

In: Biomedical materials (Bristol, England), Vol. 10, No. 4, 01.08.2015, p. 45025.

Research output: Contribution to journal › Article › Scientific › peer-review

High quality sub-10 nm graphene nanoribbons by on-chip PS-b-PDMS block copolymer lithography. / Rasappa, Sozaraj; Caridad, José M.; Schulte, Lars; Cagliani, Alberto; Borah, Dipu; Morris, Michael A.; Bøggild, Peter; Ndoni, Sokol.

In: RSC Advances, Vol. 5, No. 82, 29.07.2015, p. 66711-66717.

Research output: Contribution to journal › Article › Scientific › peer-review

Electricity production by a microbial fuel cell fueled by brewery wastewater and the factors in its membrane deterioration. / Çetinkaya, Afşin Y.; Köroğlu, Emre Oğuz; Demir, Neslihan Manav; Baysoy, Derya Yılmaz; Özkaya, Bestamin; Çakmakçı, Mehmet.

In: Chinese Journal of Catalysis, Vol. 36, No. 7, 20.07.2015, p. 1068-1076.

Research output: Contribution to journal › Article › Scientific › peer-review

Lithography-free oxide patterns as templates for self-catalyzed growth of highly uniform GaAs nanowires on Si(111). /

Hakkarainen, T. V.; Schramm, A.; Mäkelä, J.; Laukkanen, P.; Guina, M.

In: Nanotechnology, Vol. 26, No. 27, 275301, 18.07.2015.

Research output: Contribution to journal › Article › Scientific › peer-review

Lipid production by eukaryotic microorganisms isolated from palm oil mill effluent. / Marjakangas, Jatta M.; Lakaniemi, Aino Maija; Koskinen, Perttu E. P.; Chang, Jo Shu; Puhakka, Jaakko A.

In: Biochemical Engineering Journal, Vol. 99, 05.07.2015, p. 48-54.

Research output: Contribution to journal › Article › Scientific › peer-review

The influence of SrO and CaO in silicate and phosphate bioactive glasses on human gingival fibroblasts. / Massera, J.; Kokkari, A.; Närhi, T.; Hupa, L.

In: Journal of Materials Science: Materials in Medicine, Vol. 26, No. 6, 196, 25.06.2015.

Research output: Contribution to journal › Article › Scientific › peer-review

Catalytic effect of Ca and K on CO₂ gasification of spruce wood char. / Perander, M.; DeMartini, N.; Brink, A.; Kramb, J.; Karlström, O.; Hemming, J.; Moilanen, A.; Konttinen, J.; Hupa, M.

In: Fuel, Vol. 150, 15.06.2015, p. 464-472.

Research output: Contribution to journal › Article › Scientific › peer-review

A facile route to synthesis of S-doped TiO₂ nanoparticles for photocatalytic activity. / McManamon, Colm; O'Connell, John; Delaney, Paul; Rasappa, Sozaraj; Holmes, Justin D.; Morris, Michael A.
In: Journal of Molecular Catalysis A: Chemical, Vol. 406, 30.05.2015, p. 51-57!
Research output: Contribution to journal › Article › Scientific › peer-review

Biomimetic collagen I and IV double layer Langmuir-Schaefer films as microenvironment for human pluripotent stem cell derived retinal pigment epithelial cells. / Sorkio, Anni E.; Vuorimaa-Laukkanen, Elina P.; Hakola, Hanna M.; Liang, Huamin; Ujula, Tiina A.; Valle-Delgado, Juan José; Österberg, Monika; Yliperttula, Marjo L.; Skottman, Heli.
In: Biomaterials, Vol. 51, 01.05.2015, p. 257-269.
Research output: Contribution to journal › Article › Scientific › peer-review

Workplace performance of a loose-fitting powered air purifying respirator during nanoparticle synthesis. / Koivisto, Antti J.; Aromaa, Mikko; Koponen, Ismo K.; Fransman, Wouter; Jensen, Keld A.; Mäkelä, Jyrki M.; Hämeri, Kaarle J.
In: Journal of Nanoparticle Research, Vol. 17, No. 4, 09.04.2015.
Research output: Contribution to journal › Article › Scientific › peer-review

Multi-stable dynamics of the non-adiabatic repressilator. / Potapov, Ilya; Zhurov, Boris; Volkov, Evgeny.
In: Journal of the Royal Society. Interface, Vol. 12, No. 104, 20141315, 06.03.2015.
Research output: Contribution to journal › Article › Scientific › peer-review

Fluidized-bed denitrification of mining water tolerates high nickel concentrations. / Zou, G.; Papirio, S.; van Hullebusch, E. D.; Puhakka, J. A.
In: Bioresource Technology, Vol. 179, 01.03.2015, p. 284-290.
Research output: Contribution to journal › Article › Scientific › peer-review

Second-harmonic generation imaging of semiconductor nanowires with focused vector beams. / Bautista, Godofredo; Mäkitalo, Jouni; Chen, Ya; Dhaka, Veer; Grasso, Marco; Karvonen, Lasse; Jiang, Hua; Huttunen, Mikko J.; Huhtio, Teppo; Lipsanen, Harri; Kauranen, Martti.
In: Nano Letters, Vol. 15, No. 3, 06.02.2015, p. 1564-1569.
Research output: Contribution to journal › Article › Scientific › peer-review

Second-Harmonic Generation from Metal Nanoparticles : Resonance Enhancement versus Particle Geometry. / Czaplicki, R.; Mäkitalo, J.; Siikanen, R.; Husu, H.; Lehtolahti, J.; Kuittinen, M.; Kauranen, M.
In: Nano Letters, Vol. 15, No. 1, 14.01.2015, p. 530-534.
Research output: Contribution to journal › Article › Scientific › peer-review

Oxidation half-reaction of aqueous nucleosides and nucleotides via photoelectron spectroscopy augmented by ab initio calculations. / Schroeder, Christi A.; Pluharová, Eva; Seidel, Robert; Schroeder, William P.; Faubel, Manfred; Slaviček, Petr; Winter, Bernd; Jungwirth, Pavel; Bradforth, Stephen E.
In: Journal of the American Chemical Society, Vol. 137, No. 1, 14.01.2015, p. 201-209.
Research output: Contribution to journal › Article › Scientific › peer-review

Perfluoro-1,1'-biphenyl and perfluoronaphthalene and their derivatives as π -acceptors for anions. / Yi, H.; Albrecht, M.; Valkonen, A.; Rissanen, K.
In: New Journal of Chemistry, Vol. 39, No. 1, 01.01.2015, p. 746-749.
Research output: Contribution to journal › Article › Scientific › peer-review

A comparison of five optical surface topography measurement methods. / Mettänen, Marja; Hirn, Ulrich.
In: TAPPI Journal, Vol. 14, No. 1, 01.01.2015, p. 27-38.
Research output: Contribution to journal › Article › Scientific › peer-review

Chemolithotrophic denitrification in biofilm reactors. / Di Capua, Francesco; Papirio, Stefano; Lens, Piet N L; Esposito, Giovanni.
In: Chemical Engineering Journal, Vol. 280, 2015, p. 643-657.
Research output: Contribution to journal › Article › Scientific › peer-review

Characterisation of novel regenerated cellulosic, viscose, and cotton fibres and the dyeing properties of fabrics. /

Kamppuri, Taina; Vehviläinen, Marianna; Puolakka, Arja; Honkanen, Mari; Vippola, Minnamari; Rissanen, Marja.

In: *Coloration Technology*, Vol. 131, No. 5, 2015, p. 396-402.

Research output: Contribution to journal > Article > Scientific > peer-review

Water-responsive dual-coloured photonic polymer coatings based on cholesteric liquid crystals. /

Stumpel, J. E.; Broer, D. J.; Schenning, A. P. H. J.

In: *RSC Advances*, Vol. 5, No. 115, 2015, p. 94650-94653.

Research output: Contribution to journal > Article > Scientific > peer-review

Coulomb explosion during the early stages of the reaction of alkali metals with water. /

Mason, Philip E.; Uhlig, Frank; Vaněk, Václav; Buttersack, Tillmann; Bauerecker, Sigurd; Jungwirth, Pavel.

In: *Nature Chemistry*, Vol. 7, No. 3, 2015, p. 250-254.

Research output: Contribution to journal > Article > Scientific > peer-review

Multifunctional ultrasmall nanoplatfoms for vascular-targeted interstitial photodynamic therapy of brain tumors guided by

real-time MRI. / Bechet, Denise; Auger, Florent; Couleaud, Pierre; Marty, Eric; Ravasi, Laura; Durieux, Nicolas; Bonnet,

Corinne; Plénat, François; Frochot, Céline; Mordon, Serge; Tillement, Olivier; Vanderesse, Régis; Lux, François; Perriat,

Pascal; Guillemin, François; Barberi-Heyob, Muriel.

In: *NANOMEDICINE: NANOTECHNOLOGY BIOLOGY AND MEDICINE*, Vol. 11, No. 3, 2015, p. 657-670.

Research output: Contribution to journal > Article > Scientific > peer-review

Efficient preparation of shuffled DNA libraries through recombination (Gateway) cloning. /

Lehtonen, Soili I.; Taskinen, Barbara; Ojala, Elina; Kukkurainen, Sampo; Rahikainen, Rolle; Riihimäki, Tiina A.; Laitinen, Olli H.; Kulomaa, Markku S.;

Hytönen, Vesa P.

In: *Protein Engineering Design and Selection*, Vol. 28, No. 1, 2015, p. 23-28.

Research output: Contribution to journal > Article > Scientific > peer-review

Enquête de la variabilité cycle-cycle du NO dans la combustion homogène. /

Karvountzis-Kontakiotis, A.; Ntziachristos, L.

In: *OIL AND GAS SCIENCE AND TECHNOLOGY : REVUE DE L'INSTITUT FRANCAIS DU PETROLE*, Vol. 70, No. 1,

2015, p. 111-123.

Research output: Contribution to journal > Article > Scientific > peer-review

Switchavidin : Reversible biotin-avidin-biotin bridges with high affinity and specificity. /

Taskinen, Barbara; Zauner, Dominik; Lehtonen, Soili I.; Koskinen, Masi; Thomson, Chloe; Kähkönen, Niklas; Kukkurainen, Sampo; Määttä, Juha A E;

Ihalainen, Teemu O.; Kulomaa, Markku S.; Gruber, Hermann J.; Hytönen, Vesa P.

In: *Bioconjugate Chemistry*, Vol. 25, No. 12, 17.12.2014, p. 2233-2243.

Research output: Contribution to journal > Article > Scientific > peer-review

Time-resolved fluorescence methods (IUPAC technical report). /

Lemmetyinen, Helge; Tkachenko, Nikolai V.; Valeur, Bernard; Hotta, Jun Ichi; Ameloot, Marcel; Ernsting, Nikolaus P.; Gustavsson, Thomas; Boens, Noël.

In: *Pure and Applied Chemistry*, Vol. 86, No. 12, 01.12.2014, p. 1969-1998.

Research output: Contribution to journal > Article > Scientific > peer-review

Improved biomass and lipid production in a mixotrophic culture of *Chlorella* sp. KR-1 with addition of coal-fired flue-gas. /

Praveenkumar, Ramasamy; Kim, Bohwa; Choi, Eunji; Lee, Kyubock; Park, Ji Yeon; Lee, Jin Suk; Lee, Young Chul; Oh,

You Kwan.

In: *Bioresource Technology*, Vol. 171, 01.11.2014, p. 500-505.

Research output: Contribution to journal > Article > Scientific > peer-review

Rapid, Brushless Self-assembly of a PS-b-PDMS Block Copolymer for Nanolithography. /

Rasappa, Sozaraj; Schulte, Lars; Borah, Dipu; Morris, Michael A.; Ndoni, Sokol.

In: *Colloids and Interface Science Communications*, Vol. 2, 01.10.2014, p. 1-5.

Research output: Contribution to journal > Article > Scientific > peer-review

Mixotrophic cultivation of oleaginous *Chlorella* sp. KR-1 mediated by actual coal-fired flue gas for biodiesel production. / Praveenkumar, Ramasamy; Kim, Bohwa; Choi, Eunji; Lee, Kyubock; Cho, Sunja; Hyun, Ju Soo; Park, Ji Yeon; Lee, Young Chul; Lee, Hyun Uk; Lee, Jin Suk; Oh, You Kwan.

In: *Bioprocess and Biosystems Engineering*, Vol. 37, No. 10, 12.09.2014, p. 2083-2094.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Molecular engineering of avidin and hydrophobin for functional self-assembling interfaces. / Kurppa, Katri; Hytönen, Vesa P.; Nakari-Setälä, Tiina; Kulomaa, Markku S.; Linder, Markus B.

In: *Colloids and Surfaces B: Biointerfaces*, Vol. 120, 01.08.2014, p. 102-109.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Bioprocessing of enhanced cellulase production from a mutant of *Trichoderma asperellum* RCK2011 and its application in hydrolysis of cellulose. / Raghuwanshi, Sanjeev; Deswal, Deepa; Karp, Matti; Kuhad, Ramesh Chander.

In: *Fuel*, Vol. 124, 15.05.2014, p. 183-189.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Light-fuelled transport of large dendrimers and proteins. / Koskela, Jenni E.; Liljeström, Ville; Lim, Jongdoo; Simanek, Eric E.; Ras, Robin H A; Priimagi, Arri; Kostiaainen, Mauri A.

In: *Journal of the American Chemical Society*, Vol. 136, No. 19, 14.05.2014, p. 6850-6853.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Assessment of metabolic flux distribution in the thermophilic hydrogen producer *Caloramator celer* as affected by external pH and hydrogen partial pressure. / Ciranna, Alessandro; Pawar, Sudhanshu S.; Santala, Ville; Karp, Matti; van Niel, Ed W J.

In: *Microbial Cell Factories*, Vol. 13, No. 1, 48, 28.03.2014.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Structure and barrier properties of human embryonic stem cell-derived retinal pigment epithelial cells are affected by extracellular matrix protein coating. / Sorkio, Anni; Hongisto, Heidi; Kaarniranta, Kai; Uusitalo, Hannu; Juuti-Uusitalo, Kati; Skottman, Heli.

In: *Tissue Engineering Part A*, Vol. 20, No. 3-4, 01.02.2014, p. 622-634.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

A 3D Alzheimer's disease culture model and the induction of P21-activated kinase mediated sensing in iPSC derived neurons. / Zhang, Dawei; Pekkanen-Mattila, Mari; Shahsavani, Mansoureh; Falk, Anna; Teixeira, Ana I.; Herland, Anna.

In: *Biomaterials*, Vol. 35, No. 5, 02.2014, p. 1420-1428.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Large-area arrays of three-dimensional plasmonic subwavelength-sized structures from azopolymer surface-relief gratings. / Moerland, Robert J.; Koskela, Jenni E.; Kravchenko, Aleksandr; Simberg, Mikael; Van Der Vegte, Stefan; Kaivola, Matti; Priimagi, Arri; Ras, Robin H A.

In: *Materials Horizons*, Vol. 1, No. 1, 01.01.2014, p. 74-80.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Stearate Modified Zinc-Aluminum Layered Double Hydroxides and Acrylonitrile Butadiene Rubber Nanocomposites. / Eshwaran, S. B.; Basu, D.; Kutlu, B.; Leuteritz, A.; Wagenknecht, U.; Stöckelhuber, K. W.; Naskar, K.; Das, A.; Heinrich, G.

In: *Polymer-Plastics Technology and Engineering*, Vol. 53, No. 1, 01.2014, p. 65-73.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Repeated use of stable magnetic flocculant for efficient harvest of oleaginous *Chlorella* sp. / Lee, Kyubock; Lee, So Yeun; Praveenkumar, Ramasamy; Kim, Bohwa; Seo, Jung Yoon; Jeon, Sang Goo; Na, Jeong Geol; Park, Ji Yeon; Kim, Dong Myung; Oh, You Kwan.

In: *Bioresource Technology*, Vol. 167, 2014, p. 284-290.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Direct observation of the collapse of the delocalized excess electron in water. / Savolainen, Janne; Uhlig, Frank; Ahmed, Saima; Hamm, Peter; Jungwirth, Pavel.

In: *Nature Chemistry*, Vol. 6, No. 8, 2014, p. 697-701.

Research output: Contribution to journal > Article > Scientific > peer-review

Nickel-based HVOF coatings promoting high temperature corrosion resistance of biomass-fired power plant boilers. /

Oksa, Maria; Auerkari, Pertti; Salonen, Jorma; Varis, Tommi.

In: *Fuel Processing Technology*, Vol. 125, 2014, p. 236-245.

Research output: Contribution to journal > Article > Scientific > peer-review

Effect of non-rubber components of NR on the carbon nanotube (CNT) localization in SBR/NR blends. / Le, Hai Hong;

Parsekar, Meenali; Ilisch, Sybill; Henning, Sven; Das, Amit; Stöckelhuber, Klaus Werner; Beiner, Mario; Ho, Chi Anh; Adhikari, Rameshwar; Wießner, Sven; Heinrich, Gert; Radosch, Hans Joachim.

In: *Macromolecular Materials and Engineering*, Vol. 299, No. 5, 2014, p. 569-582.

Research output: Contribution to journal > Article > Scientific > peer-review

Fabrication of 3-D nanodimensioned electric double layer capacitor structures using block copolymer templates. /

Rasappa, Sozaraj; Borah, Dipu; Senthamarai Kannan, Ramsankar; Faulkner, Colm C.; Holmes, Justin D.; Morris, Michael A.

In: *Journal Nanoscience and Nanotechnology*, Vol. 14, No. 7, 2014, p. 5221-5227.

Research output: Contribution to journal > Article > Scientific > peer-review

Magnetophoretic harvesting of oleaginous *Chlorella* sp. by using biocompatible chitosan/magnetic nanoparticle composites. / Lee, Kyubock; Lee, So Yeun; Na, Jeong Geol; Jeon, Sang Goo; Praveenkumar, Ramasamy; Kim, Dong Myung; Chang, Won Seok; Oh, You Kwan.

In: *Bioresource Technology*, Vol. 149, 12.2013, p. 575-578.

Research output: Contribution to journal > Article > Scientific > peer-review

Reversible biofunctionalization of surfaces with a switchable mutant of avidin. / Pollheimer, Philipp; Taskinen, Barbara; Scherfler, Andreas; Gusenkov, Sergey; Creus, Marc; Wiesauer, Philipp; Zauner, Dominik; Schöfberger, Wolfgang;

Schwarzinger, Clemens; Ebner, Andreas; Tampé, Robert; Stutz, Hanno; Hytönen, Vesa P.; Gruber, Hermann J.

In: *Bioconjugate Chemistry*, Vol. 24, No. 10, 16.10.2013, p. 1656-1668.

Research output: Contribution to journal > Article > Scientific > peer-review

Mechanisms of acceleration and retardation of water dynamics by ions. / Stirnemann, Guillaume; Wernersson, Erik; Jungwirth, Pavel; Laage, Damien.

In: *Journal of the American Chemical Society*, Vol. 135, No. 32, 14.08.2013, p. 11824-11831.

Research output: Contribution to journal > Article > Scientific > peer-review

Development and characterization of poly(ϵ -caprolactone) hollow fiber membranes for vascular tissue engineering. /

Diban, Nazely; Haimi, Suvi; Bolhuis-Versteeg, Lydia; Teixeira, Sandra; Miettinen, Susanna; Poot, André; Grijpma, Dirk; Stamatialis, Dimitrios.

In: *Journal of Membrane Science*, Vol. 438, 01.07.2013, p. 29-37.

Research output: Contribution to journal > Article > Scientific > peer-review

Shape-dependent plasmonic response and directed self-assembly in a new semiconductor building block, indium-doped cadmium oxide (ICO). / Gordon, Thomas R.; Paik, Taejong; Klein, Dahlia R.; Naik, Gururaj V.; Caglayan, Humeyra;

Boltasseva, Alexandra; Murray, Christopher B.

In: *Nano Letters*, Vol. 13, No. 6, 12.06.2013, p. 2857-2863.

Research output: Contribution to journal > Article > Scientific > peer-review

Screening pretreatment methods to enhance thermophilic anaerobic digestion of pulp and paper mill wastewater treatment secondary sludge. / Bayr, Suvi; Kaparaju, Prasad; Rintala, Jukka.

In: *Chemical Engineering Journal*, Vol. 223, 01.05.2013, p. 479-486.

Research output: Contribution to journal > Article > Scientific > peer-review

Immobilized bioactive agents onto polyurethane surface with heparin and phosphorylcholine group. / Tan, Mingqi; Feng, Yakai; Wang, Heyun; Zhang, Li; Khan, Musammir; Guo, Jintang; Chen, Qingliang; Liu, Jianshi.

In: *Macromolecular Research*, Vol. 21, No. 5, 05.2013, p. 541-549.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

The sensitivity of random polymer brush-lamellar polystyrene-b-polymethylmethacrylate block copolymer systems to process conditions. / Borah, Dipu; Rasappa, Sozaraj; Senthamarai Kannan, Ramsankar; Shaw, Matthew T.; Holmes, Justin D.; Morris, Michael A.

In: *Journal of Colloid and Interface Science*, Vol. 393, No. 1, 01.03.2013, p. 192-202.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Fabrication of a sub-10 nm silicon nanowire based ethanol sensor using block copolymer lithography. / Rasappa, Sozaraj; Borah, Dipu; Faulkner, Colm C.; Lutz, Tarek; Shaw, Matthew T.; Holmes, Justin D.; Morris, Michael A.

In: *Nanotechnology*, Vol. 24, No. 6, 065503, 15.02.2013.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Chemically tailored dielectric-to-metal transition for the design of metamaterials from nanoimprinted colloidal nanocrystals. / Fafarman, Aaron T.; Hong, Sung Hoon; Caglayan, Humeysa; Ye, Xingchen; Diroll, Benjamin T.; Paik, Taejong; Engheta, Nader; Murray, Christopher B.; Kagan, Cherie R.

In: *Nano Letters*, Vol. 13, No. 2, 13.02.2013, p. 350-357.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

A potential nonthrombogenic small-diameter vascular scaffold with polyurethane/poly(ethylene glycol) hybrid materials by electrospinning technique. / Wang, Heyun; Feng, Yakai; Zhao, Haiyang; Fang, Zichen; Khan, Musammir; Guo, Jintang.

In: *Journal of Nanoscience and Nanotechnology*, Vol. 13, No. 2, 02.2013, p. 1578-1582.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

A 'clusters-in-liquid' method for calculating infrared spectra identifies the proton-transfer mode in acidic aqueous solutions. / Kulig, Waldemar; Agmon, Noam.

In: *Nature Chemistry*, Vol. 5, No. 1, 01.2013, p. 29-35.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

New reports on anti-bacterial and anti-candidal activities of fatty acid methyl esters (FAME) obtained from *Scenedesmus bijugatus* var. *bicellularis* biomass. / Mubarakali, Davoodbasha; Praveenkumar, Ramasamy; Shenbagavalli, Thiyagarajan; Mari Nivetha, Thayalan; Parveez Ahamed, Abdulazees; Al-Dhabi, Naif Abdullah; Thajuddin, Nooruddin.

In: *RSC Advances*, Vol. 2, No. 30, 28.11.2012, p. 11552-11556.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Influence of ionic liquids on the dielectric relaxation behavior of CNT based elastomer nanocomposites. / Steinhauser, D.; Subramaniam, K.; Das, A.; Heinrich, G.; Klüppel, M.

In: *Express Polymer Letters*, Vol. 6, No. 11, 11.2012, p. 927-936.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Fabrication of ssDNA/oligo(ethylene glycol) monolayers and complex nanostructures by an irradiation-promoted exchange reaction. / Khan, M. Nuruzzaman; Tjong, Vinalia; Chilkoti, Ashutosh; Zharnikov, Michael.

In: *Angewandte Chemie (International Edition)*, Vol. 51, No. 41, 08.10.2012, p. 10303-10306.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Biomimetic surface modification of polycarbonateurethane film via phosphorylcholine-graft for resisting platelet adhesion. / Gao, Wei; Feng, Yakai; Lu, Jian; Khan, Musammir; Guo, Jintang.

In: *Macromolecular Research*, Vol. 20, No. 10, 10.2012, p. 1063-1069.

Research output: [Contribution to journal](#) > [Article](#) > [Scientific](#) > [peer-review](#)

Impact of biodiesel application at various blending ratios on passenger cars of different fueling technologies. /

Kousoulidou, Marina; Ntziachristos, Leonidas; Fontaras, Georgios; Martini, Giorgio; Dilara, Panagiota; Samaras, Zissis.

In: Fuel, Vol. 98, 08.2012, p. 88-94.

Research output: Contribution to journal > Article > Scientific > peer-review

Molecular mechanisms of ion-specific effects on proteins. / Rembert, Kelvin B.; Paterová, Jana; Heyda, Jan; Hilty, Christian; Jungwirth, Pavel; Cremer, Paul S.

In: Journal of the American Chemical Society, Vol. 134, No. 24, 20.06.2012, p. 10039-10046.

Research output: Contribution to journal > Article > Scientific > peer-review

Structural characteristics and flammability of fire retarding EPDM/layered double hydroxide (LDH) nanocomposites. / Wang, De Yi; Das, Amit; Leuteritz, Andreas; Mahaling, R. N.; Jehnichen, Dieter; Wagenknecht, Udo; Heinrich, Gert.

In: RSC Advances, Vol. 2, No. 9, 21.04.2012, p. 3927-3933.

Research output: Contribution to journal > Article > Scientific > peer-review

Demonstration of increased lipid accumulation potential of stigeoclonium sp., Kütz. BUM11007 under nitrogen starved regime : A new source of lipids for biodiesel production. / Praveenkumar, Ramasamy; Johny, Kamarasu; MubarakAli, Davoodbhasha; Vijayan, Durairaj; Thajuddin, Nooruddin; Gunasekaran, Muthukumar.

In: Journal of Biobased Materials and Bioenergy, Vol. 6, No. 2, 04.2012, p. 209-213.

Research output: Contribution to journal > Article > Scientific > peer-review

Highly exfoliated natural rubber/Clay composites by "propping-open procedure" : The influence of fatty-acid chain length on exfoliation. / Rooj, Sandip; Das, Amit; Stöckelhuber, Klaus Werner; Reuter, Uta; Heinrich, Gert.

In: Macromolecular Materials and Engineering, Vol. 297, No. 4, 04.2012, p. 369-383.

Research output: Contribution to journal > Article > Scientific > peer-review

Human adipose tissue extract induces angiogenesis and adipogenesis in vitro. / Sarkanen, Jertta Riina; Kaila, Ville; Mannerström, Bettina; Rätty, Sari; Kuokkanen, Hannu; Miettinen, Susanna; Ylikomi, Timo.

In: Tissue Engineering Part A, Vol. 18, No. 1-2, 01.01.2012, p. 17-25.

Research output: Contribution to journal > Article > Scientific > peer-review

Utilization of agrowaste polymers in PVC/NBR alloys : Tensile, thermal, and morphological properties. / Mousa, Ahmad; Heinrich, Gert; Kretschmar, Bernd; Wagenknecht, Udo; Das, Amit.

In: INTERNATIONAL JOURNAL OF CHEMICAL ENGINEERING, 2012.

Research output: Contribution to journal > Article > Scientific > peer-review

Osteogenic medium is superior to growth factors in differentiation of human adipose stem cells towards boneforming cells in 3D culture. / Tirkkonen, L.; Haimi, Suvi; Huttunen, S.; Wolff, J.; Pirhonen, E.; Sándor, G. K.; Miettinen, S.

In: European Cells and Materials, Vol. 25, 2012, p. 144-158.

Research output: Contribution to journal > Article > Scientific > peer-review

Screening ethnically diverse human embryonic stem cells identifies a chromosome 20 minimal amplicon conferring growth advantage. / Amps, Katherine; Andrews, Peter W.; Anyfantis, George; Armstrong, Lyle; Avery, Stuart; Baharvand, Hossein; Baker, Julie; Baker, Duncan; Munoz, Maria B.; Beil, Stephen; Benvenisty, Nissim; Ben-Yosef, Dalit; Biancotti, Juan Carlos; Bosman, Alexis; Brena, Romulo Martin; Brison, Daniel; Caisander, Gunilla; Camarasa, Marãa V.; Chen, Jieming; Chiao, Eric; Choi, Young Min; Choo, Andre B H; Collins, Daniel; Colman, Alan; Crook, Jeremy M.; Daley, George Q.; Dalton, Anne; De Sousa, Paul A.; Denning, Chris; Downie, Janet; Dvorak, Petr; Montgomery, Karen D.; Feki, Anis; Ford, Angela; Fox, Victoria; Fraga, Ana M.; Frumkin, Tzvia; Ge, Lin; Gokhale, Paul J.; Golan-Lev, Tamar; Gourabi, Hamid; Gropp, Michal; Guangxiu, Lu; Hampl, Ales; Harron, Katie; Healy, Lyn; Herath, Wishva; Holm, Frida; Hovatta, Outi; Hyllner, Johan; Inamdar, Maneesha S.; Irwanto, Astrid Kresentia; Ishii, Tetsuya; Jaconi, Marisa; Jin, Ying; Kimber, Susan; Kiselev, Sergey; Knowles, Barbara B.; Kopper, Oded; Kukhareenko, Valeri; Kuliev, Anver; Lagarkova, Maria A.; Laird, Peter W.; Lako, Majlinda; Laslett, Andrew L.; Lavon, Neta; Lee, Dong Ryul; Lee, Jeoung Eun; Li, Chunliang; Lim, Linda S.; Ludwig, Tenneille E.; Ma, Yu; Maltby, Edna; Mateizel, Ileana; Mayshar, Yoav; Mileikovsky, Maria; Minger, Stephen L.; Miyazaki, Takamichi; Moon, Shin Yong; Moore, Harry; Mummery, Christine; Nagy, Andras; Nakatsuji, Norio; Narwani, Kavita; Oh, Steve K W; Oh, Sun Kyung; Olson, Cia; Otonkoski, Timo; Pan, Fei; Park, In Hyun; Pells, Steve; Pera, Martin F.; Pereira, Lygia V.; Qi, Ouyang; Raj, Grace Selva; Reubinoff, Benjamin; Robins, Alan; Robson, Paul; Rossant, Janet; Salekdeh, Ghasem H.; Schulz, Thomas C.; Sermon, Karen; Mohamed, Jameelah Sheik; Shen, Hui; Sherrer, Eric; Sidhu, Kuldip; Sivarajah, Shirani; Skottman, Heli; Spits, Claudia; Stacey, Glyn N.; Strehl, Raimund; Strelchenko, Nick; Suemori, Hirofumi; Sun, Bowen; Suuronen, Riitta; Takahashi, Kazutoshi; Tuuri, Timo; Venu, Parvathy; Verlinsky, Yuri; Oostwaard, Dorien Ward Van; Weisenberger, Daniel J.; Wu, Yue; Yamanaka, Shinya; Young, Lorraine; Zhou, Qi.

In: Nature Biotechnology, Vol. 29, No. 12, 12.2011, p. 1132-1144.

Research output: Contribution to journal > Article > Scientific > peer-review

Synthesis of depsipeptides from L-amino acids and lactones. / Cao, Hongfei; Feng, Yakai; Wang, Heyun; Zhang, Li; Khan, Musammir; Guo, Jintang.

In: *Frontiers of Chemical Science and Engineering*, Vol. 5, No. 4, 12.2011, p. 409-415.

Research output: Contribution to journal > Article > Scientific > peer-review

Versatile bio-ink for covalent immobilization of chimeric avidin on sol-gel substrates. / Heikkinen, Jarkko J.; Kivimäki, Liisa; Määttä, Juha A E; Mäkelä, Inka; Hakalahti, Leena; Takkinen, Kristiina; Kulomaa, Markku S.; Hytönen, Vesa P.; Hormi, Osmo E O.

In: *Colloids and Surfaces B: Biointerfaces*, Vol. 87, No. 2, 15.10.2011, p. 409-414.

Research output: Contribution to journal > Article > Scientific > peer-review

The effect of organic loading rate and retention time on hydrogen production from a methanogenic CSTR. / Pakarinen, O.; Kaparaju, P.; Rintala, J.

In: *Bioresource Technology*, Vol. 102, No. 19, 10.2011, p. 8952-8957.

Research output: Contribution to journal > Article > Scientific > peer-review

Towards universal enrichment nanocoating for IR-ATR waveguides. / Giammarco, James; Zdyrko, Bogdan; Petit, Laetitia; Musgraves, J. David; Hu, Juejun; Agarwal, Anu; Kimerling, Lionel; Richardson, Kathleen; Luzinov, Igor.

In: *Chemical Communications*, Vol. 47, No. 32, 28.08.2011, p. 9104-9106.

Research output: Contribution to journal > Article > Scientific > peer-review

Defined-size DNA triple crossover construct for molecular electronics : Modification, positioning and conductance properties. / Linko, Veikko; Leppiniemi, Jenni; Paasonen, Seppo Tapio; Hytönen, Vesa P.; Jussi Toppari, J.

In: *Nanotechnology*, Vol. 22, No. 27, 275610, 08.07.2011.

Research output: Contribution to journal > Article > Scientific > peer-review

Hybrid nanoparticle design based on cationized gelatin and the polyanions dextran sulfate and chondroitin sulfate for ocular gene therapy. / Zorzi, Giovanni Konat; Párraga, Jenny Evelin; Seijo, Begoña; Sánchez, Alejandro.

In: *MACROMOLECULAR BIOSCIENCE*, Vol. 11, No. 7, 07.07.2011, p. 905-913.

Research output: Contribution to journal > Article > Scientific > peer-review

Two-stage anaerobic digestion of tomato, cucumber, common reed and grass silage in leach-bed reactors and upflow anaerobic sludge blanket reactors. / Jagadabhi, Padma Shanthi; Kaparaju, Prasad; Rintala, Jukka.

In: *Bioresource Technology*, Vol. 102, No. 7, 04.2011, p. 4726-4733.

Research output: Contribution to journal > Article > Scientific > peer-review

Osteoconductive properties of poly(96L/4D-lactide)/beta-tricalcium phosphate in long term animal model. / Daculsi, Guy; Goyenvalle, Eric; Cognet, Ronan; Aguado, Eric; Suokas, Esa O.

In: *Biomaterials*, Vol. 32, No. 12, 04.2011, p. 3166-3177.

Research output: Contribution to journal > Article > Scientific > peer-review

Chimeric avidin shows stability against harsh chemical conditions-biochemical analysis and 3D structure. / Määttä, Juha A.E.; Eisenberg-Domovich, Yael; Nordlund, Henri R.; Hayouka, Ruchama; Kulomaa, Markku S.; Livnah, Oded; Hytönen, Vesa P.

In: *Biotechnology and Bioengineering*, Vol. 108, No. 3, 03.2011, p. 481-490.

Research output: Contribution to journal > Article > Scientific > peer-review

Enrichment polymer layers for detection of volatile vapors by ATR FT-IR. / Giammarco, James M.; Zdyrko, Bogdan; Hu, Juejun; Agarwal, Anu; Kimerling, Lionel; Carlie, Nathan; Petit, Laetitia; Richardson, Kathleen; Luzinov, Igor.

In: *ACS National Meeting Book of Abstracts*, 2011.

Research output: Contribution to journal > Article > Scientific > peer-review

Effect of micro-aeration and leachate replacement on COD solubilization and VFA production during mono-digestion of grass-silage in one-stage leach-bed reactors. / Jagadabhi, Padma Shanthi; Kaparaju, Prasad; Rintala, Jukka.

In: Bioresource Technology, Vol. 101, No. 8, 04.2010, p. 2818-2824.
Research output: Contribution to journal › Article › Scientific › peer-review

Surface science analysis and surface modification methods for biomaterials research. / Kanninen, L.; Jokinen, N.; Lahtonen, K.; Jussila, P.; Ali-Löyty, H.; Hirsimäki, M.; Leppiniemi, J.; Hytönen, V.; Kulomaa, M.; Ahola, N.; Paakinaho, K.; Kellomäki, M.; Valden, M.

In: European Cells and Materials, Vol. 20, No. SUPPL. 3, 01.01.2010, p. 133.
Research output: Contribution to journal › Article › Scientific › peer-review

On entropy-based molecular descriptors : Statistical analysis of real and synthetic chemical structures. / Dehmer, Matthias; Varmuza, Kurt; Borgert, Stephan; Emmert-Streib, Frank.

In: Journal of Chemical Information and Modeling, Vol. 49, No. 7, 27.07.2009, p. 1655-1663.
Research output: Contribution to journal › Article › Scientific › peer-review

Biogas production from boreal herbaceous grasses - Specific methane yield and methane yield per hectare. / Seppälä, Mari; Paavola, Teija; Lehtomäki, Annamari; Rintala, Jukka.

In: Bioresource Technology, Vol. 100, No. 12, 06.2009, p. 2952-2958.
Research output: Contribution to journal › Article › Scientific › peer-review

Impact of crop species on bacterial community structure during anaerobic co-digestion of crops and cow manure. / Wang, Hong; Lehtomäki, Annamari; Tolvanen, Katariina; Puhakka, Jaakko; Rintala, Jukka.

In: Bioresource Technology, Vol. 100, No. 7, 04.2009, p. 2311-2315.
Research output: Contribution to journal › Article › Scientific › peer-review

Storing energy crops for methane production : Effects of solids content and biological additive. / Pakarinen, Outi; Lehtomäki, Annamari; Rissanen, Sanna; Rintala, Jukka.

In: Bioresource Technology, Vol. 99, No. 15, 10.2008, p. 7074-7082.
Research output: Contribution to journal › Article › Scientific › peer-review

Effects of storage on characteristics and hygienic quality of digestates from four co-digestion concepts of manure and biowaste. / Paavola, Teija; Rintala, Jukka.

In: Bioresource Technology, Vol. 99, No. 15, 10.2008, p. 7041-7050.
Research output: Contribution to journal › Article › Scientific › peer-review

Group-specific quantification of methanotrophs in landfill gas-purged laboratory biofilters by tyramide signal amplification-fluorescence in situ hybridization. / Wang, Hong; Einola, Juha; Heinonen, Mirja; Kulomaa, Markku; Rintala, Jukka.

In: Bioresource Technology, Vol. 99, No. 14, 09.2008, p. 6426-6433.
Research output: Contribution to journal › Article › Scientific › peer-review

Anaerobic digestion of grass silage in batch leach bed processes for methane production. / Lehtomäki, A.; Huttunen, S.; Lehtinen, T. M.; Rintala, J. A.

In: Bioresource Technology, Vol. 99, No. 8, 05.2008, p. 3267-3278.
Research output: Contribution to journal › Article › Scientific › peer-review

Leachate and gaseous emissions from initial phases of landfilling mechanically and mechanically-biologically treated municipal solid waste residuals. / Sormunen, Kai; Einola, Juha; Ettala, Matti; Rintala, Jukka.

In: Bioresource Technology, Vol. 99, No. 7, 05.2008, p. 2399-2409.
Research output: Contribution to journal › Article › Scientific › peer-review

Effects of solid-liquid separation on recovering residual methane and nitrogen from digested dairy cow manure. / Kaparaju, P. L N; Rintala, J. A.

In: Bioresource Technology, Vol. 99, No. 1, 01.2008, p. 120-127.
Research output: Contribution to journal › Article › Scientific › peer-review

Anaerobic on-site treatment of kitchen waste in combination with black water in UASB-septic tanks at low temperatures. / Luostarinen, S.; Rintala, J.

In: *Bioresource Technology*, Vol. 98, No. 9, 07.2007, p. 1734-1740.
Research output: Contribution to journal > Article > Scientific > peer-review

Hydrolysis rates, methane production and nitrogen solubilisation of grey waste components during anaerobic degradation. / Jokela, J. P Y; Vavilin, V. A.; Rintala, J. A.

In: *Bioresource Technology*, Vol. 96, No. 4, 03.2005, p. 501-508.
Research output: Contribution to journal > Article > Scientific > peer-review

Modeling solid waste decomposition. / Vavilin, V. A.; Lokshina, L. Ya; Jokela, J. P Y; Rintala, J. A.

In: *Bioresource Technology*, Vol. 94, No. 1, 08.2004, p. 69-81.
Research output: Contribution to journal > Article > Scientific > peer-review

Comparison of laboratory-scale thermophilic biofilm and activated sludge processes integrated with a mesophilic activated sludge process. / Suvilampi, J.; Lehtomäki, A.; Rintala, J.

In: *Bioresource Technology*, Vol. 88, No. 3, 07.2003, p. 207-214.
Research output: Contribution to journal > Article > Scientific > peer-review

Modeling of anaerobic degradation of solid slaughterhouse waste : Inhibition effects of long-chain fatty acids or ammonia. / Lokshina, L. Y.; Vavilin, V. A.; Salminen, E.; Rintala, J.

In: *Applied Biochemistry and Biotechnology*, Vol. 109, No. 1-3, 04.2003, p. 15-32.
Research output: Contribution to journal > Article > Scientific > peer-review

Anaerobic digestion of organic solid poultry slaughterhouse waste - A review. / Salminen, E.; Rintala, J.

In: *Bioresource Technology*, Vol. 83, No. 1, 2002, p. 13-26.
Research output: Contribution to journal > Article > Scientific > peer-review

Anaerobically digested poultry slaughterhouse wastes as fertiliser in agriculture. / Salminen, E.; Rintala, J.; Härkönen, J.; Kuitunen, M.; Högmander, H.; Oikari, A.

In: *Bioresource Technology*, Vol. 78, No. 1, 2001, p. 81-88.
Research output: Contribution to journal > Article > Scientific > peer-review

Biological treatment of pulp and paper mill process and wastewaters under thermophilic conditions - A review. / Suvilampi, J.; Lepistö, R.; Rintala, J.

In: *Paperi ja puu*, Vol. 83, No. 4, 2001, p. 320-325.
Research output: Contribution to journal > Article > Scientific > peer-review

Biokalvojen rakenteen ja toiminnan simulointi tuo uutta tietoa rasvoista. / Hyvönen, Marja T.; Rantala, Tapio T.; Ala-Korpela, Mika.

In: *Kemia - Kemi*, Vol. 26, No. 3, 1999, p. 222-225.
Research output: Contribution to journal > Article > Scientific > peer-review

Start-up and Operation of Laboratory-Scale Thermophilic Upflow Anaerobic Sludge Blanket Reactors Treating Vegetable Processing Wastewaters. / Lepistö, Satu S.; Rintala, Jukka A.

In: *Journal of Chemical Technology and Biotechnology*, Vol. 68, No. 3, 03.1997, p. 331-339.
Research output: Contribution to journal > Article > Scientific > peer-review

A two-stage thermophilic anaerobic process for the treatment of source sorted household solid waste. / Rintala, Jukka A.; Ahring, Birgitte K.

In: *Biotechnology Letters*, Vol. 16, No. 10, 10.1994, p. 1097-1102.
Research output: Contribution to journal > Article > Scientific > peer-review

Thermophilic anaerobic digestion of source-sorted household solid waste : the effects of enzyme additions. / Rintala, Jukka A.; Ahring, Birgitte K.

In: *Applied Microbiology and Biotechnology*, Vol. 40, No. 6, 02.1994, p. 916-919.
Research output: Contribution to journal > Article > Scientific > peer-review

Sorption and retention of ethylene glycol monoethyl ether (EGME) on silicas. / Kellomäki, Aarre; Kuula-Väisänen, Pirjo; Nieminen, Pertti.

In: *Journal of Colloid and Interface Science*, Vol. 129, No. 2, 1989, p. 373-378.

Research output: Contribution to journal › Article › Scientific › peer-review

A Finite Cluster Approach to the Electron-Hole Pair Damping of the Adsorbate Vibration : CO Adsorbed on Cu(100). / Rantala, T. T.; Rosén, A.; Helsing, B.

In: *Studies in Surface Science and Catalysis*, Vol. 26, No. C, 1986, p. 173-181.

Research output: Contribution to journal › Article › Scientific › peer-review

Mixed carbon substrates : a necessary nuisance or a missed opportunity? / Liu, Nian; Santala, Suvi; Stephanopoulos, Gregory.

In: *CURRENT OPINION IN BIOTECHNOLOGY*, Vol. 62, 01.04.2020, p. 15-21.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Applications of nanocellulose/nanocarbon composites : Focus on biotechnology and medicine. / Bacakova, Lucie; Pajorova, Julia; Tomkova, Maria; Matejka, Roman; Broz, Antonin; Stepanovska, Jana; Prazak, Simon; Skogberg, Anne; Siljander, Sanna; Kallio, Pasi.

In: *Nanomaterials*, Vol. 10, No. 2, 196, 2020.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Understanding the Role of Lipids in Signaling Through Atomistic and Multiscale Simulations of Cell Membranes. / Manna, Moutusi; Nieminen, Tuomo; Vattulainen, Ilpo.

In: *ANNUAL REVIEW OF BIOPHYSICS*, Vol. 48, 06.05.2019, p. 421-439.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Effects of wastewater constituents and operational conditions on the composition and dynamics of anodic microbial communities in bioelectrochemical systems. / Kokko, Marika; Epple, Stefanie; Gescher, Johannes; Kerzenmacher, Sven.

In: *Bioresource Technology*, Vol. 258, 01.06.2018, p. 376-389.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Waves in hyperbolic and double negative metamaterials including rogues and solitons. / Boardman, A. D.; Alberucci, A.; Assanto, G.; Grimalsky, V. V.; Kibler, B.; McNiff, J.; Nefedov, I. S.; Rapoport, Yu G.; Valagiannopoulos, C. A.

In: *Nanotechnology*, Vol. 28, No. 44, 444001, 09.10.2017.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Liquid flame spray—a hydrogen-oxygen flame based method for nanoparticle synthesis and functional nanocoatings. / Mäkelä, Jyrki M.; Haapanen, Janne; Harra, Juha; Juuti, Paxton; Kujanpää, Sonja.

In: *KONA POWDER AND PARTICLE JOURNAL*, Vol. 2017, No. 34, 2017, p. 141-154.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Recent advances in nutrient removal and recovery in biological and bioelectrochemical systems. / Nancharaiah, Y. V.; Venkata Mohan, S.; Lens, P. N. L.

In: *Bioresource Technology*, Vol. 215, 09.2016, p. 173-185.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Metals removal and recovery in bioelectrochemical systems : A review. / Nancharaiah, Y. V.; Venkata Mohan, S.; Lens, P.N.L.

In: *Bioresource Technology*, Vol. 195, 2015, p. 102-114.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Stimuli-responsive photonic polymer coatings. / Stumpel, Jelle E.; Broer, Dirk J.; Schenning, Albertus P H J.

In: *Chemical Communications*, Vol. 50, No. 100, 28.12.2014, p. 15839-15848.

Research output: Contribution to journal › Review Article › Scientific › peer-review

Enablers and barriers of smart data-based asset management services in industrial business networks. / Ahonen, Toni; Hanski, Jyri; Hyvärinen, Matti; Kortelainen, Helena; Uusitalo, Teuvo; Vainio, Henri; Kunttu, Susanna; Koskinen, Kari. Lecture Notes in Mechanical Engineering. Pleiades Publishing, 2019. p. 51-60 (Lecture Notes in Mechanical Engineering).

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Understanding selenium biogeochemistry in engineered ecosystems : Transformation and analytical methods. / Jain, Rohan; Van Hullebusch, Eric D.; Lenz, Markus; Farges, François.

Bioremediation of Selenium Contaminated Wastewater. Springer International Publishing, 2017. p. 33-56.

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Nanostructured Ionomeric Elastomers. / Basu, Debdipta; Das, Amit; Stöckelhuber, Klaus Werner; Wießner, Sven.

Designing of Elastomer Nanocomposites: From Theory to Applications. ed. / Klaus Werner Stöckelhuber; Amit Das; Manfred Klüppel. Springer International Publishing, 2016. p. 235-266 (Advances in Polymer Science; Vol. 275).

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Framework for optimization and scheduling of a copper production plant. / Suominen, Olli; Mörsky, Ville; Ritala, Risto; Vilkkö, Matti.

26th European Symposium on Computer Aided Process Engineering, 2016. Vol. 38 Elsevier Science B.V., 2016. p. 1243-1248 (Computer Aided Chemical Engineering).

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Two models for hydraulic cylinders in flexible multibody simulations. / Ylinen, Antti; Mäkinen, Jari; Kouhia, Reijo.

Computational Methods for Solids and Fluids: Multiscale Analysis, Probability Aspects and Model Reduction. Springer, 2016. p. 463-493 (Computational Methods in Applied Sciences; Vol. 41).

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Functional model for organisational and safety culture. / Porkka, Pasi L.

Chemical Engineering Transactions. Italian Association of Chemical Engineering AIDIC, 2016. p. 907-912 (Chemical Engineering Transactions; Vol. 48).

Research output: Chapter in Book/Report/Conference proceeding › Chapter › Scientific › peer-review

Enhancing CT 3D Images by Independent Component Analysis of Projection Images. / Hannula, Markus; Hyttinen, Jari A.K.; Tanskanen, Jarno M.A.

15th Mediterranean Conference on Medical and Biological Engineering and Computing – MEDICON 2019 - Proceedings of MEDICON 2019. ed. / Jorge Henriques; Paulo de Carvalho; Nuno Neves. Springer, 2020. p. 381-389 (IFMBE Proceedings; Vol. 76).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Ectopic Beat Detection from Wrist Optical Signals for Sinus Rhythm and Atrial Fibrillation Subjects. / Haddad, Serj; Harju, Jarkko; Tarniceriu, Adrian; Halkola, Tuomas; Parak, Jakob; Korhonen, Ilkka; Yli-Hankala, Arvi; Vehkaoja, Antti.

15th Mediterranean Conference on Medical and Biological Engineering and Computing – MEDICON 2019 - Proceedings of MEDICON 2019. ed. / Jorge Henriques; Paulo de Carvalho; Nuno Neves. Springer, 2020. p. 150-158 (IFMBE Proceedings; Vol. 76).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Deformability analysis and improvement in stretchable electronics systems through finite element analysis. / Di Vito, Donato; Mosallaei, Milad; Vahed, Behnam Khorramdel; Kanerva, Mikko; Mäntysalo, Matti.

Proceedings of XXIV AIMETA Conference 2019. ed. / Antonio Carcaterra; Giorgio Graziani; Achille Paolone. Springer, 2020. p. 755-763 (Lecture Notes in Mechanical Engineering).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Moving Web and Dynamic Problem of Aerothermoelastic Vibrations and Instability. / Banichuk, Nikolay; Ivanova, Svetlana; Jeronen, Juha.

Advanced Problems in Mechanics: Proceedings of the 47th International Summer School-Conference on Advanced Problems in Mechanics, APM 2019. ed. / D.A. Indeitsev; A.M. Krivtsov. Springer, 2020. p. 66-71 (Lecture Notes in Mechanical Engineering).

Miniaturized stimulator for imaging of live cell responses to high frequency mechanical vibration. / Halonen, Heidi T.; Hyttinen, Jari A.K.; Ihalainen, Teemu O.

CMBEBIH 2019 - Proceedings of the International Conference on Medical and Biological Engineering. ed. / Almir Badnjevic; Lejla Gurbeta Pokvić; Ranko Škrbić; Almir Badnjevic; Lejla Gurbeta Pokvić. Springer Verlag, 2019. p. 21-27 (IFMBE Proceedings; Vol. 73).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

The electrical conductivity of human cerebrospinal fluid in vivo. / Latikka, Juha; Eskola, Hannu.

World Congress on Medical Physics and Biomedical Engineering 2018. Springer, 2019. p. 773-776 (IFMBE Proceedings; Vol. 68, No. 1).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

μCT based characterization of biomaterial scaffold microstructure under compression. / Hannula, Markus; Narra, Nathaniel; Paakinaho, Kaarlo; Haaparanta, Anne-Marie; Kellomäki, Minna; Hyttinen, Jari.

World Congress on Medical Physics and Biomedical Engineering 2018. Springer, 2019. p. 165-169 (IFMBE Proceedings; Vol. 68, No. 3).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Electrical stimulation of eye blink in individuals with dry eye symptoms caused by chronic unilateral facial palsy. /

Lylykangas, J.; Ilves, M.; Venesvirta, H.; Rantanen, V.; Mäkelä, E.; Vehkaoja, A.; Verho, J.; Leikkala, J.; Rautiainen, M.; Surakka, V.

CMBEBIH 2019 - Proceedings of the International Conference on Medical and Biological Engineering. ed. / Almir Badnjevic; Lejla Gurbeta Pokvić; Ranko Škrbić; Almir Badnjevic; Lejla Gurbeta Pokvić. Springer Verlag, 2019. p. 7-11 (IFMBE Proceedings; Vol. 73).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Nanocellulose and Polylactic Acid Based Multilayer Coatings for Barrier Applications. / Lahti, Johanna.

17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. p. 446-455.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Market implementation of active and intelligent packaging-opportunities from a socio-economic perspective. / Lahti, Johanna.

17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. p. 419-427.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Effect of polyolefin molecular structure on product properties in extrusion coating. / Suokas, Esa.

17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. p. 89-98.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Detection and assessment of sleep-disordered breathing with emfit mattress. / Tenhunen, Mirja; Hyttinen, J.; Viik, J.; Perez-Macias, Jose Maria; Himanen, S. L.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 173-176 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Time characteristics of prolonged partial obstruction periods using an Emfit mattress. / Perez-Macias, Jose Maria; Viik, Jari; Värrö, Alpo; Himanen, Sari-Leena; Tenhunen, Mirja.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 775-778 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Auto-regression-driven, reallocative particle filtering approaches in PPG-based respiration rate estimation. / Pirhonen, Mikko; Suominen, Olli; Vehkaoja, A.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1020-1024 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Altered synaptic signaling due to β -amyloid interference in astrocytes : A modeling study. / Havela, R.; Manninen, T.; Linne, M. L.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 679-682 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Performance analysis of novel flexible electrodes for wearable ECG/heart rate monitoring. / Kaappa, E. S.; Joutsen, A. S.; Vanhala, J.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 237-240 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Stimulation waveform selection to suppress functional electrical stimulation artifact from surface EMG signals. / Rantanen, Ville; Vehkaoja, Antti; Verho, Jarmo.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 422-425 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

A case study of focal bayesian EEG inversion for whitney element source spaces : Mesh-based vs. cartesian orientations. / Miinalainen, T.; Pursiainen, S.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1065-1068 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Pathvalue : Pathways with value. / Losoi, Pauli; Aho, Tommi.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 583-586 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Temperature effect on the baseline noise in MEA measurements. / Rynnänen, Tomi; Leikkala, Jukka.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 5-8 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Dry electrode sizes in recording ECG and heart rate in wearable applications. / Joutsen, Atte S.; Kaappa, Emma S.; Karinsalo, Tapio J.; Vanhala, Jukka.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 735-738 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

High resolution E-jet printed temperature sensor on artificial skin. / Vuorinen, T.; Laurila, M. M.; Mangayil, R.; Karp, M.; Mäntysalo, M.

EMBECE and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 839-842 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Identification of feasible pathway information for c-di-GMP binding proteins in cellulose production. / Hassan, Syeda Sakira ; Mangayil, Rahul; Aho, Tommi; Yli-Harja, Olli; Karp, Matti.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 667-670 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Nocturnal use of light compression garments and recovery. / Jokinen, V.I.; Korpela, J.; Lehtinen, E.; Perttunen, J.; Viik, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 125-128 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Human activity recognition using a single optical heart rate monitoring wristband equipped with triaxial accelerometer. /

Mehrang, Saeed; Pietilä, Julia; Tolonen, Johanna; Helander, Elina; Jimison, Holly; Pavel, Misha; Korhonen, Ilkka.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 587-590 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Reproducible preparation method of hydrogels for cell culture applications – Case study with spermidine crosslinked gellan gum. / Gering, C.; Koivisto, J. T.; Parraga, J. E.; Kellomäki, M.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 811-814 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Computational model for multifocal imaging in optical projection tomography and numerical analysis of all-in-focus fusion in tomographic image reconstruction. / Koskela, O.; Pursiainen, S.; Belay, B.; Montonen, T.; Figueiras, E.; Hyttinen, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 282-285 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Multiresolution MAPEM method for 3D reconstruction of symmetrical particles with electron microscopy. / Acar, E.;

Baikoghli, M. A.; Stark, M.; Peltonen, S.; Ruotsalainen, U.; Cheng, R. H.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 141-144 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Twelve years follow-up of ballistocardiography. / Alametsä, J.; Viik, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1117-1120 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Predicting gene expression levels from histone modification signals with convolutional recurrent neural networks. / Zhu, Lingyu; Kesseli, Juha; Nykter, Matti; Huttunen, Heikki.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 555-558 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Characterization of chloride channels in human embryonic stem cell derived retinal pigment epithelium. / Korkka, I.;

Johansson, J. K.; Skottman, H.; Hyttinen, J.; Nymark, S.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p.

454-457 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Evaluating different shapes of cranial fixation mini-plates using finite element method. / Chamrad, J.; Marcián, P.; Narra, N.; Borák, L.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 747-750 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

A strategy for dissecting the kinetics of transcription repression mechanisms. / Palma, Cristina S.D.; Startceva, Sofia; Neeli-Venkata, Ramakanth; Zare, Marzieh; Goncalves, Nadia S.M.; Fonseca, Jose M.; Oliveira, Samuel M.D.; Ribeiro, Andre S.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1097-1100 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Nonlinear local projection filter for impedance pneumography. / Gracia, J.; Seppä, V. P.; Pelkonen, A.; Kotaniemi-Syrjänen, A.; Mäkelä, M.; Malmberg, P.; Viik, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Singapore : Springer Verlag, 2018. p. 306-309 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Evaluation of the accuracy and reliability for photoplethysmography based heart rate and beat-to-beat detection during daily activities. / Pietilä, J.; Mehrang, S.; Tolonen, J.; Helander, E.; Jimison, H.; Pavel, M.; Korhonen, I.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 145-148 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Wearable RFID perspiration sensor tags for well-being applications – From laboratory to field use. / Mulholland, Kyle; Virkki, J.; Raunonen, P.; Merilampi, S.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1012-1015 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Impacts of laminin and polyethyleneimine surface coatings on morphology of differentiating human SH-SY5Y cells and networks. / Teppola, H.; Sarkanen, J. R.; Jalonen, T. O.; Linne, M. L.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 298-301 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Artificial eye blink pacemaker - A first investigation into the blink production using constant-interval electrical stimulation. / Lylykangas, J.; Ilves, M.; Venesvirta, H.; Rantanen, V.; Mäkelä, E.; Vehkaoja, A.; Verho, J.; Lekkala, J.; Rautiainen, M.; Surakka, V.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 522-525 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Connectivity analysis of full montage EEG in traumatic brain injury patients in the ICU. / Lipping, T.; Erkintalo, N.; Särkelä, M.; Takala, R. S.K.; Katila, A.; Frantzen, J.; Posti, J. P.; Müller, M.; Tenovu, O.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 97-100 (IFMBE Proceedings; Vol. 65).

Electric field of eeg during anesthesia. / Jääntti, Ville; Subramaniyam, Narayan Puthanmadam; Kamata, Kotoe; Ylinen, Tuomo; Yli-Hankala, Arvi; Kauppinen, Pasi; Väisänen, Outi.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 354-357 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Learned vs. hand-designed features for ECG beat classification : A comprehensive study. / Ince, T.; Zabihi, M.; Kiranyaz, S.; Gabbouj, M.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 551-554 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Optical projection tomography imaging of single cells in 3D gellan gum hydrogel. / Belay, B.; Koivisto, J. T.; Vuornos, K.; Montonen, T.; Koskela, O.; Lehti-Polojärvi, M.; Miettinen, S.; Kellomäki, M.; Figueiras, E.; Hyttinen, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 996-999 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Texture-property relations of bioamine crosslinked gellan gum hydrogels. / Koivisto, J.T.; Koskela, O.; Montonen, T.; Parraga, J. E.; Joki, T.; Ylä-Outinen, L.; Narkilahti, S.; Figueiras, E.; Hyttinen, J.; Kellomäki, M.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 189-192 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Low-latency EMG onset and termination detection for facial pacing. / Kontunen, A.; Rantanen, V.; Vehkaoja, A.; Ilves, M.; Lylykangas, J.; Mäkelä, E.; Rautiainen, M.; Surakka, V.; Lekkala, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1016-1019 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Linearity of simultaneously recorded impedance pneumography and direct pneumotachography in thoracic surgery patients. / Jauhainen, Milla; Gracia, J.; Seppä, V. P.; Mahrberg, H.; Tuomisto, L.; Laurikka, J.; Viik, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 1077-1080 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Automated pipeline for brain ROI analysis with results comparable to previous freehand measures in clinical settings. / Ilvesmäki, T.; Hakulinen, U.; Eskola, H.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 635-638 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Correlation of depth of anesthesia indexes with MAC in volatile anesthesia. / Olejarczyk, Elzbieta; Lipping, T.; Marciniak, R.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 972-975 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Physical characteristics of collimators for dual-isotope imaging with ^{99m}Tc and ^{123}I . / Tunninen, V.; Kauppinen, T.; Eskola, H.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 245-249 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Optimization of ^{99m}Tc -sestamibi/ ^{123}I subtraction SPECT/CT protocol for parathyroid scintigraphy. / Tunninen, V.; Kauppinen, T.; Eskola, H.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 847-851 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Nonlinear dynamics of heart rate variability in children with asthmatic symptoms. / Milagro, J.; Gil, E.; Bolea, J.; Seppä, V. P.; Malmberg, L. P.; Pelkonen, A. S.; Kotaniemi-Syrjänen, A.; Mäkelä, M. J.; Viik, J.; Bailón, R.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Vol. 65 Springer Verlag, 2018. p. 815-818 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Comparison of linear and non-linear heart rate variability indices between preterm infants at their theoretical term age and full term newborns. / Helander, E.; Khodor, N.; Kallonen, A.; Värrä, A.; Patural, H.; Carrault, G.; Pladys, P.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 153-156 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Coronary artery disease diagnosis by means of heart rate variability analysis using respiratory information. / Hernando, D.; Kähönen, M.; Lázaro, J.; Lehtinen, R.; Nieminen, T.; Nikus, K.; Lehtimäki, T.; Bailón, R.; Viik, J.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2018. p. 270-273 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Finite element mapping for efficient image reconstruction in rotational electrical impedance tomography. / Koskela, Olli; Lehti-Polojärvi, Mari; Seppänen, Aku; Figueiras, Edite; Hyttinen, Jari.

World Congress on Medical Physics and Biomedical Engineering 2018. Vol. 2 Springer, 2018. p. 901-904 (IFMBE Proceedings; Vol. 68).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Atrial fibrillation detection from wrist photoplethysmography data using artificial neural networks. / Rezaei Yousefi, Zeinab; Parak, Jakub; Tarniceriu, Adrian; Harju, Jarkko; Yli-Hankala, Arvi; Korhonen, Ilkka; Vehkaoja, Antti.

World Congress on Medical Physics and Biomedical Engineering 2018. Vol. 2 Springer, 2018. p. 399-404 (IFMBE Proceedings; Vol. 68).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Effects of nitroglycerin to ballistocardiography by EMFi. / Alametsä, Jarmo; Viik, Jari.

World Congress on Medical Physics and Biomedical Engineering 2018. Vol. 2 Springer, 2018. p. 541-545 (IFMBE Proceedings; Vol. 68).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

A neural network strategy for learning of nonlinearities toward feed-forward control of pressure-compensated hydraulic valves with a significant dead zone. / Nurmi, Jarmo; Aref, Mohammad M.; Mattila, Jouni.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Floating frame of reference formulation for a flexible manipulator with hydraulic actuation - Modelling and experimental validation. / Mäkinen, Petri; Dmitrochenko, Oleg; Mattila, Jouni.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Bilateral teleoperation of a hydraulic robotic manipulator in contact with physical and virtual constraints. / Lampinen, Santeri; Koivumäki, Janne; Mattila, Jouni.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Model-based control of a digital hydraulic transformer-based hybrid actuator. / Linjama, Matti.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Effect of driver and work cycle on losses of a loader. / Tikkanen, Seppo; Ahola, Ville; Koskela, Elias.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Direct position control of electro-hydraulic excavator. / Danaee, Siavash; Nurmi, Jarmo; Minav, Tatiana; Mattila, Jouni; Pietola, Matti.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Addressing closed-chain dynamics for high-precision control of hydraulic cylinder actuated manipulators. / Koivumäki, Janne; Zhu, Wen Hong; Mattila, Jouni.

BATH/ASME 2018 Symposium on Fluid Power and Motion Control, FPMC 2018. ASME, 2018.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Novel equipment to simulate hot air heat sealability of packaging materials. / Lahti, Johanna; Kuusipalo, Jurkka; Auvinen, Sanna.

16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017. p. 237-248.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Effect of air gap on the adhesion of PET layer on cardboard substrate in extrusion coating. / Suokas, Esa.

16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017. p. 529-544.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Novel bio-based materials for active and intelligent packaging. / Lahti, Johanna; Kamppuri, Taina; Kuusipalo, Jurkka.

16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Tampere University of Technology, laboratory of materials science, paper converting and packaging technology Tampere, Finland. / Kuusipalo, Jurkka; Lahti, Johanna.

16th TAPPI European PLACE Conference 2017: Basel; Switzerland; 22 May 2017 through 24 May 2017. Vol. May-2017 TAPPI Press, 2017.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Electrode comparison for textile-integrated electrocardiogram and impedance pneumography measurement. / Tuohimäki, Katariina; Mahdiani, S.; Jeyhani, V.; Vehkaoja, A.; Iso-Ketola, P.; Vanhala, J.; Viik, J.; Mäntysalo, M.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Vol. 65 Springer Verlag, 2017. p. 302-305 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Day-to-day repeatability of the results of the finger-toe-plot analysis. / Peltokangas, M.; Telembeci, A.A.; Verho, J.; Lekkala, J.; Vehkaoja, A.; Oksala, N.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2017. p. 534-537 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Short-term stability of combined finger and toe photoplethysmogram analysis. / Peltokangas, M.; Huotari, M.; Verho, J.; Mattila, V. M.; Röning, J.; Romsa, P.; Lekkala, J.; Vehkaoja, A.; Oksala, N.

EMBEC and NBC 2017 - Joint Conference of the European Medical and Biological Engineering Conference EMBEC 2017 and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics, NBC 2017. Springer Verlag, 2017. p. 342-345 (IFMBE Proceedings; Vol. 65).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

X-ray microtomography of collagen and polylactide samples in liquids. / Hannula, M.; Haaparanta, A. M.; Tamminen, I.; Aula, A.; Kellomäki, M.; Hyttinen, J.

XIV Mediterranean Conference on Medical and Biological Engineering and Computing 2016: MEDICON 2016, March 31st–April 2nd 2016, Paphos, Cyprus. Springer Verlag, 2016. p. 420-424 (IFMBE Proceedings; Vol. 57).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

A novel generic algorithm for robust physiological signal classification. / Mahdiani, Shadi; Vanhala, J.; Viik, J.

XIV Mediterranean Conference on Medical and Biological Engineering and Computing 2016: MEDICON 2016, March 31st–April 2nd 2016, Paphos, Cyprus. Springer Verlag, 2016. p. 1038-1043 (IFMBE Proceedings; Vol. 57).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

A review of transient suppression methods of IIR notch filters used for power-line interference rejection in ECG measurement. / Mahdiani, Shadi; Jeyhani, Vala; Vehkaoja, Antti.

IFMBE Proceedings. Vol. 57 Springer Verlag, 2016. p. 151-156 (IFMBE Proceedings).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

A tool for geometrical measurements of orthognathic surgery changes using cone beam computed tomography. / Prakash, Mithilesh; Peltomäki, Timo; Eskola, Hannu.

XIV Mediterranean Conference on Medical and Biological Engineering and Computing 2016: MEDICON 2016, March 31st–April 2nd 2016, Paphos, Cyprus. Springer Verlag, 2016. p. 430-433 (IFMBE Proceedings; Vol. 57).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Optimal short distance electrode locations for impedance pneumography measurement from the frontal thoracic area. / Jeyhani, Vala; Vuorinen, Tiina; Nojonen, Kai; Mäntysalo, Matti; Vehkaoja, Antti.

XIV Mediterranean Conference on Medical and Biological Engineering and Computing 2016: MEDICON 2016, March 31st–April 2nd 2016, Paphos, Cyprus. Springer Verlag, 2016. p. 1138-1143 (IFMBE Proceedings; Vol. 57).

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Nanoscale barrier coating on BOPP packaging film by ALD. / Lahti, Johanna.

TAPPI PLACE Conference 2016: Exploring New Frontiers. TAPPI Press, 2016. p. 493-505.

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Roll-to-roll application of photocatalytic TiO₂ nanoparticles for printed functionality. / Saarinen, J. J.; Valtakari, D.; Bollström, R.; Stepien, M.; Haapanen, J.; Mäkelä, J. M.; Toivakka, M.

Advanced Manufacturing, Electronics and Microsystems: TechConnect Briefs 2016. Vol. 4 TechConnect, 2016. p. 47-50.

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

'miSimBa' - A simulator of synthetic time-lapsed microscopy images of bacterial cells. / Martins, Leonardo; Fonseca, Jose; Ribeiro, Andre.

Proceedings - 2015 IEEE 4th Portuguese Meeting on Bioengineering, ENBENG 2015. The Institute of Electrical and Electronics Engineers, Inc., 2015. 7088854.

Research output: Chapter in Book/Report/Conference proceeding > Conference contribution > Scientific > peer-review

Fungal treatment of landfill mining fine fraction to increase its stability and end-use potential. / Palmroth, Marja Riitta Tuulikki; Mönkäre, Tiina Johanna; Steffen, Kari T.

Book of abstracts of the 6th European Bioremediation Conference. ed. / Nicolas Kalogerakis; Fabio Fava; Elena Manousaki. 2015. p. 47-169.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Improving the effect of nanoscale barrier coating on BOPP film properties : Influence of substrate contamination, web handling and pretreatments. / Lahti, Johanna; Johansson, Petri; Lahtinen, Kimmo; Cameron, David C.; Seppänen, Tarja. TAPPI PLACE Conference 2014. Vol. 2 TAPPI Press, 2014. p. 1039-1061.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Improving the effect of a nanoscale barrier coating on BOPP film properties by surface pretreatments. / Lahtinen, Kimmo; Lahti, Johanna; Johansson, Petri; Seppänen, Tarja; Cameron, David C. 14th European PLACE Conference 2013. Vol. 1 TAPPI Press, 2013. p. 469-493.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Conductive layers on surface modified natural fibre based substrates for printed functionality. / Valtakari, Dimitar; Bollström, Roger; Tuominen, Mikko; Teisala, Hannu; Aromaa, Mikko; Toivakka, Martti; Kuusipalo, Jurkka; Mäkelä, Jyrki M.; Uozumi, Jun; Saarinen, Jarkko J. AIChE 2012 - 2012 AIChE Annual Meeting, Conference Proceedings. 2012.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Nanoparticle deposition on packaging materials by the liquid flame spray. / Teisala, Hannu; Tuominen, Mikko; Aromaa, Mikko; Mäkelä, Jyrki M.; Stepien, Milena; Saarinen, Jarkko J.; Toivakka, Martti; Kuusipalo, Jurkka. 13th European PLACE Conference 2011. Vol. 1 2011.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Effect of pre-treatments on barrier properties of layers applied by atomic layer deposition onto polymer-coated substrates. / Vähä-Nissi, M.; Hirvikorpi, T.; Sievänen, J.; Salo, E.; Harlin, A.; Johansson, P.; Kuusipalo, J. 13th European PLACE Conference 2011. Vol. 1 2011. p. 447.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

The effects of corona and flame treatment : Part 2. PE-HD and PP coated papers. / Lahti, Johanna; Tuominen, Mikko; Penttinen, Tapani; Räsänen, Jari P.; Kuusipalo, Jurkka. TAPPI Press - 12th European PLACE Conference 2009. Vol. 1 2009. p. 278-314.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

Statistical modeling of water vapor transmission rates for extrusion-coated papers. / Lahtinen, Kimmo; Kuusipalo, Jurkka. TAPPI 2008 PLACE Conference: Innovations in Flexible Consumer Packaging. 2008.

Research output: Chapter in Book/Report/Conference proceeding › Conference contribution › Scientific › peer-review

EMBEC & NBC 2017 : Joint Conference of the European Medical and Biological Engineering Conference (EMBEC) and the Nordic-Baltic Conference on Biomedical Engineering and Medical Physics (NBC), Tampere, Finland, June 2017. / Eskola, Hannu (Editor); Väisänen, Outi (Editor); Viik, Jari (Editor); Hyttinen, Jari (Editor). Springer, 2017. 1139 p. (IFMBE Proceedings; Vol. 65).

Research output: Book/Report › Anthology › Scientific › peer-review

Designing of Elastomer Nanocomposites : From Theory to Application. / Stöckelhuber, Klaus Werner (Editor); Das, Amit (Editor); Klüppel, Manfred (Editor). Springer International Publishing, 2016. (Advances in Polymer Science; Vol. 275).

Research output: Book/Report › Anthology › Scientific › peer-review

Modular Instrumentation for Controlling and Monitoring In-Vitro Cultivation Environment and Image-based Functionality Measurements of Human Stem Cells. / Kattippambil Rajan, Dhanesh. Tampere University, 2020. (Tampere University Dissertations; Vol. 256).

Research output: Book/Report › Doctoral thesis › Collection of Articles

A simulation case study of production planning and control in printed wiring board manufacturing. / Korhonen, H. M E;
Heikkilä, Jussi; Törnwall, Jon M.
In: Winter Simulation Conference Proceedings, Vol. 2, 01.12.2001, p. 844-847.
Research output: Contribution to journal › Conference article › Scientific › peer-review