

Donadei, V., Koivuluoto, H., Sarlin, E., & Vuoristo, P. (2020). Lubricated icephobic coatings prepared by flame spraying with hybrid feedstock injection. *Surface and Coatings Technology*, 403, [126396]. <https://doi.org/10.1016/j.surfcoat.2020.126396>

Sarlin, E., Honkanen, M., Lindgren, M., Laihonon, P., Juutilainen, M., Vippola, M., & Vuorinen, J. (2020). The effect of substrate pre-treatment on durability of rubber-stainless steel adhesion. *Surfaces and Interfaces*, 21, [100646]. <https://doi.org/10.1016/j.surfin.2020.100646>

Tan, C., Ceballos, G., Kasabov, N., & Subramaniam, N. P. (2020). Fusionsense: Emotion classification using feature fusion of multimodal data and deep learning in a brain-inspired spiking neural network. *Sensors (Switzerland)*, 20(18), [5328]. <https://doi.org/10.3390/s20185328>

Olżyńska, A., Kulig, W., Mikkolainen, H., Czerniak, T., Jurkiewicz, P., Cwiklik, L., ... Vattulainen, I. (2020). Tail-Oxidized Cholesterol Enhances Membrane Permeability for Small Solutes. *Langmuir*, 36(35), 10438-10447. <https://doi.org/10.1021/acs.langmuir.0c01590>

Kaleva, A., Tassaing, T., Saarimaa, V., Le Bourdon, G., Väisänen, P., Markkula, A., & Levänen, E. (2020). Formation of corrosion products on zinc in wet supercritical and subcritical CO<sub>2</sub>: In-situ spectroscopic study. *Corrosion Science*, 174. <https://doi.org/10.1016/j.corsci.2020.108850>

Azemati, H., Jam, F., Ghorbani, M., Dehmer, M., Ebrahimpour, R., Ghanbaran, A., & Emmert-Streib, F. (2020). The role of symmetry in the aesthetics of residential building façades using cognitive science methods. *Symmetry*, 12(9), [1438]. <https://doi.org/10.3390/sym12091438>

He, H., Chen, X., Mehmood, A., Raivio, L., Huttunen, H., Raunonen, P., & Virkki, J. (2020). ClothFace: A Batteryless RFID-Based Textile Platform for Handwriting Recognition. *Sensors (Basel, Switzerland)*, 20(17), [4878]. <https://doi.org/10.3390/s20174878>

Truong, K. N., Rautiainen, J. M., Rissanen, K., & Puttreddy, R. (2020). The C-I<sup>-</sup>⋯O-N<sup>+</sup> Halogen Bonds with Tetraiodoethylene and Aromatic N-Oxides. *Crystal Growth and Design*, 20(8), 5330-5337. <https://doi.org/10.1021/acs.cgd.0c00560>

Lahikainen, M., Zeng, H., & Priimagi, A. (2020). Design principles for non-reciprocal photomechanical actuation. *Soft Matter*, 16(25), 5951-5958. <https://doi.org/10.1039/d0sm00624f>

Ojha, N., Szczodra, A., Boetti, N. G., Massera, J., & Petit, L. (2020). Nucleation and growth behavior of Er<sup>3+</sup> doped oxyfluorophosphate glasses. *RSC Advances*, 10(43), 25703-25716. <https://doi.org/10.1039/d0ra04681g>

Sharma, R. O., Rantala, T. T., & Hoggan, P. E. (2020). Selective hydrogen production at Pt(111) investigated by Quantum Monte Carlo methods for metal catalysis. *International Journal of Quantum Chemistry*, 120(11), [e26198]. <https://doi.org/10.1002/qua.26198>

Arvani, M., Keskinen, J., Railanmaa, A., Siljander, S., Björkqvist, T., Tuukkanen, S., & Lupo, D. (2020). Additive manufacturing of monolithic supercapacitors with biopolymer separator. *Journal of Applied Electrochemistry*, 50(6), 689-697. <https://doi.org/10.1007/s10800-020-01423-2>

Baratto, C., Golovanova, V., Faglia, G., Hakola, H., Niemi, T., Tkachenko, N., ... Golovanov, V. (2020). On the alignment of ZnO nanowires by Langmuir – Blodgett technique for sensing application. *Applied Surface Science*, 528, [146959]. <https://doi.org/10.1016/j.apsusc.2020.146959>

Isca, V. M. S., Ferreira, R. J., Garcia, C., Monteiro, C. M., Dinic, J., Holmstedt, S., ... Rijo, P. (2020). Molecular Docking Studies of Royleanone Diterpenoids from *Plectranthus* spp. as P-Glycoprotein Inhibitors. *ACS MEDICINAL CHEMISTRY LETTERS*, 11(5), 839-845. <https://doi.org/10.1021/acsmedchemlett.9b00642>

Alanen, J., Isotalo, M., Kuittinen, N., Simonen, P., Martikainen, S., Kuuluvainen, H., ... Rönkkö, T. (2020). Physical Characteristics of Particle Emissions from a Medium Speed Ship Engine Fueled with Natural Gas and Low-Sulfur Liquid Fuels. *Environmental Science and Technology*, 54(9), 5376-5384. <https://doi.org/10.1021/acs.est.9b06460>

Javanainen, M., Ollila, O. H. S., & Martinez-Seara, H. (2020). Rotational Diffusion of Membrane Proteins in Crowded Membranes. *Journal of Physical Chemistry B*, 124(15), 2994-3001. <https://doi.org/10.1021/acs.jpcc.0c00884>

Haavisto, J. M., Kokko, M. E., Lakaniemi, A. M., Sulonen, M. L. K., & Puhakka, J. A. (2020). The effect of start-up on energy recovery and compositional changes in brewery wastewater in bioelectrochemical systems. *BIOELECTROCHEMISTRY*, 132, [107402]. <https://doi.org/10.1016/j.bioelechem.2019.107402>

Twum, K., Rautiainen, J. M., Yu, S., Truong, K. N., Feder, J., Rissanen, K., ... Beyeh, N. K. (2020). Host-Guest Interactions of Sodiumsulfonatomethylenesorscinarene and Quaternary Ammonium Halides: An Experimental-Computational Analysis of the Guest Inclusion Properties. *Crystal Growth and Design*, 20(4), 2367-2376. <https://doi.org/10.1021/acs.cgd.9b01540>

Young, D. C., Tasiar, M., Laurent, A. D., Dobrzycki, Ł., Cyrański, M. K., Tkachenko, N., ... Gryko, D. T. (2020). Photostable orange-red fluorescent unsymmetrical diketopyrrolopyrrole-BF<sub>2</sub> hybrids. *Journal of Materials Chemistry C*, 8(23), 7708-7717. <https://doi.org/10.1039/d0tc01202e>

Aisala, H., Manninen, H., Laaksonen, T., Linderborg, K. M., Myoda, T., Hopia, A., & Sandell, M. (2020). Linking volatile and non-volatile compounds to sensory profiles and consumer liking of wild edible Nordic mushrooms. *Food Chemistry*, 304, [125403]. <https://doi.org/10.1016/j.foodchem.2019.125403>

Viljanen, J., Kalmankoski, K., Contreras, V., Sarin, J. K., Sorvajärvi, T., Kinnunen, H., ... Toivonen, J. (2020). Sequential Collinear Photofragmentation and Atomic Absorption Spectroscopy for Online Laser Monitoring of Triatomic Metal Species. *Sensors (Basel, Switzerland)*, 20(2), [533]. <https://doi.org/10.3390/s20020533>

Chronopoulos, A., Thorpe, S. D., Cortes, E., Lachowski, D., Rice, A. J., Mykuliak, V. V., ... del Río Hernández, A. E. (2020). Syndecan-4 tunes cell mechanics by activating the kindlin-integrin-RhoA pathway. *Nature Materials*. <https://doi.org/10.1038/s41563-019-0567-1>

Pasanen, H. P., Vivo, P., Canil, L., Hempel, H., Unold, T., Abate, A., & Tkachenko, N. V. (2020). Monitoring Charge Carrier Diffusion across a Perovskite Film with Transient Absorption Spectroscopy. *The journal of physical chemistry letters*, 11(2), 445-450. <https://doi.org/10.1021/acs.jpcclett.9b03427>

Chakraborty, S., Rene, E. R., Lens, P. N. L., Rintala, J., Veiga, M. C., & Kennes, C. (2020). Effect of tungsten and selenium on C<sub>1</sub> gas bioconversion by an enriched anaerobic sludge and microbial community analysis. *Chemosphere*, 250, [126105]. <https://doi.org/10.1016/j.chemosphere.2020.126105>

Jönkkäri, I., Poliakova, V., Mylläri, V., Anderson, R., Andersson, M., & Vuorinen, J. (2020). Compounding and characterization of recycled multilayer plastic films. *Journal of Applied Polymer Science*, [e49101]. <https://doi.org/10.1002/app.49101>

Manninen, H., Durandin, N., Hopia, A., Vuorimaa-Laukkanen, E., & Laaksonen, T. (2020). Taste compound – Nanocellulose interaction assessment by fluorescence indicator displacement assay. *Food Chemistry*, 318, [126511]. <https://doi.org/10.1016/j.foodchem.2020.126511>

Tofanello, A., Freitas, A. L. M., Carvalho, W. M., Salminen, T., Niemi, T., & Souza, F. L. (2020). Hematite Surface Modification toward Efficient Sunlight-Driven Water Splitting Activity: The Role of Gold Nanoparticle Addition. *Journal of Physical Chemistry C*. <https://doi.org/10.1021/acs.jpcc.9b11966>

- Varis, T., Suhonen, T., Jokipii, M., & Vuoristo, P. (2020). Influence of powder properties on residual stresses formed in high-pressure liquid fuel HVOF sprayed WC-CoCr coatings. *Surface and Coatings Technology*, *388*, [125604]. <https://doi.org/10.1016/j.surfcoat.2020.125604>
- Sankari, A., Stråhlman, C., Sankari, R., Partanen, L., Laksman, J., Kettunen, J. A., ... Sorensen, S. L. (2020). Non-radiative decay and fragmentation in water molecules after 1 a 1-1 4 a 1 excitation and core ionization studied by electron-energy-resolved electron-ion coincidence spectroscopy. *Journal of Chemical Physics*, *152*(7), [074302]. <https://doi.org/10.1063/1.5141414>
- Beter, J., Schrittester, B., Maroh, B., Sarlin, E., Fuchs, P. F., & Pinter, G. (2020). Comparison and impact of different fiber debond techniques on fiber reinforced flexible composites. *Polymers*, *12*(2), [472]. <https://doi.org/10.3390/polym12020472>
- Bączkiewicz, J., Malaska, M., Pajunen, S., Alanen, M., & Heinisuo, M. (2020). Experimental study on axially loaded square hollow section T-joints under fire conditions. *FIRE SAFETY JOURNAL*, *114*, [102993]. <https://doi.org/10.1016/j.firesaf.2020.102993>
- Larnimaa, S., Halonen, L., Karhu, J., Tomberg, T., Metsälä, M., Genoud, G., ... Vainio, M. (2020). High-resolution analysis of the  $\nu_3$  band of radiocarbon methane  $^{14}\text{CH}_4$ . *Chemical Physics Letters*, *750*, [137488]. <https://doi.org/10.1016/j.cplett.2020.137488>
- Khvorost, T. A., Beliaev, L. Y., Potalueva, E., Laptchenkova, A. V., Selyutin, A. A., Bogachev, N. A., ... Mereshchenko, A. S. (2020). Ultrafast Photochemistry of the  $[\text{Cr}(\text{NCS})_6]^{3-}$  Complex in Dimethyl Sulfoxide and Dimethylformamide upon Excitation into Ligand-Field Electronic State. *Journal of Physical Chemistry B*, *124*(18), 3724-3733. <https://doi.org/10.1021/acs.jpcc.0c00088>
- Moormann, W., Tellkamp, T., Stadler, E., Röhricht, F., Näther, C., Puttreddy, R., ... Herges, R. (2020). Efficient Conversion of Light to Chemical Energy: Directional, Chiral Photoswitches with Very High Quantum Yields. *Angewandte Chemie - International Edition*, *59*(35), 15081-15086. <https://doi.org/10.1002/anie.202005361>
- Oliveira, L. M. C., Koivisto, H., Iwakiri, I. G. I., Loureiro, J. M., Ribeiro, A. M., & Nogueira, I. B. R. (2020). Modelling of a pressure swing adsorption unit by deep learning and artificial Intelligence tools. *Chemical Engineering Science*, *224*, [115801]. <https://doi.org/10.1016/j.ces.2020.115801>
- Eklund, A., Zhang, H., Zeng, H., Priimägi, A., & Ikkala, O. (2020). Fast Switching of Bright Whiteness in Channeled Hydrogel Networks. *Advanced Functional Materials*, [2000754]. <https://doi.org/10.1002/adfm.202000754>
- Holmstedt, S., & Candeias, N. R. (2020). A concise synthesis of carbasugars isolated from *Streptomyces lincolnensis*. *Tetrahedron*, [131346]. <https://doi.org/10.1016/j.tet.2020.131346>
- Taimoory, S. M., Twum, K., Dashti, M., Pan, F., Lahtinen, M., Rissanen, K., ... Beyeh, N. K. (2020). Bringing a Molecular Plus One: Synergistic Binding Creates Guest-Mediated Three-Component Complexes. *Journal of Organic Chemistry*, *85*(9), 5884-5894. <https://doi.org/10.1021/acs.joc.0c00220>
- Wani, O. M., Schenning, A. P. H. J., & Priimägi, A. (2020). A bifacial colour-tunable system via combination of a cholesteric liquid crystal network and hydrogel. *Journal of Materials Chemistry C*, *8*(30), 10191-10196. <https://doi.org/10.1039/d0tc02189j>
- Palmolahti, L., Ali-Löytty, H., Khan, R., Saari, J., Tkachenko, N. V., & Valden, M. (2020). Modification of Surface States of Hematite-Based Photoanodes by Submonolayer of  $\text{TiO}_2$  for Enhanced Solar Water Splitting. *Journal of Physical Chemistry C*, *124*(24), 13094-13101. <https://doi.org/10.1021/acs.jpcc.0c00798>
- Karjalainen, M., Kontunen, A., Mäkelä, M., Anttalainen, O., Vehkaoja, A., Oksala, N., & Roine, A. (2020). Recovery characteristics of different tube materials in relation to combustion products. *International Journal for Ion Mobility Spectrometry*. <https://doi.org/10.1007/s12127-020-00266-z>

Wang, M., Chen, D., Xiao, M., Ye, Q., Stolzenburg, D., Hofbauer, V., ... Donahue, N. M. (2020). Photo-oxidation of Aromatic Hydrocarbons Produces Low-Volatility Organic Compounds. *Environmental Science and Technology*, *54*(13), 7911-7921. <https://doi.org/10.1021/acs.est.0c02100>

Hajdu-Rahkama, R., Özkaya, B., Lakaniemi, A. M., & Puhakka, J. A. (2020). Kinetics and modelling of thiosulphate biotransformations by haloalkaliphilic Thioalkalivibrio versutus. *Chemical Engineering Journal*, *401*, [126047]. <https://doi.org/10.1016/j.cej.2020.126047>

Shakun, A., Sarlin, E., & Vuorinen, J. (2020). Energy dissipation in natural rubber latex films: The effect of stabilizers, leaching and acetone-treatment. *Journal of Applied Polymer Science*. <https://doi.org/10.1002/app.49609>

Evans, D. M., Holstad, T. S., Mosberg, A. B., Småbråten, D. R., Vullum, P. E., Dadlani, A. L., ... Meier, D. (2020). Conductivity control via minimally invasive anti-Frenkel defects in a functional oxide. *Nature Materials*. <https://doi.org/10.1038/s41563-020-0765-x>

Pelkonen, A., Mzezewa, R., Sukki, L., Rynänen, T., Kreutzer, J., Hyvärinen, T., ... Narkilahti, S. (2020). A modular brain-on-a-chip for modelling epileptic seizures with functionally connected human neuronal networks. *Biosensors and Bioelectronics*, *168*, [112553]. <https://doi.org/10.1016/j.bios.2020.112553>

Jowett, G. M., Norman, M. D. A., Yu, T. T. L., Rosell Arévalo, P., Hoogland, D., Lust, S. T., ... Gentleman, E. (2020). ILC1 drive intestinal epithelial and matrix remodelling. *Nature Materials*. <https://doi.org/10.1038/s41563-020-0783-8>

Ometov, A., Bezzateev, S., Voloshina, N., Masek, P., & Komarov, M. (2019). Environmental monitoring with distributed mesh networks: An overview and practical implementation perspective for urban scenario. *Sensors (Switzerland)*, *19*(24), [5548]. <https://doi.org/10.3390/s19245548>

Zhang, H., Zeng, H., Priimägi, A., & Ikkala, O. (2019). Programmable responsive hydrogels inspired by classical conditioning algorithm. *Nature Communications*, *10*(1), [3267]. <https://doi.org/10.1038/s41467-019-11260-3>

Lowe, S. J., Partridge, D. G., Davies, J. F., Wilson, K. R., Topping, D., & Riipinen, I. (2019). Key drivers of cloud response to surface-active organics. *Nature Communications*, *10*(1), [5214]. <https://doi.org/10.1038/s41467-019-12982-0>

Roldin, P., Ehn, M., Kurtén, T., Olenius, T., Rissanen, M. P., Sarnela, N., ... Boy, M. (2019). The role of highly oxygenated organic molecules in the Boreal aerosol-cloud-climate system. *Nature Communications*, *10*(1), [4370]. <https://doi.org/10.1038/s41467-019-12338-8>

Shevkunov, I., Katkovnik, V., Claus, D., Pedrini, G., Petrov, N. V., & Egiazarian, K. (2019). Spectral object recognition in hyperspectral holography with complex-domain denoising. *Sensors (Switzerland)*, *19*(23), [5188]. <https://doi.org/10.3390/s19235188>

Poikkimäki, M., Koljonen, V., Leskinen, N., Närhi, M., Kangasniemi, O., Kausiala, O., & Dal Maso, M. (2019). Nanocluster Aerosol Emissions of a 3D Printer. *Environmental Science and Technology*, *53*(23), 13618-13628. <https://doi.org/10.1021/acs.est.9b05317>

Ye, Q., Wang, M., Hofbauer, V., Stolzenburg, D., Chen, D., Schervish, M., ... Donahue, N. M. (2019). Molecular Composition and Volatility of Nucleated Particles from  $\alpha$ -Pinene Oxidation between -50 °C and +25 °C. *Environmental Science and Technology*, *53*(21), 12357-12365. <https://doi.org/10.1021/acs.est.9b03265>

Tomkowski, R., Sorsa, A., Santa-Aho, S., Lundin, P., & Vippola, M. (2019). Statistical evaluation of barkhausen noise testing (BNT) for ground samples. *Sensors (Switzerland)*, *19*(21), [4716]. <https://doi.org/10.3390/s19214716>

Saegusa, T., Sakai, H., Nagashima, H., Kobori, Y., Tkachenko, N. V., & Hasobe, T. (2019). 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. *Journal of the American Chemical Society*, *141*(37), 14720-14727. <https://doi.org/10.1021/jacs.9b06567>

Haavisto, J., Dessì, P., Chatterjee, P., Honkanen, M., Noori, M. T., Kokko, M., ... Puhakka, J. A. (2019). Effects of anode materials on electricity production from xylose and treatability of TMP wastewater in an up-flow microbial fuel cell. *Chemical Engineering Journal*, *372*, 141-150. <https://doi.org/10.1016/j.cej.2019.04.090>

Reshef, O., Saad-Bin-Alam, M., Huttunen, M. J., Carlow, G., Sullivan, B. T., Ménard, J. M., ... Boyd, R. W. (2019). Multiresonant High-Q Plasmonic Metasurfaces. *Nano Letters*, *19*(9), 6429-6434. <https://doi.org/10.1021/acs.nanolett.9b02638>

Karjalainen, P., Rönkkö, T., Simonen, P., Ntziachristos, L., Juuti, P., Timonen, H., ... Keskinen, J. (2019). Strategies To Diminish the Emissions of Particles and Secondary Aerosol Formation from Diesel Engines. *Environmental science & technology*, *53*(17), 10408-10416. <https://doi.org/10.1021/acs.est.9b04073>

Calejo, M. T., Haapala, A., Skottman, H., & Kellomäki, M. (2019). Porous polybutylene succinate films enabling adhesion of human embryonic stem cell-derived retinal pigment epithelial cells (hESC-RPE). *European Polymer Journal*, *118*, 78-87. <https://doi.org/10.1016/j.eurpolymj.2019.05.041>

Poojari, C., Wilkosz, N., Lira, R. B., Dimova, R., Jurkiewicz, P., Petka, R., ... Róg, T. (2019). Behavior of the DPH fluorescence probe in membranes perturbed by drugs. *Chemistry and Physics of Lipids*, *223*, [104784]. <https://doi.org/10.1016/j.chemphyslip.2019.104784>

Wang, S., Nawale, G. N., Oommen, O. P., Hilborn, J., & Varghese, O. P. (2019). Influence of ions to modulate hydrazone and oxime reaction kinetics to obtain dynamically cross-linked hyaluronic acid hydrogels. *Polymer Chemistry*, *10*(31), 4322-4327. <https://doi.org/10.1039/c9py00862d>

Kiilakoski, J., Langlade, C., Koivuluoto, H., & Vuoristo, P. (2019). Characterizing the micro-impact fatigue behavior of APS and HVOF-sprayed ceramic coatings. *Surface and Coatings Technology*, *371*, 245-254. <https://doi.org/10.1016/j.surfcoat.2018.10.097>

Fantozzi, D., Matikainen, V., Uusitalo, M., Koivuluoto, H., & Vuoristo, P. (2019). Chlorine induced high-temperature corrosion mechanisms in HVOF and HVOF sprayed Cr<sub>3</sub>C<sub>2</sub>-based hardmetal coatings. *Corrosion Science*, [108166]. <https://doi.org/10.1016/j.corsci.2019.108166>

Schraik, D., Varvia, P., Korhonen, L., & Rautiainen, M. (2019). Bayesian inversion of a forest reflectance model using Sentinel-2 and Landsat 8 satellite images. *JOURNAL OF QUANTITATIVE SPECTROSCOPY AND RADIATIVE TRANSFER*, *233*, 1-12. <https://doi.org/10.1016/j.jqsrt.2019.05.013>

Solovyev, A. I., Mikheyli, A. V., Plyusnin, V. F., Shubin, A. A., Grivin, V. P., Larionov, S. V., ... Lemmetyinen, H. (2019). Photochemistry of dithiophosphinate Ni(S<sub>2</sub>P(i-Bu)<sub>2</sub>)<sub>2</sub> complex in CCl<sub>4</sub>. Transient species and TD-DFT calculations. *Journal of Photochemistry and Photobiology A: Chemistry*, *381*, [111857]. <https://doi.org/10.1016/j.jphotochem.2019.111857>

Matikainen, V., Rubio Peregrina, S., Ojala, N., Koivuluoto, H., Schubert, J., Houdková, & Vuoristo, P. (2019). Erosion wear performance of WC-10Co4Cr and Cr<sub>3</sub>C<sub>2</sub>-25NiCr coatings sprayed with high-velocity thermal spray processes. *Surface and Coatings Technology*, *370*, 196-212. <https://doi.org/10.1016/j.surfcoat.2019.04.067>

Kezilebieke, S., Žitko, R., Dvorak, M., Ojanen, T., & Liljeroth, P. (2019). Observation of Coexistence of Yu-Shiba-Rusinov States and Spin-Flip Excitations. *Nano Letters*, *19*(7), 4614-4619. <https://doi.org/10.1021/acs.nanolett.9b01583>

Abada, A., Abbrescia, M., AbdusSalam, S. S., Abdyukhanov, I., Abelleira Fernandez, J., Abramov, A., ... Stenvall, A. (2019). FCC-hh: The Hadron Collider: Future Circular Collider Conceptual Design Report Volume 3. *European Physical Journal: Special Topics*, *228*(4), 755-1107. <https://doi.org/10.1140/epjst/e2019-900087-0>

- Ghalibaf, M., Doddapaneni, T. R. K. C., & Alén, R. (2019). Pyrolytic behavior of lignocellulosic-based polysaccharides. *Journal of Thermal Analysis and Calorimetry*, *137*(1), 121-131. <https://doi.org/10.1007/s10973-018-7919-y>
- Paananen, R. O., Javanainen, M., Holopainen, J. M., & Vattulainen, I. (2019). Crystalline Wax Esters Regulate the Evaporation Resistance of Tear Film Lipid Layers Associated with Dry Eye Syndrome. *Journal of Physical Chemistry Letters*, *10*(14), 3893-3898. <https://doi.org/10.1021/acs.jpcllett.9b01187>
- Banerjee, S. S., Hait, S., Natarajan, T. S., Wießner, S., Stöckelhuber, K. W., Jehnichen, D., ... Das, A. (2019). Water-Responsive and Mechanically Adaptive Natural Rubber Composites by in Situ Modification of Mineral Filler Structures. *Journal of Physical Chemistry B*, *123*(24), 5168-5175. <https://doi.org/10.1021/acs.jpccb.9b02125>
- Hilksa, J., Koivusalo, E., Puustinen, J., Suomalainen, S., & Guina, M. (2019). Epitaxial phases of high Bi content GaSbBi alloys. *Journal of Crystal Growth*, *516*, 67-71. <https://doi.org/10.1016/j.jcrysgro.2019.03.028>
- Sautter, J. D., Xu, L., Miroshnichenko, A. E., Lysevych, M., Volkovskaya, I., Smirnova, D. A., ... Rahmani, M. (2019). Tailoring Second-Harmonic Emission from (111)-GaAs Nanoantennas. *Nano Letters*, *19*(6), 3905-3911. <https://doi.org/10.1021/acs.nanolett.9b01112>
- Lolicato, F., Joly, L., Martinez-Seara, H., Fragneto, G., Scoppola, E., Baldelli Bombelli, F., ... Maccarini, M. (2019). The Role of Temperature and Lipid Charge on Intake/Uptake of Cationic Gold Nanoparticles into Lipid Bilayers. *Small*, *15*(23), [1805046]. <https://doi.org/10.1002/smll.201805046>
- Sariola, V. (2019). Analytical Expressions for Spring Constants of Capillary Bridges and Snap-in Forces of Hydrophobic Surfaces. *Langmuir*, *35*(22), 7129-7135. <https://doi.org/10.1021/acs.langmuir.9b00152>
- Lai, Y., Zhang, H., Sugano, Y., Xie, H., & Kallio, P. (2019). Correlation of Surface Morphology and Interfacial Adhesive Behavior between Cellulose Surfaces: Quantitative Measurements in Peak-Force Mode with the Colloidal Probe Technique. *Langmuir*, *35*(22), 7312-7321. <https://doi.org/10.1021/acs.langmuir.8b03503>
- Ali, I., Suominen, O., Gotchev, A., & Morales, E. R. (2019). Methods for simultaneous robot-world-hand-eye calibration: A comparative study. *Sensors (Switzerland)*, *19*(12), [2837]. <https://doi.org/10.3390/s19122837>
- Kekonen, A., Bergelin, M., Johansson, M., Kumar Joon, N., Bobacka, J., & Viik, J. (2019). Bioimpedance Sensor Array for Long-Term Monitoring of Wound Healing from Beneath the Primary Dressings and Controlled Formation of H<sub>2</sub>O<sub>2</sub> Using Low-Intensity Direct Current. *Sensors*, *19*(11). <https://doi.org/10.3390/s19112505>
- Iyer, S., Rissanen, M. P., & Kurtén, T. (2019). Reaction between Peroxy and Alkoxy Radicals Can Form Stable Adducts. *Journal of Physical Chemistry Letters*, *10*(9), 2051-2057. <https://doi.org/10.1021/acs.jpcllett.9b00405>
- Gil-Gallegos, S., Klages, R., Solanpää, J., & Räsänen, E. (2019). Energy-dependent diffusion in a soft periodic Lorentz gas. *European Physical Journal: Special Topics*, *228*(1), 143-160. <https://doi.org/10.1140/epjst/e2019-800136-8>
- Trainer, D. J., Putilov, A. V., Wang, B., Lane, C., Saari, T., Chang, T. R., ... Iavarone, M. (2019). Moiré superlattices and 2D electronic properties of graphite/MoS<sub>2</sub> heterostructures. *Journal of Physics and Chemistry of Solids*, *128*, 325-330. <https://doi.org/10.1016/j.jpcs.2017.10.034>
- Saari, T., & Nieminen, J. (2019). Spin filtering in silicene by edges and chemically or electrically induced interfaces. *Journal of Physics and Chemistry of Solids*, *128*, 316-324. <https://doi.org/10.1016/j.jpcs.2017.12.037>
- Itävuori, P., Hulthén, E., Yahyaei, M., & Vilkkö, M. (2019). Mass balance control of crushing circuits. *Minerals Engineering*, *135*, 37-47. <https://doi.org/10.1016/j.mineng.2019.02.033>

- Kulig, W., Korolainen, H., Zatorska, M., Kwolek, U., Wydro, P., Kepczynski, M., & Róg, T. (2019). Complex Behavior of Phosphatidylcholine-Phosphatidic Acid Bilayers and Monolayers: Effect of Acyl Chain Unsaturation. *Langmuir*, *35*(17), 5944-5956. <https://doi.org/10.1021/acs.langmuir.9b00381>
- Puustinen, J., Hilska, J., & Guina, M. (2019). Analysis of GaAsBi growth regimes in high resolution with respect to As/Ga ratio using stationary MBE growth. *Journal of Crystal Growth*, *511*, 33-41. <https://doi.org/10.1016/j.jcrysgro.2019.01.010>
- Asikainen, S., Paakinaho, K., Kyhkynen, A. K., Hannula, M., Malin, M., Ahola, N., ... Seppälä, J. (2019). Hydrolysis and drug release from poly(ethylene glycol)-modified lactone polymers with open porosity. *European Polymer Journal*, *113*, 165-175. <https://doi.org/10.1016/j.eurpolymj.2019.01.056>
- Ometov, A., Bezzateev, S., Davydov, V., Shchesniak, A., Masek, P., Lohan, E. S., & Koucheryavy, Y. (2019). Positioning information privacy in intelligent transportation systems: An overview and future perspective. *Sensors*, *19*(7), [1603]. <https://doi.org/10.3390/s19071603>
- Kerst, T., Malmbeck, R., Ial Banik, N. L., & Toivonen, J. (2019). Alpha radiation-induced luminescence by am-241 in aqueous nitric acid solution. *Sensors (Switzerland)*, *19*(7), [1602]. <https://doi.org/10.3390/s19071602>
- Gurtovenko, A. A., Javanainen, M., Lolicato, F., & Vattulainen, I. (2019). The Devil Is in the Details: What Do We Really Track in Single-Particle Tracking Experiments of Diffusion in Biological Membranes? *Journal of Physical Chemistry Letters*, *10*(5), 1005-1011. <https://doi.org/10.1021/acs.jpcllett.9b00065>
- Pekkanen, T. T., Timonen, R. S., Lendvay, G., Rissanen, M. P., & Eskola, A. J. (2019). Kinetics and thermochemistry of the reaction of 3-methylpropargyl radical with molecular oxygen. *PROCEEDINGS OF THE COMBUSTION INSTITUTE*, *37*(1), 299-306. <https://doi.org/10.1016/j.proci.2018.05.050>
- Kuroda, K., Yazaki, K., Tanaka, Y., Akita, M., Sakai, H., Hasobe, T., ... Yoshizawa, M. (2019). A Pentacene-based Nanotube Displaying Enriched Electrochemical and Photochemical Activities. *Angewandte Chemie - International Edition*, *58*(4), 1115-1119. <https://doi.org/10.1002/anie.201812976>
- Ruoko, T-P., Hiltunen, A., Iivonen, T., Ulkuniemi, R., Lahtonen, K., Ali-Löyty, H., ... Tkachenko, N. V. (2019). Charge carrier dynamics in tantalum oxide overlayers and tantalum doped hematite photoanodes. *Journal of Materials Chemistry A*, *7*(7), 3206-3215. <https://doi.org/10.1039/C8TA09501A>
- Guglielmetti, S., Santala, V., Mangayil, R., Ciranna, A., & Karp, M. T. (2019). O<sub>2</sub>-requiring molecular reporters of gene expression for anaerobic microorganisms. *Biosensors and Bioelectronics*, *123*, 1-6. <https://doi.org/10.1016/j.bios.2018.09.066>
- Levämäki, H., Tian, L-Y., Vitos, L., & Ropo, M. (2019). An automated algorithm for reliable equation of state fitting of magnetic systems. *Computational Materials Science*, *156*, 121-128. <https://doi.org/10.1016/j.commatsci.2018.09.026>
- Shin, M., Kim, J., Jung, Y. K., Ruoko, T-P., Priimagi, A., Walsh, A., & Shin, B. (2019). Low-dimensional formamidinium lead perovskite architectures via controllable solvent intercalation. *Journal of Materials Chemistry C*, *7*(13), 3945-3951. <https://doi.org/10.1039/c9tc00379g>
- Bhagyaraj, S., Perumbilavil, S., Udayabashkar, R., Mangalaraja, R. V., Thomas, S., Kalarikkal, N., & Oluwafemi, O. S. (2019). Tuning of nonlinear absorption in highly luminescent CdSe based quantum dots with core-shell and core/multi-shell architectures. *Physical Chemistry Chemical Physics*, *21*(21), 11424-11434. <https://doi.org/10.1039/c9cp00476a>
- Mandal, S., & Tkachenko, N. V. (2019). Multiphoton Excitation of CsPbBr<sub>3</sub> Perovskite Quantum Dots (PQDs): How Many Electrons Can One PQD Donate to Multiple Molecular Acceptors? *Journal of Physical Chemistry Letters*, 2775-2781. <https://doi.org/10.1021/acs.jpcllett.9b01045>

Lemougna, P. N., Yliniemi, J., Ismailov, A., Levänen, E., Tanskanen, P., Kinnunen, P., ... Illikainen, M. (Hyväksyty/painossa). Spodumene tailings for porcelain and structural materials: Effect of temperature (1050–1200°C) on the sintering and properties. *Minerals Engineering*, [105843]. <https://doi.org/10.1016/j.mineng.2019.105843>

Eregowda, T., Rene, E. R., Rintala, J., & Lens, P. N. L. (2019). Volatile fatty acid adsorption on anion exchange resins: kinetics and selective recovery of acetic acid. *Separation Science and Technology (Philadelphia)*. <https://doi.org/10.1080/01496395.2019.1600553>

Anttalainen, O., Puton, J., Kontunen, A., Karjalainen, M., Kumpulainen, P., Oksala, N., ... Roine, A. (2019). Possible strategy to use differential mobility spectrometry in real time applications. *International Journal for Ion Mobility Spectrometry*. <https://doi.org/10.1007/s12127-019-00251-1>

Assoah, B., Riihonen, V., Vale, J. R., Valkonen, A., & Candeias, N. R. (2019). Synthesis of 6,12-disubstituted methanodibenzo[b,f][1,5]dioxocins: Pyrrolidine catalyzed self-condensation of 2'-Hydroxyacetophenones. *Molecules*, 24(13), [2405]. <https://doi.org/10.3390/molecules24132405>

Tienaho, J., Karonen, M., Muilu-Mäkelä, R., Wähälä, K., Denegri, E. L., Franzén, R., ... Sarjala, T. (2019). Metabolic profiling of water-soluble compounds from the extracts of dark septate endophytic fungi (DSE) isolated from scots pine (*Pinus sylvestris* L.) seedlings using UPLC–orbitrap–MS. *Molecules*, 24(12), [2330]. <https://doi.org/10.3390/molecules24122330>

Umeyama, T., Hanaoka, T., Yamada, H., Namura, Y., Mizuno, S., Ohara, T., ... Imahori, H. (2019). Exclusive occurrence of photoinduced energy transfer and switching of its direction by rectangular  $\pi$ -extension of nanographenes. *Chemical Science*, 10(27), 6642-6650. <https://doi.org/10.1039/c9sc01538h>

Liu, W., Ban, J., Feng, L., Cheng, T., Emmert-Streib, F., & Dehmer, M. (2019). The maximum Hosoya index of unicyclic graphs with diameter at most four. *Symmetry*, 11(8), [1034]. <https://doi.org/10.3390/sym11081034>

Ghorbani, M., Dehmer, M., Mowshowitz, A., Tao, J., & Emmert-Streib, F. (2019). The Hosoya entropy of graphs revisited. *Symmetry*, 11(8), [1013]. <https://doi.org/10.3390/sym11081013>

Banerjee, S. S., Natarajan, T. S., Subramani B., E., Wießner, S., Janke, A., Heinrich, G., & Das, A. (2019). Temperature scanning stress relaxation behavior of water responsive and mechanically adaptive elastomer nanocomposites. *Journal of Applied Polymer Science*, [48344]. <https://doi.org/10.1002/app.48344>

Sharma, V., Yiannacou, K., Karjalainen, M., Lahtonen, K., Valden, M., & Sariola, V. (2019). Large-scale efficient water harvesting using bioinspired micro-patterned copper oxide nanoneedle surfaces and guided droplet transport. *Nanoscale Advances*, 1(10), 4025-4040. <https://doi.org/10.1039/c9na00405j>

Ayodele, O. B., Cai, R., Wang, J., Ziouani, Y., Liang, Z., Spadaro, M. C., ... Kolen'Ko, Y. V. (2019). Synergistic Computational-Experimental Discovery of Highly Selective PtCu Nanocluster Catalysts for Acetylene Semihydrogenation. *ACS CATALYSIS*, 451-457. <https://doi.org/10.1021/acscatal.9b03539>

Passananti, M., Zapadinsky, E., Zanca, T., Kangasluoma, J., Myllys, N., Rissanen, M. P., ... Vehkamäki, H. (2019). How well can we predict cluster fragmentation inside a mass spectrometer? *Chemical Communications*, 55(42), 5946-5949. <https://doi.org/10.1039/c9cc02896j>

Joost, U., Sutka, A., Oja, M., Smits, K., Doebelin, N., Loot, A., ... Nommiste, E. (2018). Reversible photodoping of TiO2 nanoparticles. *Chemistry of Materials*, 30(24), 8968-8974. <https://doi.org/10.1021/acs.chemmater.8b04813>

Czaplicki, R., Kiviniemi, A., Huttunen, M. J., Zang, X., Stolt, T., Vartiainen, I., ... Kauranen, M. (2018). Less Is More: Enhancement of Second-Harmonic Generation from Metasurfaces by Reduced Nanoparticle Density. *Nano Letters*, 18(12), 7709-7714. <https://doi.org/10.1021/acs.nanolett.8b03378>



Garifullin, M. (2018). Experimental moment resistance of rectangular hollow section T joints. *MATEC Web of Conferences*, 245, [08003]. <https://doi.org/10.1051/mateconf/201824508003>

Kotila, T., Kogan, K., Enkavi, G., Guo, S., Vattulainen, I., Goode, B. L., & Lappalainen, P. (2018). Structural basis of actin monomer re-charging by cyclase-Associated protein. *Nature Communications*, 9(1), [1892]. <https://doi.org/10.1038/s41467-018-04231-7>

Perumbilavil, S., Piccardi, A., Barboza, R., Buchnev, O., Kauranen, M., Strangi, G., & Assanto, G. (2018). Beaming random lasers with soliton control. *Nature Communications*, 9(1), [3863]. <https://doi.org/10.1038/s41467-018-06170-9>

Salmenjoki, H., Alava, M. J., & Laurson, L. (2018). Machine learning plastic deformation of crystals. *Nature Communications*, 9(1), [5307]. <https://doi.org/10.1038/s41467-018-07737-2>

Ferreira, S. A., Motwani, M. S., Faull, P. A., Seymour, A. J., Yu, T. T. L., Enayati, M., ... Gentleman, E. (2018). Bi-directional cell-pericellular matrix interactions direct stem cell fate. *Nature Communications*, 9(1), [4049]. <https://doi.org/10.1038/s41467-018-06183-4>

Rimpiläinen, T., Andrade, J., Nunes, A., Ntungwe, E., Fernandes, A. S., Vale, J. R., ... Candeias, N. R. (2018). Aminobenzylated 4-Nitrophenols as Antibacterial Agents Obtained from 5-Nitrosalicylaldehyde through a Petasis Borono-Mannich Reaction. *ACS Omega*, 3(11), 16191-16202. <https://doi.org/10.1021/acsomega.8b02381>

Närhi, M., Salmela, L., Toivonen, J., Billet, C., Dudley, J. M., & Genty, G. (2018). Machine learning analysis of extreme events in optical fibre modulation instability. *Nature Communications*, 9(1). <https://doi.org/10.1038/s41467-018-07355-y>

Uusheimo, S., Huotari, J., Tulonen, T., Aalto, S. L., Rissanen, A. J., & Arvola, L. (2018). High Nitrogen Removal in a Constructed Wetland Receiving Treated Wastewater in a Cold Climate. *Environmental science & technology*, 52(22), 13343-13350. <https://doi.org/10.1021/acs.est.8b03032>

Sakai, H., Inaya, R., Tkachenko, N. V., & Hasobe, T. (2018). 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. *Chemistry - A European Journal*, 24(64), 17062-17071. <https://doi.org/10.1002/chem.201803257>

Rinne, J., Keskinen, J., Berger, P. R., Lupo, D., & Valkama, M. (2018). M2M Communication Assessment in Energy-Harvesting and Wake-Up Radio Assisted Scenarios Using Practical Components. *Sensors (Basel, Switzerland)*, 18(11). <https://doi.org/10.3390/s18113992>

Chevrier, D. M., Raich, L., Rovira, C., Das, A., Luo, Z., Yao, Q., ... Zhang, P. (2018). Molecular-Scale Ligand Effects in Small Gold-Thiolate Nanoclusters. *Journal of the American Chemical Society*, 140(45), 15430-15436. <https://doi.org/10.1021/jacs.8b09440>

Tan, L. C., Nancharaiyah, Y. V., Lu, S., van Hullebusch, E. D., Gerlach, R., & Lens, P. N. L. (2018). Biological treatment of selenium-laden wastewater containing nitrate and sulfate in an upflow anaerobic sludge bed reactor at pH 5.0. *Chemosphere*, 211, 684-693. <https://doi.org/10.1016/j.chemosphere.2018.07.079>

Huttunen-Saarivirta, E., Isotahdon, E., Metsäjoki, J., Salminen, T., Carpén, L., & Ronkainen, H. (2018). Tribocorrosion behaviour of aluminium bronze in 3.5 wt.% NaCl solution. *Corrosion Science*, 144, 207-223. <https://doi.org/10.1016/j.corsci.2018.08.058>

Tiihonen, J., Kylänpää, I., & Rantala, T. T. (2018). Computation of Dynamic Polarizabilities and van der Waals Coefficients from Path-Integral Monte Carlo. *Journal of Chemical Theory and Computation*, 14, 5750-5763. <https://doi.org/10.1021/acs.jctc.8b00859>

Heijne, A. T., Liu, D., Sulonen, M., Sleutels, T., & Fabregat-Santiago, F. (2018). Quantification of bio-anode capacitance in bioelectrochemical systems using Electrochemical Impedance Spectroscopy. *Journal of Power Sources*, *400*, 533-538. <https://doi.org/10.1016/j.jpowsour.2018.08.003>

Rajan, R., Rainosalu, E., Ramamoorthy, S. K., Thomas, S. P., Zavašnik, J., Vuorinen, J., & Skrifvars, M. (2018). Mechanical, thermal, and burning properties of viscose fabric composites: Influence of epoxy resin modification. *Journal of Applied Polymer Science*, *135*(36), [46673]. <https://doi.org/10.1002/app.46673>

Jermakka, J., Thompson Brewster, E., Ledezma, P., & Freguia, S. (2018). Electro-concentration for chemical-free nitrogen capture as solid ammonium bicarbonate. *Separation and Purification Technology*, *203*, 48-55. <https://doi.org/10.1016/j.seppur.2018.04.023>

Nieminen, V., Karjalainen, M., Salminen, K., Rantala, J., Kontunen, A., Isokoski, P., ... Leikkala, J. (2018). A compact olfactometer for IMS measurements and testing human perception. *International Journal for Ion Mobility Spectrometry*, *21* (3), 71-80. <https://doi.org/10.1007/s12127-018-0235-1>

HyvÄluoma, J., Hannula, M., Arstila, K., Wang, H., Kulju, S., & Rasa, K. (2018). Effects of pyrolysis temperature on the hydrologically relevant porosity of willow biochar. *Journal of Analytical and Applied Pyrolysis*, *134*. <https://doi.org/10.1016/j.jaap.2018.07.011>

Mandal, S., Garcia Iglesias, M., Ince, M., Torres, T., & Tkachenko, N. V. (2018). Photoinduced Energy Transfer in ZnCdSeS Quantum Dot-Phthalocyanines Hybrids. *ACS Omega*, *3*(8), 10048-10057. <https://doi.org/10.1021/acsomega.8b01623>

Tan, L. C., Espinosa-Ortiz, E. J., Nancharaiah, Y. V., van Hullebusch, E. D., Gerlach, R., & Lens, P. N. (2018). Selenate removal in biofilm systems: Effect of nitrate and sulfate on selenium removal efficiency, biofilm structure and microbial community. *Journal of Chemical Technology and Biotechnology*, *93*(8), 2380-2389. <https://doi.org/10.1002/jctb.5586>

Hiltunen, A., Ruoko, T-P., Iivonen, T., Lahtonen, K., Ali-LÖyttÄ, H., Sarlin, E., ... Tkachenko, N. (2018). Design aspects of all atomic layer deposited TiO<sub>2</sub>-Fe<sub>2</sub>O<sub>3</sub> scaffold-absorber photoanodes for water splitting. *Sustainable Energy & Fuels*, *2* (9), 2124-2130. <https://doi.org/10.1039/C8SE00252E>

Rajala, S., Schouten, M., Krijnen, G., & Tuukkanen, S. (2018). High Bending-Mode Sensitivity of Printed Piezoelectric Poly(vinylidene fluoride- co-trifluoroethylene) Sensors. *ACS Omega*, *3*(7), 8067-8073. <https://doi.org/10.1021/acsomega.8b01185>

LaurÄn, P., Paukkonen, H., LipiÄinen, T., Dong, Y., Oksanen, T., RÄikkönen, H., ... Laaksonen, T. (2018). Pectin and Mucin Enhance the Bioadhesion of Drug Loaded Nanofibrillated Cellulose Films. *Pharmaceutical Research*, *35*(7), [145]. <https://doi.org/10.1007/s11095-018-2428-z>

Siljander, S., KeinÄnen, P., RÄty, A., Ramakrishnan, K. R., Tuukkanen, S., Kunnari, V., ... Kanerva, M. (2018). Effect of surfactant type and sonication energy on the electrical conductivity properties of nanocellulose-CNT nanocomposite films. *International Journal of Molecular Sciences*, *19*(6), [1819]. <https://doi.org/10.3390/ijms19061819>

Nair, A. K., Bhavitha, K. B., Perumbilavil, S., Sankar, P., Rouxel, D., Kala, M. S., ... Kalarikkal, N. (2018). Multifunctional nitrogen sulfur co-doped reduced graphene oxide - Ag nano hybrids (sphere, cube and wire) for nonlinear optical and SERS applications. *Carbon*, *132*, 380-393. <https://doi.org/10.1016/j.carbon.2018.02.068>

George, L., Hiltunen, A., Santala, V., & Efimov, A. (2018). Photo-antimicrobial efficacy of zinc complexes of porphyrin and phthalocyanine activated by inexpensive consumer LED lamp. *Journal of Inorganic Biochemistry*, *183*, 94-100. <https://doi.org/10.1016/j.jinorgbio.2018.03.015>

- Pirhonen, M., Peltokangas, M., & Vehkaoja, A. (2018). Acquiring respiration rate from photoplethysmographic signal by recursive bayesian tracking of intrinsic modes in time-frequency spectra. *Sensors*, *18*(6), [1693]. <https://doi.org/10.3390/s18061693>
- Virtanen, J., Somppi, S., Törnqvist, H., Jeyhani, V., Fiedler, P., Gizatdinova, Y., ... Vehkaoja, A. (2018). Evaluation of dry electrodes in canine heart rate monitoring. *Sensors*, *18*(6), [1757]. <https://doi.org/10.3390/s18061757>
- Virkki, K., Tervola, E., Medel, M., Torres, T., & Tkachenko, N. V. (2018). Effect of Co-Adsorbate and Hole Transporting Layer on the Photoinduced Charge Separation at the TiO<sub>2</sub>-Phthalocyanine Interface. *ACS Omega*, *3*(5), 4947-4958. <https://doi.org/10.1021/acsomega.8b00600>
- Zhou, K., Dichlberger, A., Martinez-Seara, H., Nyholm, T. K. M., Li, S., Kim, Y. A., ... Blom, T. (2018). A Ceramide-Regulated Element in the Late Endosomal Protein LAPTM4B Controls Amino Acid Transporter Interaction. *ACS Central Science*, *4*(5), 548-558. <https://doi.org/10.1021/acscentsci.7b00582>
- Raappana, M., Polojärvi, V., Aho, A., Mäkelä, J., Aho, T., Tukiainen, A., ... Guina, M. (2018). Wet etching of dilute nitride GaInNAs, GaInNAsSb, and GaNAsSb alloys lattice-matched to GaAs. *Corrosion Science*, *136*, 268-274. <https://doi.org/10.1016/j.corsci.2018.03.018>
- Manninen, H., Rotola-Pukkila, M., Aisala, H., Hopia, A., & Laaksonen, T. (2018). Free amino acids and 5'-nucleotides in Finnish forest mushrooms. *Food Chemistry*, *247*, 23-28. <https://doi.org/10.1016/j.foodchem.2017.12.014>
- Harra, J., Tuominen, M., Juuti, P., Rissler, J., Koivuluoto, H., Haapanen, J., ... Mäkelä, J. M. (2018). Characteristics of nFOG, an aerosol-based wet thin film coating technique. *Journal of Coatings Technology Research*, *15*(3), 623-632. <https://doi.org/10.1007/s11998-017-0022-7>
- Melcr, J., Martinez-Seara, H., Nencini, R., Kolafa, J., Jungwirth, P., & Ollila, O. H. S. (2018). Accurate Binding of Sodium and Calcium to a POPC Bilayer by Effective Inclusion of Electronic Polarization. *Journal of Physical Chemistry B*, *122*(16), 4546-4557. <https://doi.org/10.1021/acs.jpcc.7b12510>
- Khan, M., Koivisto, J., Hukka, T., Hokka, M., & Kellomäki, M. (2018). Composite Hydrogels Using Bioinspired Approach with in Situ Fast Gelation and Self-Healing Ability as Future Injectable Biomaterial. *ACS Applied Materials & Interfaces*, *10* (14), 11950-11960. <https://doi.org/10.1021/acsami.8b01351>
- Magarkar, A., Parkkila, P., Viitala, T., Lajunen, T., Mobarak, E., Licari, G., ... Bunker, A. (2018). Membrane bound COMT isoform is an interfacial enzyme: General mechanism and new drug design paradigm. *Chemical Communications*, *54*(28), 3440-3443. <https://doi.org/10.1039/c8cc00221e>
- Sassatelli, P., Bolelli, G., Lassinantti Gualtieri, M., Heinonen, E., Honkanen, M., Lusvarghi, L., ... Vippola, M. (2018). Properties of HVOF-sprayed Stellite-6 coatings. *Surface and Coatings Technology*, *338*, 45-62. <https://doi.org/10.1016/j.surfcoat.2018.01.078>
- Poutanen, M., Ahmed, Z., Rautkari, L., Ikkala, O., & Priimägi, A. (2018). Thermal Isomerization of Hydroxyazobenzenes as a Platform for Vapor Sensing. *ACS Macro Letters*, *7*(3), 381-386. <https://doi.org/10.1021/acsmacrolett.8b00093>
- Janka, L., Berger, L. M., Norpoth, J., Trache, R., Thiele, S., Tomastik, C., ... Vuoristo, P. (2018). Improving the high temperature abrasion resistance of thermally sprayed Cr<sub>3</sub>C<sub>2</sub>-NiCr coatings by WC addition. *Surface and Coatings Technology*, *337*, 296-305. <https://doi.org/10.1016/j.surfcoat.2018.01.035>
- Karvinen, J., Joki, T., Ylä-Outinen, L., Koivisto, J. T., Narkilahti, S., & Kellomäki, M. (2018). Soft hydrazone crosslinked hyaluronan- and alginate-based hydrogels as 3D supportive matrices for human pluripotent stem cell-derived neuronal cells. *Reactive and Functional Polymers*, *124*, 29-39. <https://doi.org/10.1016/j.reactfunctpolym.2017.12.019>

Hannula, M., Ali-Löyty, H., Lahtonen, K., Sarlin, E., Saari, J., & Valden, M. (2018). Improved Stability of Atomic Layer Deposited Amorphous TiO<sub>2</sub> Photoelectrode Coatings by Thermally Induced Oxygen Defects. *Chemistry of Materials*, 30(4), 1199-1208. <https://doi.org/10.1021/acs.chemmater.7b02938>

Mehrang, S., Pietilä, J., & Korhonen, I. (2018). An activity recognition framework deploying the random forest classifier and a single optical heart rate monitoring and triaxial accelerometer wrist-band. *Sensors*, 18(2), [613]. <https://doi.org/10.3390/s18020613>

Kainulainen, T. P., Sirviö, J. A., Sethi, J., Hukka, T. I., & Heiskanen, J. P. (2018). UV-Blocking Synthetic Biopolymer from Biomass-Based Bifuran Diester and Ethylene Glycol. *Macromolecules*, 51(5), 1822-1829. <https://doi.org/10.1021/acs.macromol.7b02457>

Vale, J. R., Rimpiläinen, T., Sievänen, E., Rissanen, K., Afonso, C. A. M., & Candeias, N. R. (2018). Pot-economy autooxidative condensation of 2-Aryl-2-lithio-1,3-dithianes. *Journal of Organic Chemistry*, 83(4), 1948-1958. <https://doi.org/10.1021/acs.joc.7b02896>

Vaikuntam, S. R., Stöckelhuber, K. W., Subramani Bhagavatheswaran, E., Wießner, S., Scheler, U., Saalwächter, K., ... Das, A. (2018). Entrapped Styrene Butadiene Polymer Chains by Sol-Gel-Derived Silica Nanoparticles with Hierarchical Raspberry Structures. *Journal of Physical Chemistry B*, 122(6), 2010-2022. <https://doi.org/10.1021/acs.jpcc.7b11792>

Iantovics, L. B., Dehmer, M., & Emmert-Streib, F. (2018). MetrIntSimil-an accurate and robust metric for comparison of similarity in intelligence of any number of cooperative multiagent systems. *Symmetry*, 10(2), [48]. <https://doi.org/10.3390/sym10020048>

Barreca, D., Carraro, G., Maccato, C., Altantzis, T., Kaunisto, K., & Gasparotto, A. (2018). Controlled Growth of Supported ZnO Inverted Nanopyramids with Downward Pointing Tips. *Crystal Growth and Design*, 18(4), 2579-2587. <https://doi.org/10.1021/acs.cgd.8b00198>

Das, A., Sallat, A., Böhme, F., Sarlin, E., Vuorinen, J., Vennemann, N., ... Stöckelhuber, K. W. (2018). Temperature scanning stress relaxation of an autonomous self-healing elastomer containing non-covalent reversible network junctions. *Polymers*, 10(1), [94]. <https://doi.org/10.3390/polym10010094>

Kato, D., Sakai, H., Araki, Y., Wada, T., Tkachenko, N. V., & Hasobe, T. (2018). Concentration-dependent photophysical switching in mixed self-assembled monolayers of pentacene and perylene-3,4,9,10-tetracarboxylic diimide on gold nanoclusters. *Physical Chemistry Chemical Physics*, 20(13), 8695-8706. <https://doi.org/10.1039/c8cp00174j>

Ojha, N., Tuomisto, M., Lastusaari, M., & Petit, L. (2018). Upconversion from fluorophosphate glasses prepared with NaYF<sub>4</sub>:Er<sup>3+</sup>, Yb<sup>3+</sup> nanocrystals. *RSC Advances*, 8(34), 19226-19236. <https://doi.org/10.1039/c8ra03298j>

Saccone, M., Kuntze, K., Ahmed, Z., Siiskonen, A., Giese, M., & Priimagi, A. (2018). Ortho-Fluorination of azophenols increases the mesophase stability of photoresponsive hydrogen-bonded liquid crystals. *Journal of Materials Chemistry C*, 6(37), 9958-9963. <https://doi.org/10.1039/c8tc02611d>

Shakun, A., Poikelispää, M., Das, A., & Vuorinen, J. (2018). Improved electromechanical response in acrylic rubber by different carbon-based fillers. *Polymer Engineering and Science*, 58(3), 395-404. <https://doi.org/10.1002/pen.24586>

Rajan, R., Rainosalo, E., Thomas, S. P., Ramamoorthy, S. K., Zavašnik, J., Vuorinen, J., & Skrifvars, M. (2018). Modification of epoxy resin by silane-coupling agent to improve tensile properties of viscose fabric composites. *Polymer Bulletin*, 75(1), 167-195. <https://doi.org/10.1007/s00289-017-2022-2>

Doddapaneni, T. R. K. C., Jain, R., Praveenkumar, R., Rintala, J., Romar, H., & Konttinen, J. (2018). Adsorption of furfural from torrefaction condensate using torrefied biomass. *Chemical Engineering Journal*, 334, 558-568. <https://doi.org/10.1016/j.cej.2017.10.053>

Honkanen, M., Wang, J., Kärkkäinen, M., Huuhtanen, M., Jiang, H., Kallinen, K., ... Vippola, M. (2018). Regeneration of sulfur-poisoned Pd-based catalyst for natural gas oxidation. *Journal of Catalysis*, *358*, 253-265. <https://doi.org/10.1016/j.jcat.2017.12.021>

Dessi, P., Porca, E., Haavisto, J., Lakaniemi, A-M., Collins, G., & Lens, P. N. L. (2018). Composition and role of the attached and planktonic microbial communities in mesophilic and thermophilic xylose-fed microbial fuel cells. *RSC Advances*, *8*(6), 3069-3080. <https://doi.org/10.1039/c7ra12316g>

Ojha, N., Nguyen, H., Laihininen, T., Salminen, T., Lastusaari, M., & Petit, L. (2018). Decomposition of persistent luminescent microparticles in corrosive phosphate glass melt. *Corrosion Science*, *135*, 207-214. <https://doi.org/10.1016/j.corsci.2018.02.050>

Saarimaa, V., Kaleva, A., Paunikallio, T., Nikkanen, J-P., Heinonen, S., Levänen, E., ... Markkula, A. (2018). Convenient extraction method for quantification of thin zinc patina layers. *Surface and Interface Analysis*, *50*(5), 564-570. <https://doi.org/10.1002/sia.6429>

Rokade, S. S., Joshi, K. A., Mahajan, K., Patil, S., Tomar, G., Dubal, D. S., ... Ghosh, S. (2018). Gloriosa superba Mediated Synthesis of Platinum and Palladium Nanoparticles for Induction of Apoptosis in Breast Cancer. *Bioinorganic Chemistry and Applications*, *2018*, [4924186]. <https://doi.org/10.1155/2018/4924186>

Tienaho, J., Poikulainen, E., Sarjala, T., Muilu-Mäkelä, R., Santala, V., & Karp, M. (2018). A Bioscreening Technique for Ultraviolet Irradiation Protective Natural Substances. *Photochemistry and Photobiology*, *94*(6), 1273-1280. <https://doi.org/10.1111/php.12954>

D'Urso, L., Condorelli, M., Puglisi, O., Tempra, C., Lolicato, F., Compagnini, G., & La Rosa, C. (2018). Detection and characterization at nM concentration of oligomers formed by hIAPP, A $\beta$ (1-40) and their equimolar mixture using SERS and MD simulations. *Physical Chemistry Chemical Physics*, *20*(31), 20588-20596. <https://doi.org/10.1039/c7cp08552d>

Nykänen, H., Mpamah, P. A., & Rissanen, A. J. (2018). Stable carbon isotopic composition of peat columns, subsoil and vegetation on natural and forestry-drained boreal peatlands. *Isotopes in Environmental and Health Studies*, *54*(6). <https://doi.org/10.1080/10256016.2018.1523158>

Sadiek, I., Mikkonen, T., Vainio, M., Toivonen, J., & Foltynowicz, A. (2018). Optical frequency comb photoacoustic spectroscopy. *Physical Chemistry Chemical Physics*, *20*(44), 27849-27855. <https://doi.org/10.1039/c8cp05666h>

Durandin, N. A., Isokuortti, J., Efimov, A., Vuorimaa-Laukkanen, E., Tkachenko, N. V., & Laaksonen, T. (2018). Efficient photon upconversion at remarkably low annihilator concentrations in a liquid polymer matrix: when less is more. *Chemical Communications*, *54*(99), 14029-14032. <https://doi.org/10.1039/c8cc07592a>

Virkki, M., Maurice, A., Forni, A., Sironi, M., Dichiarante, V., Brevet, P. F., ... Priimagi, A. (2018). On the molecular optical nonlinearity of halogen-bond-forming azobenzenes. *Physical Chemistry Chemical Physics*, *20*(45), 28810-28817. <https://doi.org/10.1039/c8cp05392h>

Saarimaa, V., Kaleva, A., Nikkanen, J-P., Heinonen, S., Levänen, E., Väisänen, P., ... Juhanoja, J. (2017). Supercritical carbon dioxide treatment of hot dip galvanized steel as a surface treatment before coating. *Surface and Coatings Technology*, *331*, 137-142. <https://doi.org/10.1016/j.surfcoat.2017.10.047>

Lisitsyna, E. S., Ketola, T-M., Morin-Picardat, E., Liang, H., Hanzlíková, M., Urtti, A., ... Vuorimaa-Laukkanen, E. (2017). Time-Resolved Fluorescence Spectroscopy Reveals Fine Structure and Dynamics of Poly(L-lysine) and Polyethylenimine Based DNA Polyplexes. *Journal of Physical Chemistry B*, *121*(48), 10782-10792. <https://doi.org/10.1021/acs.jpccb.7b08394>

Liimatainen, V., Vuckovac, M., Jokinen, V., Sariola, V., Hokkanen, M. J., Zhou, Q., & Ras, R. H. A. (2017). Mapping microscale wetting variations on biological and synthetic water-repellent surfaces. *Nature Communications*, *8*(1), [1798]. <https://doi.org/10.1038/s41467-017-01510-7>

Christophliemk, H., Johansson, C., Ullsten, H., & Järnström, L. (2017). Oxygen and water vapor transmission rates of starch-poly(vinyl alcohol) barrier coatings for flexible packaging paper. *Progress in Organic Coatings*, 113, 218-224. <https://doi.org/10.1016/j.porgcoat.2017.04.019>

Sippola, R. J., Hadipour, A., Kastinen, T., Vivo, P., Hukka, T. I., Aernouts, T., & Heiskanen, J. P. (2017). Carbazole-based small molecule electron donors: Syntheses, characterization, and material properties. *Dyes and Pigments*, 150, 79-88. <https://doi.org/10.1016/j.dyepig.2017.11.014>

Danne, R., Poojari, C., Martinez-Seara, H., Rissanen, S., Lolicato, F., Róg, T., & Vattulainen, I. (2017). DoGlycans-Tools for Preparing Carbohydrate Structures for Atomistic Simulations of Glycoproteins, Glycolipids, and Carbohydrate Polymers for GROMACS. *Journal of Chemical Information and Modeling*, 57(10), 2401-2406. <https://doi.org/10.1021/acs.jcim.7b00237>

Christophliemk, H., Ullsten, H., Johansson, C., & Järnström, L. (2017). Starch-poly(vinyl alcohol) barrier coatings for flexible packaging paper and their effects of phase interactions. *Progress in Organic Coatings*, 111, 13-22. <https://doi.org/10.1016/j.porgcoat.2017.04.018>

Isakov, M., Matikainen, V., Koivuluoto, H., & May, M. (2017). Systematic analysis of coating-substrate interactions in the presence of flow localization. *Surface and Coatings Technology*, 324, 264-280. <https://doi.org/10.1016/j.surfcoat.2017.05.040>

Timr, Š., Pleskot, R., Kadlec, J., Kohagen, M., Magarkar, A., & Jungwirth, P. (2017). Membrane Binding of Recoverin: From Mechanistic Understanding to Biological Functionality. *ACS Central Science*, 3(8), 868-874. <https://doi.org/10.1021/acscentsci.7b00210>

Pirjola, L., Rönkkö, T., Saukko, E., Parviainen, H., Malinen, A., Alanen, J., & Saveljeff, H. (2017). Exhaust emissions of non-road mobile machine: Real-world and laboratory studies with diesel and HVO fuels. *Fuel*, 202, 154-164. <https://doi.org/10.1016/j.fuel.2017.04.029>

Itävuori, P., Hulthén, E., & Vilkkö, M. (2017). Feed-hopper level estimation and control in cone crushers. *Minerals Engineering*, 110, 82-95. <https://doi.org/10.1016/j.mineng.2017.04.010>

Rahaman, O., Kalimeri, M., Katava, M., Paciaroni, A., & Sterpone, F. (2017). Configurational Disorder of Water Hydrogen-Bond Network at the Protein Dynamical Transition. *Journal of Physical Chemistry Part B*, 121(28), 6792-6798. <https://doi.org/10.1021/acs.jpcc.7b03888>

Poikelispää, M., Shakun, A., Sarlin, E., Das, A., & Vuorinen, J. (2017). Vegetable fillers for electric stimuli responsive elastomers. *Journal of Applied Polymer Science*, 134(28), [45081]. <https://doi.org/10.1002/app.45081>

Suominen, M., Lehtimäki, S., Yewale, R., Damlin, P., Tuukkanen, S., & Kvarnström, C. (2017). Electropolymerized polyazulene as active material in flexible supercapacitors. *Journal of Power Sources*, 356, 181-190. <https://doi.org/10.1016/j.jpowsour.2017.04.082>

Nogueira, I. B. R., Ribeiro, A. M., Martins, M. A. F., Rodrigues, A. E., Koivisto, H., & Loureiro, J. M. (2017). Dynamics of a True Moving Bed separation process: Linear model identification and advanced process control. *Journal of Chromatography A*, 1504. <https://doi.org/10.1016/j.chroma.2017.04.060>

Baek, J., Umeyama, T., Stranius, K., Yamada, H., Tkachenko, N. V., & Imahori, H. (2017). Long-Range Observation of Exciplex Formation and Decay Mediated by One-Dimensional Bridges. *Journal of Physical Chemistry C*, 121(25), 13952-13961. <https://doi.org/10.1021/acs.jpcc.7b04483>

Railanmaa, A., Lehtimäki, S., & Lupo, D. (2017). Comparison of starch and gelatin hydrogels for non-toxic supercapacitor electrolytes. *Applied Physics A-Materials Science and Processing*, 123(6), [459]. <https://doi.org/10.1007/s00339-017-1068-1>

Ma, L., Laasonen, K., & Akola, J. (2017). Catalytic Activity of AuCu Clusters on MgO(100): Effect of Alloy Composition for CO Oxidation. *Journal of Physical Chemistry C*, 121(20), 10876-10886. <https://doi.org/10.1021/acs.jpcc.6b12054>

Goh, J.-Q., Akola, J., & Ferrando, R. (2017). Geometric Structure and Chemical Ordering of Large AuCu Clusters: A Computational Study. *Journal of Physical Chemistry C*, 121(20), 10809-10816. <https://doi.org/10.1021/acs.jpcc.6b11958>

Piccardi, A., Alberucci, A., Kravets, N., Buchnev, O., & Assanto, G. (2017). Nematicon-enhanced spontaneous symmetry breaking. *Molecular Crystals and Liquid Crystals*, 649(1), 59-65. <https://doi.org/10.1080/15421406.2017.1303916>

Jones, R. O., Ahlstedt, O., Akola, J., & Ropo, M. (2017). Density functional study of structure and dynamics in liquid antimony and  $Sb_n$  clusters. *Journal of Chemical Physics*, 146(19), [194502]. <https://doi.org/10.1063/1.4983219>

Kramb, J., Gómez-Barea, A., DeMartini, N., Romar, H., Doddapaneni, T. R. K. C., & Konttinen, J. (2017). The effects of calcium and potassium on  $CO_2$  gasification of birch wood in a fluidized bed. *Fuel*, 196, 398-407. <https://doi.org/10.1016/j.fuel.2017.01.101>

Virkki, K., Hakola, H., Urbani, M., Tejerina, L., Ince, M., Martínez-Díaz, M. V., ... Tkachenko, N. V. (2017). Photoinduced Electron Injection from Zinc Phthalocyanines into Zinc Oxide Nanorods: Aggregation Effects. *Journal of Physical Chemistry C*, 121(17), 9594-9605. <https://doi.org/10.1021/acs.jpcc.7b01562>

Honkanen, M., Hansen, T. W., Jiang, H., Kärkkäinen, M., Huuhtanen, M., Heikkinen, O., ... Vippola, M. (2017). Electron microscopic studies of natural gas oxidation catalyst – Effects of thermally accelerated aging on catalyst microstructure. *Journal of Catalysis*, 349, 19-29. <https://doi.org/10.1016/j.jcat.2017.03.003>

Mah, P. T., Novakovic, D., Saarinen, J., van Landeghem, S., Peltonen, L., Laaksonen, T., ... Strachan, C. J. (2017). Elucidation of Compression-Induced Surface Crystallization in Amorphous Tablets Using Sum Frequency Generation (SFG) Microscopy. *Pharmaceutical Research*, 34(5), 957-970. <https://doi.org/10.1007/s11095-016-2046-6>

Higashino, T., Nakatsuji, H., Fukuda, R., Okamoto, H., Imaj, H., Matsuda, T., ... Imahori, H. (2017). Hexaphyrin as a Potential Theranostic Dye for Photothermal Therapy and  $^{19}F$  Magnetic Resonance Imaging. *ChemBioChem*, 18(10), 951-959. <https://doi.org/10.1002/cbic.201700071>

Bilkova, E., Pleskot, R., Rissanen, S., Sun, S., Czogalla, A., Cwiklik, L., ... Coskun, Ü. (2017). Calcium Directly Regulates Phosphatidylinositol 4,5-Bisphosphate Headgroup Conformation and Recognition. *Journal of the American Chemical Society*, 139(11), 4019-4024. <https://doi.org/10.1021/jacs.6b11760>

Milani, R., Houbenov, N., Fernandez-Palacio, F., Cavallo, G., Luzio, A., Haataja, J., ... Ikkala, O. (2017). Hierarchical Self-Assembly of Halogen-Bonded Block Copolymer Complexes into Upright Cylindrical Domains. *Chem*, 2(3), 417-426. <https://doi.org/10.1016/j.chempr.2017.02.003>

Guixà-González, R., Albasanz, J. L., Rodríguez-Espigares, I., Pastor, M., Sanz, F., Martí-Solano, M., ... Selent, J. (2017). Membrane cholesterol access into a G-protein-coupled receptor. *Nature Communications*, 8, [14505]. <https://doi.org/10.1038/ncomms14505>

Izdebskaya, Y., Shvedov, V., Assanto, G., & Krolikowski, W. (2017). Magnetic routing of light-induced waveguides. *Nature Communications*, 8, [14452]. <https://doi.org/10.1038/ncomms14452>

Siiskonen, A., & Priimägi, A. (2017). Benchmarking DFT methods with small basis sets for the calculation of halogen-bond strengths. *Journal of Molecular Modeling*, 23(2), [50]. <https://doi.org/10.1007/s00894-017-3212-4>

Balanta, M. A. G., Orsi Gordo, V., Carvalho, A. R. H., Puustinen, J., Alghamdi, H. M., Henini, M., ... Galvão Gobato, Y. (2017). Polarization resolved photoluminescence in  $GaAs_{1-x}Bi_x/GaAs$  quantum wells. *Journal of Luminescence*, 182, 49-52. <https://doi.org/10.1016/j.jlumin.2016.10.008>

Kovács, P. T., Zare, A., Balogh, T., Bregovic, R., & Gotchev, A. (2017). Architectures and codecs for real-time light field streaming. *Journal of Imaging Science and Technology*, *61*(1), [010403]. <https://doi.org/10.2352/J.ImagingSci.Technol.2017.61.1.010403>

Vuori, L., Ali-Löytty, H., Lahtonen, K., Hannula, M., Lehtonen, E., Niu, Y., & Valden, M. (2017). Improved corrosion properties of Hot Dip Galvanized Steel by nanomolecular silane layers as hybrid interface between zinc and top coatings. *Corrosion*, *73*(2). <https://doi.org/10.5006/2206>

Lahbib, I., Valkonen, A., Rzaigui, M., & Smirani, W. (2017). Synthesis, Structural Characterization, Hirshfeld Surface and Antioxidant Activity Analysis of a Novel Organic Cation Antimonate Complex. *Journal of Cluster Science*, *28*(4), 2239–2252. <https://doi.org/10.1007/s10876-017-1217-x>

Golovanov, V. V., Nazarchuk, B. V., Golovanova, V. V., Tkachenko, N. V., & Rantala, T. T. (2017). Effects of orientation at the phthalocyanine-CdSe interface on the electron transfer characteristics. *Physical Chemistry Chemical Physics*, *19*(16), 10511–10517. <https://doi.org/10.1039/c7cp00833c>

Mojica, E., Pertuz, S., & Arguello, H. (2017). High-resolution coded-aperture design for compressive X-ray tomography using low resolution detectors. *Optics Communications*, *404*, 103–109. <https://doi.org/10.1016/j.optcom.2017.06.053>

Fabert, M., Ojha, N., Erasmus, E., Hannula, M., Hokka, M., Hyttinen, J., ... Massera, J. (2017). Crystallization and sintering of borosilicate bioactive glasses for application in tissue engineering. *Journal of Materials Chemistry B*, *5*(23), 4514–4525. <https://doi.org/10.1039/c7tb00106a>

Javanainen, M., Melcrová, A., Magarkar, A., Jurkiewicz, P., Hof, M., Jungwirth, P., & Martinez-Seara, H. (2017). Two cations, two mechanisms: Interactions of sodium and calcium with zwitterionic lipid membranes. *Chemical Communications*, *53*(39), 5380–5383. <https://doi.org/10.1039/c7cc02208e>

Vapaavuori, J., Siiskonen, A., Dichiarante, V., Forni, A., Saccone, M., Pilati, T., ... Priimagi, A. (2017). Supramolecular control of liquid crystals by doping with halogen-bonding dyes. *RSC Advances*, *7*(64), 40237–40242. <https://doi.org/10.1039/c7ra06397k>

Saccone, M., Palacio, F. F., Cavallo, G., Dichiarante, V., Virkki, M., Terraneo, G., ... Metrangolo, P. (2017). Photoresponsive ionic liquid crystals assembled: Via halogen bond: En route towards light-controllable ion transporters. *Faraday Discussions*, *203*, 407–422. <https://doi.org/10.1039/c7fd00120g>

Baek, J., Umeyama, T., Mizuno, S., Tkachenko, N. V., & Imahori, H. (2017). Photophysical properties of porphyrin dimer-single-walled carbon nanotube linked systems. *Journal of Physical Chemistry C*, *121*(39). <https://doi.org/10.1021/acs.jpcc.7b08594>

Kordmahaleh, A. A., Naghashzadegan, M., Javaherdeh, K., & Khoshgoftar, M. (2017). Design of a 25 MWe Solar Thermal Power Plant in Iran with Using Parabolic Trough Collectors and a Two-Tank Molten Salt Storage System. *International Journal of Photoenergy*, *2017*, [4210184]. <https://doi.org/10.1155/2017/4210184>

Ntziachristos, L., Saukko, E., Lehtoranta, K., Rönkkö, T., Timonen, H., Simonen, P., ... Keskinen, J. (2016). Particle emissions characterization from a medium-speed marine diesel engine with two fuels at different sampling conditions. *Fuel*, *186*, 456–465. <https://doi.org/10.1016/j.fuel.2016.08.091>

Varis, T., Suhonen, T., Calonijs, O., Čuban, J., & Pietola, M. (2016). Optimization of HVOF Cr<sub>3</sub>C<sub>2</sub>-NiCr coating for increased fatigue performance. *Surface and Coatings Technology*, *305*, 123–131. <https://doi.org/10.1016/j.surfcoat.2016.08.012>

Ropo, M., Akola, J., & Jones, R. O. (2016). Collective excitations and viscosity in liquid Bi. *Journal of Chemical Physics*, *145*(18), [184502]. <https://doi.org/10.1063/1.4965429>



Poikelispää, M., Shakun, A., Das, A., & Vuorinen, J. (2016). Improvement of actuation performance of dielectric elastomers by barium titanate and carbon black fillers. *Journal of Applied Polymer Science*, 133(42), [44116]. <https://doi.org/10.1002/app.44116>

Smith, J. D., Mitsakou, C., Kitwiroon, N., Barratt, B. M., Walton, H. A., Taylor, J. G., ... Beevers, S. D. (2016). London Hybrid Exposure Model: Improving Human Exposure Estimates to NO<sub>2</sub> and PM<sub>2.5</sub> in an Urban Setting. *Environmental Science and Technology*, 50(21), 11760-11768. <https://doi.org/10.1021/acs.est.6b01817>

Ali-Löytty, H., Hannula, M., Honkanen, M., Östman, K., Lahtonen, K., & Valden, M. (2016). Grain orientation dependent Nb-Ti microalloying mediated surface segregation on ferritic stainless steel. *Corrosion Science*, 112, 204-213. <https://doi.org/10.1016/j.corsci.2016.07.024>

Reisberg, L., Pärna, R., Kikas, A., Kuusik, I., Kisand, V., Hirsimäki, M., ... Nõmmiste, E. (2016). UPS and DFT investigation of the electronic structure of gas-phase trimesic acid. *Journal of Electron Spectroscopy and Related Phenomena*, 213, 11-16. <https://doi.org/10.1016/j.elspec.2016.10.004>

Will, O. M., Purcz, N., Chalaris, A., Heneweer, C., Boretius, S., Purcz, L., ... Tiwari, S. (2016). Increased survival rate by local release of diclofenac in a murine model of recurrent oral carcinoma. *International Journal of Nanomedicine*, 11, 5311-5321. <https://doi.org/10.2147/IJN.S109199>

Kramb, J., Konttinen, J., Backman, R., Salo, K., & Roberts, M. (2016). Elimination of arsenic-containing emissions from gasification of chromated copper arsenate wood. *Fuel*, 181, 319-324. <https://doi.org/10.1016/j.fuel.2016.04.109>

Zhou, Q., Sariola, V., Latifi, K., & Liimatainen, V. (2016). Controlling the motion of multiple objects on a Chladni plate. *Nature Communications*, 7, [12764]. <https://doi.org/10.1038/ncomms12764>

Robison, A. D., Sun, S., Poyton, M. F., Johnson, G. A., Pellois, J. P., Jungwirth, P., ... Cremer, P. S. (2016). Polyarginine Interacts More Strongly and Cooperatively than Polylysine with Phospholipid Bilayers. *Journal of Physical Chemistry Part B*, 120(35), 9287-9296. <https://doi.org/10.1021/acs.jpcc.6b05604>

Pilehrood, M. K., Atashi, A., Sadeghi-Aliabadi, H., Nousiainen, P., & Harlin, A. (2016). 3D micro-nano structured hybrid scaffolds: An investigation into the role of nanofiber coating on viability, proliferation and differentiation of seeded mesenchymal stem cells. *Journal Nanoscience and Nanotechnology*, 16(9), 9000-9007. <https://doi.org/10.1166/jnn.2016.12740>

Mylläri, V., Hartikainen, S., Poliakova, V., Anderson, R., Jönkkäri, I., Pasanen, P., ... Vuorinen, J. (2016). Detergent impurity effect on recycled HDPE: Properties after repetitive processing. *Journal of Applied Polymer Science*, 133(31), [43766]. <https://doi.org/10.1002/app.43766>

Garifullin, M., Sineelnikov, A., Bronzova, M., Kovacic, B., & Kamnik, R. (2016). Buckling Behavior of Cold-Formed Studs with Thermal Perforations. *MATEC Web of Conferences*, 73, [04011]. <https://doi.org/10.1051/mateconf/20167304011>

Kapgate, B. P., Das, C., Das, A., Basu, D., Wiessner, S., Reuter, U., & Heinrich, G. (2016). Reinforced chloroprene rubber by in situ generated silica particles: Evidence of bound rubber on the silica surface. *Journal of Applied Polymer Science*, 133(30), [43717]. <https://doi.org/10.1002/app.43717>

Luna, E., Wu, M., Hanke, M., Puustinen, J., Guina, M., & Trampert, A. (2016). Spontaneous formation of three-dimensionally ordered Bi-rich nanostructures within GaAs<sub>1-x</sub>Bi<sub>x</sub>/GaAs quantum wells. *Nanotechnology*, 27(32), [325603]. <https://doi.org/10.1088/0957-4484/27/32/325603>

Kärkkäinen, M., Kolli, T., Honkanen, M., Heikkinen, O., Väliheikki, A., Huuhtanen, M., ... Keiski, R. L. (2016). The Influence of Phosphorus Exposure on a Natural-Gas-Oxidation Catalyst. *Topics in Catalysis*, 59(10-12), 1044-1048. <https://doi.org/10.1007/s11244-016-0587-x>

- Poutanen, M., Ikkala, O., & Priimägi, A. (2016). Structurally Controlled Dynamics in Azobenzene-Based Supramolecular Self-Assemblies in Solid State. *Macromolecules*, *49*(11), 4095-4101. <https://doi.org/10.1021/acs.macromol.6b00562>
- Isotahdon, E., Huttunen-Saarivirta, E., & Kuokkala, V-T. (2016). Development of Magnetic Losses During Accelerated Corrosion Tests for Nd-Fe-B Magnets Used in Permanent Magnet Generators. *Corrosion*, *72*(6), 732-741. <https://doi.org/10.5006/2037>
- Razavi, A., Valkama, M., & Lohan, E. S. (2016). Robust statistical approaches for RSS-based floor detection in indoor localization. *Sensors*, *16*(6), [793]. <https://doi.org/10.3390/s16060793>
- Sharma, R., Bhalerao, S., & Gupta, D. (2016). Effect of incorporation of CdS NPs on performance of PTB7: PCBM organic solar cells. *Organic Electronics: physics, materials, applications*, *33*, 274-280. <https://doi.org/10.1016/j.orgel.2016.03.030>
- Soto, A. M., Koivisto, J. T., Parraga, J. E., Silva-Correia, J., Oliveira, J. M., Reis, R. L., ... Figueiras, E. (2016). Optical Projection Tomography Technique for Image Texture and Mass Transport Studies in Hydrogels Based on Gellan Gum. *Langmuir*, *32*(20), 5173-5182. <https://doi.org/10.1021/acs.langmuir.6b00554>
- La Rosa, C., Scalisi, S., Lolicato, F., Pannuzzo, M., & Raudino, A. (2016). Lipid-assisted protein transport: A diffusion-reaction model supported by kinetic experiments and molecular dynamics simulations. *Journal of Chemical Physics*, *144* (18), [184901]. <https://doi.org/10.1063/1.4948323>
- Hakola, H., Sariola-Leikas, E., Efimov, A., & Tkachenko, N. V. (2016). Effect of Hole Transporting Material on Charge Transfer Processes in Zinc Phthalocyanine Sensitized ZnO Nanorods. *Journal of Physical Chemistry C*, *120*(13), 7044-7051. <https://doi.org/10.1021/acs.jpcc.6b01583>
- Janka, L., Norpoth, J., Trache, R., & Berger, L. M. (2016). Influence of heat treatment on the abrasive wear resistance of a Cr<sub>3</sub>C<sub>2</sub>NiCr coating deposited by an ethene-fuelled HVOF spray process. *Surface and Coatings Technology*, *291*, 444-451. <https://doi.org/10.1016/j.surfcoat.2016.02.066>
- Fernandez-Palacio, F., Saccone, M., Priimägi, A., Terraneo, G., Pilati, T., Metrangolo, P., & Resnati, G. (2016). Coordination networks incorporating halogen-bond donor sites and azobenzene groups. *CrystEngComm*, *18*(13), 2251-2257. <https://doi.org/10.1039/c6ce00059b>
- Isakov, M., Kokkonen, J., Östman, K., & Kuokkala, V-T. (2016). Strain rate change tests with the Split Hopkinson Bar method. *European Physical Journal. Special Topics*, *225*(2), 231-242. <https://doi.org/10.1140/epjst/e2015-99999-x>
- Ma, L., Melander, M., Weckman, T., Lipasti, S., Laasonen, K., & Akola, J. (2016). DFT simulations and microkinetic modelling of 1-pentyne hydrogenation on Cu<sub>20</sub> model catalysts. *Journal of Molecular Graphics and Modelling*, *65*, 61-70. <https://doi.org/10.1016/j.jmgm.2016.02.007>
- Viljanen, J., Sun, Z., & Alwahabi, Z. T. (2016). Microwave assisted laser-induced breakdown spectroscopy at ambient conditions. *Spectrochimica Acta Part B: Atomic Spectroscopy*, *118*, 29-36. <https://doi.org/10.1016/j.sab.2016.02.002>
- Mal, J., Nancharaiyah, Y. V., Van Hullebusch, E. D., & Lens, P. N. L. (2016). Metal chalcogenide quantum dots: Biotechnological synthesis and applications. *RSC Advances*, *6*(47), 41477-41495. <https://doi.org/10.1039/c6ra08447h>
- Sakuma, T., Sakai, H., Araki, Y., Mori, T., Wada, T., Tkachenko, N. V., & Hasobe, T. (2016). Long-Lived Triplet Excited States of Bent-Shaped Pentacene Dimers by Intramolecular Singlet Fission. *Journal of Physical Chemistry A*, *120*(11), 1867-1875. <https://doi.org/10.1021/acs.jpca.6b00988>
- Katava, M., Kalimeri, M., Stirnemann, G., & Sterpone, F. (2016). Stability and Function at High Temperature. What Makes a Thermophilic GTPase Different from Its Mesophilic Homologue. *Journal of Physical Chemistry Part B*, *120*(10), 2721-2730. <https://doi.org/10.1021/acs.jpcc.6b00306>

- Szabo, H. M., Lepistö, R., & Tuhkanen, T. (2016). HPLC-SEC: a new approach to characterise complex wastewater effluents. *International Journal of Environmental Analytical Chemistry*, *96*(3), 257-270. <https://doi.org/10.1080/03067319.2016.1150463>
- Salunke, J. K., Wong, F. L., Feron, K., Manzhos, S., Lo, M. F., Shinde, D., ... Wadgaonkar, P. P. (2016). Phenothiazine and carbazole substituted pyrene based electroluminescent organic semiconductors for OLED devices. *Journal of Materials Chemistry C*, *4*(5), 1009-1018. <https://doi.org/10.1039/c5tc03690a>
- Ali-Löytty, H., Louie, M. W., Singh, M. R., Li, L., Sanchez Casalongue, H. G., Ogasawara, H., ... Friebel, D. (2016). Ambient-Pressure XPS Study of a Ni-Fe Electrocatalyst for the Oxygen Evolution Reaction. *Journal of Physical Chemistry C*, *120*(4), 2247-2253. <https://doi.org/10.1021/acs.jpcc.5b10931>
- Allolio, C., Baxova, K., Vazdar, M., & Jungwirth, P. (2016). Guanidinium Pairing Facilitates Membrane Translocation. *Journal of Physical Chemistry Part B*, *120*(1), 143-153. <https://doi.org/10.1021/acs.jpcc.5b10404>
- Pirjola, L., Dittrich, A., Niemi, J. V., Saarikoski, S., Timonen, H., Kuuluvainen, H., ... Hillamo, R. (2016). Physical and Chemical Characterization of Real-World Particle Number and Mass Emissions from City Buses in Finland. *Environmental Science and Technology*, *50*(1), 294-304. <https://doi.org/10.1021/acs.est.5b04105>
- Rocherullé, J., Massera, J., Oudadesse, H., Calvez, L., Trolès, J., & Zhang, X. H. (2016). Heat capacities of crystalline and glassy lithium metaphosphate up to the transition region. *Journal of Thermal Analysis and Calorimetry*, *123*(1), 401-407. <https://doi.org/10.1007/s10973-015-4938-9>
- Golovanov, V., Golovanova, V., & Rantala, T. T. (2016). Thermal desorption of molecular oxygen from SnO<sub>2</sub> (110) surface: Insights from first-principles calculations. *Journal of Physics and Chemistry of Solids*, *89*, 15-22. <https://doi.org/10.1016/j.jpccs.2015.10.010>
- Higashino, T., Yamada, T., Yamamoto, M., Furube, A., Tkachenko, N. V., Miura, T., ... Imahori, H. (2016). Remarkable Dependence of the Final Charge Separation Efficiency on the Donor-Acceptor Interaction in Photoinduced Electron Transfer. *Angewandte Chemie (International Edition)*, *55*(2), 629-633. <https://doi.org/10.1002/anie.201509067>
- Jain, R., Dominic, D., Jordan, N., Rene, E. R., Weiss, S., van Hullebusch, E. D., ... Lens, P. N. L. (2016). Preferential adsorption of Cu in a multi-metal mixture onto biogenic elemental selenium nanoparticles. *Chemical Engineering Journal*, *284*, 917-925. <https://doi.org/10.1016/j.cej.2015.08.144>
- Santos, F. M. F., Rosa, J. N., Candeias, N. R., Carvalho, C. P., Matos, A. I., Ventura, A. E., ... Gois, P. M. P. (2016). A Three-Component Assembly Promoted by Boronic Acids Delivers a Modular Fluorophore Platform (BASHY Dyes). *Chemistry: A European Journal*, *22*(5), 1631-1637. <https://doi.org/10.1002/chem.201503943>
- Matsuo, S., Yamazoe, S., Goh, J-Q., Akola, J., & Tsukuda, T. (2016). The electrooxidation-induced structural changes of gold di-superatomic molecules: Au<sub>23</sub> vs. Au<sub>25</sub>. *Physical Chemistry Chemical Physics*, *18*(6), 4822-4827. <https://doi.org/10.1039/c5cp06969f>
- Kulig, W., Cwiklik, L., Jurkiewicz, P., Rog, T., & Vattulainen, I. (2016). Cholesterol oxidation products and their biological importance. *Chemistry and Physics of Lipids*, *199*, 144-160. <https://doi.org/10.1016/j.chemphyslip.2016.03.001>
- Kato, D., Sakai, H., Tkachenko, N. V., & Hasobe, T. (2016). High-Yield Excited Triplet States in Pentacene Self-Assembled Monolayers on Gold Nanoparticles through Singlet Exciton Fission. *Angewandte Chemie (International Edition)*, *55*(17), 5230-5234. <https://doi.org/10.1002/anie.201601421>
- Cavallo, G., Terraneo, G., Monfredini, A., Saccone, M., Priimägi, A., Pilati, T., ... Bruce, D. W. (2016). Superfluorinated Ionic Liquid Crystals Based on Supramolecular, Halogen-Bonded Anions. *Angewandte Chemie (International Edition)*, *55*(21), 6300-6304. <https://doi.org/10.1002/anie.201601278>

Bansod, N. D., Kapgade, B. P., Das, C., Das, A., Basu, D., & Debnath, S. C. (2016). Compatibilization of natural rubber/nitrile rubber blends by sol-gel nano-silica generated by in situ method. *JOURNAL OF SOL-GEL SCIENCE AND TECHNOLOGY*, *80*(2), 548–559. <https://doi.org/10.1007/s10971-016-4114-0>

Horinouchi, H., Sakai, H., Araki, Y., Sakanoue, T., Takenobu, T., Wada, T., ... Hasobe, T. (2016). Controllable Electronic Structures and Photoinduced Processes of Bay-Linked Peryleneimide Dimers and a Ferrocene-Linked Triad. *Chemistry: A European Journal*, *22*(28), 9631–9641. <https://doi.org/10.1002/chem.201601058>

Basu, D., Das, A., Wang, D. Y., George, J. J., Stöckelhuber, K. W., Boldt, R., ... Heinrich, G. (2016). Fire-safe and environmentally friendly nanocomposites based on layered double hydroxides and ethylene propylene diene elastomer. *RSC Advances*, *6*(31), 26425–26436. <https://doi.org/10.1039/c5ra27444c>

Lee, T. Y., Ramasamy, P., Oh, Y. K., Lee, K., & Kim, S. H. (2016). Alginate microgels created by selective coalescence between core drops paired with an ultrathin shell. *Journal of Materials Chemistry B*, *4*(19), 3232–3238. <https://doi.org/10.1039/c6tb00580b>

Halder, A., Kandambeth, S., Biswal, B. P., Kaur, G., Roy, N. C., Addicoat, M., ... Banerjee, R. (2016). Decoding the Morphological Diversity in Two Dimensional Crystalline Porous Polymers by Core Planarity Modulation. *Angewandte Chemie (International Edition)*, *55*(27), 7806–7810. <https://doi.org/10.1002/anie.201600087>

Akamatsu, N., Aizawa, M., Tatsumi, R., Hisano, K., Priimägi, A., & Shishido, A. (2016). Photoresponsive liquid-crystalline polymer films bilayered with an inverse opal structure. *JOURNAL OF PHOTOPOLYMER SCIENCE AND TECHNOLOGY*, *29*(1), 145–148. <https://doi.org/10.2494/photopolymer.29.145>

Kattiparambil Rajan, D., Patrikoski, M., Verho, J., Sivula, J., Ihalainen, H., Miettinen, S., & Lekkala, J. (2016). Optical non-contact pH measurement in cell culture with sterilizable, modular parts. *Talanta*, *161*, 755–761. <https://doi.org/10.1016/j.talanta.2016.09.021>

Kastinen, T., Niskanen, M., Risko, C., Cramariuc, O., & Hukka, T. I. (2016). On describing the optoelectronic characteristics of poly(benzodithiophene-: Co -quinoxaline)-fullerene complexes: The influence of optimally tuned density functionals. *Physical Chemistry Chemical Physics*, *18*(39), 27654–27670. <https://doi.org/10.1039/c6cp04567g>

Spataru, A., Jain, R., Chung, J. W., Gerner, G., Krebs, R., & Lens, P. N. L. (2016). Enhanced adsorption of orthophosphate and copper onto hydrochar derived from sewage sludge by KOH activation. *RSC Advances*, *6*(104), 101827–101834. <https://doi.org/10.1039/c6ra22327c>

Perumbilavil, S., Sridharan, K., Abraham, A. R., Janardhanan, H. P., Kalarikkal, N., & Philip, R. (2016). Nonlinear transmittance and optical power limiting in magnesium ferrite nanoparticles: effects of laser pulsewidth and particle size. *RSC Advances*, *6*(108), 106754–106761. <https://doi.org/10.1039/c6ra15788b>

Dhieb, A. C., Valkonen, A., Rzaigui, M., & Smirani, W. (2015). Synthesis, crystal structure, physico-chemical characterization and dielectric properties of a new hybrid material, 1-Ethylpiperazine-1,4-dium tetrachlorocadmate. *Journal of Molecular Structure*, *1102*, 50–56. <https://doi.org/10.1016/j.molstruc.2015.08.044>

Alanen, J., Saukko, E., Lehtoranta, K., Murtonen, T., Timonen, H., Hillamo, R., ... Rönkkö, T. (2015). The formation and physical properties of the particle emissions from a natural gas engine. *Fuel*, *162*, 155–161. <https://doi.org/10.1016/j.fuel.2015.09.003>

Mäki, A. J., Peltokangas, M., Kreutzer, J., Auvinen, S., & Kallio, P. (2015). Modeling carbon dioxide transport in PDMS-based microfluidic cell culture devices. *Chemical Engineering Science*, *137*, 515–524. <https://doi.org/10.1016/j.ces.2015.06.065>

Ihalainen, T. O., Aires, L., Herzog, F. A., Schwartlander, R., Moeller, J., & Vogel, V. (2015). Differential basal-to-apical accessibility of lamin A/C epitopes in the nuclear lamina regulated by changes in cytoskeletal tension. *Nature Materials*, 14 (12), 1252-1261. <https://doi.org/10.1038/nmat4389>

Kaouk, A., Ruoko, T. P., Gönüllü, Y., Kaunisto, K., Mettenböcker, A., Gurevich, E., ... Mathur, S. (2015). Graphene-intercalated Fe<sub>2</sub>O<sub>3</sub>/TiO<sub>2</sub> heterojunctions for efficient photoelectrolysis of water. *RSC Advances*, 5(123), 101401-101407. <https://doi.org/10.1039/c5ra18330h>

Seo, J. Y., Lee, K., Ramasamy, P., Kim, B., Lee, S. Y., Oh, Y. K., & Park, S. B. (2015). Tri-functionality of Fe<sub>3</sub>O<sub>4</sub>-embedded carbon microparticles in microalgae harvesting. *Chemical Engineering Journal*, 280, 206-214. <https://doi.org/10.1016/j.cej.2015.05.122>

Le, H. H., Parsaker, M., Sriharish, M. N., Henning, S., Menzel, M., Wießner, S., ... Radusch, H. J. (2015). Effect of rubber polarity on selective wetting of carbon nanotubes in ternary blends. *Express Polymer Letters*, 9(11), 960-971. <https://doi.org/10.3144/expresspolymlett.2015.87>

Zorzi, G. K., Párraga, J. E., Seijo, B., & Sanchez, A. (2015). Comparison of different cationized proteins as biomaterials for nanoparticle-based ocular gene delivery. *Colloids and Surfaces B: Biointerfaces*, 135, 533-541. <https://doi.org/10.1016/j.colsurfb.2015.08.008>

Vapaavuori, J., Laventure, A., Bazuin, C. G., Lebel, O., & Pellerin, C. (2015). Submolecular Plasticization Induced by Photons in Azobenzene Materials. *Journal of the American Chemical Society*, 137(42), 13510-13517. <https://doi.org/10.1021/jacs.5b06611>

Vapaavuori, J., Heikkinen, I. T. S., Dichiarante, V., Resnati, G., Metrangolo, P., Sabat, R. G., ... Pellerin, C. (2015). Photomechanical Energy Transfer to Photopassive Polymers through Hydrogen and Halogen Bonds. *Macromolecules*, 48 (20), 7535-7542. <https://doi.org/10.1021/acs.macromol.5b01813>

Vapaavuori, J., Grosrenaud, J., Pellerin, C., & Bazuin, C. G. (2015). In Situ Photocontrol of Block Copolymer Morphology during Dip-Coating of Thin Films. *ACS Macro Letters*, 4(10), 1158-1162. <https://doi.org/10.1021/acsmacrolett.5b00483>

Mylläri, V., Fatarella, E., Ruzzante, M., Pogni, R., Baratto, M. C., Skrifvars, M., ... Järvelä, P. (2015). Production of sulfonated polyetheretherketone/polypropylene fibers for photoactive textiles. *Journal of Applied Polymer Science*, 132 (39), [42595]. <https://doi.org/10.1002/app.42595>

Moradi, M., Enkavi, G., & Tajkhorshid, E. (2015). Atomic-level characterization of transport cycle thermodynamics in the glycerol-3-phosphate: Phosphate antiporter. *Nature Communications*, 6, [8393]. <https://doi.org/10.1038/ncomms9393>

Orlowski, A., Kukkurainen, S., Pöyry, A., Rissanen, S., Vattulainen, I., Hytönen, V. P., & Róg, T. (2015). PIP2 and Talin Join Forces to Activate Integrin. *Journal of Physical Chemistry Part B*, 119(38), 12381-12389. <https://doi.org/10.1021/acs.jpcc.5b06457>

Bhagavatheswaran, E. S., Parsekar, M., Das, A., Le, H. H., Wiessner, S., Stöckelhuber, K. W., ... Heinrich, G. (2015). Construction of an Interconnected Nanostructured Carbon Black Network: Development of Highly Stretchable and Robust Elastomeric Conductors. *Journal of Physical Chemistry C*, 119(37), 21723-21731. <https://doi.org/10.1021/acs.jpcc.5b06629>

Milanti, A., Matikainen, V., Koivuluoto, H., Bolelli, G., Lusvarghi, L., & Vuoristo, P. (2015). Effect of spraying parameters on the microstructural and corrosion properties of HVAF-sprayed Fe-Cr-Ni-B-C coatings. *Surface and Coatings Technology*, 277, 81-90. <https://doi.org/10.1016/j.surfcoat.2015.07.018>

Goh, J. Q., & Akola, J. (2015). Superatom Model for Ag-S Nanocluster with Delocalized Electrons. *Journal of Physical Chemistry C*, 119(36), 21165-21172. <https://doi.org/10.1021/acs.jpcc.5b05824>

Ter Schiphorst, J., Coleman, S., Stumpel, J. E., Ben Azouz, A., Diamond, D., & Schenning, A. P. H. J. (2015). Molecular Design of Light-Responsive Hydrogels, for in Situ Generation of Fast and Reversible Valves for Microfluidic Applications. *Chemistry of Materials*, 27(17), 5925-5931. <https://doi.org/10.1021/acs.chemmater.5b01860>

Frankberg, E. J., George, L., Efimov, A., Honkanen, M., Pessi, J., & Levänen, E. (2015). Measuring synthesis yield in graphene oxide synthesis by modified hummers method. *Fullerenes Nanotubes and Carbon Nanostructures*, 23(9), 755-759. <https://doi.org/10.1080/1536383X.2014.993754>

Tukiainen, A., Likonen, J., Toikkanen, L., & Leinonen, T. (2015). Unintentional boron contamination of MBE-grown GaInP/AlGaInP quantum wells. *Journal of Crystal Growth*, 425, 60-63. <https://doi.org/10.1016/j.jcrysgro.2015.02.048>

Bajamundi, C. J. E., Vainikka, P., Hedman, M., Silvennoinen, J., Heinanen, T., Taipale, R., & Konttinen, J. (2015). Searching for a robust strategy for minimizing alkali chlorides in fluidized bed boilers during burning of high SRF-energy-share fuel. *Fuel*, 155, 25-36. <https://doi.org/10.1016/j.fuel.2015.03.087>

Yang, Y., Kylänpää, I., Tubman, N. M., Krogel, J. T., Hammes-Schiffer, S., & Ceperley, D. M. (2015). How large are nonadiabatic effects in atomic and diatomic systems? *Journal of Chemical Physics*, 143(12), [124308]. <https://doi.org/10.1063/1.4931667>

Barreca, D., Carraro, G., Warwick, M. E. A., Kaunisto, K., Gasparotto, A., Gombac, V., ... Fornasiero, P. (2015). Fe<sub>2</sub>O<sub>3</sub>-TiO<sub>2</sub> nanosystems by a hybrid PE-CVD/ALD approach: controllable synthesis, growth mechanism, and photocatalytic properties. *CrystEngComm*, 17(32), 6219-6226. <https://doi.org/10.1039/c5ce00883b>

Mäkelä, J., Tuominen, M., Yasir, M., Polojärvi, V., Aho, A., Tukiainen, A., ... Guina, M. (2015). Effects of thinning and heating for TiO<sub>2</sub>/AlInP junctions. *Journal of Electron Spectroscopy and Related Phenomena*, 205, 6-9. <https://doi.org/10.1016/j.elspec.2015.08.004>

Lepcha, A., Maccato, C., Mettenböcker, A., Andreu, T., Mayrhofer, L., Walter, M., ... Mathur, S. (2015). Electrospun Black Titania Nanofibers: Influence of Hydrogen Plasma-Induced Disorder on the Electronic Structure and Photoelectrochemical Performance. *Journal of Physical Chemistry C*, 119(33), 18835-18842. <https://doi.org/10.1021/acs.jpcc.5b02767>

Levin, M., Rojas, E., Vanhala, E., Vippola, M., Liguori, B., Kling, K. I., ... Jensen, K. A. (2015). Influence of relative humidity and physical load during storage on dustiness of inorganic nanomaterials: implications for testing and risk assessment. *Journal of Nanoparticle Research*, 17(8), [337]. <https://doi.org/10.1007/s11051-015-3139-6>

Kwolek, U., Kulig, W., Wydro, P., Nowakowska, M., Róg, T., & Kepczynski, M. (2015). Effect of Phosphatidic Acid on Biomembrane: Experimental and Molecular Dynamics Simulations Study. *Journal of Physical Chemistry Part B*, 119(31), 10042-10051. <https://doi.org/10.1021/acs.jpcc.5b03604>

Le, H. H., Pham, T., Henning, S., Klehm, J., Wießner, S., Stöckelhuber, K. W., ... Radosch, H. J. (2015). Formation and stability of carbon nanotube network in natural rubber: Effect of non-rubber components. *Polymer*, 73, 111-121. [18004]. <https://doi.org/10.1016/j.polymer.2015.07.044>

Stumpel, J. E. (2015). Responsive Polymer Photonics. *Chemistryopen*, 4(4), 533-535. <https://doi.org/10.1002/open.201500104>

Timr, Š., Brabec, J., Bondar, A., Ryba, T., Železný, M., Lazar, J., & Jungwirth, P. (2015). Nonlinear Optical Properties of Fluorescent Dyes Allow for Accurate Determination of Their Molecular Orientations in Phospholipid Membranes. *Journal of Physical Chemistry Part B*, 119(30), 9706-9716. <https://doi.org/10.1021/acs.jpcc.5b05123>

Rasappa, S., Caridad, J. M., Schulte, L., Cagliani, A., Borah, D., Morris, M. A., ... Ndoni, S. (2015). High quality sub-10 nm graphene nanoribbons by on-chip PS-b-PDMS block copolymer lithography. *RSC Advances*, 5(82), 66711-66717. <https://doi.org/10.1039/c5ra11735f>

- Bodrova, A., Chechkin, A. V., Cherstvy, A. G., & Metzler, R. (2015). Quantifying non-ergodic dynamics of force-free granular gases. *Physical Chemistry Chemical Physics*, 17(34), 21791-21798. <https://doi.org/10.1039/c5cp02824h>
- Virkki, K., Demir, S., Lemmetyinen, H., & Tkachenko, N. V. (2015). Photoinduced Electron Transfer in CdSe/ZnS Quantum Dot-Fullerene Hybrids. *Journal of Physical Chemistry C*, 119(31), 17561-17572. <https://doi.org/10.1021/acs.jpcc.5b04251>
- Rahaman, O., Kalimeri, M., Melchionna, S., Hénin, J., & Sterpone, F. (2015). Role of Internal Water on Protein Thermal Stability: The Case of Homologous G Domains. *Journal of Physical Chemistry Part B*, 119(29), 8939-8949. <https://doi.org/10.1021/jp507571u>
- Çetinkaya, A. Y., Köroğlu, E. O., Demir, N. M., Baysoy, D. Y., Özkaya, B., & Çakmakçı, M. (2015). Electricity production by a microbial fuel cell fueled by brewery wastewater and the factors in its membrane deterioration. *Chinese Journal of Catalysis*, 36(7), 1068-1076. [https://doi.org/10.1016/S1872-2067\(15\)60833-6](https://doi.org/10.1016/S1872-2067(15)60833-6)
- Hakkarainen, T. V., Schramm, A., Mäkelä, J., Laukkanen, P., & Guina, M. (2015). Lithography-free oxide patterns as templates for self-catalyzed growth of highly uniform GaAs nanowires on Si(111). *Nanotechnology*, 26(27), [275301]. <https://doi.org/10.1088/0957-4484/26/27/275301>
- Isoniemi, T., Tuukkanen, S., Cameron, D. C., Simonen, J., & Toppari, J. J. (2015). Measuring optical anisotropy in poly(3,4-ethylene dioxythiophene): poly(styrene sulfonate) films with added graphene. *Organic Electronics*, 25, 317-323. <https://doi.org/10.1016/j.orgel.2015.06.037>, <https://doi.org/10.1016/j.orgel.2015.06.037>
- Ahmed, Z., George, L., Hiltunen, A., Lemmetyinen, H., Hukka, T., & Efimov, A. (2015). Synthesis and study of electrochemical and optical properties of substituted perylenemonoimides in solutions and on solid surfaces. *Journal of Materials Chemistry A*, 3(25), 13332-13339. <https://doi.org/10.1039/c5ta02241j>
- Sanginés, R., Contreras, V., Sobral, H., & Robledo-Martinez, A. (2015). Optimal emission enhancement in orthogonal double-pulse laser-induced breakdown spectroscopy. *Spectrochimica Acta Part B: Atomic Spectroscopy*, 110, 139-145. [4935]. <https://doi.org/10.1016/j.sab.2015.06.012>
- Mylläri, V., Ruoko, T-P., & Syrjäälä, S. (2015). A comparison of rheology and FTIR in the study of polypropylene and polystyrene photodegradation. *Journal of Applied Polymer Science*, 132(28), [42246]. <https://doi.org/10.1002/app.42246>
- Zorzi, G. K., Párraga, J. E., Seijo, B., & Sánchez, A. (2015). On the biomaterials for nanostructured ocular therapeutics. *Current Organic Chemistry*, 19(15), 1443-1459.
- Abou-Chahine, F., Fujii, D., Imahori, H., Nakano, H., Tkachenko, N. V., Matano, Y., & Lemmetyinen, H. (2015). Synthesis and Photophysical Properties of Two Diazaporphyrin-Porphyrin Hetero Dimers in Polar and Nonpolar Solutions. *Journal of Physical Chemistry Part B*, 119(24), 7328-7337. <https://doi.org/10.1021/jp510903a>
- Perander, M., DeMartini, N., Brink, A., Kramb, J., Karlström, O., Hemming, J., ... Hupa, M. (2015). Catalytic effect of Ca and K on CO<sub>2</sub> gasification of spruce wood char. *Fuel*, 150, 464-472. <https://doi.org/10.1016/j.fuel.2015.02.062>
- De Carvalho, S. J., Metzler, R., & Cherstvy, A. G. (2015). Inverted critical adsorption of polyelectrolytes in confinement. *Soft Matter*, 11(22), 4430-4443. <https://doi.org/10.1039/c5sm00635j>
- Dzieciuch, M., Rissanen, S., Szydłowska, N., Bunker, A., Kumorek, M., Jamróz, D., ... Kepczynski, M. (2015). PEGylated liposomes as carriers of hydrophobic porphyrins. *Journal of Physical Chemistry Part B*, 119(22), 6646-6657. <https://doi.org/10.1021/acs.jpcc.5b01351>
- Manea, L. R., Cramariuc, B., Popescu, V., Cramariuc, R., Sandu, I., & Cramariuc, O. (2015). Equipment for obtaining polymeric nanofibres by electrospinning technology: II. The obtaining of polymeric nanofibers. *Materiale Plastice*, 52(2), 180-185.

He, X., Benniston, A. C., Saarenpää, H., Lemmetyinen, H., Tkachenko, N. V., & Baisch, U. (2015). Polymorph crystal packing effects on charge transfer emission in the solid state. *Chemical Science*, 6(6), 3525-3532. <https://doi.org/10.1039/c5sc01151e>

Mordon, S., & Bourg-Heckly, G. (2015). Photodiagnostic et chirurgie guidés par la fluorescence. *ACTUALITE CHIMIQUE*, (397-398), 41-45.

Borah, D., Rasappa, S., Salaun, M., Zellsman, M., Lorret, O., Liontos, G., ... Morris, M. A. (2015). Soft graphoepitaxy for large area directed self-assembly of polystyrene-block-poly(dimethylsiloxane) block copolymer on nanopatterned poss substrates fabricated by nanoimprint lithography. *Advanced Functional Materials*, 25(22), 3425-3432. <https://doi.org/10.1002/adfm.201500100>

Frochot, C., Barberi-Heyob, M., Blanchard-Desce, M., Bolotine, L., Bonneau, S., Jimenez, C. M., ... Vicendo, P. (2015). La thérapie photodynamique: État de l'art et perspectives. *ACTUALITE CHIMIQUE*, (397-398), 46-50.

McManamon, C., O'Connell, J., Delaney, P., Rasappa, S., Holmes, J. D., & Morris, M. A. (2015). A facile route to synthesis of S-doped TiO<sub>2</sub> nanoparticles for photocatalytic activity. *Journal of Molecular Catalysis A: Chemical*, 406, 51-57. <https://doi.org/10.1016/j.molcata.2015.05.002>

Hladílková, J., Fischer, H. E., Jungwirth, P., & Mason, P. E. (2015). Hydration of hydroxyl and amino groups examined by molecular dynamics and neutron scattering. *Journal of Physical Chemistry Part B*, 119(21), 6357-6365. <https://doi.org/10.1021/jp510528u>

Kuz'min, V. A., Durandin, N. A., Lisitsyna, E. S., Nekipelova, T. D., Podrugina, T. A., Matveeva, E. D., ... Zefirov, N. S. (2015). Spectral and kinetic characteristics of indotricarbocyanine complexation with albumin. *DOKLADY PHYSICAL CHEMISTRY*, 462(1), 107-109. <https://doi.org/10.1134/S0012501615050036>

Song, X., Liu, Z., Suhonen, T., Varis, T., Huang, L., Zheng, X., & Zeng, Y. (2015). Effect of melting state on the thermal shock resistance and thermal conductivity of APS ZrO<sub>2</sub>-7.5wt.% Y<sub>2</sub>O<sub>3</sub> coatings. *Surface and Coatings Technology*, 270, 132-138. <https://doi.org/10.1016/j.surfcoat.2015.03.011>

Pluhařová, E., Slavíček, P., & Jungwirth, P. (2015). Modeling photoionization of aqueous DNA and its components. *Accounts of Chemical Research*, 48(5), 1209-1217. <https://doi.org/10.1021/ar500366z>

Liang, Y., Ma, L., Wang, J., & Wang, G. (2015). Multistep reactions of water with small Pd<sub>n</sub> clusters: A first principles study. *Journal of Theoretical and Computational Chemistry*, 14(3), [1550017]. <https://doi.org/10.1142/S0219633615500170>

Kuzmin, V. A., Durandin, N. A., Lisitsyna, E. S., Litvinkova, L. V., Nekipelova, T. D., Podrugina, T. A., ... Zefirov, N. S. (2015). Energy degradation in photoexcited complexes of indocarbocyanine with albumin. *HIGH ENERGY CHEMISTRY*, 49(3), 211-212. <https://doi.org/10.1134/S0018143915030108>

Cherstvy, A. G., & Metzler, R. (2015). Ergodicity breaking and particle spreading in noisy heterogeneous diffusion processes. *Journal of Chemical Physics*, 142(14), [144105]. <https://doi.org/10.1063/1.4917077>

Koivisto, A. J., Aromaa, M., Koponen, I. K., Fransman, W., Jensen, K. A., Mäkelä, J. M., & Hämeri, K. J. (2015). Workplace performance of a loose-fitting powered air purifying respirator during nanoparticle synthesis. *Journal of Nanoparticle Research*, 17(4). <https://doi.org/10.1007/s11051-015-2990-9>

Sorvajärvi, T., Viljanen, J., Toivonen, J., Marshall, P., & Glarborg, P. (2015). Rate constant and thermochemistry for K + O<sub>2</sub> + N<sub>2</sub> = KO<sub>2</sub> + N<sub>2</sub>. *Journal of Physical Chemistry A*, 119(14), 3329-3336. <https://doi.org/10.1021/acs.jpca.5b00755>



- Karilainen, T., Timr, Š., Vattulainen, I., & Jungwirth, P. (2015). Oxidation of cholesterol does not alter significantly its uptake into high-density lipoprotein particles. *Journal of Physical Chemistry Part B*, 119(13), 4594-4600. <https://doi.org/10.1021/acs.jpcc.5b00240>
- Saarikoski, E., Rissanen, M., & Seppälä, J. (2015). Effect of rheological properties of dissolved cellulose/microfibrillated cellulose blend suspensions on film forming. *Carbohydrate Polymers*, 119, 62-70. <https://doi.org/10.1016/j.carbpol.2014.11.033>
- Pirjola, L., Karjalainen, P., Heikkilä, J., Saari, S., Tzamkiozis, T., Ntziachristos, L., ... Rönkkö, T. (2015). Effects of fresh lubricant oils on particle emissions emitted by a modern gasoline direct injection passenger car. *Environmental Science and Technology*, 49(6), 3644-3652. <https://doi.org/10.1021/es505109u>
- Bollelli, G., Berger, L. M., Börner, T., Koivuluoto, H., Lusvarghi, L., Lyphout, C., ... Vuoristo, P. (2015). Tribology of HVOF- and HVOF-sprayed WC-10Co4Cr hardmetal coatings: A comparative assessment. *Surface and Coatings Technology*, 265, 125-144. <https://doi.org/10.1016/j.surfcoat.2015.01.048>
- Varis, T., Bankiewicz, D., Yrjas, P., Oksa, M., Suhonen, T., Tuurna, S., ... Holmström, S. (2015). High temperature corrosion of thermally sprayed NiCr and FeCr coatings covered with a KCl-K<sub>2</sub>SO<sub>4</sub> salt mixture. *Surface and Coatings Technology*, 265, 235-243. <https://doi.org/10.1016/j.surfcoat.2014.11.012>
- Tuominen, M., Yasir, M., Lång, J., Dahl, J., Kuzmin, M., Mäkelä, J., ... Guina, M. (2015). Oxidation of the GaAs semiconductor at the Al<sub>2</sub>O<sub>3</sub>/GaAs junction. *Physical Chemistry Chemical Physics*, 17(10), 7060-7066. <https://doi.org/10.1039/c4cp05972g>
- Ma, L., Melander, M., Laasonen, K., & Akola, J. (2015). CO oxidation catalyzed by neutral and anionic Cu<sub>2</sub>O clusters: Relationship between charge and activity. *Physical Chemistry Chemical Physics*, 17(10), 7067-7076. <https://doi.org/10.1039/c5cp00365b>
- Figueira, J., Czardybon, W., Mesquita, J. C., Rodrigues, J., Lahoz, F., Russo, L., ... Rissanen, K. (2015). Synthesis, characterization and solid-state photoluminescence studies of six alkoxy phenylene ethynylene dinuclear palladium(II) rods. *DALTON TRANSACTIONS*, 44(9), 4003-4015. <https://doi.org/10.1039/c4dt00493k>
- Lolicato, F., Raudino, A., Milardi, D., & La Rosa, C. (2015). Resveratrol interferes with the aggregation of membrane-bound human-IAPP: A molecular dynamics study. *European Journal of Medicinal Chemistry*, 92, 876-881. <https://doi.org/10.1016/j.ejmech.2015.01.047>
- Wecharine, I., Valkonen, A., Rzaigui, M., Sta, W. S., & Smith, G. (2015). Crystal structure of 2-methylpiperazine-1,4-dium bis(hydrogen maleate). *Acta Crystallographica Section E: Structure Reports Online*, 71(3), o193-o194. <https://doi.org/10.1107/S2056989015003102>
- Eshwaran, S. B., Basu, D., Vaikuntam, S. R., Kutlu, B., Wiessner, S., Das, A., ... Heinrich, G. (2015). Exploring the role of stearic acid in modified zinc aluminum layered double hydroxides and their acrylonitrile butadiene rubber nanocomposites. *Journal of Applied Polymer Science*, 132(9), [41539]. <https://doi.org/10.1002/app.41539>
- Shin, J., Cherstvy, A. G., & Metzler, R. (2015). Polymer looping is controlled by macromolecular crowding, spatial confinement, and chain stiffness. *ACS Macro Letters*, 4(2), 202-206. <https://doi.org/10.1021/lm500709w>
- Ray, S., Steven, R. T., Green, F. M., Höök, F., Taskinen, B., Hytönen, V. P., & Shard, A. G. (2015). Neutralized chimeric avidin binding at a reference biosensor surface. *Langmuir*, 31(6), 1921-1930. <https://doi.org/10.1021/la503213f>
- Beyeh, N. K., Pan, F., Valkonen, A., & Rissanen, K. (2015). Encapsulation of secondary and tertiary ammonium salts by resorcinarenes and pyrogallarenes: The effect of size and charge concentration. *CrystEngComm*, 17(5), 1182-1188. <https://doi.org/10.1039/c4ce01927j>

- Bautista, G., Mäkitalo, J., Chen, Y., Dhaka, V., Grasso, M., Karvonen, L., ... Kauranen, M. (2015). Second-harmonic generation imaging of semiconductor nanowires with focused vector beams. *Nano Letters*, *15*(3), 1564-1569. <https://doi.org/10.1021/nl503984b>
- Fatarella, E., Mylläri, V., Ruzzante, M., Pogni, R., Baratto, M. C., Skrifvars, M., ... Järvelä, P. (2015). Sulfonated polyetheretherketone/polypropylene polymer blends for the production of photoactive materials. *Journal of Applied Polymer Science*, *132*(8), [41509]. <https://doi.org/10.1002/app.41509>
- Saccone, M., Dichiarante, V., Forni, A., Goulet-Hanssens, A., Cavallo, G., Vapaavuori, J., ... Priimägi, A. (2015). Supramolecular hierarchy among halogen and hydrogen bond donors in light-induced surface patterning. *Journal of Materials Chemistry C*, *3*, 759-768. <https://doi.org/10.1039/c4tc02315c>
- Goh, J-Q., Malola, S., Häkkinen, H., & Akola, J. (2015). Silver sulfide nanoclusters and the superatom model. *Journal of Physical Chemistry C*, *119*(3), 1583-1590. <https://doi.org/10.1021/jp511037x>
- Shin, J., Cherstvy, A. G., & Metzler, R. (2015). Kinetics of polymer looping with macromolecular crowding: Effects of volume fraction and crowder size. *Soft Matter*, *11*(3), 472-488. <https://doi.org/10.1039/c4sm02007c>
- Ghosh, S. K., Cherstvy, A. G., & Metzler, R. (2015). Non-universal tracer diffusion in crowded media of non-inert obstacles. *Physical Chemistry Chemical Physics*, *17*(3), 1847-1858. <https://doi.org/10.1039/c4cp03599b>
- Li, Z., Le, T., Wu, Z., Yao, Y., Li, L., Tentzeris, M., ... Wong, C. P. (2015). Rational design of a printable, highly conductive silicone-based electrically conductive adhesive for stretchable radio-frequency antennas. *Advanced Functional Materials*, *25*(3), 464-470. <https://doi.org/10.1002/adfm.201403275>
- Czaplicki, R., Mäkitalo, J., Siikanen, R., Husu, H., Lehtolahti, J., Kuittinen, M., & Kauranen, M. (2015). Second-Harmonic Generation from Metal Nanoparticles: Resonance Enhancement versus Particle Geometry. *Nano Letters*, *15*(1), 530-534. <https://doi.org/10.1021/nl503901e>
- Schroeder, C. A., Pluharová, E., Seidel, R., Schroeder, W. P., Faubel, M., Slaviček, P., ... Bradforth, S. E. (2015). Oxidation half-reaction of aqueous nucleosides and nucleotides via photoelectron spectroscopy augmented by ab initio calculations. *Journal of the American Chemical Society*, *137*(1), 201-209. <https://doi.org/10.1021/ja508149e>
- Khan, M., Yang, J., Shi, C., Feng, Y., Zhang, W., Gibney, K., & Tew, G. N. (2015). Manipulation of polycarbonate urethane bulk properties via incorporated zwitterionic polynorbornene for tissue engineering application. *RSC Advances*, *5*(15), 11284-11292. <https://doi.org/10.1039/C4RA14608E>
- Reeta, P. S., Khetubol, A., Jella, T., Chukharev, V., Abou-Chahine, F., Tkachenko, N. V., ... Lemmetyinen, H. (2015). Photophysical properties of Sn (IV)tetraphenylporphyrin-pyrene dyad with a  $\beta$ -vinyl linker. *Journal of Porphyrins and Phthalocyanines*, *19*(1-3), 288-300. <https://doi.org/10.1142/S1088424615500108>
- Yi, H., Albrecht, M., Valkonen, A., & Rissanen, K. (2015). Perfluoro-1,1'-biphenyl and perfluoronaphthalene and their derivatives as  $\pi$ -acceptors for anions. *New Journal of Chemistry*, *39*(1), 746-749. <https://doi.org/10.1039/c4nj01654h>
- Mettänen, M., & Hirn, U. (2015). A comparison of five optical surface topography measurement methods. *TAPPI Journal*, *14*(1), 27-38.
- Hukka, J. J., & Katko, T. S. (2015). Appropriate pricing policy needed worldwide for improving water services infrastructure. *Journal American Water Works Association*, *107*(1), E37-E46. <https://doi.org/10.5942/jawwa.2015.107.0007>
- Nazir, R., Bourquard, F., Balčiūnas, E., Smoleń, S., Gray, D., Tkachenko, N. V., ... Gryko, D. T. (2015).  $\pi$ -Expanded  $\alpha,\beta$ -unsaturated ketones: Synthesis, optical properties, and two-photon-induced polymerization. *ChemPhysChem*, *16*(3), 682-690. <https://doi.org/10.1002/cphc.201402646>

Pelado, B., Abou-Chahine, F., Calbo, J., Caballero, R., delaCruz, P., Junquera-Hernández, J. M., ... Langa, F. (2015). Role of the bridge in photoinduced electron transfer in porphyrin-fullerene dyads. *Chemistry: A European Journal*, *21*(15), 5814-5825. <https://doi.org/10.1002/chem.201406514>

Molnar, W., Nugent, S., Lindroos, M., Apostol, M., & Varga, M. (2015). Ballistic and numerical simulation of impacting goods on conveyor belt rubber. *Polymer Testing*, *42*, 1-7. <https://doi.org/10.1016/j.polymertesting.2014.12.001>

Stasyuk, A. J., Smoleń, S., Glodkowska-Mrowka, E., Brutkowski, W., Cyrański, M. K., Tkachenko, N., & Gryko, D. T. (2015). Synthesis of fluorescent naphthoquinolizines via intramolecular houben-hoesch reaction. *Chemistry - An Asian Journal*, *10*(3), 553-558. <https://doi.org/10.1002/asia.201403339>

Wacharine, I., Valkonen, A., Rzaigui, M., & Smirani, W. (2015). Synthesis, crystal structure, spectral, dielectric characteristics and conduction mechanism of two novel carboxylates of 1-benzhydrylpiperazine. *Monatshefte fur Chemie*, *146*(12), 2007-2020. <https://doi.org/10.1007/s00706-015-1553-1>

Di Capua, F., Papirio, S., Lens, P. N. L., & Esposito, G. (2015). Chemolithotrophic denitrification in biofilm reactors. *Chemical Engineering Journal*, *280*, 643-657. <https://doi.org/10.1016/j.cej.2015.05.131>

Karilainen, T., Cramariuc, O., Kuisma, M., Tappura, K., & Hukka, T. I. (2015). Van der Waals interactions are critical in Car-Parrinello molecular dynamics simulations of porphyrin-fullerene dyads. *Journal of Computational Chemistry*, *36*(9), 612-621. <https://doi.org/10.1002/jcc.23834>

Kamppuri, T., Vehviläinen, M., Puolakka, A., Honkanen, M., Vippola, M., & Rissanen, M. (2015). Characterisation of novel regenerated cellulosic, viscose, and cotton fibres and the dyeing properties of fabrics. *Coloration Technology*, *131*(5), 396-402. <https://doi.org/10.1111/cote.12163>

Mardoukhi, Y., Jeon, J-H., & Metzler, R. (2015). Geometry controlled anomalous diffusion in random fractal geometries: Looking beyond the infinite cluster. *Physical Chemistry Chemical Physics*, *17*(44), 30134-30147. <https://doi.org/10.1039/c5cp03548a>

Stumpel, J. E., Gil, E. R., Spoelstra, A. B., Bastiaansen, C. W. M., Broer, D. J., & Schenning, A. P. H. J. (2015). Stimuli-Responsive Materials Based on Interpenetrating Polymer Liquid Crystal Hydrogels. *Advanced Functional Materials*, *25* (22), 3314-3320. <https://doi.org/10.1002/adfm.201500745>

Stumpel, J. E., Broer, D. J., & Schenning, A. P. H. J. (2015). Water-responsive dual-coloured photonic polymer coatings based on cholesteric liquid crystals. *RSC Advances*, *5*(115), 94650-94653. <https://doi.org/10.1039/c5ra18017a>

Mason, P. E., Uhlig, F., Vaněk, V., Buttersack, T., Bauerecker, S., & Jungwirth, P. (2015). Coulomb explosion during the early stages of the reaction of alkali metals with water. *Nature Chemistry*, *7*(3), 250-254. <https://doi.org/10.1038/nchem.2161>

Borah, D., Rasappa, S., Senthamaraiannan, R., Holmes, J. D., & Morris, M. A. (2015). Block co-polymers for nanolithography: Rapid microwave annealing for pattern formation on substrates. *Polymers*, *7*(4), 592-609. <https://doi.org/10.3390/polym7040592>

Taskinen, B., Zauner, D., Lehtonen, S. I., Koskinen, M., Thomson, C., Kähkönen, N., ... Hytönen, V. P. (2014). Switchavidin: Reversible biotin-avidin-biotin bridges with high affinity and specificity. *Bioconjugate Chemistry*, *25*(12), 2233-2243. <https://doi.org/10.1021/bc500462w>

Palivec, V., Pluharová, E., Unger, I., Winter, B., & Jungwirth, P. (2014). DNA lesion can facilitate base ionization: Vertical ionization energies of aqueous 8-oxoguanine and its nucleoside and nucleotide. *Journal of Physical Chemistry Part B*, *118* (48), 13833-13837. <https://doi.org/10.1021/jp5111086>

- Lemmettyinen, H., Tkachenko, N. V., Valeur, B., Hotta, J. I., Ameloot, M., Ernsting, N. P., ... Boens, N. (2014). Time-resolved fluorescence methods (IUPAC technical report). *Pure and Applied Chemistry*, *86*(12), 1969-1998. <https://doi.org/10.1515/pac-2013-0912>
- Tawade, B. V., Salunke, J. K., Sane, P. S., & Wadgaonkar, P. P. (2014). Processable aromatic polyesters based on bisphenol derived from cashew nut shell liquid: synthesis and characterization. *JOURNAL OF POLYMER RESEARCH*, *21*(12). <https://doi.org/10.1007/s10965-014-0617-y>
- Mohanty, A. K., Ghosh, A., Sawai, P., Pareek, K., Banerjee, S., Das, A., ... Voit, B. (2014). Electromagnetic interference shielding effectiveness of MWCNT filled poly(ether sulfone) and poly(ether imide) nanocomposites. *Polymer Engineering and Science*, *54*(11), 2560-2570. <https://doi.org/10.1002/pen.23804>
- Wang, X., Vapaavuori, J., Zhao, Y., & Bazuin, C. G. (2014). A supramolecular approach to photoresponsive thermo/solvoplastic block copolymer elastomers. *Macromolecules*, *47*(20), 7099-7108. <https://doi.org/10.1021/ma501278b>
- Amanatidis, S., Ntziachristos, L., Giechaskiel, B., Bergmann, A., & Samaras, Z. (2014). Impact of selective catalytic reduction on exhaust particle formation over excess ammonia events. *Environmental Science and Technology*, *48*(19), 11527-11534. <https://doi.org/10.1021/es502895v>
- Deng, Y., Alicea-Velázquez, N. L., Bannwarth, L., Lehtonen, S. I., Boggon, T. J., Cheng, H. C., ... Turk, B. E. (2014). Global analysis of human nonreceptor tyrosine kinase specificity using high-density peptide microarrays. *Journal of Proteome Research*, *13*(10), 4339-4346. <https://doi.org/10.1021/pr500503q>
- Rasappa, S., Schulte, L., Borah, D., Morris, M. A., & Ndoni, S. (2014). Rapid, Brushless Self-assembly of a PS-b-PDMS Block Copolymer for Nanolithography. *Colloids and Interface Science Communications*, *2*, 1-5. <https://doi.org/10.1016/j.colcom.2014.07.001>
- Goulet-Hanssens, A., Corkery, T. C., Priimagi, A., & Barrett, C. J. (2014). Effect of head group size on the photoswitching applications of azobenzene Disperse Red 1 analogues. *Journal of Materials Chemistry C*, *2*(36), 7505-7512. <https://doi.org/10.1039/c4tc00996g>
- Salunke, J. K., Sonar, P., Wong, F. L., Roy, V. A. L., Lee, C. S., & Wadgaonkar, P. P. (2014). Pyrene based conjugated materials: Synthesis, characterization and electroluminescent properties. *Physical Chemistry Chemical Physics*, *16*(42), 23320-23328. <https://doi.org/10.1039/c4cp03693j>
- Wang, J., Ma, L., Liang, Y., Gao, M., & Wang, G. (2014). Density functional theory study of transition metals doped B<sub>80</sub> fullerene. *Journal of Theoretical and Computational Chemistry*, *13*(6), [1450050]. <https://doi.org/10.1142/S0219633614500503>
- Priimagi, A., Barrett, C. J., & Shishido, A. (2014). Recent twists in photoactuation and photoalignment control. *Journal of Materials Chemistry C*, *2*(35), 7155-7162. <https://doi.org/10.1039/c4tc01236d>
- Uhlig, F., Herbert, J. M., Coons, M. P., & Jungwirth, P. (2014). Optical spectroscopy of the bulk and interfacial hydrated electron from ab initio calculations. *Journal of Physical Chemistry A*, *118*(35), 7507-7515. <https://doi.org/10.1021/jp5004243>
- Le, H. H., Abhijeet, S., Ilisch, S., Klehm, J., Henning, S., Beiner, M., ... Radosch, H. J. (2014). The role of linked phospholipids in the rubber-filler interaction in carbon nanotube (CNT) filled natural rubber (NR) composites. *Polymer*, *55*(18), 4738-4747. <https://doi.org/10.1016/j.polymer.2014.07.043>
- Kapgate, B. P., Das, C., Basu, D., Das, A., Heinrich, G., & Reuter, U. (2014). Effect of silane integrated sol-gel derived in situ silica on the properties of nitrile rubber. *Journal of Applied Polymer Science*, *131*(15), [40531]. <https://doi.org/10.1002/app.40531>

Kurppa, K., Hytönen, V. P., Nakari-Setälä, T., Kulomaa, M. S., & Linder, M. B. (2014). Molecular engineering of avidin and hydrophobin for functional self-assembling interfaces. *Colloids and Surfaces B: Biointerfaces*, *120*, 102-109. <https://doi.org/10.1016/j.colsurfb.2014.05.010>

Oksa, M., Varis, T., & Ruusuvoori, K. (2014). Performance testing of iron based thermally sprayed HVOF coatings in a biomass-fired fluidised bed boiler. *Surface and Coatings Technology*, *251*, 191-200. <https://doi.org/10.1016/j.surfcoat.2014.04.025>

Kohagen, M., Mason, P. E., & Jungwirth, P. (2014). Accurate description of calcium solvation in concentrated aqueous solutions. *Journal of Physical Chemistry Part B*, *118*(28), 7902-7909. <https://doi.org/10.1021/jp5005693>

Werner, J., Wernersson, E., Ekholm, V., Ottosson, N., Öhrwall, G., Heyda, J., ... Björneholm, O. (2014). Surface behavior of hydrated guanidinium and ammonium ions: A comparative study by photoelectron spectroscopy and molecular dynamics. *Journal of Physical Chemistry Part B*, *118*(25), 7119-7127. <https://doi.org/10.1021/jp500867w>

Mahmood, N., Khan, A. U., Stöckelhuber, K. W., Das, A., Jehnichen, D., & Heinrich, G. (2014). Carbon nanotubes-filled thermoplastic polyurethane-urea and carboxylated acrylonitrile butadiene rubber blend nanocomposites. *Journal of Applied Polymer Science*, *131*(11). <https://doi.org/10.1002/app.40341>

Pluhařová, E., Fischer, H. E., Mason, P. E., & Jungwirth, P. (2014). Hydration of the chloride ion in concentrated aqueous solutions using neutron scattering and molecular dynamics. *Molecular Physics*, *112*(9-10), 1230-1240. <https://doi.org/10.1080/00268976.2013.875231>

Raghuwanshi, S., Deswal, D., Karp, M., & Kuhad, R. C. (2014). Bioprocessing of enhanced cellulase production from a mutant of *Trichoderma asperellum* RCK2011 and its application in hydrolysis of cellulose. *Fuel*, *124*, 183-189. <https://doi.org/10.1016/j.fuel.2014.01.107>

Koskela, J. E., Liljeström, V., Lim, J., Simanek, E. E., Ras, R. H. A., Priimagi, A., & Kostianen, M. A. (2014). Light-fuelled transport of large dendrimers and proteins. *Journal of the American Chemical Society*, *136*(19), 6850-6853. <https://doi.org/10.1021/ja502623m>

Kuzmin, M. G., Soboleva, I. V., Durandin, N. A., Lisitsyna, E. S., & Kuzmin, V. A. (2014). Microphase mechanism of "superquenching" of luminescent probes in aqueous solutions of DNA and some other polyelectrolytes. *Journal of Physical Chemistry Part B*, *118*(15), 4245-4252. <https://doi.org/10.1021/jp500713q>

Hytönen, V. P., & Wehrle-Haller, B. (2014). Protein conformation as a regulator of cell-matrix adhesion. *Physical Chemistry Chemical Physics*, *16*(14), 6342-6357. <https://doi.org/10.1039/c3cp54884h>

Kulig, W., & Agmon, N. (2014). Deciphering the infrared spectrum of the protonated water pentamer and the hybrid Eigen-Zundel cation. *Physical Chemistry Chemical Physics*, *16*(10), 4933-4941. <https://doi.org/10.1039/c3cp54029d>

Khan, M. N., & Zharnikov, M. (2014). Fabrication of ssDNA/oligo(ethylene glycol) monolayers by promoted exchange reaction with thiol and disulfide substituents. *Journal of Physical Chemistry C*, *118*(6), 3093-3101. <https://doi.org/10.1021/jp411353f>

Priimagi, A., & Shevchenko, A. (2014). Azopolymer-based micro- and nanopatterning for photonic applications. *Journal of Polymer Science. Part B, Polymer Physics*, *52*(3), 163-182. <https://doi.org/10.1002/polb.23390>

Kulig, W., & Agmon, N. (2014). Both zundel and eigen isomers contribute to the IR spectrum of the gas-phase H<sub>9</sub>O<sub>4</sub> + cluster. *Journal of Physical Chemistry Part B*, *118*(1), 278-286. <https://doi.org/10.1021/jp410446d>

Oksala, N. K. J., Ekmekçi, F. G., Özsoy, E., Kirankaya, Ş., Kokkola, T., Emecen, G., ... Atalay, M. (2014). Natural thermal adaptation increases heat shock protein levels and decreases oxidative stress. *REDOX BIOLOGY*, 3, 25-28. <https://doi.org/10.1016/j.redox.2014.10.003>

Enkavi, G., Li, J., Wen, P., Thangapandian, S., Moradi, M., Jiang, T., ... Tajkhorshid, E. (2014). A microscopic view of the mechanisms of active transport across the cellular membrane. *Annual Reports in Computational Chemistry*, 10, 77-125. <https://doi.org/10.1016/B978-0-444-63378-1.00004-5>

Savolainen, J., Uhlig, F., Ahmed, S., Hamm, P., & Jungwirth, P. (2014). Direct observation of the collapse of the delocalized excess electron in water. *Nature Chemistry*, 6(8), 697-701. <https://doi.org/10.1038/nchem.1995>

Wang, J., & Ray, A. K. (2014). A full-potential linearized augmented plane wave study of the interaction of CO<sub>2</sub> with  $\alpha$ -Pu (020) surface nanolayers. *Journal of Computational and Theoretical Nanoscience*, 11(7), 1710-1717. <https://doi.org/10.1166/jctn.2014.3555>

Jungwirth, P. (2014). Molekuly a ionty v pohybu: Počítačové simulace biochemických a biofyzikálních procesů. *Chemické Listy*, 108(4), 278-284.

Airiskallio, E., Nurmi, E., Väyrynen, I. J., Kokko, K., Ropo, M., Punkkinen, M. P. J., ... Vitos, L. (2014). Magnetic origin of the chemical balance in alloyed Fe-Cr stainless steels: First-principles and Ising model study. *Computational Materials Science*, 92, 135-140. <https://doi.org/10.1016/j.commatsci.2014.05.036>

Le, H. H., Parsekar, M., Ilisch, S., Henning, S., Das, A., Stöckelhuber, K. W., ... Radosch, H. J. (2014). Effect of non-rubber components of NR on the carbon nanotube (CNT) localization in SBR/NR blends. *Macromolecular Materials and Engineering*, 299(5), 569-582. <https://doi.org/10.1002/mame.201300254>

Akimova, A. V., Grin, M. A., Golovina, G. V., Kokrashvili, T. A., Vinogradov, A. M., Mironov, A. F., ... Durandin, N. A. (2014). Novel derivatives of bacteriochlorophyll a: Complex formation with albumin and the mechanism of tumor cell photodamage. *DOKLADY BIOCHEMISTRY AND BIOPHYSICS*, 454(1), 17-20. <https://doi.org/10.1134/S1607672914010062>

Rasappa, S., Borah, D., Senthamaraikannan, R., Faulkner, C. C., Holmes, J. D., & Morris, M. A. (2014). Fabrication of 3-D nanodimensioned electric double layer capacitor structures using block copolymer templates. *Journal Nanoscience and Nanotechnology*, 14(7), 5221-5227. <https://doi.org/10.1166/jnn.2014.8668>

Mokarian-Tabari, P., Cummins, C., Rasappa, S., Simao, C., Torres, C. M. S., Holmes, J. D., & Morris, M. A. (2014). Study of the kinetics and mechanism of rapid self-assembly in block copolymer thin films during solvo-microwave annealing. *Langmuir*, 30(35), 10728-10739. <https://doi.org/10.1021/la503137q>

Näreoja, T., Ebner, A., Gruber, H. J., Taskinen, B., Kienberger, F., Hänninen, P. E., ... Härmä, H. (2014). Kinetics of bioconjugate nanoparticle label binding in a sandwich-type immunoassay. *Analytical and Bioanalytical Chemistry*, 406(2), 493-503. <https://doi.org/10.1007/s00216-013-7474-0>

Cummins, C., Borah, D., Rasappa, S., Chaudhari, A., Ghoshal, T., O'Driscoll, B. M. D., ... Morris, M. A. (2013). Self-assembly of polystyrene-block-poly(4-vinylpyridine) block copolymer on molecularly functionalized silicon substrates: Fabrication of inorganic nanostructured etchmask for lithographic use. *Journal of Materials Chemistry C*, 1(47), 7941-7951. <https://doi.org/10.1039/c3tc31498g>

Häkkinen, M. R., Roine, A., Auriola, S., Tuokko, A., Veskimäe, E., Keinänen, T. A., ... Vepsäläinen, J. (2013). Analysis of free, mono- and diacetylated polyamines from human urine by LC-MS/MS. *JOURNAL OF CHROMATOGRAPHY B: ANALYTICAL TECHNOLOGIES IN THE BIOMEDICAL AND LIFE SCIENCES*, 941, 81-89. <https://doi.org/10.1016/j.jchromb.2013.10.009>

Le, H. H., Oßwald, K., Wießner, S., Das, A., Stöckelhuber, K. W., Boldt, R., ... Radosch, H. J. (2013). Location of dispersing agent in rubber nanocomposites during mixing process. *Polymer*, 54(26), 7009-7021. <https://doi.org/10.1016/j.polymer.2013.10.038>

German, S. J., Behbahani, M., Miettinen, S., Grijpma, D. W., & Haimi, S. P. (2013). Proliferation and differentiation of adipose stem cells towards smooth muscle cells on poly(trimethylene carbonate) membranes. *Macromolecular symposia*, 334(1), 133-142. <https://doi.org/10.1002/masy.201300100>

Diban, N., Haimi, S. P., Bolhuis-Versteeg, L., Teixeira, S., Miettinen, S., Poot, A. A., ... Stamatialis, D. (2013). Effect of surface morphology of poly( $\epsilon$ -caprolactone) scaffolds on adipose stem cell adhesion and proliferation. *Macromolecular symposia*, 334(1), 126-132. <https://doi.org/10.1002/masy.201300106>

Gebraad, A. W. H., Miettinen, S., Grijpma, D. W., & Haimi, S. P. (2013). Human adipose stem cells in chondrogenic differentiation medium without growth factors differentiate towards annulus fibrosus phenotype in vitro. *Macromolecular symposia*, 334(1), 49-56. <https://doi.org/10.1002/masy.201300104>

Khan, M. N., & Zharnikov, M. (2013). Fabrication of ssDNA/Oligo(ethylene glycol) monolayers and patterns by exchange reaction promoted by ultraviolet light irradiation. *Journal of Physical Chemistry C*, 117(47), 24883-24893. <https://doi.org/10.1021/jp408819k>

Hladilkova, J., Prokop, Z., Chaloupkova, R., Damborsky, J., & Jungwirth, P. (2013). Release of halide ions from the buried active site of the haloalkane dehalogenase LinB revealed by stopped-flow fluorescence analysis and free energy calculations. *Journal of Physical Chemistry Part B*, 117(46), 14329-14335. <https://doi.org/10.1021/jp409040u>

Pluhařová, E., Mason, P. E., & Jungwirth, P. (2013). Ion pairing in aqueous lithium salt solutions with monovalent and divalent counter-anions. *Journal of Physical Chemistry A*, 117(46), 11766-11773. <https://doi.org/10.1021/jp402532e>

Priimagi, A., Cavallo, G., Metrangolo, P., & Resnati, G. (2013). The Halogen Bond in the Design of Functional Supramolecular Materials: Recent Advances. *Accounts of Chemical Research*, 46(11), 2686-2695. <https://doi.org/10.1021/ar400103r>

Kalimeri, M., Rahaman, O., Melchionna, S., & Sterpone, F. (2013). How conformational flexibility stabilizes the hyperthermophilic elongation factor G-domain. *Journal of Physical Chemistry Part B*, 117(44), 13775-13785. <https://doi.org/10.1021/jp407078z>

Uhlig, F., & Jungwirth, P. (2013). Embedded cluster models for reactivity of the hydrated electron. *ZEITSCHRIFT FUR PHYSIKALISCHE CHEMIE-INTERNATIONAL JOURNAL OF RESEARCH IN PHYSICAL CHEMISTRY AND CHEMICAL PHYSICS*, 227(11), 1583-1593. <https://doi.org/10.1524/zpch.2013.0402>

Borah, D., Simao, C. D., Sentharamaikannan, R., Rasappa, S., Francone, A., Lorret, O., ... Morris, M. A. (2013). Soft-graphoepitaxy using nanoimprinted polyhedral oligomeric silsesquioxane substrates for the directed self-Assembly of PS-b-PDMS. *European Polymer Journal*, 49(11), 3512-3521. <https://doi.org/10.1016/j.eurpolymj.2013.08.011>

Niskanen, M., Kuisma, M., Cramariuc, O., Golovanov, V., Hukka, T. I., Tkachenko, N., & Rantala, T. T. (2013). Porphyrin adsorbed on the (1010) surface of the wurtzite structure of ZnO-conformation induced effects on the electron transfer characteristics. *Physical Chemistry Chemical Physics*, 15(40), 17408-17418. <https://doi.org/10.1039/c3cp51685g>

Pollheimer, P., Taskinen, B., Scherfler, A., Gusenkov, S., Creus, M., Wiesauer, P., ... Gruber, H. J. (2013). Reversible biofunctionalization of surfaces with a switchable mutant of avidin. *Bioconjugate Chemistry*, 24(10), 1656-1668. <https://doi.org/10.1021/bc400087e>

Sterpone, F., Nguyen, P. H., Kalimeri, M., & Derreux, P. (2013). Importance of the ion-pair interactions in the OPEP coarse-grained force field: Parametrization and validation. *Journal of Chemical Theory and Computation*, 9(10), 4574-4584. <https://doi.org/10.1021/ct4003493>

Laitaoja, M., Valjakka, J., & Jänis, J. (2013). Zinc coordination spheres in protein structures. *Inorganic Chemistry*, 52(19), 10983-10991. <https://doi.org/10.1021/ic401072d>

Khan, M. N., Tjong, V., Chilkoti, A., & Zharnikov, M. (2013). Spectroscopic study of a DNA brush synthesized in situ by surface initiated enzymatic polymerization. *Journal of Physical Chemistry Part B*, 117(34), 9929-9938. <https://doi.org/10.1021/jp404774x>

Stirnemann, G., Wernersson, E., Jungwirth, P., & Laage, D. (2013). Mechanisms of acceleration and retardation of water dynamics by ions. *Journal of the American Chemical Society*, 135(32), 11824-11831. <https://doi.org/10.1021/ja405201s>

Khan, M. N., & Zharnikov, M. (2013). Irradiation promoted exchange reaction with disulfide substituents. *Journal of Physical Chemistry C*, 117(28), 14534-14543. <https://doi.org/10.1021/jp4006026>

Borah, D., Rasappa, S., Sentharamkannan, R., Holmes, J. D., & Morris, M. A. (2013). Tuning PDMS brush chemistry by UV-O3 exposure for PS-b-PDMS microphase separation and directed self-assembly. *Langmuir*, 29(28), 8959-8968. <https://doi.org/10.1021/la401561k>

Paterová, J., Rembert, K. B., Heyda, J., Kurra, Y., Okur, H. I., Liu, W. R., ... Jungwirth, P. (2013). Reversal of the Hofmeister series: Specific ion effects on peptides. *Journal of Physical Chemistry Part B*, 117(27), 8150-8158. <https://doi.org/10.1021/jp405683s>

Stumpel, J. E., Liu, D., Broer, D. J., & Schenning, A. P. H. J. (2013). Photoswitchable hydrogel surface topographies by polymerisation-induced diffusion. *Chemistry: A European Journal*, 19(33), 10922-10927. <https://doi.org/10.1002/chem.201300852>

Diban, N., Haimi, S., Bolhuis-Versteeg, L., Teixeira, S., Miettinen, S., Poot, A., ... Stamatialis, D. (2013). Development and characterization of poly( $\epsilon$ -caprolactone) hollow fiber membranes for vascular tissue engineering. *Journal of Membrane Science*, 438, 29-37. <https://doi.org/10.1016/j.memsci.2013.03.024>

Gordon, T. R., Paik, T., Klein, D. R., Naik, G. V., Caglayan, H., Boltasseva, A., & Murray, C. B. (2013). Shape-dependent plasmonic response and directed self-assembly in a new semiconductor building block, indium-doped cadmium oxide (ICO). *Nano Letters*, 13(6), 2857-2863. <https://doi.org/10.1021/nl4012003>

Gerlofs-Nijland, M. E., Totlandsdal, A. I., Tzamkiozis, T., Leseman, D. L. A. C., Samaras, Z., Låg, M., ... Cassee, F. R. (2013). Cell toxicity and oxidative potential of engine exhaust particles: Impact of using particulate filter or biodiesel fuel blend. *Environmental Science and Technology*, 47(11), 5931-5938. <https://doi.org/10.1021/es305330y>

Štěpánková, V., Paterová, J., Damborský, J., Jungwirth, P., Chaloupková, R., & Heyda, J. (2013). Cation-specific effects on enzymatic catalysis driven by interactions at the tunnel mouth. *Journal of Physical Chemistry Part B*, 117(21), 6394-6402. <https://doi.org/10.1021/jp401506v>

Pelto, J. M., Haimi, S. P., Siljander, A. S., Miettinen, S. S., Tappura, K. M., Higgins, M. J., & Wallace, G. G. (2013). Surface properties and interaction forces of biopolymer-doped conductive polypyrrole surfaces by atomic force microscopy. *Langmuir*, 29(20), 6099-6108. <https://doi.org/10.1021/la4009366>

McManamon, C., Delaney, P., Kavanagh, C., Wang, J. J., Rasappa, S., & Morris, M. A. (2013). Depth profiling of PLGA copolymer in a novel biomedical bilayer using confocal Raman spectroscopy. *Langmuir*, 29(19), 5905-5910. <https://doi.org/10.1021/la400402a>

Bayr, S., Kaparaju, P., & Rintala, J. (2013). Screening pretreatment methods to enhance thermophilic anaerobic digestion of pulp and paper mill wastewater treatment secondary sludge. *Chemical Engineering Journal*, 223, 479-486. <https://doi.org/10.1016/j.cej.2013.02.119>

Tan, M., Feng, Y., Wang, H., Zhang, L., Khan, M., Guo, J., ... Liu, J. (2013). Immobilized bioactive agents onto polyurethane surface with heparin and phosphorylcholine group. *Macromolecular Research*, 21(5), 541-549. <https://doi.org/10.1007/s13233-013-1028-3>



Vapaavuori, J., Mahimwalla, Z., Chromik, R. R., Kaivola, M., Priimagi, A., & Barrett, C. J. (2013). Nanoindentation study of light-induced softening of supramolecular and covalently functionalized azo polymers. *Journal of Materials Chemistry C*, 1(16), 2806-2810. <https://doi.org/10.1039/c3tc30246f>

Roop, S., Das, A., Stöckelhuber, K. W., Wang, D. Y., Galiatsatos, V., & Heinrich, G. (2013). Understanding the reinforcing behavior of expanded clay particles in natural rubber compounds. *Soft Matter*, 9(14), 3798-3808. <https://doi.org/10.1039/c3sm27519a>

Pale, V., Nikkonen, T., Vapaavuori, J., Kostianen, M., Kavakka, J., Selin, J., ... Helaja, J. (2013). Biomimetic zinc chlorin-poly(4-vinylpyridine) assemblies: Doping level dependent emission-absorption regimes. *Journal of Materials Chemistry C*, 1(11), 2166-2173. <https://doi.org/10.1039/c3tc00499f>

Ma, L., Wang, J., & Wang, G. (2013). Site-specific analysis of dipole polarizabilities of heterogeneous systems: Iron-doped  $\text{Si}_n$  ( $n = 1-14$ ) clusters. *Journal of Chemical Physics*, 138(9), [094304]. <https://doi.org/10.1063/1.4793276>

Borah, D., Ozmen, M., Rasappa, S., Shaw, M. T., Holmes, J. D., & Morris, M. A. (2013). Molecularly functionalized silicon substrates for orientation control of the microphase separation of PS-b-PMMA and PS-b-PDMS block copolymer systems. *Langmuir*, 29(9), 2809-2820. <https://doi.org/10.1021/la304140q>

Barboza, R., Bortolozzo, U., Assanto, G., & Residori, S. (2013). Optical vortex generation in nematic liquid crystal light valves. *Molecular Crystals and Liquid Crystals*, 572(1), 24-30. <https://doi.org/10.1080/15421406.2012.763206>

Rasappa, S., Borah, D., Faulkner, C. C., Lutz, T., Shaw, M. T., Holmes, J. D., & Morris, M. A. (2013). Fabrication of a sub-10 nm silicon nanowire based ethanol sensor using block copolymer lithography. *Nanotechnology*, 24(6), [065503]. <https://doi.org/10.1088/0957-4484/24/6/065503>

Vazdar, M., Jungwirth, P., & Mason, P. E. (2013). Aqueous guanidinium-carbonate interactions by molecular dynamics and neutron scattering: Relevance to ion-protein interactions. *Journal of Physical Chemistry Part B*, 117(6), 1844-1848. <https://doi.org/10.1021/jp310719g>

Farman, A. T., Hong, S. H., Caglayan, H., Ye, X., Diroll, B. T., Paik, T., ... Kagan, C. R. (2013). Chemically tailored dielectric-to-metal transition for the design of metamaterials from nanoimprinted colloidal nanocrystals. *Nano Letters*, 13(2), 350-357. <https://doi.org/10.1021/nl303161d>

Ma, L., & Ray, A. K. (2013). Growth behavior and magnetic properties of spherical uranium oxide nanoclusters. *Journal of Computational and Theoretical Nanoscience*, 10(2), 334-340. <https://doi.org/10.1166/jctn.2013.2701>

Ma, L., Wang, J., Hao, Y., & Wang, G. (2013). Density functional theory study of  $\text{FePd}_n$  ( $n = 2-14$ ) clusters and interactions with small molecules. *Computational Materials Science*, 68, 166-173. <https://doi.org/10.1016/j.commatsci.2012.10.014>

Subramaniam, K., Das, A., Simon, F., & Heinrich, G. (2013). Networking of ionic liquid modified CNTs in SSBR. *European Polymer Journal*, 49(2), 345-352. <https://doi.org/10.1016/j.eurpolymj.2012.10.023>

Wang, H., Feng, Y., Zhao, H., Fang, Z., Khan, M., & Guo, J. (2013). A potential nonthrombogenic small-diameter vascular scaffold with polyurethane/poly(ethylene glycol) hybrid materials by electrospinning technique. *Journal Nanoscience and Nanotechnology*, 13(2), 1578-1582. <https://doi.org/10.1166/jnn.2013.6051>

Kulig, W., & Agmon, N. (2013). A 'clusters-in-liquid' method for calculating infrared spectra identifies the proton-transfer mode in acidic aqueous solutions. *Nature Chemistry*, 5(1), 29-35. <https://doi.org/10.1038/nchem.1503>

- Ylilauri, M., Mattila, E., Nurminen, E. M., Käpylä, J., Niinevehmas, S. P., Määttä, J. A., ... Pentikäinen, O. T. (2013). Molecular mechanism of T-cell protein tyrosine phosphatase (TCPTP) activation by mitoxantrone. *Biochimica et biophysica acta: proteins and proteomics*, 1834(10), 1988-1997. <https://doi.org/10.1016/j.bbapap.2013.07.001>
- Mubarakali, D., Praveenkumar, R., Shenbagavalli, T., Mari Nivetha, T., Parveez Ahamed, A., Al-Dhabi, N. A., & Thajuddin, N. (2012). New reports on anti-bacterial and anti-candidal activities of fatty acid methyl esters (FAME) obtained from *Scenedesmus bijugatus* var. *bicellularis* biomass. *RSC Advances*, 2(30), 11552-11556. <https://doi.org/10.1039/c2ra21130k>
- Buchholz, M., Goletz, C. M., Grossmann, F., Schmidt, B., Heyda, J., & Jungwirth, P. (2012). Semiclassical hybrid approach to condensed phase molecular dynamics: Application to the  $I_2Kr_{17}$  cluster. *Journal of Physical Chemistry A*, 116(46), 11199-11210. <https://doi.org/10.1021/jp305084f>
- Pluhaová, E., Marsalek, O., Schmidt, B., & Jungwirth, P. (2012). Peptide salt bridge stability: From gas phase via microhydration to bulk water simulations. *Journal of Chemical Physics*, 137(18), [185101]. <https://doi.org/10.1063/1.4765052>
- Ma, L., Wang, J., & Wang, G. (2012). Search for global minimum geometries of medium sized  $Cd_nTe_n$  clusters ( $n = 15, 16, 20, 24$  and  $28$ ). *Chemical Physics Letters*, 552, 73-77. <https://doi.org/10.1016/j.cplett.2012.09.036>
- Pluhařová, E., Ončák, M., Seidel, R., Schroeder, C., Schroeder, W., Winter, B., ... Slavíček, P. (2012). Transforming anion instability into stability: Contrasting photoionization of three protonation forms of the phosphate ion upon moving into water. *Journal of Physical Chemistry Part B*, 116(44), 13254-13264. <https://doi.org/10.1021/jp306348b>
- Steinhauser, D., Subramaniam, K., Das, A., Heinrich, G., & Klüppel, M. (2012). Influence of ionic liquids on the dielectric relaxation behavior of CNT based elastomer nanocomposites. *Express Polymer Letters*, 6(11), 927-936. <https://doi.org/10.3144/expresspolymlett.2012.98>
- Mahimwalla, Z., Yager, K. G., Mamiya, J. I., Shishido, A., Priimagi, A., & Barrett, C. J. (2012). Azobenzene photomechanics: Prospects and potential applications. *Polymer Bulletin*, 69(8), 967-1006. <https://doi.org/10.1007/s00289-012-0792-0>
- Lisitsyna, E. S., Lygo, O. N., Durandin, N. A., Dement'eva, O. V., Rudoi, V. M., & Kuzmin, V. A. (2012). Superquenching of SYBRGreen dye fluorescence in complex with DNA by gold nanoparticles. *HIGH ENERGY CHEMISTRY*, 46(6), 363-367. <https://doi.org/10.1134/S0018143912060057>
- Khan, M. N., Tjong, V., Chilkoti, A., & Zharnikov, M. (2012). Fabrication of ssDNA/oligo(ethylene glycol) monolayers and complex nanostructures by an irradiation-promoted exchange reaction. *Angewandte Chemie (International Edition)*, 51(41), 10303-10306. <https://doi.org/10.1002/anie.201204245>
- Le, H. H., Hoang, X. T., Das, A., Gohs, U., Stoeckelhuber, K. W., Boldt, R., ... Radosch, H. J. (2012). Kinetics of filler wetting and dispersion in carbon nanotube/rubber composites. *Carbon*, 50(12), 4543-4556. <https://doi.org/10.1016/j.carbon.2012.05.039>
- Gao, W., Feng, Y., Lu, J., Khan, M., & Guo, J. (2012). Biomimetic surface modification of polycarbonateurethane film via phosphorylcholine-graft for resisting platelet adhesion. *Macromolecular Research*, 20(10), 1063-1069. <https://doi.org/10.1007/s13233-012-0152-9>
- Bardhan, J. P., Jungwirth, P., & Makowski, L. (2012). Affine-response model of molecular solvation of ions: Accurate predictions of asymmetric charging free energies. *Journal of Chemical Physics*, 137(12), [124101]. <https://doi.org/10.1063/1.4752735>
- Kapgate, B. P., Das, C., Das, A., Basu, D., Reuter, U., & Heinrich, G. (2012). Effect of sol-gel derived in situ silica on the morphology and mechanical behavior of natural rubber and acrylonitrile butadiene rubber blends. *JOURNAL OF SOL-GEL SCIENCE AND TECHNOLOGY*, 63(3), 501-509. <https://doi.org/10.1007/s10971-012-2812-9>

Pegado, L., Marsalek, O., Jungwirth, P., & Wernersson, E. (2012). Solvation and ion-pairing properties of the aqueous sulfate anion: Explicit versus effective electronic polarization. *Physical Chemistry Chemical Physics*, *14*(29), 10248-10257. <https://doi.org/10.1039/c2cp40711f>

Kousoulidou, M., Ntziachristos, L., Fontaras, G., Martini, G., Dilara, P., & Samaras, Z. (2012). Impact of biodiesel application at various blending ratios on passenger cars of different fueling technologies. *Fuel*, *98*, 88-94. <https://doi.org/10.1016/j.fuel.2012.03.038>

Mason, P. E., Wernersson, E., & Jungwirth, P. (2012). Accurate description of aqueous carbonate ions: An effective polarization model verified by neutron scattering. *Journal of Physical Chemistry Part B*, *116*(28), 8145-8153. <https://doi.org/10.1021/jp3008267>

Serak, S. V., Tabiryanyan, N. V., & Assanto, G. (2012). Nematicons in azobenzene liquid crystals. *Molecular Crystals and Liquid Crystals*, *559*, 202-213. <https://doi.org/10.1080/15421406.2012.658710>

Rembert, K. B., Paterová, J., Heyda, J., Hilty, C., Jungwirth, P., & Cremer, P. S. (2012). Molecular mechanisms of ion-specific effects on proteins. *Journal of the American Chemical Society*, *134*(24), 10039-10046. <https://doi.org/10.1021/ja301297g>

Priimagi, A., Cavallo, G., Forni, A., Gorynsztejn-Leben, M., Kaivola, M., Metrangolo, P., ... Terraneo, G. (2012). Halogen bonding versus hydrogen bonding in driving self-assembly and performance of light-responsive supramolecular polymers. *Advanced Functional Materials*, *22*(12), 2572-2579. <https://doi.org/10.1002/adfm.201200135>

Vazdar, M., Jurkiewicz, P., Hof, M., Jungwirth, P., & Cwiklik, L. (2012). Behavior of 4-hydroxynonenal in phospholipid membranes. *Journal of Physical Chemistry Part B*, *116*(22), 6411-6415. <https://doi.org/10.1021/jp3044219>

Ma, L., Atta-Fynn, R., & Ray, A. K. (2012). Elemental and mixed actinide dioxides: An ab initio study. *Journal of Theoretical and Computational Chemistry*, *11*(3), 611-629. <https://doi.org/10.1142/S021963361250040X>

Wang, D. Y., Das, A., Leuteritz, A., Mahaling, R. N., Jehnichen, D., Wagenknecht, U., & Heinrich, G. (2012). Structural characteristics and flammability of fire retarding EPDM/layered double hydroxide (LDH) nanocomposites. *RSC Advances*, *2*(9), 3927-3933. <https://doi.org/10.1039/c2ra20189e>

Rooj, S., Das, A., Stöckelhuber, K. W., Reuter, U., & Heinrich, G. (2012). Highly exfoliated natural rubber/Clay composites by "propping-open procedure": The influence of fatty-acid chain length on exfoliation. *Macromolecular Materials and Engineering*, *297*(4), 369-383. <https://doi.org/10.1002/mame.201100185>

Stradomska, A., Kulig, W., Slawik, M., & Petelenz, P. (2012). Excited-state polarizability in crystalline sexithiophene: Charge-transfer and vibronic effects. *Chemical Physics Letters*, *529*, 27-30. <https://doi.org/10.1016/j.cplett.2012.01.038>

Das, A., George, J. J., Kutlu, B., Leuteritz, A., Wang, D. Y., Rooj, S., ... Heinrich, G. (2012). A novel thermotropic elastomer based on highly-filled LDH-SSB composites. *Macromolecular Rapid Communications*, *33*(4), 337-342. <https://doi.org/10.1002/marc.201100735>

Nandre, K. P., Salunke, J. K., Nandre, J. P., Patil, V. S., Borse, A. U., & Bhosale, S. V. (2012). Glycerol mediated synthesis of 5-substituted 1H-tetrazole under catalyst free conditions. *Chinese Chemical Letters*, *23*(2), 161-164. <https://doi.org/10.1016/j.ccllet.2011.11.019>

Koskela, J. E., Vapaavuori, J., Hautala, J., Priimagi, A., Faul, C. F. J., Kaivola, M., & Ras, R. H. A. (2012). Surface-relief gratings and stable birefringence inscribed using light of broad spectral range in supramolecular polymer-bisazobenzene complexes. *Journal of Physical Chemistry C*, *116*(3), 2363-2370. <https://doi.org/10.1021/jp210706n>

Marsalek, O., Uhlig, F., Vandevondele, J., & Jungwirth, P. (2012). Structure, dynamics, and reactivity of hydrated electrons by Ab initio molecular dynamics. *Accounts of Chemical Research*, 45(1), 23-32. <https://doi.org/10.1021/ar200062m>

Leuteritz, A., Kutlu, B., Meinel, J., Wang, D., Das, A., Wagenknecht, U., & Heinrich, G. (2012). Layered Double Hydroxides (LDH): A multifunctional versatile system for nanocomposites. *Molecular Crystals and Liquid Crystals*, 556, 107-113. <https://doi.org/10.1080/15421406.2012.635923>

Priimagi, A., Shimamura, A., Kondo, M., Hiraoka, T., Kubo, S., Mamiya, J. I., ... Shishido, A. (2012). Location of the Azobenzene moieties within the cross-linked liquid-crystalline polymers can dictate the direction of photoinduced bending. *ACS Macro Letters*, 1(1), 96-99. <https://doi.org/10.1021/mz200056w>

Marsalek, O., Elles, C. G., Pieniazek, P. A., Pluhaov, E., Vandevondele, J., Bradforth, S. E., & Jungwirth, P. (2011). Chasing charge localization and chemical reactivity following photoionization in liquid water. *Journal of Chemical Physics*, 135(22), [224510]. <https://doi.org/10.1063/1.3664746>

Härkönen, H. H., Mattsson, J. M., Määttä, J. A. E., Stenman, U. H., Koistinen, H., Matero, S., ... Lahtela-Kakkonen, M. (2011). The Discovery of Compounds That Stimulate the Activity of Kallikrein-Related Peptidase3 (KLK3). *CHEMMEDCHEM*, 6(12), 2170-2178. <https://doi.org/10.1002/cmdc.201100349>

Manna, M., & Mukhopadhyay, C. (2011). Cholesterol driven alteration of the conformation and dynamics of phospholamban in model membranes. *Physical Chemistry Chemical Physics*, 13(45), 20188-20198. <https://doi.org/10.1039/c1cp21793c>

Subramaniam, K., Das, A., Steinhauser, D., Klüppel, M., & Heinrich, G. (2011). Effect of ionic liquid on dielectric, mechanical and dynamic mechanical properties of multi-walled carbon nanotubes/polychloroprene rubber composites. *European Polymer Journal*, 47(12), 2234-2243. <https://doi.org/10.1016/j.eurpolymj.2011.09.021>

Gladich, I., Pfalzgraff, W., Maršálek, O., Jungwirth, P., Roeselová, M., & Neshyba, S. (2011). Arrhenius analysis of anisotropic surface self-diffusion on the prismatic facet of ice. *Physical Chemistry Chemical Physics*, 13(44), 19960-19969. <https://doi.org/10.1039/c1cp22238d>