

Lappalainen, Kari ; Wang, Guang C. ; Kleissl, Jan. / **Estimation of the largest expected photovoltaic power ramp rates**. In: Applied Energy. 2020 ; Vol. 278.

Huttunen-Saarivirta, E. ; Kilpi, L. ; Pasanen, A. T. ; Salminen, T. ; Ronkainen, H. / **Tribocorrosion behaviour of tin bronze CuSn12 under a sliding motion in NaCl containing environment : Contact to inert vs. reactive counterbody**. In: Tribology International. 2020 ; Vol. 151.

Kivioja, Henna ; Vinha, Juha. / **Hot-box measurements to investigate the internal convection of highly insulated loose-fill insulation roof structures**. In: Energy and Buildings. 2020 ; Vol. 216.

Ryynänen, Tomi ; Mzezewa, Ropafadzo ; Meriläinen, Ella ; Hyvärinen, Tanja ; Lekkala, Jukka ; Narkilahti, Susanna ; Kallio, Pasi. / **Transparent microelectrode arrays fabricated by ion beam assisted deposition for neuronal cell in vitro recordings**. In: Micromachines. 2020 ; Vol. 11, No. 5.

Shevkunov, Igor ; Katkovnik, Vladimir ; Claus, Daniel ; Pedrini, Giancarlo ; Petrov, Nikolay V. ; Egiazarian, Karen. / **Hyperspectral phase imaging based on denoising in complex-valued eigensubspace**. In: Optics and Lasers in Engineering . 2020 ; Vol. 127.

Belardini, Alessandro ; Leahu, Grigore ; Petronijevic, Emilija ; Hakkarainen, Teemu ; Koivusalo, Eero ; Piton, Marcelo Rizzo ; Talmila, Soile ; Guina, Mircea ; Sibilia, Concita. / **Circular dichroism in the second harmonic field evidenced by asymmetric Au coated GaAs nanowires**. In: Micromachines. 2020 ; Vol. 11, No. 2. pp. 1-8.

Schoeppner, R.L. ; Mohanty, G. ; Polyakov, M.N. ; Petho, L. ; Maeder, X. ; Michler, J. / **An exploratory study on strengthening and thermal stability of magnetron sputtered W nanoparticles at the interface of Cu/Ni multilayer films**. In: Materials and Design. 2020 ; Vol. 195.

Saarimaa, Ville ; Fuertes, Nuria ; Persson, Dan ; Zavalis, Tommy ; Kaleva, Aaretti ; Nikkanen, Juha-Pekka ; Levänen, Erkki ; Heydari, Golrokh. / **Assessment of pitting corrosion in bare and passivated (wet scCO<sub>2</sub>-induced patination and chemical passivation) hot-dip galvanized steel samples with SVET, FTIR, and SEM (EDS)**. In: Materials and Corrosion. 2020.

Paunonen, Lassi ; Seifert, David. / **Asymptotics and approximation of large systems of ordinary differential equations**. In: Systems and Control Letters. 2020 ; Vol. 140.

Juoksukangas, Janne ; Hintikka, Jouko ; Lehtovaara, Arto ; Mäntylä, Antti ; Vaara, Joonas ; Frondelius, Tero. / **Avoiding the high friction peak in fretting contact**. In: Rakenteiden Mekaniikka. 2020 ; Vol. 53, No. 1. pp. 12-19.

Olin, Miska ; Dal Maso, Miikka. / **CFD modeling the diffusional losses of nanocluster-sized particles and condensing vapors in 90° bends of circular tubes**. In: Journal of Aerosol Science. 2020 ; Vol. 150.

Evans, Donald M. ; Holstad, Theodor S. ; Mosberg, Aleksander B. ; Småbråten, Didrik R. ; Vullum, Per Erik ; Dadlani, Anup L. ; Shapovalov, Konstantin ; Yan, Zewu ; Bourret, Edith ; Gao, David ; Akola, Jaakko ; Torgersen, Jan ; van Helvoort, Antonius T.J. ; Selbach, Sverre M. ; Meier, Dennis. / **Conductivity control via minimally invasive anti-Frenkel defects in a functional oxide**. In: Nature Materials. 2020.

Di Vito, Donato ; Mosallaei, Milad ; Vahed, Behnam Khorramdel ; Kanerva, Mikko ; Mäntysalo, Matti. / **Deformability analysis and improvement in stretchable electronics systems through finite element analysis**. Proceedings of XXIV AIMETA Conference 2019. editor / Antonio Carcaterra ; Giorgio Graziani ; Achille Paolone. Springer, 2020. pp. 755-763 (Lecture Notes in Mechanical Engineering).

Mäntylä, Antti ; Juoksukangas, Janne ; Hintikka, Jouko ; Frondelius, Tero ; Lehtovaara, Arto. / **FEM-based wear simulation for fretting contacts**. In: Rakenteiden Mekaniikka. 2020 ; Vol. 53, No. 1. pp. 20-27.

Priimägi, Arri (Editor) ; Hecht, Stefan (Editor). / **From Responsive Molecules to Interactive Materials**. In: *Advanced Materials*. 2020 ; Vol. 32, No. 20.

Singh, Arun Kumar ; Ahonen, Andrei ; Ghabcheloo, Reza ; Mueller, Andreas. / **Introducing Multi-Convexity in Path Constrained Trajectory Optimization for Mobile Manipulators**. *European Control Conference 2020, ECC 2020*. IEEE, 2020. pp. 1178-1185

Holopainen, Sami. / **Käyräviivaiset koordinaatitot kontinuumimekaniikassa**. In: *Rakenteiden Mekaniikka*. 2020 ; Vol. 53, No. 2. pp. 53-66.

Vitola, V. ; Lahti, V. ; Bite, I. ; Spustaka, A. ; Millers, D. ; Lastusaari, M. ; Petit, L. ; Smits, K. / **Low temperature afterglow from SrAl<sub>2</sub>O<sub>4</sub> : Eu, Dy, B containing glass**. In: *Scripta Materialia*. 2020 ; Vol. 190. pp. 86-90.

Lauri, Mikko ; Pajarinen, Joni ; Peters, Jan ; Frintrop, Simone. / **Multi-sensor next-best-view planning as matroid-constrained submodular maximization**. In: *IEEE Robotics and Automation Letters*. 2020 ; Vol. 5, No. 4. pp. 5323-5330.

Nommeots-Nomm, A. ; Houaoui, A. ; Pradeepan Packiyannathar, A. ; Chen, X. ; Hokka, M. ; Hill, R. ; Pauthe, E. ; Petit, L. ; Boissière, M. ; Massera, J. / **Phosphate/oxyfluorophosphate glass crystallization and its impact on dissolution and cytotoxicity**. In: *Materials Science and Engineering C*. 2020 ; Vol. 117.

Pajarinen, Joni ; Arenz, Oleg ; Peters, Jan ; Neumann, Gerhard. / **Probabilistic approach to physical object disentangling**. In: *IEEE Robotics and Automation Letters*. 2020 ; Vol. 5, No. 4. pp. 5510-5517.

Gusrialdi, Azwirman ; Xu, Ying ; Qu, Zhihua ; Simaan, Marwan A. / **Resilient Cooperative Voltage Control for Distribution Network with High Penetration Distributed Energy Resources**. *European Control Conference 2020, ECC 2020*. IEEE, 2020. pp. 1533-1539

Priimägi, Arri (Editor) ; Hecht, Stefan (Editor). / **Special Issue: From Responsive Materials to Interactive Materials**. In: *Advanced Materials*. 2020 ; Vol. 32, No. 20.

Chronopoulos, Antonios ; Thorpe, Stephen D. ; Cortes, Ernesto ; Lachowski, Dariusz ; Rice, Alistair J. ; Mykuliak, Vasyl V. ; Rog, Tomasz ; Lee, David A. ; Hytönen, Vesa P. ; del Río Hernández, Armando E. / **Syndecan-4 tunes cell mechanics by activating the kindlin-integrin-RhoA pathway**. In: *Nature Materials*. 2020.

Zhang, Hang ; Zeng, Hao ; Priimägi, Arri ; Ikkala, Olli. / **Viewpoint : Pavlovian Materials—Functional Biomimetics Inspired by Classical Conditioning**. In: *Advanced Materials*. 2020.

Santa-aho, Suvi ; Laitinen, Arttu ; Sorsa, Aki ; Vippola, Minnamari. / **Barkhausen Noise Probes and Modelling : A Review**. In: *Journal of Nondestructive Evaluation*. 2019 ; Vol. 38, No. 4.

Pirjola, Liisa ; Kuuluvainen, Heino ; Timonen, Hilka ; Saarikoski, Sanna ; Teinilä, Kimmo ; Salo, Laura ; Datta, Arindam ; Simonen, Pauli ; Karjalainen, Panu ; Kulmala, Kari ; Rönkkö, Topi. / **Potential of renewable fuel to reduce diesel exhaust particle emissions**. In: *Applied Energy*. 2019 ; Vol. 254.

Mäntylä, A. ; Hintikka, J. ; Frondelius, T. ; Vaara, J. ; Lehtovaara, A. ; Juoksukangas, J. / **Prediction of contact condition and surface damage by simulating variable friction coefficient and wear**. In: *Tribology International*. 2019.

Mäenpää, Pekka ; Aref, Mohammad M. ; Mattila, Jouni. / **FORM: A Fast Holonomic Path Planning and Obstacle Representation Method Based on Interval Analysis**. *Proceedings of the IEEE 2019 9th International Conference on Cybernetics and Intelligent Systems and Robotics, Automation and Mechatronics, CIS and RAM 2019*. IEEE, 2019. pp. 398-403 (IEEE International Conference on Cybernetics and Intelligent Systems).

Motlagh, Hamid Didari Khamseh ; Lotfi, Faraz ; Taghirad, Hamid D. ; Gerami, Saeed Bakhshi. / **Position Estimation for Drones based on Visual SLAM and IMU in GPS-denied Environment**. ICRoM 2019 - 7th International Conference on Robotics and Mechatronics. IEEE, 2019. pp. 120-124

Hintikka, Jouko ; Mäntylä, Antti ; Vaara, Joonas ; Frondelius, Tero ; Juoksukangas, Janne ; Lehtovaara, Arto. / **Running-in in fretting, transition from near-stable friction regime to gross sliding**. In: Tribology International. 2019 ; Vol. 143.

Mäntyranta, Aino ; Heino, Vuokko ; Isotahdon, Elisa ; Salminen, Turkka ; Huttunen-Saarivirta, Elina. / **Tribocorrosion behaviour of two low-alloy steel grades in simulated waste solution**. In: Tribology International. 2019 ; Vol. 138. pp. 250-262.

Perttula, Arto ; Nguyen, Nhan ; Collin, Jussi ; Jokinen, Jani-Pekka. / **Vehicle type detection and passenger satisfaction analysis using smartphone sensors and digital surveys**. In: IET Intelligent Transport Systems. 2019 ; Vol. 13, No. 10. pp. 1499-1506.

Reshef, Orad ; Saad-Bin-Alam, Md ; Huttunen, Mikko J. ; Carlow, Graham ; Sullivan, Brian T. ; Ménard, Jean Michel ; Dolgaleva, Ksenia ; Boyd, Robert W. / **Multiresonant High-Q Plasmonic Metasurfaces**. In: Nano Letters. 2019 ; Vol. 19, No. 9. pp. 6429-6434.

Ylönen, Markku ; Franc, Jean Pierre ; Miettinen, Juha ; Saarenrinne, Pentti ; Fivel, Marc. / **Shedding frequency in cavitation erosion evolution tracking**. In: International Journal of Multiphase Flow. 2019 ; Vol. 118. pp. 141-149.

Lehmusto, Juho ; Olin, Miska ; Viljanen, Jan ; Kalliokoski, Joni ; Mylläri, Fanni ; Toivonen, Juha ; Dal Maso, Miikka ; Hupa, Leena. / **Detection of gaseous species during KCl-induced high-temperature corrosion by the means of CPFAAS and CI-API-TOF**. In: Materials and Corrosion. 2019.

Kreutzer, Joose ; Viehrig, Marlitt ; Pölonen, Risto Pekka ; Zhao, Feihu ; Ojala, Marisa ; Aalto-Setälä, Katriina ; Kallio, Pasi. / **Pneumatic unidirectional cell stretching device for mechanobiological studies of cardiomyocytes**. In: BIOMECHANICS AND MODELING IN MECHANOBIOLOGY. 2019.

Thomas, K. ; Mohanty, G. ; Wehrs, J. ; Taylor, A. A. ; Pathak, S. ; Casari, D. ; Schwiedrzik, J. ; Mara, N. ; Spolenak, R. ; Michler, J. / **Elevated and cryogenic temperature micropillar compression of magnesium–niobium multilayer films**. In: Journal of Materials Science. 2019 ; Vol. 54, No. 15. pp. 10884-10901.

Szczodra, A. ; Mardoukhi, A. ; Hokka, M. ; Boetti, N. G. ; Petit, L. / **Fluorine losses in Er<sup>3+</sup> oxyfluoride phosphate glasses and glass-ceramics**. In: Journal of Alloys and Compounds. 2019 ; Vol. 797. pp. 797-803.

Kezilebieke, Shawulienu ; Žitko, Rok ; Dvorak, Marc ; Ojanen, Teemu ; Liljeroth, Peter. / **Observation of Coexistence of Yu-Shiba-Rusinov States and Spin-Flip Excitations**. In: Nano Letters. 2019 ; Vol. 19, No. 7. pp. 4614-4619.

Juoksukangas, Janne ; Nurmi, Verner ; Hintikka, Jouko ; Vippola, Minnamari ; Lehtovaara, Arto ; Mäntylä, Antti ; Vaara, Joonas ; Frondelius, Tero. / **Characterization of cracks formed in large flat-on-flat fretting contact**. In: International Journal of Fatigue. 2019 ; Vol. 124. pp. 361-370.

Sautter, Jürgen D. ; Xu, Lei ; Miroshnichenko, Andrey E. ; Lysevych, Mykhaylo ; Volkovskaya, Irina ; Smirnova, Daria A. ; Camacho-Morales, Rocio ; Zangeneh Kamali, Khosro ; Karouta, Fouad ; Vora, Kaushal ; Tan, Hoe H. ; Kauranen, Martti ; Staude, Isabelle ; Jagadish, Chennupati ; Neshev, Dragomir N. ; Rahmani, Mohsen. / **Tailoring Second-Harmonic Emission from (111)-GaAs Nanoantennas**. In: Nano Letters. 2019 ; Vol. 19, No. 6. pp. 3905-3911.

Vuornos, Kaisa ; Ojansivu, Miina ; Koivisto, Janne T. ; Häkkänen, Heikki ; Belay, Birhanu ; Montonen, Toni ; Huhtala, Heini ; Kääriäinen, Minna ; Hupa, Leena ; Kellomäki, Minna ; Hyttinen, Jari ; Ihalainen, Janne A. ; Miettinen, Susanna. / **Bioactive glass ions induce efficient osteogenic differentiation of human adipose stem cells encapsulated in gellan gum and collagen type I hydrogels**. In: Materials Science and Engineering C. 2019 ; Vol. 99. pp. 905-918.

Koivikko, Anastasia ; Sariola, Veikko. / **Fabrication of soft devices with buried fluid channels by using sacrificial 3D printed molds.** 2019 2nd IEEE International Conference on Soft Robotics (RoboSoft). IEEE, 2019. pp. 509-513

Sanchez-Guevara, Carmen ; Núñez Peiró, Miguel ; Taylor, Jonathon ; Mavrogianni, Anna ; Neila González, Javier. / **Assessing population vulnerability towards summer energy poverty : Case studies of Madrid and London.** In: Energy and Buildings. 2019 ; Vol. 190. pp. 132-143.

Rossi, Mattia ; Liegmann, Eyke ; Karamanakos, Petros ; Castelli-Dezza, Francesco ; Kennel, Ralph. / **Direct model predictive power control of a series-connected modular rectifier.** PRECEDE 2019: 2019 IEEE International Symposium on Predictive Control of Electrical Drives and Power Electronics. IEEE, 2019. pp. 1-6

Wendel, Sebastian ; Karamanakos, Petros ; Dietz, Armin ; Kennel, Ralph. / **Operating point dependent variable switching point predictive current control for PMSM drives.** PRECEDE 2019: 2019 IEEE International Symposium on Predictive Control of Electrical Drives and Power Electronics. IEEE, 2019. pp. 1-6

Itävuori, Pekka ; Hulthén, Erik ; Yahyaei, Moshen ; Vilkkonen, Matti. / **Mass balance control of crushing circuits.** In: Minerals Engineering. 2019 ; Vol. 135. pp. 37-47.

Wu, Di ; Coatanea, Eric ; Wang, G. Gary. / **Employing Knowledge on Causal Relationship to Assist Multidisciplinary Design Optimization.** In: Journal of Mechanical Design, Transactions of the ASME. 2019 ; Vol. 141, No. 4.

Backas, Joni ; Ghabcheloo, Reza. / **Nonlinear model predictive energy management of hydrostatic drive transmissions.** In: Proceedings of the Institution of Mechanical Engineers. Part I: Journal of Systems and Control Engineering. 2019 ; Vol. 233, No. 3. pp. 335-347.

Hintikka, Jouko ; Mäntylä, Antti ; Vaara, Joonas ; Frondelius, Tero ; Lehtovaara, Arto. / **Stable and unstable friction in fretting contacts.** In: Tribology International. 2019 ; Vol. 131. pp. 73-82.

Nurmi, Verner ; Hintikka, Jouko ; Juoksukangas, Janne ; Honkanen, Mari ; Vippola, Minnamari ; Lehtovaara, Arto ; Mäntylä, Antti ; Vaara, Joonas ; Frondelius, Tero. / **The formation and characterization of fretting-induced degradation layers using quenched and tempered steel.** In: Tribology International. 2019 ; Vol. 131. pp. 258-267.

Liimatainen, Heikki ; van Vliet, Oscar ; Aplyn, David. / **The potential of electric trucks – An international commodity-level analysis.** In: Applied Energy. 2019 ; Vol. 236. pp. 804-814.

Claude, Sophie ; Ginestet, Stephane ; Bonhomme, Marion ; Escadeillas, Gilles ; Taylor, Jonathon ; Marincioni, Valentina ; Korolija, Ivan ; Altamirano, Hector. / **Evaluating retrofit options in a historical city center : Relevance of bio-based insulation and the need to consider complex urban form in decision-making.** In: Energy and Buildings. 2019 ; Vol. 182. pp. 196-204.

Pekkanen, Timo T. ; Timonen, Raimo S. ; Lendvay, György ; Rissanen, Matti P. ; Eskola, Arkko J. / **Kinetics and thermochemistry of the reaction of 3-methylpropargyl radical with molecular oxygen.** In: PROCEEDINGS OF THE COMBUSTION INSTITUTE. 2019 ; Vol. 37, No. 1. pp. 299-306.

Wani, Owies M. ; Verpaalen, Rob ; Zeng, Hao ; Priimagi, Arri ; Schenning, Albert P.H.J. / **An Artificial Nocturnal Flower via Humidity-Gated Photoactuation in Liquid Crystal Networks.** In: Advanced Materials. 2019 ; Vol. 31, No. 2.

Jaurola, Miikka ; Hedin, Anders ; Tikkanen, Seppo ; Huhtala, Kalevi. / **A TOpti simulation for finding fuel saving by optimising propulsion control and power management.** In: Journal of Marine Science and Technology (Japan). 2019.

Huttunen-Saarivirta, E. ; Isotahdon, E. ; Metsäjoki, J. ; Salminen, T. ; Ronkainen, H. ; Carpén, L. / **Behaviour of leaded tin bronze in simulated seawater in the absence and presence of tribological contact with alumina counterbody : Corrosion, wear and tribocorrosion.** In: Tribology International. 2019 ; Vol. 129. pp. 257-271.

Välikangas, Turo ; Hærvig, Jakob ; Kuuluvainen, Heino ; Dal Maso, Miikka ; Peltonen, Petteri ; Vuorinen, Ville. / **Deposition of dry particles on a fin-and-tube heat exchanger by a coupled soft-sphere DEM and CFD.** In: International Journal of Heat and Mass Transfer. 2019.

Cao, Xuepeng ; Aref, Mohammad M. ; Mattila, Jouni. / **Design and Control of a Flexible Joint as a Hydraulic Series Elastic Actuator for Manipulation Applications.** Proceedings of the IEEE 2019 9th International Conference on Cybernetics and Intelligent Systems and Robotics, Automation and Mechatronics, CIS and RAM 2019. IEEE, 2019. pp. 553-558 (IEEE International Conference on Cybernetics and Intelligent Systems).

Houaoui, A. ; Lyyra, I. ; Agniel, R. ; Pauthe, E. ; Massera, J. ; Boissière, M. / **Dissolution, bioactivity and osteogenic properties of composites based on polymer and silicate or borosilicate bioactive glass.** In: Materials Science and Engineering C. 2019 ; Vol. 107.

Haiko, O. ; Heino, V. ; Porter, D. A. ; Uusitalo, J. ; Kömi, J. / **Effect of microstructure on the abrasive wear resistance of steels with hardness 450 HV.** In: Tribologia. 2019 ; Vol. 36, No. 1. pp. 54-57.

Suokas, Esa. / **Effect of polyolefin molecular structure on product properties in extrusion coating.** 17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. pp. 89-98

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

Valtonen, Kati ; Ratia, Vilma ; Ramakrishnan, Karthik Ram ; Apostol, Marian ; Terva, Juuso ; Kuokkala, Veli-Tapani. / **Impact wear and mechanical behavior of steels at subzero temperatures.** In: Tribology International. 2019 ; Vol. 129. pp. 476-493.

Gao, Qiang ; Linjama, Matti ; Paloniitty, Miika ; Zhu, Yuchuan. / **Investigation on positioning control strategy and switching optimization of an equal coded digital valve system.** In: Proceedings of the Institution of Mechanical Engineers. Part I: Journal of Systems and Control Engineering. 2019.

Cheng, Yu Chieh ; Lu, Hao Chuan ; Lee, Xuan ; Zeng, Hao ; Priimagi, Arri. / **Kirigami-Based Light-Induced Shape-Morphing and Locomotion.** In: Advanced Materials. 2019.

Lahti, Johanna. / **Market implementation of active and intelligent packaging-opportunities from a socio-economic perspective.** 17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. pp. 419-427

Liikanen, Henri ; Aref, Mohammad M. ; Mattila, Jouni. / **M-Estimator Application in Real-Time Sensor Fusion for Smooth Position Feedback of Heavy-Duty Field Robots.** Proceedings of the IEEE 2019 9th International Conference on Cybernetics and Intelligent Systems (CIS) and IEEE Conference on Robotics, Automation and Mechatronics (RAM). IEEE, 2019. pp. 368-373 (IEEE International Conference on Cybernetics and Intelligent Systems).

Lahti, Johanna. / **Nanocellulose and Polylactic Acid Based Multilayer Coatings for Barrier Applications.** 17th Biennial TAPPI European PLACE Conference 2019. TAPPI Press, 2019. pp. 446-455

Alanen, Jarmo ; Ruiz Morales, Emilio ; Muhammad, Ali ; Saarinen, Hannu ; Minkkinen, Joni. / **Remote diagnostics application software for remote handling equipment.** In: Fusion Engineering and Design. 2019.

Linjamaa, A. ; Lehtovaara, A. ; Kallio, M. ; Léger, A. / **Running-in effects on friction of journal bearings under slow sliding speeds.** In: Proceedings of the Institution of Mechanical Engineers, Part J: Journal of Engineering Tribology. 2019.

Matikainen, V. ; Rubio Peregrina, S. ; Ojala, N. ; Koivuluoto, H. ; Schubert, J. ; Houdková, ; Vuoristo, P. / **Slurry and dry particle erosion wear properties of WC-10Co4Cr and Cr<sub>3</sub>C<sub>2</sub>-25NiCr hardmetal coatings deposited by HVOF and HVOF spray processes**. In: Tribologia. 2019 ; Vol. 36, No. 1-2. pp. 58-61.

Lemougna, Patrick N. ; Yliniemi, Juho ; Ismailov, Arnold ; Levänen, Erkki ; Tanskanen, Pekka ; Kinnunen, Paivo ; Roning, Juha ; Illikainen, Mirja. / **Spodumene tailings for porcelain and structural materials : Effect of temperature (1050–1200°C) on the sintering and properties**. In: Minerals Engineering. 2019.

Linjama, Matti. / **Variable speed digital hydraulic transformer-based servo drive**. In: Proceedings of the Institution of Mechanical Engineers. Part I: Journal of Systems and Control Engineering. 2019.

Linjama, Matti. / **Variable speed drive with hydraulic boost**. In: International Journal of Fluid Power. 2019 ; Vol. 20, No. 1. pp. 99-123.

Czaplicki, Robert ; Kiviniemi, Antti ; Huttunen, Mikko J. ; Zang, Xiaorun ; Stolt, Timo ; Vartiainen, Ismo ; Butet, Jérémy ; Kuittinen, Markku ; Martin, Olivier J.F. ; Kauranen, Martti. / **Less Is More : Enhancement of Second-Harmonic Generation from Metasurfaces by Reduced Nanoparticle Density**. In: Nano Letters. 2018 ; Vol. 18, No. 12. pp. 7709-7714.

Ottosen, Niels Saabye ; Ristinmaa, Matti ; Kouhia, Reijo. / **Enhanced multiaxial fatigue criterion that considers stress gradient effects**. In: International Journal of Fatigue. 2018 ; Vol. 116. pp. 128-139.

Far, Mehrnaz Farzam ; Mustafa, Bilal ; Martin, Florian ; Rasilo, Paavo ; Belahcen, Anouar. / **Flux-Weakening Control for IPMSM Employing Model Order Reduction**. 2018 23rd International Conference on Electrical Machines, ICEM 2018. IEEE, 2018. pp. 1510-1516

Far, Mehrnaz Farzam ; Mukherjee, Victor ; Martin, Florian ; Rasilo, Paavo ; Belahcen, Anouar. / **Model Order Reduction of Bearingless Reluctance Motor Including Eccentricity**. 2018 23rd International Conference on Electrical Machines, ICEM 2018. IEEE, 2018. pp. 2243-2249

Niemelä-Anttonen, Henna ; Koivuluoto, Heli ; Tuominen, Mikko ; Teisala, Hannu ; Juuti, Paxton ; Haapanen, Janne ; Harra, Juha ; Stenroos, Christian ; Lahti, Johanna ; Kuusipalo, Jurkka ; Mäkelä, Jyrki M. ; Vuoristo, Petri. / **Icephobicity of Slippery Liquid Infused Porous Surfaces under Multiple Freeze–Thaw and Ice Accretion–Detachment Cycles**. In: Advanced Materials Interfaces. 2018 ; Vol. 5, No. 20.

Šutka, Andris ; Käämbre, Tanel ; Joost, Urmas ; Kooser, Kuno ; Kook, Mati ; Duarte, Roberto Felix ; Kisand, Vambola ; Maiorov, Mikhael ; Döbelin, Nicola ; Smits, Krisjanis. / **Solvothermal synthesis derived Co-Ga codoped ZnO diluted magnetic degenerated semiconductor nanocrystals**. In: Journal of Alloys and Compounds. 2018 ; Vol. 763. pp. 164-172.

Mäkinen, Petri ; Mononen, Teemu ; Mattila, Jouni. / **Inertial Sensor-Based State Estimation of Flexible Links Subject to Bending and Torsion**. 2018 14th IEEE/ASME International Conference on Mechatronic and Embedded Systems and Applications, MESA 2018. IEEE, 2018.

Teke, Burak ; Lanz, Minna ; Kämäräinen, Joni-Kristian ; Hietanen, Antti. / **Real-time and Robust Collaborative Robot Motion Control with Microsoft Kinect @ v2**. 2018 14th IEEE/ASME International Conference on Mechatronic and Embedded Systems and Applications, MESA 2018. IEEE, 2018.

Mahmoodpour, Mehdi ; Lobov, Andrei ; Lanz, Minna ; Mäkelä, Petteri ; Rundas, Niko. / **Role-based visualization of industrial IoT-based systems**. 2018 14th IEEE/ASME International Conference on Mechatronic and Embedded Systems and Applications, MESA 2018. IEEE, 2018.

Sippola, Petteri ; Kolehmainen, Jari ; Ozel, Ali ; Liu, Xiaoyu ; Saarenrinne, Pentti ; Sundaresan, Sankaran. / **Experimental and numerical study of wall layer development in a tribocharged fluidized bed**. In: Journal of Fluid Mechanics. 2018 ; Vol. 849. pp. 860-884.

Ghabcheloo, Reza ; Siddiqui, Shadman. / **Complete Odometry Estimation of a Vehicle Using Single Automotive Radar and a Gyroscope**. MED 2018 - 26th Mediterranean Conference on Control and Automation. IEEE, 2018. pp. 855-860

Sajna, M. S. ; Perumbilavil, Sreekanth ; Prakashan, V. P. ; Sanu, M. S. ; Joseph, Cyriac ; Biju, P. R. ; Unnikrishnan, N. V. / **Enhanced resonant nonlinear absorption and optical limiting in Er<sup>3+</sup> ions doped multicomponent tellurite glasses**. In: Materials Research Bulletin. 2018 ; Vol. 104. pp. 227-235.

Roldán Del Cerro, P. ; Salminen, T. ; Lastusaari, M. ; Petit, L. / **Persistent luminescent borosilicate glasses using direct particles doping method**. In: Scripta Materialia. 2018 ; Vol. 151. pp. 38-41.

Nommeots-Nomm, A. ; Boetti, N. G. ; Salminen, T. ; Massera, J. ; Hokka, M. ; Petit, L. / **Luminescence of Er<sup>3+</sup> doped oxyfluoride phosphate glasses and glass-ceramics**. In: Journal of Alloys and Compounds. 2018 ; Vol. 751. pp. 224-230.

Javaheri, Vahid ; Nyssönen, Tuomo ; Grande, Bjørnar ; Porter, David. / **Computational design of a novel medium-carbon, low-alloy steel microalloyed with niobium**. In: Journal of Materials Engineering and Performance. 2018 ; Vol. 27, No. 6. pp. 2978-2992.

Oluoti, Kehinde ; Doddapaneni, Tharaka Rama K.C. ; Richards, Tobias. / **Investigating the kinetics and biofuel properties of *Alstonia congensis* and *Ceiba pentandra* via torrefaction**. In: Energy. 2018 ; Vol. 150. pp. 134-141.

Koivusalo, Laura ; Karvinen, Jennika ; Sorsa, Eetu ; Jönkkäri, Ilari ; Väliäho, Jari ; Kallio, Pasi ; Ilmarinen, Tanja ; Miettinen, Susanna ; Skottman, Heli ; Kellomäki, Minna. / **Hydrazone crosslinked hyaluronan-based hydrogels for therapeutic delivery of adipose stem cells to treat corneal defects**. In: Materials Science and Engineering C. 2018 ; Vol. 85. pp. 68-78.

Mohammed, Wael M. ; Ramis Ferrer, Borja ; Iarovy, Sergii ; Negri, Elisa ; Fumagalli, Luca ; Lobov, Andrei ; Martinez Lastra, Jose L. / **Generic platform for manufacturing execution system functions in knowledge-driven manufacturing systems**. In: International Journal of Computer Integrated Manufacturing. 2018 ; pp. 1-13.

Krogerus, Tomi ; Hyvönen, Mika ; Huhtala, Kalevi. / **Analysis of common rail pressure signal of dual-fuel large industrial engine for identification of injection duration of pilot diesel injectors**. In: Fuel. 2018 ; Vol. 216. pp. 1-9.

Välilikangas, Turo ; Karvinen, Reijo. / **Conjugated Heat Transfer Simulation of a Fin-and-Tube Heat Exchanger**. In: Heat Transfer Engineering. 2018 ; Vol. 39, No. 13-14. pp. 1192-1200.

Soltani, Ayat ; Curtze, S. ; Lahti, J. ; Järvelä, K. ; Laurikka, J. ; Hokka, M. ; Kuokkala, V. T. / **Digital image correlation study of the deformation and functioning of the human heart during open-heart surgery**. Mechanics of Biological Systems, Materials and other topics in Experimental and Applied Mechanics - Proceedings of the 2017 Annual Conference on Experimental and Applied Mechanics. Vol. 4 Springer New York LLC, 2018. pp. 19-27 (Conference Proceedings of the Society for Experimental Mechanics).

Vazquez Fernandez, N. ; Isakov, M. ; Hokka, M. ; Kuokkala, V. T. / **Effects of adiabatic heating estimated from tensile tests with continuous heating**. Dynamic Behavior of Materials - Proceedings of the 2017 Annual Conference on Experimental and Applied Mechanics. Vol. 1 Springer New York LLC, 2018. pp. 1-7 (Conference Proceedings of the Society for Experimental Mechanics).

Vuorinen, E. ; Heino, V. ; Ojala, N. ; Haiko, O. ; Hedayati, A. / **Erosive-abrasive wear behavior of carbide-free bainitic and boron steels compared in simulated field conditions**. In: Proceedings of the Institution of Mechanical Engineers, Part J: Journal of Engineering Tribology. 2018 ; Vol. 232, No. 1. pp. 3-13.

Välilikangas, Turo ; Singh, Shobhana ; Sørensen, Kim ; Condra, Thomas. / **Fin-and-tube heat exchanger enhancement with a combined herringbone and vortex generator design**. In: International Journal of Heat and Mass Transfer. 2018 ; Vol. 118. pp. 602-616.

Coatanéa, Eric ; Wu, Di ; Tsarkov, Vadim ; Gary Wang, G. ; Modi, Siddhant ; Jafarian, Hesam. / **Knowledge-based artificial neural network (KB-ANN) in engineering : Associating functional architecture modeling, dimensional analysis and causal graphs to produce optimized topologies for KB-ANNs**. 38th Computers and Information in Engineering Conference. Vol. 1B-2018 The American Society of Mechanical Engineers ASME, 2018.

Zeng, Hao ; Wasylczyk, Piotr ; Wiersma, Diederik S. ; Priimagi, Arri. / **Light Robots: Bridging the Gap between Microrobotics and Photomechanics in Soft Materials**. In: Advanced Materials. 2018 ; Vol. 30, No. 24.

Doddapaneni, Tharaka Rama Krishna C. ; Praveenkumar, Ramasamy ; Tolvanen, Henrik ; Rintala, Jukka ; Konttinen, Jukka. / **Techno-economic evaluation of integrating torrefaction with anaerobic digestion**. In: Applied Energy. 2018 ; Vol. 213. pp. 272-284.

Jaurola, Miikka ; Hedin, Anders ; Tikkanen, Seppo ; Huhtala, Kalevi. / **TOpti : a flexible framework for optimising energy management for various ship machinery topologies**. In: Journal of Marine Science and Technology (Japan). 2018.

Teisala, Hannu ; Geyer, Florian ; Haapanen, Janne ; Juuti, Paxton ; Mäkelä, Jyrki M. ; Vollmer, Doris ; Butt, Hans Jürgen. / **Ultrafast Processing of Hierarchical Nanotexture for a Transparent Superamphiphobic Coating with Extremely Low Roll-Off Angle and High Impalement Pressure**. In: Advanced Materials. 2018 ; Vol. 30, No. 14.

Pyrhönen, Veli-Pekka ; Koivisto, Hannu ; Vilkkö, Matti. / **A Reduced-Order Two-Degree-of-Freedom Composite Nonlinear Feedback Control for a Rotary DC Servo Motor**. Proceedings of the 56th IEEE Conference on Decision and Control. Melbourne, Australia, 2017. pp. 2065-2071

Holmberg, Kenneth ; Kivikytö-Reponen, Päivi ; Härkisaari, Pirita ; Valtonen, Kati ; Erdemir, Ali. / **Global energy consumption due to friction and wear in the mining industry**. In: Tribology International. 2017 ; Vol. 115. pp. 116-139.

Layek, Rama K. ; Uddin, Md Elias ; Kim, Nam Hoon ; Tak Lau, Alan Kin ; Lee, Joong Hee. / **Noncovalent functionalization of reduced graphene oxide with pluronic F127 and its nanocomposites with gum arabic**. In: Composites Part B : Engineering. 2017 ; Vol. 128. pp. 155-163.

Heininen, Arttu ; Aaltonen, Jussi ; Koskinen, Kari T. / **Simulating the Drag Coefficient of a Spherical Autonomous Underwater Vehicle**. Proceedings of the 2nd Annual SMACC Research Seminar 2017. editor / Jussi Aaltonen ; Riikka Virkkunen ; Kari T. Koskinen ; Risto Kuivanen. Vol. 2 Tampere : Tampere University of Technology, 2017. pp. 53-56

Boardman, A. D. ; Alberucci, A. ; Assanto, G. ; Grimalsky, V. V. ; Kibler, B. ; McNiff, J. ; Nefedov, I. S. ; Rapoport, Yu G. ; Valagiannopoulos, C. A. / **Waves in hyperbolic and double negative metamaterials including rogues and solitons**. In: Nanotechnology. 2017 ; Vol. 28, No. 44.

Koivumäki, Janne ; Mattila, Jouni. / **Adaptive and nonlinear control of discharge pressure for variable displacement axial piston pumps**. In: Journal of Dynamic Systems, Measurement and Control: Transactions of the ASME. 2017 ; Vol. 139, No. 10.

Itävuori, Pekka ; Hulthén, Erik ; Vilkkö, Matti. / **Feed-hopper level estimation and control in cone crushers**. In: Minerals Engineering. 2017 ; Vol. 110. pp. 82-95.

Palagi, Stefano ; Mark, Andrew G. ; Melde, Kai ; Qiu, Tian ; Zeng, Hao ; Parmeggiani, Camilla ; Martella, Daniele ; Wiersma, Diederik S. ; Fischer, Peer. / **Locomotion of light-driven soft microrobots through a hydrogel via local melting**. International Conference on Manipulation, Automation and Robotics at Small Scales, MARSS 2017 - Proceedings. IEEE, 2017.

Kreutzer, Joose ; Viehrig, Marlitt ; Maki, Antti-Juhana ; Kallio, Pasi ; Rahikainen, Rolle ; Hytönen, Vesa. / **Pneumatically actuated elastomeric device for simultaneous mechanobiological studies & live-cell fluorescent microscopy**. International Conference on Manipulation, Automation and Robotics at Small Scales, MARSS 2017 - Proceedings. IEEE, 2017.



Laurila, M. M. ; Khorrarnadel, B. ; Dastpak, A. ; Mäntysalo, M. / **Statistical analysis of E-jet print parameter effects on Ag-nanoparticle ink droplet size**. In: Journal of Micromechanics and Microengineering. 2017 ; Vol. 27, No. 9.

Antin, Kim Niklas ; Pärnänen, Tuomas. / **Democratizing composites manufacturing -inexpensive tooling empowers new players**. In: SAMPE Journal. 2017 ; Vol. 53, No. 4. pp. 6-10.

Kivelä, Tuomo ; Mattila, Jouni ; Puura, Jussi ; Launis, Sirpa. / **Redundant robotic manipulator path planning for real-time obstacle and self-collision avoidance**. Advances in Service and Industrial Robotics: Proceedings of the 26th International Conference on Robotics in Alpe-Adria-Danube Region, RAAD 2017. editor / Carlo Ferraresi ; Giuseppe Quaglia. Springer International Publishing, 2017. pp. 208-216 (Mechanisms and Machine Science).

Stoykova, Elena ; Berberova, Natalia ; Kim, Youngmin ; Nazarova, Dimana ; Ivanov, Branimir ; Gotchev, Atanas ; Hong, Jisoo ; Kang, Hoonjong. / **Dynamic speckle analysis with smoothed intensity-based activity maps**. In: Optics and Lasers in Engineering. 2017 ; Vol. 93. pp. 55-65.

Laakkonen, P. ; Quadrat, A. / **A fractional representation approach to the robust regulation problem for SISO systems**. In: Systems and Control Letters. 2017 ; Vol. 103. pp. 32-37.

Lanz, M. ; Tuokko, R. / **Concepts, methods and tools for individualized production**. In: PRODUCTION ENGINEERING. 2017 ; Vol. 11, No. 2. pp. 205-212.

Seppi, Tiina ; Airaksinen, Miimu ; Saari, Arto. / **Effect of energy measures on the values of energy efficiency indicators in Finnish daycare and school buildings**. In: Energy and Buildings. 2017 ; Vol. 139. pp. 124-132.

Mashayekhi, Mohammad ; Winchester, Lee ; Laurila, Mika-Matti ; Mäntysalo, Matti ; Ogier, Simon ; Terés, Lluís ; Carrabina, Jordi. / **Chip-by-chip configurable interconnection using digital printing techniques**. In: Journal of Micromechanics and Microengineering. 2017 ; Vol. 27, No. 4.

Seidt, J. D. ; Kuokkala, V.-T. ; Smith, J. L. ; Gilat, A. / **Synchronous Full-Field Strain and Temperature Measurement in Tensile Tests at Low, Intermediate and High Strain Rates**. In: Experimental Mechanics. 2017 ; Vol. 57, No. 2. pp. 219-229.

Suokas, Esa. / **Effect of air gap on the adhesion of PET layer on cardboard substrate in extrusion coating**. 16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017. pp. 529-544

Lahti, Johanna ; Kampuri, Taina ; Kuusipalo, Jurkka. / **Novel bio-based materials for active and intelligent packaging**. 16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017.

Lahti, Johanna ; Kuusipalo, Jurkka ; Auvinen, Sanna. / **Novel equipment to simulate hot air heat sealability of packaging materials**. 16th TAPPI European PLACE Conference 2017. TAPPI Press, 2017. pp. 237-248

Kuusipalo, Jurkka ; Lahti, Johanna. / **Tampere University of Technology, laboratory of materials science, paper converting and packaging technology Tampere, Finland**. 16th TAPPI European PLACE Conference 2017: Basel; Switzerland; 22 May 2017 through 24 May 2017. Vol. May-2017 TAPPI Press, 2017.

Isotahdon, Elisa ; Huttunen-Saarivirta, Elina ; Kuokkala, Veli. / **Characterization of the microstructure and corrosion performance of Ce-alloyed Nd-Fe-B magnets**. In: Journal of Alloys and Compounds. 2017 ; Vol. 692. pp. 190-197.

Huova, Mikko ; Aalto, Arttu ; Linjama, Matti ; Huhtala, Kalevi ; Lantela, Tapio ; Pietola, Matti. / **Digital hydraulic multi-pressure actuator – the concept, simulation study and first experimental results**. In: International Journal of Fluid Power. 2017 ; Vol. 18, No. 3. pp. 141-152.

Wu, Di ; Coatanea, Eric ; Wang, G. Gary. / **Dimension reduction and decomposition using causal graph and qualitative analysis for aircraft concept design optimization**. 43rd Design Automation Conference. The American Society of Mechanical Engineers ASME, 2017.

Wang, Xiaoju ; Fagerlund, Susanne ; Massera, Jonathan ; Södergård, Berndt ; Hupa, Leena. / **Do properties of bioactive glasses exhibit mixed alkali behavior?**. In: Journal of Materials Science. 2017 ; Vol. 52, No. 15. pp. 8986–8997.

Haiko, O. ; Miettunen, I. ; Porter, D. ; Ojala, N. ; Ratia, V. ; Heino, V. ; Kemppainen, A. / **Effect of finish rolling and quench stop temperatures on impact-abrasive wear resistance of 0.35 % carbon direct-quenched steel**. In: Tribologia. 2017 ; Vol. 35, No. 1-2. pp. 5-21.

Mikkonen, Antti ; Karvinen, Reijo. / **Heat Transfer of Impinging Jet : Effect of Compressibility and Turbulent Kinetic Energy Production**. IX International Conference on Computational Heat and Mass Transfer (ICCHMT 2016) . 2017.

Lindroos, Matti ; Laukkanen, Anssi ; Cailletaud, Georges ; Kuokkala, Veli-Tapani. / **On the effect of deformation twinning and microstructure to strain hardening of high manganese austenitic steel 3D microstructure aggregates at large strains**. In: International Journal of Solids and Structures. 2017 ; Vol. 125. pp. 68-76.

Taddeo, Raffaele ; Prajapati, Sumitra ; Lepistö, Raghida. / **Optimizing ammonium adsorption on natural zeolite for wastewaters with high loads of ammonium and solids**. In: Journal of Porous Materials. 2017 ; Vol. 24, No. 6. pp. 1545–1554.

Koivuluoto, Heli ; Milanti, Andrea ; Bolelli, Giovanni ; Latokartano, Jyrki ; Marra, Francesco ; Pulci, Giovanni ; Vihinen, Jorma ; Lusvardi, Luca ; Vuoristo, Petri. / **Structures and properties of laser-assisted cold-sprayed aluminum coatings**. THERMEC 2016. Vol. 879 Trans Tech Publications Ltd, 2017. pp. 984-989 (Materials Science Forum).

Mishra, A. ; Petit, L. ; Pihl, M. ; Andersson, M. ; Salminen, T. ; Rocherullé, J. ; Massera, J. / **Thermal, structural and in vitro dissolution of antimicrobial copper-doped and slow resorbable iron-doped phosphate glasses**. In: Journal of Materials Science. 2017 ; Vol. 52, No. 15. pp. 8957–8972.

Hintikka, Jouko ; Lehtovaara, Arto ; Mäntylä, Antti. / **Third Particle Ejection Effects on Wear with Quenched and Tempered Steel Fretting Contact**. In: TRIBOLOGY TRANSACTIONS. 2017 ; Vol. 60, No. 1. pp. 70-78.

Barreca, Davide ; Carraro, Giorgio ; Gasparotto, Alberto ; Maccato, Chiara ; Altantzis, Thomas ; Sada, Cinzia ; Kaunisto, Kimmo ; Ruoko, Tero-Petri ; Bals, Sara. / **Vapor Phase Fabrication of Nanoheterostructures Based on ZnO for Photoelectrochemical Water Splitting**. In: Advanced Materials Interfaces. 2017 ; Vol. 4, No. 18.

Carfora, D. ; Gironimo, G. Di ; Esposito, G. ; Huhtala, K. ; Määttä, T. ; Mäkinen, H. ; Micciché, G. ; Mozzillo, R. / **Multicriteria selection in concept design of a divertor remote maintenance port in the EU DEMO reactor using an AHP participative approach**. In: Fusion Engineering and Design. 2016 ; Vol. 112. pp. 324-331.

Juoksukangas, Janne ; Lehtovaara, Arto ; Mäntylä, Antti. / **Experimental and numerical investigation of fretting fatigue behavior in bolted joints**. In: Tribology International. 2016 ; Vol. 103. pp. 440-448.

Järvinen, Henri ; Isakov, Matti ; Nyyssönen, Tuomo ; Järvenpää, Martti ; Peura, Pasi. / **The effect of initial microstructure on the final properties of press hardened 22MnB5 steels**. In: Materials Science and Engineering A: Structural Materials Properties Microstructure and Processing. 2016 ; Vol. 676. pp. 109-120.

Juoksukangas, J. ; Lehtovaara, A. ; Mäntylä, A. / **A comparison of relative displacement fields between numerical predictions and experimental results in fretting contact**. In: Proceedings of the institution of Mechanical Engineers Part J: Journal of Engineering Tribology. 2016 ; Vol. 230, No. 10. pp. 1273-1287.

Sekki, Tiina ; Andelin, Mia ; Airaksinen, Miimu ; Saari, Arto. / **Consideration of energy consumption, energy costs, and space occupancy in Finnish daycare centres and school buildings.** In: Energy and Buildings. 2016 ; Vol. 129. pp. 199-206.

Mikkonen, Antti ; Karvinen, Reijo. / **Solar Panel Breakage During Heavy Rain Caused by Thermal Stress.** Engineered Transparency 2016: Glass in Architecture and Structural Engineering. Wiley, 2016.

Lindgren, M. ; Santa-aho, S. ; Vippola, M. / **Barkhausen noise response of three different welded duplex stainless steels.** In: Insight. 2016 ; Vol. 58, No. 9. pp. 480-486.

Ellman, Asko ; Wendrich, Robert ; Tiainen, Tarja. / **Framework and feasibility study for pairwise comparison tool.** Proceedings of the ASME 2016 Computers and Information in Engineering Conference IDETC/CIE 2016. Charlotte, North Carolina : ASME, 2016.

Luna, E. ; Wu, M. ; Hanke, M. ; Puustinen, J. ; Guina, M. ; Trampert, A. / **Spontaneous formation of three-dimensionally ordered Bi-rich nanostructures within GaAs<sub>1-x</sub>Bi<sub>x</sub>/GaAs quantum wells.** In: Nanotechnology. 2016 ; Vol. 27, No. 32.

Rodríguez Ripoll, Manel ; Ojala, Niko ; Katsich, Christian ; Totolin, Vladimir ; Tomastik, Christian ; Hradil, Klaudia. / **The role of niobium in improving toughness and corrosion resistance of high speed steel laser hardfacings.** In: Materials and Design. 2016 ; Vol. 99. pp. 509-520.

Philippi, P. C. ; Siebert, D. N. ; Hegele, L. A. ; Mattila, K. K. / **High-order lattice-Boltzmann.** In: Journal of the Brazilian Society of Mechanical Sciences and Engineering. 2016 ; Vol. 38, No. 5. pp. 1401-1419.

Kuzmin, Mikhail ; Laukkanen, Pekka ; Mäkelä, Jaakko ; Yasir, Muhammad ; Tuominen, Marjukka ; Dahl, Johnny ; Punkkinen, Marko P J ; Kokko, Kalevi ; Hedman, Hannu Pekka ; Moon, Jongyun ; Punkkinen, Risto ; Lastusaari, Mika ; Polojärvi, Ville ; Korpjärvi, Ville-Markus ; Guina, Mircea. / **Toward the Atomically Abrupt Interfaces of SiO<sub>x</sub>/Semiconductor Junctions.** In: Advanced Materials Interfaces. 2016 ; Vol. 3, No. 11.

Janka, Leo ; Norpoth, Jonas ; Eicher, Stefan ; Rodríguez Ripoll, Manel ; Vuoristo, Petri. / **Improving the toughness of thermally sprayed Cr<sub>3</sub>C<sub>2</sub>-NiCr hardmetal coatings by laser post-treatment.** In: Materials and Design. 2016 ; Vol. 98. pp. 135-142.

Hokka, M. ; Black, J. ; Tkalich, D. ; Fourmeau, M. ; Kane, A. ; Hoang, N. H. ; Li, C. C. ; Chen, W. W. ; Kuokkala, V.-T. / **Effects of strain rate and confining pressure on the compressive behavior of Kuru granite.** In: International Journal of Impact Engineering. 2016 ; Vol. 91. pp. 183-193.

Kanerva, Ulla ; Karhu, Marjaana ; Lagerbom, Juha ; Kronlöf, Anna ; Honkanen, Mari ; Turunen, Erja ; Laitinen, Tarja. / **Chemical synthesis of WC-Co from water-soluble precursors : The effect of carbon and cobalt additions to WC synthesis.** In: International Journal of Refractory Metals and Hard Materials. 2016 ; Vol. 56. pp. 69-75.

Korkiakoski, Samuli ; Brøndsted, Povl ; Sarlin, Essi ; Saarela, Olli. / **Influence of specimen type and reinforcement on measured tension-tension fatigue life of unidirectional GFRP laminates.** In: International Journal of Fatigue. 2016 ; Vol. 85. pp. 114-129.

Andersson, P. ; Kilpi, L. ; Holmberg, K. ; Vaajoki, A. ; Oksanen, V. / **Static friction measurements on steel against uncoated and coated cast iron.** In: Tribologia. 2016 ; Vol. 34, No. 1-2. pp. 5-40.

Paris, Henri ; Mokhtarian, Hossein ; Coatanéa, Eric ; Museau, Matthieu ; Ituarte, Inigo Flores. / **Comparative environmental impacts of additive and subtractive manufacturing technologies.** In: CIRP Annals: Manufacturing Technology. 2016 ; Vol. 65, No. 1. pp. 29-32.

Hartikainen, Juha ; Kolari, Kari ; Kouhia, Reijo. / **Development and numerical implementation of an anisotropic continuum damage model for concrete**. Advances in Fracture and Damage Mechanics XV. Trans Tech Publications Ltd, 2016. pp. 115-118 (Key Engineering Materials).

Hokka, Mikko ; Mirow, Nikolas ; Nagel, Horst ; Vogt, Sebastian ; Kuokkala, Veli-Tapani. / **DIC measurements of the human heart during cardiopulmonary bypass surgery**. Conference Proceedings of the Society for Experimental Mechanics Series. Vol. 6 Springer New York LLC, 2016. pp. 51-59

Hilliaho, Kimmo ; Kõliõ, Arto ; Pakkala, Toni ; Lahdensivu, Jukka ; Vinha, Juha. / **Effects of added glazing on Balcony indoor temperatures : Field measurements**. In: Energy and Buildings. 2016 ; Vol. 128. pp. 458-472.

Mäkinen, Jari ; Fränti, Keijo ; Korhonen, Matti ; Fillion, Joshua ; Heinisuo, Markku. / **End-plate connections in Bi-axial bending - Measurements**. 13th International Aluminium Conference, Sustainability, Durability and Structural Advantages, : INALCO 2016; Naples; Italy; 21 September 2016 through 23 September 2016. editor / F. M. Mazzolani ; A. Squillace ; B. Faggiano ; F. Bellucci . Vol. 710 Trans Tech Publications Ltd, 2016. pp. 275-280 (Key Engineering Materials).

Lahti, Johanna. / **Nanoscale barrier coating on BOPP packaging film by ALD**. TAPPI PLACE Conference 2016: Exploring New Frontiers. TAPPI Press, 2016. pp. 493-505

Hintikka, Jouko ; Lehtovaara, Arto ; Mäntylä, Antti. / **Normal displacements in non-Coulomb friction conditions during fretting**. In: Tribology International. 2016 ; Vol. 94. pp. 633-639.

Bolelli, Giovanni ; Milanti, Andrea ; Lusvardi, Luca ; Trombi, Lorenzo ; Koivuluoto, Heli ; Vuoristo, Petri. / **Wear and impact behaviour of High Velocity Air-Fuel sprayed Fe-Cr-Ni-B-C alloy coatings**. In: Tribology International. 2016 ; Vol. 95. pp. 372-390.

Ihalainen, Teemu O. ; Aires, Lina ; Herzog, Florian A. ; Schwartlander, Ruth ; Moeller, Jens ; Vogel, Viola. / **Differential basal-to-apical accessibility of lamin A/C epitopes in the nuclear lamina regulated by changes in cytoskeletal tension**. In: Nature Materials. 2015 ; Vol. 14, No. 12. pp. 1252-1261.

Fedorik, Filip ; Malaska, Mikko ; Hannila, Raimo ; Haapala, Antti. / **Improving the thermal performance of concrete-sandwich envelopes in relation to the moisture behaviour of building structures in boreal conditions**. In: Energy and Buildings. 2015 ; Vol. 107. pp. 226-233.

Bourhis, Kevin ; Massera, Jonathan ; Petit, Laetitia ; Koponen, Joonas ; Fargues, Alexandre ; Cardinal, Thierry ; Hupa, Leena ; Hupa, Mikko ; Dussauze, Marc ; Rodriguez, Vincent ; Ferraris, Monica. / **Erbium-doped borosilicate glasses containing various amounts of P<sub>2</sub>O<sub>5</sub> and Al<sub>2</sub>O<sub>3</sub> : Influence of the silica content on the structure and thermal, physical, optical and luminescence properties**. In: Materials Research Bulletin. 2015 ; Vol. 70. pp. 47-54.

Sekki, Tiina ; Airaksinen, Miimu ; Saari, Arto. / **Impact of building usage and occupancy on energy consumption in Finnish daycare and school buildings**. In: Energy and Buildings. 2015 ; Vol. 105. pp. 247-257.

Gashti, E. Hassani Nezhad ; Malaska, M. ; Kujala, K. / **Analysis of thermo-active pile structures and their performance under groundwater flow conditions**. In: Energy and Buildings. 2015 ; Vol. 105. pp. 1-8.

Syrjärinne, Paula ; Nummenmaa, Jyrki ; Thanisch, Peter ; Kerminen, Riitta ; Hakulinen, Esa. / **Analysing traffic fluency from bus data**. In: IET Intelligent Transport Systems. 2015 ; Vol. 9, No. 6. pp. 566-572.

Haaparanta, Anne-Marie ; Uppstu, Peter ; Hannula, Markus ; Ellä, Ville ; Rosling, Ari ; Kellomäki, Minna. / **Improved dimensional stability with bioactive glass fibre skeleton in poly(lactide-co-glycolide) porous scaffolds for tissue engineering**. In: Materials Science and Engineering C: Materials for Biological Applications. 2015 ; Vol. 56. pp. 457-466.

Hakkarainen, T. V. ; Schramm, A. ; Mäkelä, J. ; Laukkanen, P. ; Guina, M. / **Lithography-free oxide patterns as templates for self-catalyzed growth of highly uniform GaAs nanowires on Si(111)**. In: Nanotechnology. 2015 ; Vol. 26, No. 27.

Carfora, D. ; Di Gironimo, G. ; Järvenpää, J. ; Huhtala, K. ; Määttä, T. ; Siuko, M. / **Divertor remote handling for DEMO : Concept design and preliminary FMECA studies.** In: Fusion Engineering and Design. 2015 ; Vol. 98-99. pp. 1437-1441.

Hintikka, Jouko ; Lehtovaara, Arto ; Mäntylä, Antti. / **Fretting-induced friction and wear in large flat-on-flat contact with quenched and tempered steel.** In: Tribology International. 2015 ; Vol. 92. pp. 191-202.

Mendes, Miguel Rodrigues ; Subramaniyam, Narayan Puthanmadam ; Wendel-Mitoraj, Katrina. / **Evaluating the electrode measurement sensitivity of subdermal electroencephalography electrodes.** International IEEE/EMBS Conference on Neural Engineering, NER. Vol. 2015-July IEEE COMPUTER SOCIETY PRESS, 2015. pp. 1092-1095

Tanskanen, Jarno M. A. ; Kapucu, Fikret E. ; Hyttinen, Jari A. K. / **On the threshold based neuronal spike detection, and an objective criterion for setting the threshold.** International IEEE/EMBS Conference on Neural Engineering, NER. IEEE COMPUTER SOCIETY PRESS, 2015. pp. 1016-1019

Subramaniyam, Narayan Puthanmadam ; Hyttinen, Jari ; Hatsopoulos, Nicholas G. ; Takahashi, Kazutaka. / **Recurrence network analysis of wide band oscillations of local field potentials from the primary motor cortex reveals rich dynamics.** International IEEE/EMBS Conference on Neural Engineering, NER. IEEE COMPUTER SOCIETY PRESS, 2015. pp. 960-963

Le, Taoran ; Lin, Ziyin ; Wong, C. P. ; Tentzeris, M. M. / **Smart Skins : Could they be the ultimate sensing tool? Today's FFDDs industry and personal medical care both strongly demand accurate, reliable, robust, lo.** In: IEEE Nanotechnology Magazine. 2015 ; Vol. 9, No. 2. pp. 4-10.

Wu, Haosheng ; Sariola, Veikko ; Zhu, Congcong ; Zhao, Jingsi ; Sitti, Metin ; Bettinger, Christopher J. / **Transfer printing of metallic microstructures on adhesion-promoting hydrogel substrates.** In: Advanced Materials. 2015 ; Vol. 27, No. 22. pp. 3398-3404.

Isotahdon, E. ; Huttunen-Saarivirta, E. ; Heinonen, S. ; Kuokkala, V. T. ; Paju, M. / **Corrosion mechanisms of sintered Nd-Fe-B magnets in the presence of water as vapour, pressurised vapour and liquid.** In: Journal of Alloys and Compounds. 2015 ; Vol. 626. pp. 349-359.

Bautista, Godofredo ; Mäkitalo, Jouni ; Chen, Ya ; Dhaka, Veer ; Grasso, Marco ; Karvonen, Lasse ; Jiang, Hua ; Huttunen, Mikko J. ; Huhtio, Teppo ; Lipsanen, Harri ; Kauranen, Martti. / **Second-harmonic generation imaging of semiconductor nanowires with focused vector beams.** In: Nano Letters. 2015 ; Vol. 15, No. 3. pp. 1564-1569.

Ratia, Vilma ; Rojacz, Harald ; Terva, Juuso ; Valtonen, Kati ; Badisch, Ewald ; Kuokkala, Veli Tapani. / **Effect of Multiple Impacts on the Deformation of Wear-Resistant Steels.** In: Tribology Letters. 2015 ; Vol. 57, No. 2.

Czaplicki, R. ; Mäkitalo, J. ; Siikanen, R. ; Husu, H. ; Lehtolahti, J. ; Kuitinen, M. ; Kauranen, M. / **Second-Harmonic Generation from Metal Nanoparticles : Resonance Enhancement versus Particle Geometry.** In: Nano Letters. 2015 ; Vol. 15, No. 1. pp. 530-534.

Mettänen, Marja ; Hirn, Ulrich. / **A comparison of five optical surface topography measurement methods.** In: TAPPI Journal. 2015 ; Vol. 14, No. 1. pp. 27-38.

Sekki, Tiina ; Airaksinen, Miimu ; Saari, Arto. / **Measured energy consumption of educational buildings in a Finnish city.** In: Energy and Buildings. 2015 ; Vol. 87. pp. 105-115.

Martinez, Francisco ; Neculqueo, Gloria ; Vasquez, Sergio O. ; Lemmetyinen, Helge ; Efimov, Alexander ; Vivo, Paola. / **Branched thiophene oligomer/polymer bulk heterojunction organic solar cell.** Materials Research Society Symposium Proceedings. Vol. 1737 MATERIALS RESEARCH SOCIETY, 2015. pp. 19-25

Palazzo, Gerardo ; De Tullio, Donato ; Magliulo, Maria ; Mallardi, Antonia ; Intranuovo, Francesca ; Mulla, Mohammad Yusuf ; Favia, Pietro ; Vikholm-Lundin, Inger ; Torsi, Luisa. / **Detection beyond Debye's length with an electrolyte-gated organic field-effect transistor**. In: Advanced Materials. 2015 ; Vol. 27, No. 5. pp. 911-916.

Lindroos, Matti ; Apostol, Marian ; Kuokkala, Veli Tapani ; Laukkanen, Anssi ; Valtonen, Kati ; Holmberg, Kenneth ; Oja, Olli. / **Experimental study on the behavior of wear resistant steels under high velocity single particle impacts**. In: International Journal of Impact Engineering. 2015 ; Vol. 78. pp. 114-127.

Barreca, Davide ; Carraro, Giorgio ; Gasparotto, Alberto ; Maccato, Chiara ; Warwick, Michael E A ; Kaunisto, Kimmo ; Sada, Cinzia ; Turner, Stuart ; Gönüllü, Yakup ; Ruoko, Tero-Petri ; Borgese, Laura ; Bontempi, Elza ; Van Tendeloo, Gustaaf ; Lemmetyinen, Helge ; Mathur, Sanjay. / **Fe<sub>2</sub>O<sub>3</sub>-TiO<sub>2</sub> Nano-heterostructure Photoanodes for Highly Efficient Solar Water Oxidation**. In: Advanced Materials Interfaces. 2015 ; Vol. 2, No. 17.

Hokka, M. ; Östman, K. ; Rämö, J. ; Kuokkala, V. T. / **High Temperature Tension HSB Device Based on Direct Electrical Heating**. Dynamic Behavior of Materials, Volume 1: Proceedings of the 2014 Annual Conference on Experimental and Applied Mechanics. editor / Bo Song ; Daniel Casem ; Jamie Kimberley. Vol. 65 Springer, 2015. pp. 227-233 (Conference Proceedings of the Society for Experimental Mechanics Series).

Pylkkänen, Kari ; Nurmikolu, Antti ; Guthrie, W. Spencer ; Argyle, Hillary M. / **Measurements and Modeling of Frost Depth in Railway Tracks**. Proceedings of the International Conference on Cold Regions Engineering: 16th International Conference on Cold Regions Engineering 2015. American Society of Civil Engineers ASCE, 2015. pp. 123-134

Mäkelä, Jyrki M. ; Haapanen, Janne ; Aromaa, Mikko ; Teisala, Hannu ; Tuominen, Mikko ; Stepien, Milena ; Saarinen, Jarkko J. ; Toivakka, Martti ; Kuusipalo, Jurkka. / **Roll-to-roll coating by liquid flame spray nanoparticle deposition**. Materials Research Society Symposium Proceedings. Vol. 1747 MATERIALS RESEARCH SOCIETY, 2015. pp. 37-42

Björling, M. ; Miettinen, J. ; Marklund, P. ; Lehtovaara, A. ; Larsson, R. / **The correlation between gear contact friction and ball on disc friction measurements**. In: Tribology International. 2015 ; Vol. 83. pp. 114-119.

Lindroos, Matti ; Apostol, Marian ; Heino, Vuokko ; Valtonen, Kati ; Laukkanen, Anssi ; Holmberg, Kenneth ; Kuokkala, Veli Tapani. / **The deformation, strain hardening, and wear behavior of chromium-alloyed hadfield steel in abrasive and impact conditions**. In: Tribology Letters. 2015 ; Vol. 57, No. 3.

Seppälä, Jari ; Salmenperä, Mikko. / **Towards dependable automation**. Cyber Security: Analytics, Technology and Automation: Part IV. Springer International Publishing, 2015. pp. 229-249 (Intelligent Systems, Control and Automation: Science and Engineering).

Sariola, Veikko ; Sitti, Metin. / **Mechanically Switchable Elastomeric Microfibrillar Adhesive Surfaces for Transfer Printing**. In: Advanced Materials Interfaces. 2014 ; Vol. 1, No. 4.

Borah, Dipu ; Rasappa, Sozaraj ; Senthamarai Kannan, Ramsankar ; Holmes, Justin D. ; Morris, Michael A. / **Graphoepitaxial Directed Self-Assembly of Polystyrene-Block-Polydimethylsiloxane Block Copolymer on Substrates Functionalized with Hexamethyldisilazane to Fabricate Nanoscale Silicon Patterns**. In: Advanced Materials Interfaces. 2014 ; Vol. 1, No. 3.

Teisala, Hannu ; Tuominen, Mikko ; Kuusipalo, Jurkka. / **Superhydrophobic Coatings on Cellulose-Based Materials : Fabrication, Properties, and Applications**. In: Advanced Materials Interfaces. 2014 ; Vol. 1, No. 1. pp. 1-20.

Saintsing, Christy D. ; Cook, Benjamin S. ; Tentzeris, Manos M. / **An origami inspired reconfigurable spiral antenna**. 38th Mechanisms and Robotics Conference. Vol. 5B The American Society of Mechanical Engineers ASME, 2014.

Coatanéa, Eric ; Nonsiri, Sarayut ; Christophe, Francois ; Mokammel, Faisal. / **Graph based representation and analyses for conceptual stages**. 34th Computers and Information in Engineering Conference. Vol. 1A The American Society of Mechanical Engineers ASME, 2014.

Tzounis, Lazaros ; Debnath, Subhas ; Rooj, Sandip ; Fischer, Dieter ; Mäder, Edith ; Das, Amit ; Stamm, Manfred ; Heinrich, Gert. / **High performance natural rubber composites with a hierarchical reinforcement structure of carbon nanotube modified natural fibers.** In: Materials and Design. 2014 ; Vol. 58. pp. 1-11.

Lahti, Johanna ; Johansson, Petri ; Lahtinen, Kimmo ; Cameron, David C. ; Seppänen, Tarja. / **Improving the effect of nanoscale barrier coating on BOPP film properties : Influence of substrate contamination, web handling and pretreatments** . TAPPI PLACE Conference 2014. Vol. 2 TAPPI Press, 2014. pp. 1039-1061

Gordon, Thomas R. ; Paik, Taejong ; Klein, Dahlia R. ; Naik, Gururaj V. ; Caglayan, Humeyra ; Boltasseva, Alexandra ; Murray, Christopher B. / **Shape-dependent plasmonic response and directed self-assembly in a new semiconductor building block, indium-doped cadmium oxide (ICO).** In: Nano Letters. 2013 ; Vol. 13, No. 6. pp. 2857-2863.

Colace, L. ; Santoni, F. ; Assanto, G. / **A near-infrared optoelectronic approach to detection of road conditions.** In: Optics and Lasers in Engineering. 2013 ; Vol. 51, No. 5. pp. 633-636.

Liimatainen, Ville ; Sariola, Veikko ; Zhou, Quan. / **Controlling liquid spreading using microfabricated undercut edges.** In: Advanced Materials. 2013 ; Vol. 25, No. 16. pp. 2275-2278.

Magliulo, Maria ; Mallardi, Antonia ; Mulla, Mohammad Yusuf ; Cotrone, Serafina ; Pistillo, Bianca Rita ; Favia, Pietro ; Vikholm-Lundin, Inger ; Palazzo, Gerardo ; Torsi, Luisa. / **Electrolyte-gated organic field-effect transistor sensors based on supported biotinylated phospholipid bilayer.** In: Advanced Materials. 2013 ; Vol. 25, No. 14. pp. 2090-2094.

Cochrane, Cédric ; Mordon, Serge R. ; Lesage, Jean Claude ; Koncar, Vladan. / **New design of textile light diffusers for photodynamic therapy.** In: Materials Science and Engineering C: Materials for Biological Applications. 2013 ; Vol. 33, No. 3. pp. 1170-1175.

Rasappa, Sozaraj ; Borah, Dipu ; Faulkner, Colm C. ; Lutz, Tarek ; Shaw, Matthew T. ; Holmes, Justin D. ; Morris, Michael A. / **Fabrication of a sub-10 nm silicon nanowire based ethanol sensor using block copolymer lithography.** In: Nanotechnology. 2013 ; Vol. 24, No. 6.

Farman, Aaron T. ; Hong, Sung Hoon ; Caglayan, Humeyra ; Ye, Xingchen ; Diroll, Benjamin T. ; Paik, Taejong ; Engheta, Nader ; Murray, Christopher B. ; Kagan, Cherie R. / **Chemically tailored dielectric-to-metal transition for the design of metamaterials from nanoimprinted colloidal nanocrystals.** In: Nano Letters. 2013 ; Vol. 13, No. 2. pp. 350-357.

Debnath, Subhas Ch ; Das, Amit ; Basu, Debdipta ; Heinrich, G. / **Naturally occurring amino acids : A suitable substitute of N-N-di-phenyl guanidine (DPG) in silica tyre formulation?** In: KGK: KAUTSCHUK GUMMI KUNSTSTOFFE. 2013 ; Vol. 66, No. 1-2. pp. 25-31.

Lahtinen, Kimmo ; Lahti, Johanna ; Johansson, Petri ; Seppänen, Tarja ; Cameron, David C. / **Improving the effect of a nanoscale barrier coating on BOPP film properties by surface pretreatments.** 14th European PLACE Conference 2013. Vol. 1 TAPPI Press, 2013. pp. 469-493

Ronkainen, Helena ; Kanerva, Ulla ; Varis, Tommi ; Ruusuvoori, Kimmo ; Turunen, Erja ; Peräntie, Jani ; Putaala, Jussi ; Juuti, Jari ; Jantunen, Heli. / **Materials for electronics by thermal spraying.** Physical and Numerical Simulation of Materials Processing VII. Vol. 762 2013. pp. 451-456 (Materials Science Forum).

Alatalo, Matti ; Pitkänen, Heikki ; Ropo, Matti ; Kokko, Kalevi ; Vitos, Levente. / **Modeling of steels and steel surfaces using quantum mechanical first principles methods.** Physical and Numerical Simulation of Materials Processing VII. Vol. 762 2013. pp. 445-450 (Materials Science Forum).

Mokammel, Faisal ; Coatanea, Eric ; Christophe, Francois ; Ba Khouya, Mohamed ; Medyna, Galina. / **Towards an approach for evaluating the quality of requirements.** 33rd Computers and Information in Engineering Conference. Vol. 2 B American Society of Mechanical Engineers, 2013.

Wang, Heyun ; Feng, Yakai ; Fang, Zichen ; Yuan, Wenjie ; Khan, Musamir. / **Co-electrospun blends of PU and PEG as potential biocompatible scaffolds for small-diameter vascular tissue engineering**. In: Materials Science and Engineering C: Materials for Biological Applications. 2012 ; Vol. 32, No. 8. pp. 2306-2315.

Kouhia, Reijo ; Tůma, Miroslav ; Mäkinen, Jari ; Fedoroff, Alexis ; Marjamäki, Heikki. / **Implementation of a direct procedure for critical point computations using preconditioned iterative solvers**. In: Computers & Structures. 2012 ; Vol. 108-109. pp. 110-117.

Subramaniam, Kalaivani ; Das, Amit ; Heinrich, Gert. / **Highly conducting polychloroprene composites based on multi-walled carbon nanotubes and 1-butyl 3-methyl imidazolium bis(trifluoromethylsulphonyl)imide**. In: KGK: KAUTSCHUK GUMMI KUNSTSTOFFE. 2012 ; Vol. 65, No. 7-8. pp. 44-46.

Ahmed, Rumman ; Priimagi, Arri ; Faul, Charl F J ; Manners, Ian. / **Redox-active, organometallic surface-relief gratings from azobenzene-containing polyferrocenylsilane block copolymers**. In: Advanced Materials. 2012 ; Vol. 24, No. 7. pp. 926-931.

Caraffi, Claudio ; Vojir, Tomáš ; Trefný, Jiří ; Šochman, Jan ; Matas, Jiří. / **A system for real-time detection and tracking of vehicles from a single car-mounted camera**. 2012 15th International IEEE Conference on Intelligent Transportation Systems, ITSC 2012. 2012. pp. 975-982

Yang, Dazhi ; Feng, Yakai ; Behl, Marc ; Lendlein, Andreas ; Zhao, Haiyang ; Khan, Musamir ; Guo, Jintang. / **Biomimetic hemo-compatible surfaces of polyurethane by grafting copolymer brushes of poly(ethylene glycol) and poly(phosphorylcholine methacrylate)**. Multifunctional Polymer-Based Materials. Vol. 1403 2012. pp. 171-176

Borah, Dipu ; Rasappa, Sozaraj ; Kosmala, Barbara ; Holmes, Justin D. ; Morris, Michael A. / **Block copolymer self-assembly on ethylene glycol (EG) self-assembled monolayer (SAM) for nanofabrication**. Nanoscale Materials Modification by Photon, Ion, and Electron Beams. Vol. 1450 2012. pp. 8-13

Malas, Asish ; Das, Chapal Kumar ; Das, Amit ; Heinrich, Gert. / **Development of expanded graphite filled natural rubber vulcanizates in presence and absence of carbon black : Mechanical, thermal and morphological properties**. In: Materials and Design. 2012 ; Vol. 39. pp. 410-417.

Rasilo, Paavo ; Belahcen, Anouar ; Arkkio, Antero. / **Effect of rotor pole-shoe construction on losses of inverter-fed synchronous motors**. Proceedings - 2012 20th International Conference on Electrical Machines, IECM 2012. 2012. pp. 1282-1286

Kurnitski, Jarek ; Saari, Arto ; Kalamees, Targo ; Vuolle, Mika ; Niemelä, Jouko ; Tark, Teet. / **Cost optimal and nearly zero (nZEB) energy performance calculations for residential buildings with REHVA definition for nZEB national implementation**. In: Energy and Buildings. 2011 ; Vol. 43, No. 11. pp. 3279-3288.

Kravchenko, Aleksandr ; Shevchenko, Andriy ; Ovchinnikov, Victor ; Priimagi, Arri ; Kaivola, Matti. / **Optical interference lithography using azobenzene-functionalized polymers for micro-and nanopatterning of silicon**. In: Advanced Materials. 2011 ; Vol. 23, No. 36. pp. 4174-4177.

Chang, Bo ; Routa, Iiris ; Sariola, Veikko ; Zhou, Quan. / **Self-alignment of RFID dies on four-pad patterns with water droplet for sparse self-assembly**. In: Journal of Micromechanics and Microengineering. 2011 ; Vol. 21, No. 9.

Linko, Veikko ; Leppiniemi, Jenni ; Paasonen, Seppo Tapio ; Hytönen, Vesa P. ; Jussi Toppari, J. / **Defined-size DNA triple crossover construct for molecular electronics : Modification, positioning and conductance properties**. In: Nanotechnology. 2011 ; Vol. 22, No. 27.

Tuurna, S. ; Varis, T. ; Penttilä, K. ; Ruusuvuori, K. ; Holmström, S. ; Yli-Olli, S. / **Optimised selection of new protective coatings for biofuel boiler applications**. In: Materials and Corrosion-Werkstoffe und Korrosion. 2011 ; Vol. 62, No. 7. pp. 642-649.



Lisjak, Darja ; Lintunen, Pertti ; Hujanen, Arto ; Varis, Tommi ; Bolelli, Giovanni ; Lusvarghi, Luca ; Jagodič, Marko ; Drogenik, Miha. / **Hexaferrite/polyethylene Composite coatings prepared with flame spraying**. In: Materials Letters. 2011 ; Vol. 65, No. 3. pp. 534-536.

Chang, Bo ; Sariola, Veikko ; Jääskeläinen, Mirva ; Zhou, Quan. / **Self-alignment in the stacking of microchips with mist-induced water droplets**. In: Journal of Micromechanics and Microengineering. 2011 ; Vol. 21, No. 1.

Vähä-Nissi, M. ; Hirvikorpi, T. ; Sievänen, J. ; Salo, E. ; Harlin, A. ; Johansson, P. ; Kuusipalo, J. / **Effect of pre-treatments on barrier properties of layers applied by atomic layer deposition onto polymer-coated substrates**. 13th European PLACE Conference 2011. Vol. 1 2011. pp. 447

Medyna, Galina ; Coatanea, Eric ; Millet, Dominique. / **Evaluation of parts of a boat cabin based on exergy - Focusing on environmental and economic assessments**. ASME 2011 International Mechanical Engineering Congress and Exposition, IMECE 2011. Vol. 4 PARTS A AND B. ed. AMER SOC MECHANICAL ENGINEERS, 2011. pp. 1083-1092

Teisala, Hannu ; Tuominen, Mikko ; Aromaa, Mikko ; Mäkelä, Jyrki M. ; Stepien, Milena ; Saarinen, Jarkko J. ; Toivakka, Martti ; Kuusipalo, Jurkka. / **Nanoparticle deposition on packaging materials by the liquid flame spray**. 13th European PLACE Conference 2011. Vol. 1 2011.

Christophe, François ; Ritola, Tuomas ; Coatanéa, Eric ; Bernard, Alain. / **Semantic analysis of function-solution duality**. ASME 2011 International Mechanical Engineering Congress and Exposition, IMECE 2011. Vol. 3 2011. pp. 611-619

Coatanéa, Eric ; Ritola, Tuomas ; Tumer, Irem Y. ; Jensen, David. / **A framework for building behavioral models for design-stage failure identification using dimensional analysis**. Proceedings of the ASME Design Engineering Technical Conference. Vol. 5 AMER SOC MECHANICAL ENGINEERS, 2010. pp. 591-601

Lahti, Johanna ; Tuominen, Mikko ; Penttinen, Tapani ; Räsänen, Jari P. ; Kuusipalo, Jurkka. / **The effects of corona and flame treatment : Part 2. PE-HD and PP coated papers**. TAPPI Press - 12th European PLACE Conference 2009. Vol. 1 2009. pp. 278-314

Coatanéa, Eric ; Yannou, Bernard ; Honkala, Sauli ; Lajunen, Antti ; Saarelainen, Tanja ; Makkonen, Petri. / **Measurement theory and dimensional analysis : Methodological impact on the comparison and evaluation process**. 19th International Conference on Design Theory and Methodology and 1st International Conference on Micro and Nano Systems, presented at - 2007 ASME International Design Engineering Technical Conferences and Computers and Information in Engineering Conference, IDETC/CIE2007. AMER SOC MECHANICAL ENGINEERS, 2008. pp. 173-182

Lahtinen, Kimmo ; Kuusipalo, Jurkka. / **Statistical modeling of water vapor transmission rates for extrusion-coated papers**. TAPPI 2008 PLACE Conference: Innovations in Flexible Consumer Packaging. 2008.

Lorimer, G. W. ; Dicken, R. ; Peura, P. ; Pilkington, R. ; Younes, C. M. ; Allen, G. C. ; Holt, M. J. / **The effect of phosphorous and arsenic on the fracture behaviour of a 2,25% Cr-1% Mo Steel**. In: Materials Science Forum. 1996 ; Vol. 207-209, No. PART 2. pp. 645-648.