

### **A new approach to build a low-level malicious fault list starting from high-level description and alternative graphs**

Benso, A.; Prinetto, Paolo; Rebaudengo, M.; Sonza, M.; **Ubar, Raimund-Johannes** Proceedings IEEE European Design & Test Conference, Paris, March 17-20, 1997 1997 / p. 560-565 <https://ieeexplore.ieee.org/document/582417>

### **About robustness of test patterns regarding multiple faults**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** LATW 2012 : 13th IEEE Latin-American Test Workshop proceedings : April 10th-13th, 2012, Quito, Ecuador 2012 / p. 86-91 : ill <https://www.infona.pl/resource/bwmeta1.element.ieee-art-000006261243>

### **Accelerating transient fault injection campaigns by using Dynamic HDL Slicing**

**Bagbaba, Ahmet Cagri; Jenihhin, Maksim; Raik, Jaan;** Sauer, Christian 2019 IEEE Nordic Circuits and Systems Conference (NORCAS) : NORCHIP and International Symposium of System-on-Chip (SoC), 29-30 October 2019, Helsinki, Finland : proceedings in IEEE Xplore 2019 / 7 p. : ill <https://doi.org/10.1109/NORCHIP.2019.8906932>

### **Active power losses in Estonian power transmission network**

**Ainsaar, Karin Maria; Ülavere, Eero; Tammoja, Heiki; Valtin, Juhan** 14th International Symposium "Topical problems in the field of electrical and power engineering. Doctoral school of energy and geotechnology. II" : Pärnu, Estonia, January 13-18, 2014 2014 / p. 112-117 : ill

### **AdAM: adaptive fault-tolerant approximate multiplier for edge DNN accelerators**

**Taheri, Mahdi; Cherezova, Natalia;** Nazari, Samira; **Rafiq, Ahsan; Azarpeyvand, Ali; Ghasempouri, Tara; Daneshtalab, Masoud; Raik, Jaan; Jenihhin, Maksim** 2024 IEEE European Test Symposium (ETS): ETS 2024 : May 20-24, 2024, The Hague, Netherlands : proceedings 2024 <https://doi.org/10.1109/ETS61313.2024.10567161> [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

### **Adaptive Kalman filter based data aggregation in fault-resilient Underwater Sensor Networks**

**Vihman, Lauri; Raik, Jaan** 2023 24th International Conference on Digital Signal Processing (DSP) 2023 / p. 1-5 <https://doi.org/10.1109/DSP58604.2023.10167982>

### **Adjusted electrical equivalent circuit model of induction motor with broken rotor bars**

**Rassõlkin, Anton; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants;** Petrov, Aleksei; Plokhov, Igor; Kotelnikov, Aleksandr PQ2016 : the 10th International Conference 2016 Electric Power Quality and Supply Reliability Conference (PQ) : August 29-31, 2016, Tallinn, Estonia : proceedings 2016 / p. 213-218 : ill <https://doi.org/10.1109/PQ.2016.7724115>

### **Adjusted electrical equivalent circuit model of induction motor with broken rotor bars and eccentricity faults**

Petrov, Aleksei; Plokhov, Igor; **Rassõlkin, Anton; Vaimann, Toomas; Kallaste, Ants; Belahcen, Anouar** Proceeding of the 2017 IEEE 11th International Symposium on Diagnostics for Electric Machines, Power Electronics and Drives (SDEMPED) : [Tinos (Greece), August 29 - September 01, 2017] 2017 / p. 58-64 : ill <https://doi.org/10.1109/DEMPED.2017.8062334>

### **An advanced diagnostic approach for broken rotor bar detection and classification in DTC controlled induction motors by leveraging dynamic SHAP interaction feature selection (DSHAP-IFS) GBDT methodology**

**Khan, Muhammad Amir; Asad, Bilal; Vaimann, Toomas; Kallaste, Ants** Machines 2024 / art. 495 <https://doi.org/10.3390/machines12070495> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Advances in machine fault diagnosis**

**Vaimann, Toomas** Applied sciences 2021 / art. 7348, 5 p <https://doi.org/10.3390/app11167348> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Advances in machine fault diagnosis**

2022 <https://doi.org/10.3390/books978-3-0365-5110-4>

### **Advances in machine fault diagnosis**

**Vaimann, Toomas** Advances in machine fault diagnosis 2022 / p. 1-5 <https://doi.org/10.3390/app11167348>

### **Air-core sensors operation modes for partial discharge detection and on-line diagnostics in medium voltage networks**

**Kütt, Lauri;** Shafiq, Muhammad; **Mõlder, Heigo; Järvik, Jaan;** Lehtonen, Matti Scientific Journal of Riga Technical University. Electrical, control and communication engineering 2013 / p. 5-12 : ill

### **Algorithms for hierarchical fault simulation in digital systems**

**Ubar, Raimund-Johannes; Raik, Jaan;** Klüver, B. Proceedings of the 10th International Conference : Mixed Design of Integrated Circuits and Systems : MIXDES 2003 : Lodz, Poland, 26-28 June 2003 2003 / p. 530-535 : ill

### **Analysis and improvement of resilience for long short-term memory neural networks**

**Ahmadilivani, Mohammad Hasan; Raik, Jaan; Daneshtalab, Masoud; Kuusik, Alar** 2023 IEEE International Symposium on Defect and Fault Tolerance in VLSI and Nanotechnology Systems (DFT) 2023 / 4 p <https://doi.org/10.1109/DFT59622.2023.10313559>

**Analysis of common mode and rapidly varying voltage profile on stator current harmonics of an inverter-fed induction motor**

**Sardar, Muhammad Usman; Vaimann, Toomas; Kütt, Lauri; Kallaste, Ants; Asad, Bilal; Kudelina, Karolina; Akbar, Siddique** 2023 IEEE 64th International Scientific Conference on Power and Electrical Engineering of Riga Technical University (RTUCON), Riga, Latvia, October 9-10, 2023 : conference proceedings 2023 / 6 p. : ill <https://doi.org/10.1109/RTUCON60080.2023.10413067>

**Analysis of grain orientation and defects in Sb<sub>2</sub>Se<sub>3</sub> solar cells fabricated by close-spaced sublimation**

**Krautmann, Robert; Spalatu, Nicolae;** Gunder, Rene; Abou-Ras, Daniel; Unold, Thomas; Schorr, Susan; **Oja Acik, Ilona; Krunks, Malle** GSFMT Scientific Conference 2021 : Tartu, June 14-15, 2021 : abstracts 2021 / P 17 [https://fntdk.ut.ee/wp-content/uploads/2021/06/GSFMT\\_abstractbook\\_2021.pdf](https://fntdk.ut.ee/wp-content/uploads/2021/06/GSFMT_abstractbook_2021.pdf)

**Analysis of grain orientation and defects in Sb<sub>2</sub>Se<sub>3</sub> solar cells fabricated by close-spaced sublimation : [journal article]**

**Krautmann, Robert; Spalatu, Nicolae;** Gunder, Rene; Abou-Ras, Daniel; Unold, Thomas; Schorr, Susan; **Krunks, Malle; Oja Acik, Ilona** Solar energy 2021 / p. 494-500 <https://doi.org/10.1016/j.solener.2021.07.022> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

**Analysis of the vibration magnitude of an induction motor with different numbers of broken bars**

Martinez, Javier; **Belahcen, Anouar;** Muetze, Annette IEEE transactions on industry applications 2017 / p. 2711-2720 : ill <https://doi.org/10.1109/TIA.2017.2657478> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

**An analytic model for fault diagnosis in power distribution systems considering unreliable alarms**

Wang, Chongyu; Pang, Kaiyuan; Zhang, Yong; **Wen, Fushuan; Palu, Ivo;** Xiong, Wen; Chen, Minghui; Shang, Huiyu 2020 IEEE Power & Energy Society General Meeting (GM 2020) 2020 / 5 I <https://doi.org/10.1109/PESGM41954.2020.9281468>

**Anomaly detection and classification in power system state estimation: Combining model-based and data-driven methods**

**Asefi, Sajjad;** Mitrovic, Mile; Cetenovic, Dragan; Levi, Victor; Gryazina, Elena; Terzija, Vladimir Sustainable energy, grids and networks 2023 / art. 101116, 14 p. : ill <https://doi.org/10.1016/j.segan.2023.101116> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

**Assessment and Enhancement of Hardware Reliability for Deep Neural Networks = Riistvara töökindluse hindamine ja täiustamine süvanärvivõrkude jaoks**

**Ahmadilivani, Mohammad Hasan** 2025 [https://www.ester.ee/record=b5739227\\*est](https://www.ester.ee/record=b5739227*est) <https://digikogu.taltech.ee/et/Item/652d50e3-773f-4de5-897d-86531feb0d56> <https://doi.org/10.23658/taltech.19/2025>

**Assessment of diagnostic test for automated bug localization**

**Tihhomirov, Valentin; Tšepurov, Anton; Jenihhin, Maksim; Raik, Jaan; Ubar, Raimund-Johannes** LATW2013 : 14th IEEE Latin-American Test Workshop, Cordoba, Argentina, April 3-5, 2013 : [proceedings] 2013 / [6] p. : ill

**Assessment of electricity supply interruption costs under restricted time and information resources**

**Raesaar, Peeter; Tiigimägi, Eeli; Valtin, Juhan** Proceedings of the 2006 IASME/WSEAS International Conference on Energy & Environmental Systems : Chalkida, Greece, May 8-10, 2006 2006 / p. 409-415 : ill

**Asynchronous fault detection in IEEE P1687 instrument network**

**Shibin, Konstantin; Devadze, Sergei; Jutman, Artur** IEEE 23rd North Atlantic Test Workshop : 14-16 May 2014, Binghampton, New York : proceedings 2014 / p. 73-78 : ill

**At-speed on-chip diagnosis of board-level interconnect faults**

**Jutman, Artur** Ninth IEEE European Test Symposium : ETS 2004 : 23-26 May 2004, Corsica, France : proceedings 2004 / p. 2-7 : ill [https://www.researchgate.net/publication/4098807\\_At-speed\\_on-chip\\_diagnosis\\_of\\_board-level\\_interconnect\\_faults](https://www.researchgate.net/publication/4098807_At-speed_on-chip_diagnosis_of_board-level_interconnect_faults)

**Automated area and coverage optimization of minimal latency checkers**

**Azad, Siavoosh Payandeh; Niazmand, Behrad; Apneet Kaur; Raik, Jaan; Jervan, Gert; Hollstein, Thomas** 2017 22nd IEEE European Test Symposium (ETS 2017), Limassol, Cyprus, 22 – 26 May 2017 : proceedings 2017 / p. 7-8 : ill <https://doi.org/10.1109/ETS.2017.7968211>

**Automated identification of application-dependent safe faults in automotive systems-on-a-chips**

**Bagbaba, Ahmet Cagri;** Augusto da Silva, Felipe; Sonza Reorda, Matteo; Hamdioui, Said; **Jenihhin, Maksim;** Sauer, Christian Electronics 2022 / art. 319 <https://doi.org/10.3390/electronics11030319> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

**Automated minimization of concurrent online checkers for network-on-chips**

**Saltarelli, Pietro; Niazmand, Behrad; Hariharan, Ranganathan; Raik, Jaan; Jervan, Gert; Hollstein, Thomas** 10th International Symposium on Reconfigurable and Communication-centric Systems-on-Chip (ReCoSoC 2015) : Bremen, 29 June - 1 July 2015 2015 / [8] p. : ill <http://dx.doi.org/10.1109/ReCoSoC.2015.7238079>

### **Automated test bench generation for high-level synthesis flow ABELITE**

**Viilukas, Taavi; Jenihhin, Maksim; Raik, Jaan; Ubar, Raimund-Johannes;** Baranov, Samary Proceedings of IEEE East-West Design & Test Symposium (EWDTS'2011) : Sevastopol, Ukraine, September 9-12, 2011 / p. 13-16 : ill  
<https://ieeexplore.ieee.org/document/6116601>

### **Auvere jaama ehitaja on Enefit Powerile maksnud trahvi juba 130 miljonit**

Nikolajev, Jüri err.ee 2022 [Auvere jaama ehitaja on Enefit Powerile maksnud trahvi juba 130 miljonit](#)

### **AWAIT : an ultra-lightweight soft-error mitigation mechanism for network-on-chip links**

**Janson, Karl; Pihlak, Rene; Azad, Siavoosh Payandeh; Niazmand, Behrad; Jervan, Gert; Raik, Jaan** 2018 13th International Symposium on Reconfigurable Communication-centric Systems-on-Chip (ReCoSoC), Lille, France, July 9th-11th, 2018 / p. 1-6 : ill  
<https://doi.org/10.1109/ReCoSoC.2018.8449374>

### **BASTION - board and SoC test instrumentation for Ageing and No Failure Found**

**Devadze, Sergei** MEDIAN Finale : Workshop on Manufacturable and Dependable Multicore Architectures at Nanoscale : November 10-11, 2015, Tallinn, Estonia 2015 / p. 77

### **BASTION : board and SoC test instrumentation for ageing and no failure found**

**Jutman, Artur;** Lotz, Christophe; Larsson, Erik; Sonza Reorda, Matteo; **Jenihhin, Maksim; Raik, Jaan** Proceedings of the 2017 Design, Automation & Test in Europe (DATE) : 27-31 March 2017, Swisstech, Lausanne, Switzerland 2017 / p. 115-120 : ill  
<https://doi.org/10.23919/DATE.2017.7926968>

### **Bearing fault analysis of BLDC motor intended for electric scooter application**

**Kudelina, Karolina; Asad, Bilal; Vaimann, Toomas; Rassõlkin, Anton; Kallaste, Ants** 2021 IEEE 13th International Symposium on Diagnostics for Electrical Machines, Power Electronics and Drives (SDEMPED) 2021 / p. 427-432  
<https://doi.org/10.1109/SDEMPED51010.2021.9605519>

### **The bearing faults detection methods for electrical machines — the state of the art**

Khan, Muhammad Amir; **Asad, Bilal; Kudelina, Karolina; Vaimann, Toomas; Kallaste, Ants** Energies 2023 / art. 296  
<https://doi.org/10.3390/en16010296> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Behavior modeling of faulty complex VLSIs : why and how?**

Leveugle, R. BEC'98 : the 6th Biennial Conference on Electronics and Microsystems Technology, October 7-9, 1998, Tallinn, Estonia : proceedings 1998 / p. 191-194: ill

### **Bidirectional DC circuit breaker with improved performance during commissioning and reclosing**

Pogulaguntla, Aditya; Raghavendra I, Venkata; Banavath, Satish Naik; **Chub, Andrii;** Sreekanth, Thamballa; Krishnamoorthy, Harish Sarma 24th European Conference on Power Electronics and Applications (EPE'22 ECCE Europe) 2022 / p. P1-P9  
<https://ieeexplore.ieee.org/document/9907667>

### **Broken rotor bar fault detection of the grid and inverter-fed induction motor by effective attenuation of the fundamental component**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants; Rassõlkin, Anton; Iqbal, Muhammad Naveed** IET electric power applications 2019 / p. 2005–2014 <https://doi.org/10.1049/iet-epa.2019.0350> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Broken rotor bar fault diagnostic of inverter fed induction motor using FFT, Hilbert and Park's vector approach**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants** 2018 XIII International Conference on Electrical Machines (ICEM 2018) : Alexandroupoli, Greece, 3-6 September 2018 / p. 2352-2358 : ill <https://doi.org/10.1109/ICELMACH.2018.8506957>

### **Cable diagnostics methods for determining degradation caused by renewable energy production**

**Kiitam, Ivar; Taklaja, Paul; Niitsoo, Jaan;** Hyonen, Petri 2015 IEEE 5th International Conference on Power Engineering, Energy and Electrical Drives (POWERENG) : proceedings : May 11-13, 2015, Riga, Latvia 2015 / p. 220-224 : ill

### **Calculation of probabilistic testability measures for digital circuits with Structurally Synthesized BDDs**

**Jürimägi, Lembit; Ubar, Raimund-Johannes; Jenihhin, Maksim; Raik, Jaan** Microprocessors and microsystems 2020 / art. 103117, 12 p <https://doi.org/10.1016/j.micpro.2020.103117> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Calculation of the diagnosibility of digital circuits without using fault models**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** BEC 2008 : 2008 International Biennial Baltic Electronics Conference : proceedings of the 11th Biennial Baltic Electronics Conference : Tallinn University of Technology : October 6-8, 2008, Tallinn, Estonia 2008 / p. 159-162 : ill

### **Capacitor coupled voltage transformer inaccuracy effect on circuit breaker operation**

**Asefi, Sajjad; Andreesen, Guido; Kilter, Jako;** Landsberg, Mart 2023 23rd International Scientific Conference on Electric Power Engineering (EPE) 2023 / 5 p <https://doi.org/10.1109/EPE58302.2023.10149279>

### **Causes of indefinite faults in Estonian 110 kV overhead power grid**

Taklaja, Paul; Oidram, Rein; Niitsoo, Jaan; Palu, Ivo Oil shale 2013 / p. 225-243 : ill [https://artiklid.elnet.ee/record=b2631741\\*est](https://artiklid.elnet.ee/record=b2631741*est)

### **Changing of magnetic flux density distribution in a squirrel-cage induction motor with broken rotor bars**

Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants Elektronika ir elektrotehnika = Electronics and electrical engineering 2014 / p. 11-14 : ill <https://doi.org/10.5755/j01.eee.20.7.8018> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

### **Combinational fault simulation in sequential circuits**

Ubar, Raimund-Johannes; Kõusaar, Jaak; Gorev, Maksim; Devadze, Sergei 2015 IEEE International Symposium on Circuits and Systems : 24-27 May 2015, Lisboa, Portugal : [proceedings] 2015 / p. 2876-2879 : ill <https://doi.org/10.1109/ISCAS.2015.7169287> Conference proceedings at Scopus Article at Scopus Article at WOS

### **Combined fault-model free cause-effect and effect-cause fault diagnosis in block-level digital networks**

Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan ASQED'09 : 1st Asia Symposium on Quality Electronic Design : Kuala Lumpur, Malaysia, July 15-16, 2009 2009 / p. 385-390 <https://ieeexplore.ieee.org/document/5206232>

### **Combined FE and two dimensional spectral analysis of broken cage faults in induction motors**

Martinez, Javier; Belahcen, Anouar; Arkkio, Antero Proceedings : IECON 2013 - 39th Annual Conference of the IEEE Industrial Electronics Society : Vienna, Austria, 10-14 November, 2013 2013 / p. 2674-2679 : ill <https://ieeexplore.ieee.org/document/6699553>

### **Combined pseudo-exhaustive and deterministic testing of array multipliers**

Oyeniran, Adeboye Stephen; Azad, Siavoosh Payandeh; Ubar, Raimund-Johannes 2018 IEEE International Conference on Automation, Quality and Testing, Robotics (AQTR) : THETA 21st edition, 24th-26th May, Cluj-Napoca, Romania : proceedings 2018 / 6 p. : ill <https://doi.org/10.1109/AQTR.2018.8402708>

### **Combining fault analysis technologies for ISO26262 functional safety verification**

Augusto da Silva, Felipe; Bagbaba, Ahmet Cagri; Hamdioui, Said; Sauer, Christian 2019 IEEE 28th Asian Test Symposium (ATS) : 10-13 December 2019, Kolkata, India : proceedings 2019 / p. 129-134 : ill <https://doi.org/10.1109/ATS47505.2019.00024>

### **Common-ground energy router structure with enhanced reliability and protection = Ühise nulljuhtmega suurendatud töökindluse ja kaitsega energiaruuter**

Rahimpour, Saeed 2024 <https://doi.org/10.23658/taltech.45/2024> [https://www.ester.ee/record=b5694226\\*est](https://www.ester.ee/record=b5694226*est) <https://digikogu.taltech.ee/et/Item/520b18fc-f0a8-4a08-ade8-d3b890d253ff>

### **Complex delay fault reasoning with sequential 7-valued algebra**

Kõusaar, Jaak; Ubar, Raimund-Johannes; Alekseev, Igor 2015 16th Latin American Test Symposium (LATS 2015) : Puerto Vallarta, Mexico, 25-27 March 2015 2015 / [6] p. : ill <http://dx.doi.org/10.1109/LATW.2015.7102403>

### **Comprehensive Diagnostic Assessment of Inverter Failures in a Utility-Scale Solar Power Plant : A Case Study Based on Field and Laboratory Validation**

Kull, Karl; Asad, Bilal; Naseer, Muhammad Usman; Kallaste, Ants; Vaimann, Toomas Sensors 2025 / art. 3717 <https://doi.org/10.3390/s25123717>

### **A Comprehensive Study of Partial Discharge Based Extrinsic Aging in Nomex Insulation Films : Modeling, Simulation and Measurement**

Choudhary, Maninder; Shafiq, Muhammad; Bhattarai, Abhinav; Kiitam, Ivar; Taklaja, Paul; Palu, Ivo Electric Power Systems Research 2025 / art. 111663 <https://doi.org/10.1016/j.eprs.2025.111663>

### **Condition monitoring and fault detection for electrical machines using IOT**

Raja, Hadi Ashraf; Vaimann, Toomas; Rassõlkin, Anton; Kallaste, Ants Proceedings of the Future Technologies Conference (FTC) 2022. Volume 2 2023 / p. 162-173 [https://doi.org/10.1007/978-3-031-18458-1\\_12](https://doi.org/10.1007/978-3-031-18458-1_12) Conference proceedings at Scopus Article at Scopus

### **Condition monitoring of electrical machines**

Vaimann, Toomas; Kallaste, Ants 11th International Symposium "Topical Problems in the Field of Electrical and Power Engineering." Doctoral School of Energy and Geotechnology II : Pärnu, Estonia, January 16-21, 2012 2012 / p. 209-212 : ill

### **Condition monitoring of electrical machines and its relation to industrial internet**

Belahcen, Anouar; Gyftakis, Konstantinos N.; Martinez, Javier; Climente-Alarcon, Vicente; Vaimann, Toomas 2015 IEEE Workshop on Electrical Machines Design, Control and Diagnosis (WEMDCD) : proceedings : Castello del Valentino, Torino, Italy, 26-27 March, 2015 2015 / p. 233-241 : ill <http://dx.doi.org/10.1109/WEMDCD.2015.7194535>

### **Conditional fault collapsing in digital circuits with shared structurally synthesized BDDs [Online resource]**

Jürimägi, Lembit; Ubar, Raimund-Johannes BEC 2018 : 2018 16th Biennial Baltic Electronics Conference (BEC) : proceedings

**Construction of the tests of combinational circuit failures by analyzing the orthogonal disjunctive normal forms represented by the alternative graphs**

Matrosova, A.Yu.; Pleshkov, A.G.; **Ubar, Raimund-Johannes** Automation and remote control 2005 / p. 313-327 : ill <https://doi.org/10.1007/s10513-005-0054-9>

**Cost-effective concurrent hardware checkers for network on chip based system on chip = Kulutõhusad süsteemiga paralleelsed rikkemonitorid kiipvõrkudel põhinevatele kiipsüsteemidele**

**Hariharan, Ranganathan** 2019 <https://digi.lib.ttu.ee/i/?12854> [https://www.ester.ee/record=b5243161\\*est](https://www.ester.ee/record=b5243161*est)

**Cost-efficient real-time condition monitoring and fault diagnostics system for BLDC motor using IoT and Machine learning**

**Raja, Hadi Ashraf; Raval, Hardik; Vaimann, Toomas; Kallaste, Ants; Rassõlkin, Anton; Belahcen, Anouar** Diagnostika '22 : 2022 International Conference on Diagnostics in Electrical Engineering : conference proceedings 2022 / 4 p. <https://doi.org/10.1109/Diagnostika55131.2022.9905102>

**Critical path tracing based simulation of transition delay faults**

**Kõusaar, Jaak; Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan** 2014 17th Euromicro Conference on Digital System Design : DSD 2014 : 27-29 August 2014, Verona, Italy : proceedings 2014 / p. 108-113 : ill

**Critical path tracing based simulation of transition delay faults**

**Kõusaar, Jaak; Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan** Proceedings of the 8th Annual Conference of the Estonian National Doctoral School in Information and Communication Technologies : December 5-6, 2014, Rakvere 2014 / p. 61-66 : ill

**Cross-layer dependability management in network on chip based system on chip = Kiipvõrkudel põhinevate süsteemide kihtideülene usaldatavuse haldus**

**Azad, Siavoosh Payandeh** 2018 <https://digi.lib.ttu.ee/i/?9948> [https://www.ester.ee/record=b5056143\\*est](https://www.ester.ee/record=b5056143*est)

**Data-driven cross-layer fault management architecture for sensor networks**

**Vihman, Lauri; Kruusmaa, Maarja; Raik, Jaan** 16th European Dependable Computing Conference : EDCC 2020 : Virtual Conference, Munich, Germany, 7-10 September 2020 : proceedings 2020 / art. 20094188, p. 33-40 <https://doi.org/10.1109/EDCC51268.2020.00015>

**Data-driven fault-resilient cross-layer sensor network architecture = Andmepõhine tõrkekindel kihtideülene sensorvõrgu arhitektuur**

**Vihman, Lauri** 2024 [https://www.ester.ee/record=b5657135\\*est](https://www.ester.ee/record=b5657135*est) <https://digikogu.taltech.ee/et/Item/00a93258-dc0f-4a4d-822f-099fff757224> <https://doi.org/10.23658/taltech.7/2024>

**DECIDER : a decision diagram based hierarchical test generation system**

**Jervan, Gert; Markus, Antti; Raik, Jaan; Ubar, Raimund-Johannes** Proceedings of the 2nd International Workshop on Design and Diagnostics of Electronic Circuits and Systems, Szczyrk, Poland, September 2-4, 1998 1998 / p. 269-273 <https://www.ida.liu.se/labs/eslab/publications/pap/db/DDECS98.pdf>

**Deductive fault simulation on structurally synthesized BDDs**

**Aarna, Margit; Ubar, Raimund-Johannes; Raik, Jaan** BEC 2004 : Baltic Electronics Conference : Post-Graduate Student Session : Tallinn University of Technology, October 3-6, 2004, Tallinn, Estonia 2004 / p. 11 : ill

**DeepAxe : a framework for exploration of approximation and reliability trade-offs in DNN accelerators**

**Taheri, Mahdi; Riazati, Mohamad; Ahmadilivani, Mohammad Hasan; Jenihhin, Maksim; Daneshtalab, Masoud; Raik, Jaan; Sjödin, Mikael; Lisper, Björn** 2023 24th International Symposium on Quality Electronic Design (ISQED) 2023 / 8 p. : ill <https://doi.org/10.1109/ISQED57927.2023.10129353>

**DeepVigor: Vulnerability Value RanGes and FactORs for DNNs' Reliability Assessment**

**Ahadilivani, Mohammad Hasan; Taheri, Mahdi; Raik, Jaan; Daneshtalab, Masoud; Jenihhin, Maksim** IEEE European Test Symposium (ETS) : Venice, Italy, 22-26 May 2023 : proceedings 2023 / 6 p. : ill <https://doi.org/10.1109/ETS56758.2023.10174133>

**DeepVigor+: Scalable and Accurate Semi-Analytical Fault Resilience Analysis for Deep Neural Networks**

**Ahadilivani, Mohammad Hasan; Raik, Jaan; Daneshtalab, Masoud; Jenihhin, Maksim** arXiv.org 2024 / 14 p. : ill <https://doi.org/10.48550/arXiv.2410.15742>

**Defect oriented fault coverage of 100stuck-at fault test sets**

**Blyzniuk, M.; Cibakova, Tatiana; Gramatova, Elena; Kuzmicz, W.; Lobur, M.; Pleskacz, Witold A.; Raik, Jaan; Ubar, Raimund-Johannes** Proceedings of the 7th International Conference Mixed Design of Integrated Circuits and Systems : MIXDES 2000 : Gdynia, Poland, 15-17 June 2000 2000 / p. 511-516 : ill <https://repo.pw.edu.pl/info/seam?ps=20&id=WUT7e20f35d67ae45d3b2d1264d7a4ba722&en&pn=1&cid=156607>

### **Defect-oriented fault simulation and test generation in digital circuits**

Kuzmicz, W.; Pleskacz, Witold A.; **Raik, Jaan; Ubar, Raimund-Johannes** IEEE ISQED 2001 : proceedings of the IEEE 2001 2nd International Symposium on Quality Electronic Design : March 26-28, 2001, San Jose, California 2001 / p. 365-371  
<https://ieeexplore.ieee.org/document/915257>

### **Defect-oriented library builder and hierarchical test generation**

Cibakova, Tatiana; Gramatova, Elena; Kuzmicz, W.; Pleskacz, Witold A.; **Raik, Jaan; Ubar, Raimund-Johannes** IEEE Design and Diagnostics of Electronic Circuits and Systems - IEEE DDECS 2001 : Fourth International Workshop on IEEE Design and Diagnostics of Electronic Circuits and Systems : Győr, Hungary, April 18-20, 2001 2001 / p. 163-168 : ill

### **Defect-oriented mixed-level fault simulation in digital systems**

**Ubar, Raimund-Johannes; Raik, Jaan; Ivask, Eero; Brik, Marina** Facta Universitatis [Niš]. Series electronics and energetics 2002 / 1, April, p. 123-136 : ill

### **Defect-oriented modul-level fault diagnosis in digital circuits**

**Kostin, Sergei; Ubar, Raimund-Johannes; Raik, Jaan** Proceedings of the 2011 IEEE Symposium on Design and Diagnostics of Electronic Circuits and Systems : April 13-15, 2011, Gottbus, Germany 2011 / p. 81-86

### **Defect-oriented test generation and fault simulation in the environment of MOSCITO**

Schneider, Andre; Diener, Karl-Heinz; Gramatova, Elena; Fisherova, Maria; **Ivask, Eero; Ubar, Raimund-Johannes**; Pleskacz, Witold A.; Kuzmicz, W. BEC 2002 : proceedings of the 8th Biennial Baltic Electronics Conference : October 6-9, 2002, Tallinn, Estonia 2002 / p. 303-306 : ill

### **Defect-oriented test generation using probabilistic estimation**

Cibakova, Tatiana; Fischerova, Maria; Gramatova, Elena; Kuzmicz, W.; Pleskacz, Witold A.; **Raik, Jaan; Ubar, Raimund-Johannes** Proceedings of the 8th International Conference Mixed Design of Integrated Circuits and Systems : MIXDES 2001 : Zakopane, Poland, 21-23 June 2000 2001 / p. 131-136 : ill

### **Defektide ja rikete seoste analüüs : lepingu Lep16039 aruanne [Võrguväljaanne]**

**Palu, Ivo; Keel, Matti; Tammoja, Heiki** 2016 [https://www.elektrilevi.ee/-/doc/6305157/ettevottest/defektide\\_rikete\\_aruanne.pdf](https://www.elektrilevi.ee/-/doc/6305157/ettevottest/defektide_rikete_aruanne.pdf)

### **DefSim - the defective IC**

Pleskacz, Witold A.; **Jutman, Artur; Ubar, Raimund-Johannes; Devadze, Sergei** DATE 2007 : Design Automation and Test in Europe : Nice, France, April 16-20, 2007 2007 / p. s96 (2 p.)

### **Delay fault investigation at the register transfer level**

Fischerova, Maria; Gramatova, Elena BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 141-144

### **Dependability improvements of NoC-based systems = Töökindluse parandamine kiipvõrkudel põhinevates süsteemides**

**Niazmand, Behrad** 2018 <https://digi.lib.ttu.ee/?9879> [https://www.ester.ee/record=b4907650\\*est](https://www.ester.ee/record=b4907650*est)

### **Dependence of the carrier removal rate in 4H-SiC PN structures on irradiation temperature**

Lebedev, Alexander A.; Davydovskaya, Klavdya S.; Kozlovski, Vitali V.; **Korolkov, Oleg; Sleptsuk, Natalja; Toompuu, Jana** Silicon Carbide and Related Materials 2018 : 12th European Conference on Silicon Carbide and Related Materials (ECSCRM 2018) : Selected, peer reviewed papers from the European Conference on Silicon Carbide and Related Materials (ECSCRM 2018), September 2-6, 2018, Birmingham, UK 2019 / p. 730-733 [https://doi.org/10.4028/www.scientific.net/MSF.963.730\\_Conference\\_proceeding\\_at\\_Scopus](https://doi.org/10.4028/www.scientific.net/MSF.963.730_Conference_proceeding_at_Scopus) [Article at Scopus](#)

### **Design error diagnosis in digital circuits with stuck-at fault model**

**Jutman, Artur; Ubar, Raimund-Johannes** Microelectronics reliability 2000 / p. 307-320 : ill [https://doi.org/10.1016/S0026-2714\(99\)00203-6](https://doi.org/10.1016/S0026-2714(99)00203-6)

### **Design error diagnosis in digital circuits without error model**

**Ubar, Raimund-Johannes**; Borrione, Dominique VLSI : systems on a chip : IFIP TC10 WG10.5 Tenth International Conference on Very Large Scale Integration (VLSI'99) : December 1-4, 1999, Lisboa, Portugal 1999 / p. 281-292 : ill  
[https://www.researchgate.net/publication/292157544\\_Design\\_Error\\_Diagnosis\\_in\\_Digital\\_Circuits\\_without\\_Error\\_Model](https://www.researchgate.net/publication/292157544_Design_Error_Diagnosis_in_Digital_Circuits_without_Error_Model)

### **Design error diagnosis in scan-path designs**

**Ubar, Raimund-Johannes** 2nd IEEE Latin American Test Workshop : LATW 2001 : Cancun, Mexico, February 11-14, 2001 : digest of papers 2001 / p. 162-168 : ill

### **Design error diagnosis with re-synthesis in combinational circuits**

**Ubar, Raimund-Johannes** Journal of electronic testing : theory and applications 2003 / 1, p. 73-82 : ill  
<https://link.springer.com/article/10.1023/A:1021948013402>

### **Design error localization in digital circuits by stuck-at fault test patterns**

**Jutman, Artur; Ubar, Raimund-Johannes** [MIEL] 2000 : 22nd International Conference on Microelectronics : Niš, Yugoslavia, 14-17 May 2000 : proceedings. Volume 2 2000 / p. 723-726 <https://ieeexplore.ieee.org/document/838792>

### **Design issues of redundant protection and supervision system for the special purpose power converters [Electronic resource]**

**Vinnikov, Dmitri; Roasto, Indrek; Vodovozov, Valery** International Conference on Renewable Energies and Power Quality : ICREPQ'09 : Valencia, Spain, 15th to 17th April 2009 2009 / [6] p. [CD-ROM] <https://www.icrepq.com/ICREPQ%2709/356-vinnikov.pdf>

### **Design technologies for system-on-chip : fault simulation in complex digital designs**

Hahanov, V.; **Ubar, Raimund-Johannes** Автоматизированные системы управления и приборы автоматики, 2003 2003 / p. 16-35

### **Detection of induction motor broken bars in grid and frequency converter supply**

**Vaimann, Toomas; Belahcen, Anouar; Martinez, Javier; Kilk, Aleksander** Przegląd elektrotechniczny 2014 / p. 90-94 : ill <https://www.pe.org.pl/articles/2014/1/22.pdf> [Journal metrics at Scopus](#) [Article at Scopus](#)

### **Determination of the nonfaulty limits of circuit characteristics in the fault identification of discrete-type circuits**

Gadzheva, Elissaveta BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 97-100: ill

### **Determined-safe faults identification : a step towards ISO26262 hardware compliant designs**

Augusto da Silva, Felipe; **Bagbaba, Ahmet Cagri**; Sartoni, Sandro; Cantoro, Riccardo; Sonza Reorda, Matteo; Hamdioui, Said; Sauer, Christian 2020 25th IEEE European Test Symposium (ETS) 2020 / 6 p. : ill <https://doi.org/10.1109/ETS48528.2020.9131568>

### **Determining the unknown faults of the HV overhead lines**

**Taklaja, Paul; Niitsoo, Jaan; Palu, Ivo** Proceedings of the 13th International Scientific Conference Electric Power Engineering 2012 : EPE 2012 : Brno. Vol. 1 2012 / p. 187-192 : ill

### **Development of a Substation Risk-Based Asset Management Decision-Making Process in the Case of Insufficient Information = Alajaama riskipõhise varahalduse otsustusprotsessi arendamine ebapiisava sisendteabe tingimustes**

**Andresen, Guido** 2025 [https://www.ester.ee/record=b5754736\\*est](https://www.ester.ee/record=b5754736*est) <https://digikogu.taltech.ee/et/Item/49e349b9-c62b-4a9e-af14-5c8408e54028> <https://doi.org/10.23658/taltech.52/2025>

### **A DFT scheme to improve coverage of hard-to-detect faults in FinFET SRAMs**

Cardoso Medeiros, Guilherme; **Gürsoy, Cemil Cem**; Fieback, Moritz; Wu, Lizhou; **Jenihhin, Maksim**; Taouil, Mottaqiallah; Hamdioui, Said 2020 Design, Automation & Test in Europe Conference & Exhibition (DATE), 9-13 March 2020, Grenoble, France : proceedings 2020 / p. 792-797 <https://doi.org/10.23919/DATE48585.2020.9116278>

### **DFT-based external test and diagnosis of mesh-like networks on chips = Testitavusel põhinev välise testi ja diagnoosi meetod kahemõõtmelistele kiipvõrkudele**

**Govind, Vineeth** 2009 <https://digi.lib.ttu.ee/i/7454> [https://www.ester.ee/record=b2539211\\*est](https://www.ester.ee/record=b2539211*est)

### **Diagnostic modeling of digital systems with low- and high-level decision diagrams**

**Ubar, Raimund-Johannes** LATW2013 : 14th IEEE Latin-American Test Workshop, Cordoba, Argentina, April 3-5, 2013 : [proceedings] 2013 / [1] p

### **Diagnostic modeling of digital systems with multi-level decision diagrams**

**Ubar, Raimund-Johannes; Raik, Jaan; Jutman, Artur; Jenihhin, Maksim** Design and test technology for dependable systems-on-chip 2011 / p. 92-118 : ill [https://www.researchgate.net/publication/344994231\\_Diagnostic\\_Modeling\\_of\\_Digital\\_Systems\\_with\\_Multi-Level\\_Decision\\_Diagrams](https://www.researchgate.net/publication/344994231_Diagnostic_Modeling_of_Digital_Systems_with_Multi-Level_Decision_Diagrams)

### **Diagnostic software**

**Ubar, Raimund-Johannes** Concise encyclopedia of software engineering 1993 / p. 101-105

### **Diagnostics of induction motor rotor faults using analysis of stator current**

**Vaimann, Toomas** 6th International Symposium "Topical Problems in the Field of Electrical and Power Engineering" : Doctoral School of Energy and Geotechnology : [Kuressaare, January 12-17, 2009] 2009 / p. 13-17 : ill

### **DIAGNOZER : a laboratory tool for teaching research in diagnosis of electronic systems [Electronic resource]**

**Ubar, Raimund-Johannes; Kostin, Sergei; Jutman, Artur; Raik, Jaan; Wuttke, Heinz-Dietrich** 2009 IEEE International Conference on Microelectronic Systems Education MSE '09 : 25-27 July 2009, San Francisco, California : [proceedings] 2009 / p. 12-15 : ill. [CD-ROM] <http://dx.doi.org/10.1109/MSE.2009.5270842>

### **Digital logic simulation with compressed BDDs**

**Ubar, Raimund-Johannes; Mironov, Dmitri; Devadze, Sergei; Raik, Jaan** Proceedings : 2011 IEEE International Conference on

Computer Science and Automation Engineering : June 10-12, 2011, Shanghai, China 2011 / p. 105-109 : ill  
<https://ieeexplore.ieee.org/document/5952643>

#### **Digital twin service unit development for an EV induction motor fault detection**

**Rjabtšikov, Viktor; Mohamed, Mahmoud Ibrahim Hassanin; Asad, Bilal; Rassõlkin, Anton; Vaimann, Toomas; Kallaste, Ants; Kuts, Vladimir;** Stepień, Mariusz; Krawczyk, Mateusz 2023 IEEE International Conference on Electric Machines and Drives (IEMDC) 2023 / 5 p <https://doi.org/10.1109/IEMDC55163.2023.10239085>

#### **Digital Twin service unit for AC motor stator inter-turn short circuit fault detection**

**Rjabtšikov, Viktor; Rassõlkin, Anton; Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Kuts, Vladimir; Jegorov, Sergei;** Stepień, Mariusz; Krawczyk, Mateusz 2021 28th International Workshop on Electric Drives : Improving Reliability of Electric Drives (IWED) 2021 <https://doi.org/10.1109/IWED52055.2021.9376328>

#### **Directional calibration of rogowski coil for localization of partial discharges in smart distribution networks**

Shafiq, Muhammad; **Kütt, Lauri;** Isa, M.; Hashmi, M.; Lehtonen, Matti International review of electrical engineering 2012 / p. 5881-5890  
[https://www.researchgate.net/publication/262703688\\_Directional\\_Calibration\\_of\\_Rogowski\\_Coil\\_for\\_Localization\\_of\\_Partial\\_Discharges\\_in\\_Smart\\_Distribution\\_Networks](https://www.researchgate.net/publication/262703688_Directional_Calibration_of_Rogowski_Coil_for_Localization_of_Partial_Discharges_in_Smart_Distribution_Networks)

#### **Distance encoding waves for identification of lightning failures**

Galkin, Ilja; Suzdalenko, Alexander; **Armas, Jelena** BEC 2012 : 2012 13th Biennial Baltic Electronics Conference : proceedings of the 13th Biennial Baltic Electronics Conference : October 3-5, 2012, Tallinn, Estonia 2012 / p. 227-230 : ill

#### **Distributed approach for parallel exact critical path tracing fault simulation**

**Ivask, Eero; Devadze, Sergei; Ubar, Raimund-Johannes** MIXDES 2010 : 17th International Conference "Mixed Design of Integrated Circuits and Systems" : June 24-26, 2010, Wroclaw, Poland 2010 / p. 471-476 : ill

#### **Distributed approach for parallel exact critical path tracing fault simulation**

**Ivask, Eero; Devadze, Sergei; Ubar, Raimund-Johannes** International journal of microelectronics and computer science 2010 / p. 165-174 : ill

#### **Distributed fault simulation with collaborative load balancing for VLSI circuits**

**Ivask, Eero; Devadze, Sergei; Ubar, Raimund-Johannes** Scalable computing : practice and experience 2011 / p. 153-163 : ill

#### **Double phase fault collapsing with linear complexity in digital circuits**

**Ubar, Raimund-Johannes; Jürimägi, Lembit; Orasson, Elmet; Josifovska, Galina; Oyeniran, Adeboye Stephen** DSD 2015 : 18th Euromicro Conference on Digital Systems Design : 26-28 August 2015, Funchal, Madeira, Portugal 2015 / p. 700-705 : ill

#### **Dynamic analysis of digital circuits with 5-valued simulation**

**Ubar, Raimund-Johannes** Mixed design of integrated circuits and systems 1998 / p. 187-192: ill  
[https://link.springer.com/chapter/10.1007/978-1-4615-5651-0\\_29](https://link.springer.com/chapter/10.1007/978-1-4615-5651-0_29)

#### **Eesti soosetete leviku seosed tektooniliste ricketega**

Štokalenko, Mihkel; **Orru, Mall** XIX aprillikonverentsi "Eesti mere- ja maapõue uuringutest ning arukast kasutamisest" teesid 2011 / lk. 25-27 : kaart

#### **Effect of electrode shape on medium voltage covered conductor insulation durability under electric stress**

**Kiitam, Ivar; Taklaja, Paul; Tuttelberg, Kaur** 59th Annual International Scientific Conference on Power and Electrical Engineering : November 12, 13, 2018, Riga Technical University (RTUCON) : conference proceedings 2018 / 6 p. : ill  
<https://doi.org/10.1109/RTUCON.2018.8659862>

#### **Effect of PM parameters variability on the operation quantities of a wind generator**

**Kallaste, Ants; Belahcen, Anouar; Vaimann, Toomas** 2015 IEEE Workshop on Electrical Machines Design, Control and Diagnosis (WEMDCD) : proceedings : Castello del Valentino, Torino, Italy, 26-27 March, 2015 2015 / p. 242-247 : ill  
<http://dx.doi.org/10.1109/WEMDCD.2015.7194536>

#### **Effective scalable IEEE 1687 instrumentation network for fault management**

**Jutman, Artur; Shibin, Konstantin; Devadze, Sergei** IEEE design & test 2013 / p. 26-35 : ill  
<https://doi.org/10.1109/MDAT.2013.2278535> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

#### **Efficient fault injection based on dynamic HDL slicing technique**

**Bagbaba, Ahmet Cagri; Jenihhin, Maksim; Raik, Jaan;** Sauer, Christian 2019 IEEE 25th International Symposium on On-Line Testing and Robust System Design (IOLTS 2019) : 1-3 July 2019, Greece 2019 / p. 52-53 : ill  
<https://doi.org/10.1109/IOLTS.2019.8854419>

#### **Efficient methodology for ISO26262 functional safety verification**

Augusto da Silva, Felipe; **Bagbaba, Ahmet Cagri;** Hamdioui, Said; Sauer, Christian 2019 IEEE 25th International Symposium on

**Efficient single-pattern fault simulation on structurally synthesized BDDs**

**Raik, Jaan; Ubar, Raimund-Johannes; Devadze, Sergei; Jutman, Artur** Dependable Computing - EDCC-5 : 5th European Dependable Computing Conference : Budapest, Hungary, April 20-22, 2005 : proceedings 2005 / p. 332-344 : ill

**EFIC-ME : a fast emulation based fault injection control and monitoring enhancement**

**Abideen, Zain Ul; Rashid, Muhammad Haroon** IEEE Access 2020 / p. 207705-207716

<https://doi.org/10.1109/ACCESS.2020.3038198> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

**Eksperdid: päikesetormide mõju pärast tänapäeval enam muretsema ei pea**

Piir, Rait novaator.err.ee 2024 [Eksperdid: päikesetormide mõju pärast tänapäeval enam muretsema ei pea](#)

**Elektrilevi investeeringutest ja võrgu katkestustest**

**Rajangu, Väino** Elektriala 2015 / lk. 28 [https://artiklid.elnet.ee/record=b2738903\\*est](https://artiklid.elnet.ee/record=b2738903*est)

**Elektrimasinate terviserikkeid aitaks ennetada tehisintellekt [Võrguväljaanne]**

**Kudelina, Karolina** novaator.err.ee 2021 ["Elektrimasinate terviserikkeid aitaks ennetada tehisintellekt"](#)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V : kaitsesüsteemide katsetus-, mõõte- ja seireseadmed. Osa 3, Rikkesilmuse näivtakistus = Electrical safety in low voltage distribution systems up to 1000 V a.c. and 1500 V d.c. : equipment for testing, measuring or monitoring of protective measures. Part 3, Loop impedance (IEC 61557-3:2019)**

2022 [https://www.ester.ee/record=b5509793\\*est](https://www.ester.ee/record=b5509793*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V : kaitsesüsteemide katsetus-, mõõte- ja seireseadmed. Osa 7, Faasijärjestus = Electrical safety in low voltage distribution systems up to 1000 V a.c. and 1500 V d.c. : equipment for testing, measuring or monitoring of protective measures. Part 7, Phase sequence (IEC 61557-7:2019)**

2022 [https://www.ester.ee/record=b5509797\\*est](https://www.ester.ee/record=b5509797*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed. Osa 10, Kombineeritud mõõteseadmed kaitseviiside katsetamiseks, mõõtmiseks ja seireks = Electrical safety in low voltage distribution systems up to 1000 V a.c. and 1500 V d.c. Equipment for testing, measuring or monitoring of protective measures. Part 10, Combined measuring equipment for testing, measuring or monitoring of protective measures (IEC 61557-10:2000)**

2010 [https://www.ester.ee/record=b2630134\\*est](https://www.ester.ee/record=b2630134*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2009 [https://www.ester.ee/record=b2462029\\*est](https://www.ester.ee/record=b2462029*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2009 [https://www.ester.ee/record=b2462036\\*est](https://www.ester.ee/record=b2462036*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2009 [https://www.ester.ee/record=b2478889\\*est](https://www.ester.ee/record=b2478889*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2009 [https://www.ester.ee/record=b2478886\\*est](https://www.ester.ee/record=b2478886*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2009 [https://www.ester.ee/record=b2478887\\*est](https://www.ester.ee/record=b2478887*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

**Risthein, Endel** 2010 [https://www.ester.ee/record=b2594967\\*est](https://www.ester.ee/record=b2594967*est)

**Elektriohutus madalpingevõrkudes vahelduvpingega kuni 1000 V ja alalispingega kuni 1500 V. Kaitsesüsteemide katsetus-, mõõte- ja seireseadmed**

Risthein, Endel 2010 [https://www.ester.ee/record=b2594972\\*est](https://www.ester.ee/record=b2594972*est)

### **Enabling cross-layer reliability and functional safety assessment through ML-based compact models**

Alexandrescu, Dan; **Balakrishnan, Aneesh**; Lange, Thomas; Glorieux, Maximilien Proceedings : 2020 26th IEEE International Symposium on On-Line Testing and Robust System Design : IOLTS 2020, Napoli, Italy, July 13-16, 2020 : virtual edition 2020 / 6 p. : ill <https://doi.org/10.1109/IOLTS50870.2020.9159750>

### **Enhancing hierarchical ATPG with a functional fault model for multiplexers [Electronic resource]**

**Raik, Jaan; Ubar, Raimund-Johannes** 7th IEEE Workshop on Design and Diagnostics of Electronic Circuits and Systems : April 18-21, 2004, Stará Lesná, Slovakia : proceedings 2004 / p. 219-222 : ill. [CD-ROM] <https://www.semanticscholar.org/paper/Enhancing-Hierarchical-Atpg-with-a-Functional-Fault-Raik-Ubar/b42e913ac070fd774df97bd644c4e6220704f8d4>

### **Enhancing transmission line reliability : an AI-driven approach to fault identification and classification**

**Shabbir, Noman; Kamran, Daniel; Raja, Hadi Ashraf** Electronics 2024

### **Environment for fault simulation acceleration on FPGA**

**Ellervee, Peeter; Raik, Jaan**; Tihomirov, Valentin BEC 2004 : proceedings of the 9th Biennial Baltic Electronics Conference : October 3-6, 2004, Tallinn, Estonia 2004 / p. 217-220 : ill

### **Environment for FPGA-based fault emulation**

**Ellervee, Peeter; Raik, Jaan; Tammemäe, Kalle; Ubar, Raimund-Johannes** Proceedings of the Estonian Academy of Sciences. Engineering 2006 / 3-2, p. 323-335 : ill

### **Environment for the analysis of functional self-test quality in digital systems**

**Ubar, Raimund-Johannes; Kostin, Sergei; Kruus, Helena; Aarna, Margit; Devadze, Sergei** Proceedings of the Estonian Academy of Sciences 2014 / p. 151-162 : ill [https://artiklid.elnet.ee/record=b2673964\\*est](https://artiklid.elnet.ee/record=b2673964*est) <https://doi.org/10.3176/proc.2014.2.05> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Estimation of complex derivatives and application for fault diagnosis**

**Baraškova, Tatjana; Arjassov, Gennadi; Gornostajev, Dmitri** Annals of DAAAM for 2012 & Proceedings of the 23rd International DAAAM Symposium : Intelligent Manufacturing & Automation 2012 / p. 0469-0472 : ill. [CD-ROM] [https://www.daaam.info/Downloads/Pdfs/proceedings/proceedings\\_2012/109.pdf](https://www.daaam.info/Downloads/Pdfs/proceedings/proceedings_2012/109.pdf)

### **Estimation of complex derivatives application for fault diagnosis**

**Baraškova, Tatjana**; Pascault, D. 17th International conference on "Mathematical Modelling and Analysis" : June 6-9, 2012, Tallinn, Estonia : abstracts 2012 / p. 19

### **Evaluating architectural, redundancy, and implementation strategies for radiation hardening of FinFET integrated circuits**

**Pagliarini, Samuel Nascimento**; Benites, Luis; Martins, Mayler; Rech, Paolo; Kastensmidt, Fernanda IEEE transactions on nuclear science 2021 / p. 1045-1053 <https://doi.org/10.1109/TNS.2021.3070643> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Exact parallel critical path fault tracing to speed-up fault simulation in sequential circuits**

**Kõusaar, Jaak; Ubar, Raimund-Johannes; Kostin, Sergei; Devadze, Sergei; Raik, Jaan** International journal of microelectronics and computer science 2018 / p. 9-18 <https://ijmcs.dmcs.pl/web/guest/vol.-9-no.-1> [https://ijmcs.dmcs.pl/documents/10630/345460/IJMCS\\_1\\_2018\\_2.pdf](https://ijmcs.dmcs.pl/documents/10630/345460/IJMCS_1_2018_2.pdf)

### **Experimental performance validation of Z-source DC circuit breaker for high impedance faults**

Pogulaguntla, Aditya; Naik Banavath, Satish; **Chub, Andrii; Vinnikov, Dmitri**; Singh, Rajendra 2024 IEEE Sixth International Conference on DC Microgrids (ICDCM) 2024 / 5 p <https://doi.org/10.1109/ICDCM60322.2024.10664702>

### **Experts: No need to worry about the impact of solar storms today**

Piir, Rait news.err.ee 2024 [Experts: No need to worry about the impact of solar storms today](#)

### **Explainability and transparency of classifiers for air-handling unit faults using explainable artificial intelligence (XAI)**

**Meas, Molika**; Machlev, Ram; **Köse, Ahmet; Tepļakov, Aleksei; Loo, Lauri**; Levron, Yoash; **Petlenkov, Eduard; Belikov, Juri** Sensors 2022 / art. 6338 : ill <https://doi.org/10.3390/s22176338> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Exploiting high-level descriptions for circuits fault tolerance assessments**

Benso, A.; Prinetto, Paolo; Rebaudengo, M.; Sonza Reorda, Matteo; **Raik, Jaan; Ubar, Raimund-Johannes** 1997 IEEE International Symposium on Defect and Fault Tolerance in VLSI Systems, Paris, October 20-22, 1997 1997 / p. 212-216 <https://ieeexplore.ieee.org/document/628327>

### **Exploration of Activation Fault Reliability in Quantized Systolic Array-Based DNN Accelerators**

**Taheri, Mahdi; Cherezova, Natalia**; Ansari, Mohammad Saeed; **Jenihhin, Maksim; Mahani, Ali; Daneshtalab, Masoud; Raik,**

**Jaana** 25th International Symposium on Quality Electronic Design (ISQED) 2024 / 8 p. : ill <https://ieeexplore.ieee.org/stamp/stamp.jsp?arnumber=10528372> <https://doi.org/10.1109/ISQED60706.2024.10528372> Conference proceedings at Scopus Article at Scopus Article at WOS

**Exploring the limits of early predictive maintenance in wind turbines applying an anomaly detection technique**

Jankauskas, Mindaugas; Serackis, Artūras; Šapurov, Martynas; Pomarnacki, Raimondas; Baskys, Algirdas; Hyunh, Van Khang; **Vaimann, Toomas**; Zakis, Janis Sensors 2023 / art. 5695 <https://doi.org/10.3390/s23125695> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Extended checkers for control part of routers in network-on-chips**

**Hariharan, Ranganathan; Niazmand, Behrad; Hollstein, Thomas; Raik, Jaan; Jervan, Gert** MEDIAN 2015 : the 4th Workshop on Manufacturable and Dependable Multicore Architectures at Nanoscale : March 13, 2015, Grenoble, France 2015 / p. 36-39 : ill

**Facebooki katkestus mõjutab nii ettevõtete kui ka riikide toimepidevust [Võrguväljaanne]**

Päri, Merilin err.ee 2021 ["Facebooki katkestus mõjutab nii ettevõtete kui ka riikide toimepidevust"](https://www.err.ee/10061070/facebooki-katkestus-mojutab-nii-ettevotete-kui-ka-riikide-toimepidevust)

**Facebooki, Instagrami ja Whatsappi tabas tohutu ülemaailmne rike [Võrguväljaanne]**

ohtuleht.ee 2021 ["Facebooki, Instagrami ja Whatsappi tabas tohutu ülemaailmne rike"](https://www.ohtuleht.ee/10061070/facebooki-instagrami-ja-whatsappi-tabas-tohutu-ulemaailmne-riike)

**Failure consequence evaluation of uncontrollable district heating network**

Mao, Ding; Wang, Peng; **Ju, Yuchen**; Ni, Long Sustainable cities and society 2022 / art. 103593, 16 p. : ill <https://doi.org/10.1016/j.scs.2021.103593> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Failure mechanisms in oil-shale pillars**

**Pastarus, Jüri-Rivaldo** Oil shale 1994 / 3, p. 251-257: ill [https://kirj.ee/wp-content/plugins/kirj/pub/OS-3-1994-251-257\\_20230316182205.pdf](https://kirj.ee/wp-content/plugins/kirj/pub/OS-3-1994-251-257_20230316182205.pdf)

**Fast extended test access via JTAG and FPGAs**

**Devadze, Sergei; Jutman, Artur; Aleksejev, Igor; Ubar, Raimund-Johannes** International Test Conference 2009 : November 1 - November 6, 2009, Austin Convention Center, Austin, Texas USA : proceedings 2009 / p. 1-7 : ill <http://dx.doi.org/10.1109/TEST.2009.5355668>

**Fast fault simulation for extended class of faults in scan-path circuits**

**Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan; Jutman, Artur** Proceedings : Fifth IEEE International Symposium on Electronic Design, Test and Applications : DELTA 2010 : 13-15 January 2010, Ho Chi Minh City, Vietnam 2010 / p. 14-19 <https://ieeexplore.ieee.org/document/5438717>

**Fast identification of true critical paths in sequential circuits**

**Ubar, Raimund-Johannes; Kostin, Sergei; Jenihhin, Maksim; Raik, Jaan; Jürimägi, Lembit** Microelectronics reliability 2018 / p. 252-261 : ill <https://doi.org/10.1016/j.microrel.2017.11.027> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Fast RTL fault simulation using decision diagrams and bitwise set operations**

**Reinsalu, Uljana; Raik, Jaan; Ubar, Raimund-Johannes; Ellervee, Peeter** 2011 IEEE International Symposium on Defect and Fault Tolerance in VLSI and Nanotechnology Systems (DFT) : 3-5 October 2011, Vancouver, Canada 2011 / p. 164-170 <https://ieeexplore.ieee.org/document/6104440>

**Fault aliasing of signature analyzers**

Kemnitz, Günter; Kärger, Reinhard BEC : Baltic Electronics Conference : proceedings of the 4th Biennial Conference, October 9-14, 1994, Tallinn (Estonia). 1 1994 / p. 339-346: ill

**Fault analysis of manufacturing systems as additional constraint by simulation**

**Karaulova, Tatjana; Papstel, Jüri** International journal of simulation modelling 2003 / 1/2, p. 5-13 : ill

**Fault analysis of manufacturing systems as additional constraint by simulation**

**Karaulova, Tatjana; Papstel, Jüri** DAAAM international scientific book 2003 2003 / p. 295-304 : ill

**Fault collapsing with linear complexity in digital circuits**

**Ubar, Raimund-Johannes; Mironov, Dmitri; Raik, Jaan; Jutman, Artur** Proceedings of 2010 IEEE International Symposium on Circuits and Systems (ISCAS 2010) : 30 May - 2 June 2010, Paris, France 2010 / p. 653-656 : ill <https://ieeexplore.ieee.org/document/5537504>

**Fault detecting accuracy of mechanical damages in rolling bearings**

**Kudelina, Karolina; Baraškova, Tatjana; Shirokova, Veronika; Vaimann, Toomas; Rassõlkin, Anton** Machines 2022 / art. 86 <https://doi.org/10.3390/machines10020086> Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

### **Fault detection and predictive maintenance of electrical machines : perspective chapter**

**Raja, Hadi Ashraf; Kudelina, Karolina; Asad, Bilal; Vaimann, Toomas** New Trends in Electric Machines - Technology and Applications 2022 <https://doi.org/10.5772/intechopen.107167>

### **Fault detection and protection strategy for multi-terminal HVDC grids using wavelet analysis**

**Kaur, Jashandeep; Jayasooriya, Manilka; Iqbal, Muhammad Naveed; Daniel, Kamran; Shabbir, Noman; Peterson, Kristjan** Energies 2025 / art. 1147 <https://doi.org/10.3390/en18051147>

### **Fault detection and protection system for the power converters with high-voltage IGBTs [Electronic resource]**

**Vinnikov, Dmitri; Roasto, Indrek; Lehtla, Tõnu** ICECS 2008 : The 15th IEEE International Conference on Electronics, Circuits and Systems : August 31 - September 3, 2008, Malta 2008 / p. 922-925 : ill. [CD-ROM] <https://ieeexplore.ieee.org/document/4675005>

### **Fault diagnosis in integrated circuits with BIST**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan; Evertson, Teet; Lensen, Harri** 10th Euromicro Conference on Digital System Design Architectures, Methods and Tools, DSD 2007 : 29-31 August 2007, Lübeck, Germany : proceedings 2007 / p. 604-610 : ill <http://dx.doi.org/10.1109/DSD.2007.4341530>

### **Fault diagnosis in VLSI devices**

**Ubar, Raimund-Johannes** Proceedings of the Estonian Academy of Sciences. Engineering 1995 / 1, p. 51-67

### **Fault diagnosis of additional vibration in Cartesian robot**

**Autsou, Siarhei** 21st International Symposium "Topical problems in the field of electrical and power engineering. Doctoral school of energy and geotechnology. III" : Pärnu, Estonia, June 15-18, 2022 2022 / p. 21-22 : ill [https://www.ester.ee/record=b5504019\\*est](https://www.ester.ee/record=b5504019*est)

### **Fault diagnosis system of Cartesian robot for various belt tension**

**Autsou, Siarhei; Vaimann, Toomas; Rassõlkin, Anton; Kudelina, Karolina** 2022 International Conference on Diagnostics in Electrical Engineering (Diagnostika) 2022 / 4 | <https://doi.org/10.1109/Diagnostika55131.2022.9905111>

### **Fault emulation on FPGA : a feasibility study**

**Ellervee, Peeter; Raik, Jaan; Tihomirov, Valentin** IEEE NORCHIP 2003 : 21 Norchip Conference : Riga, Latvia, 10-11 November 2003 : proceedings 2003 / p. 92-95 : ill [https://www.researchgate.net/publication/246171898\\_Fault\\_Emulation\\_on\\_FPGA\\_A\\_Feasibility\\_Study](https://www.researchgate.net/publication/246171898_Fault_Emulation_on_FPGA_A_Feasibility_Study)

### **Fault locating in unearthed MV networks based on analysis of wave transients**

**Järvik, Jaan; Panov, Valeri** The 4th International Conference Electric Power Quality and Supply Reliability : August 29...31, 2004, Pedase, Estonia : proceedings 2004 / p. 163-168

### **Fault management instrumentation network based on IEEE P1687 IJTAG**

**Shibin, Konstantin; Jutman, Artur; Devadze, Sergei** European Test Symposium (ETS), 2013, Avignon, France 2013

### **Fault management techniques to enhance the reliability of power electronic converters : an overview**

**Rahimpour, Saeed; Husev, Oleksandr; Vinnikov, Dmitri; Vosoughi Kurdkandi, Naser; Tarzamni, Hadi** IEEE Access 2023 / p. 13432-13446 <https://doi.org/10.1109/ACCESS.2023.3242918> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Fault model and test synthesis for RISC-processors**

**Ubar, Raimund-Johannes; Markus, Antti; Jervan, Gert; Raik, Jaan** BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 229-232: ill

### **Fault modeling and diagnosis in digital systems**

**Ubar, Raimund-Johannes** CREDES Summer School : Dependable Systems Design : handouts 2011 / p. 91-106 : ill

### **Fault path detection using a spectral method**

**Porwik, Piotr** BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 315-318: ill

### **Fault prediction in power network**

**Kangilaski, Taivo** The 7th Biennial Conference on Electronics and Microsystem Technology "Baltic Electronics Conference" : BEC 2000 : October 8 - 11, 2000, Tallinn, Estonia : conference proceedings 2000 / p. 289-292

### **Fault simulation and analysis of high-voltage circuit breaker's spring charging mechanism using a universal motor model**

**Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Kilter, Jako; Sardar, Muhammad Usman** 2024 IEEE 65th International Scientific Conference on Power and Electrical Engineering of Riga Technical University (RTUCON) 2024 / 5 p <https://doi.org/10.1109/RTUCON62997.2024.10830846>

### **Fault simulation of digital systems = Digitaalsüsteemide rikete simuleerimine**

**Devadze, Sergei** 2009 <https://digi.lib.ttu.ee/i/?445> [https://www.ester.ee/record=b2508727\\*est](https://www.ester.ee/record=b2508727*est)

**Fault simulation with parallel critical path tracing for combinational circuits using structurally synthesized BDDs**  
**Devadze, Sergei; Raik, Jaan; Jutman, Artur; Ubar, Raimund-Johannes** 7th IEEE Latin American Test Workshop LATW'06 : Buenos Aires, Argentina, March 26th-29th, 2006 : proceedings 2006 / p. 97-102 : ill

**Fault simulation with parallel exact critical path tracing in multiple core environment**  
**Gorev, Maksim; Ubar, Raimund-Johannes; Devadze, Sergei** 2015 Design, Automation & Test in Europe Conference & Exhibition (DATE) : proceedings 2015 / p. 1180-1185 : ill

**Fault-aware performance assessment approach for embedded networks**  
Malburg, Jan; **Janson, Karl; Raik, Jaan**; Dannemann, Frank 2019 22nd International Symposium on Design and Diagnostics of Electronic Circuits & Systems (DDECS), Cluj-Napoca, Romania : proceedings 2019 / 4 p. : ill  
<https://doi.org/10.1109/DDECS.2019.8724670>

**Fault-resilient NoC router with transparent resource allocation**  
**Putkaradze, Tsothe; Azad, Siavoosh Payandeh; Niazmand, Behrad; Raik, Jaan; Jervan, Gert** 12th International Symposium on Reconfigurable Communication-centric Systems-on-Chip (ReCoSoC2017), July 12-14, 2017, Madrid, Spain : proceedings 2017 / 8 p. : ill <https://doi.org/10.1109/ReCoSoC.2017.8016161> <https://ieeexplore.ieee.org/stamp/stamp.jsp?tp=&arnumber=8016161>

**Faults and fault models for integrated circuits and systems [Electronic resource] : [slides]**  
**Ubar, Raimund-Johannes** Design and Test Technology for Dependable Hardware/Software Systems : DEDIS/DAAD Summer Academy : BTU Cottbus, Sept. 1st-12th, 2008 2008 / [64] p. : ill. [CD-ROM]

**Fehler in Automaten**  
1989 [http://www.ester.ee/record=b2015320\\*est](http://www.ester.ee/record=b2015320*est)

**Fehlerbestimmung in kombinatorischen Scaltungen durch Lösung der Booleschen Differentialgleichungen**  
**Ubar, Raimund-Johannes** Nachrichtentechnik, Elektronik : technisch-wissenschaftliche Zeitschrift für die gesamte elektronische Nachrichtentechnik 1978 / p. 330-334 : ill [https://www.ester.ee/record=b1550811\\*est](https://www.ester.ee/record=b1550811*est)

**The FEM based modeling and corresponding test rig preparation for broken rotor bars analysis**  
**Asad, Bilal; Eensalu, Lauri; Vaimann, Toomas; Kallaste, Ants; Rassõlkin, Anton; Belahcen, Anouar** 2019 IEEE 60th International Scientific Conference on Power and Electrical Engineering of Riga Technical University (RTUCON), 7-9 October 2019 : conference proceedings 2019 / 9 p. : ill <https://doi.org/10.1109/RTUCON48111.2019.8982350>

**Finite element analysis based technique implementation for fault diagnostic of electrical machines**  
**Akbar, Siddique** 22nd International Symposium "Topical Problems in the Field of Electrical and Power Engineering". Doctoral School of Energy and Geotechnology III : Pärnu, Estonia, August 23-26, 2023 2023 / p. 103-104  
[https://www.ester.ee/record=b5570906\\*est](https://www.ester.ee/record=b5570906*est)

**First results on load model estimation using digital fault recorder measurements**  
**Leinakse, Madis; Sarnet, Tanel; Kangro, Triin; Kilter, Jako** 16th International Symposium "Topical Problems in the Field of Electrical and Power Engineering. Doctoral School of Energy and Geotechnology III" : Pärnu, Estonia, January 16-21, 2017 2017 / p. 101-105 : ill [http://www.ester.ee/record=b4650094\\*est](http://www.ester.ee/record=b4650094*est)

**FPGA based fault emulation of synchronous sequential circuits**  
**Ellervee, Peeter; Raik, Jaan; Tihomirov, Valentin; Ubar, Raimund-Johannes** Proceedings [of] 22nd NORCHIP Conference : Oslo, Norway, 8-9 November 2004 2004 / p. 59-62 <https://ieeexplore.ieee.org/abstract/document/1423822>

**FPGA-based fault emulation of synchronous sequential circuits**  
**Ellervee, Peeter; Raik, Jaan; Tammemäe, Kalle; Ubar, Raimund-Johannes** IET computers and digital techniques 2007 / 2, p. 70-76 : ill <https://ieeexplore.ieee.org/abstract/document/1423822>

**A framework for combining concurrent checking and online embedded test for low-latency fault detection in NoC routers**  
**Saltarelli, Pietro; Niazmand, Behrad; Raik, Jaan; Govind, Vineeth; Hollstein, Thomas; Jervan, Gert; Hariharan, Ranganathan** NOCS '15 : International Symposium on Networks-on-Chip : Vancouver, BC, Canada, September 28-30, 2015 2015 / [8] p. : ill <http://dx.doi.org/10.1145/2786572.2788713>

**From online fault detection to fault management in network-on-chips : a ground-up approach**  
**Azad, Siavoosh Payandeh; Niazmand, Behrad; Janson, Karl; Nevin, George; Oyeniran, Adeboye Stephen; Putkaradze, Tsothe; Apneet Kaur; Raik, Jaan; Jervan, Gert; Ubar, Raimund-Johannes; Hollstein, Thomas** Proceedings 2017 IEEE 20th International Symposium on Design and Diagnostics of Electronic Circuit & Systems (DDECS) : April 19-21, 2017, Dresden, Germany 2017 / p. 48-53 : ill <https://ieeexplore.ieee.org/stamp/stamp.jsp?tp=&arnumber=7934553>

**Generation of tests for the localization of single gate design errors in combinational circuits using the stuck-at fault model**  
**Ubar, Raimund-Johannes; Borrione, Dominique** XI Brazilian Symposium on Integrated Circuit Design, September 30 - October 3,

1998, Rio de Janeiro, Brazil : proceedings 1998 / p. 51-54 <https://ieeexplore.ieee.org/document/715409>

### **Guardbands in random testing**

Kemnitz, Günter BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 85-88: ill

### **Handling of SETs on NoC links by exploitation of inherent redundancy in circular input buffers [Online resource]**

Janson, Karl; Pihlak, Rene; Azad, Siavoosh Payandeh; Niazmand, Behrad; Jervan, Gert; Raik, Jaan BEC 2018 : 2018 16th Biennial Baltic Electronics Conference (BEC) : proceedings of the 16th Biennial Baltic Electronics Conference, October 8-10, 2018 2018 / 4 p.: ill <https://doi.org/10.1109/BEC.2018.8600989>

### **Harmonic spectrum analysis of induction motor with broken rotor bar fault**

Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Belahcen, Anouar 59th Annual International Scientific Conference on Power and Electrical Engineering : November 12, 13, 2018, Riga Technical University (RTUCON) : conference proceedings 2018 / 7 p. : ill <https://doi.org/10.1109/RTUCON.2018.8659842>

### **Health management for self-aware SoCs based on IEEE 1687 infrastructure**

Shibin, Konstantin; Devadze, Sergei; Jutman, Artur; Grabmann, Martin; Pricken, Robin IEEE Design & Test 2017 / p. 27-35 : ill <https://doi.org/10.1109/MDAT.2017.2750902> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Hierarchical approaches to test generation and fault simulation**

Ubar, Raimund-Johannes Radioelectronics and informatics 2003 / p. 204

### **Hierarchical calculation of malicious faults for evaluating the fault-tolerance**

Ubar, Raimund-Johannes; Devadze, Sergei; Jenihhin, Maksim; Raik, Jaan; Jervan, Gert; Ellervee, Peeter Proceedings : Fourth IEEE International Symposium on Electronic Design, Test and Applications : [DELTA 2008] : 23-25 January 2008, Hong Kong, SAR, China 2008 / p. 222-227 : ill <https://ieeexplore.ieee.org/document/4459544>

### **Hierarchical design error diagnosis in combinational circuits by stuck-at fault test patterns**

Ubar, Raimund-Johannes; Jutman, Artur Proceedings of the 6th International Conference on Mixed Design of Integrated Circuits and Systems : MIXDES'99 : Krakow, Poland, 17-19 June 1999 1999 / p. 437-442 : ill <https://www.sciencedirect.com/science/article/pii/S0026271499002036>

### **Hierarchical fault diagnosis in embedded digital systems with multi-level decision diagrams [Electronic resource]**

Ubar, Raimund-Johannes; Evertson, Teet; Lensen, Harri; Aarna, Margit 5th International Conference on Industrial Automation = Cinquieme Conference Internationale sur l'Automatisation Industrielle : June 11-13, 2007, Montreal, Canada 2007 / [6] p. [CD-ROM]

### **Hierarchical fault simulation in digital systems**

Ubar, Raimund-Johannes; Raik, Jaan; Ivask, Eero; Brik, Marina International Symposium on Signals, Circuits and Systems : SCS 2001 : July 10-11, 2001, Iasi, Romania : proceedings 2001 / p. 181-184 : ill

### **Hierarchical identification of NBTI-critical gates in nanoscale logic**

Kostin, Sergei; Raik, Jaan; Ubar, Raimund-Johannes; Jenihhin, Maksim LATW2014 : 15th IEEE Latin-American Test Workshop : Fortaleza, Brazil, March 12th-15th, 2014 2014 / [6] p. : ill

### **Hierarchical identification of untestable faults in sequential circuits**

Raik, Jaan; Ubar, Raimund-Johannes; Krivenko, Anna; Kruus, Margus 10th Euromicro Conference on Digital System Design Architectures, Methods and Tools, DSD 2007 : 29-31 August 2007, Lübeck, Germany : proceedings 2007 / p. 668-671 : ill <http://dx.doi.org/10.1109/DSD.2007.4341539>

### **High level fault modeling in digital systems**

Ubar, Raimund-Johannes; Aarna, Margit; Brik, Marina; Raik, Jaan Synergies between Information and Automation : 49. Internationales Wissenschaftliches Kolloquium, 27.-30.9.2004, Technische Universität Ilmenau, Germany. Volume 2 2004 / p. 486-491

### **High-frequency current sensor for power network on-line measurements**

Kütt, Lauri; Järvi, Jaan; Vaimann, Toomas; Shafiq, Muhammad; Lehtonen, Matti; Kilter, Jako Proceedings of the 13th International Scientific Conference Electric Power Engineering 2012 : EPE 2012 : Brno. Vol. 1 2012 / p. 367-371 : ill [https://www.researchgate.net/publication/262674502\\_High-Frequency\\_Current\\_Sensor\\_for\\_Power\\_Network\\_On-line\\_Measurements](https://www.researchgate.net/publication/262674502_High-Frequency_Current_Sensor_for_Power_Network_On-line_Measurements)

### **High-level decision diagram based fault models for targeting FSMs**

Raik, Jaan; Ubar, Raimund-Johannes; Viilukas, Taavi 9th EUROMICRO Conference on Digital Systems Design : Architectures, Methods and Tools (DSD 2006) : 30 August 2006-1 September 2006, Cavtat near Dubrovnik, Croatia : proceedings 2006 / p. 353-358 : ill <http://dx.doi.org/10.1109/DSD.2006.60>

### **High-level design error diagnosis using backtrace on decision diagrams**

Raik, Jaan; Repinski, Urmis; Ubar, Raimund-Johannes; Jenihhin, Maksim; Tšepurov, Anton 28th Norchip Conference : Tampere, Finland, 15-16 November 2010 : conference program and papers 2010 / [4] p. : ill

<http://dx.doi.org/10.1109/NORCHIP.2010.5669486>

### **High-level fault diagnosis in RISC processors with Implementation-Independent Functional Test**

**Oyeniran, Adeboye Stephen; Jenihhin, Maksim; Raik, Jaan; Ubar, Raimund-Johannes** 2022 IEEE Computer Society Annual Symposium on VLSI (ISVLSI) : Nicosia, Cyprus : 04-06 July 2022 2022 / p. 32-37 <https://doi.org/10.1109/ISVLSI54635.2022.00019>

### **High-level functional test generation for microprocessor modules**

**Oyeniran, Adeboye Stephen; Ubar, Raimund-Johannes** Proceedings of 26th International Conference Mixed Design of Integrated Circuits and Systems : MIXDES 2019 : Rzeszów, Poland, June 27 - 29, 2019 2019 / p. 356-361 : ill <https://doi.org/10.23919/MIXDES.2019.8787131>

### **High-level modeling and testing of multiple control faults in digital systems**

**Jasnetski, Artjom; Oyeniran, Adeboye Stephen; Tšertov, Anton; Schölzel, Mario; Ubar, Raimund-Johannes** Formal proceedings of the 2016 IEEE 19th International Symposium on Design and Diagnostics of Electronic Circuits & Systems (DDECS) : April 20-22, 2016, Košice, Slovakia 2016 / [6] p. : ill <http://dx.doi.org/10.1109/DDECS.2016.7482445>

### **High-level path activation technique to speed up sequential circuit test generation**

**Raik, Jaan; Ubar, Raimund-Johannes** European Test Workshop 1999 : proceedings, May 25-28, 1999, Constance, Germany 1999 / p. 84-89 : ill <https://ieeexplore.ieee.org/document/804289>

### **High-level test generation for processing elements in many-core systems**

**Oyeniran, Adeboye Stephen; Ubar, Raimund-Johannes; Azad, Siavoosh Payandeh; Raik, Jaan** 12th International Symposium on Reconfigurable Communication-centric Systems-on-Chip (ReCoSoC2017), July 12-14, 2017, Madrid, Spain : proceedings 2017 / 8 p. : ill <http://dx.doi.org/10.1109/ReCoSoC.2017.8016156>

### **High-speed logic level fault simulation**

**Ubar, Raimund-Johannes; Devadze, Sergei** Design and test technology for dependable systems-on-chip 2011 / p. 310-335 : ill <https://www.igi-global.com/chapter/high-speed-logic-level-fault/51407>

### **Hilbert transform, an effective replacement of Park's vector modulus for the detection of rotor faults**

**Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Rassõlkin, Anton; Belahcen, Anouar** 2019 Electric Power Quality and Supply Reliability Conference (PQ) & 2019 Symposium on Electrical Engineering and Mechatronics (SEEM), Kärdla, Estonia, June 12-15, 2019 : proceedings 2019 / 4 p. : ill <https://doi.org/10.1109/PQ.2019.8818227>

### **Hispaania stsenaarium: miks elektrisüsteemid ootamatult kustuvad**

**Landsberg, Mart** postimees.ee 2025 <https://tehnika.postimees.ee/8239729/eksperdi-ulevaade-hispaania-stsenaarium-miks-elektrisusteemid-ootamatult-kustuvad>

### **Holistic approach for Fault-Tolerant Network-on-Chip based many-core systems [Online resource]**

**Azad, Siavoosh Payandeh; Niazmand, Behrad; Raik, Jaan; Jervan, Gert; Hollstein, Thomas** arXiv.org 2016 / [8] p. : ill

### **Hybrid built-in self-test : methods and tools for analysis and optimization of BIST = Sisseehitatud hübriidne isetestimine : meetodid ja vahendid analüüsiks ning optimeerimiseks**

**Orasson, Elmet** 2007 [https://www.ester.ee/record=b2305436\\*est](https://www.ester.ee/record=b2305436*est)

### **Hybrid FEA-Simulink modelling of permanent magnet assisted synchronous reluctance motor with unbalanced magnet flux**

**Pando-Acedo, Jaime; Rassõlkin, Anton; Lehikoinen, Antti; Vaimann, Toomas; Kallaste, Ants; Romero-Cadaval, Enrique; Belahcen, Anouar** 2019 IEEE 12th International Symposium on Diagnostics for Electrical Machines, Power Electronics and Drives (SDEMPED), 27-30 Aug. 2019, Toulouse, France : proceedings 2019 / p. : 174-180 : ill <https://doi.org/10.1109/DEMPED.2019.8864925>

### **Identification and location of PD defects in medium voltage underground power cables using high frequency current transformer**

**Shafiq, Muhammad; Kiitam, Ivar; Taklaja, Paul; Kütt, Lauri; Kauhaniemi, Kimmo; Palu, Ivo** IEEE Access 2019 / art. 8771171, p. 103608 - 103618 : ill <https://doi.org/10.1109/ACCESS.2019.2930704> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Impact of faults and different operating conditions on current parameters in case of broken rotor bars**

**Kudelina, Karolina** 21st International Symposium "Topical problems in the field of electrical and power engineering. Doctoral school of energy and geotechnology. III" : Pärnu, Estonia, June 15-18, 2022 2022 / p. 41-42 : ill [https://www.ester.ee/record=b5504019\\*est](https://www.ester.ee/record=b5504019*est)

### **Implementation of protection features for a modular bidirectional solid-state battery disconnecter**

**Dsa, Daniel; Chinnusamy, Abhinav; Banavath, Satish Naik; Carvalho da Silva, Edivan Laercio** IEEE journal of emerging and selected topics in power electronics 2024 <https://doi.org/10.1109/JESTPE.2024.3502157>

### **Implementation-independent functional test generation for RISC microprocessors**

**Oyeniran, Adeboye Stephen; Ubar, Raimund-Johannes; Jenihhin, Maksim; Raik, Jaan** VLSI-SoC 2019 : 27th IFIP/IEEE International Conference on Very Large Scale Integration : [proceedings] 2019 / p. 82-87 : ill <https://doi.org/10.1109/VLSI-SoC.2019.8920323>

#### **Implementation-independent test generation for a large class of faults in RISC processor modules**

**Jenihhin, Maksim; Oyeniran, Adeboye Stephen; Raik, Jaan; Ubar, Raimund-Johannes** 24th Euromicro Conference on Digital System Design (DSD) 2021 <https://doi.org/10.1109/DSD53832.2021.00090>

#### **An improved estimation methodology for hybrid BIST cost calculation**

**Jervan, Gert; Peng, Zebo; Ubar, Raimund-Johannes; Korelina, Olga** Proceedings [of] 22nd NORCHIP Conference : Oslo, Norway, 8-9 November 2004 2004 / p. 297-300 : ill <https://ieeexplore.ieee.org/document/1423882>

#### **Improved fault classification and localization in power transmission networks using vae-generated synthetic data and machine learning algorithms**

**Khan, Muhammad Amir; Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Pomarnacki, Raimondas; Hyunh, Van Khang** Machines 2023 / art. 963 <https://doi.org/10.3390/machines11100963> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

#### **Improved fault emulation for synchronous sequential circuits**

**Raik, Jaan; Ellervee, Peeter; Tihhomirov, Valentin; Ubar, Raimund-Johannes** Proceedings : DSD'2005 : 8th Euromicro Conference on Digital System Design : Architectures, Methods and Tools : Porto, Portugal, August 30 - September 3, 2005 2005 / p. 72-78 : ill

#### **Improving the confidence level in functional safety simulation tools for ISO 26262**

**Bagbaba, Ahmet Cagri; Augusto da Silva, Felipe; Sauer, Christian** 2018 Design and Verification Conference (DVCON) Europe : [proceedings] 2018 / 6 p. : ill <https://dvcon-proceedings.org/document/improving-the-confidence-level-in-functional-safety-simulation-tools-for-iso-26262/> <https://zenodo.org/record/3361607#.Y0PHFnZByHs>

#### **Insulation durability and measurement of partial discharge = Isolatsiooni vastupidavus ja osalahenduste mõõtmine**

**Kiitam, Ivar** 2021 [https://www.ester.ee/record=b5473274\\*est](https://www.ester.ee/record=b5473274*est) <https://digikogu.taltech.ee/et/Item/401e6d0b-f51d-488f-b0d6-2e2bdb8f9496> <https://doi.org/10.23658/taltech.62/2021>

#### **Integrated modelling, fault management, verification and reliable design environment for cyber-physical systems**

**Raik, Jaan; Rauwerda, Gerard; Zhao, Yong; Shibin, Konstantin** MEDIAN Finale : Workshop on Manufacturable and Dependable Multicore Architectures at Nanoscale : November 10-11, 2015, Tallinn, Estonia 2015 / p. 74

#### **Intelligent diagnostic centers: a new way to distributed fault-tolerance**

**Varkonyi-Koczy, Annamaria R.; Tilly, K.; Dobrowiecki, Tadeusz; Vadasz, B.; Kiss, I.** BEC : Baltic Electronics Conference : proceedings of the 4th Biennial Conference, October 9-14, 1994, Tallinn (Estonia). 1 1994 / p. 365-368: ill

#### **Internet based test generation and fault simulation**

**Ivask, Eero; Ubar, Raimund-Johannes; Raik, Jaan; Schneider, Andre** IEEE Design and Diagnostics of Electronic Circuits and Systems - IEEE DDECS 2001 : Fourth International Workshop on IEEE Design and Diagnostics of Electronic Circuits and Systems : Győr, Hungary, April 18-20, 2001 2001 / p. 57-60 : ill

#### **Internet-based collaborative test generation with MOSCITO [Electronic resource]**

**Schneider, Andre; Ivask, Eero; Miklos, P.; Raik, Jaan; Diener, Karl-Heinz; Ubar, Raimund-Johannes; Cibakova, Tatiana; Gramatova, Elena** SIGDA publications on CD-ROM : DATE'02 : Design, Automation and Test in Europe, Paris, France, March 4-8, 2002 2002 / [6] p. [CD-ROM] [https://www.cecs.uci.edu/~papers/date07/PAPERS/2002/DATE02/PDFFILES/02E\\_2.PDF](https://www.cecs.uci.edu/~papers/date07/PAPERS/2002/DATE02/PDFFILES/02E_2.PDF)

#### **Investigating the progression of insulation degradation in power cable based on partial discharge measurements**

**Hassan, Waqar; Shafiq, Muhammad; Hussain, Ghulam Amjad; Choudhary, Maninder; Palu, Ivo** Electric power systems research 2023 / art. 109452 <https://doi.org/10.1016/j.epsr.2023.109452> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

#### **Invited paper: System-Wide Fault Management based on IEEE P1687 IJTAG**

**Jutman, Artur; Devadze, Sergei; Aleksejev, Jevgeni** 6th International Workshop on Reconfigurable Communication-centric Systems-on-Chip (ReCoSoC) : 20-22 June 2011, Montpeillier, France 2011 / [4] p.: ill <https://ieeexplore.ieee.org/document/5981520>

#### **IoT based tools and methods for electrical machine diagnostics = Asjade interneti põhised tööriistad ja meetodid elektrimasinate diagnostikaks**

**Raja, Hadi Ashraf** 2023 <https://doi.org/10.23658/taltech.20/2023> <https://digikogu.taltech.ee/et/Item/3015334f-c32b-43ae-ba2d-bfcda536aba5> [https://www.ester.ee/record=b5558656\\*est](https://www.ester.ee/record=b5558656*est)

#### **Kordsete rikete diagnostika järjestikülülitustes**

**Puulinn, S.; Ubar, Raimund-Johannes** XXIX vabariiklik üliõpilaste teaduslik- tehniline konverents 30. märtsist - 1. aprillini 1977 : ettekannete teesid 1977 / lk. 43 [https://www.ester.ee/record=b2449987\\*est](https://www.ester.ee/record=b2449987*est)

## **Kui pikk peab olema elektrikatkestus**

**Valdna, Vello** Tallinna Tehnikaülikooli aastaraamat 2003 2004 / lk. 169-170

## **Kui pikk peab olema elektrikatkestus : [poliitikut peavad väärtustama reaalharidust, insenerikoolitust ja tehnikateadusi]**

**Valdna, Vello** Postimees 2003 / 23. sept., lk. 13 <https://arvamus.postimees.ee/2049577/kui-pikk-peab-olema-elektrikatkestus>

## **Kuidas teha peedist pesumasinale trumlit? Auvere elektrijaam neelab veel miljoneid ega hakka niipea normaalselt tööle!**

**Niitra, Nils** ohtuleht.ee 2023 / lk. 4-5 [Kuidas teha peedist pesumasinale trumlit? Auvere elektrijaam neelab veel miljoneid ega hakka niipea normaalselt tööle!](https://ohtuleht.ee/2023/04/04/kuidas-teha-peedist-pesumasinale-trumlit-auvere-elektrijaam-neelab-veel-miljoneid-ega-hakka-niipea-normaalselt-toole)

## **Kuumvahetusmoodulid**

**Toomsalu, Arvo** A & A 1999 / 4, lk. 13-15 [https://artiklid.elnet.ee/record=b1002041\\*est](https://artiklid.elnet.ee/record=b1002041*est)

## **Localization of single-gate design errors in combinational circuits by diagnostic information about stuck-at faults**

**Ubar, Raimund-Johannes**; Borrione, Dominique Proceedings of the 2nd International Workshop on Design and Diagnostics of Electronic Circuits and Systems, Szczyrk, Poland, September 2-4, 1998 1998 / p. 73-79  
[https://www.researchgate.net/publication/238687832\\_Localization\\_of\\_Single\\_Gate\\_Design\\_Errors\\_in\\_Combinational\\_Circuits\\_by\\_Diagnostic\\_Information\\_about\\_Stuck-at\\_Faults](https://www.researchgate.net/publication/238687832_Localization_of_Single_Gate_Design_Errors_in_Combinational_Circuits_by_Diagnostic_Information_about_Stuck-at_Faults)

## **Logic simulation and fault collapsing with shared structurally synthesized BDDs**

**Mironov, Dmitri; Ubar, Raimund-Johannes; Raik, Jaan** 2014 19th IEEE European Test Symposium (ETS) : May 26th-30th, 2014, Paderborn, Germany : proceedings 2014 / [2] p. : ill

## **Logic-based implementation of fault-tolerant routing in 3D Network-on-Chips**

**Niazmand, Behrad; Azad, Siavoosh Payandeh; Flich, Jose; Raik, Jaan; Jervan, Gert; Hollstein, Thomas** 2016 Tenth IEEE/ACM International Symposium on Networks-on-Chip (NOCS) : Nara, Japan, 31 August - 2 September 2016 2016 / [8] p. : ill  
<https://doi.org/10.1109/NOCS.2016.7579317>

## **Londoni kiirabi automaatse edastussüsteemi läbikukkumine 1992. aastal**

**Nestor, Triin** A & A 2007 / 5, lk. 18-27 [https://artiklid.elnet.ee/record=b1021106\\*est](https://artiklid.elnet.ee/record=b1021106*est)

## **Machine learning clustering techniques for selective mitigation of critical design features**

**Lange, Thomas; Balakrishnan, Aneesh; Glorieux, Maximilien; Alexandrescu, Dan; Sterpone, Luca** Proceedings : 2020 26th IEEE International Symposium on On-Line Testing and Robust System Design : IOLTS 2020, Napoli, Italy, July 13-16, 2020 : virtual edition 2020 / 7 p. : ill <https://doi.org/10.1109/IOLTS50870.2020.9159751>

## **Machine learning to tackle the challenges of transient and soft errors in complex circuits**

**Lange, Thomas; Balakrishnan, Aneesh; Glorieux, Maximilien; Alexandrescu, Dan; Sterpone, Luca** IEEE 25th International Symposium on On-Line Testing and Robust System Design (IOLTS), 1-3 July 2019, Greece 2019 / p. 7-14 : ill  
<https://doi.org/10.1109/IOLTS.2019.8854423>

## **Machinery risk assessment integration with design and development methods for risk and potential failure reduction considering safety and efficiency**

**Sivitski, Alina; Põdra, Priit** Modern materials and manufacturing 2023 : Tallinn, Estonia, 2-4 May 2023 2024 / art. 030013  
<https://doi.org/10.1063/5.0189257> [Journal metrics at Scopus](#) [Article at Scopus](#)

## **Macro level defect-oriented diagnosability of digital circuits**

**Kostin, Sergei; Ubar, Raimund-Johannes; Raik, Jaan** BEC 2010 : 2010 12th Biennial Baltic Electronics Conference : proceedings of the 12th Biennial Baltic Electronics Conference : Tallinn University of Technology, October 4-6, 2010, Tallinn, Estonia 2010 / p. 149-152 : ill

## **Magnetic equivalent circuit and Lagrange interpolation function modeling of induction machines under broken bar faults**

**Hemeida, Ahmed; Billah, Md Masum; Kudelina, Karolina; Asad, Bilal; Naseer, Muhammad Usman; Guo, Baocheng; Martin, Floran; Rasilo, Paavo; Belahcen, Anouar** IEEE transactions on magnetics 2024 / art. 8200704, 4 p  
<https://doi.org/10.1109/TMAG.2023.3306207> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

## **Main bird excrement contamination type causing insulator flashovers in 110 kV overhead power lines in Estonia**

**Taklaja, Paul; Oidram, Rein; Niitsoo, Jaan; Palu, Ivo** Oil shale 2013 / p. 211-224 : ill [https://artiklid.elnet.ee/record=b2631738\\*est](https://artiklid.elnet.ee/record=b2631738*est)  
<https://doi.org/10.3176/oil.2013.2S.03> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

## **Main gear-faults in industrial hitara**

**Autsou, Sjarhei** 20th International Symposium "Topical problems in the field of electrical and power engineering. Doctoral school of energy and geotechnology. III" : Tallinn, Estonia, September 8-10, 2021 2022 / p. 17-18 : ill [https://www.ester.ee/record=b5457278\\*est](https://www.ester.ee/record=b5457278*est)

## **Mapping faults in hierarchical testing of digital systems**

**Ubar, Raimund-Johannes** International Conference on Computer, Communication and Control Technologies CCCT'03 and the 9th International Conference on Information Systems, Analysis and Synthesis ISAS'03 : July 31 - August 1-2, Orlando, Florida, USA : proceedings. Volume I, Computing/Information Systems and Technologies 2003 / p. 14-19 : ill

#### **Marginal PCB assembly defect detection on DDR3/4 memory bus**

**Odintsov, Sergei; Jutman, Artur; Devadze, Sergei** 2017 IEEE International Test Conference (ITC 2017) : Forth Worth, Texas, USA, 31 October - 2 November 2017 / p. 238-247 : ill <https://doi.org/10.1109/TEST.2017.8242070> [Conference proceedings at Scopus Article at Scopus Article at WOS](#)

#### **A mathematical model for the determination of leakage in mains and water distribution networks**

**Koppel, Tiit; Ainola, Leo; Puust, Raido** Proceedings of the Estonian Academy of Sciences. Engineering 2007 / 1, p. 3-16 : ill

#### **Mathematical modelling of three phase squirrel cage induction motor and related signal processing for fault diagnostics = Kolmefaasilise lühisrootoriga asünkroonmootori matemaatiline modelleerimine ning lähtuv rikkediagnostiline signaalitöötlus**

**Asad, Bilal** 2021 <https://digikogu.taltech.ee/et/Item/8b5869c8-de30-4380-a0c6-8a6a2d6b6ff3> [https://www.ester.ee/record=b5452432\\*est](https://www.ester.ee/record=b5452432*est) <https://doi.org/10.23658/taltech.40/2021>

#### **Me peame rääkima Facebookist**

Kivi, Krister Postimees 2021 / Lk. 17 [https://www.ester.ee/record=b1072778\\*est](https://www.ester.ee/record=b1072778*est)

#### **Metallitööstus pani tehisintellekti seadmetest rikkeid otsima [Võrguväljaanne]**

toostusuudised.ee 2022 / Lk. 14 [Metallitööstus pani tehisintellekti seadmetest rikkeid otsima](#)

#### **Methods for improving the accuracy and efficiency of fault simulation in digital systems = Meetodid digitaalsüsteemide rikete simuleerimise täpsuse ja efektiivsuse tõstmiseks**

**Kõusaar, Jaak** 2019 <https://digi.lib.ttu.ee/i/?11667>

#### **Methods of condition monitoring and fault detection for electrical machines**

**Kudelina, Karolina; Asad, Bilal; Vaimann, Toomas; Rassõlkin, Anton; Kallaste, Ants;** Khang, Huynh Van Energies 2021 / art. 7459, 20 p. : ill <https://doi.org/10.3390/en14227459> [Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS](#)

#### **Middle-frequency isolation transformer design issues for the high-voltage DC/DC converter**

**Vinnikov, Dmitri; Laugis, Juhan; Galkin, Ilja** PESC 08 : 39th IEEE Annual Power Electronics Specialists Conference : Rhodes, Greece, 15-19 June 2008 : book of one page paper summaries 2008 / p. 304 : ill <https://ieeexplore.ieee.org/document/4592226>

#### **Middle-frequency isolation transformer design issues for the high-voltage DC/DC converter**

**Vinnikov, Dmitri; Laugis, Juhan; Galkin, Ilja** Proceedings of 2008 IEEE 39th Annual Power Electronics Specialists Conference : PESC 2008 : Rhodes, Greece, 15-19 June 2008 / p. 1930-1936 <https://ieeexplore.ieee.org/document/4592226>

#### **Miks Facebook ei tööta? Põhjuseks võib olla ebaõnnestunud tarkvarauuendus [Võrguväljaanne]**

Veedla, Alice delfi.ee 2021 ["Miks Facebook ei tööta? Põhjuseks võib olla ebaõnnestunud tarkvarauuendus"](#)

#### **Minimisation of higher harmonics in high power saturable reactors for AC power transmission lines**

**Tellinen, Juhan; Järvik, Jaan** Power Quality '98 : [International Conference, June 18-20, 1998] : Hyderabad, India / The Institute of Electrical and Electronics Engineers, Inc 1998 / p. 133-138: ill <https://ieeexplore.ieee.org/document/710367>

#### **Minimization of the high-level fault model for microprocessor control parts [Online resource]**

**Ubar, Raimund-Johannes; Oyeniran, Adeboye Stephen; Medaiyese, Olusiji** BEC 2018 : 2018 16th Biennial Baltic Electronics Conference (BEC) : proceedings of the 16th Biennial Baltic Electronics Conference, October 8-10, 2018 / 4 p.: ill <https://doi.org/10.1109/BEC.2018.8600980>

#### **Missugused varutoiteallikad valida, et elada üle elektrikatkestused**

**Thalfeldt, Martin; Rosin, Argo** maakodu.delfi.ee 2023 [Missugused varutoiteallikad valida, et elada üle elektrikatkestused](#)

#### **Mixed hierarchical-functional fault models for targeting sequential cores**

**Raik, Jaan; Ubar, Raimund-Johannes; Viilukas, Taavi; Jenihhin, Maksim** Journal of systems architecture 2008 / 3/4, p. 465-477 : ill <https://www.sciencedirect.com/science/article/abs/pii/S1383762107001166>

#### **Mixed-level defect simulation in data-paths of digital systems**

**Ubar, Raimund-Johannes; Raik, Jaan; Ivask, Eero; Brik, Marina** 23rd International Conference on Microelectronics : MIEL 2002, Niš, Yugoslavia, 12-15 May 2002 : proceedings. Volume 2 2002 / p. 617-620 : ill <https://ieeexplore.ieee.org/document/1003333>

#### **Model verification for analysis of wind power impact to transient stability in isolated power system using combined relay protection and dynamics modelling approach**

**Maripuu, Rain; Tsernobrovkin, Oleg; Palu, Ivo; Kilter, Jako** PQ2012 : 8th International Conference : 2012 Electric Power Quality

and Supply Reliability : June 11-13, 2012, Tartu, Estonia : conference proceedings 2012 / p. 169-174 : ill  
<https://ieeexplore.ieee.org/stamp/stamp.jsp?arnumber=6256222>

#### **Modeling microprocessor faults on high-level decision diagrams [Electronic resource]**

**Ubar, Raimund-Johannes; Raik, Jaan; Jutman, Artur; Jenihhin, Maksim; Istenberg, Martin; Wuttke, Heinz-Dietrich** DSN 2008 : supplemental : 2008 IEEE International Conference on Dependable Systems & Networks With FTCS & DCC (DSN) : June 24-27, 2008, Anchorage, Alaska 2008 / p. C17-C22 : ill. [CD-ROM]  
[https://webhost.laas.fr/TSF/WDSN08/2ndWDSN08\(LAAS\)\\_files/Slides/WDSN08S-04-Ubar.pdf](https://webhost.laas.fr/TSF/WDSN08/2ndWDSN08(LAAS)_files/Slides/WDSN08S-04-Ubar.pdf)

#### **Modeling sequential circuits with shared structurally synthesized BDDs**

**Ubar, Raimund-Johannes; Marenkov, Mihail; Mironov, Dmitri; Viies, Vladimir** Proceedings of 2014 9th International Design & Test Symposium (IDT) : Sheraton Club des Pins Hotel, Algiers, Algeria, December 16-18, 2014 / p. 130-135 : ill

#### **Modified winding function-based model of squirrel cage induction motor for fault diagnostics**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants; Rassõlkin, Anton; Iqbal, Muhammad Naveed** IET electric power applications 2020 / p. 1722-1734 <https://doi.org/10.1049/iet-epa.2019.1002> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

#### **Mootoririkkega uurimislav Salme ootab tormivarjusi ilma paranemist [Võrguväljaanne]**

postimees.ee 2021 ["Mootoririkkega uurimislav Salme ootab tormivarjusi ilma paranemist"](#)

#### **Multi-level fault simulation of digital systems on decision diagrams**

**Ubar, Raimund-Johannes; Raik, Jaan; Ivask, Eero; Brik, Marina** The First IEEE International Workshop on Electronic Design, Test and Applications : DELTA 2002, 29-31 January 2002, Christchurch, New Zealand : proceedings 2002 / p. 86-91 : ill

#### **Multi-level test generation and fault diagnosis in digital systems**

**Ubar, Raimund-Johannes** 1992

#### **Multi-level test generation for digital systems at system, circuit and defect levels**

**Ubar, Raimund-Johannes** Proceedings of the 7th International Scientific Conference "Theory and Technique of Information Transmission, Reception and Processing" : Tuapse, October 1-4, 2001 / p. 286-288

#### **Multi-loop model reference adaptive control of fractional-order PID control systems**

**Alagoz, Baris Baykant; Tepljakov, Aleksei; Petlenkov, Eduard; Yeroglu, Celaeddin** 2017 40th International Conference on Telecommunications and Signal Processing TSP : July 5-7, 2017, Barcelona, Spain 2017 / p. 702-705 : ill  
<https://doi.org/10.1109/TSP.2017.8076078>

#### **Multiple control fault testing in digital systems with high-level decision diagrams**

**Ubar, Raimund-Johannes; Oyeniran, Adeboye Stephen** 2016 IEEE International Conference on Automation, Quality and Testing, Robotics (AQTR) : THETA 20th edition : 19th-21st May, Cluj-Napoca, Romania : proceedings 2016 / [6] p. : ill  
<http://dx.doi.org/10.1109/AQTR.2016.7501287>

#### **Multiple fault testing in systems-on-chip with high-level decision diagrams**

**Ubar, Raimund-Johannes; Oyeniran, Adeboye Stephen; Schölzel, Mario; Vierhaus, Heinrich Theodor** Proceedings of 2015 10th International Design & Test Symposium (IDT) : Dead Sea, Jordan, 14-16 December 2015 / p. 66-71 : ill  
<http://dx.doi.org/10.1109/IDT.2015.7396738>

#### **Multiple stuck-at-fault detection theorem**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** Proceedings of the 2012 IEEE 15th International Symposium on Design and Diagnostics of Electronic Circuits & Systems (DDECS) : April 18-20, 2012 Tallinn, Estonia 2012 / p. 236-241 : ill

#### **Multiple-objective backtrace for solving test generation constraints**

**Mekler, A.; Raik, Jaan** International Symposium on System-on-Chip : November 19-21, 2003, Tampere, Finland : proceedings 2003 / p. 123-126 : ill <https://ieeexplore.ieee.org/document/1267732>

#### **Naine, kes muudab maailma: noor teadlane loob süsteemi, mis ennetab elektrimasinate rikkeid [Võrguväljaanne]**

Keba, Triinu delfi.ee 2022 [Naine, kes muudab maailma: noor teadlane loob süsteemi, mis ennetab elektrimasinate rikkeid](#)

#### **Necessity for implementation of inverse problem theory in electric machine fault diagnosis**

**Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants** SDEMPED 2015 : 10th IEEE International Symposium on Diagnostics for Electric Machines, Power Electronics and Drives : Guarda, Portugal, September 1-4, 2015 : proceedings 2015 / p. 380-385 : ill  
<http://dx.doi.org/10.1109/DEMPED.2015.7303718>

#### **New built-in self-test scheme for SoC interconnect**

**Jutman, Artur; Ubar, Raimund-Johannes; Raik, Jaan** The 9th World Multi-Conference on Systemics, Cybernetics and Informatics : WMSCI 2005 : July 10-13, 2005, Orlando, Florida, USA. Vol. IV 2005 / p. 19-24 : ill  
[https://www.researchgate.net/publication/237375234\\_New\\_Built-In\\_Self-Test\\_Scheme\\_for\\_SoC\\_Interconnect](https://www.researchgate.net/publication/237375234_New_Built-In_Self-Test_Scheme_for_SoC_Interconnect)

### **New categories of Safe Faults in a processor-based Embedded System**

**Gürsoy, Cemil Cem; Jenihhin, Maksim; Oyeniran, Adeboye Stephen; Piumatti, Davide; Raik, Jaan; Sonza Reorda, Matteo; Ubar, Raimund-Johannes** 2019 22nd International Symposium on Design and Diagnostics of Electronic Circuits & Systems (DDECS), Cluj-Napoca, Romania : proceedings 2019 / 4 p. : ill <https://doi.org/10.1109/DDECS.2019.8724642>

### **A new measure for calculating multiple fault coverage of microprocessor self-test**

**Oyeniran, Adeboye Stephen; Odozi, Uzochukwu Eddie; Ubar, Raimund-Johannes** BEC 2016 : 2016 15th Biennial Baltic Electronics Conference : proceedings of the 15th Biennial Baltic Electronics Conference : Tallinn University of Technology, October 3-5, 2016, Tallinn, Estonia 2016 / p. 75-78 : ill [http://www.ester.ee/record=b2150914\\*est](http://www.ester.ee/record=b2150914*est)

### **A new modified berger code for concurrent error detection**

Maamar, Ali H.; Russel, Gordon BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 187-190: ill

### **A new resonant fault current limiter for improved wind turbine transient stability**

Demin, Slava; Sitbon, Moshe; Aharon, Ilan; Barbi, Eli; Machlev, Ram; **Belikov, Juri**; Levron, Yoash; Baimel, Dmitry Electric Power Systems Research 2023 / art. 109600, 8 p <https://doi.org/10.1016/j.epr.2023.109600> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **New technique for hierarchical identification of untestable faults in sequential circuits**

**Krivenko, Anna; Ubar, Raimund-Johannes; Raik, Jaan; Kruus, Margus** Info- ja kommunikatsioonitehnoloogia doktorikooli IKTDK kolmanda aastakonverentsi artiklite kogumik : 25.-26. aprill 2008, Voore külalistemaja 2008 / lk. 155-158 : ill

### **NoCDepend : a flexible and scalable dependability technique for 3D networks-on-chip**

**Hollstein, Thomas; Azad, Siavoosh Payandeh; Kogge, Thilo**; Ying, Haoyuan; Hofmann, Klaus 2015 IEEE 18th International Symposium on Design and Diagnostics of Electronic Circuits & Systems DDECS 2015 : 22-24 April 2015, Belgrade, Serbia : proceedings 2015 / p. 75-78 : ill <http://dx.doi.org/10.1109/DDECS.2015.30>

### **Non-intrusive defects identification for the high voltage instrument transformers**

**Asefi, Sajjad; Kilter, Jako; Landsberg, Mart** 2023 IEEE 17th International Conference on Compatibility, Power Electronics and Power Engineering (CPE-POWERENG) 2023 / 5 p <https://doi.org/10.1109/CPE-POWERENG58103.2023.10227493>

### **Novel approaches to electrical machine fault diagnosis**

**Vaimann, Toomas**; Antonino-Daviu, Jose Alfonso; **Rassõlkin, Anton** Energies 2023 / art. 5641 <https://doi.org/10.3390/en16155641> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **A novel artificial neural networks based automatic adaptive fault detection technique for analog circuits**

**Petlenkov, Eduard; Jutman, Artur; Nõmm, Sven; Ubar, Raimund-Johannes** BEC 2008 : 2008 International Biennial Baltic Electronics Conference : proceedings of the 11th Biennial Baltic Electronics Conference : Tallinn University of Technology : October 6-8, 2008, Tallinn, Estonia 2008 / p. 167-170 : ill

### **A novel random approach to diagnostic test generation**

**Osimiry, Emmanuel Ovie; Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** 2nd IEEE NORCAS Conference : 1-2 November 2016, Copenhagen, Denmark 2016 / [4] p. : ill <https://doi.org/10.1109/NORCHIP.2016.7792915>

### **Numerical study on the structural behavior of intact and damaged box beams under four-point bending load**

**Putranto, Teguh; Kõrgesaar, Mihkel** Developments in the Collision and Grounding of Ships and Offshore Structures : Proceedings of the 8th International Conference on Collision and Grounding of Ships and Offshore Structures (ICCGS 2019), 21-23 October, 2019, Lisbon, Portugal 2019 / p. 139-143 <https://www.taylorfrancis.com/books/e/9781003002420/chapters/10.1201/9781003002420-17>

### **Observer-based residual generation for nonlinear discrete-time systems**

**Kaldmäe, Arvo; Kotta, Ülle** Proceedings of the Estonian Academy of Sciences 2018 / p. 325-336 <https://doi.org/10.3176/proc.2018.4.01> [http://www.kirj.ee/public/proceedings\\_pdf/2018/issue\\_4/proc-2018-4-325-336.pdf](http://www.kirj.ee/public/proceedings_pdf/2018/issue_4/proc-2018-4-325-336.pdf) [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Off-line testing of crosstalk induced glitch faults in NoC Interconnects**

Bengtsson, Tomas; Kumar, Shashi; **Jutman, Artur; Ubar, Raimund-Johannes** Proceedings [of] 24th IEEE Norchip Conference : Linköping, Sweden, 20-21 November 2006 2006 / p. 221-225 : ill <http://dx.doi.org/10.1109/NORCHIP.2006.329215>

### **On coverage of timing related faults at board level**

**Jutman, Artur; Aleksejev, Igor; Devadze, Sergei** 2016 21st IEEE European Test Symposium (ETS) : May 23rd-26th 2016, Amsterdam, The Netherlands : proceedings 2016 / [2] p. : ill <https://doi.org/10.1109/ETS.2016.7519295>

### **On efficient logic-level simulation of digital circuits represented by the SSBDD model**

**Jutman, Artur; Raik, Jaan; Ubar, Raimund-Johannes** 23rd International Conference on Microelectronics : MIEL 2002, Niš,

Yugoslavia, 12-15 May 2002 : proceedings. Volume 2 2002 / p. 621-624 : ill <https://ieeexplore.ieee.org/document/1003334>

### **On multiple fault detection in combinational logic circuits**

Birger, Alexander BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 225-228

### **On NBTI-induced aging analysis in IEEE 1687 reconfigurable scan networks**

Damjanovic, Aleksa; Squillero, Giovanni; **Gürsoy, Cemil Cem; Jenihhin, Maksim** VLSI-SoC 2019 : 27th IFIP/IEEE International Conference on Very Large Scale Integration : [proceedings] 2019 / p. 335-340 : ill <https://doi.org/10.1109/VLSI-SoC.2019.8920313>

### **On the estimation of complex circuits functional failure rate by machine learning techniques**

Lange, Thomas; **Balakrishnan, Aneesh**; Glorieux, Maximilien; Alexandrescu, Dan; Sterpone, Luca 49th Annual IEEE/IFIP International Conference on Dependable Systems and Networks - DSN 2019 : Supplemental Volume : proceedings 2019 / p. 35-41 : ill <https://doi.org/10.1109/DSN-S.2019.00021>

### **On-chip sensors data collection and analysis for SoC health management**

**Shibin, Konstantin; Jenihhin, Maksim; Jutman, Artur**; Devadze, Sergei; Tsertov, Anton 2023 IEEE International Symposium on Defect and Fault Tolerance in VLSI and Nanotechnology Systems (DFT) 2023 / 6 p <https://doi.org/10.1109/DFT59622.2023.10313562>

### **On-line fault classification and handling in IEEE1687 based fault management system for complex SoCs**

**Shibin, Konstantin; Devadze, Sergei; Jutman, Artur** LATS 2016 : 17th IEEE Latin-American Test Symposium, Foz do Iguacu, Brazil, 6th-9th April 2016 2016 / p. 69-74 : ill <https://doi.org/10.1109/LATW.2016.7483342>

### **Operation of Single-Chip MOSFET and IGBT Devices after failure due to repetitive avalanche [Electronic resource]**

**Blinov, Andrei**; Norrga, Staffan; Tibola, Gabriel EPE'15 ECCE Europe : 8-10 September 2015, Geneva, Switzerland : 17th European Conference on Power Electronics and Applications 2015 / p. 1-9 : ill. [USB] <http://dx.doi.org/10.1109/EPE.2015.7309190>

### **Optimization of memory-constrained hybrid BIST for testing core-based systems**

**Jervan, Gert; Kruus, Helena; Orasson, Elmet; Ubar, Raimund-Johannes** Proceedings of the IEEE 2nd International Symposium on Industrial Embedded Systems : SIES'2007 : Lisbon, Portugal, 4-6 July 2007 2007 / p. 71-77 <https://ieeexplore.ieee.org/document/4297319>

### **Overview of e-learning environment for web-based study of testing and diagnostics of digital systems**

**Jutman, Artur; Ubar, Raimund-Johannes**; Wuttke, Heinz-Dietrich Microelectronics education : proceedings of the 5th European Workshop on Microelectronics Education, held in Lausanne, Switzerland, April 15-16, 2004 2004 / p. 253-258 : ill [https://link.springer.com/chapter/10.1007/978-1-4020-2651-5\\_41](https://link.springer.com/chapter/10.1007/978-1-4020-2651-5_41)

### **Overview of e-learning environment for web-based study of testing and diagnostics of digital systems**

**Jutman, Artur; Ubar, Raimund-Johannes**; Wuttke, Heinz-Dietrich 5th European Workshop on Microelectronics Education - EWME 2004, Lausanne, 2004 2004 / p. 173-176 [https://link.springer.com/chapter/10.1007/978-1-4020-2651-5\\_41](https://link.springer.com/chapter/10.1007/978-1-4020-2651-5_41)

### **Parallel critical path tracing fault simulation**

**Ubar, Raimund-Johannes** 39. Internationales Wissenschaftliches Kolloquium : 27.-30.09.1994. Bd. 1, Vortragsreihen 1994 / S. 399-404

### **Parallel critical path tracing fault simulation in sequential circuits**

**Kõusaar, Jaak; Ubar, Raimund-Johannes; Kostin, Sergei; Devadze, Sergei; Raik, Jaan** Proceedings of 25th International Conference MIXED DESIGN OF INTEGRATED CIRCUITS AND SYSTEMS : MIXDES 2018 : Gdynia, Poland, June 21-23, 2018 2018 / p. 305-310 : ill <https://doi.org/10.23919/MIXDES.2018.8436880>

### **Parallel exact critical path tracing fault simulation with reduced memory requirements**

**Devadze, Sergei; Ubar, Raimund-Johannes; Raik, Jaan; Jutman, Artur** 4th International Conference on Design and Technology of Integrated Systems in Nanoscale Era : DTIS'09 : Cairo, Egypt, April 6-9, 2009 2009 / p. 155-160 : ill <https://ieeexplore.ieee.org/document/4938046>

### **Parallel fault analysis on structurally synthesized BDDs**

**Devadze, Sergei; Ubar, Raimund-Johannes** Info- ja kommunikatsioonitehnoloogia doktorikooli IKTDK teise aastakonverentsi artiklite kogumik : 11.-12. mai 2007, Viinistu kunstimuseum 2007 / lk. 47-50 : ill

### **Parallel fault backtracing for calculation of fault coverage**

**Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan; Jutman, Artur** Proceedings of the ASP-DAC 2008 : [13th] Asia and South Pacific Design Automation Conference 2008 : January 21-24, 2008, COEX, Seoul, Korea 2008 / p. 667-672 : ill [https://www.researchgate.net/publication/221153650\\_Parallel\\_fault\\_backtracing\\_for\\_calculation\\_of\\_fault\\_coverage](https://www.researchgate.net/publication/221153650_Parallel_fault_backtracing_for_calculation_of_fault_coverage)

### **Parallel fault backtracing for calculation of fault coverage**

**Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan; Jutman, Artur** 43rd International Conference on Microelectronics, Devices and Materials and the Workshop on Electronic Testing : September 12. - September 14.2007, Bled, Slovenia : MIDEM

conference 2007 proceedings 2007 / p. 165-170 : ill

[https://www.researchgate.net/publication/221153650\\_Parallel\\_fault\\_backtracing\\_for\\_calculation\\_of\\_fault\\_coverage](https://www.researchgate.net/publication/221153650_Parallel_fault_backtracing_for_calculation_of_fault_coverage)

### **Parallel fault simulation in digital circuits**

Aarna, Margit; **Raik, Jaan; Ubar, Raimund-Johannes** Proc. of 42nd International Scientific Conference of Riga Technical University 2001 / p. 91-94

### **Parallel fault simulation in digital circuits**

Aarna, Margit; **Raik, Jaan; Ubar, Raimund-Johannes** Scientific proceedings of Riga Technical University. 7. serija, Telecommunications and electronics 2001 / p. 91-94 : ill

### **Parallel X-fault simulation with critical path tracing technique [Electronic resource]**

**Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan; Jutman, Artur** DATE 10 : Design, Automation & Test in Europe : Dresden, Germany, 8-12 March, 2010 2010 / p. 879-884 [CD-ROM] [https://www.researchgate.net/publication/221341788\\_Parallel\\_X\\_fault\\_simulation\\_with\\_critical\\_path\\_tracing\\_technique](https://www.researchgate.net/publication/221341788_Parallel_X_fault_simulation_with_critical_path_tracing_technique)

### **Performance evaluation of additive manufacturing based test samples for studies of defects in electrical insulation**

**Shafiq, Muhammad; Taklaja, Paul; Kiitam, Ivar; Tiismus, Hans; Palu, Ivo; Kütt, Lauri** 2021 International Conference on Electrical, Computer and Energy Technologies (ICECET) 2021 / 6 | <https://doi.org/10.1109/ICECET52533.2021.9698476>

### **Platform independent event correlation tool for network management**

**Vaarandi, Risto** NOMS 2002 : 2002 IEEE/IFIP Network Operations and Management Symposium "Management Solutions for the New Communications World" : proceedings 2002 / p. 907-909 <https://ieeexplore.ieee.org/document/1015640>

### **PMU placement for fault line location using neural additive models—A global XAI technique**

Perl, Michael; Sun, Zhenglong; Machlev, Ram; **Belikov, Juri**; Levy, Kfir Yehuda; Levron, Yoash International journal of electrical power and energy systems 2024 / art. 109573, 10 p. : ill <https://doi.org/10.1016/j.ijepes.2023.109573> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Power quality issues in dispersed generation and smart grids**

**Vaimann, Toomas; Niitsoo, Jaan; Kivipõld, Tanel; Lehtla, Tõnu** Elektronika ir elektrotehnika = Electronics and electrical engineering 2012 / p. 23-26 : ill <https://citeseerx.ist.psu.edu/document?repid=rep1&type=pdf&doi=573c03a0753bcfce3929ba739ff032b16882acf5>

### **Power-constrained hybrid BIST test scheduling in an abort-on-first-fail test environment**

He, Zhiyuan; **Jervan, Gert**; Peng, Zebo; Eles, Petru Proceedings : DSD'2005 : 8th Euromicro Conference on Digital System Design : Architectures, Methods and Tools : Porto, Portugal, August 30 - September 3, 2005 2005 / p. 83-86 : ill <https://ieeexplore.ieee.org/document/1559782>

### **Preliminary analysis of bearing current faults for predictive maintenance : [conference paper]**

**Kudelina, Karolina** 22nd International Symposium "Topical Problems in the Field of Electrical and Power Engineering". Doctoral School of Energy and Geotechnology III : Pärnu, Estonia, August 23-26, 2023 2023 / p. 35-36 : ill [https://www.ester.ee/record=b5570906\\*est](https://www.ester.ee/record=b5570906*est)

### **Preliminary analysis of global parameters of induction machine for fault prediction in rotor bars**

**Kudelina, Karolina; Raja, Hadi Ashraf; Autsoo, Siarhei; Asad, Bilal; Vaimann, Toomas; Rassõlkin, Anton; Kallaste, Ants** 2022 IEEE 20th International Power Electronics and Motion Control Conference (PEMC) : Brasov, Romania, 25-28 Sept. 2022 : proceedings 2022 / p. 243-248 : ill <https://doi.org/10.1109/PEMC51159.2022.9962922>

### **Preliminary analysis of mechanical bearing faults for predictive maintenance of electrical machines**

**Kudelina, Karolina; Raja, Hadi Ashraf; Autsoo, Siarhei; Naseer, Muhammad Usman; Vaimann, Toomas; Kallaste, Ants**; Pomamacki, Raimondas; Hyunh, Van Khang 2023 IEEE 14th International Symposium on Diagnostics for Electrical Machines, Power Electronics and Drives (SDEMPED) 2023 / p. 430-435 : ill <https://doi.org/10.1109/SDEMPED54949.2023.10271451>

### **ProAct: Progressive Training for Hybrid Clipped Activation Function to Enhance Resilience of DNNs**

Mousavi, Seyedhamidreza; **Ahmadilivani, Mohammad Hasan; Raik, Jaan; Jenihhin, Maksim; Daneshtalab, Masoud** arXiv.org 2024 / 12 p. : ill <https://doi.org/10.48550/arXiv.2406.06313>

### **Protection and common mode voltage of The Push-Pull Partial Power Converter**

**Abdelrahim Abdelghafour, Omar Mohamed; Vinnikov, Dmitri; Chub, Andrii; Blinov, Andrei** IEEE Conference on Power Electronics and Renewable Energy : Luxor, Egypt, February, 19-21, 2023 2023 <https://doi.org/10.1109/CPERE56564.2023.10119636>

### **Protection of bidirectional Step-Up/Down partial power converter against short circuit and open circuit faults and mode transition issues**

**Hassanpour, Naser; Chub, Andrii; Blinov, Andrei; Yadav, Neelesh; Hasan, Sayeed; Vinnikov, Dmitri** 2024 IEEE 18th International Conference on Compatibility, Power Electronics and Power Engineering (CPE-POWERENG) 2024 / 6 p <https://doi.org/10.1109/CPE-POWERENG60842.2024.10604315>

### **A public dataset for synchronous motor electrical faults diagnosis with CNN and LSTM reference classifiers**

Sun, Zhenglong; Machlev, Ram; Wang, Qianchao; **Belikov, Juri**; Levron, Yoash; Baimel, Dmitry Energy and AI 2023 / art. 100274, 17 p <https://doi.org/10.1016/j.egyai.2023.100274> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Register-transfer level deductive fault simulation using decision diagrams**

**Reinsalu, Uljana; Raik, Jaan; Ubar, Raimund-Johannes** BEC 2010 : 2010 12th Biennial Baltic Electronics Conference : proceedings of the 12th Biennial Baltic Electronics Conference : Tallinn University of Technology, October 4-6, 2010, Tallinn, Estonia 2010 / p. 193-196 : ill

### **Rejuvenation of nanoscale logic at NBTI-critical paths using evolutionary TPG**

Palermo, N.; **Tihomirov, Valentin**; Copetti, Thiago; **Jenihhin, Maksim; Raik, Jaan; Kostin, Sergei** 2015 16th Latin American Test Symposium (LATS 2015) : Puerto Vallarta, Mexico, 25-27 March 2015 2015 / [6] p. : ill <http://dx.doi.org/10.1109/LATW.2015.7102405>

### **Reliable health monitoring and fault management infrastructure based on embedded instrumentation and IEEE 1687**

**Jutman, Artur; Shibin, Konstantin; Devadze, Sergei** IEEE AUTOTESTCON 2016 : Anaheim, California, USA, September 12-15, 2016 : proceedings 2016 / p. 240-249 : ill <https://doi.org/10.1109/AUTEST.2016.7589605>

### **Research and training environment for digital design and test**

**Ubar, Raimund-Johannes**; Wuttke, Heinz-Dietrich Proceedings of the Eighth IASTED International Conference on Computers and Advanced Technology in Education : August 29-31, 2005, Oranjestad, Aruba 2005 / p. 232-237 : ill <https://ieeexplore.ieee.org/document/1408779>

### **Research environment for teaching digital test**

**Ivask, Eero; Jutman, Artur; Orasson, Elmet; Raik, Jaan; Ubar, Raimund-Johannes**; Wuttke, Heinz-Dietrich Synergies between Information and Automation : 49. Internationales Wissenschaftliches Kolloquium, 27.-30.9.2004, Technische Universität Ilmenau, Germany. Volume 2 2004 / p. 468-473 : ill [https://pld.ttu.ee/diildis/publications/IWK'2004\\_res\\_inv.pdf](https://pld.ttu.ee/diildis/publications/IWK'2004_res_inv.pdf)

### **Reversible electrowetting on silanized silicon nitride**

Cahill, Brian; Giannitsis, Athanasios; **Land, Raul**; Gastrock, Gunter; Pliquett, Uwe; Frense, Dieter; **Min, Mart**; Beckmann, Dieter Sensors and actuators B. Chemical 2010 / p. 380-386 : ill <https://www.sciencedirect.com/science/article/pii/S092540050800885X>

### **Riigijuhid, kuhu jääb elektritootmise strateegia?**

**Rajangu, Väino** Eesti Päevaleht 2023 / Lk. 3 [https://dea.digar.ee/article/eestipaevaleht/2023/01/10/3.5\\_Riigijuhid\\_kuhu\\_jaeb\\_elektritootmise\\_strateegia?](https://dea.digar.ee/article/eestipaevaleht/2023/01/10/3.5_Riigijuhid_kuhu_jaeb_elektritootmise_strateegia?)

### **Rikkevoolukaitse**

**Teemets, Raivo** 2004 [https://www.ester.ee/record=b1961658\\*est](https://www.ester.ee/record=b1961658*est)

### **Rikkevoolukaitse**

**Teemets, Raivo** Ehitaja 1996 / 8, lk. 69-70: ill

### **Rikkevoolukaitse lülite paigaldamine**

**Teemets, Raivo** Ehitaja 1996 / 9, lk. 73-74: ill

### **Rotor fault diagnostic of inverter fed induction motor using frequency analysis**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants; Rassõlkin, Anton** 2019 IEEE 12th International Symposium on Diagnostics for Electrical Machines, Power Electronics and Drives (SDEMPED), 27-30 Aug. 2019, Toulouse, France : proceedings 2019 / p. 127-133 : ill <https://doi.org/10.1109/DEMPED.2019.8864903>

### **RT-level identification of potentially testable initialization faults**

**Raik, Jaan**; Fujiwara, Hideo; **Krivenko, Anna** The Ninth IEEE Workshop on RTL and High Level Testing (WRTL 2008), Sapporo, Japan 2008 / [6] p [https://www.researchgate.net/publication/234032548\\_RT-level\\_identification\\_of\\_potentially\\_testable\\_initialization\\_faults](https://www.researchgate.net/publication/234032548_RT-level_identification_of_potentially_testable_initialization_faults)

### **RT-level test point insertion for sequential circuits**

**Raik, Jaan**; Govind, Vineeth; **Ubar, Raimund-Johannes** IWoTA 2004 : IEEE 1st International Workshop on Testability Assessment : November 2, 2004, Rennes, France : proceedings 2004 / p. 34-40 : ill <https://ieeexplore.ieee.org/document/1428412>

### **110 kV õhuliinide isolatsiooni töökindluse analüüs ja töökindluse tõstmise meetodid = The study of 110 kV power grid reliability and the measures to decrease insulation failure**

**Taklaja, Paul** 2012 [http://www.ester.ee/record=b2857612\\*est](http://www.ester.ee/record=b2857612*est)

### **SALSy : security-aware layout synthesis**

**Eslami, Mohammad; Perez, Tiago Diadami; Pagliarini, Samuel Nascimento** arXiv.org 2024 / 13 p. : ill <https://doi.org/10.48550/arXiv.2308.06201>

### Scalable algorithm for structural fault collapsing in digital circuits

**Ubar, Raimund-Johannes; Jürimägi, Lembit; Orasson, Elmet; Raik, Jaan** 2015 IFIP/IEEE International Conference on Very Large Scale Integration (VLSI-SoC) : October 5-7, 2015, Daejeon, Korea 2015 / p. 171-176 : ill

### A scalable technique to identify true critical paths in sequential circuits

**Ubar, Raimund-Johannes; Kostin, Sergei; Jenihhin, Maksim; Raik, Jaan** Proceedings 2017 IEEE 20th International Symposium on Design and Diagnostics of Electronic Circuit & Systems (DDECS) : April 19-21, 2017, Dresden, Germany 2017 / p. 152-157 : ill  
<https://ieeexplore.ieee.org/stamp/stamp.jsp?tp=&arnumber=7934553>

### Self-diagnosis in digital systems = Isediagnoosivad digitaalsüsteemid

**Kostin, Sergei** 2012 [https://www.ester.ee/record=b2757857\\*est](https://www.ester.ee/record=b2757857*est)

### Sequential test set compaction in LFSR reseeding

**Jutman, Artur; Aleksejev, Igor; Raik, Jaan** Design and test technology for dependable systems-on-chip 2011 / p. 476-493 : ill  
<https://ieeexplore.ieee.org/document/4738292>

### 7-valued algebra for transition delay fault analysis

**Kõusaar, Jaak; Ubar, Raimund-Johannes** BEC 2014 : 2014 14th Biennial Baltic Electronics Conference : proceedings of the 14th Biennial Baltic Electronics Conference : Tallinn University of Technology, October 6-8, 2014, Tallinn, Estonia 2014 / p. 89-92 : ill

### Shared Structurally Synthesized BDDs for speeding-up parallel pattern simulation in digital circuits

**Ubar, Raimund-Johannes; Jürimägi, Lembit; Raik, Jaan** 2015 Nordic Circuits and Systems Conference (NORCAS) : NORCHIP & International Symposium on System-on-Chip (SoC) : 1st IEEE NORCAS Conference : 26-28 October 2015, Oslo, Norway 2015 / [4] p. : ill <http://dx.doi.org/10.1109/NORCHIP.2015.7364406>

### Shift register based TPG for at-speed interconnect BIST

**Jutman, Artur** MIEL 2004 : 24th International Conference on Microelectronics : Niš, Serbia and Montenegro, 16-19 May 2004 : proceedings. Volume 2 2004 / p. 751-754 : ill <https://ieeexplore.ieee.org/document/1314941?signout=success>

### Short-circuit protection circuits for silicon-carbide power transistors

**Sadik, Diane-Perle; Colmenares, Juan; Tolstoy, Georg; Rabkowski, Jacek** IEEE transactions on industrial electronics 2016 / p. 1995-2004 : ill <https://doi.org/10.1109/TIE.2015.2506628>

### Signal processing and machine learning techniques for predictive maintenance of rotor bars in induction machine

**Kudelina, Karolina; Raja, Hadi Ashraf; Rjabtšikov, Viktor; Naseer, Muhammad Usman; Vaimann, Toomas; Kallaste, Ants** 2023 International Conference on Electrical Drives and Power Electronics (EDPE) 2023 / 7 p. : ill  
<https://doi.org/10.1109/EDPE58625.2023.10274030>

### Simple relationship between the breakdown voltage, concentration and junction depth pn diffused junctions

**Rang, Toomas** Physica status solidi. A, Applied research 1982 / p. K117-K119 : tab., joon [https://www.ester.ee/record=b1562026\\*est](https://www.ester.ee/record=b1562026*est)

### Software-level TMR approach for on-board data processing in space applications

**Janson, Karl; Treudler, Carl Johann; Hollstein, Thomas; Raik, Jaan; Jenihhin, Maksim; Fey, Goerschwin** 21st IEEE International Symposium on Design and Diagnostics of Electronic Circuits and Systems : DDECS 2018 : Budapest, Hungary 25-27 April, 2018 : proceedings 2018 / p. 147-152 : ill <https://doi.org/10.1109/DDECS.2018.00033>

### Sonda tektooniline rike Põhja-Kiviõli karjääris

**Sõstra, Ülo; Vaher, Rein** XV aprillikonverentsi "Geoloogilise kaardistamise poolsajand" teesid : [30. märts 2007, Tallinn] 2007 / lk. 37-39 : ill

### Special session : approximation and fault resiliency of DNN accelerators

**Ahmadilivani, Mohammad Hasan; Barbareschi, Mario; Barone, Salvatore; Bosio, Alberto; Daneshtalab, Masoud; Torca, Salvatore Della; Gavarini, Gabriele; Jenihhin, Maksim; Raik, Jaan; Taheri, Mahdi** 2023 IEEE 41st VLSI Test Symposium (VTS) : proceedings 2023 / 10 p. : ill <https://doi.org/10.1109/VTS56346.2023.10140043> [Conference proceeding at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

### Special session: reliability assessment recipes for DNN accelerators

**Ahmadilivani, Mohammad Hasan; Bosio, Alberto; Deveautour, Bastien; Dos Santos, Fernando Fernandes; Guerrero-Balaguera, Juan-David; Jenihhin, Maksim; Kritikakou, Angeliki; Sierra, Robert Limas; Raik, Jaan; Taheri, Mahdi** 42nd IEEE VLSI Test Symposium, VTS 2024 2024 / 11 p. : ill <https://doi.org/10.1109/VTS60656.2024.10538707> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

### Spectrum analysis additional vibrations of Cartesian robot by different control modes

**Autsou, Siarhei; Vaimann, Toomas; Rassõlkin, Anton; Kudelina, Karolina** 2022 18th Biennial Baltic Electronics Conference (BEC) 2022 / 5 l. <https://doi.org/10.1109/BEC56180.2022.9935595>

### **SSBDDs and double topology for multiple fault reasoning**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** Proceedings of IEEE East-West Design & Test Symposium (EWDTS'2012) : Kharkov, Ukraine, September 14–17, 2012 / p. 23-28 <https://www.semanticscholar.org/paper/SSBDDs-and-Double-Topology-for-Multiple-Fault-Ubar-Kostin/8ba04611a41768f0c277a4ba46ca666132fc2f65>

### **Stator voltage analysis of frequency converter fed induction generator with broken rotor bars**

**Vaimann, Toomas; Belahcen, Anouar;** Martinez, Javier; **Kilk, Aleksander** 13th International Symposium "Topical Problems in the Field of Electrical and Power Engineering." Doctoral School of Energy and Geotechnology II : Pärnu, Estonia, January 14-19, 2013 / p. 249-251 : ill

### **Studying the impact of gearbox faults on the operations of the cartesian robot**

**Autsou, Sjarhei** 22nd International Symposium "Topical Problems in the Field of Electrical and Power Engineering". Doctoral School of Energy and Geotechnology III : Pärnu, Estonia, August 23-26, 2023 / p. 17-18 : ill [https://www.ester.ee/record=b5570906\\*est](https://www.ester.ee/record=b5570906*est)

### **Study of overvoltages upon single-phase ground fault initialisation and arcing processes on MV networks with isolated neutral**

**Kütt, Lauri; Järvik, Jaan; Sepping, Eino** The 4th International Conference Electric Power Quality and Supply Reliability : August 29...31, 2004, Pedase, Estonia : proceedings 2004 / p. 139-143 : ill

### **Study of the effects of single phase ground faults to the voltage transformers in the 10 kV medium voltage power networks**

**Janson, Kuno; Järvik, Jaan; Külm, Evald; Kütt, Lauri; Šklovski, Jevgeni** 48. Internationales Wissenschaftliches Kolloquium, 22.-25.09.2003, Technische Universität Ilmenau, Germany 2003 / p. 583-584 : ill

### **Study of the effects of single phase ground faults to the voltage transformers in the 10 kV medium voltage power networks [Electronic resource]**

**Janson, Kuno; Järvik, Jaan; Külm, Evald; Kütt, Lauri; Šklovski, Jevgeni** 48. Internationales Wissenschaftliches Kolloquium, 22.-25.09.2003, Technische Universität Ilmenau, Germany : proceedings and our portrait 2003 / [10] p. : ill. [CD-ROM]

### **Study of transformer overvoltages under single-phase earth faults in 6...35 kV networks with insulated neutral point [Electronic resource]**

**Janson, Kuno; Järvik, Jaan; Kalda, Heljut; Külm, Evald; Šklovski, Jevgeni** Electric Power Engineering 2003 : 5th International Scientific Conference : January 28-29, 2003, Beskydy Pension, Visalaje, Czech Republic : held by occasion of 25th Anniversary of Department of Electrical 2003 / [17] p. : ill. [CD-ROM]

### **Suppression of voltage flicker by saturable reactor operating under forced magnetization [Electronic resource]**

**Bolgov, Viktor; Järvik, Jaan** EUROCON 2007 : the International Conference on Computer as a Tool : September 9-12, 2007, Warsaw, Poland : proceedings 2007 / p. 1417-1422 : ill. [CD-ROM] <https://ieeexplore.ieee.org/document/4400513>

### **A survey of broken rotor bar fault diagnostic methods of induction motor**

**Asad, Bilal; Vaimann, Toomas; Rassõlkin, Anton; Kallaste, Ants; Belahcen, Anouar** Scientific Journal of Riga Technical University. Electrical, control and communication engineering 2018 / p. 117–124 : ill <https://doi.org/10.2478/ecce-2018-0014>

### **A survey on UAV computing platforms : a hardware reliability perspective**

**Ahmed, Faisal; Jenihhin, Maksim** Sensors 2022 / art. 6286 <https://doi.org/10.3390/s22166286> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Synthesis of multiple fault oriented test groups from single fault test sets [Electronic resource]**

**Ubar, Raimund-Johannes; Kostin, Sergei; Raik, Jaan** 2013 8th International Conference on Design & Technology of Integrated Systems in Nanoscale Era (DTIS) : 26-28 March 2013, Abu Dhabi, UAE 2013 / p. 36-41 : ill [CD-ROM]

### **A synthesis-agnostic behavioral fault model for high gate-level fault coverage**

**Karputkin, Anton; Raik, Jaan** 2016 Design, Automation & Test in Europe Conference & Exhibition (DATE) : proceedings 2016 / p. 1124-1127 : ill <https://ieeexplore.ieee.org/document/7459477/figures#figures>

### **A synthetic, hierarchical approach for modelling and managing complex systems' quality and reliability = Sünteetiline, hierarhiline lähenemine keerukate süsteemide kvaliteedi ja töökindluse modelleerimiseks ja haldamiseks**

**Bal Krishnan, Aneesh** 2022 <https://doi.org/10.23658/taltech.11/2022> <https://digikogu.taltech.ee/et/Item/a594d3ec-0e6b-4a78-819a-fe1f47992612>

### **System modelling and measurement under the view of design of testability and fault diagnosis of analog circuits**

Liu, Ji-Gou; Frühauf, Uwe BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 295-298: ill

### **Teaching diagnostic modeling of digital systems with decision diagrams [Electronic resource]**

**Ubar, Raimund-Johannes; Raik, Jaan; Mironov, Dmitri; Evartson, Teet; Orasson, Elmet; Aarna, Margit; Wuttke, Heinz-Dietrich**

### Teaching digital system test

**Oyeniran, Adeboye Stephen; Ubar, Raimund-Johannes; Kruus, Margus** The 27th EAEEIE Annual Conference : June 7-9, 2017, Grenoble 2017 / [6] p

### Techniques for robust routing, communication and computation in multiprocessor systems = Robustse marsruutimise, side ja arvutuse tehnikad mitmeprotsektorilistes süsteemides

**Janson, Karl** 2021 [https://www.ester.ee/record=b5396084\\*est](https://www.ester.ee/record=b5396084*est) <https://digikogu.taltech.ee/et/Item/c9091d5c-dcd8-4b21-95a7-84ead85241e6>  
<https://doi.org/10.23658/taltech.3/2021>

### Tehisintellekt pandi metalliettevõttes rikkeid otsima, et vähendada tootmiskulusid [Võrguväljaanne]

am.ee 2022 [Tehisintellekt pandi metalliettevõttes rikkeid otsima, et vähendada tootmiskulusid](#)

### Test configurations for diagnosing faulty links in NoC switches

**Raik, Jaan; Ubar, Raimund-Johannes; Govind, Vineeth** 12th IEEE European Test Symposium ETS 2007 : 20-24 May 2007, Freiburg, Germany : proceedings 2007 / p. 29-34 : ill <http://dx.doi.org/10.1109/ETS.2007.41>

### Test configurations for diagnosing faulty links in NoC switches

**Raik, Jaan; Ubar, Raimund-Johannes; Govind, Vineeth** Info- ja kommunikatsioonitehnoloogia doktorikooli IKTDK teise aastakonverentsi artiklite kogumik : 11.-12. mai 2007, Viinistu kunstimuseum 2007 / lk. 33-37 : ill

### Test generation for control faults in digital systems

**Dušina, Julia; Brik, Marina** BEC : Baltic Electronics Conference : proceedings of the 4th Biennial Conference, October 9-14, 1994, Tallinn (Estonia). 1 1994 / p. 325-330: ill

### Test generation for finite state machines

**Ubar, Raimund-Johannes; Brik, Marina** BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 233-236: ill

### Test methods for crosstalk-induced delay and glitch faults in network-on-chip interconnects implementing asynchronous communication protocols

Bengtsson, Tomas; Kumar, Shashi; **Ubar, Raimund-Johannes; Jutman, Artur**; Peng, Zebo IET computers and digital techniques 2008 / 6, p. 445-460 [https://www.diva-portal.org/smash/record.jsf?dswid=5073&aq2=%5B%5B%5D%5D&c=39&af=%5B%5D&searchType=SIMPLE&sortOrder2=title\\_sort\\_asc&language=en&pid=diva2%3A290043&aq=%5B%5B%7B%22personId%22%3A%22authority-5B%5B%3A23389%22%7D%5D%5D&sf=all&aqe=%5B%5D&sortOrder=author\\_sort\\_asc&onlyFullText=false&noOfRows=50](https://www.diva-portal.org/smash/record.jsf?dswid=5073&aq2=%5B%5B%5D%5D&c=39&af=%5B%5D&searchType=SIMPLE&sortOrder2=title_sort_asc&language=en&pid=diva2%3A290043&aq=%5B%5B%7B%22personId%22%3A%22authority-5B%5B%3A23389%22%7D%5D%5D&sf=all&aqe=%5B%5D&sortOrder=author_sort_asc&onlyFullText=false&noOfRows=50)

### Test pattern generation at the behavioral level from VHDL circuit description containing several processes

Gramatova, Elena; Bezakova, Jana; Cibakova, Tatiana BEC'96 : the 5th Biennial Baltic Electronics Conference, October 7-11, 1996, Tallinn, Estonia : proceedings 1996 / p. 145-148

### Testing of systems using software

**Ubar, Raimund-Johannes** Concise encyclopedia of software engineering 1993 / p. 352-356

### The analysis of integrating sigma-delta ADC noise

Gutnikov, V.S.; Krivchenko, T.I. BEC : Baltic Electronics Conference : proceedings of the 4th Biennial Conference, October 9-14, 1994, Tallinn (Estonia). 1 1994 / p. 201-206: ill

### The investigation of the Therac-25 accidents

Zdanov, Vassili A & A 2007 / 6, lk. 20-32 : ill [https://artiklid.elnet.ee/record=b1021179\\*est](https://artiklid.elnet.ee/record=b1021179*est)

### The study about indefinite fault causes in Estonian 110 kV power grid

**Taklaja, Paul; Oidram, Rein** PQ2010 : 7th International Conference "2010 Electric Power Quality and Supply Reliability" : June 16-18, 2010, Kuressaare, Estonia 2010 / p. 177-182 : ill

### 3D parallel fault simulation

**Gorev, Maksim; Ubar, Raimund-Johannes** Proceedings of the 8th Annual Conference of the Estonian National Doctoral School in Information and Communication Technologies : December 5-6, 2014, Rakvere 2014 / p. 39-42 : ill

### 3D permeance model of induction machines taking into account saturation effects and its connection with stator current and shaft speed spectra

Martinez, Javier; **Belahcen, Anouar**; Arkkio, Antero IET electric power applications 2015 / p. 20-29 : ill <http://dx.doi.org/10.1049/iet-epa.2014.0013>

### **A tool for random test generation targeting high diagnostic resolution**

**Osimiry, Emmanuel Ovie; Kostin, Sergei; Raik, Jaan; Ubar, Raimund-Johannes** BEC 2016 : 2016 15th Biennial Baltic Electronics Conference : proceedings of the 15th Biennial Baltic Electronics Conference : Tallinn University of Technology, October 3-5, 2016, Tallinn, Estonia 2016 / p. 79-82 : ill [http://www.ester.ee/record=b2150914\\*est](http://www.ester.ee/record=b2150914*est)

### **A tool set for teaching design-for-testability of digital circuits**

**Kostin, Sergei; Orasson, Elmet; Ubar, Raimund-Johannes** EWME 2016 : 11th European Workshop on Microelectronics Education : May 11-13, 2016, Southampton, UK 2016 / [6] p. : ill <https://doi.org/10.1109/EWME.2016.7496466>

### **Topological analysis of SSBDDs with applications in fault diagnosis**

**Ubar, Raimund-Johannes** Proceedings of 10th International Workshop on Boolean Problems : Freiberg, Germany, September 19-21, 2012 2012 / p. 1-16

### **Towards artificial intelligence based automatic adaptive response analyzer for high frequency analog BIST**

**Petlenkov, Eduard; Jutman, Artur; Nõmm, Sven; Ubar, Raimund-Johannes** CIMSA 2008 : IEEE International Conference on Computational Intelligence for Measurement Systems and Applications : Istanbul, Turkey, July 14-16, 2008 2008 / p. 99-104 : ill <https://ieeexplore.ieee.org/document/4595841>

### **Transient modeling and recovery of non-stationary fault signature for condition monitoring of induction motors**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants; Rassõlkin, Anton; Shams Ghahfarokhi, Payam** Advances in machine fault diagnosis 2022 / p. 43-59 <https://doi.org/10.3390/app11062806>

### **Transient modeling and recovery of non-stationary fault signature for condition monitoring of induction motors**

**Asad, Bilal; Vaimann, Toomas; Belahcen, Anouar; Kallaste, Ants; Rassõlkin, Anton; Shams Ghahfarokhi, Payam; Kudelina, Karolina** Applied sciences 2021 / 17 p. : ill <https://doi.org/10.3390/app11062806> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Transition delay fault simulation with parallel critical path back-tracing and 7-valued algebra**

**Kõusaar, Jaak; Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan** Microprocessors and microsystems 2015 / p. 1130-1138 : ill <https://doi.org/10.1016/j.micpro.2015.05.003> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Troubleshooting and debugging functions**

**Ruban, Olga; Laugis, Juhan** 5th International Symposium "Topical Problems in the Field of Electrical and Power Engineering". Doctoral School of Energy and Geotechnology : Kuressaare, January 14-19, 2008 2008 / p. 216-221 : ill

### **Troubleshooting process analysis and development of application for decision making enhancement**

**Mahmood, Kashif; Ševtšenko, Eduard; Karaulova, Tatjana; Branten, Eva; Maleki, Meysam** 26th DAAAM International Symposium on Intelligent Manufacturing and Automation 2015 (DAAAM 2015) : Zadar, Croatia, 21-24 October 2015. Volume 1 2016 / p. 0663-0671 : ill <http://dx.doi.org/10.2507/26th.daaam.proceedings.090>

### **A 2D FEM model for transient and fault analysis of induction machines**

Martinez, Javier; **Belahcen, Anouar**; Arkkio, Antero Przegląd elektrotechniczny = Electrical review 2012 / p. 157-160 : ill <http://pe.org.pl/articles/2012/7b/41.pdf>

### **Tõrked, vead ja rikked ning süsteemide usaldusväarsus**

**Paluoja, Rein; Petermann, Viktor** A & A 1998 / 3, lk. 16-21: ill

### **Ultra fast parallel fault analysis on structurally synthesized BDDs**

**Ubar, Raimund-Johannes; Devadze, Sergei; Raik, Jaan; Jutman, Artur** 12th IEEE European Test Symposium ETS 2007 : 20-24 May 2007, Freiburg, Germany : proceedings 2007 / p. 131-136 : ill <http://dx.doi.org/10.1109/ETS.2007.43>

### **Understanding fault-tolerance vulnerabilities in advanced SoC FPGAs for critical applications**

**Cherezova, Natalia; Shibin, Konstantin; Jenihhin, Maksim; Jutman, Artur** Microelectronics reliability 2023 / art. 115010, 10 p. : ill <https://doi.org/10.1016/j.microrel.2023.115010> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

### **Understanding MPSoCs : exploiting memory microarchitectural vulnerabilities of high performance NoC-based MPSoCs**

Sepulveda, Johanna; **Azad, Siavoosh Payandeh; Niazmand, Behrad; Jervan, Gert** SAMOS '18 : Proceedings of the 18th International Conference on Embedded Computer Systems: Architectures, Modeling, and Simulation, Pythagorion, Greece, July 15-19, 2018 2018 / p. 162-166 <https://doi.org/10.1145/3229631.3239367> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

### **Untestable fault identification in sequential circuits using model-checking**

**Raik, Jaan; Fujiwara, Hideo; Ubar, Raimund-Johannes; Krivenko, Anna** 2002-2011 : 20th Anniversary compendium of papers from Asian Test Symposium 2011 / p. 257-262 : ill <https://ieeexplore.ieee.org/document/4711554>

### **Untestable fault identification in sequential circuits using model-checking**

**Raik, Jaan; Fujiwara, Hideo; Ubar, Raimund-Johannes; Krivenko, Anna** Proceedings of the 17th Asian Test Symposium ATS 2008 : November 24-27, 2008, Sapporo, Japan 2008 / p. 21-26 : ill <http://dx.doi.org/10.1109/ATS.2008.22>

### **Uuenduslik metoodika aitab võidelda elektrisüsteemi riketega**

**Andreesen, Guido** novaator.err.ee 2024 [Uuenduslik metoodika aitab võidelda elektrisüsteemi riketega](#)

### **Uuendusliku metoodikaga elektrisüsteemi rikete vastu**

**Andreesen, Guido** TööstusEST 2024 / lk. 67 : portr [https://www.ester.ee/record=b4481084\\*est](https://www.ester.ee/record=b4481084*est)

### **Validation of full-converter wind power plant generic model based on actual fault ride-through measurements**

**Tšernobrovkin, Oleg; Perdana, Abram; Palu, Ivo; Kilter, Jako** Journal of energy and power engineering 2010 / 4, p. 54-62

### **Web-based framework for parallel distributed test [Electronic resource]**

**Ivask, Eero; Raik, Jaan; Ubar, Raimund-Johannes** 2008 IEEE Design and Diagnostics of Electronic Circuits and Systems : Bratislava, Slovakia, April 16-18, 2008 2008 / p. 271-274 : ill. [CD-ROM] <https://ieeexplore.ieee.org/document/4538800>

### **Veepuhastusjaama juurdevoolukanalis toimunud avarii põhjustest**

**Jaanis, Valdo** Ehitaja 1998 / lk. 86-87, 89: ill [https://www.ester.ee/record=b1072123\\*est](https://www.ester.ee/record=b1072123*est)

### **Verification of a wind farm aggregated generic dynamic model based on a real fault ride-through test in the grid**

**Tšernobrovkin, Oleg; Perdana, Abram; Palu, Ivo; Kilter, Jako** Proceedings of 5th Nordic Wind Power Conference 2009 2009 / [6] p <https://research.chalmers.se/en/publication/97817>

### **Vibration and stator current spectral analysis of induction machine operating under dynamic eccentricity**

**Sobra, Jan; Belahcen, Anouar; Vaimann, Toomas** 2015 International Conference on Electrical Drives and Power Electronics (EDPE) : 18th International Conference, 7th Joint Slovakian-Croatian Conference : proceedings : Hotel Slovan, Tatranska Lomnica, The High Tatras, Slovakia, September 21-23, 2015 2015 / p. 285-290 : ill <http://dx.doi.org/10.1109/EDPE.2015.7325307>

### **Vibration as fault indicator in electrical machines**

**Farzam Far, Mehmaz; Belahcen, Anouar; Arkkio, Antero; Roivainen, Janne** Doctoral School of Energy and Geotechnology II : closing conference of the project : Pärnu, Estonia, January 12-17, 2015 2015 / p. 120-125 : ill

### **Winding function based analytical model of squirrel cage induction motor for fault diagnostics**

**Asad, Bilal; Vaimann, Toomas; Kallaste, Ants; Rassõlkin, Anton; Belahcen, Anouar** 2019 26th International Workshop on Electric Drives : Improvement in Efficiency of Electric Drives (IWED) : Moscow Power Engineering Institute, Moscow, Russia, 30th of January - 2nd of February 2019 : proceedings 2019 / 6 p. : ill <https://doi.org/10.1109/IWED.2019.8664314>

### **Wound core voltage transformers overvoltage problems caused by single phase faults in MV networks**

**Järvik, Jaan; Kalda, Heljut; Külm, Evald; Sepping, Eino; Choi, J.** Международная научно-техническая конференция "Перенапряжения и надежность эксплуатации электрооборудования" : Санкт-Петербург, 31 марта - 05 апреля 2003 г. Выпуск 1 2003 / p. 324-332 : ill

### **Алгоритм оценки качества вероятностного тестирования цифровых схем**

**Grigorjeva, Ksenja** Машинное проектирование электронных устройств и систем 1989 / с. 97-103

### **Анализ процессов нагрузки и выявление неисправностей городских таксофонов**

**Animägi, T.; Borštševski, A.I.; Kangur, Oleg** Методы цифровой обработки и хранения радиотехнических сигналов 1987 / с. 99-105

### **Вероятностное тестирование цифровых схем и альтернативные графы**

**Ubar, Raimund-Johannes** Машинное проектирование электронных устройств и систем 1989 / с. 89-96

### **Влияние импеданса ключей на погрешности коммутируемых индуктивных делителей напряжения**

**Peterson, Jaak** Расчет и проектирование измерительных преобразователей 1983 / с. 11-17 : ил [https://www.ester.ee/record=b1288985\\*est](https://www.ester.ee/record=b1288985*est) <https://digikogu.taltech.ee/et/Item/4e3815a3-f217-4ae2-9776-1b5ea3c25959>

### **Диагностика кратных неисправностей в комбинационных схемах**

**Viilup, Agu; Ubar, Raimund-Johannes; Heiter, U.** Труды по электротехнике и автоматике : сборник статей. 11 1973 / с. 89-94 : илл [https://www.ester.ee/record=b2190624\\*est](https://www.ester.ee/record=b2190624*est) <https://digikogu.taltech.ee/et/Item/d6e57925-e104-44e1-a218-c5b3110d9996>

### **Из-за перебоев с электричеством у многих жителей Эстонии поломалась бытовая техника. Кто выплатит компенсацию?**

**Карри, А-М.** rus.postimees.ee 2024 [Из-за перебоев с электричеством у многих жителей Эстонии поломалась бытовая техника. Кто выплатит компенсацию?](#)

## Индикатор неисправности ламп ближнего света в автомобиле

Gavrilov, Aleksei Радилюбитель 2016 / с. 11

## К вычислению изменения интенсивности отказов элементов по изменениям температуры и нагрузки

**Koort, Ants** Тезисы докладов Республиканской научно-технической конференции "Современные методы и устройства радиоэлектронного оборудования", посвященной Дню радио. [2], Секция: Компьютерный анализ сигналов и цепей 1981 / с. 9-10 [https://www.ester.ee/record=b1310795\\*est](https://www.ester.ee/record=b1310795*est)

## Метод диагноза неисправностей в последовательностных системах

**Grigorjeva, Ksenja; Ubar, Raimund-Johannes** Расчет и проектирование приборов, устройств и систем технической кибернетики 1980 / с. 35-44 [https://www.ester.ee/record=b1281890\\*est](https://www.ester.ee/record=b1281890*est) <https://digikogu.taltech.ee/et/Item/8e0abfe2-9020-4ebd-85d1-fd67de0d1b30>

## Минимизация ошибок в лазерном рециркуляционном дальномере

**Zahharov, Boriss; Krusell, Urmas** Тезисы докладов III Всесоюзной конференции "Применение лазеров в технологии и системах передачи и обработки информации", 11-13 ноября 1987 г. 3, Лазерные системы передачи и обработки информации 1987 / с. 25 [https://www.ester.ee/record=b1273195\\*est](https://www.ester.ee/record=b1273195*est)

## Низкочастотные погрешности автотрансформаторных делителей напряжения

**Jöers, Rein** Расчет и проектирование приборов, устройств и систем технической кибернетики 1980 / с. 73-80 : илл [https://www.ester.ee/record=b1264145\\*est](https://www.ester.ee/record=b1264145*est) <https://digikogu.taltech.ee/et/Item/81bf2178-a9f8-417d-86c7-2000cca6a01e>

## О минимизации среднего времени обнаружения неисправностей в технических устройствах

**Ubar, Raimund-Johannes; Maslennikov, V.P.** Вопросы управления процессами. Ч.1 1971 / с. 136-142

## Описание неисправностей цифровых устройств

**Ubar, Raimund-Johannes** Расчет и проектирование приборов, устройств и систем технической кибернетики 1980 / с. 3-9 : илл [https://www.ester.ee/record=b1264145\\*est](https://www.ester.ee/record=b1264145*est) <https://digikogu.taltech.ee/et/Item/81bf2178-a9f8-417d-86c7-2000cca6a01e>

## Описание постоянных неисправностей ЦВМ

**Viilup, Agu** Расчет и проектирование приборов, устройств и систем технической кибернетики 1980 / с. 69-77 [https://www.ester.ee/record=b1281890\\*est](https://www.ester.ee/record=b1281890*est) <https://digikogu.taltech.ee/et/Item/8e0abfe2-9020-4ebd-85d1-fd67de0d1b30>

## Определение места повреждения в сетях 6...35 кВ при однофазных замыканиях на землю

**Ranov, Valeri; Järvik, Jaan** Ограничение перенапряжений и режимы заземления нейтрали сетей 6-35 кВ : труды третьей всероссийской научно-технической конференции : 28-30 сентября 2004 года 2004 / с. 160-167 : ил

## Организация обработки ошибок в системе построения трансляторов

**Vooglaid, Aare; Rohtla, Hanno** Анализ данных. Построение трансляторов. Вопросы программирования 1978 / с. 83-92 [https://www.ester.ee/record=b1272492\\*est](https://www.ester.ee/record=b1272492*est) <https://digikogu.taltech.ee/et/Item/1dbbc143-d62a-4471-af6c-c660a4af0827>

## Построение тестов для неисправностей комбинационных схем на основе анализа ортогональных дизъюнктивных нормальных форм, представляемых альтернативными графами

**Matrosova, A.Yu.; Pleshkov, A.G.; Ubar, Raimund-Johannes** Автоматика и телемеханика 2005 / с. 158-174 : ил <http://mi.mathnet.ru/at1333>

## Профессор Алар Конист: такими темпами о дешевом электричестве можно забыть

**Konist, Alar** dv.ee 2025 <https://www.dv.ee/novosti/2025/05/05/professor-alar-konist-takimi-tempami-o-deshevom-jelektrichestve-mozhno-zabyt>

## Стохастическое моделирование на ЭЦВМ возникновения отказов при малых нагрузках

**Koort, Ants** Тезисы докладов научно-технической конференции, посвященной Дню радио 1974 / с. 15-16 [https://www.ester.ee/record=b1294751\\*est](https://www.ester.ee/record=b1294751*est)

## Строитель Аувереской электростанции выплатил Enefit Power штраф в размере 130 млн евро

stena.ee 2022 [Строитель Аувереской электростанции выплатил Enefit Power штраф в размере 130 млн евро](#)