

A MPPT control method for full soft-switching high step-up current-fed DC-DC converter

Kosenko, Roman; Roasto, Indrek 2015 56th International Scientific Conference on Power and Electrical Engineering of Riga Technical University (RTUCon) 2015 / p. 199-203 : ill <https://ieeexplore.ieee.org/document/7343153>

Bidirectional operation of the single-phase neutral-point-clamped quasi-Z-source inverter

Husev, Oleksandr; Zakis, Janis; Vinnikov, Dmitri; Savenko, O. 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. 221-224 : ill

Bidirectional soft switching current source DC-DC converter for residential DC microgrids

Blinov, Andrei; Kosenko, Roman; Chub, Andrii; Vinnikov, Dmitri IECON 2018 - 44th Annual Conference of the IEEE Industrial Electronics Society : proceedings 2018 / p. 6059-6064 : ill <https://doi.org/10.1109/IECON.2018.8591103>

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Pourjafar, Saeed; Mohseni, Parham; Husev, Oleksandr; Strezelecki, Ryszard; Matiushkin, Oleksandr 2025 IEEE Applied Power Electronics Conference and Exposition (APEC) 2025 / p. 2173-2178 <https://doi.org/10.1109/APEC48143.2025.10977156>

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Husev, Oleksandr; Roncero-Clemente, Carlos; Stepenko, Serhii; Vinnikov, Dmitri; Romero-Cadaval, Enrique 15th International Power Electronics and Motion Control Conference, EPE-PEMC 2012 ECCE Europe, Novi Sad, Serbia 2012 / p. DS1b.21-1-DS1b.21-6 : ill <https://ieeexplore.ieee.org/document/6397221>

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Design and optimization of AIN based RF MEMS switches

Ziko, Mehadi Hasan; Koel, Ants IOP conference series : materials science and engineering 2018 / 012002 ; 9 p.: ill <https://doi.org/10.1088/1757-899X/362/1/012002> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

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Carvalho da Silva, Edivan Laercio; Sidorova, Aleksandra; Blinov, Andrei; Chub, Andrii; Vinnikov, Dmitri IEEE transactions on industrial electronics 2024 / p. 10601-10611 <https://doi.org/10.1109/TIE.2023.3331125> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

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Energy-efficient high-voltage switch based on parallel connection of IGBT and IGCT [Electronic resource]

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Feasibility study GaN transistors application in the novel split-coils inductive power transfer system with T-type inverter

Shevchenko, Viktor; Pakhaliuk, Bohdan; **Husev, Oleksandr**; Veligorskyi, Oleksandr; Stepins, Deniss; Strzelecki, Ryszard Industrial and Technological Applications of Power Electronics Systems 2021 / p. 315-330 <https://doi.org/10.3390/en13174535>

Feasibility study GaN transistors application in the novel split-coils inductive power transfer system with T-Type inverter

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Full soft-switching bidirectional isolated current-fed dual inductor push-pull DC-DC converter for battery energy storage applications [Online resource]

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Implementation possibilities of hybrid IGBT-IGCT switches in three-level NPC inverters

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Improved modulation method for full-bridge AC-DC HF-link converter

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MPPT and GMPPT Implementation for Buck-Boost Mode Control of quasi-Z-Source Inverter

Husev, Oleksandr; Vinnikov, Dmitri; Roncero-Clemente, Carlos; Blaabjerg, Frede; Strzelecki, Ryszard IEEE transactions on industrial electronics 2022 / p. 11348 - 11358 <https://doi.org/10.1109/TIE.2021.3125658> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Multiphase interleaved DC-DC converter with directly and inversely coupled inductors [Online resource]

Kroics, Kaspars; **Zakis, Janis;** Sirmelis, Ugis 2016 57th International Scientific Conference on Power and Electrical Engineering of Riga Technical University (RTUCON) : October 13, 14, 2016 : conference proceedings 2016 / [6] p. : ill <https://doi.org/10.1109/RTUCON.2016.7763102>

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Novel family of modified qZS buck-boost multilevel inverters with reduced switch count

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A novel high-voltage half-bridge converter with phase-shifted active rectifier [Electronic resource]

Blinov, Andrei; Ivakhno, Volodymyr; Zamaruev, Vladimir; **Vinnikov, Dmitri;** **Husev, Oleksandr** 2012 IEEE International Conference on Industrial Technology : proceedings CD 2012 / p. 967-970 : ill [CD-ROM] <https://ieeexplore.ieee.org/document/6210062>

Novel space vector pulse width modulation strategies for single-phase three-level NPC impedance-source inverters

Shults, Tatiana; **Husev, Oleksandr;** Blaabjerg, Frede; Roncero, Carlos; Romero-Cadaval, Enrique; **Vinnikov, Dmitri** IEEE transactions on power electronics 2019 / p. 4820-4830: ill <https://doi.org/10.1109/TPEL.2018.2859194> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Optimized modulation scheme for four-leg quasi Z-source inverter : reducing power loss and improving output quality

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P3R – Partial power post regulator for DC buildings application

Carvalho, Edivan Laercio; **Chub, Andrii;** **Blinov, Andrei;** Rathore, Akshay Kumar; **Vinnikov, Dmitri** IECON Proceedings (Industrial Electronics Conference) IECON 2024 - 50th Annual Conference of the IEEE Industrial Electronics Society 2024 / 6 p <https://doi.org/10.1109/IECON55916.2024.10905720> [Conference proceedings at Scopus](#) [Article at Scopus](#)

Passive shaping of line current waveform by converter with alternating of parallel and series resonance in AC-DC switch mode power supplies

Janson, Kuno; **Bolgov, Viktor;** **Kütt, Lauri;** **Kallaste, Ants;** **Mölder, Heigo** ICECS 2008 : The 15th IEEE International Conference on Electronics, Circuits and Systems : 31st August to 3rd September 2008, Malta : conference guide 2008 / p. 37 <https://ieeexplore.ieee.org/document/4674795>

Passive shaping of line current waveform by converter with alternating of parallel and series resonance in AC-DC switch mode power supplies [Electronic resource]

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PCB design impact on GaN-Based converter operation

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Performance improvement of PWM control methods for voltage step-down in series resonant DC-DC converters

Sidorov, Vadim; **Chub, Andrii;** **Vinnikov, Dmitri** Energies 2020 / art. en13174569 ; 18 p <https://doi.org/10.3390/en13174569> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

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