Ratil Ashique

List of Publications by Year in Descending Order

79 papers	**2,416** citations	**23** h-index	**48** g-index
87 ext. papers	**3,171** ext. citations	**5.3** avg, IF	**5.98** L-index

#	Paper	IF	Citations
79	Mitigation of mismatch power loss in aged photovoltaic arrays following a comparative investigation into module rearrangement techniques. *Energy Reports*, **2022**, 8, 1896-1906	4.6	0
78	A Comparative Analysis of Soft Switching Techniques in Reducing the Energy Loss and Improving the Soft Switching Range in Power Converters. *Electronics (Switzerland)*, **2022**, 11, 1062	2.6	1
77	Solution of Economic Dispatch Problem Using Hybrid Multi-Verse Optimizer. *Electric Power Systems Research*, **2022**, 208, 107912	3.5	1
76	A review on machine learning and deep learning for various antenna design applications.. *Heliyon*, **2022**, 8, e09317	3.6	3
75	An Improved Approach to Enhance Training Performance of ANN and the Prediction of PV Power for Any Time-Span without the Presence of Real-Time Weather Data. *Sustainability*, **2021**, 13, 11893	3.6	1
74	An improved asymmetrical multi-level inverter topology with boosted output voltage and reduced components count. *IET Power Electronics*, **2021**, 14, 2052-2066	2.2	4
73	An Analysis and Modeling of the Class-E Inverter for ZVS/ZVDS at Any Duty Ratio with High Input Ripple Current. *Electronics (Switzerland)*, **2021**, 10, 1312	2.6	2
72	A skipping adaptive P&O MPPT for fast and efficient tracking under partial shading in PV arrays. *International Transactions on Electrical Energy Systems*, **2021**, 31, e13017	2.2	6
71	A High-Performance Global Maximum Power Point Tracker of PV System for Rapidly Changing Partial Shading Conditions. *IEEE Transactions on Industrial Electronics*, **2021**, 68, 2236-2245	8.9	30
70	Intelligent Machine Learning With Evolutionary Algorithm Based Short Term Load Forecasting in Power Systems. *IEEE Access*, **2021**, 9, 100113-100124	3.5	2
69	A Comparative Performance Analysis of Zero Voltage Switching Class E and Selected Enhanced Class E Inverters. *Electronics (Switzerland)*, **2021**, 10, 2226	2.6	2
68	Image based surface damage detection of renewable energy installations using a unified deep learning approach. *Energy Reports*, **2021**, 7, 4566-4576	4.6	7
67	Exergy based evaluation of power plants for sustainability and economic performance identification. *Case Studies in Thermal Engineering*, **2021**, 28, 101393	5.6	5
66	A Simple yet Fully Adaptive PSO Algorithm for Global Peak Tracking of Photovoltaic Array Under Partial Shading Conditions. *IEEE Transactions on Industrial Electronics*, **2021**, 1-1	8.9	4
65	The Leakage Current Components as a Diagnostic Tool to Estimate Contamination Level on High Voltage Insulators. *IEEE Access*, **2020**, 1-1	3.5	12
64	Methodology to Determine Photovoltaic Inverter Conversion Efficiency for the Equatorial Region. *Applied Sciences (Switzerland)*, **2020**, 10, 201	2.6	1
63	Recent developments of MPPT techniques for PV systems under partial shading conditions: a critical review and performance evaluation. *IET Renewable Power Generation*, **2020**, 14, 3401-3417	2.9	12

62	Risk Assessment of Polluted Glass Insulator Using Leakage Current Index Under Different Operating Conditions. *IEEE Access*, **2020**, 8, 175827-175839	3.5	14
61	Analysis of Online Lyapunov-Based Adaptive State of Charge Observer for Lithium-Ion Batteries Under Low Excitation Level. *IEEE Access*, **2020**, 8, 178805-178815	3.5	5
60	Assessment of maximum power point trackers performance using direct and indirect control methods. *International Transactions on Electrical Energy Systems*, **2020**, 30, e12565	2.2	6
59	Design and Implementation of New Multilevel Inverter Topology for Trinary Sequence Using Unipolar Pulsewidth Modulation. *IEEE Transactions on Industrial Electronics*, **2020**, 67, 3573-3582	8.9	32
58	Analysis and experimental validation of partial shading mitigation in photovoltaic system using integrated dc-dc converter with maximum power point tracker. *IET Renewable Power Generation*, **2019**, 13, 2356-2366	2.9	6
57	A New Hybrid Multilevel Inverter Topology with Reduced Switch Count and dc Voltage Sources. *Energies*, **2019**, 12, 977	3.1	10
56	Hardware Approach to Mitigate the Effects of Module Mismatch in a Grid-connected Photovoltaic System: A Review. *Energies*, **2019**, 12, 4321	3.1	3
55	Critical evaluation of soft computing methods for maximum power point tracking algorithms of photovoltaic systems. *International Journal of Power Electronics and Drive Systems*, **2019**, 10, 548	1.5	9
54	Optimized sizing of photovoltaic grid-connected electric vehicle charging system using particle swarm optimization. *International Journal of Energy Research*, **2019**, 43, 500-522	4.5	42
53	An Effective Hybrid Maximum Power Point Tracker of Photovoltaic Arrays for Complex Partial Shading Conditions. *IEEE Transactions on Industrial Electronics*, **2019**, 66, 6990-7000	8.9	62
52	A rule-based energy management scheme for uninterrupted electric vehicles charging at constant price using photovoltaic-grid system. *Renewable Energy*, **2018**, 125, 384-400	8.1	54
51	A High-Gain, High-Efficiency Nonisolated Bidirectional DC-DC Converter With Sustained ZVS Operation. *IEEE Transactions on Industrial Electronics*, **2018**, 65, 7829-7840	8.9	18
50	Modifications to Accelerate the Iterative Algorithm for the Two-diode Model of PV Module **2018**,		4
49	A Rule-based Power Management Controller using Stateflow for Grid-Connected PV-Battery Energy System supplying Household load **2018**,		3
48	. *IEEE Transactions on Industrial Electronics*, **2017**, 64, 5416-5427	8.9	20
47	. *IEEE Transactions on Industrial Informatics*, **2017**, 13, 2151-2161	11.9	72
46	An Accurate and Fast Computational Algorithm for the Two-diode Model of PV Module Based on a Hybrid Method. *IEEE Transactions on Industrial Electronics*, **2017**, 64, 6212-6222	8.9	50
45	Integrated photovoltaic-grid dc fast charging system for electric vehicle: A review of the architecture and control. *Renewable and Sustainable Energy Reviews*, **2017**, 69, 1243-1257	16.2	78

44	An adaptive sliding mode control technique applied in grid-connected PV system with reduced chattering effect **2017**,		2
43	A fast MPPT technique based on I-V curve characteristics under partial shading **2017**,		2
42	Real time implementation of space vector pulse width modulation for three level neutral point clamped (NPC) inverter using Arduino DUE board **2017**,		1
41	Asymmetrical multilevel inverter topology with reduced power semiconductor devices **2016**,		6
40	A critical review of electric vehicle charging using solar photovoltaic. *International Journal of Energy Research*, **2016**, 40, 439-461	4.5	51
39	Electric vehicles charging using photovoltaic: Status and technological review. *Renewable and Sustainable Energy Reviews*, **2016**, 54, 34-47	16.2	115
38	A Comprehensive Overview of Electric Vehicle Charging using Renewable Energy. *International Journal of Power Electronics and Drive Systems*, **2016**, 7, 114	1.5	15
37	The effect of soil ionization on transient grounding electrode resistance in non-homogeneous soil conditions. *International Transactions on Electrical Energy Systems*, **2016**, 26, 1462-1475	2.2	6
36	Charging of Electric Vehicle with Constant Price Using Photovoltaic Based Grid-connected System **2016**,		5
35	A high gain soft switching non-isolated bidirectional DC-DC converter **2016**,		4
34	Electric Vehicle Charging Using Photovoltaic based Microgrid for Remote Islands. *Energy Procedia*, **2016**, 103, 213-218	2.3	22
33	A Modified P&O Maximum Power Point Tracking Method With Reduced Steady-State Oscillation and Improved Tracking Efficiency. *IEEE Transactions on Sustainable Energy*, **2016**, 7, 1506-1515	8.2	197
32	A modified differential evolution based maximum power point tracker for photovoltaic system under partial shading condition. *Energy and Buildings*, **2015**, 103, 175-184	7	43
31	Modified phyto-waste Terminalia catappa fruit shells: a reusable adsorbent for the removal of micropollutant diclofenac. *RSC Advances*, **2015**, 5, 30950-30962	3.7	49
30	Design and implementation of 15-level cascaded multi-level voltage source inverter with harmonics elimination pulse-width modulation using differential evolution method. *IET Power Electronics*, **2015**, 8, 1740-1748	2.2	36
29	SiC power devices and applications in quasi-z-source converters/inverters **2015**,		3
28	Two-diode model for parameters extraction of photovoltaic module under temperature variation. *IEICE Electronics Express*, **2015**, 12, 20150492-20150492	0.5	3
27	A high power density soft switching bidirectional converter using unified resonant circuit **2015**,		7

26	Comprehensive Design and Propagation Study of a Compact Dual Band Antenna for Healthcare Applications. *Journal of Sensor and Actuator Networks*, **2015**, 4, 50-66	3.8	7
25	An adaptive P&O MPPT using a sectionalized piece-wise linear P-V curve **2015**,		4
24	. *IEEE Transactions on Industrial Informatics*, **2015**, 11, 1378-1387	11.9	84
23	An accurate two diode model computation for CIS thin film PV module using the hybrid approach **2015**,		5
22	A Maximum Power Point Tracking (MPPT) for PV system using Cuckoo Search with partial shading capability. *Applied Energy*, **2014**, 119, 118-130	10.7	337
21	A study on large scale cultivation of Microcystis aeruginosa under open raceway pond at semi-continuous mode for biodiesel production. *Bioresource Technology*, **2014**, 172, 186-193	11	24
20	Dual matrix converters based seven-phase open-end winding drive **2014**,		1
19	Efficiency for photovoltaic inverter: A technological review **2014**,		3
18	Dielectric Barrier Discharge Ozonizer Using the Transformerless Single-Switch Resonant Converter for Portable Applications. *IEEE Transactions on Industry Applications*, **2014**, 50, 2197-2206	4.3	5
17	Common-mode voltage elimination in a three-to-seven phase dual matrix converter feeding a seven phase open-end induction motor drive **2014**,		6
16	HEPWM implementation for fifteen level cascaded inverter using field programmable gate array **2014**,		4
15	Soft computing-based harmonic elimination PWM techniques for multi-level voltage source inverter **2014**,		2
14	Design and implementation of a high-frequency LC-based half-bridge resonant converter for dielectric barrier discharge ozone generator. *IET Power Electronics*, **2014**, 7, 2403-2411	2.2	12
13	Study on the effectiveness of lightning rod tips in capturing lightning leaders. *Electrical Engineering*, **2013**, 95, 367-381	1.5	7
12	A review of maximum power point tracking techniques of PV system for uniform insolation and partial shading condition. *Renewable and Sustainable Energy Reviews*, **2013**, 19, 475-488	16.2	363
11	A soft computing MPPT for PV system based on Cuckoo Search algorithm **2013**,		29
10	The application of soft computing methods for MPPT of PV system: A technological and status review. *Applied Energy*, **2013**, 107, 135-148	10.7	243
9	Space vector PWM technique for a novel three-to-seven phase matrix converter **2013**,		7

8	Design and implementation of a low cost, high yield dielectric barrier discharge ozone generator based on the single switch resonant converter. *IET Power Electronics*, **2013**, 6, 1583-1591	2.2	7
7	Using Differential Evolution to Solve the Harmonic Elimination Pulse Width Modulation for Five Level Cascaded Multilevel Voltage Source Inverter **2013**,		2
6	A Simple and Effective Method to Estimate the Model Parameters of Dielectric Barrier Discharge Ozone Chamber. *IEEE Transactions on Instrumentation and Measurement*, **2012**, 61, 1676-1683	5.2	26
5	Application of particle swarm optimization for maximum power point tracking of PV system with direct control method **2011**,		13
4	Maximum Power Point Tracking for PV system under partial shading condition via particle swarm optimization **2011**,		28
3	Parameter extraction of photovoltaic cell using differential evolution method **2011**,		13
2	Analysis and design of a high efficiency bidirectional DC-DC converter for battery and ultracapacitor applications. *Simulation Modelling Practice and Theory*, **2011**, 19, 1651-1667	3.9	29
1	Hardware Implementation of the High Frequency Link Inveter Using the dSPACE DS1104 Digital Signal Processing Board **2006**,		3