

FACULTY DETAILED RESEARCH DATA:

Name of the Faculty: Dr. Rituparna Mukherjee

Designation: Assistant Professor

Department: Electrical Engineering

School: School of Engineering

Research Area: Power System Protection

Details of research portfolio of faculty: A.

Researcher's ID details:

Google Scholar ID: DoT93YIAAAAJ&hl

Orchid ID: 0000-0003-4455-6185

Scopus ID 57193701438

Vidwan ID

B. Publication details:

1. Conference proceedings/ Conference paper:

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
1	National Conference in Modern Trends in Electrical Engineering (NCMTEE–2009)	A Neuro-Fuzzy Control Technique for Control of Tank Level in a Lubricant Processing Plant	2009	Angon Bhattacharjee, Rituparna Mukherjee, Abhinandan De, and Pallav Datta	National	-	-
2	National Conference in Modern Trends in Electrical Engineering (NCERT2013)	Switching Transient Analysis of 33/11 kV Baruipur Substation	2013	Rituparna Mukherjee, and Rikta Mazumder	National	-	-
3	19th IEEE Conference on Power	Model Predictive Control for	2016	Arka Panda, Rituparna Mukherjee,	International	-	-

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
	System (NPSC-2016)	Power System Dynamic Security Enhancement		Abhinandan De and Samrat Chakraborty			
4	International Conference on Integrative Science and Technology (ICISE)	Machine Learning Applications in Power System Resilience: A Review	Sept 2023	Rituparna Mukherjee, Abhishek Dhar, Susmita Dhar Mukherjee, Suvraujjal Dutta and Promit Kumar Saha	International	-	-
5	International Conference on Integrative Science and Technology (ICISE)	A Complete Review of Numerous Methods of Voltage Stability Analysis	Sept 2023	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee, Avik Dutta and Rituparna Mitra	International	-	-
6	International Conference on Integrative Science and Technology (ICISE)	Applicability of Random Forest Model for Predicting Groundwater Table in Birbhum District, West Bengal India	Sept 2023	Rituparna Mukherjee, Abhishek Dhar, Susmita Dhar Mukherjee, Suvraujjal Dutta and Promit Kumar Saha	International	-	-
7	International Conference on Engineering Design and Computing (ICEDC)	Machine Learning Techniques for Power System Protection from a Utility Perspective	Feb 2024	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee,	International	-	-

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
				Avik Dutta and Rituparna Mitra			
8	International Conference on Engineering Design and Computing (ICEDC)	Review of machine learning applications to power systems studies	Feb 2024	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee, Avik Dutta and Rituparna Mitra	International	-	-
9	International Conference on Engineering Design and Computing (ICEDC)	Power System Relay Protection Technology: Its Development and Use	Feb 2024	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee, Titas Kumar Nag and Suvraujjal Dutta	International	-	-
10	International Conference on Engineering Design and Computing (ICEDC)	Optimization Techniques in Power System: Review	Feb 2024	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee, Titas Kumar Nag and Suvraujjal Dutta	International	-	-
11	International Conference on Engineering Design and Computing (ICEDC)	A Useful Method for Machine Learning in Power System Protection	Feb 2024	Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Susmita Dhar Mukherjee, Titas Kumar Nag	International	-	-

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
				and Suvraujjal Dutta			
12	International Conference on Integrative Science and Technology (ICISE)	An overview of the power systems studies' use of machine learning	June 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Rituparna Mitra and Avik Dutta	International	-	-
13	International Conference on Integrative Science and Technology (ICISE)	Detection Of Transmission Line Faults: A Review	June 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Rituparna Mitra and Titas Kumar Nag	International	-	-
14	International Conference on Integrative Science and Technology (ICISE)	A Review on Fault Detection and Allocation Techniques in Power System	June 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Suvraujjal Dutta and Titas Kumar Nag	International	-	-
15	International Conference on Integrative Science and Technology (ICISE)	Power System And Faults: A Review	June 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Sujay	International	-	-

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
				Bhowmik and Arunima Mahapatra			
16	International Conference on Integrative Science and Technology (ICISE)	A Review on Fault Detection on DC Microgrid	June 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Sujay Bhowmik and Arunima Mahapatra	International	-	-
17	International Conference on Sustainable Research and Development (ICSRD)	Integration of renewable energy sources into the electricity grid	Sept 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Rituparna Mitra and Avik Dutta	International	-	-
18	International Conference on Sustainable Research and Development (ICSRD)	Review of Online Condition Monitoring in Power Systems	Sept 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Sujay Bhowmik and Arunima Mahapatra	International	-	-
19	International Conference on Sustainable	A comprehensive review: Microgrid	Sept 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee,	International	-	-

Sl. No.	Name of the Conference	Title of the paper	Month & Year of Publication	Author(s) Name	National/ International	doi number (if any)	ISSN/ ISBN no.
	Research and Development (ICSRD)	Protection (AC and DC)		Abhishek Dhar, Promit Kumar Saha, Rituparna Mitra and Titas Kumar Nag			
20	International Conference on Sustainable Research and Development (ICSRD)	A review on forecasting photovoltaic power using machine learning	Sept 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Sujay Bhowmik and Arunima Mahapatra	International	-	-
21	International Conference on Sustainable Research and Development (ICSRD)	A literature review on predicting solar energy output using machine learning techniques	Sept 2024	Rituparna Mukherjee, Susmita Dhar Mukherjee, Abhishek Dhar, Promit Kumar Saha, Suvraujjal Dutta and Titas Kumar Nag	International	-	-

Type of Journal	DOI No.	Name of the Article	Name of the Author	ISSN No.
IEEE System Journal SCI Indexed	Doi: 10.1109/JSYST.2020.2978504	Development of an Ensemble Decision Tree-Based Power System Dynamic Security State Predictor	R. Mukherjee and A. De	1932-8184
Springer Electrical,	Doi.org/10.1007/s00202-020-01118-z	Real-time dynamic security	R. Mukherjee and A. De	2092-7592

SCI Indexed		analysis of power systems using strategic PMU measurements and decision tree classification		
IJIRSET 2016		Transient Analysis of Single-Phase Transformer Using State Mode	R Majumder, S Ghosh, R Mukherjee	
Journal Of Mines	https://doi.org/10.18311/jmmf/2023/43590	A Convolutional Neural Network based Pattern Classification Approach for Dynamic Security Assessment with Inadequate Energy Sources	R. Mukherjee, A. De, P. K. Saha, S. D. Mukherjee, A. Dhar, and S. Adhikari	
Journal of Mines	https://doi.org/10.18311/jmmf/2023/43590	Power System Transient Stability Analysis using Decision Tree Classifier- A Case Study on the IEEE 57-Bus System	R. Mukherjee, A. De, P. K. Saha, S. D. Mukherjee, A. Dhar, and S. Adhikar	

2. Publications in SCI/Scopus indexed Journals:

Sl. No	Name of the Journal (mention SCI/scopus)	Title of the paper	Month & Year of Publication	Author(s) Name (Highlight the corresponding and 1st author in	doi number	Issue No. & Volume No.	Page no.	ISSN of the journal
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				every article)				
	IEEE System Journal SCI Indexed	Development of an Ensemble Decision Tree- Based Power System Dynamic Security State Predictor		R. Mukherjee and A. De	Doi: 10.1109/ JSYST.2 020.2978 504		3836- 3843	1932-8184
	Springer Electrical, SCI Indexed	Real-time dynamic security analysis of power systems using strategic PMU measurements and decision tree classification		R. Mukherjee and A. De	Doi.org/ 10.1007/ s00202- 020- 01118-z			2092-7592
	IJIRSET 2016	Transient Analysis of Single-Phase Transformer Using State Mode		R Majumder, S Ghosh, R Mukherjee				
	Journal Of Mines	A Convolutional Neural Network based Pattern Classification Approach for Dynamic Security Assessment with Inadequate Energy Sources		R. Mukherjee, A. De, P. K. Saha, S. D. Mukherjee, A. Dhar, and S. Adhikari	https://d oi.org/10 .18311/j mmf/202 3/43590			

	Journal of Mines	Power System Transient Stability Analysis using Decision Tree Classifier- A Case Study on the IEEE 57-Bus System		R. Mukherjee, A. De, P. K. Saha, S. D. Mukherjee, A. Dhar, and S. Adhikar	https://doi.org/10.18311/jmmf/2023/43590			
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3. Book chapter:

Sl. No.	Title of the book	Publishers	Author(s) Name (Highlight the corresponding and 1 st author in every article)	Year	ISBN No.	doi no. (if applicable)
	Innovations in Electrical and Electronic Engineering	Springer Nature	R. Mukherjee and A. De	2020	978-981-15-4692-1	https://doi.org/10.1007/978-981-15-4692-1_5
	Frontiers of Engineering Innovation: Interdisciplinary approaches and Applications		Rituparna Mukherjee , Susmita Dhar Mukherjee , Avik Datta, Rituparna Mitra		978-93-6452-860-3	
	Frontiers of Engineering Innovation: Interdisciplinary approaches and Applications		Rituparna Mukherjee, Susmita Dhar Mukherjee, Titas Kumar Nag, Promit Kumar Saha		978-93-6452-860-3	
	Frontiers of Engineering Innovation: Interdisciplinary		Promit Kumar Saha, Rituparna Mukherjee , Rituparna Mitra, Suvraujjal Dutta, Susmita Dhar		978-93-6452-860-3	

	approaches and Applications		Mukherjee, Aritras Chakraborty			
	Frontiers of Engineering Innovation: Interdisciplinary approaches and Applications		Promit Kumar Saha, Rituparna Mukherjee, Suvraujjal Dutta, Rituparna Mitra, Avik Datta, Titas Kumar Nag		978-93-6452-860-3	
	Frontiers of Engineering Innovation: Interdisciplinary approaches and Applications		Susmita Dhar Mukherjee, Rituparna Mukherjee, Suvraujjal Dutta		978-93-6452-860-3	
	Frontiers of Engineering Innovation: Interdisciplinary approaches and Applications		Susmita Dhar Mukherjee, Rituparna Mukherjee, Rituparna Mitra		978-93-6452-860-3	
	Synergy in Science and Engineering: An Integrative Approach		Suvraujjal Dutta, Rituparna Mukharjee, Avik Datta and Rituparna Mitra		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
	Synergy in Science and Engineering: An Integrative Approach		Suvraujjal Dutta, Avik Datta, Rituparna Mitra and Rituparna Mukharjee		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
	Synergy in Science and Engineering: An Integrative Approach		Suvraujjal Dutta, Avik Datta, Rituparna Mitra and Rituparna Mukharjee		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
	Synergy in Science and Engineering: An Integrative Approach		Suvraujjal Dutta, Avik Datta, Rituparna Mitra and Rituparna Mukharjee		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863

	Synergy in Science and Engineering: An Integrative Approach		Susmita Dhar Mukherjee, Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Rituparna Mitra and Avik Dutta		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
	Synergy in Science and Engineering: An Integrative Approach		Susmita Dhar Mukherjee, Rituparna Mukherjee, Abhishek Dhar, Promit Kumar Saha, Sujoy Bhowmik and Arunima Mahapatra		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
	Synergy in Science and Engineering: An Integrative Approach		Susmita Dhar Mukherjee, Rituparna Mukherjee, Suvraujjal Dutta and Promit Kumar Saha		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
			Susmita Dhar Mukherjee, Rituparna Mukherjee and Rituparna Mitra		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863
			Rituparna Mitra, Avik Datta, Suvraujjal Dutta, Promit Kumar Saha, Rituparna Mukherjee and Susmita Dhar Mukherjee		978-93-6135-058-0	https://doi.org/10.22271/ed.book.2863

4. Text/Reference book published from reputed national/international publishers:

Sl. No.	Title of the Text/Reference book	Publishers	Author(s) Name (Highlight the corresponding and 1 st author in every article)	Year	ISBN No.	doi no. (if applicable)

5. Project granted:

Sl. No	Sponsoring Agency	Name of the project	Duration		Amount in Lakhs	PI/ CO-PI
			Starting Month & Year	Ending month & Year		

6. Consultancy Project Grant:

Sl No.	Project title	Funding Agency	Duration	Completed (yes/no)	Sanctioned amount (in Rs.)	PI and CO-PI (if any)

7. Patent/IPR granted:

Sl. No.	Name of the patent	Name of the applicant	Name of the inventor	Date of File	Date of Publication	Whether Granted (yes/no); If yes, Date of Grant	Application No.

8.