

CURRICULUM VITAE

1.	Name	JAYATI DEY
2.	Date of Birth (dd/mm/yyyy)	24/05/1977
3.	Designation	Associate Professor
4.	Address	National Institute of Technology Durgapur, M. G. Avenue, City: Durgapur (W.B.) P.O.: R. E. College, Pin Code: 713 209 Contact No: 9434788173 Email_id: jayati.dey@ee.nitdgp.ac.in
5.	Professional Qualifications:	

Degree	Institution conferring the degree	Field(s)	Year
B. E.	Jadavpur University, Kolkata	Electrical Engineering	2000
M.E.	B. E. College , Shibpur, Howrah	Electrical Engineering (Control Systems)	2003
PhD	Indian Institute of Technology Kharagpur	Electrical Engineering (Control Systems)	2007

6. Research/training experience

Duration	Designation	Institution	Nature of Work
1 st Jan, 2001 – 5 th March, 2003	Junior Research Fellow in RCI, Hyderabad (DRDO) sponsored R&D Project	Department of Applied Mechanics, Bengal Engineering College, (Deemed University), Shibpur, Howrah	Development of Simulation Software for Two- Stage Electrohydraulic Servovalve

7. List of publications:

JOURNAL

Sl. No.	Title of paper	Author(s)	Name of the Journal	Vol.&Year	Pages
1.	Periodic Compensation of Continuous-time Plants	Sarit K. Das, Jayati Dey	IEEE Transaction on Automatic Control	Vol. 52, 2007	898-904
2.	Sliding mode control, implementation and	Nayan Kumar, Tapas Kumar	Solar Energy (SCI)	Vol. 155 (2017)	1178-1187

	performance analysis of standalone PV fed Dual Inverter	Saha, Jayati Dey			
3.	Periodic control for cart-pendulum system with structured uncertainty	A. Chakraborty and J. Dey	Turkish Journal Of Electrical Engineering & Computer Sciences (SCI)	Volume 25, Issue 1, 2017	140-154
4.	Modeling, control and analysis of cascaded inverter based grid-connected photovoltaic system	Nayan Kumar, Tapas Kumar Saha, Jayati Dey	Electrical Power and Energy Systems (SCI)	Vol. 78, 2016	165-173
5.	Sliding-Mode Control of PWM Dual Inverter-Based Grid-Connected PV System: Modeling and Performance Analysis	Nayan Kumar, Tapas Kumar Saha, Jayati Dey	IEEE Journal of Emerging And Selected Topics in Power Electronics (SCI)	Vol. 4, No.2, June 2016	435-444
6.	Robust compensation of time delayed plant by continuous-time high frequency periodic controller with negligible output ripples	A. Chakraborty and Jayati Dey	International Journal of Robust and Nonlinear Control (SCI)	Volume 26, Issue 13, 2016	2880-2898
7.	Discrete Lagrangian Mathematical Model Based Sensorless Two DOF Control of Induction Motor	M. Swargiary, J. Dey, T. K. Saha	International Journal of Control Theory and Applications (SCOPUS Indexed)	Vol 9, No. 43, 2016	231-242
8.	Robust PID Controller Design for TRMS using Kharitonov Theorem & PSO Technique	Sumit Kumar Pandey, Jayati Dey and Subrata Banerjee	International Journal of Control Theory and Applications (Scopus Indexed)	Vol. 10, No.-18, 2017	211-222
9	Control, implementation, and analysis of a dual two-level photovoltaic inverter based on modified proportional-resonant controller	Nayan Kumar, Tapas Kumar Saha, Jayati Dey	IET Renewable Power Generation (SCI)	Vol 12, Iss 5, 2018	598-604
10	Design of robust proportional-integral-derivative controller for generalized decoupled twin Rotor multi-input-multi-output system with actuator nonlinearity	Sumit Kumar Pandey, Jayati Dey and Subrata Banerjee	Proc IMechE Part 1: Journal of Systems and Control Engineering (Sage Publication) (SCI)	232(8), 2018	971-982
11	Generalized Phase Compensator of Continuous-time Plants	Jayati Dey, Reetam Mondal, S Halder	ISA Transactions, Elsevier	81 (2018)	141-154
12	Optimal fractional order $PI^{\alpha}D^{\mu}$ controller for stabilization of cart-inverted pendulum system: Experimental results	Reetam Mondal, Arindam Chakraborty, Jayati Dey, Suman Halder	Asian Journal of Control, Wiley	2019	1-15
13	Periodic Controller For Guaranteed Simultaneous Stabilization of two Plants with Robust Zero Error tracking	Arindam Chakraborty, Jayati Dey	Proc IMechE Part 1: Journal of Systems and Control Engineering (Sage Publication) (SCI)	2019, 233(5)	480-490
14	Fractional Order (FO) Two Degree of Freedom (2-DOF) Control of Linear Time Invariant (LTI) Plants	Reetam Mondal and Jayati Dey	ISA Transactions, Elsevier	96(2020)	352-366
15	Design of Fractional Order (FO) Controller for Non-	Reetam Mondal, Jayati Dey and	International Journal of	2018	pp.148-155

	Minimum Phase Unstable Plant	Suman Halder	Mechanical and Production Engineering Research and Development (IJMPERD), Trans Stellar Journal Publications		(Scopus)
16	Design of Two DOF PID controller based on Kharitonov's Stability Theorem for Control of TRMS	Sumit Kumar Pandey, Jayati Dey and Subrata Banerjee	International Journal of Mechanical and Production Engineering Research and Development (IJMPERD), Trans Stellar Journal Publications	2018	pp. 140-147
17	Robust Stabilization of Cart-Inverted Pendulum in course of Hill Climbing with Periodic Controller	A. Chakraborty, Jayati Dey	International Journal of Mechanical and Production Engineering Research and Development (IJMPERD)	2018	pp. 168-176
18	Robust Stability and Chaotic Behavior of a Periodic Compensated Time Delayed Inverted Pendulum	A. Chakraborty, Jayati Dey	International Journal of Mechanical and Production Engineering Research and Development (IJMPERD)	2018	pp. 305-314
19	Multilevel Inverter (MLI)-Based Stand-Alone Photovoltaic System: Modeling, Analysis, and Control	Nayan Kumar, Tapas Kumar Saha, Jayati Dey	IEEE SYSTEMS JOURNAL	Vol 14, No1. March 2020	909-915
20	Performance Analysis and Implementation of Fractional Order (FO) 2-DOF (Degree of Freedom) Control on Cart-Inverted Pendulum System	Reetam Mondal and Jayati Dey	IEEE TRANSACTIONS ON INDUSTRY APPLICATIONS	Vol. 56, No. 6,	7055-7066
21	Development, implementation and performance analysis of decoupler based control of dual source DC-DC converter based control of dual source DC-DC converter	Dibyendu Sen, Tapas Kumar Saha, Jayati Dey	International Journal of Electronics and Communications	117 (2020)	
22	Sliding mode control of double input buck buck-boost fused converter	Dibyendu Sen, Tapas Kumar Saha, Jayati Dey	Asian Journal of Control	DOI: 10.1002/asjc.2481	
23	On Internal Model Control (IMC) of MIMO Systems	Sumit Kumar Pandey, Jayati Dey & Subrata Banerjee	IETE Journal of Research	https://doi.org/10.1080/03772063.2021.1951379	

24	Generalized Discrete Decoupling and Control of MIMO Systems	Sumit Kumar Pandey, Jayati Dey & Subrata Banerjee	Asian Journal of Control	https://doi.org/10.1002/asjc.2716	
25	Practical Application of Fractional-Order PID Controller based on Evolutionary Optimization Approach for a Magnetic Levitation System	Soham Dey, Subrata Banerjee & Jayati Dey	IETE Journal of Research	https://www.tandfonline.com/doi/full/10.1080/03772063.2022.2052983	
26	A Novel Design Methodology on Cascaded Fractional Order (FO) PI-PD Control and its Real Time Implementation to Cart-Inverted Pendulum System	Reetam Mondal and Jayati Dey	ISA Transactions, Elsevier	https://doi.org/10.1016/j.isatra.2022.04.015	
27	Modified Kharitonov Theorem Based Optimal PID Controller Design for MIMO Systems	Sumit Kumar Pandey, Jayati Dey & Subrata Banerjee	Journal of Electrical Engineering & Technology, Springer (SCI)	https://doi.org/10.1007/s42835-022-01329-3	
28	Fractional order internal model control of non-minimum phase and time-delayed plants	Reetam Mondal and Jayati Dey	Asian Journal of Control (SCI)	DOI: 10.1002/asjc.3015, Dec, 2022	
29	An Extended Experimental Study on Control of Unstable and Non-Minimum Phase Plants with the Cascaded Form of a Fractional Order Compensator	Reetam Mondal and Jayati Dey	IEEE TRANSACTIONS ON INDUSTRIAL APPLICATIONS	DOI 10.1109/TIA.2023.3250607	
30	Control of Generalized decoupled MIMO Systems based on Linear Programming Method	Sumit Kumar Pandey, Jayati Dey & Subrata Banerjee	IETE Journal of Research	Accepted	
31	Active Power Control of DPC Based Operation of Three Phase Inverter Under Stand-alone Mode	Dibyendu Sen, Sunil Kumar, Tapas Kumar Saha, Jayati Dey	Electric Power Components and Systems	https://doi.org/10.1080/15325008.2022.2148776	
32	Bifurcation of Double Input DC-DC Buck Buck-boost Fused Converter	Dibyendu Sen, Ruman Kalyan Mahapatra, Tapas Kumar Saha, Jayati Dey	Journal of Control, Automation and Electrical Systems	Accepted	

Conference			
Sl.No.	Name of the Conference	Title of the paper with Date	Author (s)Name
1.	International Conference on Emerging Trends in Engineering Science and Technology (ICETEST-ICETICS) 2018	Decoupling Control of TRMS based On relative gain array (RGA) and Kharitnov's Theorem 18-20 th Jan, 2018	S K Pandey, J Dey and S Banerjee
2.	International Conference on Emerging Trends in Engineering Science and Technology	Development and Performance Analysis of Modified Decoupler Based Control of Double Input DC-	D Sen, R K Mahapatra, T K Saha, J Dey

	(ICETEST-IEEE PICC) 2018	DC Converter 18-20 Jan, 2018	
3.	2nd International Conference on Advances in Dynamics, Vibration and Control (ICADV-2018), NIT Durgapur	Design of Two DOF PID Controller based on Kharitnov's Stability Theorem for Control of TRMS 6-8 th June, 2018	S Kumar Pandey, J Dey and S Banerjee
4.	2nd International Conference on Advances in Dynamics, Vibration and Control (ICADV-2018), NIT Durgapur	Design of Fractional Order Controller for Non-Minimum Phase Unstable Plant 6-8 th June, 2018	R Mondal, J Dey and S Halder
5.	2nd International Conference on Advances in Dynamics, Vibration and Control (ICADV-2018), NIT Durgapur	Robust Stabilization of Cart-Inverted Pendulum in course of Hill Climbing with Periodic Controller 6-8 th June, 2018	A Chakraborty and J Dey
6.	2nd International Conference on Advances in Dynamics, Vibration and Control (ICADV-2018), NIT Durgapur	Robust Stability and Chaotic Behavior of a Periodic Compensated Time Delayed Inverted Pendulum 6-8 th June, 2018	A Chakraborty and J Dey
7	IEEE Sponsored 2019 5th International Conference For Convergence in Technology I2CT, Pune, India	Control of DC-DC CUK Converter by Fractional Order PI λ D μ Controller 29TH -31ST MARCH 2019	Duttatreya Roy Chowdhury, Jayati Dey
8	IEEE International Conference on Innovations in Power and Advanced Computing Technologies, i-PACT-2019, VIT, Vellore Power Coordination System between Multiple Sources in Electric Vehicle Application	Power Coordination System between Multiple Sources in Electric Vehicle Application 22 & 23 March, 2019	Sanchari Hajari, Rajarshi Saha and Jayati Dey
9	2 nd IEEE International Conference on Power, Energy, Environment and Intelligent Control	MPPT Based Hybrid Energy Storage System 18 th - 19 th Oct, 2019	Rajarshi Saha and Jayati Dey
10	16 th IEEE India Council International Conference, Rajkot, Gujarat	PV, Battery and Ultracapacitor based Hybrid Energy Storage System 13 th - 15 th Dec, 2019	Rajarshi Saha and Jayati Dey
11	CALCON 2020: 2020 IEEE CALCUTTA CONFERENCE	Optimization Algorithm Based PID Controller Design for a Magnetic Levitation System 28-29th February 2020	Soham Dey, Jayati Dey and Subrata Banerjee
12	CALCON 2020: 2020 IEEE CALCUTTA CONFERENCE	An Improved Buck-Boost Converter Suitable for PV Application 28-29th February 2020	Niraj Rana, Jayati Dey and Subrata Banerjee
13	IEEE 4th International Conference on Electronics, Materials Engineering & Nano-Technology (IEMENTech)	Design of optimal controller for TRMS based on reduced order state observer Kolkata, 2-4 Oct. 2020	Bidisha Bhattacharya, Jayati Dey, Sumit Kumar Pandey
14	2021 International Conference on Nascent Technologies in Engineering (ICNTE 2021)	FOPID Controller as Power System Stabilizer for SMIB under Different Loading Conditions Navi Mumbai, India, 15-16 Jan. 2021	Poulomi Chatterjee, Reetam Mondal, Jayati Dey
15	2020 IEEE-HYDCON	State of Charge Estimation of Lithium-Ion Battery Using State	P. S. Mannarayana, A.

		Augmented Cubature Kalman Filter in Presence of Uncharacterized Coloured Noise Hyderabad, India, 2020, pp. 1-6, doi: 10.1109/HYDCON48903.2020.9242680.	Dey and J. Dey
16	Michael Faraday IET International Summit (MFIIS)-2020	Compensation of SISO stable and unstable LTI plants with non-integer order Controllers , Oct 03-04, 2020	Swetaleena Guha, Maitreyee Banerjee, Jayati Dey and Reetam Mondal
17	Michael Faraday IET International Summit (MFIIS)-2020	Precision Modular DC Servo Motor Control with FO Controllers Oct 03-04, 2020	Maitreyee Banerjee, Swetaleena Guha, Jayati Dey and Reetam Mondal
18	Michael Faraday IET International Summit (MFIIS)-2020	Estimation of the State-of-Charge of Lithium-ion Battery using Adaptive State Augmented Cubature Kalman Filter in Presence of Uncharacterized Coloured Noise in the Measurement Oct 03-04, 2020	P. S. Mannarayana, A. Dey and J. Dey
19	2021 IEEE 4th International Conference on Computing, Power and Communication Technologies (GUCON)	Power Management and Control for PV-Battery- UC Standalone System 24-26 September 2021	Sonali Badpanda, Jayati Dey, Tapas kumar Saha
20	2021 IEEE 4th International Conference on Computing, Power and Communication Technologies (GUCON)	Design and Performance Analysis of Optimized Fractional Order PID Controller for Magnetic Levitation System 24-26 September 2021	Soham Dey, Subrata Banerjee, Jayati Dey
21	2021 IEEE 4th International Conference on Computing, Power and Communication Technologies (GUCON)	Power Management and Control for PV-Battery Standalone System 24-26 September 2021	Sonali Badpanda, Jayati Dey, Tapas kumar Saha
22	2021 IEEE 4th International Conference on Computing, Power and Communication Technologies (GUCON)	Modified Internal Model Control for Cart Inverted Pendulum System 24-26 September 2021	Sumit Kumar Pandey, Jayati Dey, and Subrata Banerjee
23	IEEE International Conference on Communication, Control and Information Sciences (ICCISc), 2021	Cascaded Fractional Order (FO) Compensation of Linear Time Invariant (LTI) Plants 16-18 th June, 2021	Reetam Mondal and Jayati Dey
24	2021 Third International Conference on Advanced Computational and Communication Paradigms (ICACCP), Advances in Intelligent Systems and Computing, 2021, Sikkim Manipal Institute of Technology	Decoupling & PID Control of Four Tank MIMO System Based on Kharitonov Theorem 22nd to 24th of March, 2021	Sumit Kumar Pandey, Jayati Dey

	(SMIT), Sikkim, India[Online]		
25	6th International Conference on Electronics, Materials Engineering and Nano-Technology (IEMENTech 2022), INSTITUTE OF ENGINEERING & MANAGEMENT (IEM), Gurukul Campus, Salt Lake, Sec V, Kolkata, India, 2nd-4th December, 2022	Stabilization and Control of Quadcopter	Kalyani Mamidi, Jayati Dey

BOOK CHAPTERS	
Sl. No.	Publication Details with DOI
1.	M. K. Sameer, Reetam Mondal and Jayati Dey, "Fractional Order (FO) Control of DC-DC Buck Boost Converter", Advances in Power and Control Engineering, Lecture Notes in Electrical Engineering, Springer, Vol. 609, 2019, pp.107-117. (Scopus), January 2020, DOI: 10.1007/978-981-15-0313-9_8
2.	Sumit Kumar Pandey, Jayati Dey, Subrata Banerjee, Generalized Decoupling and Robust Control of Unstable MIMO System, January 2020, DOI: 10.1007/978-981-15-0313-9_2, In book: Advances in Power and Control Engineering (pp.13-23), Lecture Notes in Electrical Engineering, Springer
3.	Sumit Kumar Pandey, Jayati Dey, Subrata Banerjee, Design of Optimal PID Controller for Control of Twin Rotor MIMO System (TRMS), January 2020, DOI: 10.1007/978-981-15-0313-9_7, Advances in Power and Control Engineering (pp.93-106), Lecture Notes in Electrical Engineering, Springer
4.	Reetam Mondal and Jayati Dey, FO 2-(DOF) Control of Non-commensurate Fractional Order (FO) Plants, Advances in Communication, Devices and Networking, Lecture Notes in Electrical Engineering, Springer, Vol. 662, 2020, pp.59-65. (Scopus), July 2020, DOI: 10.1007/978-981-15-4932-8_8
5.	Reetam Mondal and Jayati Dey, "Fractional Order Control of Unstable and Time-Delayed Linear Time Invariant (LTI) Plants", Lecture Notes in Electrical Engineering, Springer, Vol.662, 2020, pp.263-272, July 2020, DOI: 10.1007/978-981-15-4932-8_29
6.	Sumit Kumar Pandey, Jayati Dey, Subrata Banerjee, Discrete Decoupling and Control of Time-Delayed MIMO Systems, July 2020, DOI: 10.1007/978-981-15-4932-8_33, In book: Advances in Communication, Devices and Networking (pp.303-311), Lecture Notes in Electrical Engineering,
7.	Nayan Kumar, T. K. Saha, Jayati Dey, Power Electronics and Solar Panel: Solar Panel Design and Implementation, November 2020, DOI: 10.1002/9781119760801.ch5, In book: Green Energy (pp.141-164) Publisher: Wiley- Scrivener

8. Sponsored/Consultancy Projects undertaken:

Sponsoring Agency	Title of the Project	Period	Amount	Status (Completed/ongoing)
Department of Science and Technology (DST), Govt. of India	Control System Design using Periodic Feedback compensation: A Practical Implementation	2009-2012	13.6 Lakhs	Completed
National Institute of Wind Energy (NIWE) under Ministry of New And Renewable Energy (MNRE), Govt. of India	Control of multi Input Converter for Hybrid wind Solar battery based system	3 yrs duration, Date of start: 22 nd March, 2017	30.71 Lakhs	Completed
Defence Research Development Organisation	Improved Energy Management and Control of	3 yrs duration,	70.34 Lakhs	Ongoing

(DRDO), Govt. of India	a Hybrid UGV for Combat Use	Date of start: 13 th Nov, 2020		
Ministry of Electronics and Information Technology (MeitY), Government of India	Capacity building for human resource development in Unmanned Aircraft System (Drone and related Technology)	5 yrs Duration, Date of start: 7 th Nov, 2022	150.91 Lakhs	Ongoing
National Mission Project on Education through ICT (hosted by Indian Institute of Technology Kharagpur)	PEDAGOGY Project on Course Development of "Electromagnetic Theory & Applications"	2013-2017	7 Lakhs	Completed

9. Research Guidance:

PhD Thesis Supervised:

Sl.No	Name of Student	Year	Title of the Dissertation	Status (Completed/Ongoing)
1.	Arindam Chakraborty	2010 (Registration)	Some Aspects of periodic Compensation of Continuous-time plants	Completed, Degree awarded on 02.03.2017
2.	Nayan Kumar	2013 (Registration)	Modelling and Performance Analysis of Cascaded Two-Level Inverter Based Grid Connected and Stand-Alone Photovoltaic Systems	Completed, Degree awarded on 26.02.2018
3.	Sumit Kumar Pandey	2015 (Registration)	Development of Decoupling Technique & Robust Control Algorithm for MIMO Systems	Completed, Degree awarded on 05.06.2020
4.	Reetam Mandal	2016 (Registration)	Fractional Order Compensation of Continuous-time Plants	Completed, Degree awarded on 27.07.2020
5.	Dibyendu Sen	2018 (Registration)	Control of multi Input Converter for Hybrid wind Solar battery based system	Writing Thesis
6.	Soham Dey	2020 (Registration)	Design and Real Time Implementation of Controllers for Magnetic Levitation System using Optimal Control Theory	Writing Thesis
7.	Poulomi Chatterjee	2020 (Registration)	Performance Study, Stability Analysis and Control of Multi-Machine System with Fractional Order Compensation	Ongoing

M.Tech./Other PG Programme:

Sl.No.	Title of the Project	Name of supervisor(s)	Academic session
1	Speed Drive Of Electric Vehicle Powered By Multiple Energy Sources	JAYATI DEY	Sarvesh Kumar Yadav 18EE4202
2	Power Coordination System Between Multiple Sources In EV Application	JAYATI DEY	RAJARSHI SAHA (17/EE/4206)
3	Fractional Order Compensation For DC-DC Converters	JAYATI DEY	Morari Kinkar Sameer Kumar (17/EE/4214)
4	Induction Motor Driven Electric Vehicle Powered By Hybrid Energy Storage System	JAYATI DEY	SONALI BADPANDA 19EE4208
5	Power Coordination System Between Multiple Sources In Electric Vehicle Application	JAYATI DEY	Sanchari Hajari 16/EE/4210
6	Control of DC-DC Converters by Fractional Order Compensator	JAYATI DEY	Chinmay Chandan Sahoo

			(16/EE/4215)
7	Efficient Power Sharing Strategy For A Battery-Ultracapacitor Hybrid Energy System	JAYATI DEY	Duttatreya Roy Chowdhury (16/EE/4219)
8	Integral Action based Nonlinear High gain Observer for Sensorless control of Induction machine for Electric vehicle	TAPAS KUMAR SAHA & JAYATI DEY	SAMUDRA PANDA 18EE4210
9	PID & Sliding Mode Control of DC-DC Converter	JAYATI DEY	ABHISHEK ROHIT Roll No: 20EE4202
10	Stabilization and control of Quadcopter	JAYATI DEY	KALYANI MAMIDI Roll No: 20EE4216

UG Programme:

Sl. No.	Title of the Project/ Thesis	Names of the Students and Roll Nos.	Name(s) of other supervisor(s) (if any)
1.	Power management scheme for Hybrid Electric Vehicle with Battery and Ultracapacitor as two electrical sources of the vehicle	DEVIDAS PANDAY ROLL NO. 18EE8075	SOLE
2.	Path planning for unmanned ground vehicle for the purpose of surveillance in a defense application	KAPISH LUHARIWALA ROLL NO. 18EE8041	SOLE
3.	Plug in Hybrid Electric Vehicle Power Management	SOHAM SAMANTA ROLL NO. 18EE8066	SOLE
4.	Path planning of Unmanned Aerial Vehicle (UAV) by using Sliding Mode Control (SMC) Technique	SUJOY SANKAR GHOSH ROLL NO. 18EE8015	SOLE
5.	Mathematical Modelling And Stability Analysis Of DC Generator	Devara Tejkamal 17EE8055	SOLE
6.	Fractional Order Controller and its Design for the Control of a Cart-Inverted Pendulum System and a Magnetic Levitation System	Ankit Mitra 17EE8026	SOLE
7.	PID Controller Application On Power System Stabilization	V NETHAJI GOUD 16EE8065	SOLE
8.	A Study On Impact Of EV Charging Stations On The Power Grid	Soumik Paul 17EE8074	SOLE
9.	Wireless Power Transmission	Tabish Shakeel 16EE8004	SOLE
10.	CLOSED LOOP SPEED CONTROL OF DC MOTOR USING FOUR QUADRANT CHOPPER	Rehnab Khan 16EE8031	SOLE
11.	State Space Model for Magnetic Levitation System and Control Design using Pole Placement	SHASHANK KUMAR 16EE8017, MANISH KUMAR MAHATO 16EE8007	SOLE
12.	Design of Fractional Order Digital Filter	Shadab Alam (15/EE/20), Saidullah Hakimi (15/EE/88)	SOLE
13.	Model Predictive Control of a Quadrupled Tank System	Preeti Verma (15/EE/77), Shristy Kumari (15/EE/78)	SOLE
14.	Design and Implementation of an Extended Kalman Filter for the State Estimation of a Permanent magnet Synchronous Motor (PMSM)	Sneha Saha (15/EE/23), Tushar Kanti Mandal (15/EE/29)	SOLE

10. Paper Presented in Conference/Seminar and Workshop attended (India & Abroad) etc. (for Academic sessions 2019-2020, 2020-2021, 2021-2022)

Sl.No.	Activities	Year
1	Research Paper Presenter at 5th National Innovators-Industry Meet-2021 on Theme "Technological Innovations in Electronics & Related Fields for Aerospace and Defence Production" Towards Atmanirbhar Bharat organised by The Institution of Electronics and Telecommunication Engineers (IETE) (Recognised as SIRO by DSIR, Govt. of India)	26th & 27th August, 2021
2	Research Paper Presenter at 16 th IEEE India Council International Conference (INDICON 2019) organized by IEEE Gujarat Section from 13 - 15 December 2019, at Marwadi University, Rajkot (GUJARAT)	13 - 15 December, 2019
3	Research Paper Presenter at 6th International Conference on Electronics, Materials Engineering and Nano-Technology (IEMENTech 2022), IEM, Gurukul Campus, Salt Lake, Sec V, Kolkata, India	2nd-4th December, 2022

Sl. No.	Particulars	Date	Remarks
1	Best Paper Award for "Optimization Algorithm Based PID Controller Design for a Magnetic Levitation System", Soham Dey, Jayati Dey and Subrata Banerjee	28-29th February 2020	CALCON 2020: 2020 IEEE CALCUTTA CONFERENCE
2	Best Paper Award for "Design of optimal controller for TRMS based on reduced order state observer", Bidisha Bhattacharya, Jayati Dey, Sumit Kumar Pandey	2nd - 4th Oct, 2020	IEEE 4th International Conference on Electronics, Materials Engineering & Nano-Technology (IEMENTech), Kolkata
3	Best Paper Award for "MPPT Based Hybrid Energy Storage System" by Rajarshi Saha and Jayati Dey	18 th -19 th Oct, 2019	IEEE International Conference on "Power, Energy and Intelligent Control PEEIC-2019"

11. Details of the Invited Talks delivered

Sl. No.	Type of the talk (Invited talk/ Keynote talk/etc.)	Title of The Talk	Name of the Event	Event Organized by	Date of the event
1.	Invited Lecture	Application of MATLAB in Control System Design and Analysis	TEQIP III sponsored one day seminar	Dumka Engineering College under Techno India	31.01.2019
2.	Expert talk	Fractional order compensation	One Week AICTE sponsored Short Term Training Programme on "Fractional Order Robust Control System Design (Series-I)"	Vardhaman College Of Engineering, Hyderabad	28.10.2020
3.	Guest speaker	Control System	5 days lecture series on "Control System"	Chaibasa Engineering College, Jharkhand, under Techno India	22.09. 2020-26.09.2020
4.	Speaker	Control	One Day Webinar	Department of	09.06.2020

		system	on "Control System Engineering"	Electrical Engineering, Dr. B. C. Roy Polytechnic, Durgapur	
5.	Resource Person	Robust Compensation of Continuous Time Plants	One Week Faculty Development Programme on "Modern Trends In Electrical Engineering"	Department of Electrical Engineering, Dr. B. C. Roy Polytechnic, Durgapur	24.06.2020
6.	Invited Speaker	On Decoupling Control of MIMO Systems	Online Faculty Development Programme (FDP) on "Emerging Trends In Different Fields Of Electrical Engineering"	Electrical Engineering Department, DR. B. C. Roy Engineering College, Durgapur, West Bengal	15.06.2022

12. Teaching Engagements

Sl. No.	Level (U.G./P.G.)	Course Title & Code (both theory and laboratory)	No. of Students	Names of other faculty members sharing the course (if any)	Weekly		
					L	T	P
1.	UG	MODERN CONTROL SYSTEM EEE612	38	NIL	3	0	0
2.	UG	CONTROL SYSTEMS EEC502	99	Prof. S. Banerjee	3	1	0
3.	PG	ADVANCED CONTROL SYSTEM I EE1013	10	NIL	3	1	0
3.	PG	ADVANCED CONTROL SYSTEM I EE1022	08	NIL	3	1	0
4.	PG	ADVANCED CONTROL SYSTEMS EE2013	08	Dr. Aritro Dey	3	1	0
5.	UG	CONTROL SYSTEM LABORATORY EES481	100	Dr. Aritro Dey	0	0	3
6.	PG	ADVANCED CONTROL SYSTEM LABORATORY EE2062	19	Prof. S. Banerjee, Dr. Aritro Dey	0	0	3
6.	PG	ADVANCED CONTROL SYSTEM LABORATORY EE2071	08	Prof. S. Banerjee, Dr. Aritro Dey	0	0	3
7.	UG	ELECTRICAL TECHNOLOGY LABORATORY EES51	50	Dr. Soumya Chatterjee, Dr. Santanu paul	0	0	2
8.	UG	CONTROL SYSTEM LABORATORY EES551	99	Prof. S. Banerjee, Dr. Aritro Dey, Dr. Manika Saha	0	0	6

13. Fellow/ Membership of Professional Societies or Bodies

Sl. No.	Name of the Professional Body	Membership No. With Validity
1.	IEEE PROFESSIONAL MEMBERSHIP, IEEE CONTROL SYSTEM MEMBERSHIP & IEEE INDUSTRIAL ELECTRONICS MEMBERSHIP	90380417 (1ST JAN, 2022 – 31ST DEC, 2023)
2.	SENIOR MEMBER IEEE	29 th APRIL 2022- to Till date

14. Other Activities (not included in the above)

1. Reviewer of IEEE Transactions on Industrial Electronics
2. Reviewer of ISA Transactions
3. Reviewer of IETE Journal of Research
4. Published an article "SMC for Control of UAVs" in IEEE Transportation Electrification Community eNewsletter

15. Administrative Responsibility in the Institute

Sl. No.	Section/office/ Institute level committee	From	To	Position held	Responsibilities
1.	Office of Warden Council	9 th Nov, 2016	21 July, 2019	Warden, Hall 7	Maintaining proper arrangement for foods in mess, cleanliness of hall, hospitality and security arrangement for the students, preventing ragging etc.
2.	Office of Warden Council	22 July, 2019	22 Nov, 2022	Associate Chief Warden	Coordination of the work amongst the wardens, Maintaining proper arrangement for foods in mess, cleanliness of hall, providing arrangement for health care, hospitality and security arrangement for the students, preventing ragging etc.
3.	Departmental Post Graduate academic Committee for PhD	4 th Dec, 2013	Till date	Coordinator	Coordination of PhD Selection Procedure, Doctoral Scrutiny Committee, Arrangement of Registration, Enhancement, Synopsis & Defence Seminars etc.
4.	Departmental Academic Committee	25 th Jan, 2007	Till date	Member	Syllabus preparation, Scrutiny of the Question papers, Decision Making before declaration of Semester Result
8.	Departmental Scrutiny Committee for faculty Selection	8 th August, 2019	Till Date	Convener	Scrutiny of the Application form, Conduct Seminar, Finalization of the list of the screened candidates
9.	Introduction of New Post Graduate Course on Instrumentation & Control at EE Department	5 th March, 2020	July, 2021	Convener	Preparation of Curriculum of the proposed course and Syllabus of the subjects
10	Board of Governors of NIT Durgapur	1 st April, 2021	Till date	Senate Nominee	Faculty Representative of NIT Durgapur at Board of Governors
11	Departmental Post Graduate academic Committee for PhD	4 th Dec, 2013	June, 2022	Coordinator	Coordination of PhD Selection Procedure, Doctoral Scrutiny Committee, Arrangement of Registration, Enhancement, Synopsis & Defence Seminars etc.
12	Office of Warden Council	26/09/2022	11/11/2022	Convener	Committee for Inspecting "Feasibility and Future Aspect of Wi-fi as proposed by BSNL"
13	Office of Election Commission for Student Gymkhana	18/10/2022		Observer	Overall Supervision for smooth conduct of poll in Hostel No. 10 and 13

Jayati Dey

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