

Dr. Satyaranjan Jena
Assistant profesor -II

[E-mail-snjenafel@kiit.ac.in](mailto:snjenafel@kiit.ac.in)

Contact No-9437239362



Academic Background:

- Ph.D in Electrical Engineering from KIIT University, Bhubaneswar , Odisha
- M.Tech in Power Control and Drives from National Institute of Technology, Rourkela .
- B.E. in electrical from Bhadrak institute of engineering & technology under BPUT .
- Diploma in electrical from Barapada school of engineering & technology under S.C.T.E &V.T, Orissa
- +2Sc from Betnoti College Betnoti under C.H.S.E Orissa
- H.S.C from M.P.C high school Betnoti under B.S.E Orissa.

Professional Career :(10 years of teaching experience)

- Working as a Assistant Professor in the Department of EE ,KIIT university From June- 2012 to till date
- Working as an Assistant Professor in the Department of EEE ,HIT From June- 2011 to June 2012
- Working as a Senior Lecturer in the Department of EEE ,RIT From August- 2004 to July 2009

M.Tech thesis Guidance

Sl No	Title of the Thesis	Name of the Scholar	Year of award
1.	A Comparative Evaluation Between Different Current Controllers for Single Phase Grid Connected Inveter	Sthitaprajna Rath (1158011)	2013
2.	Modelling And Control of 3-Phase Permanent Magnet Synchronous Generator Based Micro Hydro Power Plant	Sudhir Mallapati (1258028)	2014
3.	Integration Control Technique for Inverter Interfaced Renewable Energy Sytem to Utility grid	Jyoti Prakash Maharana (1252012)	2014
4.	Analysis of Different Current Control Techniques For Single Phase Grid Integrated Renewables	Pratik Ranjan Behera (1358012)	2015
5.	Design Of Pitch-Controlled Variable Speed Wind Turbine With Permanent Magnet Synchronous Generator	Souraj Rakshit (1358020)	2015
6.	Implementation and Analysis of Different Hysteresis Current Controller for Grid Connected Pulse Width Modulated Voltage Source Inverter	Bhabasis Mohapatra (1458008)	2016

5. Professional Affiliation:

- Member of Institute of Electrical and Electronics Engineers (IEEE)
- Member of Institution of Engineering and Technology (IET)
- Life Member Indian Science Congress (ISC)
- Life Member of Indian Society for Technical Education (ISTE)
- Life Member of Indian Society of lighting Engineers (isle)
- Member of The Institute of Engineers (India)
- Member of International Association of Engineers (IAENG)

Trainings, workshop Attended

1. Attended NSTEDB and DST Sponsored Faculty Development programme on “Entrepreneurship” Organized by KIIT Technology Business Incubator (KIIT-TBI), KIIT University, Bhubaneswar, from 3rd October to 19th October, 2016.
2. Attended TEQIP Sponsored Faculty Development programme on “Electrical Power Distribution Management” Organized by College of Engineering at Technology, Bhubaneswar, from 20th September to 24th September, 2016.
3. Attended Faculty Development programme on “LabVIEW in Electrical Engineering and Smart Grid Technologies” Organized by National Instrument India in KIIT university’ Bhubaneswar from 27th June to 30th June, 2016.
4. Attended Short term training programme on “Advances process control and instrumentation” Organized by National Institute of Technical Teachers’ Training and research, Kolkata from 13th June-17th June, 2016.
5. Attended QIP Sponsored Short term course on “Impacts of Climate Change, Urbanization and Land-Use-Land-Cover Change on Water Resource” Organized by Centre for Environmental Science and Engineering & Department of Civil Engineering, Indian Institute of Technology Bombay, Powai. Mumbai from 30th May to 3 June 2016.
6. Attended QIP Sponsored Short term course on “Make in India: Innovative Product Design” Organized by Department of Mechanical Engineering, I.I.T. Delhi from 14-18 December, 2015.
7. Attended QIP Sponsored Short term course on “Advances in Solar Energy Technologies” Organized by centre for energy studies, I.I.T. Delhi from 9-15 December, 2014.
8. Attended QIP Sponsored Short term course on “Applied Game Theory for Engineers and Managers” Organized by Department of Humanities & Social Sciences, and Department of Electrical Engineering I.I.T. Kanpur from 20-24 June, 2014.
9. Attended TEQIP-II Sponsored “National Seminar on Grid Management” from 30th January 2014 to 1st February 2014, which would be held at CET, Bhubaneswar.
10. Attended QIP Sponsored Short term course on “Application of renewable energy sources” Organized by centre for energy studies, I.I.T. Delhi from 11-17 December, 2013.

11. Completed Successfully the specialized training on “ frontier of lighting and human factors ” Organized by Indian society of lighting engineers, Calcutta state centre, Kolkata & local centre Bhubaneswar & school of electrical engineering KIIT university Bhubaneswar from 21st October to 4th November,2013
12. Attended AICTE sponsored Staff Development Programme On “Non-Conventional Energy Sources and Direct Energy Conversion Systems” Organized by By Roland Institute Of Technology, Berhampur from 17.06.2009 To 01.07.2009.
13. Attended AICTE sponsored Faculty Development Programme on “ Application of Power Electronics to Emerging Trend in Power sector held from june 30th to july 5th 2008 at NIST Berhampur
14. Attended AICTE Sponsored Faculty Development Programme on “Modeling, Simulation & Optimization Technique in Science & Engineering Organized by NIST, Berhampur Orissa from 2nd july-14th July 2007.
15. Attended AICTE Sponsored Faculty Development Programme on “ Recent Trends & Application in Power electronics and Drives” Organized by Department of Electrical Engineering UCE Burla during June 19-july1,2006
16. Attended AICTE Sponsored Faculty Development Programme on “ Modern Optimization Technique in Power system ” Organized by Department of Electrical Engineering UCE Burla during 19-31 December,200

Conferences (International & National) Attended/Award Received

- Attended and presented paper in International Conference on Signal processing, Communication, Power and Embedded System (SCOPEs) Organized by Centurion University of Technology and Management, Paralakkhemundi, odisha during 3rd to 5th October 2016.
- First position in the poster presentation held during “National Science Day” celebration on 27th - 28th February, 2016 at KIIT University.
- Attended and presented paper in IEEE Students’ Technical Symposium Organized by IEEE Student Branch, IIT Khargpur Section during January 14-16, 2011.
- Attended and paper presented in 2011 International Conference on Process Automation, Control and Computing (PACC), Organized by CIT, Coimbatore from 20-22 July 2011.
- Attended and paper presented Attended and presented paper in 2011 International Conference on Process Automation, Control and Computing (PACC India Conference (INDICON), Organized by IEEE section Hyderabad, from 16-18 Dec. 2011.
- Presented paper in International Conference on. “Environment and Electrical Engineering” co-sponsored by IEEE and IEEE-PES. Rome, Italy, 8-11 May 2011

Administrative Experience:

- Coordinator & Trainer of “Solar PV Technician training” sponsored DDU-GKY.
- Coordinator & Trainer of “maintenance of pumps, Generators training” sponsored by Ministry of Drinking Water and Sanitation.
- Deputy Superintendent Hostel
- Prof. In charge School level Compliance Cell.
- Member of School level UGC Accreditation team of School of Electrical Engineering, KIIT University
- Member of School level NBA Team of School of Electrical Engineering, KIIT University.
- Member of School level IET Accreditation team of School of Electrical Engineering, KIIT University.
- Member of School level NAAC Accreditation team of School of Electrical Engineering, KIIT University.
- Invited Member of Board of studies of School of Electrical Engineering, KIIT University.
- HOD, Department of EEE, HIT From June 2011 to June 2012.
- Co-Convenor of AICTE Staff development programme on Non conventional energy resources from 17th June to 1st July 2009.
- Convenor ISTE sponsored technical Symposium UTKARSH in RIT
- In charge of NSS
- In charge of Literary & Cultural activities, RIT Berhampur
- In Charge of Department of EEE In RIT From 2007 to 2009
- In charge of Examination Section RIT from 2005 to 2007

Reviewer & Committee Member of International Conferences:

- Reviewer of the technical program committee for International Conference on Education (ICOED'15)
- Reviewer of the technical program committee for the 2015 IEEE 7th International Conference on Engineering Education (ICEED2015).
- Reviewer on the technical program committee for the 2014 IEEE 6th International Conference on Engineering Education (ICEED2014).
- Reviewer on the technical program committee for International Conference of Francophone Engineers and Technicians (CITEF 2014).
- Reviewer on the technical program committee for 5th International Conference on Intelligent and Advanced Systems, 2014 (ICIAS2014)
- Reviewer on the technical program committee for the 2014 IEEE Innovative Smart Grid Technologies Conference - Asia (ISGT ASIA) (ISGT14).
- Reviewer on the technical program committee for the 2013 IEEE 5th International Conference on Engineering Education (ICEED2013).
- Reviewer of the 2013 IEEE International Conference on Clean Energy & Technologies (CEAT 2013).
- Programme committee member of EEEIC-2012(As a reviewer for IEEE Sponsored International Conference on Environment and Electrical Engineering).

- Reviewer and member of the technical program committee for PECON 2012 (2012 IEEE International Power and Energy Conference)
- Programme committee member of EEEIC-2012(As a reviewer for IEEE Sponsored International Conference on Environment and Electrical Engineering).
- Technical Committee Member of 3rd International Conference on Computer Technology and Development (ICCTD 2011) www.icctd.org Chengdu, China. November 25-27, 2011.

Invited Talks Delivered (National & International)

- Delivered talk on “Renewable Energy Scenario of India, Solar Energy and its application, Integration of PV System to Utility Grid “as MEVLANA instructor under MEVLANA Exchange Programme at Dumulpinar University, Kutahya, Turkey from 30.03.2015 to 05.04.2015.
- As a resource person for the national seminar on “Recent Advances in Electrical Energy System” at Kalam Institute of technology(KIT) Berhampur on 3rd march 2015.
- Invited talk on “Distributed generation systems: Energy Security, Global Warming and Sustainable Climate” at Institute of Textile Technology, Choudwar, Cuttack on 02.06.14.
- Invited talk on “Distributed generation systems: A new Paradigm for sustainable Energy” at Institute of Textile Technology, Choudwar, Cuttack on 30.08.13.

Publications

A. Journal:

1. **S.Jena** and C.K.Panigrahi “Power Quality Improvement of Single Phase Grid Connected Voltage Source Inverter Using Modified Hysteresis Current Controller along with Proportional Integral Controller”, Journal of the Institution of Engineers (India): Series B (Under Review).
2. **S.Jena** and C.K.Panigrahi ,“ Harmonic Reduction of Single Phase Grid Connected Pulse Width Modulated Voltage Source Inverter using different Hysteresis Current Controllers”, International Journal of Ambient Energy, Taylor & Francis(Under Review).
3. B.Mohapatra, **S.Jena**, C.K.Panigrahi ,“ Comparative Study between Hysteresis Current Controller, Modified Hysteresis Current Controller and Hysteresis Current Controller with Offset Band for 1- Grid Integrated PWM-VSI ”, Special Issue on International Journal on Advanced Electrical and Computer Engineering (IJAECE) Vol-3, Issue-1 Pp 41-49,2016.
4. C.K.Panigrahi, **Satyaranjan Jean** et.al. “Application of Fuzzy Logic for the Performance Improvement of Single-Phase Grid-Connected PWM Inverter” International Electrical Engineering Journal (IEEJ) Vol. 3 (2012) No. 3, pp. 827-831 ISSN2078-2365.

B. Conference Paper Published (IEEE):

1. **S. Jena**, C. K. Panigrahi ,S. Sahoo and S. Behera “Current harmonics Reduction of Three Phase Grid Connected Pulse Width Modulated Voltage Source Inverter by Hysteresis Current Controller with Offset Band ” 2016 IEEE Seventh India International Conference on Power Electronics (IICPE-2016) .(Accepted and Presented)
2. **S. Jena**, S. Sahoo and C. K. Panigrahi “Interconnection of Renewables to the Utility Grid by three Phase Pulse Width Modulated Voltage Source Inverter without Phase Locked Loop”International conference on Signal Processing, Communication, Power and Embedded System (SCOPEs)-2016(Accepted & Presented,IEEE).
3. **S. Jena**, B. Mohapatra, C. K. Panigrahi and S. K. Mohanty, "Power quality improvement of 1- grid integrated pulse width modulated voltage source inverter using hysteresis Current Controller with offset band," 2016 3rd International Conference on Advanced Computing and Communication Systems (ICACCS), Coimbatore, pp. 1-7,2016(IEEE).
4. **S. Jena**, B. Mohapatra and C. K. Panigrahi, "Realization of double band hysteresis current controller for single phase grid connected pulse width modulated voltage source inverter," 2015 International Conference on Man and Machine Interfacing (MAMI), Bhubaneswar, India, 2015, pp. 1-6 (IEEE).
5. **S. Jena**, P.R. Behera andC. K. Panigrahi, "Modified hysteresis current-controlled PWM strategy for Single phase grid connected inverters," 2015 IEEE Power, Communication and Information Technology Conference (PCITC), Bhubaneswar, 2015, pp. 930-934(IEEE).
6. **Jena, Satyaranjan**; Babu, B. Chitti; Mishra, Gokulananda; Naik, Amiya Ku.; , "Reactive power compensation in inverter-interfaced distributed generation," Energy, Automation, and Signal (ICEAS), 2011 International Conference on , vol., no., pp.1-6, 28-30 Dec. 2011.
7. **Jena, Satyaranjan**; Babu, B. Chitti; Naik, Amiya Kumar; Mishra, Gokulananda; , "Performance improvement of single-phase grid — Connected PWM inverter using PI with hysteresis current controller," Energy, Automation, and Signal (ICEAS), 2011 International Conference on , vol., no., pp.1-5, 28-30 Dec. 2011.
8. **Jena, S.**; Babu, B.C.; Sahu, L.; , "Experimental study on adaptive hysteresis current controller for inverter-interfaced 1- grid connected system," *India Conference (INDICON), 2011 Annual IEEE* , vol., no., pp.1-6, 16-18 Dec. 2011.
9. **Satyaranjan, J.**; Babu, B.C.; Kumar, N.A.; Neeraja, D.; , "Fuzzy Logic Based-SVPWM Current Controller for Inverter-Interfaced Distributed Generation System," *Process Automation, Control and Computing (PACC), 2011 International Conference on* , vol., no., pp.1-6, 20-22 July 2011.
10. **Jena, Satyaranjan**; Babu, B. Chitti; Naik, Amiya; , "Experimental study on reactive power management in inverter-interfaced distributed generation system," *Sustainable Energy and Intelligent Systems (SEISCON 2011), International Conference on* , vol., no., pp.80-85, 20-22 July 2011.
11. **Jena, S.**; Babu, B.C.; , "Power quality improvement of 1- grid-connected PWM inverter using fuzzy with hysteresis current controller," *Environment and Electrical Engineering (EEEIC), 2011 10th International Conference on* , vol., no., pp.1-4, 8-11 May 2011.

12. **Jena, Satyaranjan**; Chitti Babu, B.; Samantaray, S. R.; Mohapatra, Mohamayee; , "Comparative study between adaptive hysteresis and SVPWM current control for grid-connected inverter system," Students' Technology Symposium (TechSym),2011 IEEE, vol., no., pp.310-315, 14-16 Jan. 2011.
13. Chitti Babu, B.; Mohapatra, M.; **Jena, S.**; Naik, A.; , "Dynamic performance of adaptive hysteresis current controller for mains-connected inverter system," International Conference on Industrial Electronics, Control & Robotics (IECR), 2010, vol., no., pp.95-100, 27-29 Dec. 2010.

Subjects taught:

A. B.Tech Programme

Basic Electrical Engg.
Network Theory
Electrical Machine-I
Electric Drives & Traction
Power Station Engineering
Electrical Mesurment and Instrument
Digital Electronics
Power Electronics
Electrical Machine-II
Renewable Energy System

B. M.Tech Programme

Enviormental Impact Analysis
Advance Renewable Energy System
Electrical Energy System and Managment
Energy System Lab-I
Energy System Lab-II