

## FACULTY PROFILE

**Name** : **Dr. Rajani S. Pujar**



**Designation** : **Assistant Professor**  
**Department** : **Electronics and Communication Engineering**  
**Employee ID** : **1-462384609**  
**E mail ID** : **rspec@becbkgk.edu, rajanisaachi@gmail.com**  
(College official ID),  
(Personal mail ID)

**Contact details** : **Dr. Rajani S. Pujar**  
**“Samruddhi”, Plot No. 69**  
**9<sup>th</sup> Cross, 2<sup>nd</sup> Main Road**  
**Sector No. 57, Navanagar**  
**Bagalkot-587102, Karnataka**  
**M. No. 9980185099**

**Orcid ID** : 0000-0003-2885-7121  
**Scopus ID** : 57201896205  
**Vidwan Id** : 125031  
**Researcher ID (Web of Science)** : AAH-8596-2021  
**Google Scholar ID** : ieYrPBkAAAAJ

**Qualification** : B.E., M.Tech., Ph.D.

**Professional Experience**  
**Teaching experience** : 16 Years

**Administrative Responsibilities** :  
1) Department BoE Coordinator (Since 2019)  
2) BEC-IDEA Laboratory Member (ACTE Sponsored)  
3) Communication Laboratory In charge

**Teaching** : Optical Communication and Networks  
Wireless Networks  
Error Control Codes

**No. of Projects Guided**

UG : 14

PG : 04

- Research Interest Area** : 1) Speech Processing  
2) Wireless Networks
- Journals (with citations)** : 1) Rajani S. Pujar, P. N. Kulkarni, “Wiener Filter Based Noise Reduction Algorithm with Perceptual Post Filtering for Hearing Aids”, *International Journal of Image, Graphics and Signal Processing (IJIGSP)*, pp. 69-81, Vol. 11, No. 7, 2019
- Conferences** : 1) Rajani S. Pujar, P. N. Kulkarni, “Cascaded Structure of Noise Reduction and Multiband Frequency Compression of Speech Signal to improve Speech Perception of Monaural Hearing Aids”, *Proc. 16<sup>th</sup> IEEE India Council International Conference (INDICON 2019)*, Gujarat, 13<sup>th</sup> – 15<sup>th</sup> December 2019
- 2) Rajani S. Pujar, P. N. Kulkarni, “Cascaded Structure of Wiener Filter with FBS Based Spectral Splitting and Dynamic Range Compression for Listeners with Sensorineural Hearing Loss”, *Proc. 15<sup>th</sup> IEEE India Council International Conference (INDICON 2018)*, Amrita Vishwa Vidyapeetham, Coimbatore, 16<sup>th</sup> to 18<sup>th</sup> December 2018
- 3) Rajani S. Pujar, P. N. Kulkarni, “Effect of Noise Reduction Algorithms on Temporal Splitting of Speech Signal to Improve Speech Perception for Binaural Hearing Aids”, *Proc. 13<sup>th</sup> Western Pacific Conference on Acoustics (WESPAC-2018)*, CSIR-NPL, New Delhi, 11<sup>th</sup> – 15<sup>th</sup> November 2018
- 4) Rajani S. Pujar, P. N. Kulkarni, “Frequency Compression of Speech for Improving Speech Perception in Sensorineural Hearing loss: FBS Approach”, *Proc. International Conference on Wireless Communications, Signal Processing and Networking (WiSPNET 2017)*, March 22-24, 2017, SSN College of Engineering, Chennai, India
- 5) S. S. Manvi, G. K. Chandrayya, J. D. Mallapur, R. S. Pujar, “A multimedia synchronization scheme for mobile wireless networks”, *Proc. National Conference on Emerging trends in Electronics and Communication Engg.*, pp. 01-04, Padre Conceição College of Engineering, Verna, Goa, 14-15<sup>th</sup> Sept. 2006
- 6) R. S. Pujar, S. S. Manvi, “An agent-based web services in virtual organizations”, *Proc. National Conference on Emerging trends in Electronics and Communication Engg.*, pp. 274-278, Padre Conceição College of Engineering, Verna, Goa, 14-15<sup>th</sup> Sept. 2006
- 7) R. S. Pujar, S. S. Manvi, “Multi-agent system based online shopping model for virtual organization”, *Proc. World Science Congress Conference*, Los Veagas, USA

### **Invited Talks**

- : 1) Invited talks presented and handled lab sessions at faculty development programme, “Computer Network Simulation (CNS-08)” Feb 21-23, 2008, at Basaveshwar Engineering College, Bagalkot – 587102
- 2) Invited talk presented and handled lab sessions at Short term training programme, “Internet Protocols” at Basaveshwar Engineering College, Bagalkot - 587102 on “Communication Networks; Overview” August 21-26, 2006
- 3) Invited talks presented at Short Term Training Programme on “Data Communication and Networks”, B.V.V.S. Polytechnic, Bagalkot-587101, 2<sup>nd</sup> to 6th January 2006

### **Events Organized**

- : 1) Organized talk on “COVID-19 Disease in children –What Parents Need to Know?” by Dr. Raghavendra Vanaki , Professor, Department of Pediatrics, S. N. Medical College& HSK Hospital, Bagalkot On 24-05-2021
- 2) Organized talks on “Women Empowerment – Lessons Learnt from Kerala” by Dr. Leyanna S. George, Amruta Institute of Medical Science, Cochin, Kerala and “Women Autonomy in Health Care Decision Making” by Dr. Ayesha S. Nawaz, Piramal Swasthya Management and Research, Hyderabad were organized on 12.12.2020 under Equity Action Plan of TEQIP-III.
- 3) Coordinator for TEQIP-III Sponsored EAP on “Attitudinal Change and Team Building” and “Interview Techniques and Mock Interview” at BEC, Bagalkot on 5<sup>th</sup> April 2019 by Bhuvaneshwari I.Shurpali, freelance trainer , Pune

### **Conferences/ Symposiums/ Workshops/ Training Programs Attended**

- : 1) AICTE approved FDP course on “Computer Networks and Internet Protocol (SWAYAM)” conducted by Prof. SoumyaKanti Ghosh and Prof. Sandip Chakraborty, IIT Kharagpur, 27January 2020 - 17 April 2020
- 2) AICTE approved online FDP course on “Introduction to Internet of Things (SWAYAM)” conducted by Sudip Misra, IIT Kharagpur, 14 September 2020 - 04 December 2020
- 3) AICTE Training and Learning (ATAL) FDP on “Cyber Security” organized by National Institute of Technology, Nagaland,October19-23, 2020
- 4) Online FDP on “Research Aspects in Modern Analytics and Cyber Security” Conducted by Jaypee Institute of Information Technology, Noida, July 20-24, 2020
- 5) Online FDP on “Six Sigma”, BEC Bagalkot, 6 - 10 July 2020
- 6) E – Workshop on “Awareness and Prevention of Sexual Harassment at Workplaces”, organized by BEC, Bagalkot, June 27, 2020

- 7) AICTE Training and Learning (ATAL) FDP on, “Block Chain”, organized by National Institute of Technology, Nagaland, June 22- 26, 2020
- 8) Online Webinar series on “Recent Trends in Electronics and Communication Engineering” BEC, Bagalkot, June 11-12, 2020
- 9) Virtual FDP on “Neural Networks and Deep Learning using Python”, organized by REVA University, Bangalore, June 1-5,2020
- 10) Online International FDP on “Innovative Trends in Engineering and Technology, organized by SLRT College of Engineering Thane, Mumbai, May 25-29, 2020
- 11) Online FDP on “Research, Funding Projects and IPR”, organized by K. C. College of Engineering and Management Studies and Research, Thane, Mumbai, May 7-10, 2020
- 12) FDP on “Digital Transformation in Teaching Learning Process” (SWAYAM) conducted by IIT Mumbai, April 6-22, 2020
- 13) Workshop on “AICTE Examination Reform Policy”, BEC Bagalkot, February 14-15, 2020
- 14) NPTEL Workshop, BEC Bagalkot, November 29, 2019
- 15) Workshop on “Sensor Networks”, BEC Bagalkot, January 08-09, 2018
- 16) International Conference on Wireless Communications, Signal Processing and Networking (WiSPNET 2017), at SSN College of Engineering, Chennai, India, March 22-24, 2017
- 17) Faculty Development Programme on “Recent Advances in Signal Processing and Communication Networks”, at Basaveshwar Engineering College, Bagalkot, 17th – 19th March, 2017
- 18) International symposium on “Green Technologies for Sustainable Development”, BEC Bagalkot, January 24-25, 2017
- 19) One day workshop on “Research Methodology” organized by Basaveshwar Engineering College, Bagalkot on 19/12/2015
- 20) One day workshop on “Outcome Based Education” organized by Basaveshwar Engineering College, Bagalkot on 18/12/2015
- 21) Workshop on Image and Speech Processing, at Indian Institute of Technology, Guwahati, December 13-14, 2013
- 22) Workshop on “Quality Enhancement in Engineering Education (QEEE) at Indian Institute of Technology, Chennai, December 6-7, 2013
- 23) FDP on “Soft Computing and Evolutionary Techniques” May 30 – June 1, 2013, BEC Bagalkot

- 24) Three days faculty development programme on “Computer Network Simulation (CNS-08)”, at Basaveshwar Engineering College, Bagalkot, February 21-23, 2008
- 25) Faculty development programme on “Real Time Operating System”, at Basaveshwar Engineering College, Bagalkot, Mar 26-31, 2007
- 26) Faculty development programme on “Advanced Microcontroller”, at Basaveshwar Engineering College, Bagalkot, Feb 15-17, 2007
- 27) Faculty development programme on “Embedded Systems”, at Basaveshwar Engineering College, Bagalkot, Feb 05-10, 2007
- 28) Faculty development programme on “Digital Signal Processor and its applications”, at Basaveshwar Engineering College, Bagalkot, Sep 25-30, 2006
- 29) State level post graduate technical symposium (PRAGATI-06), at B. V. Bhoomaraddi College of Engineering and Technology, Hubli, Sep 09, 2006
- 30) Short-term training programme on “Internet Protocols” at Basaveshwar Engineering College, Bagalkot, Aug 21-26, 2006
- 31) Faculty development programme on “C# & .NET”, at Basaveshwar Engineering College, Bagalkot, June 01-06, 2006
- 32) Short term course on “Instructional Design and Delivery”, at Basaveshwar Engineering College, Bagalkot – 587102, Aug. 08 -13, 2005
- 33) National level seminar on “Recent Trends in Computer Communications and Networking”, at Basaveshwar Engineering College, Bagalkot-587102, Mar. 15-16, 2005
- 34) Short Term Training Programme on “Semiconductor Physics and VLSI Design “, at Basaveshwar Engineering College, Bagalkot -587102, Feb. 07-19, 2005