# **FACULTY PROFILE**

### K. RUSHENDRABABU

Department: Electronics and Communication Engineering

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#### **Address for Communication**

K. Rushendrababu s/o K.Durga, H.No: 21-5-4, Bhavana Rushi Pet, Beside Suresh Mahal, Chirala, Prakasam District Andhra Pradesh: 523155

## **Academic Qualifications**

S. No	Name of the Degree	University	Percentage of Marks/Grade	Specialization	Year of Pass
1	M.E	Anna University	72	Communication Systems	2009
2	B.E	Anna University	73	E.C.E	2005
3	Intermediate	Board of Higher Education	84.1	M.P.C	2001
4	SSC	Board of Secondary Education	68	-	1999

### **Professional Experience**

G 31	Designation		Working Period		
S. No.		Institution Name	From	То	
1	Assistant Professor	Gudlavalleru Engineering College	16-07-2013	Till date	
2	Assistant Professor	MLR Institute of Technology	26-11-2012	25-04-2013	
3	Assistant Professor	Vishnu Institute of Technology	10-05-2011	08-11-2011	
4	Assistant Professor	Eluru College of Engineering & Technology	06-06-2009	16-04-2011	

### **Professional Body Membership**

S. No.	Name of the Professional body	Membership Number	
1	Institution of Engineers India	AM159547-7	

### Papers Published in Journals No.: 12

- 1) Goriparthi Venkateswara Rao, K.Rushendra Babu, Sumit Kumar "Performance comparison of IEEE802.11a Standard in Mobile Environment" International Journal of Scientific & Engineering Research, Volume 5, Issue 10, October-2014; ISSN 2229-5518
- **2)** Prudhvi Raj Metti, **K.Rushendra Babu**, Sumit Kumar "Spectrum Handoff Mechanism in Cognitive Radio Networks using Fuzzy Logic" International Journal of Scientific & Engineering Research, Volume 5, Issue 10, October-2014; ISSN 2229-5518.
- **3)** P. Vidyullatha, R. Chandra Sekhar, **K. Rushendrababu**, B. Ajay Kumar "Performance Analysis of PARP in STBC MIMO-OFDM System under Different Modulation Schemes", International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 5, Issue 1, January 2016, ISSN (Print) 2320-3756 ISSN (Online) 2278-8875
- **4)** M. Bhagya Lakshmi, **K. Rushendrababu**, R. Chandra Sekhar, B. Ajay Kumar "Convergence Rate Improvement and Interference Reduction in Smart Antenna System" in International Journal of Advanced Research in Electrical, Electronics and Instrumentation Engineering, Volume 5, Issue 2, February 2016, ISSN (Print) 2320-3765 ISSN (Online) 2278-8875
- **5)** P. Vinay Kumar, **K. Rushendrababu**, K. Rasool Reddy, "Super Resolution using edge modification through SWT on colour images" in International Journal of Engineering Sciences & Research Technology, Volume 5, Issue 9, September 2016, pp:582-587, ISSN: 2277-9655.

- **6)** T. Maheswari, V. Uma Sankar, S. Sai Reddy, B. Pradeep Kumar, **K. Rushendrababu**, "Design of a microstrip patch antenna for 5G wireless applications" in International Journal of Research and Analytical Review, Volume 6, Issue 1, March 2019, pp:510-515, ISSN: 2349-5138.
- 7) R. Chandrasekhar, K. Rushendrababu, "PAPR Reduction in MIMO-OFDM using combination of Non-linear companding with weighting function" International Journal of Recent Technology and Engineering, Volume 7, Issue 5S4, February 2019, pp:393-398, ISSN: 2277-3878.
- **8)** K. Rushendra Babu, K. Jayanth, K. Gowthami Priya, K. Deepak Babu, "Fingerprint Recognition System Using Minutiae Approach" International Research Journal of Modernization in Engineering Technology and Science, Volume:05, Issue:04, April-2023, pp: 1956-1960, e-ISSN: 2582-5208
- 9) Rushendra Babu. Karyampudi, Saiteja Padmata, Neeraja Lakshmi Baswani, Meghana Nakka, Hema Mareedu, "Machine Learning Framework For Effective Prediction Of Cardiovascular Diseases" International Research Journal of Modernization in Engineering Technology and Science, Volume:05, Issue:04, April-2023, pp: 1239-1243, e-ISSN: 2582-5208
- 10) C. V. Ravikumar, Kalapraveen Bagadi, K. Rushendrababu, Asadi Srinivasulu, and Satish Kumar, "Optimizing Nonlinear Distortion and Interference in MC-CDMA Receivers Employing Deep Neural Networks", Hindawi Mobile Information Systems, Volume 2023, Article ID 6430987, 13 pages, https://doi.org/10.1155/2023/6430987
- **11)** K. Rushendrababu , N. Lakshmi Pavani , P. Yaswitha , M. Manoj Kumar , Shaheda Begum, "32-BIT FPGA BASED ALU EMPLOYING REVERSIBLE LOGIC", Journal of Emerging Technologies and Innovative Research (JETIR), Volume 11, Issue 4, April 2024, ISSN-2349-5162, pp:478-489
- **12) K. Rushendrababu**, Bonthu Sai Snehith, Bethu Yoga Lakshmi Nithya, Amboji pravallika, Chebrolu Loka Sravani, "Gyroscopic Sensor-Based Helipad Stabilization System", Journal of Emerging Technologies and Innovative Research (JETIR), Volume 11, Issue 4, April 2024, ISSN-2349-5162, pp:661-665

## Papers Published in Conferences No.: 02

**1) K.Rushendrababu**, Dr.V.Nagarajan "Hybrid WDM/TDMA PON Optimized for Diversified Application Scenarios" National Conference on Signal Processing, Communications and VLSI design NCSCV'09 on 8<sup>th</sup> & 9<sup>th</sup> May 2009 at Anna University Coimbatore.

**2)** K Rushendrababu, Dr. C.V. Ravi Kumar, "Performance Analysis Of Modified Congestion Control For Real-World Traffic In Iot-Enabled Edge Networks", 2<sup>nd</sup> Intentional conference on Science, Engineering and Advanced Technology (ICET 2024), during May 2024, Springer, Gulf University.

### Workshops Organized No.: 07

- 1) Acted as co-cordinator for "One Day Workshop on "Ultra Low Power Communication using CC430 Microcontroller Hands on Experience" held on 07-02-2015 at Gudlavalleru Engineering College, Gudlavalleru.
- **2)** Acted as co-cordinator for "One Week FDP on Development of Wireless Sensor Networks using Network Simulator (NS2) Hands on Experience" during 1<sup>st</sup> to 5<sup>th</sup> December 2015, Gudlavalleru Engineering College, Gudlavalleru.
- 3) Acted as co-cordinator for "One day workshop on Advanced Image Processing Techniques" held on 23<sup>rd</sup> September 2017, Gudlavalleru Engineering College, Gudlavalleru.
- 4) Acted as co-cordinator for "One day workshop on Curriculum Design Blooms taxonommy" held on 3<sup>rd</sup> January 2018, Gudlavalleru Engineering College, Gudlavalleru.
- **5)** Acted as co-cordinator for One Week Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies" **I Phase:** 16 21 November 2020, organized by Gudlavalleru Engineering College.
- 6) Acted as co-cordinator for One Week Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies" II Phase: 16 22 March 2021, organized by Gudlavalleru Engineering College.
- 7) Acted as co-cordinator for One Week Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies" III Phase: 17 24 August 2021, organized by Gudlavalleru Engineering College.

## Workshops /Conferences /Seminars Attended No.: 14

- 1) Attended the two day workshop on "Wireless Sensor Networks" at SSN College of Engineering, Chennai, during 18-19 April 2008.
- **2)** Attended a two day workshop on "Soft Computing and Signal Processing Applications to Engineering" at Sasi Institute of Technology and Engineering, Tadepalligudem, during 24<sup>th</sup> to 25<sup>th</sup> June 2011.
- **3)** Attended a workshop on "Microcontrollers" at Shri Vishnu Engineering College for Women, Bhimavaram during 20<sup>th</sup>–26<sup>th</sup> August 2011.
- **4)** One week refresher course on "Electronic Devices and Circuits" during 23-28 September, 2013 at Gudlavalleru Engineering College.
- 5) Two weeks refresher course on Signals and Systems during 02-12 January, 2014 at Gudlavalleru Engineering College, by IIT Kharagpur.
- 6) Attended a three day national workshop on "Theory & Applications of Intelligent Signal Processing" at Gudlavalleru Engineering College, Gudlavalleru during 28-02-14 to 02-03-14.

- 7) Attended Faculty Summit on Advanced Wireless Communication & Research conducted on December 13<sup>th</sup> and 14<sup>th</sup>, 2013 at IIIT Hyderabad.
- 8) Attended 3 day workshop on Advances in Antenna Design and applications with HFSS S/W simulations and hands on at Matrusri Engineering College, Hyderabad on 24<sup>th</sup> 26<sup>th</sup> July'2014.
- 9) Attended a one day workshop on "Speech Processing current challenges and Hands on experience" by Dr. Anil Kumar Vuppala at Gudlavalleru Engineering College on 23<sup>rd</sup> August' 15.
- **10)** Attended a one day workshop on "Ultra Low Power Communication using CC430 microcontroller::Hands on experience" on 7<sup>th</sup> February'2015 in the department.
- 11) Attended a one day workshop on "Research in Energy Management" at Vijayawada, conducted by Institution of Engineers (India) on 29<sup>th</sup> March'2015
- 12) Attended a two day workshop on "Image Processing Applications using MATLAB" at Gudlavalleru Engineering College, during 12-13 October 2015.
- **13)** Attended a two day "Cisco Annual Conference 2020" at Bangalore, during 28-29 January 2020.
- **14)** Attended a one day workshop on "Leading the Way: Navigating the emerging Trends of AI & Electrification in Engineering Education." at JNTUK Kakinada, on 15<sup>th</sup> September 2023.

### **Certifications/Training Programs Attended No.: 12**

- 1) Attended a one week workshop on "Training Teachers for Excellence" at Gudlavalleru Engineering College" Gudlavalleru from 19-08-14 to 21-08-14 and 29-12-14 to 31-12-14.
- 2) Short Term Training Program on "Digital Signal and Image Processing using MATLAB and LabVIEW" from 19.05.2015 to 22.05.2015 at Kongu Engineering College, Erode, Tamil Nadu.
- 3) Attended a Three day FDP on "Bio-Signal Processing & Measurements and Computing Everywhere" at Vignan University, Vadlamudi during 26<sup>th</sup> to 28<sup>th</sup> November 2015.
- **4)** Attended a one week FDP on "Development of Wireless Sensor Networks Using Network Simulator (NS2) Hands on Experience" during 1<sup>st</sup> to 5<sup>th</sup> December 2015 at Gudlavalleru Engineering College, Gudlavalleru.
- 5) Attended in DeitY, MCIT Sponsored FDP on "Wireless Communication Technologies" organized by the E&ICT Acdemy, NITW at Gayatri Vidya Parishad College of Engineering, Visakhapatnam, from 29<sup>th</sup> August 3<sup>rd</sup> September 2016.
- 6) Attended a two day staff training program on "Simulation of Linear & Digital Integrated Circuits and Microcontroller based Applications using NI Multisim" during 4<sup>th</sup> to 5<sup>th</sup> November 2016, organized by Department of Electronics and Communication Engineering, Gudlavalleru Engineering College, Gudlavalleru.
- 7) Attended a one week FDP on "Hands on Experience in Signal Processing Applications" held during 7<sup>th</sup>-12<sup>th</sup> November, 2016 at Gudlavalleru Engineering College, Gudlavalleru.
- **8)** Attended a two day FDP on "Research Issues in Cognitive Radio Networks" during 9<sup>th</sup> 10<sup>th</sup> January 2017 at Gudlavalleru Engineering College, Gudlavalleru.

- 9) Attended a One Week FDP on "Signal and Image Processing using LabVIEW" during 13<sup>th</sup> to 18<sup>th</sup> November 2017 at Gudlavalleru Engineering College, Gudlavalleru.
- **10)** Attended a One Week FDP on "Design and Analysis of RF Antennas using HFSS software" during 7<sup>th</sup> -11<sup>th</sup> November 2017 at Sasi Institute of Technology and Engineering, Tadepalligudem.
- 11) Attended a Short term course on "Metamaterials and Applications" during 13<sup>th</sup> -20<sup>th</sup> December 2017 at IIT Kharagpur, Kharagpur.
- 12) Attended a two weeks training program on "CCNA R & S (Module 1 & 2)" during 1<sup>st</sup> 12<sup>th</sup> May 2018 at SRK Institute of Technology, Vijayawada conducted by Cisco Trident Academy.

#### **ONLINE:**

#### Webinars: 05

- 1) Attended on Online Webinar on "Outcome Based Education Road-Map to E-Learning & Accreditation", organized by Informatics, Banglaore on 29-05-2020.
- 2) Attended an Online Webinar on "Radio Frequency Measurements for Cellular and Wireless Communication Systems" organized by Department of Electronics and Communication Engineering on 25th May, 2020.
- **3)** Attended on Online Webinar on "Impact of COVID in Engineering Education & Way forward", organized by ISTE Chapter, Gudlavalleru Engineering College, Gudlavalleru on 09-06-2020.
- **4)** Attended on Online Webinar on "National Education Policy 2020", organized by Department of ECE, Gudlavalleru Engineering College, Gudlavalleru on 24-08-2021.
- 5) Attended a National Webinar on "How to Write Research Article "organized by Department of Social Work, Ganpat University on 3rd July, 2021.

### FDP/Training Programs: 41

- 1) Attended a Short Term Training Programme through ICT Mode on "Evaluating Student's Performance and Designing Question Papers", during 25-02-2019 to 01-03-2019 conducted by National Institute of Technical Teacher Training and Research, Kolkata.
- **2)** Attended a Three Day training programme on "Advanced Development Tools Based IoT" Organized by Department of ECE, Gudlavalleru Engineering College, during 11-11-2019 to 13-11-2019.
- 3) Attended a One Week FDP on "Data Acquisition and RT using LabVIEW" Organized by Department of ECE, Gudlavalleru Engineering College in association with National Instruments, Bangalore, during 25-11-2019 to 30-11-2019.
- **4)** Attended One week training program on "CCNv7 (Module-3) Remote Instructor Training Program" during 7<sup>th</sup> April 14<sup>th</sup> April 2020.
- 5) Attended Four Day FDP on "Digital Image Processing using Matlab" during 24<sup>th</sup> April 27<sup>th</sup> April 2020 hosted by SkilltoHire.
- 6) Attended Two week FDP on "Advanced Digital Image Processing Techniques" during 1<sup>st</sup> May 14<sup>th</sup> May 2020 hosted by SkilltoHire.
- 7) Attended One week online FDP on "Advanced Antenna Design using HFSS" during 12<sup>th</sup> May 17<sup>th</sup> May 2020 organized by Santhiram Engineering College, Nandyal.

- 8) Attended Five day National level online FDP on "Modern Research Trends in Communication, Signal Processing and VLSI/MEMS", organized by Andhra Layola Institute of Engineering and Technology, during 19<sup>th</sup> May 23<sup>rd</sup> May 2020.
- 9) Attended one week international online knowledge development programme on "Challenges and advancements in the design of IoT, Embedded an VLSI systems A Researchers View" during 8<sup>th</sup> June 13<sup>th</sup> June 2020, organized by Gudlavalleru Engineering College.
- **10)** Attended FDP on "Data Science" during 1<sup>st</sup> June 26<sup>th</sup> June 2020 organized by EXCELR and APSSDC.
- 11) Attended a "Five Day Online Faculty Development Program on Scilab" during 25-06-2020 to 29-06-2020, organized by VKR, VNB & AGK College of Engineering in association with Spoken Tutorials IIT Bombay
- **12)** Attended an online Two week FDP on "Embedded Systems" during 13-07-2020 to 25-07-2020, organized by APSSDC, Andhra Pradesh.
- **13**) Attended a National Level Online FDP on "Cyber Security", Organized by Department of CSE, Gudlavalleru Engineering College, during 22-07-2020 to 26-07-2020.
- 14) Attended a National Level Online FDP on "Image Processing and Computer Vision-Industrial Scope" organized by the Department of Electronics and Communication Engineering, Malineni Lakshmaiah Women's Engineering College, Guntur from 8th to 12th July 2020.
- **15)** Attended an Online One week Refresher course on "Embedded System Design", organized by Department of Electronics and Communication Engineering, Gudlavalleru Engineering College, Gudlavalleru during 27-07-2020 to 01-08-2020.
- **16)** Attended Two Week online training program on "Routing & Switching" conducted by Huawei during August 2020.
- 17) Attended APSSDC online FDP on "Python Programming" during 03-08-2020 to 15-08-2020.
- **18)** Attended an Online Five days FDP on "Data Science Applied in Industry" organized by Jawaharlal Nehru Technological University Kakinada (JNTUK) in association with DeepSphere.AI, USA, during 17-08-2020 to 21-08-2020.
- 19) Attended an Online AICTE Sponsored Short Term Training Programme on "Blockchain Architecture Design and Use Cases" (Phase-I), organized by Gudlavalleru Engineering College, during 10th 15th August, 2020.
- **20)** Attended a 15 Days Online Workshop on "Application of Data Science for Industries Problem Through Python" Organized by JNTUK & EXCELR during 10-08-2020 to 28-08-2020
- **21)** Attended an Online AICTE Sponsored Short Term Training Programme on "Blockchain Architecture Design and Use Cases Decentralized Network Synchronization" (Phase-II), organized by Gudlavalleru Engineering College, during 17th 22th August, 2020.
- **22)** Attended an Online AICTE Sponsored Short Term Training Programme on "Blockchain Architecture Design and Use Cases Smart Contracts with Ethereum Solidity" (Phase-III), organized by Gudlavalleru Engineering College, during 24th 29th August, 2020.
- 23) Attended One Week an Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies I Phase: 16 21 November 2020, organized by Gudlavalleru Engineering College.

- **24)** Attended One Week Online FDP on "Internet of Things" organized by ATAL Academy during 07-12-2020 to 11-12-2020.
- **25)** Attended One Week an Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies **II Phase:** 16 22 March 2021, organized by Gudlavalleru Engineering College.
- **26)** Attended an online course on "Soft Skills" conducted by IIT Bombay during 26-01-2021 to 28-05-2021
- 27) Attended a Five Day Online FDP on "Emerging Technologies in Electronics Engineering" organized by Department of Electronics and Communication Engineering, Godavari Institute Of Engineering & Technology(A), during 29-06-2021 to 02-07-2021.
- 28) Attended One Week an Online AICTE-ISTE Sponsored induction programme on "mmWave Frequencies III Phase: 17 24 August 2021", organized by Seshadri Rao Gudlavalleru Engineering College.
- **29)** Attended a workshop "Design and simulation of Antenna using HFSS and CADFEKO" organized by HAM Club of Kumaraguru, Kumaraguru College of Technology conducted on 29/10/2021 30/10/2021.
- **30)** Attended Two week training program on "CCNA 200-301" during September 2022 conducted by PyNets.
- **31)** Participated in One Week online Faculty Development Programme (FDP) on "Emerging Trends and Challenges in Communication and Computational Technologies (5G/6G)" Organized by Department of Electronics and Communication Engineering in Association with IEEE Communication Society and MTT-Society of VNRVJIET, Hyderabad from 18-03-2024 to 22-03-2024.
- **32)** Participated in Two Days online workshop on "Design of RF & Microwave Circuits and Applications" Organized by Department of Electronics and Communication Engineering in Association with IEEE Communication Society and MTT-Society of VNRVJIET, Hyderabad from 03-05-2024 to 04-05-2024.
- **33)** Successfully completed and received a passing grade in "RPFNet: An Introduction to Computer Networking for Teachers" a course offered by RaspberryPiFoundation, June 2024
- **34)** Participated in a Six day online Faculty development program titled "Recent Trends in Embedded Systems and IoT (RTESIoT-2024)" organized by Department of ECE of GMR Institute of Technology in collaboration with Sri Sairam Institute of Technology, Chennai from 27/05/2024 to 01/06/2024.
- **35)** Participated in Two-Week Faculty Development Program (Online Mode) on "Transforming Education: Integrating OBE and NEP 2020" from 22 July to 2 August 2024, Organized by the Department of Electronics and Communication Engineering, CVR College of Engineering.
- **36)** Participated in the "One-Week Faculty Development Program on Recent Trends in Wireless Communications and Networks", organized by School of Electronics Engineering (SENSE) at VIT-AP University, during 23rd 27th July, 2024.
- 37) Participated in 10 Hours International Faculty Development Program on Machine Learning and Artificial Intelligence organized by Pimpri Chinchwad College of Engineering and Research, Ravet, Pune Maharashtra, Sri Venkateswara Degree College, Kadapa Andhra Pradesh, SJB Institute of Technology, Bangalore Karnataka

- and Sri Indu PG College, Hyderabad Telangana in Collaboration with ExcelR Edtech Pvt. Ltd. during 12th Aug to 19th Aug 2024.
- **38)** Participated in the One-Week Faculty Development Program on "Semiconductor Devices, Modeling & Circuit Technology" Organized by ECE Department LENDI Institute of Engineering and Technology during 19-08-2024 to 24-08-2024.
- **39)** Participated in the AICTE Recognized Faculty Development Programme on "Microstrip Patch Antenna Design Techniques and Tools" Conducted by Electronics and Communication Engineering Department from 16/09/2024 to 20/09/2024 (One Week) at NITTTR, Chandigarh.
- **40)** Participated in the AICTE Recognized Faculty Development Programme on AI for Engineering Applications Conducted by Electronics and Communication Engineering Department from 04/11/2024 to 08/11/2024 (One Week) at NITTTR, Chandigarh.
- **41)** Participated in the AICTE Recognized Faculty Development Programme on AI for SDGs under Unnat Bharat Abhiyaan Conducted by Electronics and Communication Engineering Department from 18/11/2024 to 22/11/2024 (One Week) at NITTTR, Chandigarh.

#### Awards: 02

- 1) Instructor Excellence Award, RUSHENDRABABU KARYAMPUDI in recognition of advanced level instructor excellence and overall contributions to Cisco Networking Academy in 2021.
- 2) 5 Years Instructor Years of Service, award is presented to RUSHENDRABABU KARYAMPUDI for FIVE YEARS of active participation and dedicated service in Cisco Networking Academy.

#### **NPTEL Certifications: 05**

- 1) Introduction to Research Elite
- 2) Antennas Elite
- 3) Principles of Signal Estimation for MIMO/OFDM Wireless Communication Gold
- 4) Python for Data Science Pass
- 5) Electromagnetic waves in Guided and Wireless Media Pass
- 6) Computer Networks and Internet Protocol Elite
- 7) CIT001: Fundamentals of Computer Systems 82% (IGNOU)

#### **Guest Lectures Delivered No.: 03**

- 1) Delivered a staff seminar on Cognitive Radio Networks in the department for the faculty.
- 2) Delivered a staff seminar on Metamaterials on 18<sup>th</sup> September'15 in the department for the faculty.
- 3) Delivered a staff seminar on Computer Networks on 20<sup>th</sup> June 2024 in the department for the faculty.

## **Subjects Handled**

#### **Under Graduation**

- Biomedical Engineering, IBE
- Basic Electronics/Electronic Devices and Circuits/Elements of Electronics Engineering.
- Electromagnetic Fields
- Probability Theory and Stochastic Process
- Digital Communication
- Computer Networks, DCCN
- Antennas and Wave Propagation
- Microwave and Optical Communications
- Fundamentals of Communication Systems.

#### Labs Handled: (UG)

- ➤ Electronic Devices and Circuits/ Semiconductor Devices and Circuits
- Digital Communications
- ➤ Analog Communications
- > Pulse and Digital Circuits
- ➤ Data Communication and Computer Networks
- > IT Workshop
- Digital Signal Processing

#### **Post Graduation**

- Wireless Communication Networks
- Embedded C
- Research Methodology

#### Labs Handled: (PG)

Embedded - C

## **Other Responsibilities**

#### **College Level**

- 1. Member of the anti ragging committee for the academic year 2014-2015.
- 2. One of the instructors for CCNA R&S under Cisco Networking Academy (GEC).
- 3. One of the instructors for JUNOS under Juniper Academy.
- 4. SPOC for EduSkills

## **Department Level**

- 1. Time Table Co-cordinator for the II B.Tech & IV B.Tech ECE (Autonomous) for the AY 2015-2016, 2016-2017, 2017-2018 and 2018-2019 respectively.
- 2. IV B.Tech ECE Examination Coordinator for 2021-2022, 2022-2023.
- **3.** Electrical Maintenance coordinator.
- **4.** TnP Co-cordinator

# **Projects Guided**

**Under Graduation: 12** 

S. No.	Name of the project	Year
1	Face Detection Based On Gabor Feature Extraction And Neural Networks	2013
2	Electronic Security Jacket for Women	2014
3	Toxic Gas Detection and Alerting System	2015
4	Brain Tumor Detection by processing MRI Images	2016
5	Noise Reduction of ECG signals through genetic optimized wavelet threshold filtering	2017
6	Comparative Analysis of Filtering Techniques	2018
7	Deign of Microstrip patch antenna for 5G wireless application	2019
8	Deign and comparison of 1*4 and 2*4 Metamaterial microstrip patch antenna	2020
9	Fingerprint Recognition System Using Minutiae Approach	2023
10	Machine Learning Framework For Effective Prediction Of Cardiovascular Diseases	2023
11	32-Bit FPGA Based ALU Employing Reversible Logic	2024
12	Gyroscopic Sensor-Based Helipad Stabilization System	2024

#### **Post Graduation: 04**

S.No.	Name of the project	Year
1	Spectrum Handoff Mechanism in Cognitive Radio Networks using Fuzzy Logic	2014
2	Performance comparison of IEEE802.11a Standard in Mobile Environment	2014
3	Convergence rate improvement and interference reduction in smart antenna system	2016
4	Super resolution using edge modification through SWT on color images.	2016

## Guiding Ph. D Students: NIL

### **Book Chapter(s):**

**1.** An Exploratory Evaluation of Patch Antenna concept for Underwater Unmanned Aerial Vehicles. Published on 20 December 2024, Springer, Cham, <a href="https://doi.org/10.1007/978-3-031-69441-7">https://doi.org/10.1007/978-3-031-69441-7</a> Online ISBN978-3-031-69441-7

#### **Books Published No.: 04**

- 1. Co-author for chapter 1 titled "Electronic Devices and Circuits Lab" of Electronics and Communication Engineering Laboratory Manual series 2 with ISBN-978-1-4276-5564-6 in the year 2016
- 2. Co-author for chapter **4** (4.1) titled" **Digital Communications Lab**" of Electronics and Communication Engineering Laboratory Manual series with ISBN-978-1-4276-5563-9 in the year 2016
- Co-author for chapter 13 titled "Computer Networks" of Electronics and Communication Engineering Instructional Manual with ISBN-978-1-4276-5539-4 in the year 2015 and Co-author for chapter 22 titled" Bio-Medical Engineering" of Electronics and Communication Engineering Instructional Manual with ISBN-978-1-4276-5539-4 in the year 2015
- 4. Co-author for chapter **2** (2.2) titled" **Analog Communications Lab**" of Electronics and Communication Engineering Laboratory Manual with ISBN-978-1-4276-5536-3 in the year 2015

## **R&D** and Consultancy: 02

S.No.	Project Title	Source of Funding	Duration	Role	Status
1	Design and Realisation of CMOS circuits using PGDST technique to reduce power dissipation	In-House R&D	1 Year	Co- Investigator	Completed
2	Design and Development of Automated Public Transportation System and Traffic Guidance System.	UGC	2 Years	Co- Investigator	Completed

#### Patents Published: 01

➤ Title of the invention: Bandwidth Expansion System for Communication Medium and Method Thereof. Application No.202241051258, Journal No. 37/2022 Dated 16/09/2022, Page No: 58396

## **Curriculum Design and Development**

- 1. Embedded C
- 2. Computer Networks
- 3. Biomedical Engineering
- 4. Introduction to 4G and 5G
- 5. Cognitive Radio Networks
- 6. Data Communication and Computer Networks
- 7. Computer Networks and Network Security

#### **Declaration**

I hereby declare that all the above-furnished information is correct to the best of my knowledge.

Date: 09-01-2025 Signature

Place: Gudlavalleru (K. Rushendrababu)