Name	Dr. RANJEETH MAMIDI
Years of Experience	Teaching: 5 Years Research: 9 Years Industry: NIL
Email Id	ranjeeth.m@bvrithyderabad.edu.in
Areas of Specialization	Wireless Communications, 5G, NOMA, Cognitive Radio, Fading Channels, V2V Communications.

Educational Qualifications

Doctoral Degree	Ph.D. (NIT-Warangal)	ECE – Wireless Communications
PG Degree	M.Tech. (NIT-Durgapur)	Telecommunication Engineering
UG Degree	B.Tech. (JNTU-Hyderabad)	Electronics and Communication Engineering

Patents:

1. "Censoring Methods for Energy-Efficient Collaborative Spectrum Sensing Network with Improved Energy Detectors over Generalized Fading Channel is communicated for Full-Patent Grant. **(Patent filed with application No.202241052070).**
2. Evaluation of BER Performance of NOMA System Under Various Fading Channels is communicated for Full-Patent Grant. **(Communicated & Under review).**

Papers Published

International Journal Publications

1. M. Ranjeeth, N. Srinivas, A. Bhowmick, B. Prasad, "On Selection of Parameter and Fusion in Hard/Soft data-aided Cooperative Spectrum Sensing System Over $\eta - \mu$ Fading Channels", Wireless Personal Communication Journal, Springer **(Under Review)**.
2. M. Ranjeeth, "Selection of Optimal Network Parameters for The Proposed CSS Network Over Rayleigh Fading", Wireless Personal Communication Journal, Springer **(Under Review)**.
3. M. Ranjeeth, Srikar D, Anvesh kumar. N, Ashok Babu, Sudipta Das, Sunil Lavadiya, Abeer D. Algarni, Walid El-Shafai, "A Novel Integrated UWB Sensing and 8-element MIMO Communication Cognitive Radio Antennas System", Electronics, (MDPI), ISSN 2079-9292. **(SCI)** I.F: 2.690 (https://doi.org/10.3390/electronics12020330)

4. M. Ranjeeth, N. Srinivas, A. Bhowmick, "Analysis of Energy-Efficient Cooperative Spectrum Sensing with Improved Energy Detectors and Multiple Antennas over Nakagami-q/n Fading Channels", International Journal of Communication Systems, vol.34, Issue.5, pp.1-21, Jan-2021, (Wiley), ISSN 1099-1131. **(SCI)** I.F: 2.047 (https://doi.org/10.1002/dac.4731)

5. M. Ranjeeth, S. Anuradha, "Optimized Cooperative Spectrum Sensing Network Analysis in Non-Fading and Fading Environments", International Journal of Communication Systems, vol.33, Issue.5, pp.1-28, Jan-2020, (Wiley), ISSN 1099-1131. **(SCI)** I.F: 2.047 (https://doi.org/10.1002/dac.4262)

6. M. Ranjeeth, S. Anuradha, "The Effect of Weibull Fading Channel on Cooperative Spectrum Sensing Network Using an Improved Energy Detector", Telecommunications Systems, Vol. 68, Issue.3, pp.493-512, July-2018, (Springer), ISSN 1572-9451. **(SCI)** I.F: 2.314 (https://doi.org/10.1007/s11235-017-0405-1)

7. M. Ranjeeth, S. Anuradha, "Throughput Analysis in Proposed Cooperative Spectrum Sensing Network with an Improved Energy Detector scheme over Rayleigh Fading Channel", International Journal of Electronics and Communications, AEU Journal, vol.83, pp.416-426, Jan-2018, (Elsevier), ISSN 1434-8411. **(SCI)** I.F: 3.183 (https://doi.org/10.1016/j.aeue.2017.09.008)

8. M. Ranjeeth, S. Anuradha, N Srinivas, "Performance Analysis of Cooperative spectrum Sensing Network Using Optimization Technique in Different fading channels", Wireless Personal Communications, Vol. 97, issue 2, pp.2887-2909, November-2017, (Springer), ISSN 0929-6212. **(SCI)** I.F: 1.2 (https://doi.org/10.1007/s11277-017-4640-2)

9. M. Ranjeeth, S. Anuradha, "Threshold Based Censoring of Cognitive Radios in Rician Fading Channel", Wireless Personal Communications, Vol.93 issue 2, pp. 409-430, June-2016, (Springer), ISSN 0929-6212. **(SCI)** I.F: 1.2 (https://doi.org/10.1007/s11277-016-3440-4)

10. M. Ranjeeth, S. Anuradha, N. Srinivas, "Optimization Analysis of Improved energy detection based cooperative spectrum sensing in Nakagami-m and weibull fading channels", Journal of Engineering Science and Technology review, Vol.10, no.2, pp.114-121, June-2017, ISSN: 1791-2377. **(Scopus)** I.F: 1.2 (https://doi.org/10.25103/jestr.102.14)

11. M. Ranjeeth, S.Anuradha, "Maximization of Network Utility function in Cooperative Spectrum Sensing using Energy Detection Scheme", Indian Journal of Science and Technology, Vol.9 (SI), pp.1-4, Dec-2016, ISSN 0974-5645. **(Web of Science)** (https://doi.org/10.17485/ijst/2016/v9iS1/107908)

12. M. Ranjeeth, S.Anuradha, "Performance of Nakagami-m Fading Channel over Energy Detection Based Spectrum Sensing", International Journal of Electrical, computers, Electronics and Communications Engineering, Vol.8, no.10, pp.1605-1609, Nov-2014. **(Scopus)**, (https://doi.org/10.5281/zenodo.1337517)

13. M. Ranjeeth, A. Chandra, "Performance of RS-Coding on Fading Channels", International Journal of Systems Algorithms and Applications, Vol.3, pp.72-78, May-2013.

International Conference Publications

1. M. Ranjeeth, N. Srinivas, O. Laxmi Pratyusha, "Performance of Generalized $\alpha - \mu$ Fading for Energy Detection Based Spectrum Sensing in Presence of Channel Errors", Eighth International Conference on Advanced Computing and Communication Systems (ICACCS-2022), Coimbatore, India, March 25-26, 2022, (https://doi.org/10.1109/ICACCS54159.2022.9784984) **(IEEE Xplore)**

2. M. Ranjeeth, M. Sashidhar, "Comparative Analysis in Between HSPA+ and LTE", Eighth International Conference on Advanced Computing and Communication Systems (ICACCS-2022), Coimbatore, India, March 25-26, 2022, (https://doi.org/10.1109/ICACCS54159.2022.9785262) **(IEEE Xplore)**

3. M. Ranjeeth, V. Manohar, A. Supriya, M. Vinay, "BER Analysis of NOMA System over Various Fading Channels", Second IEEE International Conference on Communication, Computing & Industry 4.0, (C2I4-2021), Bangalore, India, Dec 16-17, 2021, pp. 1-5, (https://doi.org/10.1109/C2I454156.2021.9689385) **(IEEE Xplore)**

4. M. Ranjeeth, N. Srinivas, B. Santosh, B. Naveen, "Energy Efficiency and Throughput Analysis Using the Proposed CSS Network in Weibull Fading Environment", Seventh International Conference on Advanced Computing and Communication Systems (ICACCS-2021), Coimbatore, India, March 19-20, 2021, pp.1380-1385, (https://doi.org/10.1109/ICACCS51430.2021.9441848) **(IEEE Xplore)**

5. M. Ranjeeth, N. Srinivas, G. Kiran, "Energy-Efficiency Analysis of Cognitive Radio Network with Improved Energy Detectors and SC Diversity over Nakagami-q Fading Environment", (Best Paper Award), IEEE International Symposium on Sustainable Energy, Signal Processing and Cyber Security (IEEE-ISSSC 2020), Odisha, India, Dec-17-18, 2020, pp.1-6, (https://doi.org/10.1109/iSSSC50941.2020.9358880). **(IEEE Xplore)**

6. M. Ranjeeth and S. Anuradha, "Throughput Analysis in Cooperative Spectrum Sensing Network using an Improved Energy Detector", (Best Paper Award), Twenty-first International conference on ICACT-2019, Phoenix park, South Korea, Feb.17-20, 2019, pp.483-487, (https://doi.org/10.23919/ICACT.2019.8701974) **(IEEE Xplore)**

7. M. Ranjeeth and S. Anuradha, "Network Utility Function Performance Analysis Using Cooperative Spectrum Sensing Network over Fading Channels", Fourteenth International INDICON conference, IIT-Roorkee, India, Dec.15-17, 2017, pp.1-6, (https://doi.org/10.1109/INDICON.2017.8487546). **(IEEE Xplore)**

8. M. Ranjeeth and S. Anuradha, "Maximizing Network Utility Function in Cooperative Spectrum Sensing over Fading Channels", Seventh IEEE conference on ICCSP, Chennai, India, April 3-5, 2018, pp.845-849, (https://doi.org/10.1109/ICCSP.2018.8524290). **(IEEE Xplore)**

9. M. Ranjeeth, S. Anuradha, Sipra Behera, "Optimization of Cooperative Spectrum Sensing Network with Multiple Antennas in Weibull Fading Channel with Improved Energy Detector", Fifth IEEE conference on ICCSP, Chennai, India, April 6-8, 2016, pp.1363-1367, (https://doi.org/10.1109/ICCSP.2016.7754375). **(IEEE Xplore)**

10. M. Ranjeeth, S. Anuradha, Sipra Behera, "Optimization of Cooperative Spectrum Sensing Network with Multiple Antennas in Nakagami-m Fading Channel with Improved Energy Detector", Fifth IEEE conference on ICCSP, Chennai, India, April 6-8, 2016, pp.1410-1414, (https://doi.org/10.1109/ICCSP.2016.7754387) **(IEEE Xplore)**

11. M. Ranjeeth, S. Anuradha, Sipra Behera, "Performance Analysis and Threshold Selection in Cooperative Spectrum Sensing Using Soft Decision Techniques", IEEE-ICEEOT-2016, Chennai, India, March 3-5, 2016, pp.2412-2417, (https://doi.org/ 10.1109/ICEEOT.2016.7755126). **(IEEE Xplore)**

12. M. Ranjeeth, Sipra Behera, N. Srinivas, S. Anuradha, "Optimization of Cooperative Spectrum Sensing Based on Improved Energy Detector with Selection Diversity in AWGN and Rayleigh Fading", IEEE-ICEEOT-2016, Chennai, India, March 3-5, 2016, pp.2402-2406, (https://doi.org/10.1109/ICEEOT.2016.7755124). **(IEEE Xplore)**

13. M. Ranjeeth and S. Anuradha, "Rank based Censoring of Cognitive Radios with Cooperative Spectrum Sensing under Hoyt Fading Channel", International Conference on iCATccT-2015, BIET, Bengaluru, India, Oct 29-31, 2015, pp.625-630, (https://doi.org/10.1109/ICATCCT.2015.7456960). **(IEEE Xplore)**
14. M. Ranjeeth, S. Anuradha, "Cooperative Spectrum Sensing with Square Law Combining Diversity Reception", Third International Conference on ICSCN, Anna University, Chennai, India, Mar 26-28, 2015, pp.1-6, (https://doi.org/10.1109/ICSCN.2015.7219876). **(IEEE Xplore)**
15. M. Ranjeeth and S. Anuradha, "Performance of Fading Channels on Energy Detection Based Spectrum Sensing", Second International Conference on CNT, Hyderabad, India, Oct 17-18, 2014, pp.361-370, (Elsevier Proceeding)

FDP's Conducted

1. Conducted a one-day webinar on "Efficient Utilization of MS-Office for Preparation of Thesis and Presentations" on July-05-2021.
2. Conducted a one-day webinar on "Introduction to 5G and It's Applications" on May-25-2020.
3. Conducted a five days FDP on "Recent Trends in Communication Technologies (RTCT-2020)" from 10-10-2020 to 14-10-2020.
4. Conducted a five days Workshop on "Recent Trends in Communication Technologies (RTCT-2020)" from 10-10-2020 to 14-10-2020.

FDP's Attended

1. Attended a Five Days faculty development program from 22-05-2023 to 26-05-2023 organized at VEDIC.
2. Attended a five days National Workshop on "Applications of Machine Learning for Communication and Signal Processing" organized by NIT-Meghalaya from 22-11-2021 to 26-11-2021.
3. Attended a Six days Training program on "Optical Fiber Communication" organized by STL-Academy from 15-11-2021 to 20-11-2021.
4. Attended a three days High Intensity Training (HIT) Program on "5G Multi-User and Massive MIMO Wireless Technology" organized by IIT-Kanpur from 25-09-2020 to 27-09-2020.
5. Attended a three days High Intensity Training (HIT) Program on "5G Millimeter Wave MIMO OFDM Wireless Technology" organized by IIT-Kanpur from 02-10-2020 to 04-10-2020.
6. Attended a three days High Intensity Training (HIT) Program on "NOMA Wireless Technology" organized by IIT-Kanpur from 09-10-2020 to 11-10-2020.
7. Attended a ten days winter school training program on "Massive MIMO, mm-Wave using Python" organized by IIT-Kanpur from 21-12-2020 to 30-12-2020.
8. Attended a ten days winter school training program on "NOMA Wireless Technology using Python" organized by IIT-Kanpur from 04-01-2021 to 12-1-2021.

Certifications

1. Principles of Communication Systems-I organized by NPTEL during Jan – Apr 2021.

Book chapters

1. M. Ranjeeth and S. Anuradha, "Threshold Based Censoring of CRs in Fading Channel With Perfect Channel Estimation", Cognitive Radio Oriented Wireless Networks, LNICST 172 series, pp.220-231, 2016, ISSN 1867-8211. (Springer and Scopus proceedings)

Any Other Achievements

Awards Received

1. Got a travel grant from DST-SERB to attend an international conference at South Korea.
2. Got best Research paper award for presenting the paper in IEEE-ICACT-2019 conference at South Korea.
3. Conducted one session as session chair in IEEE-ICACT-2019 conference at South Korea.
4. Got best research paper award for presenting the paper in IEEE-ISSSC-2020 conference at Odisha.
5. Got the scholarship from MHRD-INDIA for M. Tech and Ph. D thesis.

Invited Talks (Resource Persons)

Faculty Sessions

1. Guest Lecture on "Introduction to MATLAB and It's Applications" in Five Days workshop on "Hands-on Session on MATLAB" organized by Vaagdevi College of Engineering, Warangal during 13th & 14th December 2022.
2. Guest Lecture on "Cognitive Radio and It's Applications" in Five Days National Level workshop on "RTCT-2020" organized by VCE-Warangal during 10th Oct to 14th Oct 2020.

Reviewer for International Conferences

1. Reviewer for IEEE-Access Journal (Wireless Communications).
2. Reviewer for International Journal of Communication System Journal.