

G. Narayanamma Institute of Technology and Science (For Women) **(AUTONOMOUS)**

Department of ECE **MICROWAVE ENGINEERING LAB**

Faculty associated with Microwave Engineering Lab

S. No	Name of the faculty	Designation	Area of research
1	Dr.Swapna Raghunath	Professor	Microwave and Radar Engineering
2	Dr.G.Srivalli	Associate Professor	Microwaves and Waveguides
3	Mrs.N.Krishna Jyothi	Assistant Professor	Microstrip Patch Antennas
4	Mr.P.Satyanarayana Goud	Assistant Professor	Microwaves and Signal Processing
5	Mr.Y.Prakash	Assistant Professor	Microwaves and Antennas

Photos



Microwave Engineering Lab



Microwave Bench Setup



Gunn Oscillator Characteristics



VSWR measurement of Horn Antenna

Facilities

Microwave Engineering Lab has a carpet area of 84.77 sq.m and can accommodate 24 to 36 students. Students are grouped in batches of 3 to perform experiments. The experiments related to Microwave generator characteristics, microwave components, waveguide parameters and antenna radiation pattern are performed. All the equipment operates in the X-Band (8 to 12 GHz frequency). The Microwave lab has equipment worth Rs.16,73,350 Lakhs.

Hardware Kits

S.No	Major Equipment in Microwave Engineering Lab	Quantity
1	Klystron power supply solid state	12
2	Klystron tube with mount	12
3	Solid state VSWR meter	8
4	Gunn power supply	4
5	Gunn Oscillator	4
6	Slotted Section with probe carriage	9
7	Dual trace C.R.O's and 2 channel digital storage C.R.O's	5&3
8	Microwave Power Meter	1
9	Antenna Radiation Pattern Measurement Setup	1
10	Microstrip Antennas	6

Faculty as Reviewers and Editorial board members

S. No.	Name of the faculty	Nature of Contribution	Details of associated Organization / Journal / Conference etc.
	Dr.Swapna Raghunath	Editorial Board Member	Journal of Satellite Oceanography and Meteorology, Whioce Publishling Pte. Ltd., Singapore
			International Journal of Atmospheric and Oceanic Sciences, Science Publishing Group, USA
		Reviewer	<ol style="list-style-type: none"> 1. IEEE Transactions on Geoscience and Remote Sensing (IEEE TGRS) 2. IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing 3. IEEE Geo Science and Remote Sensing Letters (IEEE GRSL) 4. IEEE ACCESS 5. Journal of Advances in Space Research Published by Elsivier 6. Journal of Measurements Published by Elsivier 7. Advances in Civil Engineering, Hindawi Publishers 8. International Conference on Soft Computing and Signal Processing (ICSCSP-2018) in association with Springer Publications scheduled on June 22-23, 2018 at Malla Reddy Engineering College, Hyderabad. 9. Second International Conference on Soft Computing and Signal Processing (ICSCSP-2019) in association with Springer Publications scheduled on June 21-22, 2018 at Malla Reddy Engineering College, Hyderabad. 10. Third International Conference on Soft Computing and Signal Processing (Springer ICSCSP20), Malla Reddy College of Engineering and Technology, Hyderabad, August 2020.

Faculty Awards and Recognitions

S.No.	Name of the Faculty	Designation	Details of the award and recognition
1	Dr.Swapna Raghunath	Professor	Education Expo TV Companies Rating System (EET CRS) 6 th Faculty Branding Awards – 18 “Award for Excellence in Research” in July, 2018 GNITS Star Woman of the Year, March 2022

Details of Faculty Professional Body Memberships

S. No	Faculty Name	Membership No.						
		IEEE	ISTE	IETE	IS OI	IEI	Internet Society	OTHERS
1	Dr.Swapna Raghunath			F-222219				
2	Dr.G.Srivalli	94031005	LM 71091	F-502932		F1238716	WAMS3021	
3	Y.Prakash			M-502938				

Industry interactions

Academic projects carried out by Student Projects during 2021-22

Batch No.	Roll No.	Title of the Project	Name of the Supervisor
A9	19255A0405	Compact wearable Antenna for Biomedical Telemetry Applications	Dr.G.Srivalli
	18251A0413		
	18251A0417		
A11	18251A0409	Microstrip Phased array with Beam Scanning for Satellite Applications	Dr.G.Srivalli
	18251A0451		
	18251A0425		
	18251A0411		
C7	18251A04C7	Design and Analysis of Dual Circular Polarized Antenna	Mrs.N.Krishna Jyothi
	18251A04E5		
	18251A04D7		
	18251A04J0		
C8	18251A04E6	Micro Strip Patch Antenna Based On FSS Using HFSS	Mrs.N.Krishna Jyothi
	18251A04E9		
	18251A04G8		
	19255A0415		

Any other Information like News Paper clippings

