Department of Electrical and Electronics Engineering

Personal Details	
Name:	Dr.Theresa Cenate C F
Designation:	Professor
Educational Qualification:	M.E., Ph.D.
Experience:	20 years
Area of Specialization:	Image Processing, Artificial Intelligence

Educational Details

S.No.	Degree	Branch/Specialization	Institute/University	Year
1	B.E	Electrical and Electronics Engineering	Institute of Road and Transport Technology, Erode	1999
2	M.E.	Electronics and Control	Sathyabama Institute of Ecience and Technology, Chennai	2005
3	Ph.D.	Electronics Engineering	Sathyabama Institute of Science and Technology, Chennai	2017

Publication Details

International Journal

1.   **C.F.Theresa Cenate**, B.Sheela Rani, R.Ramadevi, D.N.Sangeetha, B.Venkatraman, "Optimization of the Cascade Feed Forward Back Propagation Network for Defect Classification in Ultrasonic Images", Russian Journal of Nondestructive Testing,   ISSN No: 1061-8309 (Web of Science), 2016, Vol. 52, No. 10, pp. 605–616, Impact Factor 0.492. © Pleiades Publishing, Ltd.

2. **C.F.Theresa Cenate**, B.Sheela Rani, B.Venkatraman "Image Processing Algorithm for Quantitative Characterization of Austenitic Stainless Steel Weld Defect in TOFD Images and Validation with Radiographs", International Journal of Applied Engineering Research ISSN No: 0973-4562 Volume 10, Number 11 (2015) pp. 27763-27768 , SJR - 0.127.   © Research India Publications (Scopus)

National Journal

1. S.Parthasarathy, **C.F.Theresa Cenate**, R. Alarmelumangai, M.Dhakshina Moorthy, "Deep Well Robotics Manipulator", Psychology and Education (2021) 58(4): 67-71

2. V.Gayathri, **C.F.Theresa Cenate**, G.Durgadevi, "Segmentation of Hyperspectral Images using Fodpso and Feature Extraction" , Parishodh Journal, ISSN NO:2347-6648, Volume IX, Issue I, January/2020, pp280-284

3. D.Beula, G.Durgadevi, **C.F.Theresa Cenate**, "Restoration of Images under Momentous Additive Noise", Parishodh Journal, ISSN NO:2347-6648, Volume IX, Issue I, January/2020, pp275-279

4. Angelin.J.L, C.Meenakshi, **C.F.Theresa Cenate**, "Analysis and Mitigation of Impact for Lowpower IoT Devices", Parishodh Journal, ISSN NO:2347-6648, Volume IX, Issue I, January/2020, pp285-289

5. **C.F.Theresa Cenate**, G.Durgadevi, "Region of Interest Extraction for Lung Cancer Detection in CT Scan Images" , Parishodh Journal, ISSN NO:2347-6648, Volume VIII, Issue XI, November/2019, pp167-174

6. G.Durgadevi, **C.F.Theresa Cenate**, "Histogram Based Image Segmentation Approach for Automatic Image Registration" , Parishodh Journal, ISSN NO:2347-6648, Volume VIII, Issue XI, November/2019, pp 159-166

7. D.Beula, G.Durgadevi, **C.F.Theresa Cenate**, "Neural Network based Image Restoration Technique", Parishodh Journal, ISSN NO:2347-6648, Volume VIII, Issue XI, November/2019, pp 148-153

8. **C.F.Theresa Cenate**, B.Sheela Rani, D.N.Sangeetha, B.Venkatraman, "Comparative Study of Diverse Techniques for Flaw Segmentation in TOFD Images of Austenitic Stainless Steel Weld", **Indian Journal of Science and Technology**, Vol. 8(30), 78322, November 2015 , SJR – 0.234.
DOI: 10.17485/ijst/2015/v8i1/78322, ISSN (Print): 0974-6846, ISSN (Online): 0974-5645
http://www.indjst.org/index.php/indjst/article/view/78322 (Scopus)

International Conference

1. **C.F.Theresa Cenate,** B.Sheela Rani, B.Venkatraman and D.N.Sangeetha, "Classification of Defects in Time of Flight Diffraction (TOFD) Images Using Artificial Neural Network", **14th Asia-Pacific Conference on Non-Destructive Testing**, 14th APCNDT, Mumbai2013hosted by Indian Society for Non-Destructive Testing. http://www.ndt.net/article/apcndt2013/papers/375.pdf

2. **C.F.Theresa Cenate**, B.Sheela Rani and B.Venkataraman, "Multi scale wavelet algorithm based noise reduction in ultrasonic images at elevated temperatures", **3rd International Conference on Recent Trends in Information Technology** (ICRTIT 2013), Organised by Department of Information Technology, Madras Institute of Technology, Anna University, Chrompet, Chennai, pp.382 – 386 (Scopus) DOI 10.1109/ICRTIT.2013.6844234

National Conference

1. **C.F.Theresa Cenate**, B.Sheela Rani, D.N.Sangeetha, B.Venkataraman, Baldev Raj, "Noise Reduction In Ultrasonic Images Using Wavelet algorithm", **National Seminar on Non-Destructive Evaluation**, NDE-2010 Organised by Indian Society for Non-Destructive Testing, Kolkata Chapter, paper No 27, pp. 12

2. **C.F.Theresa Cenate**, B.Sheela Rani, B.Venkataraman, "Segmentation of Anomaly in Time of Flight Diffraction Images of Austenitic Stainless Steel Weld", **2nd National Conference on Innovative Computing Techniques** (NCICT'15), Organised by Department of CSE/IT, Dr.M.G.R. Educational and Research Institute University, Madhuravoil, Chennai pp. 118-120

Professional Society Membership

1. Life Member of, **"The Indian Society for Technical Education"**. Membership No: **LM 34490**
2. Life Member of, **"The Indian Society for Non Destructive Testing, Kalpakkam Chapter"**. Membership No: **LM 8980**
3. Member of, **"International Association of Engineers (IAENG)International Association of Engineers".** Membership No: **387539**

Events Organized

Sl. No	Position Occupied	Title of the Event	Agency Involved	Conducted by
1	ADZAP-Event Coordinator	ARDEUR'08' A National Level Technical Symposium	-	Dept. of EIE, Sathyabama University
2	Sathyabama Coordinator	ITFA-09 (Instrumentation Tech Fest – Ardeur'09), All India Level Technical Symposium	Instrument Society of India (ISOI) Students Chapter, Bangalore	Dept. of EIE, Sathyabama University
3	Sathyabama Coordinator	Interpretation Course on "Radiographic Testing"	Indian Society for Non-Destructive Testing , Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
4	Sathyabama Coordinator	Training and Certification Course on "Visual Examination ISNT Level-II"	Indian Society for Non Destructive Testing, Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
5	Organizer	Workshop on "Applications of Advanced Signal / Image Processing for Quality Assurance in Food Processing Industry by Imaging Techniques"	Sponsored by Council of Scientific and Industrial Research India	Organized by CQNDE, Sathyabama University
6	Organizer	Workshop on "Software Tools for Intelligent Processing of Images (STIP-2012)"	Sponsored by Board of Research in Fusion Science & Technology, India	Organized by CQNDE, Sathyabama University

7	Sathyabama Coordinator	Training and Certification Course on "Ultrasonic Testing - ISNT Level-II"	Indian Society for Non Destructive Testing, Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
8	Sathyabama Coordinator	Training and Certification Course on, "Penetrant Testing ISNT Level-II"	Indian Society for Non Destructive Testing, Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
9	Sathyabama Coordinator	Training and Certification Course on "Visual Examination ISNT Level-II"	Indian Society for Non Destructive Testing, Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
10	Coordinator	Workshop on "Durability and Performance Assessment of the Emerging Advanced Materials Non Destructive Evaluation" (Series I & II)	Sponsored by Board of Research in Nuclear Sciences, India	Organized by CQNDE, Sathyabama University
11	Organizer	Awareness Programme on "Training and Certification in Nondestructive Testing"	Indian Society for Non Destructive Testing, Kalpakkam Chapter, in association with NCB	CQNDE, Sathyabama University
12	Coordinator	Technical workshop on "Nondestructive Evaluation, Certification, Career and Research Prospects"	American Society for Nondestructive Testing - India Section (ASNT-I)	CQNDE, Sathyabama University

Program Attended

Sl. No	Programme	Title of the Event	Date	Organised by
1	Two days FDP	**LabVIEW for Multidisciplinary Engineering Applications & Research**	Feb. 16- 17, 2017	Sathyabama University in association with Embedded Systems Solutions
2	Short course	**QIRT –Asia Conference on Quantitative Infrared Thermography**	July 6, 2015	ISNT Kalpakkam Chapter and supported by Asia Pacific Federation for NDT
3	Workshop	**Non Destructive Testing and Evaluation**	March 20, 2016	Society of Materials Science Engineers, Dept. of Mechanical Engineering, College of Engineering Guindy, Anna University
4	Technology Awareness Workshop	**Induction Motor Efficiency Monitoring System**	Nov. 28, 2014	CSIO, Chennai Centre, CSIR Madras Complex
5	Workshop	**Time of Flight Diffraction (TOFD) Interpretation**	July 26, 2014	TWI (India) Pvt. Ltd and Olympus
6	Workshop	**Phased Array Testing**	May 22-24, 2013	Indian Society for Non-Destructive Testing, Kalpakkam Chapter, Olympus and National Certification Board

7	National level workshop	**Recent Trends and Emerging Scenario in Biomedical Engineering**	Aug. 4-6 2008	Dept. of Biomedical Engineering, Sathyabama University
8	Workshop	**Role of Embedded Systems in Industries**	Sept. 12-14, 2007	Dept. of Electronics and Instrumentation Engg., St. Peter's Engineering College, Avadi
9	Refresher course	**Modern MOS Technology – Tools and Design**	Nov. 28 to Dec. 17, 2005	Dept. of Electronics and Communication Engineering, Sathyabama Institute of Science and Technology, Deemed University
10	Short term Course	**Instructional Design and Delivery**	June 11- 13, 2005	National Institute of Technical Teachers Training & Research, Government of India, Chennai, Ministry of Human Resource Development
11	Short Term Course	**FEA and CAD for Electrical Engineering**	Nov. 11-16, 2002	Power Electronics and Drives Division, School of Electrical & Electronics Engg., College of Engineering, Anna University, Chennai
12	Short Term Course	**Recent Trends in High Voltage Testing Techniques**	Dec. 12- 18, 2001	Dept. of Electrical Engineering, Indian Institute of Technology Madras, sponsored by AICTE through ISTE
13	Development Meeting	**Indian Digital Heritage – Marine Exploration – A Case Study On Poompuhar and Dwarka**	Aug. 25– 26, 2016	Academy of Maritime Education and Training University in association with Department of Science and Technology, New Delhi
14	Educators Day	**"Educators Day 2012"** in Chennai	Oct. 16-17, 2012	National Instruments
15	Complimentary Seminar	**MATLAB & Simulink for Engineering Education**	Aug.24, 2012	Math Works India

Other Details

Expert Talk

1. Delivered an expert talk on "**Multi-resolution Analysis in NDE**" in the **CSIR Sponsored Workshop on "Applications of Advanced Signal / Image Processing for Quality Assurance in Food Processing Industry by Imaging Techniques"** in Sathyabama University, held in December 1-3, 2011.

2. Delivered an expert talk on "**Multirate Signal Processing**" in **Faculty Development Program on EC 2302 - Digital Signal Processing** held in June 9-16, 2010, Sponsored by Centre for Faculty Development, Anna University, Chennai

3. Delivered a Lecture on the topic "**Digital NDE – Principles & Practices**" at the Pre-Conference tutorial session, conducted during **26th National Seminar & International Exhibition on Non-Destructive Evaluation NDE-2016** held in December 15-17, 2016 at ATF Campus,

Thiruvananthapuram.