# DIVYA BHARATHI.SM.Sc., M. Phil.,B.Ed. SET

ASSISTANT PROFESSOR

RESEARCH DEPARTMENT OF MATHEMATICS

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Thiruppachanur (post),

Villupuram, 605103.

# QUALIFICATION

- B.Sc.B.Ed, Mathematics (Pope John Paul II college of education, Pondicherry, 2014)
- M.Sc., Mathematics (Thiruvalluvar university Post graduate centre, Villupuram. 2016)
- M.Phil., Mathematics (Arignar Anna Govt. arts college, Villupuram, 2017)

# TEACHING EXPERIENCE

 Assistant Professor in Theivanai Ammal College for Women (Autonomous), Villupuram from June 2018 to till date.

# AREA OF SPECIALIZATION

- Linear Algebra
- Operations research
- Numerical analysis
- Graph theory



## **QUIZ COMPETITION AWARDS**

- Participated in "Online Quiz on "REAL ANALYSIS" conducted by Palanisamy College, Perundurai, 2020.
- Participated in the Competition on "E-Quiz on Graph Theory" conducted by Thiru Kolanjiappar Govt.Arts.College, Virudhachalam, 2020.
- Participated in the Competition on "E-Quiz:Algebra & Analysis" conducted by Bharathi Women's College(Autonomous), Chennai, 2020.
- Participated in "E-quiz on Research & publication ethics-2022 "conducted by Thiruvalluvar University 26.03.2022.
- Participated in the "E- quiz on National Mathematics Day-2K22" conducted by Hindusthan College of Arts and Science (Autonomous), Coimbatore, 2022.

### PAPER PRESENTATION/ PARTICIPATION / WORKSHOP

- Participated in National Webinar on "Fuzzy Mathematics" Organized by Gonzaga College of Arts and Science for Women, Krishnagiri District, Tamilnadu on 26 October 2022.
- Participated in the "MoE IIC Impact Series I & II" organized by SRM Institute of Science and Technology, Ramapuram Campus, Chennai on 22.07.2022 and 29.07.2022.
- Participated in International Webinar on "Plagiarism Importance, Consequence and How to avoid" Organized by the Research & Department of Mathematics, Theivanai Ammal College for Women (Autonomous), Villupuram, 08.03.2023.
- Participated in National Webinar "Prevention of Sexual Harassment of Women at Work
  Place" Organized by SRM Institute of Science and Technology 30.04.2022
- participated in the Two-Day Online National Workshop on "Mathematical Tools MATLAB & Mathematica" organized by the Division of Mathematics, School of Advanced Sciences, Vellore Institute of Technology, Chennai on 30th and 31st January 2023.
- Completed Online Abacus Faculty Training course with 100%, 11/2/202.
- Participated in one day International Webinar on Multiplicative Inverse Functional Equations and their Applications Organized by St.Joseph Arts and Science College, Cuddalore held on 29th October 2021.

- Participated in Workshop National level Workshop on "Fuzzy Mathematics and Algebraic Graphs" Krishnasamy College of Science, Arts & Management for Women, 28.09.2018.
- Presented a paper entitled on "Application of the Queueing Theory to Discrete Event Simulation" International Conference Recent Advancements in Pure and Applied Mathematics PG& Research Department of Mathematics Government Arts College (Autonomous), Kumbakonam, 25.02.2019.
- Participated in National Webinar "Analysis & its Applications" Dr.M.G.R Government arts and science college for Women 30.03.2022.
- Participated in National Workshop Mathematical techniques in fluid dynamics SRM Institute of Science and Technology 28.03.2022to 30.03.2022.
- Participated in the International Webinar on Recent Advances in Mathematical Science and its Applications held on 3rd December 2021 Organized by St. Joseph Arts and Science College Villupuram.
- Participated in National Workshop on Outcome based education-Mapping/Attainment TACW 24.11.2021.
- Participated in International Seminar on "The Role of Fourier Analysis in Signal Processing" organized by Department of Mathematics, Mangayarkarasi College of Arts and Science for women, Paravai, Madurai on 19.11.2021.
- Participated in National Webinar on Professional English Orientation Programme TACW 30.10.2021.
- Participated in the **National Level Webinar** on "Current Trends in IT" conducted by Dr.M.G.R Educational and Research Institute, Adayalampattu Phase II Campus, Chennai, 24<sup>th</sup> September 2021.
- Participated in National webinar level Workshop on "Recent Advancement in Vedic Mathematics" Krishnasamy College of Science, Arts & Management for Women, 28.09.2018.
- Attended the NAAC Sponsored One-day Online Seminar on "Qualitative & Quantitative Metrics in RAAF of NAAC" conducted by Rajalakshmi Engineering College (Autonomous), Chennai, 17<sup>th</sup> September 2021.
- Participated in the One Week Faculty Development Programme on "Software tools for Mathematical Education" Conducted by Bannari Amman Institute of Technology, Sathyamangalam and Providence College for Women, Coonoor, from 30<sup>th</sup> August 2021 to 05<sup>th</sup> September 2021.

- Participated in the Two Days National Webinar on "Dominations in Graphs" Conducted by C.Abdul Hakeem College (Autonomous), Melvisharam, 17<sup>th</sup> & 18<sup>th</sup> August 2021.
- Participated in online webinar" an innovative approach to fuzzy sets and real life applications" organized by SIMATS School of Engineering, 30.11.2022.
- Attended an expert talk on "Number theory & its Applications" as part of Ramanujan Day-2022, organized by the Department of Mathematics, SRMIST, Ramapuram, Chennai, 23rd of December 2022.
- Participated in "ENHANCED RESEARCH AWARENESS THROUGH VARIOUS FUNDING SCHEME" Organized by the Department of Electronics and Communication Engineering at Latha Mathavan Engineering College on 16 October 2021.
- Participated in National Workshop Blended Learning Through E-Assessment: Moodle SRM Institute of Science and Technology, Chennai12.08.2021 & 13.08.2021.
- Participated in One Day National Level webinar on "Research Funding" Organized by Marudhar Kesari Jain College for Women, Vaniyambadi, 09<sup>th</sup> November 2022.
- Participated in the National Workshop Innovation Ambassador Training MoE's Innovation Cell & AICTE 30.06.2021 to 30.07.2021
- Participated in the National Level webinar on "Mathematical Modeling and Social choice Theory" organized by the Department of Applied Mathematics, Shri Shankaracharya Technical Campus, Bhilai on 27<sup>th</sup> Sept.2021.
- Participated in IP Awareness/Training program under national intellectual awareness mission 4<sup>th</sup> January 2023 organized by intellectual property office, India.
- Participated in the National Webinar Frontiers of Mathematics (FDP) SRM Institute of Science and Technology 18.06.2021 & 19.06.2021.
- Attended Fifteen Days International Virtual FDP "Frontiers of Mathematics" organised by the Department of Mathematics, SRMIST, Ramapuram, Chennai, India in association with "1 Decembrie 1918 University" of Alba Iulia, Romania from 19.05.2022 to 02.06.2022.

- Participated in the Two Days Webinar on "Professional Development Programmes (PDP)"
  Conducted by Theivanai Ammal College for Women (Autonomous), Villupuram, 18th & 19th
  June 2021.
- Participated in 3 days Faculty Development Program on "Learning Basic Statistics and Data Interpretation using SPSS (Series 1)" organized by Department of Management Studies from 23/09/2021-25/09/2021.
- Participated in ISTD Academic Connect Programme on "Corporate Challenges in Management during Complexities" organised by Siddhartha Institute of Computer Sciences on 25-09-2021.
- Participated in the "Online Webinar on Role of Libraries in the Promotion of Research Activities" organized by Central Library, Gokaraju Rangaraju Institute of Engineering and Technology (Autonomous) Nizampet Road, Bachupally, Kukatpally, Hyderabad- 500090, Telangana State, India. held on 24 September 2021.
- Attended one day National workshop on "Essential of Thesis Writing and Hands on Training in Octave" conducted by Theivanai Ammal College for Women (Autonomous), Villupuram, 8th February 2019.
- Attended Workshop on "Outcome Based Education Mapping / Attainment" at Theivanai Ammal College for Women (Autonomous), Villupuram, 24th November 2021.

#### FACULTY DEVELOPMENT PROGRAM

- Participated in One Week Online Short term Faculty Development Program on "Ethics in Academic Research Writing" Organized by AMIT University from 30-01-2023 to 04-02-2023.
- Participated in seven days national online Faculty Development Program on "Research Methodology: Analysis, Tools & Techniques" organized By Internal Quality Assurance Cell and Research Department of Mathematics at Theivanai ammal college for women, Villupuram.from 28.12.2022-03.01.2023.
- Participated and completed one-week online FDP on "Recent Research Area and its Application in Mathematics" organized by Vel Tech Rangarajan Sagunthala R&D Institute of Science and Technology, Avadi, from 10th to 15th October 2022.
- Participated in Faculty Development Programme "Emphazising the Centrality Marketing to Business" organized by Jain university 20<sup>th</sup>-24<sup>th</sup> September 2021.
- Participated in Six days National Level Faculty Development Programme entitled "Enhancing Teaching and Creating an Effective Learning Process in the Contemporary Era" organised by Department of Business Administration (CA), Hindusthan College of Arts and Science, Coimbatore from 22.09.2021 to 28.09.2021.

# **PUBLICATIONS**

- 1. "A Score Function Of Hexagonal Neutrosophic Number and Its Application In Networking Problem" Wesleyan Journal of Research 0975-1386 2021.
- 2. "Supermagic Labeling Of Complete Bipartite Graphs" Wesleyan Journal of Research 0975-1386 2021.
- 3. "Numerical Double Integration Of Trapezoidal and Simpson's Rule For Unequal Data Spaces" Wesleyan Journal of Research 0975-1386 2021.
- 4. "On Direct Sum of Four Intuitionistic Fuzzy Graphs" Wesleyan Journal of Research 0975-1386 2021.
- 5. "Solution of Linear Volterra Integral Equation for Both First and Second Kind Using Laplace Transform" Wesleyan Journal of Research 0975-1386 2021.
- 6. "Application of Graph Theory in Real Life" Wesleyan Journal of Research 0975-1386 2021.
- 7. "Construction Project Planning and Analysis of Time Acceleration Using Precedence Diagram Method (PDM)" International Journal of Mechanical Engineering ISSN: 0974-5823April 2021-2022. https://kalaharijournals.com/resources/APRIL\_130.pdf
- 8. "Solving Nonlinear Volterra-Fredholm Integro-Differential Equations Using Modified Laplace Decomposition Method" International Journal of Mechanical Engineering ISSN: 0974-5823April 2021-2022. https://kalaharijournals.com/resources/APRIL\_130.pdf
- 9. "Solving Gauss Elimination Method Using Trapezoidal Fuzzy Matrices And Some Properties Of Triangular Trapezoidal Fuzzy Matrices" International Journal of Mechanical Engineering ISSN: 0974-5823 April 2021-2022 https://kalaharijournals.com/resources/APRIL\_130.pdf
- 10. "Applied Mathematical Optimization Technique on Menu Scheduling For Covid-19 Patients Using Matlab Program" International Journal of Mechanical Engineering ISSN: 0974-5823 April 2021-2022.
- 11. "Fuzzy Game Problem Using Octagonal Fuzzy Numbers" International Journal of Mechanical Engineering ISSN: 0974-5823 April 2021-2022.
- 12. "Solving Pythagorean Transportation Problem Using Arithmetic Mean and Harmonic Mean" International Journal of Mechanical Engineering ISSN: 0974-5823April 2021-2022.

# **ORGANIZATION OF EVENTS**

- Organized International Conference on "Smart and Sustainable Development in Multidisciplinary Research (SCI-VISION-2050)" at Theivanai Ammal College for Women (Autonomous), Villupuram, 9<sup>th</sup> &10<sup>th</sup> March 2023.
- Organized Invited lecture on "Basics of Intellectual Property Rights" at Research Department of Mathematics Theivanai Ammal College for Women (Autonomous), Villupuram, 11<sup>th</sup> March 2023.
- Organized one day National workshop on "Research article using LateX" conducted by Research Department of Mathematics, Theivanai Ammal College for Women (Autonomous), Villupuram, 25<sup>th</sup> January 2023.
- Organized a National Seminar on "New Developments in Domination Graphs" at Theivanai AmmalCollege for Women (Autonomous), Villupuram, 16<sup>th</sup> December 2021.
- Organized a National Seminar on "**Recent developments in Cryptography**" at Theivanai AmmalCollege for Women (Autonomous), Villupuram, 29th January 2021.
- Organized one day National workshop on "Essential of Thesis Writing and Hands on Training inOctave" conducted by Research Department of Mathematics, Theivanai Ammal College for Women (Autonomous), Villupuram, 8th February 2019.

# ACADEMIC RESONSIBILITIES (TACW)

- Time table Coordinator
- Room Allotment Coordinator for End Semester Examination
- ICT Time table.

### AWARDS AND ACHIEVEMENTS

- Awarded certificate for competency in the MOOC, Open Educational Resources for Online Learning Third offering by National Open University of Nigeria, 2022.
- Completed "LaTeX Test" Organized at Theivanai Ammal College for Women (Autonomous) by Theivanai Ammal College for Women (Autonomous) Villupuram with course material provided by the Spoken Tutorial Project, IIT.
- Exam TNSET qualified in Aril 2018 in Mathematics.