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<p>Experience</p>	<p>04 Years Teaching Experience 04 Years of Research Experience</p>
<p>Qualification</p>	<ul style="list-style-type: none"> • Ph.D. (Mathematics) 2025 Kuvempu University, Jnanasahyadri Shankaraghatta, Shivamogga (Thesis Title: Impact of similarity transformations of solutions of boundary layer flow and heat transfer problems.) • M. Sc. (Mathematics) 2018 Kuvempu University, Jnanasahyadri Shankaraghatta, Shivamogga. (Project Title: Dimensions on Graph Theory.) • B. Sc. (PCM) 2016 Vijayanagara College Hospete Vijayanagara Sri Krishnadevaraya University, Jnana Sagar, Ballary.
<p>My ID's</p>	<ul style="list-style-type: none"> • VTU Faculty ID: 2LBMAT0026411 • AICTE ID: 1-46628434702
<p>Subject Handled</p>	<p>Calculus and Linear Algebra: CSE Stream, Numerical Methods: CSE Stream, Mathematics for Civil Engineering Stream-II, Mathematics for EEE Stream-II, Mathematics for MES-II.</p>
<p>Area of Interest</p>	<p>Fluid dynamics, Similarity Transformations, Stretching sheet problems, Heat transfer through fins, Microchannel, Wavelet theory.</p>
<p>Mini Projects Guided</p>	<p>PG (10 Students)</p>

Publications (09)

Journals	09
Conferences	04

Journals

1. Sushma, B.J.Gireesha, & C. G. Pavithra., (2024). “Impact of thermal radiation on stretching sheet: a numerical approach using new similarity transformations”, *The European Physical Journal Plus*, 139.1 (2024): 98. (Springer, Q2, IF-3.8).
2. Sushma, Gireesha, B. J., & Pavithra, C. G. (2024). “Investigation of heat and mass transfer performance in Casson fluid flow over nonlinear stretching sheet: Impact of novel similarity transformations”, *Numerical Heat Transfer, Part A: Applications*, 1-20. (Taylors and Francis, Q2, IF-2.8).
3. Sushma, C.G. Pavithra, K.J. Gowtham & B.J. Gireesha, (2024). “Impact of Similarity Transformations on Hybrid Nanofluid Behavior with Thermal Radiation on Nonlinear Stretching Surface Via Hermite Wavelet Transformations”, *Radiation effects and Defects in solids*, 1-25. (Taylors and Francis, Q3, IF-1.1).
4. B.J.Gireesha, C.G.Pavithra, & Sushma, (2024). “Impact of new similarity transformation on analysis of nanoparticle shape effects on Casson nanofluid flow and heat transfer over a nonlinear stretching sheet with radiation”, *International Journal of Modelling and Simulation*, 1-32. (Taylors and Francis, Q1, IF-3.1)
5. S Sushma, B. Usha & B.J. Gireesha,(2025). “Impact of magnetic field on entropy production in porous radial fin wetted by water and engine oil-based SWCNTs and MWCNTs”, *International Journal of Ambient Energy*, 46(1), 2483536. (Taylors and Francis, Q1, IF-2.742)
6. C.G. Pavithra, B. J. Gireesha, S Sushma & K.J. Gowtham (2025). “Analysis of convective-radiative heat transfer in dovetail longitudinal fins with shape-dependent hybrid nanofluids: a study using the Hermite wavelet method”, *Applied Mathematics and Mechanics*, 46(2), 357-372. (Springer, Q1, IF-4.5)
7. C.G. Pavithra, Sushma, K.J.Gowtham, & B.J.Gireesha (2025). “Hermite wavelet method in thermal performance of porous fin in hybrid nanofluid: A comparative analysis of rectangular, triangular and convex configuration”, *International Journal of Mechanics and Materials in Design*, (Springer, Q1, IF-2.7)
8. B Usha, S Sushma, M..Keerthi, & B.J. Gireesha (2026). “Entropy generation analysis in longitudinal porous fin wetted by nanofluids with internal heat generation, convection, and radiation”, *International Journal of Ambient Energy*, (Springer, Q2, IF-2.742)
9. B.J.Gireesha, Sushma, C.G.Pavithra., & K.J.Gowtham. “Analysis of Thermal Radiation and Internal Heat Generation in Inclined Microchannel with Alloys using the Taylor Wavelet Method”, (Revsion Submitted) in the journal *International Journal of Modelling and Simulation* (Taylor and francis, Q1)

National and International Conferences

1. Sushma, & B.J.Gireesha, “**The Effect of Novel Similarity Transformations on the Stagnation Point Flow in a Different Nanofluid on a Nonlinear Stretching/Shrinking Interface**”, in *68th Conference of Indian Society of Theoretical and Applied Mechanics (ISTAM)*, held on 7th to 9th December 2023, Organized by National Institute Technology Warangal.
2. Sushma, & B.J.Gireesha, “**Impact of Thermal radiation on stretching sheet: A numerical approach using new Similarity Transformations** in *International Conference on an advanced in applied mathematics (ICAAM-2024)*, held during 10 – 11th January 2024, Organized by Department of Mathematics, University College of Science, Tumkur University, Tumkuru, Karnataka, India.
3. Sushma, & B.J.Gireesha, “**Innovative Similarity Transformations in Stagnation Point Flow of Casson Fluid over a Nonlinear Stretching Sheet**”, in INTERNATIONAL CONFERENCE ON MATHEMATICAL ANALYSIS & ITS APPLICATIONS (ICMAA-2024) held during 2nd – 04th August 2024, Organized by Department of Mathematics, Karnatak University, Dharwad, in collaboration with Pavate Institute of Mathematical Sciences (PIMSci.) and Dharwad Regional Science Centre, K.U. Campus, Dharwad.
4. Sushma, & B.J.Gireesha, “**Influence of Thermal Radiation on Nonlinear Stretching Sheet: A Numerical Study with Novel Similarity Transformations**”, in INTERNATIONAL CONFERENCE ON ADVANCES IN MATHEMATICAL SCIENCE AND THEIR TECHNOLOGICAL APPLICATIONS (ICAMSTA-2025), held during 12 – 14th December 2025, Organized by Department of Mathematics, Osmania University, Hyderabad.

FDP/Seminars/Workshops

1. One day FDP on “**Applied Mathematics (2025 Scheme)**”, organized by Department of Mathematics, Angadi Institute of Technology and Management, Belagavi, on 30th August 2025.