Name: Dr.A.MAGESH	Photo					
Designation:	Associate Professor					
Qualification:	M.Sc, M.Phil, B. Ed, Ph.D, SET					
Area of specialization:	Fluid Dynamics					
Experience:	Industrial Experience		Teaching Experience			
		0	15.6 years			
Number of workshops / FDP attended:	Number of Workshops		Number of FDPs			
/ FDF attended:	1		7			
Publications:	Conf	erence	Journal			
	National	International	National	International		
	3	2		23		
Professional Body Membership	IEEE					

## **Educational Qualifications:**

Categor y	Name of the Degree	Specialization	Year of Passin g	Name of the University	% of Marks / Grades obtained	Class obtained
UG	B.Sc	Mathematics	2006	THIRUVALLUVAR UNIVERSITY	70	I
PG	M.Sc	Mathematics	2008	THIRUVALLUVAR UNIVERSITY	73	I
	M.Phil	Mathematics	2011	THIRUVALLUVAR UNIVERSITY	75	I
PhD	PhD	Fluid Dynamics	2022	ANNA UNIVERSITY		

### **Academic Experience:**

	Designation	Joining Date	Relieving Date	Experience		
Name of the College				Years	Month s	Days
JEI Mathaajee College of Engineering	Asst Prof	15-1-2009	17-06- 2017	7	8	3
SMK Fomra Inst of Tech	Asst Prof	19-06- 2017	04-05- 2018	0	10	16
JEI Mathaajee College of Engineering	Asst Prof	05-05- 2018	30-06- 2022	4	1	27
Sri Sai Ram Engineering College	Asst Prof	01-07- 2022	31-08- 2024	2	2	0
	Asso Prof	01-09- 2024	Till date	0	3	9
				15	5	5

## Anna University Research Supervisor Ref no: 4270048

# **International Publications**

1. A.Magesh, M.Kothandapani, 2021, 'Heat and mass transfer analysis on non-Newtonian fluid motion driven by peristaltic pumping in an asymmetric curved channel', The European Physical Journal-Special Topics, 230, 1447-1464.

- 2. A.Magesh, M.Kothandapani, 2021, 'Analysis of heat and mass transfer on the peristaltic movement of Carreau nanofluids', Journal of Mechanics in Medicine and Biology, 22(1), 2150068.
- **3.** A.Magesh, M. Kothandapani, V.Pushparaj, 2021, 'Electro-Osmotic flow of Jeffrey fluid in an asymmetric micro-channel under the effect of Magnetic field', Journal of Physics: Conference Series. 1850, 012102
- **4.** A Magesh, P Praveen Kumar, P Tamizharasi, R Vijayaragavan, S Vimal Kumar and M Kothandapani,2021, 'Effect of magnetic field on the peristaltic transport of Oldroyd-B fluid in an asymmetric inclined channel', Journal of Physics: Conference Series.1850, 012111.
- **5.** P.Tamizharasi, R.Vijayaragavan, A.Magesh, 2021, 'Heat and Mass transfer analysis of the peristaltic driven flow of nanofluid in an asymmetric channel', Partial Differential Equations in Applied Mathematics 4, 100087.
- **6.** R.Vijayaragavan, P.Tamizharasi, A.Magesh, 2022, 'Brownian motion and thermoporesis effects of nanofluid flow through the peristaltic mechanism in a vertical channel', Journal of Porous Media, 25(6), 65-81.
- 7. A.Magesh, P.Tamizharasi, R. Vijayaragavan, 2022, 'MHD flow of Al2O3/H2O nanofluid under peristaltic mechanism in an asymmetric channel' Heat Transfer-Wiley, 51(7), 1-15 6563-6577.
- 8. J.Kamalakkanan, C.Dhanapal, M.Kothandapani, A.Magesh, 2023, 'Peristaltic transport of non-Newtonian nanofluid through an asymmetric microchannel with electroosmosis and thermal radiation effects', Indian Journal of Physics. 97, 2735–2744
- P.Tamizharasi, R Vijayaragavan, A Magesh, 2023, 'Electro-osmotic driven flow of Eyring Powell nanofluid in an asymmetric channel', Mathematical Methods In The Applied Sciences, 46(12), 13540-13557.
- 10. A.Magesh, P.Tamizharasi, R. Vijayaragavan, 2023, 'Non-Newtonian fluid flow with the influence of induced magnetic field through a curved channel under peristalsis', Heat Transfer, Wiley, 52 (7), 4946-4961.
- 11. Sara I Abdelsalam, A Magesh, P Tamizharasi, AZ Zaher,2023, Versatile response of a Sutterby nanofluid under activation energy: hyperthermia therapy, International Journal of Numerical Methods for Heat & Fluid Flow, https://doi.org/10.1108/HFF-04-2023-0173.

- 12. A Magesh, P.Tamizharasi, J.Kamalakkannan, 2023, 'Analysis of Bejan number and Entropy generation of Non-Newtonian nanofluid through an asymmetric microchannel' Numerical Heat Transfer, Part A: Applications, 10.1080/10407782.2023.2240507.
- 13. A Magesh, V Pushparaj, S Srinivas, P Tamizharasi, 2023, 'Numerical investigations of activation energy on the peristaltic transport of Carreau nanofluid through a curved asymmetric channel', Physics of Fluids 35 (10).
- 14. P.Praveen Kumar, S. Balakrishnan, A.Magesh, 2023, Peristaltic transport of (Al2O3 /H2O) nanofluid through a vertical asymmetric channel with MHD effects, Journal of Propulsion Technology, 44(6), 1198-1207.
- 15. R.Vijayaragavan, P.Tamizharasi, A Magesh, 2024, 'Peristaltic motion of Non-Newtonian fluid under the influence of inclined magnetic field, porous medium and chemical reaction' Scientia Iranica, Doi: 10.24200/sci.2024.59484.6270.
- 16. Yasir Akbar, Shiping Huang, A Magesh, J. Ji, Mohammad Alam, 2024, 'Thermal Analysis of Mixed Convective Peristaltic Pumping of Nanofluids in the Occurrence of an Induced Magnetic Field and Variable Viscosity', Journal of Taibah University for Science, 18 (1), 2319890,
- 17. A.Magesh, P.Tamizharasi, O.D. Makinde, S. Srinivas, 2024, 'Analysis of activation energy on the Johnson Segalman nanofluid through an asymmetric microchannel: Numerical study, International Journal of Modern Physics -B, DOI: 10.1142/S0217979225500195.
- 18. P.Praveen Kumar, S.Balakrishnan, P.Tamizharasi, A.Magesh, Sara I Abdelsalam, 2024, 'Numerical treatment of Entropy generation and Bejan number into an Electroosmoticallydriven Flow of Sutterby nanofluid in an Asymmetric Microchannel', Numerical Heat Transfer Part B: Fundamentals, DOI: 10.1080/10407790.2024.2329773
- 19. P.Praveen Kumar, S.Balakrishnan, A.Magesh, 2024, Effect of heat and mass transfer on the MHD Al2O3/H2O and Al2O3/C2H6O2 nanoliquid through an asymmetric vertical channel, Pramana-Journal of Physics. https://doi.org/10.1007/s12043-024-02814-2
- 20. Sara I Abdelsalam, A. Magesh, P. Tamizharasi, 2024, Optimizing Fluid Dynamics: An In-depth Study for Nano-Biomedical Applications with a Heat Source, Journal of Thermal Analysis and Calorimetry DOI: 10.1007/s10973-024-13472-2

- 21. P.Praveen Kumar, S. Balakrishnan, P.Tamizharasi, A.Magesh, 2024, Heat and Mass transfer investigations of Oldroyd-B fluid in a curved symmetric channel, Journal of Computational Analysis and Applications, 33,4,421-432.
- 22. P. Tamizharsi, A. Magesh, P. Praveen Kumar, 2025, Influence of electroosmosis, thermal radiation, magnetic field, and activation energy on the peristaltic motion of Hyperbolic tangent nanofluid in an asymmetric channel. *Z Angew Math Mech.* 105, e202400727 (2025). https://doi.org/10.1002/zamm.202400727
- 23. P. Tamizharsi, Y.Akbar, A. Magesh, 2025, "Impact of Activation Energy and Electroosmosis on Peristaltic Flow of Pseudoplastic Nanofluids in an Asymmetric Channel, Archive of Applied Mechanics, Doi;10.1007/s00419-025-02778.

Startup :2 days

Webinar : 3

Online Courses :2

#### Resource Person :1

Gave the invited talk in the SEVEN-DAY ONLINE FACULTY DEVELOPMENT PROGRAMME "ENHANCE AND ENABLE THE POTENTIAL OF MATHEMATICS AND STATISTICS" entitled "Peristaltic motion of nanofluid in an asymmetric channel" organized by SRM Institute of Science and Technology, Kattangulathur from 02-01-2024 to 08-01-2024