

Dr. G. LAVANYA, B.E, M.E, Ph.D.,



*Anna University, Department of Civil Engineering, University College of Engineering
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Professional Summary

Meticulous academic professional adept in maintaining student engagement and participation in both online and in-classroom contexts. Offering a solid foundation of delivering engaging student lectures and assignments illustrated over 17 years of experience. Passionate about fostering academic development and success for every student.

Area of Interest

- Geopolymer concrete
- Machine learning and network analytics
- Computer Applications in Structural Engineering
- Fatigue
- Dynamics

Awards and Honours

- Received the award, “ Women Engineering Award”, by Institution of Engineers (IEI), September 15th , 2025.
- Received silver medal in Badminton- doubles in the district level competitions for “The Tamilnadu chief minister’s trophy games” in September 2025.
- Received the award, “Inspiring Women Researcher Award” by Madras Journal Series, March 8, 2022.
- Won BEST PAPER award in National web conference on recent innovations and advancements in civil Engineering, organized by Kongunadu college Of Engineering and technology, dept of civil Engg, Thottiyam on 12-06-20
- Received the award, “Young woman in Engineering ”(Center for advanced research and design) by Venus International Foundation, VIWA 2019, , March 2, 2019
- Received the award, “Adharsh Vidhya Saraswati Rashtriya Puraskar”(National Award of excellence 2018) by Global Management council, on Dec / 2018
- Academic excellence in the subject “Repair and rehabilitation of structures” VII sem, April/May 2012.
- Secured “second rank” in M.E. Structural Engineering at Annamalai University, May 2009

Academic Responsibilities at University

- Head of the department at department of Civil Engineering, University College of Engineering Ramanathapuram from 6.9.2023
- Member of the inspection committee for granting of provisional affiliation of colleges for the academic year 2017-2018, 2019-2020, 2024-2025.
- Member of inspection squad for the April/May examination 2018, 2019, 2020, 2021,2023,2024, 2025
- Member of Anti Ragging committee
- Maintaining database on yearly basis pertaining to competitive exam, internship attended, higher studies for all department students.
- Class Advisor (2010-2014), (2014-2018), (2018-2022), (2023-2024), (2022-2026), (2024-2028)
- Identity card incharge for the year Feb 2011 to Dec 2011

Chairperson for conferences / Seminar / Technical symposia

- Delivered the lecture for AICTE approval under the VAANI scheme Seminar on “Advanced Nanotechnological Interventions in Recycling Industrial Waste for Sustainable Energy Solutions” on the topic “Photocatalytic Nanomaterials for Degradation of Industrial Pollutants and Energy Generation” on 19.11.2025 at Kongu Engineering College, perundurai.
- Served as a Jury for various events held for kalloori kalai thiruvila 2025 at Anna University , Regional campus Madurai on 08.11.2025.
- Served as a Jury for various events held for kalloori kalai thiruvila 2025 at University college of Engineering Ramanathapuram on 27.10.2025 and 28.10.2025.
- Delivered the speech on “AICTE ATAL sponsored FDP on “ Waste management: Innovations and Implementations” on 08-07-2025 at Mohamed Sathak Polytechnic college, Kilakarai.
- Delivered the speech on “ Importance of higher education as a pathway to gender equality” on 15-02-2025 at Anna University sponsored seven days NSS special camp on “ Youth my Bharath” in pullangudi village.
- Planted tree samplings on on 15-02-2025 at Anna University sponsored seven days NSS special camp in pullangudi village.
- keynote lecture for the National Seminar on “WASTE MANAGEMENT ON SMART CITIES” (ONLINE) conducted by University College of Engineering Dindugal on 13.11.24.
- Resource person for the Induction program – 2024 for first year B.E students of University College of Engineering Ramanathapuram on the topic, “ Introduction to civil Engineering” .
- keynote lecture for the Symposium conducted by University College of Engineering Dindugal on .
- Delivered the speech on “ Importance of higher education as a pathway to gender equality” on 16-02-2024 at Anna University sponsored seven days NSS special camp in pullangudi village.
- Planted tree samplings on on 16-02-2024 at Anna University sponsored seven days NSS special camp in pullangudi village.

- Resource person for the Induction program – 2020 for first year B.E students of University college of Engineering Ramanathapuram, on the topic, “ Orientation on the basics of civil Engineering”
- Resource person for the Induction program – 2020 for first year B.E students of Regional campus Madurai on the topic, “ Orientation on the basics of civil Engineering” on 10.11.2020 (online)
- keynote lecture on “Shallow Foundation” for the ONLINE FACULTY DEVELOPMENT PROGRAMME ON “Foundation Engineering, Fluid Mechanics and Structural Design for Civil Engineers (11th to 15th MAY’ 2020) conducted by SRM Valliammai Engineering College, Chennai on 12.05.20
- Chaired a session in the National conference on research advances in science and technology NCRAS 2019 at CSI college of Engineering, OOTY on 22-02-2019.
- Chaired a session in the interschool kids competition at Mohamed sathak Kabeer Public School on 03-03-2019.

Membership of Scientific and Professional Societies

- Life member of The institute of Engineers (IEI)
- Life member of Indian society of technical education (ISTE)
- Life Member of Indian Water Works Association (IWWA)

Completed B.E/M.E Projects

- a. Number of Ph.D scholars completed: 04
- b. Number of Ph.D Projects on going: 04
- c. Number of ME Projects Completed: 40
- d. Number of BE Project Completed: 30+

PhD Research Projects (completed)

- Strength, durability and structural properties of high calcium fly ash based geopolymer concrete (2016)
- Enhancement of energy efficiency and daylighting in a buildings (2021).
- Experimental Investigation on the synergistic effect of Nano Metakaolin and expansive agent on the properties of self curing self compacting concrete containing copper slag (2022)
- Engineering properties of self compacting concrete blended with various chemical and mineral admixtures (2022)
- Defining livability from user surveys and road network analytics with machine learning models. (2025)

PhD Research Projects (On going)

- Flexural and impact behavior of geopolymer roof panels reinforced with GEOGRIDS
- Building information modelling in structural engineering
- Sustainable alternative for Geopolymer.
- Environmental Impact Assessment in Environmental geotechnical Engineering.

Patent

- Steel concrete composite structure design
50xx/2021 dated 10-12-2021

Consultancy Activities

- California bearing ratio (CBR) value of the soil for the works proposed under upgradation of panchayat Union road/ Panchayat Road for the year 2022-2023 in respect of Paramakudi(H) NABARD & Rural roads, sub division from 13.04.2022 to 07.10.2022
- Material testing for the materials used in the construction of library and knowledge centre- Ramanathapuram Municipality - Ramanathapuram from 26.09.2022 to 28.09.2022
- Compressive strength test for the concrete cubes used for “Laying of 18”OD, 143 Km approx. cross country R-LNG PIPE LINE from Ramanathapuram to Tuticorin receiving terminal and associated combined station works of ETMBPL R-LNG PIPE LINE PROJECT at SV-301 @ 26.366 Km” for AL MUASER PETROLEUM SERVICES LIMITED (valuthur), Ramanathapuram. 04.03.2022
- Compressive strength test for the concrete cubes used for the pile cap in piers in constructing new Pamban bridge, for BALAJI RAILROAD SYSTEMS PRIVATE LIMITED, PAMBAN BRIDGE, MANDAPAM, Ramanathapuram. 02.03.2022
- Compressive strength test for the concrete cubes used for the pile cap in piers in constructing new Pamban bridge, for BALAJI RAILROAD SYSTEMS PRIVATE LIMITED, PAMBAN BRIDGE, MANDAPAM, Ramanathapuram. 06.01.2022
- Field density test for granular sub base for airport hanger at AGBR, INS parundu, Uchipuli, Ramanathapuram.
- Material test and Mix design done for the company, “ Sterling and Wilson”, Paramakudi
- Cement testing for the Civil and electrical works for establishment of ARC, CPWD, Rameswaram.
- Material testing and mix design for the provision of interlocking poth from watch tower along with security walls at INS parundu , RR foundation, Uchipuli.
- Mix design done for Vivek and Oberai , INS Parundu

Professional Activities

- Doctoral committee member for Ph.D scholars
- Committee member in Swachh action plan (SAP) post covid-19 measure -Sanitation and Hygiene.
- As a technical committee member in various conferences
- As an editorial member in Journals
- As an editorial member in conferences
- Editorial board member of “Glacial Journal of Scientific Research”.
- Technical Program Committee Member of ICE2ME2019, International conference on Electronical, Mechanical and Materials Engineering, January 20-21, 2019, Wuhan, China.
- Resource person in Centre for Research in Engineering & Technology (CRET), HILLGROVE RESEARCH PVT LTD, Coimbatore.
- Reviewer of various Scientific Journals

List of Seminar / Short Term Course /FDP/ Workshop attended: (Within India)

•	Two weeks Industrial training programme on “Industrial Automation & Internet of Things (IoT)” at the Industry 4.0 Centre (Govt. ITI), Skill India, Ramanathapuram, during the period 19.12.2025 to 03.01.2026.
•	One week FDP on “Artificial Intelligence in multidisciplinary research from 15.12.25 to 21.12.2025 organised by Xavier Institute for research and development
•	ATAL sponsored Faculty Development Program on Climate-Responsive Design and Sustainable Energy Systems in Civil Engineering at University of Visvesvaraya College of Engineering from 20/10/2025 to 25/10/2025 (online).
•	8 module course MOOC conducted by NITTTR through SWAYAM portal (online) during the period April 2024 to May 2024.
•	One week FEP on “ Prefabricated structures CE 3003” conducted by University College of Engineering Pattukottai from 24.06.2024 to 29.06.2024
•	Two weeks Industrial training programme on quality control " quality control division, WRD, Madurai from 01.07.2022 to 15.07.2022
•	online course on “Modern construction materials” conducted by NPTEL through SWAYAM portal (online) during the period from 24.01.2022 to 15.04.2022.
•	online course on “Maintenance and repair of concrete structures” conducted by NPTEL through SWAYAM portal (online) during the period from 24.01.2022 to 15.04.2022.
•	online course on AICTE Incorporating Universal Human Values in Education - 5-day FDP-SI UHV Online Workshop conducted by AICTE (online) during the period from 28-02-2022 to 04-03-2022.
•	One week Faculty Development Programme on "CE 8301 - Strength of Materials I" sponsored by Anna University Chennai from 07.06.21 to 12.06.21 through online platform at University College of Engineering Ramanathapuram
•	Two weeks online international STTP on “Advances in technology and management of civil Engineering” organized by KDKCE, Nagpur from 23-06-2020 to 03-07-2020
•	One week online FDP on Sustainable Smart Cities organized by Chennai Institute of Technology, Kundrathur, Chennai from 15.06.2020 to 19.06.2020
•	Three weeks Industrial training programme on Telecom tower construction" conducted

	by BSNL-TN circle from 15.05.2020 to 05.06.2020
•	One week FDP on Advanced technologies in Infrastructure development conducted by Easwari Engineering College from 13.05.2020 to 19.05.2020
•	E-Learning webinar on water resource management organized by MAM college of Engineering and Technology, Trichy on 11.05.2020
•	Two weeks Online MHRD sponsored Course on "managing online classes and co creating MOOCS" in SWAYAM Portal organized by Teaching learning centre, Ramanujam college, University of Delhi from 20.04.2020 to 06.05.2020.
•	AICTE short term training programme on “Advanced concrete technology” conducted by P.S.R Engineering College, Sivakasi from 09.12.19 to 14.12.19.
•	2 weeks Online Course on "Remote sensing and digital image processing of satellite data" in SWAYAM Portal organised by NPTEL Online from Aug to Oct 2019.
•	2 weeks Online Course on "Transforming Instruction through Blended Classroom" in SWAYAM Portal organised by NITTTR CHENNAI from Oct to Dec 2018.
•	AICTE – ISTE sponsored faculty induction refresher program on “Modern construction materials and construction techniques” conducted by Valliammai Engineering College, Chennai from 21.05.18 to 26.05.18.
•	National level workshop on “Environmental and social impact evaluation (ESIE)” Annamalai University, from 21.04.18 to 22.04.18.
•	AICTE sponsored two week Faculty Development Programme on “Limit State Design of Steel Structures” 07.11.17 to 20.11.17. Sethu Institute of Technology, Kariapatti.
•	one week course on “Surveying Using Total station & GPS” 18.09.17 to 22.09.17. National Institute of Technical Teachers Training & Research, Chennai,
•	AICTE Approved two week Faculty Development Programme, “FDP 101X Foundation Program in ICT for education” 03.08.17 to 07.09.17. IIT Bombay X (Online course)
•	IEI sponsored All India two days seminar on “Industrial waste management in India” conducted by Vickram College of Engineering, Sivagangai from 03.08.17 to 04.08.17.
•	CSIR sponsored seminar on “Recent advances in Earthquake resistant design and structural dynamics” conducted by Valliammai Engineering College, Chennai from 16.02.17 to 17.02.17.
•	Center for faculty development sponsored Faculty development programme on “CE 6502-Foundation Engineering” at University college of Engineering Pattukottai, 06.05.16- 12.05.16, India.
•	TEQIP II sponsored Faculty development programme on “Application of GIS and remote sensing, 24.04.15- 30.04.15, Anna University, Bharathidasan Institute of Technology Tiruchirappali, Tiruchirappali, India.
•	One day workshop on “Recent advances in construction technology” conducted by Anna University of technology Madurai on 20.03.2012.
•	One day workshop on “Recent trends in Nano Scale Science and technology”, conducted by Anna University of technology Madurai on 23.11.2011.
•	Center for faculty development sponsored Faculty development programme on “CE 2306-design of RC elements at college of engineering, Guindy, 20.06.11- 26.06.11, India.
•	Faculty development programme on “Discrete and Fuzzy mathematics, 07.04.11- 08.04.11, Anna University of technology Madurai, Ramanathapuram campus, Ramanathapuram, India.
•	One day workshop on “Research methodology: objectives and approaches”, conducted by Anna University of technology Madurai on 20.12.2010.

•	Training program on ‘Advanced Course on Fatigue and Fracture’ conducted by Structural Engineering Research Centre, Chennai, 2009.
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International Conferences Presented/Participated

1.	G. Lavanya, “ An experimental investigation on sustainable substitute for binder in geopolymer”, Proceedings of the 12th International conference on Emerging trends in Engineering & Technology ‘25, Pandiyan Saraswathi Yadav Engineering College, Madurai, India, April 4 and 5, 2025.
2.	G. Lavanya, “Experimental study on the properties of self curing concrete” ”, International Conference on Emerging trends in science, technology, Engineering and management ‘24 with ISBN 9789361635793 Organized by Bharath Niketan Engineering College , Theni on 26 & 27 th , April 2024.
3.	R.Kamali, G. Lavanya, “Progressive structural collapse of multi storey building under dynamic loading using ANSYS”, 9th International Conference on Contemporary Engineering & Technology 2021, Organized by Organisation of Science & Innovative Engineering &Technology (OSIET), Chennai, India in association with, Prince. Shri Venkateshwara Padmavathy Engineering College Prince. DR.K. Vasudevan College of Engineering and Technology, 10 & 11 th , April 2021.
4.	K. MUTHUPIRIYA , G. Lavanya, “Analysis of pre stressed bridge deck in seismic zone by structural responses using Fusion 360 & with FEA software”, 9th International Conference on Contemporary Engineering & Technology 2021, Organized by Organisation of Science & Innovative Engineering &Technology (OSIET), Chennai, India in association with, Prince. Shri Venkateshwara Padmavathy Engineering College Prince. DR.K. Vasudevan College of Engineering and Technology, 10 & 11 th , April 2021.
5.	V. KARTHIKA , G. Lavanya, “Experimental investigation on M-sand concrete by using nano silica and glass fibre as admixture. ”, 9th International Conference on Contemporary Engineering & Technology 2021, Organized by Organisation of Science & Innovative Engineering &Technology (OSIET), Chennai, India in association with, Prince. Shri Venkateshwara Padmavathy Engineering College Prince. DR.K. Vasudevan College of Engineering and Technology, 10 & 11 th , April 2021.
6.	J. Madhumathi, G. Lavanya ,“Seismic analysis and design of high rise building using ETABS in different seismic zone”, 9th International Conference on Contemporary Engineering & Technology 2021, Organized by Organisation of Science & Innovative Engineering &Technology (OSIET), Chennai, India in association with, Prince. Shri Venkateshwara Padmavathy Engineering College Prince. DR.K. Vasudevan College of Engineering and Technology, 10 & 11 th , April 2021.
7.	
8.	S.Arunraj, Dr.G.Lavanya, “Modelling and Analytical Study of Strengthening the Concrete Using Composite Materials”, National Level Web Conference on “Recent Innovations and Advancements in Engineering & Technology (RIAET 2020)” organized by Department of Civil Engineering, Dr.N.G.P. Institute of Technology,Coimbatore on June 5-6, 2020.
9.	S.Arunraj, Dr.G.Lavanya, “Finite Element Analysis of Hybrid Composite Lap Joint using ANSYS Software”, National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.

10.	Guruvignesh.N, Lavanya.G, “Optimization and Static Response of Recycle Coarse Aggregate Pavement Resting on Elastic Foundation”, National conference on Advanced Construction Materials and Techniques for Sustainable Development, Organized by Chennai Institute of Technology on may30,2020. ISBN. No. 978-93-5407-630-5, pp 9-15.
11.	N.Guruvignesh, Dr.G.Lavanya, “Structural Optimization and Modelling of Recycle Coarse Aggregate Pavement Resting on Winkler Foundation” National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.
12.	M. Muruganantham, Dr.G.Lavanya, “Strength of Concrete on Partial Replacement of Fine Aggregate With Porcelain” National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.
13.	K.Priyanka, Dr.G.Lavanya, “Optimization And Static Response of Railway Sleepers By Replacing Fine Aggregate With Waste Materials” National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.
14.	A. Sivasankari, Dr.G.Lavanya, “Study on The Performance of Steel Tube Section Filled With GGBS” National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.
15.	S.Subaram, Dr.G.Lavanya, “Study on the Behaviour of Nylon Fibre in Concrete”, National Level Web Conference on “Recent Innovations and Advancements in Engineering & Technology (RIAET 2020)” organized by Department of Civil Engineering, Dr.N.G.P. Institute of Technology,Coimbatore on June 5-6, 2020.
16.	S.Subaram, Dr.G.Lavanya, “Mechanistic Analysis of Nylon Fibre in Concrete”, National Web Conference on “Recent Innovations and Advancements in Civil Engineering (RIACE-2K20)” organized by Department of Civil Engineering, Kongunadu College of Engineering and Technology, Thottiam on 12/06/2020.
17.	Study on the properties of top mix concrete, proceedings of the “International conference on trends in Engineering, technology and management (ICRTETM-2019) on 18-03-2019 at PSN College of Engineering and Technology Tirunelveli, pp.13
18.	G.Lavanya, Experimental investigation on the strength and behaviour of mild steel powder reinforced concrete”, 7 th International conference on Design and Applications of structures, drives, communicational and computing systems, ICDASDC-2019, K.L.N college of Information Technology, March 8 and 9 , 2019.
19.	Kln-7-3
20.	G.Lavanya, strength behaviour of geopolymere concrete”, 7 th International conference on Design and Applications of structures, drives, communicational and computing systems, ICDASDC-2019, K.L.N college of Information Technology, March 8 and 9 , 2019.

21.	G.Lavanya, “ Behaviour of reinforced concrete column retrofitted by carbon wrap”, 7 th International conference on Design and Applications of structures, drives, communicational and computing systems, ICDASDC-2019, K.L.N college of Information Technology, March 8 and 9 , 2019.
22.	G.Lavanya, “ study on the properties of tiles using natural materials”, 7 th International conference on Design and Applications of structures, drives, communicational and computing systems, ICDASDC-2019, K.L.N college of Information Technology, March 8 and 9 , 2019.
23.	G.Lavanya, “ Effects of curing on class C fly ash based geopolymer bricks”, National conference on research advances in science and technology NCRASST 2019, CSI college of Engineering, OOTY, 22-02-2019, pp-25
24.	G.Lavanya, “Strength characteristics of concrete paver blocks embedded with PET fibres, National conference on research advances in science and technology NCRASST 2019, CSI college of Engineering, OOTY, 22-02-2019, pp-26.
25.	G.Lavanya, “A study on the characteristics of concrete paver blocks embedded with waste plastic fibre” National conference on Recent innovations in Civil Engineering RICE’18, Mohammed Sathak Engineering College, 23-03-2018.
26.	G. Lavanya, “ Experimental study on blended cement sandcrete blocks using rice husk”, Proceedings of the 4th International conference on Emerging trends in Engineering & Technology ‘17, Pandiyan Saraswathi Yadav Engineering College, Madurai, India, March 10 and 11, 2017, PP. CE-43.
27.	G. Lavanya, “ Study on behaviour of self compacting concrete with fly ash, quarry dust and polypropylene fibre”, Proceedings of the 4th International conference on Emerging trends in Engineering & Technology ‘17, Pandiyan Saraswathi Yadav Engineering College, Madurai, India, March 10 and 11, 2017, PP. ME 13.
28.	Lavanya, G, ‘Dynamic resistance of tall buildings by using tuned mass damper’s (TMD’s) , International conference on Current research in Science and technology (SSRG-IJCE-ICCREST –Part I- 2016)
29.	Lavanya, G, ‘Experimental study on hybrid fiber reinforced concrete’ , 7th international conference on emerging technologies in civil engineering, architecture and environment engineering for global sustainability (CEAEGS-2015)), 4-5th April 2015, Jawaharlal Nehru University, New Delhi, India
30.	Lavanya .G, “Infilled double skin column made of stainless steel outer tube and mild steel inner tube”, International society for research and development, International conference of emerging technology and science march 29,2015, Coimbatore.
31.	LAVANYA G., VINOTH KUMAR M,“Experimental study on hybrid fiber reinforced concrete”, 1st International conference on advanced engineering and technology for sustainable development (ICAETSD 2015), 5-6 march 2015, Karpagam college of engineering, Coimbatore.
32.	Lavanya, G, Mehala “PARTIAL REPLACEMENT OF CEMENT BY RICE HUSK ASH IN POLYESTER FIBER REINFORCED CONCRETE”, 1st International conference on advanced engineering and technology for sustainable development (ICAETSD 2015), 5-6 march 2015, Karpagam college of engineering, Coimbatore.
33.	Lavanya, G, “Experimental study on the flexural behaviour of waste plastics (bakelite) in concrete”, 1st International conference on advanced engineering and technology for sustainable development (ICAETSD 2015), 5-6 march 2015, Karpagam college of engineering, Coimbatore.
34.	Lavanya, G, “Comparative study of flexural behavior of FRC using recycled aggregates with quarry dust”, 1st International conference on advanced engineering and technology for sustainable development (ICAETSD 2015), 5-6 March 2015, Karpagam

	college of engineering, Coimbatore
35.	Lavanya, G, “Experimental study on the behaviour of concrete infilled double skin column made of stainless steel outer tube and mild steel inner tube” ,1st International conference on advanced engineering and technology for sustainable development (ICAETSD 2015), 5-6 march 2015, Karpagam college of engineering, Coimbatore.
36.	Lavanya, G, ‘Compressive strength development with environment friendly geosynthetic materials’, TEQIP II sponsored international conference on environmental Geotechnics (ICEGEO’14)), 30-31st October 2014, Anna University, Bharathidasan Institute of Technology Tiruchirappali, Tiruchirappali, India.
37.	Lavanya, G, ‘Study on the workability and compressive strength of alkali activated fly ash concrete, international conference on Sustainable innovative techniques in civil and environmental engineering (SITCEE-2013), 5-6th June 2013, Jawaharlal Nehru University, New Delhi, India.
38.	Lavanya, G, Jegan J“ A greener review on high calcium fly ash based geopolymer”, National Conference on Engineering approach for sustainable development (STEP MACC ‘11), 27th September 2011, Anna University of Technology Tiruchirappali, Tiruchirappali, India.
39.	G. Lavanya, “Evaluation of fatigue crack growth constants for SA.333 Gr.6 steel used in nuclear power plant structures ”, Proceedings of the national conference on recent trends in mechanical Engineering, Paavai Engineering College, Namakkal, India, April 24 and 25, 2009, PP. 15 - 16.

Publications – Books

- Evaluation of Relationship between Split Tensile Strength and Compressive Strength for Geopolymer Concrete of Varying Grades and Molarity, Research India Publications, India, 978-93-86138-65-1, 2016.
- Strength, durability and structural properties of geopolymer concrete, Lambert Academic Publishing, 978-613-7-42603-6, 2018.
- Experimental and Analytical Study of Partially Replaced Waste Materials in Rigid Pavement, Akinik Publications, July, 2022

International Journals

1.	Ramya, Lavanya, G, “Nano-cellulose and biochar reinforced fly ash–ggbfs based geopolymer concrete: a sustainable pathway to enhanced strength and durability”, Revista Materia, Jnauary 2026, ISSN 1517-7076, DOI: https://doi.org/10.1590/1517-7076-RMAT-2025-0694
2.	Lavanya, G., Rajamurugadoss, J., Sujatha. V., Kachancheeri, M.S., Kannan, SPM., Gupta, R. and Sivakumar, V. 2025. “Geo-spatial dynamics and machine learning insights: SVM and RF-driven land use and cover change detection in São Paulo, Brazil ,Journal of Degraded and Mining Lands Management 12(5):8509-8523, doi:10.15243/jdmlm.2025.125.8509.
3.	Vijayaraghavan Sujatha ,Ganesan Lavanya and Ramaiah Prakash , Quantifying Liveability Using Survey Analysis and Machine Learning Model, Sustainability jan 2023, 15, 1633. https://doi.org/10.3390/su15021633

4.	Hari Ganesh M, Lavanya G, “ A Study on the Properties of High Strength Fiber Reinforced Self Curing Concrete”, International Journal for Research in Applied Science & Engineering Technology (IJRASET) ISSN: 2321-9653; IC Value: 45.98; SJ Impact Factor: 7.538 Volume 10 Issue VIII Aug 2022, pp 1594-1603
5.	A. Mathu Mathi, G. Lavanya, “Study on the Light Weight Geopolymer Concrete Made of Recycled Aggregates from Lightweight Blocks”, International Journal for Research in Applied Science & Engineering Technology (IJRASET) ISSN: 2321-9653; IC Value: 45.98; SJ Impact Factor: 7.538 Volume 10 Issue VIII August 2022, pp 1551-1559
6.	Deenadhayalan R, Lavanya G,” Study on the Behaviour of Nano Concrete Columns Wrapped with Glass Fiber Reinforced Polymer under Axial Load”, International Journal for Research in Applied Science & Engineering Technology (IJRASET) ISSN: 2321-9653; IC Value: 45.98; SJ Impact Factor: 7.538 Volume 10 Issue VIII August 2022, pp 1454-1462
7.	Kishanthini P, Lavanya G, “ Experimental Studies on Ternary Blended Concrete using GGBS and Calcined Clay”, International Journal for Research in Applied Science & Engineering Technology (IJRASET) ISSN: 2321-9653; IC Value: 45.98; SJ Impact Factor: 7.538 Volume 10 Issue VIII August 2022, pp 1463-1471
8.	R.Kamali, G.Lavanya, “Progressive Structural Collapse Of Multi-Storey Building Under Dynamic Loading Using Ansys”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, PP 1-5, July2021
9.	Dr.G.Lavanya, V.Karthika, “ EXPERIMENTAL INVESTIGATION ON M-SAND CONCRETE BY USING NANO SILICA AND GLASS FIBRE AS ADMIXTURE”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, PP 4428-4431, July2021
10.	K.Muthupiriya, Dr.G.Lavanya, “ ANALYSIS OF A PRESTRESSED BRIDGE DECK IN SEISMIC ZONE BY STRUCTURAL RESPONSES USING FUSION 360 AND WITH FEA SOFTWARE”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, PP 3011- 3015, July2021
11.	M.Nagarathinam, Dr.G.Lavanya, “ STUDY ON STRUCTURAL PERFORMANCE OF HOLLOW COLUMN WITH TRIANGULAR REINFORCEMENT”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, pp 1-5, July2021
12.	R.vishnu ram, Dr.G.Lavanya, “An experimental investigation on the mechanical properties of concrete with graphene oxide”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, pp 1-5, July2021
13.	J.Madhumathi, Dr.G.Lavanya, “ SEISMIC ANALYSIS AND DESIGN OF HIGH RISE BUILDING BY USING ETABS IN DIFFERENT SEISMIC ZONES”, International Research Journal of Engineering and Technology, Volume:08, Issue:07, p-ISSN:2395-0072, pp 2849-2853, July2021
14.	B.Sugumaran, G.Lavanya 2021, ‘Characterization study on the synergistic effect of nano metakaolin and expansive agent on the shrinkage mitigation and strength enhancement of self curing- self compacting concrete’, Romanian

	Journal of Materials, vol. 51 (2), pp. 186 – 194, ISSN-L 1583-3186. (Annexure I, Impact Factor: 0.542).
15.	Maria Antony Sebastin Vimalan, P & Lavanya, G 2021, ‘Influence of Calcined Zeolite on Physical-Mechanical Properties of Self Compacting Concrete containing Glass Powder’, Romanian Journal of Materials, vol. 51 (1), pp. 25 – 32, ISSN-L 1583-3186. (Annexure I, Impact Factor: 0.542).
16.	Maria Antony Sebastin Vimalan, P & Lavanya, G 2021, ‘Synergistic effect of lignosulfonate and nano ground granulated blast furnace slag on the properties of micro steel fiber reinforced self compacting concrete’, Materials Express, vol. 11(3), pp. 381-396, ISSN: 2158-5849. (Annexure I, Impact Factor: 1.650).
17.	S.Arunraj, G.Lavanya, “Modelling And Analytical Study of Strengthening The Concrete Using Composite Materials”, SOUTH ASIAN JOURNAL OF RESEARCH ENGINEERING SCIENCE AND TECHNOLOGY, Volume 5, Issue 03, ISSN:2455-9261, pp 1-7, July-September 2020.
18.	A. Sivasankari, Dr. G. lavanya. “Study on the Performance of Steel Tube Section Filled With GGBS”, International Journal of All Research Education and Scientific Methods (IJARESM), Volume 8, Issue 9, ISSN: 2455-6211, pp102-108, September-2020.
19.	S.Subaram, G.Lavanya, “Study on The Behaviour of Nylon Fibre In Concrete”, SOUTH ASIAN JOURNAL OF RESEARCH ENGINEERING SCIENCE AND TECHNOLOGY, Volume 5, Issue 03, ISSN:2455-9261, pp 16-25, July-September 2020.
20.	N.Guruvignesh and G.Lavanya “Experimental and Analytical Study of Partially Replaced Waste Materials in Rigid Pavement”, International Journal for Modern Trends in Science and Technology, ISSN: 2455-3778, Volume: 06, Issue No: 05, May 2020, pp 84-91.
21. L0	Maria Antony Sebastin Vimalan and Lavanya, “ Potential application of alkali activated materials as protection coatings for plaster board” International Journal of scientific technology research, Vol 9, issue 04, April 2020, ISSN 2277-8616, pp 1215-1216.
22.	Lavanya and Priyanka, “Static response and structural optimization of railway sleepers by replacing fine aggregate with waste materials”, International Journal of Scientific Research in Mathematical and Statistical Sciences, Vol.7, Issue.2, April 2020, ISSN
23.	M.Muruganatham, G.Lavanya, “BEHAVIOUR OF CONCRETE ON PARTIAL REPLACEMENT OF FINE AGGREGATE WITH PORCELAIN” ,IJRT ,Volume 5, Issue 12 , ISSN: 2349-6002, May2019, pp 1- 5
24.	Arun raj S, Dr. G.Lavanya, “MODELLING AND ANALYTICAL STUDY OF HYBRID COMPOSITE LAP JOINT” South Asian Journal of Research in Engineering Science and Technology Volume 4, Issue 11, November 2019 pp 1-5.
25.	K.Priyanka, Dr.G.Lavanya, Mrs.P.Akila,“ A Review: Structural Optimization of Railway Sleepers by Replacing Fine Aggregate with Waste Materials “,INTERNATIONAL JOURNAL OF INNOVATIVE RESEARCH IN TECHNOLOGY, Volume 6, Issue 5, ISSN: 2349-6002, pp 98-104, October 2019.
26.	Mr.N.Guruvignesh, Dr.G.Lavanya, Mrs.P.Akila, “ A Review: Experimental and Analytical Study of Partially Replaced Waste Materials in Rigid Pavement”, INTERNATIONAL JOURNAL OF INNOVATIVE RESEARCH IN TECHNOLOGY, Volume 6, Issue 5, ISSN: 2349-6002, pp 90-97, October

	2019.
27.	G. Kousalyadevi & G. Lavanya, Optimal investigation of daylighting and energy efficiency in industrial building using energy efficient velux daylighting simulation, Journal of Asian Architecture and Building Engineering, Taylor and francis, ISSN: 1346-7581 (Print) 1347-2852 (Online), Sep 2019, pp 1-15.
28.	Lavanya Ganesan, "Effects of curing on geopolymer bricks, "International Journal of Engineering research and management , IISN 2349-2058, vol 06, issue09, Sept 2019.
29.	Lavanya Ganesan and chippymol james, " strength characteristics of concrete paver blocks embedded with PET fibres", International Journal of Engineering research and management , IISN 2349-2058, vol 06, issue09, pp. 62-64, Sept 2019.
30.	Muthuselvakumar.N, Lavanya.G, Muruganantham.M , Guruvignesh.N, " Study of Properties of Geopolymer Concrete, International Research Journal of Engineering and Technology (IRJET), ISSN: 2395-0072, pp 3713-3716,2019.
31.	Dr.G.Lavanya, S.Kausalya Devi, M.Kayalvizhi, T.Nithya, R.Ramkumar, " Study on the Properties of Top Mix Concrete Pavement" International Journal of Civil Engineering, (SSRG-IJCE) – Special Issue ICRTEEM, March 2019, ISSN: 2348 – 8352, pp 1 – 4.
32.	Lavanya G and Thamizhanban S, "Experimental Investigation on the Strength and Behaviour of Mild Steel Powder Reinforced Concrete, International Journal of Recent Technology and Engineering (IJRTE) ISSN: 2277-3878, Volume-8, Issue-1, May 2019, pp 2312-2317.
33.	G.Kousalyadevi, Dr. G. Lavanya, 2019, "Comprehensive Review To Analyze The Role Of Day lighting And Its Importance Of Energy Efficiency In Industrial Buildings", Int. J. Advanced Research in Basic Engg. Sci. & Tech (IJARBEST), Vol.5, No.3, March 2019, DOI: 10.20238/IJARBEST.2019.05030014, pp 72-96.
34.	Lavanya, G, 2018, "Flexural behaviour of reinforced concrete beam by partially replacing replacing pulverised copper slag for cement", International journal of engineering science and computing", vol.8, issue 6, pp. 18316- 18320.
35.	Lavanya, G , Jegan, J & Aravindan, S, 2017, 'Seismic Effectiveness of Tall Buildings with Shear Wall and TMD's at Various Locations' , International Journal of Printing, Packaging & Allied Sciences, Vol. 5, No. 1, pp. 368-376.
36.	Lavanya, G & Jegan, J, 2016, ' Finite element modeling of high calcium fly ash based geopolymer concrete beam' International Journal of Earth Sciences and Engineering, vol -9 , no-1, pp. 201-206. (Annexure II, Serial No. 8565)
37.	Lavanya, G & Jegan, J, 2016, 'Structural behaviour of high calcium fly ash based geopolymer concrete beam' , International Journal of Advance Engineering and Research Development, Vol- 3, Issue 03, pp.
38.	Lavanya, G & Vasantha kumar P, 2016, 'Experimental Study on Paver Blocks Utilize in Pet Fibres' , International Journal of Advanced Engineering Research and Technology, Vol – 4, Issue 4, Paper Number: : 150099, (ISSN: 2348-8190)
39.	Lavanya, G & Karuppasamy, R, 2016, 'Experimental study on concrete using glass powder and granite powder', International Journal of Advanced Engineering Research and Technology, Vol - 4 Issue 4, pp.97-101.
40.	Lavanya, G & Jegan, J, 2015, 'Durability study on high calcium fly ash based geopolymer concrete', Advances in Materials Science and Engineering, DOI: 10.1155/2015/731056. (Annexure I, Serial No. 267)

41.	Lavanya, G & Jegan, J, 2015, 'Compressive strength development with environment friendly geosynthetic materials', International Journal of Earth Sciences and Engineering, vol-08, no-05, pp.256-258. (Annexure II, Serial No. 8565)
42.	Lavanya, G & Jegan, J, 2015, 'Evaluation of relationship between split tensile strength and compressive strength for geopolymer concrete of varying grades and molarity', International Journal of Applied Engineering Research, vol-10, no-15, pp. 35523-35529. (Annexure II, Serial No. 8785)
43.	Lavanya, G & Muhammed Murad K, 2015, 'Dynamic resistance of tall buildings by using tuned mass damper's – A review' , International Journal of Advance Engineering and Research Development, Vol- 2, Issue 10, pp.60-68.
44.	Lavanya, G Aravindan, S & Jegan, J, 2013, 'Study on the workability and compressive strength of alkali activated fly ash concrete ' , International Journal of civil engineering and applications, Vol- 3, Issue 03, pp. 10-15.

National Journals

- Lavanya, G & Vinoth kumar M, 2015, 'Experimental study on hybrid fiber reinforced concrete', Journal of civil engineering and environmental technology, Vol – 2, Issue 6, pp. 496-499.

Programs organised

•	ALUMNI meet for 2016 batch students at University college of Engineering Ramanathapuram on 07.02.2026.
•	TANSCHÉ sponsored kalloori kalai thiruvila 2025 at University college of Engineering Ramanathapuram on 5.11.2025
•	AICTE sponsored ATAL FDP on “Sustainable urban growth: The intersection of smart cities and mobility “from 20.01.25 to 25.01.25 through online platform at University College of Engineering Ramanathapuram.
•	Online National Seminar on “Artificial Intelligence for waste management in smart cities” on 07.11.2024 at University College of Engineering Ramanathapuram
•	Guest lecture on “Modern Construction techniques” on 26.10.2024 at University College of Engineering Ramanathapuram
•	Guest lecture on “civil engineering profession” on 19.10.2022 at University College of Engineering Ramanathapuram
•	organised program on “Let us go green to turn our campus into clean” on 23-06-22 at University College of Engineering Ramanathapuram as a part of Swachh action plan (SAP)
•	Guest lecture on “Carrier opportunities in civil Engineering” on 08.09 .2022 at University College of Engineering Ramanathapuram
•	One week Faculty Development Programme on "CE 8301 - Strength of Materials I" sponsored by Anna University Chennai from 07.06.21 to 12.06.21 through online platform at University College of Engineering Ramanathapuram
•	National level technical symposium BERYLLA '14 on 17-02-2014 at University College of Engineering Ramanathapuram
•	One day workshop on “Formwork and Estimation” on 12-10-2012 at University

