

DEPARTMENT OF MATHEMATICS

List of Publications

1. A. Arul Shantrinal, Sandi Klavžar, T. M. Rajalaxmi, and R. Sundara Rajan, An algorithm for embedding Turán graphs into incomplete hypercubes with minimum wirelength, *Journal of Graph Algorithms and Applications*, Vol. 25, no. 1, pp. 367-381, 2021, 0.39, 10.7155/jgaa.00562, Scopus.
1. K. Jagadeesh Kumar, Sandy Klavzar, R. Sundara Rajan, Indra Rajasingh, T. M. Rajalaxmi, An asymptotic relation between the wirelength of an embedding and the Wiener index, *Discrete Mathematics Letters*, 7 and 74 - 78, 2021, 10.47443/dml.2021.0063, Scopus.
2. V. Vembarasan, Passivity based on synchronization of T-S fuzzy energy resources system, *Journal of Mathematics and Computer Science-JMCS*, 25 (3) 269--283, 2022, 0.22, 10.22436/jmcs.025.03.06, 03-07-2021, Clarivate, Scopus.
3. P. Nataraj, R. Sundareswaran, V. Swaminathan, Complementary equitably totally disconnected equitable domination in graphs, *Discrete Mathematics, Algorithms and Applications*, 13(4), 2021, 0.307, 10.1142/S1793830921500439, 30-11-2020, Clarivate, Scopus.
4. Jessy Sujana G., T.M. Rajalaxmi, Indra Rajasingh and R. Sundara Rajan, Edge Forcing in Butterfly Networks, *Fundamenta Informatica*, 182 (1) and 1 - 15, 2021, 1.333, 10.3233/FI-2021-2060, Clarivate, Scopus.
5. M. Shanmugapriya , R. Sundareswaran , and P. Senthil Kumar , Heat and Mass Transfer Enhancement of MHD Hybrid Nanofluid Flow in the Presence of Activation Energy, *International Journal of Chemical Engineering*, 1-12, 2021, 2.257, <https://doi.org/10.1155/2021/9473226>, 25-08-2021, Clarivate, Scopus.
6. P. Nataraj,R. Sundareswaran , V. Swaminathan, Equitably strong non-split equitable domination in graphs, *Proyecciones* , 40(4),989-1000, 2021, 0.226, <https://doi.org/10.22199/issn.0717-6279-4497>, 10-08-2021, Scopus

7. B.Praba, M. Logeshwari, Sentiment analysis using Rough Co-zero Divisor Graph , Journal of Mathematical and Computational Science, vol. 11. No. 6 and 7372-7383, 2021, 0.22, 14-09-2021, Scopus.
8. B.Praba, M. Logeshwari, Wiener Index of Rough Co-Zero Divisor Graph O\of A Rough Semiring, Dynamic Systems and Applications , vol. 30 No. 9 and 1519 – 1544, 2021, 0.362, Clarivate.
9. Sumaiya Tasneem Z , Kalpana Gopalan, Thabet Abdeljawad, New Fixed Point Results for Generalized Θ -Contraction in Extended **Gb**-Metric Spaces with an Application, Gazi University Journal of Science, 34(3), 808-819, 2021, 10.35378/gujs.712142, Clarivate
10. R. Sundara Rajan, A. Arul Shantrinal, T.M. Rajalaxmi, Jianxi Fan, Weibei Fan, Embedding complete multipartite graphs into Cartesian product of paths and cycles, Electronic Journal of Graph Theory and Applications, 9 (2) and 507 - 525, 2021, 10.5614/ejgta.2021.9.2.21, Clarivate, Scopus.
11. Sumaiya Tasneem Zubair, Kalpana Gopalan, Thabet Abdeljawad, Bahaaeldin Abdalla , On Fuzzy Extended Hexagonal b-Metric Spaces with Applications to Nonlinear Fractional Differential Equations, Symmetry, 13, 2032, 2021,
12. Praba, S. Sophia, Laasya Subramanyam, Sasya Subramanyam, Shamitha Dev and Shruthi Arun, Prediction of Indian GDP using Grey Forecast Model, Indian Journal of Natural Sciences, 12(69) and 37116-37125, 2021.
13. V. Swaminathan,R. Sundareswaran R. Lakshmanaraj,P. Nataraj,L. Muthusubramanian, Equitable fair domination in graphs, Discrete Mathematics, Algorithms and Applications, Vol. 13, No. 6, 0.8, 10.1142, 2021.
14. S Vanitha, An M/G/1 Queue With Second Optional Service and Deterministic Repair Times, International Journal of Natural Sciences, Vol.12, Issue 69, pp 36411 - 36423, 2021, Clarivate.
15. Devaraj Ponnaian, Ankush Kumar Garg and Yugesh Shanmugam, Average and Convolution Sampling over Shift-Invariant Spaces, Complex Analysis and Operator Theory, 16 and 20, 2020, 0.843, 10.1007/s11785-021-01165-9, 30.01.2022, Clarivate and Scopus.

16. Kalpana Gopalan, Sumaiya Tasneem Zubair, Thabet Abdeljawad and Nabil Mlaiki, New Fixed Point Theorem on Triple Controlled Metric Type Spaces with Applications to Volterra - Fredholm Integro-Dynamic Equations Axioms, Axioms 2022, 11, 19. Impact Factor 2.11, 02-01-2022, Clarivate.
17. R.V. Jaikumar, R. Sundareswaran, G. Balaraman , P K Kishore Kumar, Said Broumi, Vulnerability Parameters in Neutrosophic Graphs, Neutrosophic Sets and Systems, Vol. 48, 109-121, 06.02.2022, Scopus.
18. A Daniel Raj, P Venugopal , N Padmapriya, Identification of Proper and Improper Signatures Using Graph Theory Techniques, Indian Journal Of Science And Technology, 15(6): 227-236., 2022, 1.26, doi.org/10.17485/IJST/v15i6.1913, 16-02-2022, Clarivative.
19. A.Anirudh , R. Aravind Kannan , R. Sriganesh , R. Sundareswaran, S. Sampath Kumar , M. Shanmugapriya, Said Broumi, Reliability Measures in Neutrosophic Soft Graphs, Neutrosophic Sets and Systems, 49, 2022, 22.4.2022, Scopus.
20. Sumaiya Tasneem Zubair, Kalpana Gopalan, Thabet Abdeljawad, Nabil Mlaiki, Novel fixed point technique to coupled system of nonlinear implicit fractional differential equations in complex valued fuzzy rectangular b-metric spaces, AIMS Mathematics, 7(6), 10867-10891, 2022, 1.427, 01-04-2022, Clarivate, Scopus.
21. S.Vanitha, M/G/1 Queue with Two Types of Service and Multiple Server Vacation, Indian Journal of Natural Sciences , Vol.13 / Issue 71 , pp 40187 - 40197, April - 2022, Clarivate.
22. Shwetha Srikanth, S.Sneha & N.Padmapriya, A year into the pandemic: A mathematical model and study of COVID-19 in India, Indian Journal of Public Health Research & Development, 13(1) : pp 343-353, 2022, 01-04.2022, Scopus.
23. P. Sangeetha, M. Shanmugapriya, R. Manjula, Aparna P. Vijay, K. Sooraj, Study the effect of intermediate and closer stiffener on the behaviour of the cold - formed steel

lipped channel section under axial compression, Journal of Materials and Engineering Structures, 9, 49 - 60, 2022, 0.565, Clarivate.

24. Praba B, Pooja S and Nethraa Sivakumar, Attribute based Double Bounded Rough Neutrosophic Sets in Facial Expression Detection, Neutrosophic Sets and Systems, Vol. 49 AND pp. 324-340, 2022, 2.429, Clarivate, Scopus.
25. S. Gopi Krishnaa, M. Shanmugapriya, P. Senthil Kumar, Prediction of bio-heat and mass transportation in radiative MHD Walter-B nanofluid using MANFIS model, Mathematics and Computers in Simulation, 201, 49-67, 2022, 2.463, <https://doi.org/10.1016/j.matcom.2022.05.002>, 14.05.2022, Clarivate and Scopus.
26. R Sumathi, R. Sujatha, R. Sundareswaran, Best Fuzzy Graph with Application in Fuzzy Social Network, AIP Conf. Proc., 2393, 020156, 2022, doi.org/10.1063/5.0074198, 19-05-2022, Scopus.
27. Kalpana Gopalan, Sumaiya Tasneem Zubair and Thabet Abdeljawad, New Fixed Point Theorems In Operator Valued Extended Hexagonal B-Metric Spaces, Palestine Journal of Mathematics, 11 (3), 48 - 56, 2022, Scopus.