

PG & RESEARCH DEPARTMENT OF MATHEMATICS

RESEARCH PAPERS

2020-2021

S. No	Name of the Faculty Member	Research Paper	Date of publication	Name of the Journal (referred)
1	P.Selvi, W. Ritha, J. Merline Vinotha, & I. Antonitte Vinoline,.	Economic order quantity model for sustainable inventory considering different sources of Environmental cost along with the non-environmental cost.	Dec 2020	European Journal of Molecular and Clinical Medicine
1.	Dr. W. Ritha & S. Josephine Vinnarasi	Analysis of fuzzy queuing prototypes coupled with ranking conception	June 2020	Journal of information and computational science
2.	Dr. W. Ritha & S. Josephine Vinnarasi	Exploration of M/M/C network structure with trapezoidal fuzzy numbers	June 2020	Journal of information and computational science
3.	Dr. W. Ritha & P. Selvi	An economic order quantity model with green designing cost	June 2020	Journal of information and computational science
4.	Dr. W. Ritha & P. Selvi	Environmental oriented inventory model for recycling food waste and its benefit	Oct-Dec 2020	Sambodhi

5.	K.Jayanthi and W.Ritha	Economic production quantity model with cloudy fuzzy associated cost of internet advertising to acquire customers residing worldwide with geometric programming technique	October- December 2020	Kalasarovar UGC CARE group 1 journal
6.	K.Jayanthi and W.Ritha	A new ranking principle of trapezoidal cloudy fuzzy numbers with geometric programming application of replenishment policy for economic manufacturing model with rework, multiple shipments, switching and packaging	October- December 2020	Sambodhi
7.	A. Rosa Mystica and M. Mary Mejrullo Merlin	An approach for multi criteria decision making with intuitionistic fuzzy set by integrating H-max distance measure, CODAS method and PROMETHEE techniques	October 2020	Malaya Journal of Matematik, Vol. 8, No. 4, 1930-1933,
8.	S. Arokiamary and M. Mary Mejrullo Merlin	The interplay between human emotions and beliefs: A study using Special Mixed Fuzzy relational maps (SMFRMs)	2020	Malaya Journal of Matematik

9.	S. Arokiamary and M. Mary Mejrullo Merlin	A study on human intelligence using Fuzzy Grey Relational Maps (FGRMs)	2021	IOP Conf. Series: Materials Science and Engineering
10.	J.Merline Vinotha, P.Vijayalakshmi	Multi-Objective Multi-Period Fixed Charge Solid Transportation Problem With Externalities Using Extended Vikor Approach Under Pythagorean Fuzzy Environment	Sep 2020	International Journal of Grid and Distributed Computing
11.	J.Merline Vinotha, P.Vijayalakshmi	Multi choice Ecological Intuitionistic Fuzzy Multi-Objective Transportation Problem with Non Linear cost, ,	Oct 2020	Solid State Technology
12.	J. Merline Vinotha , W.Ritha & I. Antonitte Vinoline	An Algorithm For Multi Objective Fuzzy Fractional Transportation Problem	Dec 2020	European Journal of Molecular and Clinical Medicine
13.	J.Arockia theo ¹ ,S.Merline laura ² ,S.Jerline zita ³ , S.RexlinJeyakumari*	Analyze of fuzzy inventory model with shortages utilizing Kuhn-Tucker Technique	March 2020	Advances in Mathematics:Scientific journal
14.	S.Merline laura ¹ ,S.Jerline zita ² .J.Arockia	A fuzzy inventory model with environmentally responsible waste disposal.	March 2020	Advances in Mathematics:Scientific journal

	theo ³ ,S.RexlinJeyakumari *			
15.	S.Jerline zita ¹ · J.Arockia theo ² · S.Merline laura ³ , S.RexlinJeyakumar i*	A fuzzy inventory model with permissible delay in payments.	March 2020	Advances in Mathematics:Scientific journal
16.	S. RexlinJeyakumari I.Shiny Bridgette M.Mary Jansirani A. Alphonse Anitha	Optimization of Fuzzy Inventory Model Without Shortages	December 2020	European Journal of Molecular & Clinical Medicine
17.	I. Antonitte vinoline, W.Ritha, &J.Merline vinotha	Environmentally Sustainable Inventory Model With The Impact Of Trade Credit And Partial Backordering	Dec 2020	European Journal of Molecular and Clinical Medicine
18.	S. Jonejayashree, J.Beny &P.Sagayaleeli	Common Fixed Point Theorems On Locally Contractive Mappings In B-Multiplicative Metric Spaces	Dec 2020	European Journal of Molecular and Clinical Medicine
19.	A. Mary Priya Dharsini , A. Leema Maria Prakasam& A. Jennie Sebasthy Pritha	Some Common Fixed Point Theorems For Hardy Roger Type Contraction On Partial B-Metric Spaces	Dec 2020	European Journal of Molecular and Clinical Medicine
20.	Dhanalakshmi.K, Selvarani.P &Irudaya Monica Catherine	Modified Zagreb Indices Of Product of graphs	Dec 2020	European Journal of Molecular and Clinical Medicine

21.	A. Leema Maria Prakasam, A. Mary Priya Dharsini&A. Jennie Sebasthy Pritha	Fixed Point Theorems For Integral Type F- Contractions In Complex Valued G_b -Metric Spaces	Dec 2020	European Journal of Molecular and Clinical Medicine
22.	A.Leema Maria Prakasam & M.Gunaseelan	Common Fixed Point Theorems Using CLR and E.A Properties in Complex Partial B-Metric Spaces.	June 2020	Advances in Mathematics :Scientific
23.	A. Leema Maria Prakasam, A. Mary Priya Dharsini&A. Jennie Sebasthy Pritha	Some Fixed Point theorems for multivalued $(\alpha z, \psi x, \epsilon y)$ -rational type contractive mappings	April 2020	Malaya Journal Of Matematik
24.	J. Beny, S. Jone Jayashree &P. Sagaya Leeli	A Study Of Fixed Point Theorems In S-Metric Spaces	Dec 2020	European Journal of Molecular and Clinical Medicine
25.	P. Selvarani, Dr.Dhanalakshmi & Ms.Monica	Generalization of New Degree Based Topological Indices of Silicate Network graph	2021	Journal of Physics: Conference Series
26.	P. SagayaLeeli, S.JoneJayashree, J.Beny	An Approach for Solving Fuzzy Transportation Problem using Ranking function	Dec 2020	European Journal of Molecular & Clinical Medicine

27.	A.JennieSebastPrith, A.MaryPriyadharsini, Leema Maria Prakasam	A Fixed Point Theorem For JSC- Contraction Type Mappings On Group Theory	December 2020	European Journal of Molecular & Clinical Medicine
28.	A.Saranya , I. FracinaNishandhi, F.S.Josephine	An Algorithm For Solving Hesitant Fuzzy Quadratic Fractional Transportation Problem	Dec 2020	European Journal of Molecular & Clinical Medicine
29.	A.Theresal Jeyaseeli, S. Josephine Vinnarasi	Optimizing Hexagonal Fuzzy Number EOQ Model Using Nearest interval Approximation Method	December 2020	European Journal of Molecular & Clinical Medicine
30.	S. Josephine Vinnarasi & A. Theresal Jeyaseeli	M/G/1 Queueing Model With Arbitrary Service Time Based On Fuzzy Randomness	Dec 2020	European Journal of Molecular and Clinical Medicine
31.	I.FrancinaNishandhi, A.Saranya, F.S.Josephine and P.Swetha	Integrated Three Echelon Inventory Model with Finite Manufacturing And Remanufacturin grates Along With The Transportation Cost And Packaging Cost	December 2020	European Journal of Molecular & Clinical Medicine
32.	Dr.I.FrancinaNishandhi	A production vendor – buyer inventory model with imperfect quality items considering the screening errors, budget capacity constraint along with a Karush – Khun – Tucker approach	November 2020	Solid State Technology
33.	Dr.I.FrancinaNishandhi	An economic order quantity model for growing items with imperfect quality and Budget	November 2020	Solid State Technology

		capacity constraint to limit the purchase		
34.	F.S.Josephine ,A. Saranya& I. FrancinaNishandhi	A Dynamic Method for Solving Intuitionistic Fuzzy Transportation Problem	Dec 2020	European Journal of Molecular & Clinical Medicine
35.	I. Shiny Bridgette S. RexlinJeyakumari	Comparison Between Kuhn – Tucker and Lagrangean Methods On Fuzzy Inventory Model	December 2020	European Journal of Molecular & Clinical Medicine
36.	Irudaya Monica Catherine J Dhanalakshmi K SelvaRani P	Frequency of Replacement With Maximum Effects of Electricutions and Cumulative Damages in Reliability	December 2020	European Journal of Molecular & Clinical Medicine
37.	<u>Dr.M. Mary Jansi Rani,</u> <u>A. Mubina</u> <u>Nancy and J. Shalini,</u>	N-generated T-intuitionistic fuzzy ideals of BG-algebras	October 2020	Advances in Applicable Mathematics - ICAAM2020
38.	Dr. M. Mary Jansirani&K.Jamshida	Composite Runge – Kutta Method Fourth Order For Based On Variety Of Means By Using Intuitionistic Fuzzy Differential Equations	December 2020	Palarch’s Journal Of Archaeology Of Egypt/Egyptology
39.	Dr. M. Mary Jansirani & K.Jamshida	Numerical Solutions For Solving Fivps Using Third Order Runge-Kutta Method Based On Variety Of Means	December 2020	International Journal of Engineering Research and Modern Education (IJERME)
40.	Dr. M. Mary Jansirani&K.Jamshida	Numerical Solution Of Intuitionistic Fuzzy Differential Equation Using Runge-Kutta Method	December 2020	International Journal of Scientific Research and Modern Education (IJSRME)
41.	Dr.P.Selvarani	Gourava Indices And Inverse Sum Indegree Index Of Finite	Dec 2020	Sambodhi

		Super Subdivision Of Cycle and Path Graph		
42.	Dr.W.Ritha & Ms.Rajeswari	Analytical Approach to Solve Fuzzy Queuing Theory	Jan-March-2021	Sambodhi
43.	Dr.W.Ritha & Ms.P.Yasodai	Multi Server Fuzzy Queuing Model With Erlang Service Performance Measures By L-R Method	Jan-March-2021	Sambodhi
44.	Dr.M.Mary JansiRani ,A. AlponseAnita , Dr. S.Rexiline Jayakumari , Shiny Bridjet	N-Generated T-Intuitionistic Fuzzy Subgroups	2020	PalArch's Journal of Archaeology of Egypt/ Egyptology
45.	A. Alphonse Anitha , Dr. M. Mary Jansirani , Dr. S. Rexlin Jeyakumari , I. Shiny Bridgette	K-Dimensional Intuitionistic Multi Fuzzy Subnear-Ring	2020	European Journal of Molecular & Clinical Medicine
46.	A. Leema Maria Prakasam1 And M. Gunaseelan	Common Fixed Point Theorems Using Clr And E.A. Properties In Complex Partial B-Metric Space	March 2021	Advances in Mathematics: Scientific Journal
47.	M.Fabiana Jacintha Mary and Dr.M.Mary Mejrullo Merlin	Integrated approach of superiority and inferiority ranking method with interval-valued intuitionistic fuzzy cognitive map (IVIFCM) for analyzing the Online resource tools used in teaching and Learning during Covid-19 in India	January 2021	Malaya Journal of Mathematik
48.	C. Gladia Vincy & M. Mary Mejrullo Merlin	An inquisition on post-harvest losses of food grains during storage by using an approach focused on distance measure under interval-valued intuitionistic fuzzy group decision-making.	June 2020	Malaya Journal of Mathematik

49.	M.Fabiana Jacintha Mary and Dr.M.Mary Mejrullo Merlin	A comparative study using Neutrosophic cognitive map and triangular fuzzy cognitive map for analyzing the factors for quality training of elementary education student-teachers in Tamilnadu	March 2021	Advances in Mathematics: Scientific Journal
50.	A. Rosa Mystica and M. Mary Mejrullo Merlin	An extended Topsis method based on Generalized weighted dice similarity measure and intuitionistic preference relation with intuitionistic fuzzy multi attribute decision making	October 2020	Advances in Mathematics: Scientific Journal
51.	Dr.K.Dhanalakshmi	Results on uniquely colorable digraphs	Jan 2021	Discrete Mathematics Application and Algorithms
52.	Ms.S.Jone Jayashree	Strong and Δ - convergence of Ishikawa iterates of mixed type nonexpansive mappings in hyperbolic spaces	March 2021	Journal of Analysis-Springer
53.	L.Arockia Angeline and M. Mary Mejrullo Merlin	An Analysis on Youth Unemployment and Underemployment in India using Neutrosophic Associative Triangular Fuzzy Cognitive Map model	March 2020	Compliance Engineering Journal
54.	L.Arockia Angeline and M. Mary Mejrullo Merlin	Threats of Cancer due to modernized Society – A Study on Neutrosophic Approach	October 2020	Advances in Mathematics: Scientific Journal
55.	M. Mary Mejrullo Merlin, C. Gladia Vincy, R. Aishwarya and M. Fabiana Jacintha Mary	A Study of people perspective towards Water Purification Technologies using GRA Method of Multiple Attribute Decision Making in	May 2021	Turkish Journal of Computer and Mathematics Education

		Intuitionistic Fuzzy environment		
56.	Arokiamary. S and M.Mary Mejrullo Merlin	Participatory modelling of the causal relationship between self- beliefs and personality using aggregated fuzzy relational map model and Kosko-hamming distance	May 2021	Advances in Mathematics: ScientificJournal
57.	Arokiamary. S and M.Mary Mejrullo Merlin	Exploring the causal influence ofbeliefs on mathematical competencies using an integratedapproach of Interval-valued Intuitionistic Fuzzy Relational Map and TOPSIS	May 2021	Turkish Journal of Computer and Mathematics Education
58.	Dr. A. Mary Priya Dharsini, Dr. A. Leema Maria Prakasam, Dr. A. Jennie Sebasty Pritha	Fixed point theorem in multiplicative rectangular metric spaces	April 2020	Malaya Journal of Mathematik
59.	Dr. A. Mary Priya Dharsini, Dr. A. Jennie Sebasty Pritha, Dr. A. Leema Maria Prakasam	A note on (Φ, A, B) Contractive results using comparison function on b-metric Spaces	April 2021	Advances and Application in Mathematical Sciences