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Qualifications: B. Sc., M. Sc. (Maths.), Ph.D. (D.D.U. Gorakhpur University Gorakhpur).

Area of Interest/Specialization: Fluid Dynamics, Shock Waves

Research Experience: 16 Years

Teaching Experience: 12 Years

Experience:

Assistant Professor (Deptt. of Maths., Mahatma Gandhi Post Graduate College, Gorakhpur)
18 May 2010 to till date.

Peer Reviewed Publication:

1. A Study of Shock Wave In Exothermic Chemical Reaction In Two Dimensional Flow ‘Indian Journal of Theoretical Physics 57(3) 2009, ISSN -0019-5693
2. Effect of Magnetic Field on Collapse and rebound of a gas bubble ‘Indian Journal of Theoretical Physics 58(3), 2010, ISSN -0019-5693
3. The reflection and diffraction of shock wave over a semi- circular cylinder in dusty gas ‘ Indian Journal of Theoretical Physics 59(2) ,2011, ISSN -0019-5693.
4. Magneto gas dynamic planes are in two dimensional flow ‘Indian Journal of Theoretical Physics 59(4) ,2011, ISSN -0019-5693.
5. Effect of magnetic field on two dimensional shock wave “Indian Journal of Theoretical Physics 59(3) ,2011 ISSN -0019-5693.
6. A study of detonation wave in magnetogasdynamics,’Journal of computer and mathematical sciences 3(2),2012, ISSN – 0976-5727.
7. A study of shock wave in spherical flow, ’Journal of computer and mathematical sciences 3(1),2012, ISSN – 0976-5727.

8. A study of variable energy blast wave in magnetogasdynamics, 'journal of experimental sciences' 3(1),2012, ISSN- 2218-1768.
9. A study of azimuthal modulations of the solar wind influence of magnetic field, 'Golden research thought' 3(2),2013 , ISSN – 2231-5063.
10. The propagation of strong shock waves in magnetohydrodynamics, 'Golden research thought' 4(3),2013 , ISSN – 2231-5063.
11. Effect of magnetic field on two phase gas particle flow, 'Jetir ' 7(10), 2020, ISSN- 2349-5162.
12. Effect of magnetic field on heat conducting gas in the presence of strong explosion, 'International journal of research and analytical reviews' 9(2), 2022 , ISSN – 2348-1269.
13. A mathematical formulation for control the transmission of dengue disease, 'International journal of mathematics and computer research ' 10(6), 2022, ISSN- 2320-7167.
14. A comparative study between experimental and numerical value of subharmonic acoustic resonances, 'IJSR' 11(5), 2022,2319-7064.

Paper Presented in the Conferences:

1. Effect of Magnetic Field on Collapse and rebound of a gas bubble, 'A national conference by Indian society of mathematics and mathematical science' Feb. 22-24, 2008.
2. Magnetohydrodynamics shock in multicomponent flow , 'A national conference by Indian society of mathematics and mathematical science' Feb. 20-21, 2009.
3. Planer shock waves propagating in dusty gases, 'A national conference in department of mathematics and ststistics' July. 11-12, 2009.
4. A Study of variable energy blast waves in electro static pressure, 'A national conference by Indian society of mathematics and mathematical science' Feb. 20-21, 2010.
5. Magnetogas dynamic plane shock in two dimensional flow, 'A national conference in department of mathematics and ststistics' July. 24-25, 2010.
6. The reflection and diffraction of shock wave over a semi circular cylinder in a dusty gas. 'National symposium on application of various techniques in fluid dynamics, B. S.N. V.(P.G.) college Lucknow, Feb. 10-12, 2011.
7. A study of shock wave in exothermic chemical reaction in two dymentional flow, 'A national conference by Indian society of mathematics and mathematical science' Feb. 25-26, 2012.

8. A study of variable energy blast wave in magnetogas dynamics,' 'A national conference department of applied science M.M.M.Engg college Gorakhpur, March 23-24,2012.
9. A study of azimuthal modulations of the solar wind influence of magnetic field,' A national conference Alwar institute of engg and technology and SRU, Alwar April 5-7, 2013.
10. Variable energy blast waves in presence of electric field , 'An international conference on recent innovations in science and technology RIST, July 08-09,2022.

List of published books:

1. A Text Book of ' A Glimpse of Operation Research, 2011; Vandana Prakashan, Gorakhpur.
2. A Text Book of Ordinary Differential Equations, ISBN- 978-93-81054-39-0, 2012; Neelkamal Prakashan, Gorakhpur.
3. A Text Book of Real Analysis, ISBN- 978-93-81054-48-2 , 2013; Neelkamal Prakashan, Gorakhpur
4. A Text Book of Numerical Analysis, ISBN- 978-93-81054-47-5, 2013; Neelkamal Prakashan, Gorakhpur
5. A Text Book of Complex Analysis, ISBN- 978-93-81054-46-8, 2013; Neelkamal Prakashan Gorakhpur
6. A Text Book of Mechanics, ISBN- 978-93-86201-04-1, 2016; Vandana Prakashan, Gorakhpur.
7. A Text Book of Abstract Algebra, ISBN- 978-91-925063-05-7, 2016 ; Vandana Prakashan, Gorakhpur
8. A Text Book of Mechanics, ISBN- 978-93-86201-05-8, 2016; Vandana Prakashan, Gorakhpur.
9. A Text Book of Calculus, ISBN- 978-93-86201-00-3, 2017; Vandana Prakashan, Gorakhpur.
10. A Text Book of Differential Equations and Laplace Transform , ISBN- 978-93-89242-43-0 , 2019; Krishna Prakashan Media(P)Ltd Meerut
11. A Text Book of Advanced Calculus, ISBN- 978-93-86201-10-3 , 2019; Vandana Prakashan ,Gorakhpur
12. A Text Book of Matrix and Differential Equation ISBN- 978-93-93509-08-6 , 2021; Discount Group of Publications, Gorakhpur
13. A Text Book of Differential Calculus 2021, Vandana Prakashan, Gorakhpur.

14. A Text Book of Differential Equations, 2021; Kanha Publishing House, Gorakhpur
15. A Text Book of Linear Programming and Game Theory, ISBN- 978-9386201-06-5 , 2020;Vandana Prakashan, Gorakhpur
16. A Text Book of Algebra, ISBN- 978-93-91245-03-0, 2022; Vandana Prakashan, Gorakhpur.
17. A Text Book of Mathematical Methods, ISBN- 978-81-956677-07-2, 2022; Kanha Publishing House, Gorakhpur.
18. A Text Book of Ordinary Differential Equations, ISBN- 978-93-81054-39-0 , 2012; Neelkamal Prakashan, Gorakhpur.

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