JSS MAHAVIDYAPEETHA

JSS ACADEMY OF TECHNICAL EDUCATION, NOIDA

C-20/1, Sector 62, Noida

Department of Physics

Publication Details:

2024

Journal Publications 2024

- 1. Nidhi yaduvanshi, Divya ghildiyal, Yash, Water Quality Parameters of Major Rivers of Uttar Pradesh in Winter Season in International Journal of Lakes and Rivers [IJLR], ISSN 0973-4570 Volume 17, Number 1, pp. 29-46, (2024).
- 2. Divya Ghildyal, Nidhi Yaduvanshi, Amrisha Tiwari, Monitoring Conductivity of Ganga River Water in Winter Season A Pilot study, Vidyawarta (Special Issue) pp. 166 (2024)
- 3. Manisha Chaudhry and Divya Ghildyal, Investigations of axioms of twist grain boundary phases (TGBPs) in binary mixture of liquid crystals, Int. Journal of Modern Physics B, Vol. 38, No. 01, 2450006 (2024).

- Manisha Chaudhary, Oral presentation on title," Thermo-Optical investigation of TGB Phases in Binary Mixture of Nematic and Cholesteric Liquid Crystals" in International Conference on Material Science Technology and Sustainable Environment (ICMSTSE-2024), 18-19 April, 2024.
- 2. Pratima Rajput, Oral presentation on title "Nitride Plasmonic Nanoparticles for Improved sensing of Pesticides used in Wheat Crop in India" in International Conference on Material Science Technology and Sustainable Environment (ICMSTSE-2024), 18-19 April, 2024.
- 3. Nidhi Yaduvanshi, Oral presentation on title "Study of Optical Parameters of Chalcogenide S90-xTe10Ag4Bix thin films" in International Conference on Material Science Technology and Sustainable Environment (ICMSTSE-2024), 18-19 April, 2024.
- 4. Nidhi Yaduvanshi & Divya Ghildyal, Oral presentation on MONITORING CONDUCTIVITY OF GANGA RIVER WATER IN WINTER SEASON A Pilot study in National conference on Multidiscillinary subjects by DR. H. N. SINHA ARTS

- & COMMERCE COLLEGE PATUR, DIST. AKOLA (M.S), Affliated to Sant Gadge Baba Amravatri University, Amravati on 20 March 2024.
- 5. Nidhi Yaduvanshi, Participated in 2nd International Conference on Recent Advances in Functional Materials (RAFM-2024) at ARSD College, New Delhi on March 14-16, 2024

2023

Journal Publications 2023

- **1.** Richa Verma, "Preferential Solvation in Binary Liquid Mixtures with Norbornadiene" J. Phys.: Conf. Ser. 2603 012032, 2023.
- 2. Nidhi Yaduvanshi, "Comparitive study of Physio chemical parameters of Ganga and Yamuna river at Allahabad", International journal of lakes and rivers, Volume 16, Number 1 (2023), pp. 75-82
- **3.** Divya Ghildyal, Manisha Chaudhary, Seasonal Variations of pH and Dissolved Oxygen Concentrations in Major Rivers of Uttar Pradesh, Journal of Physics: Conference Series 2570, 012013, 2023.

- Richa Verma, Presented a paper in the National Conference on Physics and Chemistry of Materials (NCPCM2023) during 16th - 18th March, 2023 in Govt Holkar Science Collge, Indore.
- 2. Nidhi Yaduvanshi, Presented a paper entitled Study of Optical Parameters of Chalcogenide Se70Sb20-x Ag10Inx thin films in the National Conference on Physics and Chemistry of Materials (NCPCM2023) during 16th 18th March, 2023 in Govt Holkar Science Collge,Indore
- 3. Nidhi Yaduvanshi, Oral presentation on a paper titled Swanepole Study of Se70Sb20-xAg10Inxin the Second National Conference On Computational and Characterization Techniques in Engineering & Sciences (CCTES23) organized by Department of Applied Science & Humanities, Rajkiya Engineering College, Ambedkar Nagar, UP, during February 27-28, 2023.
- 4. Pratima Pajput, Oral presentation on title "Comparative Analysis of Energy Transfer and molecular Decay Rates of Spherical and Non Spherical Nanoparticles" in National conference on Computational and Characterization Techniques in Engineering & Science (CCTES-23), 27-28 February, 2023.

- 5. Pratima Rajput, Oral presentation on title "Electric Field Enhancement Near Plasmonic Nitrides and Carbides based Core@shell Nanoparticle For Sensing" in International conference on Condensed Matter & Applied Physics (IIC 2023), 9-10 October, 2023.
- 6. Pratima Rajput, Oral presentation on title "ZrN Plasmonic Nanoparticles for Enhanced Fluorescence and FRET between CdTe Quantum Dots for Improved Sensing of Pesticides in Wheat crop" in International conference on Energy & Environmental Materials (INCEEM-2023), 6-9 December, 2023.
- 7. Manisha Chaudhary, Oral presentation, Enhancement the Electro-Optical, Photoluminescent and Plasmonic properties of Gold Nano Particles (GNPs) doped Cholesteric Liquid Crystals Matrix", in International conference on Energy & Environmental Materials (INCEEM-2023), 6-9 December, 2023.

Book Chapter:

- 1. Nidhi Yaduvanshi, Book chapter titled "Tauc Model Calculations for Se90Sb10-x Agx Chalcogenides" in book titled "Recent Review and Research in Physics (Volume 5)", 2023 (20Feb).
- 2. Divya Ghildyal, M.B.Santosh Kumar, Book Chapter, "Covid Lockdown Improves the Health of river Yamuna A Pilot Study", Climate Change & environmental Impact- Past, Present & Future. 2023

2022

Journal Publications 2022

- Manisha Chaudhary, Characterization of Thermal, Electro Optical and Photoluminescent of Nematic Liquid Crystal Doped with Gold Nano Particles, Materials Today: Proceedings, Vol.57, pp. 2061-66, 2022
- 2. Divya Ghildyal, Manisha Chaudhary Indira Vats, Naved Akhtar, Mukul Chauhan, Santhosh Kumar M B, Future forecasting of faecal coliforms using supervised machine learning models, after second lockdown due to sars-2 cov-2 virus, Vol. 14, pp. 1803-1814, 2022.
- 3. Pratima, Manmohan Singh Shishodia, "FRET sensing and field enhancement near spheroidal nanoparticle: Multipole spectral expansion approach", Optics Communications, Vol.519, 128391, 2022.

Conference Publication 2022

1. Exploring the possibility of Molecular Solar Thermal Energy Storage System using Kirkwood Buff Integrals, International Conference on Current Trends in Physics and

- Photonics 2022 School of Physics, Dr. Vishwanath Karad MIT World Peace University Pune
- 2. Advances in smart agriculture and biodiversity conservation for sustainable development in Jaipur National University from 4-6 march 2022.

 Pratima, Manmohan Singh Shishodia, "Energy Transfer Interactions and Sensing Characteristics of Gain Assisted and Graphene Coated Plasmonic Nanomatryoshka". Plasmonics, vol.16, 2021

Conference Publication 2021

 Oral Presentation on "Characterization of Thermal, Electro Optical and Photoluminescent of Nematic Liquid Crystal Doped with Gold Nano Particles" in International Conference on Innovation & Application in Science & Technology (ICIAST-2021) 21-23 Dec 2021.

Journal Publications 2020

- R. Verma, K. P. Singh and S. Singh, "Application of the Kirkwood Buff theory of solutions to a binary mixture of interest for Refrigeration Systems and Heat Pumps." AIP Conference Proceedings (2020 Dec)
- Pratima, Manmohan Singh Shishodia, "Forster Resonance Energy Transfer and Molecular Fluorescence near Gain Assisted Refractory Nitrides Based Plasmonic Core-Shell Nanoparticle", Plasmonics 15, 2081-2093 (2020).
 - 3. Divya Ghildyal, K.P.Singh, Pratibha Singh "Healing of Rivers During Coronavirus Lockdown in India: A Statistical Approach" International journal of Lacks and Rivers, ISSN0973-4570, Vol.13, Number-2 (2020), pp 105-119.
- Pratibha Singh, Divya Ghildyal "Utilization of Algal Consortium to Produce Biofuels and Byproducts For Reducing Pollution load Pollution", 6(2): 363-376, Spring 2020 DOI:22059/poll.2020.292916.714, Print ISSN: 2383-4501
- 5. Pratibha Singh, Divya Ghildyal "APPLICATION OF MICROBIAL FUEL CELL FOR ELECTRICITY GENERATION BY USING UTILIZING DIFFERENT WASTEWATER" Poll Res. 39 (1): 121-126 (2020)

Conference publication 2020

 Manisha Chaudhry and Shaweta Khanna, "Thermo-optical studies of TGB Phases in Binary Mixture of Liquid Crystals", International Conference On Intelligent Control and Computation For Smart Energy and Mechatronic Systems, ICCSEMS-2020, 25-26 sept 2020, JSSATE, Noida

Journal Publications 2019

- 1. R. Verma, K. P. Singh, "Evaluation of the Kirkwood Buff parameters for a High Power Tunable Dye Laser Solution" AIP Conference Proceedings 2136, 040013 (2019);
- 2. Nidhi Yaduvanshi, Deepak Kumar, Nikhil Rastogi, Ashok Kumar "Application of Single Scan Differential Scanning Calorimetry Technique for Determination of Kinetic Parameters of Crystallisation in Se-Sb-Ag", Journal of crystallisation process and technology, Vol 9, No 1 Jan 2019, 9, pp.1-11
- Nidhi Yaduvanshi, Deepak Kumar, Nikhil Rastogi, Ashok Kumar "Application of single scan differential scanning calorimetry technique for determination of kinetic parameters of crystallisation in se-in-ag, Chalcogenide letters, Vol. 16, No. 5, 201 – 207, May 2019
 - **4.** Divya Ghildyal "Study of seasonal variations between coliforms and biochemical oxygen demand (BOD) in Hindon River: a statistical approach", Int. Res. J. of Science & Engineering, 2019; Vol. 7 (4): pp. 81-91

- Ajay Mall, Shaweta Khanna, Arti Noor, "Design of Low Power Dual Edge Triggered Retention Flip-Flop for IOT Devices" in 2nd International Conference on Recent Innovations in Computing (ICRIC-2019) from 8th - 9th March, 2019 at Central University of Jammu.
- Manisha Chaudhry, "Investigation of TGB phases in binary mixture of Cholesteric Liquid Crystal, International conference on Computing, Communication and Cyber-security, 12-13th Oct, 2019, Chandigarh.

- Nidhi Yaduvanshi, Deepak Kumar, Nikhil Rastogi, "Optical Properties of Amorphous Se90Sb10-xAgx using TAUC and URBACH Model, International Journal of Engineering Technology Science and Research, Volume 4, Issue 12, pp.102-107, December 2018.
- 2. Nidhi Yaduvanshi, Deepak Kumar, Nikhil Rastogi, "OPTICAL PROPERTIES OF AMORPHOUS THIN FILMS OF Se90In10-xAgx, Journal of Non Oxide Glasses, Vol. 10, No. 2, April June 2018, p. 33 42,
- 3. Nidhi Yaduvanshi, Deepak Kumar, Nikhil Rastogi." Optical Properties of Amorphous Thin Films of Se90Sb10-xAgx, Materials Focus, Vol. 7, no 6, pp. 509–514, 2018.
- 4. Manisha Chaudhry, "Twist Grain Boundary phases in binary mixture of Liquid Crystals", World Scientific News, WSN vol. 113 (2018) 148-156.
- 5. Divya Ghildyal, "Statistical Analysis of Coliforms and Bod Levels in Hindon River at Meerut: A Pilot Study" International Journal of Lakes and Rivers. ISSN 0973-4570 Vol. 11, Number 1, (2018), pp. 13-28
- Sarish Yadava, Sphoorti Srivastava, D Kumar & A Kumar," Study of thermal stability in Se90Sb10-xAgx glassy alloys", Indian Journal of Pure & Applied Physics Vol. 56,2018
- 7. K. P. Singh and S. Singh, "Thermodynamic and acoustic properties of binary mixtures of PEGDME 250 with 1-propanol and 1- butanol at 293, 303 and 313°K" Physics and chemistry of liquids: An international journal, 2018

- Manisha Chaudhry, "Twist Grain Boundary phases in binary mixture of Nematic and Cholesteric Liquid Crystals", 2nd International Conference on Frontiers of Science & Technology, 21-22 July 2018.
- Nidhi Yaduvanshi, 3rd International Conference on Advancement in Engineering,
 Applied Science and Management (ICAEASM-2018) 27 May 2018
 (ICSSR, Chandigarh) Indian Council of Social Science ICSSR, Chandigarh.

- 3. Divya Ghildyal, "International Conference Liviable Cities: Transforming Sustainability and its challenges". Development of an Integrated Nanosensor System for Sensitive Detection of Environmental Toxins and Harmful Microbes to Achieve Smart City Approach". At Delhi University 5th 7th Feburary 2018.
- 4. PK Singh, Ritwik Tiwari, Akanksha Sharma, Shaweta Khanna, Meenakshi Sood, , "A Systematic Review on Automatic Image Caption Generation using Deep Learning", in Proceedings of 5th International Conference on "Co mputing for Sustainable Global Develop ment", held at Bharti Vidyapeeth, New delhi from 14th -16th March, 2018
- Pratima, Manmohan Singh Shishodia, "Role of Optical Gain Assisted Core-shell Plasmonic Nanoparticle in Forster Resonance Energy Transfer and Resonance Linewidth', in International Conference on Fiber optics & Photonics (PHOTONICS-2018), at IIT Delhi.
- 6. International Conference on Bio Innovation for Environment and Health (BEHSD-2018). November 27-28., 2018.

1. Manisha Chaudhry, Investigations of Twist Grain Boundary Phases in Chiral liquid Crystals, Advances in Physical Science Research, Vol.10, No.2, pp 1-07, 2017

Conference Publication 2017

 Pratima, Manmohan Singh Shishodia, "Multipole Spectral Expansion Based Closed Form Expression for Field Enhancement near Spherical & Core@shll Plasmonic Nanoparticle" in International Conference on Frontiers of Science & Technology (ICFST-2017), at Krishana Institute of engineering & Technology (KIET), Ghaziabad.

Journal Publications 2016

 Manisha Chaudhry & S.S.Bawa, "Optical and Thermo-dynamical properties of Twist Grain boundary phases in Liquid Crystals", published in Proceedings CRTMD 2016.

- N. Yaduvanshi, D. Kumar, S. Srivastava, R.K. Shukla and A. Kumar, "Optical Properties of Amorphous Se_{100-x} Bi_x Thin Films", ISST Journal of Applied Physics, Vol. 6 No. 1, (July - December 2015), p.p. 42-47,
- 2. Manisha Chaudhry & S.S.Bawa, X-Ray Investigation of Twist Grain Boundary Phases in Binary mixture of Liquid Crystals. International Journal of Engineering Technology, Management and Applied Sciences, 03, 163-171, 2015.

- 1. Manisha Chaudhry & S.S.Bawa, "X-Ray Investigation of Twist Grain Boundary Phases in Binary mixture of Liquid Crystals", (Oral presentation) International Conference on Recent Development in Engineering Science and Management ICRDESM', 17 May 2015.
- Manisha Chaudhry & S.S.Bawa, "Optical and Thermo-dynamical properties of Twist Grain boundary phases in Liquid Crystals", International Conference on Recent Trends in Materials and Devices CRTMD 15- 17 Dec 2015.
- 3. K.P.Singh. "Thermo acoustical and viscometric study of Poly ethylene glycols methyl ether methacrylate 475 with 2-methoxyethanol and 2- ethoxyethanol", National conference on interdisciplinary approaches in chemical sciences, 16 Dec 2015 at Jamia Millia Islamia, New Delhi.
- 4. K. P. Sing, "Ultrasonic, viscometric, optical and acoustical study of poly ethylene glycol dimethyl ether 150 with 1 propanol and 1 butanol at varying temperatures", International conference on emerging trends of engineering science, management and its applications, march 01, 2015 at JNU, New Delhi.
- 5. N. Yaduvanshi, D. Kumar, S. Srivastava, R.K. Shukla A. Kumar, Optical properties of amorphous Se 100-x Bi x thin films ", Vol 6, No 1 National Conference on Applied Physics and Material Science, held on February 5-6 2015, at M.D. University, Rohtak, Haryana.

1. Manisha Chaudhry, S.S.Bawa, & Anjuli Khandelwal, Dielectic Studies of Twist Grain Boundary Phases in Liquid Crystal, Advances in Physical Science Research, 1, 1-12, 2013.

Journal Publications 2009

- 1. J D Pandey, Ranjan Dey, Richa Verma, Tanuja Nautiyal, N.K. Soni and J.D. Pandey, Physics and Chemistry of Liquids, 47, No. 3, 287–295, (2009)
- 2. Anjuli Khandelwal, Manisha Chaudhry, S. S. Bawa, Optical investigations of Twist Grain Boundary Phases exhibiting Cylindrical and cone-like domain textures. Mol. Cryst. Liq., Cryst., vol. 511, pp. 59-74, 2009.

Conference Publication 2009

1. Manisha Chaudhry, Anjuli Khandelwal, S. S. Bawa, Dielectric studies of Twist Grain Boundary Phases, "16th National Conference on Liquid Crystals", Oct 26-28, 2009. Lucknow.

Journal Publications 2008

 Anjuli Khandelwal, Manisha Chaudhry, S. S. Bawa, Twist Grain Boundary Phases Giving Developable Domain Textures as Those Exhibited by Columnar Phases. Mol. Cryst. Liq.Cryst., vol.489, pp.298-309, 2008.

Conference Publication: 2007

1. Anjuli Khandelwal, Manisha Chaudhry, S. S. Bawa, Goldstone Mode behaviour in Twist Grain Boundary phases, Gordon Conference on Liquid Crystals, Colby Sawyer College, New London, New Hampshire (USA), June 10- June 15, 2007.

Conference Publication: 2006

1. Anjuli Khandelwal, Manisha Chaudhry, S. S. Bawa, K.K. Raina, "Experimental study of Twist Grain Boundary phases: the liquid crystal analog of the Abrikosov phases",

International Conference on Liquid Crystals ICLC06, Dec.05- Dec.08, 2006, University of Mumbai, Mumbai

Conference Publication: 2005

- Anjuli Khandelwal, Manisha Chaudhry, S.S. Bawa, "Twist Grain Boundary Phase of Hexatics in Liquid Crystals", 11th International Topical Meeting on the Optics of Liquid Crystals, In Florida, U.S.A, Oct 2-7 2005
- 2. Anjuli Khandelwal, Manisha Chaudhry, S. S. Bawa, 'Dielectric studies of the Soft mode and Goldstone mode in Twist Grain boundary phases' (oral) at '12th National conference on liquid crystals', 19th-21st Dec, 2005, Assam University, Silchar, Assam.

Journal Publications 2004

- 1. J D Pandey, R K Mishra and Richa Verma, J. Phys. D. Appl. Phys. 37, 1-3, (2004)
- 2. J.D. Pandey, Ranjan Dey and Richa Verma, Fluid Phase Equilibria215, 17-22, (2004)

Conference Publication: 2004

 Anjuli Khandelwal, Manisha Chaudhry & S.S. Bawa, "Calculation of new refraction parameter of some pure and mixtures of liquid crystals", Twentieth International Liquid Crystal Conference, In Lzubljana, Slovenia, July 4-9, 2004

Journal Publications 2003

1. J.D. Pandey, Ranjan Dey and Richa Verma, Phys. Chem. Liq., 14(2), 145, (2003)

Journal Publications 2001

1. J.D. Pandey and Richa Verma, Chemical Physics, 270, 429, (2001)

Journal Publications 2000

- 1. J.D. Pandey, Richa Verma and Ranjan Dey, Acoustics letters, 24, 5, 94, (2000)
- 2. J.D. Pandey, J. Chabbra, R. Dey, Vinay Sanguri and Richa Verma, Pramana Journal of Physics, 55, No.3, 433, (2000)

1. G.P. Dubey, V. Sanguri and Richa Verma, Indian journal of Pure and Applied Physics, 36, 678, (1998)