

ASHISH GIRDHAR

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Google Scholar h-index: 14

Scopus Id: 57201359313

Scopus h-index: 13

**EDUCATIONAL QUALIFICATION**

Degree	University/Board	Institute	Year of Passing	Specialization
PhD.	Thapar University	T.I.E.T, Patiala	2019	Image Processing
M.Tech	Thapar University	Thapar University, Patiala	2012	Computer Science and Applications
B.Tech	Kurukshetra University	U.I.E.T. Kurukshetra	2010	Computer Science and Engineering
XII	C.B.S.E.	O.S.D.A.V. Public School Kaithal	2006	Non-Medical
X	C.B.S.E.	O.S.D.A.V. Public School Kaithal	2004	English, Science, Maths

TEACHING EXPERIENCE

- Currently Working as Assistant Professor in department of Computer Science and Applications, **Kurukshetra University**
- Worked as **Assistant Professor** in CSE Dept. at Delhi Technological University, Delhi from 07th December 2020 to 21st November, 2022.
- Worked as **Assistant Professor** in CSE Dept. at **Thapar University**, Patiala from 17th July 2015 to 7th December, 2020.
- Worked as **Assistant Professor** in CSE Dept. at **S.L.I.E.T.** Longowal (Sangrur) from 18th July 2014 to 30th June, 2015.
- Worked as **Assistant Professor** in CSE Dept. at **Sharda University**, Greater Noida from 16th June 2012 to 17th July 2014.

SCI/SCIE PUBLICATIONS (16)

1. Pallavi Ranjan, Anukriti Kaushal, Ashish Girdhar et al. **“Revolutionizing hyperspectral image classification for limited labeled data: unifying autoencoder-enhanced GANs with convolutional neural networks and zero-shot learning”**. Earth Sci Inform 18, 216 (2025). <https://doi.org/10.1007/s12145-025-01739-7>
2. Shanu Bhardwaj, Shailender Kumar, Ashish Girdhar, **“Performance Analysis of TEVN with Ryu SDN Controller”**, Journal of Information Science and Engineering, 42(1), 2025, (IF 1.14) ISSN:

1016-2364 DOI: 10.6688/JISE.202601_42(1).0003

3. Pallavi Ranjan, Rajeev Kumar & Ashish Girdhar (2024), “**A 3D-convolutional-autoencoder embedded Siamese-attention-network for classification of hyperspectral images**”, *Neural Computing and Applications*, Volume 36, pages 8335–8354.
4. Ashish Girdhar and Vijay Kumar (2024), “**Color image encryption based on planetary encoding paradigm and 5D hyper chaotic lorenz system**”, *Computers and Electrical Engineering*, Volume 118, Part A, 2024, 109352, ISSN 0045-7906, <https://doi.org/10.1016/j.compeleceng.2024.109352>.
5. Ranjan, Pallavi, Ashish Girdhar, Rajeev Kumar and Hassan Babaie. “**A novel spectral-spatial 3D auxiliary conditional GAN integrated convolutional LSTM for hyperspectral image classification.**” *Earth Science Informatics*, 17 (2024): 5251 - 5271.
6. Shanu Bhardwaj, Ashish Girdhar (2023), “**Network Traffic Analysis in Software-Defined Networking using RYU controller**”, *Wireless Personal Communication* 132, 3, 1797–1818. <https://doi.org/10.1007/s11277-023-10680-1>
7. Ashish Girdhar, Himani Kapur and Vijay Kumar, “**Classification of White blood cell using Convolution Neural Network**” *Biomedical Signal Processing and Control* 71 (2022) 103156.
8. Pallavi Ranjan & Ashish Girdhar (2022) “**Xcep-Dense: a novel lightweight extreme inception model for hyperspectral image classification**”, *International Journal of Remote Sensing*, 43:14, 5204-5230, DOI: 10.1080/01431161.2022.2130727.
9. Pallavi Ranjan & Ashish Girdhar (2022) “**A comprehensive systematic review of deep learning methods for hyperspectral images classification**”, *International Journal of Remote Sensing*, 43:17, 6221-6306, DOI: 10.1080/01431161.2022.2133579.
10. Pallavi Ranjan & Ashish Girdhar, “**Deep Siamese Network with Handcrafted Feature Extraction for Hyperspectral Image Classification**” *Multimedia Tools and Applications* <https://doi.org/10.1007/s11042-023-15444-4>
11. Ashish Girdhar, Himani Kapur and Vijay Kumar, “**A novel grayscale image encryption approach based on chaotic maps and image blocks**”, *Applied Physics B*, February 2021, *Impact Factor-2.07*.
12. Ashish Girdhar, Himani Kapur, Vijay Kumar, Manjit Kaur, Dilbag Singh & Robertas Damasevicius, “**Effect of COVID-19 Outbreak on Urban Health and Environment**”. *Air Quality, Atmosphere & Health*, September 2020, *Impact Factor-2.87*.
13. Vijay Kumar and Ashish Girdhar, “**A 2D logistic map and Lorenz-Rossler chaotic system based RGB image encryption approach**”, *Multimedia Tools and Applications* (September 2020), *Impact Factor-2.313*.
14. Ashish Girdhar, and Vijay Kumar, “**A reversible and affine invariant 3D data hiding technique based on difference shifting and logistic map**”, *Journal of Ambient Intelligence and Humanized Computing*, (2019), PP. 1-15. *Impact Factor-4.594*
15. Ashish Girdhar, and Vijay Kumar, “**A RGB image encryption technique using Lorenz and Rossler chaotic system on DNA sequences**”, *Multimedia Tools and Applications*, Volume 77, Issue 20 (October 2018), PP. 27017-27039. *Impact Factor-2.313*
16. Ashish Girdhar, and Vijay Kumar, “**Comprehensive survey of 3D image steganography techniques**”, *IET Image Processing*, Volume 12, Issue 1(September 2017, PP. 1-10 *Impact Factor-1.995*.

CONFERENCE PUBLICATIONS (12)

1. Girdhar, A., Kait, R., Kapur, H. (2025). Design of Lightweight RNN for Human Activity Recognition on KU-HAR Dataset. In: Jain, S., Bhargava, B.K., Kalra, D., Groppe, S. (eds) Proceedings of the International Health Informatics Conference. IHIC 2023. Lecture Notes in Networks and Systems, vol 1113. Springer, Singapore. https://doi.org/10.1007/978-981-97-7190-5_22
2. R. Kait, Lokesh, T. Kumar and A. Girdhar, "Enhancing Fog Computing Performance with SqueezeNet

Approach for IoT Applications," *2024 Second International Conference on Advanced Computing & Communication Technologies (ICACCTech)*, Sonipat, India, 2024, pp. 681-688, doi: 10.1109/ICACCTech65084.2024.00114.

3. P. Ranjan, R. Kumar and A. Girdhar, "Unlocking the Potential of Unlabeled Data: Semi-Supervised Learning for Stratification of Hyperspectral Images," *2023 OITS International Conference on Information Technology (OCIT)*, Raipur, India, 2023, pp. 938-943, doi: 10.1109/OCIT59427.2023.10430513.
4. Goel, R., Girdhar, A. (2023). A Novel Image Encryption Algorithm Using Logistic and Henon Map. In: Goar, V., Kuri, M., Kumar, R., Senjyu, T. (eds) *Advances in Information Communication Technology and Computing. Lecture Notes in Networks and Systems*, vol 628. Springer, Singapore. https://doi.org/10.1007/978-981-19-9888-1_16
5. Ranjan, P., Kumar, R., & Girdhar, A. (2023). Recent CNN Advancements For Stratification of Hyperspectral Images. *2023 6th International Conference on Information Systems and Computer Networks (ISCON)*, 1-5.
6. S. Bhardwaj, S. Kumar and A. Girdhar, "Current Perspectives and Virtualisation solutions with SDN for IoT," *2023 Second International Conference On Smart Technologies For Smart Nation (SmartTechCon)*, Singapore, Singapore, 2023, pp. 77-82, doi: 10.1109/SmartTechCon57526.2023.10391403.
7. P. Ranjan and A. Girdhar, "A Comparison of Deep Learning Algorithms Dealing With Limited Samples in Hyperspectral Image Classification," *2022 OPJU International Technology Conference on Emerging Technologies for Sustainable Development (OTCON)*, Raigarh, Chhattisgarh, India, 2023, pp. 1-6, doi: 10.1109/OTCON56053.2023.10114005
8. D. Dua, A. Bhat and A. Girdhar, "A Review of Moving Object Detection Techniques for Night Time," *2023 5th International Conference on Advances in Computing, Communication Control and Networking (ICAC3N)*, Greater Noida, India, 2023, pp. 1629-1636, doi: 10.1109/ICAC3N60023.2023.10541663.
9. S. Bhardwaj and A. Girdhar, "Software-Defined Networking: A Traffic Engineering Approach," *2021 IEEE 8th Uttar Pradesh Section International Conference on Electrical, Electronics and Computer Engineering (UPCON)*, Dehradun, India, 2021, pp. 1-5, doi: 10.1109/UPCON52273.2021.9667584.
10. M. J. Singh and A. Girdhar, "Fingerprint Enhancement Using Wavelet Transformation and Differential Support Vector Machine," *2018 International Conference on Inventive Research in Computing Applications (ICIRCA)*, Coimbatore, India, 2018, pp. 651-663, doi: 10.1109/ICIRCA.2018.8597376.
11. Divya Aggarwal, Vijay Kumar, Ashish Girdhar, "Lagrangian relaxation for the vehicle routing problem with time windows" *International Conference on Intelligent Computing, Instrumentation and Control Technologies (ICICT)*, IEEE, 2017, 1601-1606.
12. Priyanka Takkar, Ashish Girdhar, VP Singh, "Image encryption algorithm using chaotic sequences and flipping", *International Conference on Computing, Communication and Automation (ICCCA)*, IEEE, 2017, 1188-1191.

NON-SCI PUBLICATIONS

1. Himani Kapur and Ashish Girdhar, “**Image Encryption approach using Ikeda map and vertical and horizontal blocks**”, *Asian Journal of Multidimensional Research*, Volume 8, Issue 3 (March 2019) PP. 81-90.
2. Himani Kapur and Ashish Girdhar, “**Tools and Techniques for recognizing temporal expressions from text: A survey**”, *Asian Journal of Multidimensional Research*, Volume 7, Issue 12 (December 2018) PP. 270-277.
3. Monty J Singh and Ashish Girdhar, “**Fingerprint Image Enhancement Techniques: A Survey**”, *International Journal of Innovations & Advancement in Computer Science*, (2018)
4. Monty J Singh and Ashish Girdhar, “**Review of Transforms used in Image Enhancement**”, *International Journal of Computer & Mathematical Sciences* (2017)
5. Himani Kapur, Ashish Girdhar and Manoj Sachan, “**Detection and normalisation of Temporal Expressions in Hindi language**”, *International Research Journal of Engineering and Technology*, Volume 4, Issue 7 (2017) PP. 1231-1235.
6. Ashish Girdhar, Sanmeet Kaur, “**Comparative Study of Different Honeypots System**”, *International Journal of Engineering Research and Development*, Volume 2, Issue 10 (August 2012), PP. 23-27.
7. Himani, Ashish Girdhar, “**Swarm Intelligence and Flocking Behavior**”, *International Journal of Computer Applications* (ISSN: 0975-8887), PP. 9-12.

STUDENTS SUPERVISED

PhD. Supervision (Completed) (02)

1. Ms. Pallavi Ranjan, “Devise and Development of Deep Learning Models for Stratification of Hyperspectral Images,” Delhi Technological University in 2024
2. Ms. Shanu Bhardwaj, “A Novel Framework for The Network Traffic Analysis Using A Controller in Software-Defined Networking” Delhi Technological University in 2026

PhD. Supervision (Ongoing) (03)

1. Ms. Disha Dua at Delhi Technological University
2. Ms. Rashmi Ranga at Kurukshetra University
3. Ms. Kajal at Kurukshetra University

M.Tech. Students Supervised (04)

1. Ms. Divya Aggarwal at Thapar Institute of Engineering & Technology, Patiala in 2017
2. Ms. Priyanka Takkar at Thapar Institute of Engineering & Technology, Patiala in 2017
3. Ms. Monty J Singh at Thapar Institute of Engineering & Technology, Patiala in 2018

B.Tech /MCA/M.Sc. Students Projects (More than 50)

FDP/STC ORGANIZED

1. Co Ordinator of One Week Online Shot-Term Programme/Faculty Development Programme on E-Content Development, Online Pedagogy and Open Educational Resources from 04-06-2025 to 10-06-2025
2. Co-Coordinator of One Week Online Short-Term Course on Cyber Crime and Cyber Security from 27th November, 2024 to 03rd December, 2024.

LECTURES DELIVERED

1. Speaker in Cyber Security Workshop Cyber Safety organized by The Milestone Senior Secondary School, Kaithal on 5th July, 2025
2. Expert speaker for the ISEA sponsored Bootcamp on Computer and Network Security Essentials held at NIT Kurukshetra during 8-13 March 2025.
3. Expert talk on 'Cyber Security Issues' in webinar organized by Computer Science Department at Guru Nanak Girls College, Yamuna Nagar on 27th February, 2025.
4. Expert talk on 'Cyber Crime and Cyber Security' organized by PM SHRI GGSSS Jakholi Adda, Kaithal on 22nd February, 2025.
5. Delivered a talk on Image Processing as a Resource Person in three-day National Level online FDP on 'Recent Trends in Science and Technology' being organized on 28.2.2022 - 02.03.2022 by Guru Nanak Khalsa College Yamuna Nagar

WORKSHOPS AND CONFERENCES ATTENDED

- 3rd International Conference on Advancements in Engineering and Technology held at Bhai Gurdas Institute of Engineering and Technology, Sangrur, March 2015.
- 6th International Conference on New Frontiers of Engineering, Science, Management and Humanities, Chandigarh, December 2017.
- International Conference on Research Trends in Engineering, Applied Science and Management, Punjab University Campus, Chandigarh, March 2018
- UGC sponsored one day workshop on Hybrid Cloud Computing & IOT, Guru Nanak Khalsa College Yamunanagar, September 2017.
- One day Inter-disciplinary National Workshop on Intellectual Property Rights Awareness & Issues in Academic Research, Guru Nanak Khalsa College Yamunanagar, February 2020.
- National Web Seminar Research Methodology Organized by Research Cell, Guru Nanak Khalsa College Yamuna Nagar, May 2020.
- International Webinar on Nanotechnology-The Way Ahead” organized by Department of Physics, Guru Nanak Khalsa College Yamuna Nagar, September 2020.
- Attended Next generation Security and analytics for Mobile Assisted RemoTe Healthcare Webinar held during 12th Jan to 14th Jan, 2021 at Department of CSE, Delhi Technological University, Delhi.
- Participated in the One-Week Online Faculty Development Program on Ethics and Values in Technical Education in Context of National Education Policy-2020 organized by Centre for Value Based Education, Delhi Technological University, Delhi during April 15th -19th, 2021
- Completed the Faculty Development Program by IIT Kanpur on Python from 1st March 2021 to 6th March 2021
- Organized online workshop on “Entrepreneurship and Innovation as Career Opportunity” on 24th November, 2021.

- Participated in two-day off-line training program for the newly recruited Assistant Professors of DTU on 29th - 30th November 2021 organized by HRDC, DTU.
- Attended Professional Development Programme on NBA Accreditation Procedures organized by NITTTR Chennai at DTU from 9th May, 2022-11th May, 2022.
- Attended Two-week interdisciplinary refresher course on “Advanced Research methodology” organized by Ramanujan College, 22nd January, 2022-5th February, 2022.

ACHIEVEMENTS AND AWARDS

- Research Excellence Award from Delhi Technological University for two years: 2021, 2022.
- Reviewer of many SCI/SCIE journals
- Cleared UGC-NET Dec, 2019 with percentile 99.96
- Cleared GATE-2015 with GATE score 492.

(ASHISH GIRDHAR)

Date: 26th January, 2026

Place: Kaithal