

Name: Dr. Gour Sundar Mitra Thakur



Department: Artificial Intelligence and Machine Learning

Contact Nos.: 9732087097

Qualifications: B. Tech, M. Tech and Ph. D

Designation: Associate Professor

VIDWAN ID: 186043

Experience (Teaching / Research / Industry, in years): 14 years

Date of Joining at the Present Institution: 01/02/2014

Examinations Cleared: NA

Qualifications Summary (Reverse chronological order):

Degree	Institute	From - To	Subjects
Ph. D	National Institute of Technology Durgapur	2011-2017	Artificial Intelligence and Soft Computing
M. Tech	J. R. N. Rajasthan Vidyapeeth University, Rajasthan	2008-2010	Computer Science
B. Tech	Dr. B. C. Roy Engineering College, Durgapur	2001-2005	Computer Science and Engineering

Experience Summary (In chronological order):

Designation	Organization	Date From –Date To
Lecturer	University Institute of Technology, Burdwan, West Bengal	Mar, 2007 – Jun, 2007
Lecturer	Durgapur Society of Management Science, Durgapur, West Bengal	Aug, 2007 – Jul, 2010
Assistant Professor	Lovely Professional University, Jalandhar, Punjab	Jul, 2010 – Dec, 2013
Assistant Professor	Dr. B. C. Roy Engineering College, Durgapur, West Bengal	Feb, 2014 – Aug, 2021
Associate Professor	Dr. B. C. Roy Engineering College, Durgapur, West Bengal	Sep, 2021-Till Date

Specialization/Research Interest: Application of Artificial Intelligence in Bio-informatics, Agriculture and Macro-economy

Awards & Recognitions

- Recognized with **Quarterly Franklin Membership** (Membership ID#FQ47377) by Editorial Board of London Journal Press in 2018
- Ranked in **AD Scientific Index 2021**
- **Teachers Appreciation Award, 2013** for the contribution in the School of Computer Science and Engineering at Lovely Professional University, Punjab.
- **Best Paper Award** in International Conference on Computing Sciences-‘WILKES 100’, 2013

Courses taught:

B.Tech: Artificial Intelligence, Advanced Algorithm, Design Analysis of Algorithm, Automata Theory, Symbolic Logic and Logic Processing, Computer Networks, Operating System, Digital Electronics, Computer Architecture, OOP with C++, OOP with JAVA, Graph Theory, E-commerce, Biometrics.

M.Tech: Soft Computing, Knowledge Base Expert System, Artificial Neural Networks, Fuzzy Logic, Real Time Systems.

Online Mode of Teaching:

- Online live class via Google Meeting, Zoom Meeting, Cisco Webex
- Audio enabled Power point presentation
- Audio-video recordings
- Text, image, audio and video communication via WhatsApp
- Continuous feedback and evaluation through google forms and WhatsApp
- Assessment through live online via, google form submission and online quiz

Publications:

Journal:

1. **Gour Sundar Mitra Thakur**, Rupak Bhattacharyya, Seema Sarkar Mondal, "Modelling Stock Portfolio Selection Problem using Dempster-Shafer Evidence Theory", Journal of King Saud University- Computer and Information Sciences, Elsevier, 2018, Vol. 30(1), pp. 223-235, ISSN 1319-1578. DOI: <http://dx.doi.org/10.1016/j.jksuci.2016.07.001>
2. **Gour Sundar Mitra Thakur**, Rupak Bhattacharyya, Seema Sarkar Mondal, "Artificial Neural Network based Model for Forecasting of Inflation in India", Fuzzy Information and Engineering, Elsevier, 2016, Vol. 8(1), pp. 87-100, ISSN 1616-8666. DOI: <http://dx.doi.org/10.1016/j.fiae.2016.03.005>
3. Kaushal Kumar, **Gour Sundar Mitra Thakur**, "Extracting Explanation from Artificial Neural Networks", International Journal of Computer Science and Information Technologies, 2012, Vol. 3 (2), pp. 3812 - 3815, ISSN 0975-9646. Link: <http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.226.842&rep=rep1&type=pdf>
4. Abhishek, **Gour Sundar Mitra Thakur**, Dolly Gupta, "Proposing Efficient Neural Network Training Model for Kidney Stone Diagnosis", International Journal of Computer Science and Information Technologies, 2012, Vol. 3 (3), pp. 3900-3904, ISSN 0975-9646. Link: <http://ijcsit.com/docs/Volume%203/vol3Issue3/ijcsit2012030312.pdf>
5. Preet Inder Singh, **Gour Sundar Mitra Thakur**, "Enhanced Password Based Security System Based on User Behaviour Using Neural Networks", International Journal of Information Engineering and Electronic Business, 2012, Vol. 2, pp. 29-35, ISSN 2074-9031. DOI: <http://10.5815/ijieeb.2012.02.05>
6. Kaushal Kumar, **Gour Sundar Mitra Thakur**, "Advanced Applications of Neural Networks and Artificial Intelligence: A Review", International Journal of Information Technology and Computer Science, 2012, Vol. 6, pp. 57-68, ISSN 2074-9015. DOI:

<http://10.5815/ijitcs.2012.06.08>

7. Dolly Gupta, **Gour Sundar Mitra Thakur**, Abhishek, "Detection of Gallbladder Stone Using Learning Vector Quantization Neural Network", International Journal of Computer Science and Information Technologies, 2012, Vol. 3 (3), pp. 3934-3937, ISSN 0975-9646. Link: <http://ijcsit.com/docs/Volume%203/vol3Issue3/ijcsit2012030319.pdf>
8. Ashima Aggarwal, **Gour Sundar Mitra Thakur**, "Techniques of Performance Appraisal- A review", International Journal of Engineering and Advanced Technology, 2013, 2(3), pp 617-621, ISSN 2278-0181.
Link: <http://citeseerx.ist.psu.edu/viewdoc/summary?doi=10.1.1.679.2130>
9. Ashima Aggarwal, **Gour Sundar Mitra Thakur**, "Design and Implementation of Fuzzy Rule Based Expert System for Employee Performance Appraisal in IT Organizations", International Journal of Intelligent Systems and Applications, 2014, Vol. 8, pp. 77-86, ISSN 2074-9058. DOI: <http://10.5815/ijisa.2014.08.09>

Conference:

1. Sudip Chatterjee, **Gour Sundar Mitra Thakur**. "Identification of the Diseased Portions of an Infected Aloe Vera Leaf by Using Image Processing and k-Means Clustering." In Proceedings of International Conference on Computational Intelligence, pp. 195-205. Springer, Singapore, 2021. DOI: https://doi.org/10.1007/978-981-16-3802-2_16
2. **Gour Sundar Mitra Thakur**, Rupak Bhattacharyya, Seema Sarkar Mondal, ParthaKar, "Ranking of Stocks Using a Hybrid DS-fuzzy System: An Application to Bombay Stock Exchange", Advanced Computing and Communication Technologies, Springer Singapore, 2016, 109-116. DOI: https://doi.org/10.1007/978-981-10-1023-1_11
3. **Gour Sundar Mitra Thakur**, Rupak Bhattacharyya, Swapan Kumar Mitra, "Fuzzy Random lambda-Mean SAD Portfolio Selection Problem: An Ant Colony Optimization Approach", ICMOC' 2010, AIP Conference preceding, 2010, pp. 553-558.
DOI: <http://10.1063/1.3516365>
4. Manjushri Pathania, **Gour Sundar Mitra Thakur**, Chandra Prakash, "Neuro Fuzzy Inference System for Rainfall Prediction over Northern India", Wilkes 100, Elsevier Proceedings, pp 115-123, 2013.
5. Chandra Prakash, Amar Singh Rathor, **Gour Sundar Mitra Thakur**, "Fuzzy based Agriculture expert system for Soyabean", Wilkes 100, Elsevier Proceedings, pp 88-96, 2013.
6. Chandra Prakash, **Gour Sundar Mitra Thakur**, Natasha Vashisht, Rajesh Kumar, "UMEED-A Fuzzy Rule-Based Legal Expert System to Address Domestic Violence Against Women", Bhatia S., Mishra K., Tiwari S., Singh V. (eds) Advances in Computer

Book: NA

Book Chapter:

1. Sudip Chatterjee, **Gour Sundar Mitra Thakur**, and Shyamapriya Chowdhury. "Diagnosis and Treatment of Cardiac Patients During the Pandemic Situation Due to COVID-19: Exploring Possible Application of MIoT." In *Medical Internet of Things*, pp. 147-159. Chapman and Hall/CRC, 2021, ISSN: 9780429318078.

Supervision of Ph.D/M.Tech / B.Tech Projects:

M. Tech Thesis

1. Arpita Roy (120011515002), Gour Sundar Mitra Thakur, "Fuzzy Rule based Intelligent System for User Authentication based on User Behavior.", 2017
2. Bishnupriya Mukherjee (120011214001), Gour Sundar Mitra Thakur "Fuzzy Expert System on Medical Diagnosis", 2015
3. Tanmoy Paul (120011214001), Gour Sundar Mitra Thakur, "Identification of Fruits in a Tree Using Image processing and Artificial Neural Network.", 2014

B. Tech Projects:

1. Shivam Verma (12000217013), Shashikant (12000217014), Gour Sundar Mitra Thakur, "Resume Ranking Web Application", 2021
2. Shampa Roy (12000217015), Nehal Ahmad (12000217034), Ankita Dhara (12000217055), Gour Sundar Mitra Thakur, "Traffic Sign Recognition and Classification using Artificial Neural Network", 2021
3. Sudarshan Kumar (12000216006), Ravi Kumar (12000216020), Trishita Chakraborty (12000216002), Gour Sundar Mitra Thakur, "Better Reading Levels through Machine Learning", 2020
4. Subham Bishayee (12000216008), Gour Sundar Mitra Thakur, "Credit Card Spend Prediction and Proactive Attrition", 2020
5. Sanjeev Kumar (12000216018), Musafiatul Hoque (12000216028), Adarsh Jha (12000216058), Gour Sundar Mitra Thakur, "Bug tracking system using JAVA", 2020
6. Abhishek Kumar (12000215002), Gopal Kumar (12000215017), Shreyansh (12000215048), Shubham Kumar Sona (12000215050), Gour Sundar Mitra Thakur, "Aviation Analysis", 2019

Invited Lectures:

- Invited as guest speaker in one-day seminar on “Decision Making using Fuzzy Sets & Systems: Scope & Challenges”, organized by The Institution of Engineers (India), Durgapur Local Centre on 3rd April, 2016.
- Contributed as a speaker towards Theme based webinar on Transformative reforms under New Education Policy (NEP) - 2020 on “Quality Education, Accreditation and Teacher Development” organized by Computer Science & Technology department of Dr. B. C. Roy Polytechnic held on 6th August, 2021.

Participation in seminar/conference/symposium/workshop/discussion meeting

1. Participated in International Conference on Computational Intelligence (ICCI 2020) from December 12-13, virtually held at Indian Institute of Information Technology Pune and Soft Computing Research Society.
2. Successfully participated in one day seminar on “Enterprise Architecture and its Security” held at Dr. B. C. Roy Engineering College, Durgapur on 21st January, 2020
3. Successfully participated in “National Conference on Emerging Trends on Sustainable Technology and Engineering Applications 2020” organized by Dr. B. C. Roy Engineering College Durgapur
4. Successfully participated in “International Conference on Innovation of Quality Enrichment and Excellence of Education” virtually held at JIS University, WB, 22-23 December, 2020
5. Successfully attended the “Awareness Webinar on Outcome Based Education and Accreditation for the Engineering Colleges in West Bengal” virtually organized by NBA and MAKAUT on 15th December, 2020
6. Successfully attended “International Webinar on Facets of Computational Mathematics” on 27th July, 2020 organized by BKGC, Howrah, India
7. Successfully completed one day program on “Modern International and Digital Marketing: Practices and Tools-a Global Vision” jointly conducted by Cambridge Marketing College (UK) and Maulana Abul Kalam Azad University of Technology, West Bengal on 19th March, 2019
8. Presented the paper “Ranking of Stocks Using a Hybrid DS-fuzzy System: An Application to Bombay Stock Exchange” in the 9th International Conference on Advanced Computing and Communication Technologies, November 27-29, 2015, APIIT, Panipat.
9. Attend the International Workshop on "Fuzzy Sets, Rough Sets, Uncertainty Analysis and Applications" in National Institute of Technology Durgapur, November 21 - 25, 2011.

10. Presented the paper "Fuzzy Random 2 -Mean SAD Portfolio Selection Problem: An Ant Colony Optimization Approach" in the International Conference on Modelling, Optimization and Computing, October 28-30, 2010, National Institute of Technology, Durgapur.

Participation in faculty development programmes

Sl no.	Name of the faculty development programmes	Online / Face-to-face	From Date - To Date	Duration	Year	Organized by
1.	Outcome Based Education and Teaching Learning Process	Online	27th Oct-29th October, 2021	3 days	2021	BCRCP, DGP, WB
2.	Data Science using AI and Soft Computing Techniques	Online	18 th Sept-27 th Sept, 2021	5 days	2021	NITW, TS
3	Modern Applications of Artificial Intelligence in Machine Learning in Hardware and Software	Online	14 th Sept to 18 th Sept 2021	5 Days	2021	BCREC, DGP, WB
4	Inculcating Universal Human Values in Technical Education	Online	26 th July to 30 th July 2021	5 Days	2021	AICTE
5	Foundations and Practical Aspects of Cyber Security	Online	15 th December to 19 th December, 2020	5 Days	2021	BCREC, DGP, WB
6	3D printing and Design	Online	17 th August to 21 st August, 2020	5 days	2020	BCREC, DGP, WB
7	Recent Advances in Computer Science and Allied Domains (RACSAD 2020)	Online	8 th June to 12 th June, 2020	5 days	2020	Sharda University, India
8	Accreditation and Outcome Based Learning	Online with Proctored Exam	August to Oct 2019	8 weeks	2019	IIT-KGP, NPTEL

Organization of events (Dr. B. C. Roy Engineering College):

1. Successfully organized 5-days online FDP on *Modern Applications of Artificial Intelligence in Machine Learning in Hardware and Software* from 14th to 18th September, 2021 under the department of Computer Science and Engineering, BCREC Durgapur. Speakers were invited from Imperial College London, IMEC Belgium, Liberty Mutual Insurance, USA, NIT Rourkela and NIT Delhi.
2. Successfully organized a webinar on "Career in Open Source: Scope and Future" under the department of Information Technology, BCREC Durgapur on 19th July, 2021.

Participation in administrative committees (selected)

- Program Coordinator of B.Tech in Artificial Intelligence and Machine Learning
- NBA Coordinator of IT
- Assisting NBA accreditation process in Dr. B. C. Roy College of Polytechnic
- Project Coordinator (Dept of IT for last 4 years)
- NBA Core Committee member of CSE in 2015
- NBA coordinator of CSE in 2016 - 2017
- Member of the NBA core committee of the institution
- Member of the selection committee to select the awardees for "Dulal Mitra Best Engineering Award" and "Dr. B. C. Roy Best P.G. Student Award "
- Worked as departmental representative for research and innovation in BCREC from CSE department.

Project Ideas Submitted to Govt. Agencies/ On-going Projects: NA

Research Ideas under preparation & execution: Theoretical Methods for Universal Pandemic Vaccine Design

Membership of professional bodies:

- Member of Operational Research Society of India (ORSI)
- Member of Institute of Electrical and Electronics Engineers (IEEE)