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8. Academic Qualifications (From Highest Degree to High School):

Examination	Board / University	Year	Division/ Grade	Subjects
PhD	National Institute of Technology Kurukshetra, India	2020	-	Thesis Title: Machine Learning Models for Cloud Resource Management
MTech	Dayalbagh Educational Institute Agra, India	2013	First	Computer Science
MSc	Dayalbagh Educational Institute Agra, India	2011	First with Distinction	Computer Science
BCA	Dr. Bhimrao Ambedkar University Agra, India <i>(formerly – Agra University)</i>	2008	First	Computer Applications
Intermediate	Uttar Pradesh State Board of High School and Intermediate Education	2005	First	Science (Mathematics)
Highschool	Uttar Pradesh State Board of High School and Intermediate Education	2003	Second	Science

9. Academic/Administrative Responsibilities within the University

Position	Faculty/Department/Centre/Institution	From	To
Data Coordinator	Department of Computer Applications, National Institute of Technology Tiruchirappalli	Jan 2022	Present
Member, Anti-Ragging Committee Member	National Institute of Technology Tiruchirappalli	26.02.2021	Present
Co-coordinator, Syllabus Revision Committee for MCA Programme	Department of Computer Applications, National Institute of Technology Tiruchirappalli	Aug 2021	Present
Member, Accommodation & Space Allocation Committee	Department of Computer Applications, National Institute of Technology Tiruchirappalli	Aug 2021	Present

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PAC Chairman	Department of Computer Applications, National Institute of Technology Tiruchirappalli	Aug 2021	Dec 2021
Co-coordinator, NBA Accreditation Committee for MCA Programme	Department of Computer Applications, National Institute of Technology Tiruchirappalli	Aug 2021	Present
Member, NIMCET-2021 Counselling Committee	Department of Computer Applications, National Institute of Technology Tiruchirappalli	2021-2022	-

10. Academic/Administrative Responsibilities outside the University: NIL

Position	Institution	From	To
Member, Doctoral Committee	SRM University, Ramapuram, Chennai	2021	Present
PhD Examiner	Sathyabama Institute of Science and Technology (Deemed to be University), Chennai	2022	2022

11. Awards, Associateships etc.

Year of Award	Name of the Award	Awarding Organization
2019	Best Paper Award	International Conference on Smart Computing & Communication (ICSCC), Curtin University, Malaysia.
2016	Best Paper Award	International Conference on Eco-friendly Computing & Communication Systems (ICECCS), MANIT Bhopal, India.
2011	Director Medal	Dayalbagh Educational Institute Agra, India

12. Fellowships

Year of Award	Name of the Fellowship	Awarding Organization	From (Month/Year)	To (Month/Year)
2015	Visvesvaraya PhD Scheme Fellowship	Ministry of Electronics & Information Technology, Govt. of India.	10/2015	07/2019
2011	Graduate Aptitude Test Engineering (GATE) Fellowship	Ministry of Human Resource & Development, Govt. of India	07/2011	05/2013

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13. Details of Academic Work

(i) Curriculum Development:

- a. MCA – Soft Computing, Machine Learning and Deep Learning
- b. MSc -
- c. MTech – Data Visualization

(ii) Courses taught at Postgraduate and Undergraduate levels:

- a. Postgraduate level: Big Data Analytics, Object Oriented Analysis and Design, Cloud Computing
- b. Undergraduate level: Data Analytics, Introduction to Artificial Intelligence and Machine Learning, Introduction to Programming, Design and Analysis of Algorithms

(iii) Projects guided at Postgraduate level: 15

(iv) Other contribution(s)

14. Details of Major R&D Projects: NIL

Title of Project	Funding Agency	Duration		Status
		From	To	Ongoing/ Completed

15. Number of PhDs guided/ongoing

Name of the PhD Scholar	Title of PhD Thesis	Role (Supervisor/ Co-Supervisor)	Year of Award
Raseena T.P.	Medical Image Analysis	Supervisor	Ongoing

16. Participation in Workshops/ Symposia/ Conferences/ Colloquia /Seminars/ Schools etc. (mentioning the role)

Date (s)	Title of Activity	Level of Event (International/ National/ Local)	Role (Participant/ Speaker/ Chairperson, Paper presenter, Any other)	Event Organized by	Venue
Aug 10-14, 2020	E-Content Development	Local	Participant	National Institute of Technology Tiruchirappalli, India	Online
Jan	High Impact	Local	Participant	GLA	GLA

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13-15, 2020	Teaching Skills			University, Mathura, India	University, Mathura, India
Dec 30, 2019 - Jan 1, 2020	T3 IBM Workshop on Introduction to Artificial Intelligence & Machine Learning	Local	Participant	GLA University, Mathura, India	GLA University, Mathura, India
July 15-17, 2019	T3 IBM Workshop on Security in Cloud	Local	Participant	GLA University, Mathura, India	GLA University, Mathura, India
Nov 1, 2018	Data Analysis	National	Participant	National Institute of Technology, Kurukshetra, India	National Institute of Technology, Kurukshetra, India
March 3-7, 2018	Multiobjective Optimization using Metaheuristics	International	Participant	Indian Institute of Technology Kanpur, India	Indian Institute of Technology Kanpur, India
Dec 7-8, 2017	International Conference on Smart Computing & Communications (ICSCC)	International	Paper presenter	National Institute of Technology, Kurukshetra, India	National Institute of Technology, Kurukshetra, India
Nov 16-18, 2017	Research Evaluation Workshop, Visvesvaraya PhD Scheme for Electronics & IT/ITES	National	Participant	Ministry of Electronics and Information Technology, Govt. of India.	Andhra University, Visakhapatnam, India
March 30-31, 2017	Article & Thesis Writing with LATEX	National	Participant	National Institute of Technology, Kurukshetra, India	National Institute of Technology, Kurukshetra, India
Dec 8-9, 2016	International Conference on Eco-friendly Computing & Communication Systems (ICECCS)	International	Paper presenter	National Institute of Technology, Bhopal, India	National Institute of Technology, Bhopal, India

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May 23-25, 2016	International Workshop on Computational Intelligence and Applications	International	Participant	South Asian University, New Delhi, India	South Asian University, New Delhi, India
Feb 12-13, 2016	National Workshop on Cyber Security: Innovations & Opportunities (CyberSec-2016)	National	Participant	National Institute of Technology, Kurukshetra, India	National Institute of Technology, Kurukshetra, India
May 15-16, 2015	International Conference on Computing, Communications & Automation (ICCCA)	International	Paper presenter	Galgotias University, Greater Noida, India	Galgotias University, Greater Noida, India
July 7-10, 2013	IEEE International Conference on Fuzzy Systems (FUZZ-IEEE)	International	Paper presenter	IEEE	Hyderabad International Convention Center (HICC), Hyderabad, India
March 31, 2013	Bridges between Physics & Biology	National	Participant	Dayalbagh Educational Institute, Agra, India	Dayalbagh Educational Institute, Agra, India
Jan 16-18, 2013	Engineering and Analysis of Evolutionary Algorithms (EAEA-2013)	International	Participant	Dayalbagh Educational Institute, Agra, India	Dayalbagh Educational Institute, Agra, India
April 3, 2012	Bio Inspired Systems	National	Participant	Dayalbagh Educational Institute, Agra, India	Dayalbagh Educational Institute, Agra, India
March 30, 2010	Soft Computing Techniques for Biometric Technologies	National	Participant	Dayalbagh Educational Institute, Agra, India	Dayalbagh Educational Institute, Agra, India

17. Workshops/ Symposia/ Conferences/ Colloquia/Seminars Organized (as Chairman/ Organizing Secretary/ Convenor / Co-Convenor): NIL

Title of Activity	Level of Event	Date (s)	Role	Venue
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	(International/ National/ Local)			

18. Invited Talks delivered

Topic	Date	Inviting Organization
Presenting Scientific Data: Plots, Postscripts, and PDF Graphics in TEX	March 15, 2022	National Institute of Technology, Kurukshetra, India.
Quantum Evolutionary Neural Network: Biological inspired computing and quantum principles	Nov 25, 2021	ABESIT College of Engineering, Ghaziabad, Uttar Pradesh, India
Plots & Figures in LATEX	Aug 4, 2021	National Institute of Technology, Kurukshetra, India
Evolutionary Neural Networks	Jan 14, 2021	PSNA College of Engineering & Technology, Dindigul, Tamilnadu, India
Plots & Figures in LATEX	Feb 11, 2021	ABESIT College of Engineering, Ghaziabad, Uttar Pradesh, India
Machine Learning: Today and Tomorrow	Oct 6, 2020	Gulzar Group of Institutes, Ludhiana, Punjab, India

19. Membership of Learned Societies

Type of Membership (Ordinary Member/ Honorary Member / Life Member)	Organization	Membership No. with date
Senior Member	IEEE	Membership No: 92243365 October, 2012
Member	ACM	Membership No: 2811146 January, 2021

20. Academic Foreign Visits: NIL

Country	Duration of Visit	Programme

21. Publications

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(A) Refereed Research Journals:

Author(s)	Title of Paper	Journal	Volume (No.)	Page numbers	Year	doi	Impact Factor of the Journal (Optional)
Niharika Singh, Jitendra Kumar, Ashutosh Kumar Singh, Anand Mohan	Privacy-preserving multi-keyword hybrid search over encrypted data in cloud	Journal of Ambient Intelligence and Humanized Computing			2022	https://doi.org/10.1007/s12652-022-03889-8	7.104
Jitendra Kumar, Ashutosh Kumar Singh	Performance evaluation of metaheuristic algorithms for workload prediction in cloud environment	Applied Soft Computing	113, Part A	107895	2021	https://doi.org/10.1016/j.asoc.2021.107895	6.725
Deepika Saxena, Ishu Gupta, Jitendra Kumar, Ashutosh Kumar Singh, Xiaoqing Wen	A Secure and Multiobjective Virtual Machine Placement Framework for Cloud DataCenter	IEEE Systems Journal	16, no. 2	3163-3174	2022	10.1109/JSYST.2021.3092521	3.931
Ashutosh Kumar Singh, Deepika	A quantum approach towards the adaptive	IEEE Transactions on Parallel and	32, no. 12	2893-2905	2021	10.1109/TPDS.2021.30793	2.687

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Saxena, Jitendra Kumar, Vrinda Gupta	prediction of cloud workloads	Distributed Systems				41	
Jitendra Kumar, Ashutosh Kumar Singh, Rajkumar Buyya	Self directed learning based workload forecasting model for cloud resource management	Information Sciences	543	345-366	2021	https://doi.org/10.1016/j.ins.2020.07.012	6.795
Jitendra Kumar, Ashutosh Kumar Singh, Rajkumar Buyya	Ensemble learning based predictive framework for virtual machine resource request prediction	Neurocomputing	397	20-30	2020	https://doi.org/10.1016/j.neucom.2020.02.014	5.719
Jitendra Kumar, Ashutosh Kumar Singh	Decomposition based cloud resource demand prediction using extreme learning machines	Journal of Network and Systems Management	28	1775-1793	2020	https://doi.org/10.1007/s10922-020-09557-6	2.026
Jitendra Kumar, Deepika Saxena, Ashutosh Kumar Singh, Anand Mohan	BiPhase adaptive learning-based neural network model for cloud datacenter workload	Soft Computing	24	14593-14610	2020	https://doi.org/10.1007/s00500-020-04808-9	3.643

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	forecasting						
Jitendra Kumar, Ashutosh Kumar Singh, Anand Mohan	Resource-efficient load-balancing framework for cloud data center networks	ETRI Journal	43	53-63	2021	https://doi.org/10.4218/etrij.2019-0294	1.374
Jitendra Kumar, Ashutosh Kumar Singh	Cloud datacenter workload estimation using error preventive time series forecasting models	Cluster Computing	23(2)	1363-1379	2020	https://doi.org/10.1007/s10586-019-03003-2	1.809
Jitendra Kumar, Ashutosh Kumar Singh	Performance assessment of time series forecasting models for cloud datacenters' workload prediction	Wireless Personal Communications	116	1949-1969	2021	https://doi.org/10.1007/s11277-020-07773-6	1.671
Jitendra Kumar, Ashutosh Kumar Singh	Adaptive learning based prediction framework for cloud datacenter networks' workload anticipation	Journal of Information Science and Engineering	36(5)	540-541	2019	10.6688/JISE.20200936(5).0003	1.316
Jitendra Kumar, Ashutosh Kumar Singh	An efficient machine learning approach for virtual machine	International Journal of Advanced Science and Technology	123	21-30	2019	10.14257/ijast.2019.123.03	

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	resource demand prediction						
Jitendra Kumar, Ashutosh Kumar Singh	Workload prediction in cloud using artificial neural network and adaptive differential evolution	Future Generation Computer Systems	81	41-52	2018	https://doi.org/10.1016/j.future.2017.10.047	7.187

(B) Conferences/Workshops/Symposia Proceedings

Author(s)	Title of Abstract/ Paper	Title of the Proceedings	Page numbers	Conference Theme	Venue	Year	doi
Sajeev Vijaykumar , Jitendra Kumar	Cloud Resource Usage Forecasting Using Neural Network and Artificial Lizard Search Optimization	10 th IEEE Humanitarian Technology Conference (R10 HTC)	NA	Internet of Things (IoT) and Industry 4.0	Novotel Hyderabad Convention Centre, Hyderabad, India	2022	Accepted
Jitendra Kumar, Ashutosh Kumar Singh	Cloud resource demand prediction using differential evolution based learning	7 th International Conference on Smart Computing & Communications (ICSCC)	1-5	Smart Computational Intelligence for a Digital World	Curtin University, Sarawak, Malaysia	2019	10.1109/ICSCC.2019.8843680
Vartika Sharma, Sizman Kaur, Jitendra	A fast parkinson's disease prediction technique	International Conference on Intelligent Computing and Control	1491-1496	NA	Madurai, India	2019	https://doi.org/10.1109/ICCS451

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Kumar, Ashutosh Kumar Singh	using PCA and artificial neural network	Systems (ICICCS)					41.2019.9065876
Sukhman Singh, Tarun Kumar Madan, Jitendra Kumar, Ashutosh Kumar Singh	Stock market forecasting using machine learning: today and tomorrow	2 nd International Conference on Intelligence Computing, Instrumentation and Control Technologies (ICICT-2019)	738-745	NA	Kannur, India	2019	https://doi.org/10.1109/ICICT.2019.8993160
Preetesh K. Yadav, Sourav Pareek, Shaif Shakeel, Jitendra Kumar, Ashutosh Kumar Singh	Advancements and security issues of IoT & cyber physical systems	International Conference on Intelligent Computing and Control Systems (ICICCS)	940-945	NA	Madurai, India	2019	https://doi.org/10.1109/ICCS451.2019.9065835
Jitendra Kumar, Rimsha Goomer, Ashutosh Kumar Singh	Long Short Term Memory Recurrent Neural Network (LSTM-RNN) based workload forecasting model for cloud datacenters	6 th International Conference on Smart Computing and Communications (ICSCC)	676-682	NA	NIT Kurukshetra, India	2017	https://doi.org/10.1109/jprocs.2017.12087
Jitendra Kumar, Ashutosh Kumar Singh	Dynamic resource scaling in cloud using neural network and black	5 th International Conference on Eco-friendly Computing and	63-67	NA	MANIT Bhopal, India	2016	10.1109/Ecofriendly.2016.7893243

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	hole algorithm	Communication Systems (ICECCS)					
Mayank Dixit, Jitendra Kumar, Rajesh Kumar	Internet of things and its challenges	International Conference on Green Computing and Internet of Things (ICGCIoT)	810-814	NA	Noida, India	2015	https://doi.org/10.1109/ICGCIoT.2015.7380574
Jitendra Kumar, Rajesh Kumar, Mayank Dixit	Result merging in meta-search engine using genetic algorithm	International Conference on Computing, Communication & Automation (ICCCA)	299-303	NA	Noida, India	2015	https://doi.org/10.1109/ICCCA.2015.7148393
Jitendra Kumar, Lotika Singh, Sandeep Paul	GPU based parallel cooperative Particle Swarm Optimization using C-CUDA: A case study	IEEE International Conference on Fuzzy Systems (FUZZ-IEEE)	1-8	NA	Novotel Hyderabad Convention Centre, Hyderabad, India	2013	https://doi.org/10.1109/FUZZ-IEEE.2013.6622514

(C) Books & Monographs

Author(s)	Title of Book/Monograph	Name of Publishers	Year of Publication	ISSN/ISBN Number	doi
Jitendra Kumar, Ashutosh Kumar Singh, Anand Mohan, Rajkumar Buyya	Machine Learning for Cloud Management	Chapman and Hall/CRC	2021	ISBN: 9780367626488	https://doi.org/10.1201/9781003110101