# **CURRICULUM VITAE**

Name:	Dr Sunil Kumar Singh		
Designation:	Assistant Professor		
School:	School of Computer Sciences & Information Technology		
Department:	Department of Computer Science & Information Technology		
Specialization & Research Interests:	Mobile Computing, Parallel Computing, Machine Learning and Internet of Things (IoT)		
Address:	Sunil Kumar Singh, Dept. of Computer Science & Information Technology, TempCamp, Zila School Campus, Chanakya Parisar, Mahatma Gandhi Central University, Motihari, Bihar-845401 Email Id. sksingh@mgcub.ac.in; sunilsingh.jnu@gmail.com; Mobile No.: +91-8826870662		
Languages Known:	English, Hindi	State of Domicile:	Uttar Pradesh, India

# 2. ACADEMIC QUALIFICATION (in Reverse Chronological order):

Examination Passed	Year	University / Board	Percentage / CGPA	Division	Specialisation / Subjects
Ph.D.	2017	JNU, NEW DELHI	NA	NA	Mobile Computing
M.Tech.	2012	JNU, NEW DELHI	77.20	First	Computer Science and Technology
B.Tech.	2010	UPTU, Lucknow, Uttar Pradesh	73.24	First	Computer Science & Engineering

# 3. ANY OTHER QUALIFICATION:

- i. Graduate Aptitude Test Qualified in Engineering (GATE-2012) with GATE Score-502, percentile 97.7%.
- ii. University Grant Commission-National Eligibility Test (UGC-NET) Qualified June-2013.

## 4. PROFESSIONAL EXPERIENCE:

Position Held	Duration	Organization/Institute/University
Assistant Professor	09-11-2016 to till date	Mahatma Gandhi Central University, Motihari, Bihar.
Assistant Professor	01-02-2016 to 03-11-2016	Galgotias College of Engineering & Technology, Greater Noida, UP.
Assistant Professor	01-03-2013 to 31-01-2016	Galgotias University, Greater Noida, UP.
Ph.D. Scholar	Winter and Monsoon Semester-2012	School of Computer & Systems Sciences, JNU New Delhi-110067

## 5. ADMINISTRATIVE ASSIGNMENTS:

Position Held	Duration	Nature of Work
Nodal Officer	24-05-2018 to till date	NKN (National Knowledge Network) project, To handle the Internet issues at Mahatma Gandhi Central University, Bihar
Nodal Officer	12 <sup>th</sup> may 2022 to till date	Samarth eGov Project, Mahatma Gandhi Central University, Bihar
Website Committee (Member)	December-2016 to July-2019	Website development

## 6. COURSES TAUGHT:

# A. UG Level:

- i. Design and Analysis of Algorithms
- ii. Computer Networks
- iii. Wireless and Mobile Communication
- iv. Real-Time Operating System
- v. Introduction to Computers and Programming with C
- vi. Web Technology
- vii. Applied Numerical Methods
- viii. Management Information System
- ix. Graphics & Animation Tools

## B. PG Level:

- i. Operating System
- ii. Advanced Algorithms
- iii. Advanced Operating System

## 7. RESEARCH SUPERVISION:

#### A. M.Tech.:

i. Awarded : 06ii. Submitted : NILiii. Ongoing : 05

## B. Ph.D.

i. Awarded : NILii. Submitted : NILiii. Ongoing : 03

#### 8. CONTRIBUTION TO CORPORATE LIFE OF THE UNIVERSITY:

- M.Tech Course Coordinator, Dept. of Computer Science and Information Technology, Mahatma Gandhi Central University.
- ii. Visited World Bookfair from 5<sup>th</sup> to 13<sup>th</sup> January as a member of the World Bookfair Committee.
- iii. Contributed as a member of the tender's opening committee, for opening the tenders concerning Empanelment of Vendors.
- iv. Participated as Special Invitee in Board of Studies and School Board for curriculum development.

## 9. MEMBERSHIP OF SOCIETIES / PROFESSIONAL BODIES:

- I. Member of Departmental Research Committee, Mahatma Gandhi Central University, Bihar, India
- II. Member of "MGCU Committee on Cyber Crime Awareness", Mahatma Gandhi Central University, Motihari, Bihar, India
- III. Member of International Association of Engineers (IAENG)

## 10. PUBLICATIONS:

#### A. PAPERS IN REFEREED/PEER-REVIEWED JOURNALS:

- Surbhi Kumar, and S K Singh, "Machine learning-based Time Series Models for Effective CO<sub>2</sub> Emission Prediction in India", pp. 1-16 International Journal of Environmental Science and Pollution Research, Springer, 2022. (SCIE Indexed, IF: 5.190)
- ii. S Kumar, S Mishra, and **S K Singh**, "Deep Transfer Learning-based COVID-19 prediction using Chest X-rays", Journal of Health Management, SAGE, Volume 23(04), pp. 730-746, December-2021. (SCOPUS Indexed)
- iii. S Kumar, S Mishra, and **S K Singh**, "A machine learning-based model to estimate PM2.5 concentration levels in Delhi's Atmosphere", journal of Heliyon, Elsevier, Volume 06(11), pp. 1-10, November-2020:e05618. *(SCIE Indexed, IF: 3.776)*
- iv. M P Mishra, S K Singh, and D P Vidyarthi, "Opportunistic Channel Allocation Model in Collocated Primary Cognitive Network", International Journal of Mathematical, Engineering and Management Sciences, Volume 5 (05), pp. 995-1012, June-2020. (SCOPUS Indexed)

- v. **S K Singh**, D P Vidyarthi, "A Pricing Model for Effective Radio Spectrum Utilization", International Journal of Mobile Computing and Multimedia Communications (IJMCMC), IGI Global, Volume 10(4), pp. 41-65, October-December-2019. (SCOPUS Indexed)
- vi. D P Vidyarthi, **S K Singh** "A Heuristic Channel Allocation Model using Cognitive Radio" International Journal of Wireless Personal Communication, Springer, Volume 85(3), pp. 1043-1059, July-2015. (SCIE Indexed, IF: 2.017)
- vii. **S K Singh**, A Kaushik and D P Vidyarthi, "A Cognitive Channel Allocation Model in Cellular Network using Genetic Algorithm" International Journal of Wireless Personal Communication, Springer, 26th May-2017. *(SCIE Indexed, IF: 2.017)*
- viii. **S K Singh**, D P Vidyarthi, "Independent Tasks Scheduling using Parallel PSO in Multiprocessor Systems", International Journal of Grid and High-Performance Computing (IJGHPC), IGI Global, Volume 7(2). April-June-2015. (SCOPUS Indexed)
- ix. **S K Singh**, D P Vidyarthi, "A Heuristic Channel Allocation Model with Multilending in Mobile Computing Network", Internal Journal of Wireless and Mobile Computing, INDERSCIENCE, Vol. 16, No. 4, pp.322-339, 2019. (SCOPUS Indexed)
- x. S Shukla, **S K Singh**, "Mobile Agent-Based Congestion Control Using Aodv for Mobile Ad-Hoc. Network" International Journal of Engineering Research & Management Technology Volume 01, Issue 04. ISSN: 2348-4039, July- 2014
- xi. A Panwar, **S K Singh** & M Panwar, "An Approach to Secure Services and Log Management in Cloud" INTERNATIONAL JOURNAL OF SCIENCE, ENGINEERING, AND TECHNOLOGY, Volume 02, Issue 06. ISSN: 2348-4098 July -2014
- xii. S Shukla, **S K Singh**, "A Survey: On Mobile Ad-hoc Networks Security & Vulnerabilities" International Journal of Engineering Research & Management Technology, Volume 01, Issue 02. ISSN: 2348-4039, March- 2014.

#### B. RESEARCH PAPERS IN EDITED AND PEER-REVIEWED CONFERENCES:

- Neha Srivastava, and S K Singh, "A Deep Learning-Based MobileNet Model for Effectively Classifying the White Blood Cancerous Microscopic Images", International Conference on Networking, Communication and Computing Technology (ICNCC-2022) (Accepted)
- ii. Mehar Nasreen, and **S K Singh**, "Implementation of Blockchain based Electronic Health Record System using Java Eclipse and MongoDB", 2022 IEEE International Conference on Blockchain and Distributed Systems Security (ICBDS). (Accepted)
- iii. Ankit Prakash, and **S K Singh**, "A comparative study of Time-series, Machine learning, and Ensemble models for crude oil price prediction", International

- conference on Advanced Computing and Intelligent Technologies (ICACIT2022). (Accepted)
- iv. Ashish Kumar, **S K Singh**, and Pawan Kumar Chaurasia, "A Heuristic Model for Friend Selection in Social Internet of Things, 3<sup>rd</sup> International Conference on Machine Intelligence and Signal Processing, Sept. 23-25, 2021, NIT Arunachal Pradesh, India. (Accepted)
- v. Kalpana Anshu, **S K Singh**, and R. Kumari, "A Machine Learning model for Effective Consumer Behaviour Prediction.", 5<sup>th</sup> Internation Conference on Information Systems and Computer (ISCON), 2021, pp. 1-5, doi: 10.1109/ISCON52037.2021.9702495.
- vi. Prabhu Ranjan, and **S K Singh**, "A Model on Intrusion Detection using Firefly Algorithm and Classical Machine Learning", 3<sup>rd</sup> International Conference on Machine Intelligence and Signal Processing, 2022, pp. 217-228, doi: 10.1007/978-981-19-0840-8\_16.
- vii. **S K Singh**, A Kaushik and D P Vidyarthi, "A Model for Cognitive Channel Allocation using GA", IEEE, International Conference on Computational Intelligence and Communication Technology. pp. 528-532, Feb-2016.
- viii. **S K Singh**, R Kumar, "Scheduling in Multiprocessor Systems using Parallel PSO", IEEE, International Conference on Computing, Communication, and Automation. pp. 175-180, March-2015.
- ix. R Kumar, **S K Singh** and V Kumar "A Heuristic Approach for Search Engine Selection in Meta-search Engine", IEEE, International Conference on Computing, Communication, and Automation. pp. 865-869, March-2015.

## C. BOOK CHAPTERS:

- i. **S K Singh**, S Kumar, "Blockchain Technology: Introduction, Integration and Security Issues with IoT", Book chapter in *Applications of BlockChain and Big IoT Systems: Digital Solutions for Diverse Industries,* Apple Academic Press. ISBN: 9781774637456
- ii. S K Singh, "The Role of Emerging Technologies in Better Implementation of New Education Policy", Book chapter in New Education Policy 2020: Conspectus, Mahatma Gandhi Central University in collaboration with Kitabwale. ISBN: 978-81-948605-2-5

## D. Edited Book

 P K Chaurasia and S K Singh, "Research Challenges in Computer Science and Technology", Edited book, Sapatrishi Publications, year 2020. ISBN:9-788194-905363.

## 11. INVITED TALKS:

**Visiting Professor**, Institute of Accountancy Arusha, Arusha, Tanzania from 21/06/2014 to 19/07/2014.

## 12. PARTICIPATION IN SEMINARS/SYMPOSIA/WORKSHOPS/CONFERENCES:

#### A. ATTENDED:

i. A six-day workshop on "Blockchain Fundamentals", organized by the Department of Computer Science and Engineering, Saintgits College of Engineering, Kottayam Kerala from 24th -29th August, 2020.

- A five-day workshop on "Mathematics for Machine Learning", organized by Department of Basic and Applied Science, NIT Arunachal Pradesh from 25<sup>th</sup> -30<sup>th</sup> January,2021.
- iii. Orientation Course at JNU-HRDC from 8th January to 2nd February 2018.
- iv. Seven-day Workshop on "Universal Human Values & Ethics" at Galgotias University from 13<sup>th</sup> to 21<sup>st</sup> July 2015.
- v. International Conference on Computing Communication and Automation (ICCCA 2015) at Galgotias University from 15th to 16th May 2015.
- vi. International Research Workshop in Cloud Computing (RWCC-2016) from Dec. 22nd, 2016 to Dec. 23rd, 2016 held at SC&SS, JNU, New Delhi-110067
- vii. International Research Workshop in Cloud Computing (RWCC-2015) from Dec. 22nd, 2015 to Dec. 23rd, 2015 held at SC&SS, JNU, New Delhi-110067
- viii. International Research Workshop in Cloud Computing (RWCC-2014) from Sept. 26th, 2014 to Sept. 27th, 2014 held at SC&SS, JNU, New Delhi-110067
- ix. Training on "Business Intelligence" from 18<sup>th</sup> to 20<sup>th</sup> February 2014, conducted by IBM at Galgotias University, Gr. Noida, UP.
- x. Training on "Graphics & Animation Tools" from 14th to 17th February 2014, conducted by IBM at Galgotias University, Gr. Noida, UP.
- xi. Training on "Introduction to Open Source & Open Standards", from August 19th 21st, 2013, conducted by IBM team at Galgotias University, Gr. Noida
- xii. Training on "Introduction to Virtualization Techniques", from August 23rd 24th, 2013, conducted by IBM team at Galgotias University, Gr. Noida

#### B. ORGANIZED

- i. Co-convener of a one-week national workshop on "Machine Learning and Computer Vision using MATLAB" from April 3<sup>rd</sup>, 2019 to April 7<sup>th</sup>, 2019.
- ii. Technical Coordinator, ACM chapter TechFest Astitva-2018 from  $22^{nd}$  to  $23^{rd}$  April 2018.

## 13. AWARDS, FELLOWSHIPS & OTHER DISTINCTIONS:

- i. Third prize in Robo-soccer (event), Tech-fest: Finesee-07(DR.KNMIET Modinagar Ghaziabad)
- ii. First prize in Chess (event), Tech-fest: Spandan-10 (DR.KNMIET Modinagar Ghaziabad).s
- iii. First prize in Chess (event) JNU Inter hostel Tournament.
- iv. Playing Chess, Reading Newspaper, Listening Music.