Name   : Dr. A. Sakila

Designation   : Assistant Professor

Department   : Computer Science (Artificial Intelligence)

Qualification   : M. Sc., M. Phil., UGC Fellow., Ph. D.,

Research   : 11 Years

Area of Specialization(s) : Data Mining, Image Processing, Artificial Intelligence

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Academic Qualifications

Degree	Branch	Institution/University Name	Year of Graduation
Ph.D.	Computer Science	Bharathiar University	2022
M.Phil.	Computer Science	Bharathiar University	2016
M. Sc.	Computer Science	Karpagam University	2014
B.Sc.	Computer Science	Bharathiar University	2012

Research Publications (Indexed)

INTERNATIONAL: 18

1. **Dr. S. Vijayarani and Ms. A. Sakila,** "Multi-script Language Identification from Document Images", International Research Journal of Modernization in Engineering Technology and Science, e-ISSN 2582-5208, Volume 03, Issue 01, January 2021, Impact Factor: 5.354.

2. **Ms. A.Sakila and Dr. S.Vijayarani,** "Mathematical Symbol Extraction From Document Images -A Comprehensive Review", International Journal of Scientific & Technology Research, ISSN 2277-8616, Volume 9, Issue 03, March 2020. **(Scopus)**

3. **Dr. S. Vijayarani and Ms. A. Sakila,** "Efficient Blurring and De-Blurring Techniques for Secure the Document Images", International Journal of Scientific & Technology Research, ISSN 2277-8616 6499, Volume 9, Issue 03, March 2020. **(Scopus)**

4. **Dr. S. Vijayarani and Ms. A. Sakila,** "A Comprehensive Review on Handwriting Character Recognition", International Journal of Computer Science Engineering (IJCSE), ISSN: 2319-7323, Vol. 9 No. 1 Jan-Feb 2020.

5. **Dr. S. Vijayarani and Ms. A. Sakila,** "Face Recognition based Student Attendance System", International Journal of Research Publication and Reviews, ISSN 2582-7421, Vol (2), Issue (4), (2020).

6. **Dr. S. Vijayarani and Ms. A. Sakila,** "A Survey on Facial Recognition", International Journal of Computer Sciences and Engineering, E-ISSN: 2347-2693, Vol.-7, Issue-4, April 2019.

7. **Dr. S. Vijayarani and Ms. A. Sakila,** Process Mining - A Comprehensive Review, "International Journal of Computer Sciences and Engineering", E-ISSN: 2347-2693, Vol.-6, Issue-7, July 2018.

8. **Ms. A.Sakila and Dr. S.Vijayarani,** "Content Based Text Information Search and Retrieval in Document Images for Digital Library", Journal of Digital Information Management (JDIM), ISSN: 0972-7272, Volume 16, Issue 3, June 2018. **(Scopus)**

9. **Ms. A.Sakila and Dr. S.Vijayarani,** "A Survey on Document Image Analysis", International Journal for Research in Applied Science & Engineering Technology (IJRASET), ISSN: 2321-9653, Volume 6 Issue IV, April 2018. Impact Factor: 6.887 **(UGC Approved)**

10. **Ms. A.Sakila and Dr. S.Vijayarani,** "Skew Detection and Correction in the Document Image", International Journal of Innovative Research in Science, Engineering and Technology (IJIRSET), ISSN(Online): 2319-8753, ISSN (Print): 2347-6710, Vol. 6, Issue 8, August 2017. Impact Factor: 7.089 **(UGC Approved)**

11. **Ms. A.Sakila and Dr. S.Vijayarani,** "Image Enhancement using Morphological Operations", International Journal of Scientific Research in Science, Engineering and Technology (IJSRSET), Print ISSN: 2395-1990, Online ISSN: 2394-4099, Volume 3, Issue 2, April 2017. Impact Factor: 4.916

12. **Dr. S.Vijayarani and Ms. A.Sakila,** "A Survey on Word Spotting Techniques for Document Image Retrieval", International Journal of Engineering Applied Sciences and Technology, ISSN No. 2455-2143, Vol. 2, Issue 2, December 2016. Impact Factor:4.982

13. **Ms. A.Sakila and Dr. S.Vijayarani,** "Document Image Compression using Hybrid Compression Technique", International Journal of Engineering Science and Computing (IJESC), ISSN 2321 3361, Volume 6, Issue 11, November 2016. Impact Factor:5.611

14. **Ms. A.Sakila and Dr. S.Vijayarani,** "Text Extraction from Tamil and Hindi Document Images using Open Source Optical Character Recognition tools", (IJSART), ISSN: 2395-1052, Volume 2, Issue 1, November 2016. Impact Factor:4.284

15. **Dr. S. Vijayarani and Ms. A. Sakila,** "A Performance Comparison of Edge Detection Techniques for Printed and Handwritten Document Images", International Journal of Innovative Research in Computer and Communication Engineering, ISSN (Online): 2320-9801, ISSN (Print) : 2320-9798Vol. 4, Issue 5, May 2016.

16. **Dr. S. Vijayarani and Ms. A. Sakila,** "Template Matching Technique for Searching Words in Document Images", International Journal on Cybernetics & Informatics (IJCI) Vol. 4, No. 6, December 2015.

17. **Dr. S. Vijayarani and Ms. A. Sakila,** "Performance Comparison of OCR Tools", International Journal of UbiComp (IJU), Vol.6, No.3, July 2015.

18. **Dr. S. Vijayarani and Ms. A. Sakila,** "Multimedia Mining Research – An Overview", International Journal of Computer Graphics & Animation (IJCGA), Vol.5, No.1, January 2015.

BOOK CHAPTER PUBLISHED: 1

1. **Ms. A. Sakila and Dr. S.Vijayarani,** "Smart Farming: IOT Based Plant Leaf Disease Detection and Prediction using Image Processing Technique", Securing IoT in Industry 4.0 Applications. **(Scopus - Taylor & Francis)**

Reviewer in journal: 1

1. **Elsevier -** Optik – International Journal for Light and Electron Optics (SCIE)

Paper Presentations in Conference

INTERNATIONAL: 9

1. **Ms. A.Sakila and Dr. S.Vijayarani,** "Comparative Analysis of Character Recognition Algorithms International Conference on Advanced Computing (ICAC-2022), Department of Computer Science, Bharathiar University, Coimbatore, ISBN: 978-93-913-47-48-2, 03.03.2022 and 04.03.2022.

2. **Ms. A.Sakila and Dr. S.Vijayarani,** Line Space-based Document Image Compression, A Virtual International Conference on Application of Data Science, Cloud Computing & Computer Vision In Research And Development), School of Computer Science and IT - Jain University, Bangalore, 16.07.2021.

3. **Ms. A.Sakila and Dr. S.Vijayarani,** Firefly Based Word Spotting Technique for Searching Keywords from Cursive Document Images, 2nd International Conference on Intelligent Data Communication Technologies and Internet of Things (ICICI 2019), JCT College of Engineering and Technology, Pichanur. 978-3-030-34080-3, 12.09.2020 to 13.09.2020. **(Scopus- Springer)**

4. **Ms. A.Sakila and Dr. S.Vijayarani,** An Efficient Image Compression Technique for Document Images, First International Conference on Science, Technology, Management, Arts and Science – Contemporary Research in future of Asia at Asia Pacific University, Kuala Lumpur, Malaysia, 19.10.2018. **(Scopus)**

5. **Ms. A.Sakila and Dr. S.Vijayarani,** Face Frontalization for Unconstrained Face Recognition", INDIACom 5th International Conference on Computing for Sustainable Global Development, Bharati Vidyapeeth's Institute of Computer Applications and Management (BVICAM), New Delhi, ISBN 978-93-80544-28-1, 14.03.2018 to 16.03.2018. **(Scopus-IEEE)**

6. **Dr. S.Vijayarani and Ms. A.Sakila,** "Image Segmentation Techniques - A Review", International Conference on Advanced Information and Communication Technology (ICAIC-18), Karpagam College of Engineering, Coimbatore, 08.03.2018 and 09.03.2018.

7. **Ms. A.Sakila and Dr. S.Vijayarani,** "A Hybrid Approach for Document Image Binarization", IEEE International Conference on Inventive Computing and Informatics(ICICS-2017), Ranganathan Engineering College, Coimbatore, ISBN: 978-1-5386-4031-9, 23.11.2017 and 24.11.2017. **(Scopus-IEEE)**

8. **Ms. A.Sakila and Dr. S.Vijayarani,** "Online Optical Character Recognition (OCR) Tools Performance Analysis" International Conference on Innovative Trends in Computer Science and Applications (ICITCSA-2017), Pioneer College of Arts and Science, Coimbatore, ISBN: 978-93-86176-49-3, 06.01.2017.

9. **Dr. S.Vijayarani and Ms. A.Sakila,** "Clustering Algorithms for Outlier Detection – Performance Analysis", International Conference on Computing and Intelligence Systems, Organized by D.G.Vaishnav College, Chennai, ISSN: 2278-2397, Volume: 04 March 2015. P.no.1213-2017.

NATIONAL: 8

1. **Ms. A.Sakila and Dr. S.Vijayarani,** "Skew Detection and Correction for Multi-Script Printed and Handwritten Document Images, National Conference on Advanced Computing (NCAC-2020), Department of Computer Science, Bharathiar University, Coimbatore, ISBN: 9 789386 176271, 22.09.2020 and 23.01.2020.

2. **Dr. S.Vijayarani, Ms. A.Sakila, and Sujithra C.R,** "A Survey on Handwritten Images Skew Detection and Correction", National Conference on Advanced Computing (NCAC-2020), Department of Computer Science, Bharathiar University, Coimbatore, ISBN: 9 789386 176271, 22.09.2020 and 23.01.2020.

3. **Dr. S.Vijayarani, Ms. A.Sakila, and G.Ajith Kumar,** "A Survey on Multimedia Mining" National Conference on Advanced Computing (NCAC-2019), Department of Computer Science, Bharathiar University, Coimbatore, ISBN:978938762463, 24.01.2019 and 25.01.2019.

4. **Dr. S.Vijayarani, Ms. A.Sakila, and R.Ramya,** "Face Recognition: A Comprehensive Review" National Conference on Advanced Computing (NCAC-2019), Department of Computer Science, Bharathiar University, Coimbatore, ISBN:978938762463, 24.01.2019 and 25.01.2019.

5. **Ms. A.Sakila and Dr. S.Vijayarani,** "A Survey on Image Enhancement Techniques" National Conference on Advanced Computing (NCAC-2019), Department of Computer Science, Bharathiar University, Coimbatore, ISBN:978938762463, 24.01.2019 and 25.01.2019.

6. **Ms. A.Sakila and Dr. S.Vijayarani**, "Text Extraction from Images using Optical Character Recognition tools", National Conference on Advanced Computing (NCAC-2016), Department of Computer Science, Bharathiar University, Coimbatore, ISBN:9 789386 176271, 22.09.2016 and 23.09.2016

7. **Ms. A.Sakila and Dr. S.Vijayarani,** "Text Extraction from Images using Optical Character Recognition tools", National Conference on Advanced Computing (NCAC-2016), Department of Computer Science, Bharathiar University, Coimbatore, ISBN:9 789386 176271, 22.09.2016 and 23.09.2016.

8. **Dr. S.Vijayarani and Ms. A.Sakila,** "Online OCR tools – A Comparative Analysis", National Confernence on New Horzons in Computational Intelligence and Information Systems, Organized by Gandhigram Rural Institute-Deemed University, ISBN:978-93-85777-02-8, December 2015. P.no. 239-243.

Participation in Seminars: 4

- A seminar on MATLAB 2018 at Bharathiar University- Computer Science Department on 26-09-2018.

- A seminar on System Application and Production in Data Analytics at Bharathiar University- Computer Science Department on 28-08-2018.

- A Seminar on Future of Mobile Technologies and Artificial Intelligence (SFMTAI'17) on 15.12.2017 at, Bharathiar University, Coimbatore – 46, 15.12.2017.

- Short term training program on "Pattern Recognition" conducted from 27.02.2017 to 02.03.2017 at Kumaraguru College of Technology, Coimbatore.

Participation in Workshop: 8

- Pre-Conference Workshop on Machine Learning in Image Processing on 08.08.2019 to 09.08.2019 at Kongu Engineering College, Perundurai, Erode.

- Workshop on Machine Learning at Bharathiar University- Computer Science Department on 09-09-2018.

- National Workshop on Statistical Analysis Using R on 06.09.2018 and 07.09.2018 at Bharathiar University- Computer Science Department.

- Workshop on "Deep Learning in Image Processing" on 07.02.2018 to 09.02.2018 at Anna University, Chennai.

- National Workshop on "Recent Trends in Image Processing using MATLAB", on 24.07.2017 to 25.07.2017at Kongu Engineering College, Erode.

- National Workshop on "Computer Vision and Image Processing Techniques" (NWCVIPT'16) conducted from 30.03.2017 to 01.04.2017 at Amrita Vishwa Vidyapeetham University, Coimbatore.

- Pre-conference workshop on "Programming, Simulation and Optimization using MATLAB/SIMULINK" on 21.02.2017 at SVS Engineering College, Coimbatore.

- IEEE Authorship Workshop: How to publish a Technical Paper with IEEE Authorship Workshop on 25.10.2016 at Coimbatore Institute of Technology, Coimbatore.

Participation in Faculty Development Programme: 4

- Faculty Development Programme (FDP) on Computer Vision and Deep Learning: A Research Perspective on 26.08.2019 to 01.09.2019 at PSG College of Technology, Coimbatore.

- Faculty Development Programme (FDP) on Machine Learning (FDP-ML 19) on 30.01.2019 to 01.02.2019 at Bharathiar University, Coimbatore.

- Faculty Development Programme on "Big Data Analytics" on 25.07.2016 to 27.07.2016 at PSG Technology, Coimbatore.

- Faculty Development Programme on "Data Science and Artificial Intelligenc" 06.10.2025 to 10.10.2025, organized by Consortium of Higher Educational Institutions for Research & Development (CHIRD).

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