

Curriculum Vitae

PERSONAL INFORMATION **Muhammad Suffian**



<https://scholar.google.com/citations?user=MSrYRgEAAAAJ&hl=en>



Skype | Google Hangouts

Sex: Male | Nationality: Pakistan

STUDIES APPLIED FOR OBJECTIVE

I am a PhD student at the University of Urbino Carlo Bo, Italy and want to join your prestigious institute ----- having highly professional and technically sound people in this ---- field.

RESEARCH/INTEREST AREAS

Explainable AI, Machine Learning, Deep NLP

EDUCATION AND TRAINING

30 Nov 2020–Present

PhD in Computer Science (in progress)
University of Urbino Carlo Bo (Italy)

9 Sep 2016–10 Jul 2018

Master of Science in Computer Science (MScS)
Mohammad Ali Jinnah University, Karachi (Pakistan)
CGPA 3.67/4.0 (90.5%)

I have done my master degree with Thesis-I and Thesis-II. My studies focus were in Machine Learning, Natural Language Processing and Clinical NLP.

Master Thesis: Formulating Patient descriptions to support Evidence based Medicine

My Master thesis title is "Formulating Patient descriptions to support Evidence based Medicine ". In evidence-based medicine the practitioners do prescriptions on the patient present condition. This thing was automated by using the patient descriptions (in textual format). The system predicts about the disease and do suggest the precautionary measures. This was done by using machine learning and natural language processing algorithms and techniques. Clinical records for the better prescription and medication were used as the dataset.

4Apr 2012–31 Dec 2015

Bachelor of Science in Computer Science (BScS)
Sukkur IBA University, Sukkur (Pakistan)
CGPA 3.22/4.0 (81%)

My Bachelor degree was consists of eight semesters including final year project. My specialization in bachelor degree was Computer Science. My studies focused were in Data Processing, Artificial Intelligence, Web Programing, vital signs sensing and mobile applications.

BS(CS) Final Year Project : Remote Patient Monitoring via Vital Signs

In final year project, remote patient monitoring was done with the help of vital signs of patients. The web based and mobile applications were the platforms for managing the patient condition. This was a project for the prompt response to cardiac patients to mitigate the problem by sending signals and vital sign readings to the concern doctor for the immediate response.

WORK EXPERIENCE

27 Jan 2020–Present **Lecturer, Computer Science**

FAST National University of Computer and Emerging Sciences
9-kilometer motorway, 38000 Faisalabad (Pakistan)

<http://cfd.nu.edu.pk/>

Computer Science department

I am working as a Lecturer in the department of Computer Science at National University of Computer and Emerging Sciences since January 27, 2020. I have taught various courses including:

1. **Natural Language Processing** [Fall-2020]
2. **Theory of Automata** [Fall-2020]
3. **Database Systems** [Spring-2020]
4. **Data Structures and Algorithms** [Spring-2020]

I have supervised few projects in the area of natural language processing at bachelor level.

9 Feb 2016–23 Jan 2020 **Lecturer, Computer Science**

Mohammad Ali Jinnah University, Karachi
22-E, Block-6 PECHS, 75400 Karachi (Pakistan)

<https://jinnah.edu/>

I have worked as a Lecturer in the department of Computer Science at Mohammad Ali Jinnah University, Karachi from February 09, 2016 to January 23, 2020. I have taught various courses including:

1. **Introduction to Computing** [Fall-2016]
2. **Computer Programming** [Spring-2016] [Spring-2017] [Spring-2018]
3. **Object Oriented Programming** [Fall-2018] [Fall-2019]
4. **Database Systems** [Fall-2017] [Summer-2018] [Fall-2016] [Spring-2017]
5. **Operating Systems** [Spring-2019]
6. **Data Structures and Algorithms** [Fall-2018] [Summer 2019]
7. **Theory of Automata** [Spring-2016] [Spring-2017] [Spring-2019]
8. **Programming for Bio-Informatics** [Fall-2019]

I have supervised various projects in the area of machine learning, deep learning, natural language processing, Database Systems, Computer Programming and object oriented analysis and design at bachelor level.

15 Feb 2016 – 15 May 2016

Teaching Assistant

Mohammad Ali Jinnah University, Karachi (Pakistan)

Worked as teaching assistant for Computer Programming course at Mohammad Ali Jinnah University, Karachi

1 June 2014 – 1 Aug 2014 **Internship**

Microsoft Innovation Centre (MIC), Lahore (Pakistan)

Worked as an internee in windows 8 phone application development at MIC Lahore to gain the industrial experience.

RESEARCH PAPERS

Conferences

"M. Y. Khan and M. S. Nizami, "Urdu Sentiment Corpus (v1.0): Linguistic Exploration and Visualization of Labeled Dataset for Urdu Sentiment Analysis," 2020 International Conference on Information Science and Communication Technology (ICISCT), Karachi, Pakistan, 2020, pp. 1-15, doi: 10.1109/ICISCT49550.2020.9080043.

2. "A SMRT-RPMS-APP: A Novel Remote Patient Monitoring System Featuring Vital Signs via Smart Phones". H.S.Azhar, Muhammad Suffian, Saif Hassan; in Proceedings of the 1st International Conference on Computing and Information Sciences, KIET, Karachi ICCIS-2016.

Journal Publications

1. Muhammad Suffian, Muhammad Yaseen Khan and Shuakat Wasi, "Developing Disease Classification System based on Keyword Extraction and Supervised Learning" International Journal of Advanced Computer Science and Applications(IJACSA), 9(9), 2018. <http://dx.doi.org/10.14569/IJACSA.2018.090976>
2. "A SMRT-RPMS-APP: A Novel Remote Patient Monitoring System Featuring Vital Signs via Smart Phones". H.S.Azhar, Muhammad Suffian, Saif Hassan; Science International (Lahore), 29 (1),65-71), Indexed in ClarivateAnalytics'.
3. Nizami M.S., Khan M.Y., Ahmed T. (2020) Towards a Generic Approach for PoS-Tagwise Lexical Similarity of Languages. In: Bajwa I., Sibaliya T., Jawawi D. (eds) Intelligent Technologies and Applications. INTAP 2019. Communications in Computer and Information Science, vol 1198. Springer, Singapore. https://doi.org/10.1007/978-981-15-5232-8_42
4. Ahmed, Tafseer, Muhammad Suffian Nizami, and Muhammad Yaseen Khan. "Discovering lexical similarity through articulatory feature-based phonetic edit distance." *arXiv preprint <https://arxiv.org/abs/2008.06865>* (2020).
5. Muhammad Suffian Nizami, Tafseer Ahmed and Muhammad Yaseen Khan, "Hindustani or Hindi vs. Urdu: A Computational Approach for the Exploration of Similarities Under Phonetic Aspects" International Journal of Advanced Computer Science and Applications(IJACSA), 11(11), 2020. <http://dx.doi.org/10.14569/IJACSA.2020.0111191>

PERSONAL SKILLS

Technical Skills and Tools

C, C++, C#, Matlab, Python, Java, OpenCV, Web technologies ,Oracle, Weka, SPSS, SQL server 2014, Alexnet deep convolution neural network framework, PyTorch.

Mother tongue(s)

Urdu, Punjabi

Foreign language(s)

| | UNDERSTANDING | | SPEAKING | | WRITING |
|---------|---------------|---------|--------------------|-------------------|---------|
| | Listening | Reading | Spoken interaction | Spoken production | |
| English | B2 | C1 | B2 | C1 | C1 |
| IELTS | | | | | |

ORGANISATIONAL / MANAGERIAL SKILLS

1. Member, Industrial liaison committee NUCES-FAST, Faisalabad(2020–Present)
2. Organising committee, 1st International Conference on Data Sciences, MAJU, Karachi (2019)
3. Head, Final Year Project, MAJU, Karachi (2017–2019)
4. Internal Facilitator for NCEAC, MAJU, Karachi(2018)
5. Academic Advisor, MAJU, Karachi(2017–2019)
6. Final Year Project Evaluation/Exhibition Committee, MAJU, Karachi (2017–2019)
7. Founding Faculty Sponsor of ACM-MAJU Student Chapter, MAJU, Karachi (2017–2019)
8. Admission Interview Committee(BS MS), MAJU, Karachi (2018–2019)
9. Credit Transfer Committee (MS Students), MAJU, Karachi (2018–2019)
10. Member Cafeteria Committee, MAJU, (2018–2019)

Digital skills

SELF-ASSESSMENT

| Information processing | Communication | Content creation | Safety | Problem-solving |
|------------------------|-----------------|------------------|-----------------|------------------|
| Proficient user | Proficient user | Independent user | Proficient user | Independent user |

Digital skills - Self-assessment grid

ADDITIONAL INFORMATION

- Honours and awards**
1. Silver Medal in Master's Degree
 2. Awardee of Merit Scholarship for MS Studies (2016)
 3. Awardee of ICT R&D Fund for Final Year Project in BSCS Project title ' Remote Patient Monitoring via Vital Signs' (2015)
 4. Achieved National ICT R&D Scholarship (2012-2016)) by Ministry of Information and Technology Pakistan on merit for 4 years Bachelor in Computer Science BS (CS) at Sukkur IBA University, Sukkur (Pakistan)

- Seminars**
1. 2nd International Conference on Intelligent Technologies and Applications, Bahawalpur (2019)
 2. International Spring School on Advanced Language Engineering Organized by DAAD, University of Moratuwa, Sri Lanka (2019)
 3. 1st International Conference on Data Science, MAJU, Karachi (2019)
 4. 1st International Conference on Computing and Information Sciences, KIET, Karachi (2018)
 5. 3-Day Workshop on Data Science and Deep Learning, MAJU, Karachi (2017)

INTERNATIONAL WORKSHOP

I participated in **International Spring School on Advanced Language Engineering**, at the University of Moratuwa, Sri Lanka (March 2019 organized by German education exchange agency DAAD from 11th March to 23rd March at University of Moratuwa. I completed successfully 4-courses in this school from the renowned trainers:

1. **Grammar Engineering - Dr. Miriam Butt, Germany**
2. **Language Foundations and Basic morphology - Dr. Miriam Butt, Germany**
3. **Deep Natural Language Processing - Dr. Hassan Sajjad, Qatar Computing research center**
4. **Computational Corpus Linguistics – Dr. Stefan Evert, Germany**

- References** References available upon request.