## **Muhammad Abbas**

# Adjunct Faculty

College of Electrical & Mechanical Engineering

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Since 1993

### **About**

PEC

Dr. Muhammad Abbas is working as Adjunct Faculty in the College of Electrical & Mechanical Engineering. Dr. Muhammad Abbas has a PhD in Information System. Dr. Muhammad Abbas has published 50 research articles & conference papers having a citation count of 136, carried out 2 projects and filed 0 intellectual property.

#### **Qualifications**

PhD in Information System University of Manchester, England	2007 - 2011
MS in nformation System Engineering University of Manchester , United Kingdom	2006 - 2007
BE in Bachelor of Engineering  NED UET Karachi , Pakistan	1987 - 1992
Experience	
Adjunct Faculty College of Electrical & Mechanical Engineering	2023- Present
Adjunct Faculty  College of Electrical & Mechanical Engineering	2020 - 2023
Defence Faculty College of Electrical & Mechanical Engineering	2020 - 2020
Defence Faculty College of Electrical & Mechanical Engineering	2012 - 2020
Faculty NUST/EME , NUST/EME, Rawalpindi	2012 - 2020
Brig Pakistan Army , College of EME	1993- Present
Awards	
Tamgha-i-Imtiaz(Military) GHQ	2016
Professional Memberships	

### **Research Projects**

On the mutual information of relaying protocols

Saad Rehman Aimal Khan Muhammad Abbas Ayaz Ahmad Physical Communication, Volume 30, Pages 33-42 Impact Factor: 1.451 | Quartile: 3 | Citations: 7

## **National Projects Duplicate Cleansing (Duplicate record detection and merging)** 2017 Funding Agency: NESCOM Amount: PKR 250,000.00 Status: Completed Remote Operated Weapon System (ROWS) 2018 Funding Agency: NUST Amount: PKR 300,000.00 Status: Completed **International Projects Research Articles** Vision Transformer and Language Model based Radiology Report Generation 2023 Mashood Mohammad Mohsan Muhammad Usman Akram Ghulam Rasool Norah Saleh Alghamdi Muhammad Abdullah Aamer Baqai Muhammad Abbas IEEE Access, Volume 11, Pages 1814-1824 Impact Factor: 3.476 | Quartile: 2 | Citations: 30 DOI: 10.1109/ACCESS.2022.3232719 The Impact of Technology Audit on Technology Capabilities in Pakistani Training Institutes 2022 Muhammad Abbas Asjad Shahzad Journal of Engineering Management and Competitiveness, Volume 12, Issue 2, Pages 151-164 Impact Factor: N/A DOI: 10.5937/JEMC2202151S A Framework for Classification of Gabor Based Frequency Selective Bone Radiographs Using CNN 2021 Rehan Nemati Farhan Riaz Ali Hassan Saad Rehman Muhammad Ajmal Azad Muhammad Abbas Farhan Hussain Saddaf Rubab Arabian Journal of Science and Engineering, Volume 46, Pages 4141-4152 Impact Factor: 2.807 | Quartile: 2 | Citations: 2 DOI: https://doi.org/10.1007/s13369-021-05339-7 Blood Glucose Level Prediction of Diabetic Type 1 Patients Using Nonlinear Autoregressive Neural 2021 Networks Usman Qamar Muhammad Asad Muhammad Abbas Journal of Healthcare Engineering, Volume 2021, Article ID 6611091, 7 pages Impact Factor: 3.822 | Quartile: 2 | Citations: 15 DOI: https://doi.org/10.1155/2021/6611091 Approximate Proximal Gradient-Based Correlation Filter for Target Tracking in Videos: A Unified 2019 Approach Aimal Khan Haris Masood Saad Rehman Farhan Riaz Ali Hassan Muhammad Abbas Arabian Journal for Science and Technology, Volume 44, Issue 11, Pages 9363-9380 Impact Factor: 1.711 | Quartile: 2 | Citations: 7 **DOI:** 10.1007/s13369-019-03861-3 Mathematical model based traffic violations identification 2019 Fozia Mehboob Muhammad Abbas Abdul Rauf Computational and Mathematical Organization Theory, Volume 25, Pages 302-318 Impact Factor: 1.558 | Quartile: 2 | Citations: 3 **DOI:** https://doi.org/10.1007/s10588-018-9264-x Active contour-based clutter defiance scheme for correlation filters 2019 Ahmed Bilal Awan Asim Dilawar Bakhshi Muhammad Abbas Saad Rehman Electronics Letters, Volume 55, Issue 9, Pages 525-527 Impact Factor: 1.316 | Quartile: 3 | Citations: 4 DOI: 10.1049/el.2018.7955

2018

Citations: N/A

2018 Trajectory based vehicle counting and anomalous event visualization in smart cities Fozia Mehboob Muhammad Abbas Richard Jiang Abdul Rauf Shoab Ahmed Khan Saad Rehman Cluster Computing-The Journal of Networks Software Tools and Applications, Volume: 21 Issue: 1 Pages: 443-452 Special Issue: SI Impact Factor: 1.851 | Quartile: 2 | Citations: 13 DOI: 10.1007/s10586-017-0885-5 Self-Organizing Hierarchical Particle Swarm Optimization of Correlation Filters for Object Recognition 2017 Sara Tehsin Saad Rehman Muhammad Omer Bin Saeed Farhan Riaz Ali Hassan Muhammad Abbas Rupert Young Mohammad S. Alam IEEE Access, Volume 5, Pages 24495-24502 Impact Factor: 3.557 | Quartile: 1 | Citations: 24 DOI: 10.1109/ACCESS.2017.2762354 Glyph-based video visualization on Google Map for surveillance in smart cities 2017 Fozia Mehboob Muhammad Abbas Shoab A. Khan Richard Jiang Ahmed Bouridane Saad Rehman EURASIP Journal on Image and Video Processing, Article Number: 28 Impact Factor: 1.737 | Quartile: 2 | Citations: 15 DOI: 10.1186/s13640-017-0175-4 SAP-ERP Implementation: Change Management Model using Qualitative Approach 2016 Muhammad Umar Nawar Khan Mujtaba Hassan Agha Muhammad Abbas International Journal of Computer Science and Network Security, Volume 16, Issue 6, Pages 9-13 Impact Factor: -DOI: https://www.semanticscholar.org/paper/SAP-ERP-Implementation-%3A-Change-Management-Model-Umar-Khan/edd3fbc1bfc6700103402e85a8100555c2b7e843 **Exploring the Factors Affecting ERP Implementation Quality** 2016 M. Umar Nawar Khan Muhammad Hassan Agha Muhammad Abbas Journal of Quality and Technology Management, Volume 12, Issue 1, Pages 137 - 155 Impact Factor: 0 DOI: http://pu.edu.pk/images/journal/iqtm/PDF-FILES/06-Exploring\_jun\_16.pdf 2015 A Logic Based Framework for the Management of Changing Software Requirement Umm-e-Habiba Syed Mohtashim Abbas Bokhari Muhammad Abbas Lecture Notes on Software Engineering, Volume 3, Issue 4, Pages 275-278 Impact Factor: 0 DOI: 10.7763/LNSE.2015.V3.203 Limitations of Service Oriented Architecture and its Combination with Cloud Computing 2015 Syed Mohtashim Abbas Bokhari Farooque Azam Muhammad Abbas Umm-e-Habiba Bahria University Journal of Information & Communication Technologies, Volume 8, Issue 1 Impact Factor: 0 DOI: https://www.bahria.edu.pk/ojs/index.php/bujict/article/view/86 Three Tier Unified Process Model for Requirement Negotiations and Stakeholder Collaborations 2012 Muhammad Ashraf Khan Niazi Dr. Muhammad Abbas Muhammad Shahzad International Journal of Advancements in Research & Technology, Volume 1, Issue 6 Impact Factor: 0 DOI: https://www.researchgate.net/publication/258650620\_Three\_Tier\_Unified\_Process\_Model\_for\_Requirement\_Negotiations\_and\_Stakeholder\_Collaborations **Conference Proceedings** Image Steganography using Least Significant Bit (LSB) - A Systematic Literature Review 2022 Muhammad Rashid Farooque Azam Muhammad Abbas Yawar Rasheed Muhammad Waseem Anwar Adnan Aslam Saud S. Alotaibi 2022 2nd International Conference on Computing and Information Technology (ICCIT), res.country(233,) Citations: 16 DOI: 10.1109/ICCIT52419.2022.9711628 A Model Driven Framework for Efficient Bandwidth Allocation in Fog Computing Using Priority 2022 **Algorithm** Mehwish Naz Muhammad Rashid Farooque Azam Muhammad Abbas Yawar Rasheed Mohammed H Sinky Muhammad Waseem Anwar 2022 2nd International Conference on Computing and Information Technology (ICCIT), res.country(233,)

A Novel Model Driven Framework for Image Enhancement and Object Recognition 2020 Wasi Haider Butt Yawar Rasheed Muhammad Abbas Muhammad Waseem Anwar Urooj Fatima International Conference on Information and Software Technologies, ICIST 2020, res.country(132,) Citations: N/A **DOI:** 10.1007/978-3-030-59506-7\_2 SimFiller: Similarity-Based Missing Values Filling Algorithm 2018 Fateh ur Rehman Muhammad Abbas Sajjad Murtaza Wasi Haider Butt Usman Qamar Saad Rehman 13th International Conference on Digital Information Management, res.country(57,) Citations: N/A DOI: N/A Object Recognition Using SVM Based Bag of Combined Features, 2018 Brig. Muhammad Abbas Fozia Mehboob Abdul Rauf Science and Information Conference 2018, res.country(231,) Citations: N/A DOI: 10.1007/978-3-030-01174-1\_37 2018 Comparative study of local binary pattern and its shifted variant for osteoporosis identification Hina Ajmal Farhan Hussain Muhammad Abbas Saad Rehman Aimal Khan Rupert Young Mohammad S. Alam SPIE Defense + Security 2018 Conference, res.country(233,) Citations: N/A DOI: 10.1117/12.2304721 Implementation of Scrum in Pakistan's IT Industry 2018 Bilal Maqbool Fateh Ur Rehman Muhammad Abbas Saad Rehman 2nd International Conference on Management Engineering, Software Engineering and Service Sciences, res.country(48,) Citations: N/A DOI: 10.1145/3180374.3181336 Implementation of Software Testing Practices in Pakistan's Software Industry 2018 Bilal Magbool Fateh Ur Rehman Muhammad Abbas Saad Rehman ACM-ICMSS 2018: ACM--2018 2nd International Conference on Management Engineering, Software Engineering and Service Sciences (ICMSS 2018)--Ei Compendex, res.country(48,) Citations: N/A DOI: 10.1145/3180374.3181340 Evaluation of trust management approaches in wireless sensor networks 2018 Farwa Kazmi Muazzam A. Khan Ayesha Saeed Nazar Abbas Saqib Muhammad Abbas 2018 15th International Bhurban Conference on Applied Sciences and Technology (IBCAST), res.country(177,) Citations: N/A DOI: 10.1109/IBCAST.2018.8312329 2018 Numerical investigation of breathing in a long blunt nosed body at supersonic speed Naveed Akram Emad ud Din M. Arshad Farhan Abbas Ali Abbas Zaidi 15th International Bhurban Conference on Applied Sciences and Technology, res.country(177,) Citations: N/A DOI: 10.1109/IBCAST.2018.8312290 Numerical simulation of circulation control airfoil using RANS solver 2018 Ali Abbas Zaidi Janfizza Bukhari 15th International Bhurban Conference on Applied Sciences and Technology, res.country(177,) Citations: N/A DOI: 10.1109/IBCAST.2018.8312274 2018 Design and development of low-speed water tunnel Mujahid Saeed Dr. Emad Uddin Dr. Aamir Mubashar Salim Uddin Zahir Ali Abbas Zaidi 15th International Bhurban Conference Applied Sciences and Technology (IBCAST), res.country(177,) Citations: N/A DOI: 10.1109/IBCAST.2018.8312288 **Evaluation of Trust Management Approaches in Wireless Sensor Networks** 2018

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15th International Bhurban Conference on Applied Sciences and Technology (IBCAST), res.country(177,)

Citations: N/A DOI: 10.1109/IBCAST.2018.8312329 A Novel Technique for Recognition and Tracking of Moving Objects Based on E-MACH and Proximate 2017 Gradient (PG) Filters Muazzam Khattak Haris Masood Dr. Saad Rahman Dr. Qaiser Chaudhary Dr. Muhammad Abbas M.Alam2 Rupert Young 20th IEEE International Conference of Computer and Information Technology (ICCIT), res.country(19,) Citations: N/A DOI: 10.1109/ICCITECHN.2017.8281849 A Novel Technique for Recognition and Tracking of Moving Objects based on E-MACH and Proximate 2017 Gradient (PG) Filters Haris Masood Saad Rehman Muazzam Khan Qaiser Javed Muhammad Abbas Muhammad Alam Rupert Young 20th IEEE International Conference on Computer and Information Technologies, res.country(19,) Citations: N/A DOI: 10.1109/ICCITECHN.2017.8281849 FIG based Quality Assurance in Software Product Lines 2017 Nazish Yousaf Rida Sheikh Muhammad Abbas 2017 International Conference on Frontiers of Information Technology (FIT), res.country(177,) Citations: N/A DOI: 10.1109/FIT.2017.00038 2017 **Evaluation of Team Expertise in Software Development Organizations** Muhammad Qasim Riaz Muhammad Abbas Sufian Irshad 2017 International Conference on Frontiers of Information Technology (FIT), res.country(177,) Citations: N/A DOI: 10.1109/FIT.2017.00018 AAGV: A Cluster Based Multicast Routing Protocol for Autonomous Aerial and Ground Vehicles 2017 Communication in VANET Muazzam Khattak Wagar Faroog Saad Rehman Nazar Abbas Sagib Muhammad Abbas 15th International Conference on Frontiers of Information Technology (FIT 2017), res.country(177,) Citations: N/A DOI: 10.1109/FIT.2017.00063 AAGV: A Cluster Based Multicast Routing Protocol for Autonomous Aerial and Ground Vehicles 2017 Communication in VANET Wagar Faroog Muazzam Ali Khan Saad Rehman Nazar Abbas Sagib Muhammad Abbas International Conference on Frontiers of Information Technology (FIT) held from 18-20 Dec 2017 in Pakistan, res.country(177,) Citations: N/A DOI: 10.1109/FIT.2017.00063 The Impact of Agile Methodology (DSDM) on Software Project Management 2017 Aiman Khan Nazir Iqra Zafar Muhammad Abbas International Conference on Engineering, Computing & Information Technology (ICECIT 2017), res.country(157,) Citations: N/A DOI: N/A 2017 Team Interaction for Successful Project Management in Software Development Munazza Ansar Raheela Bibi Muhammad Abbas International Conference on Engineering, Computing & Information Technology (ICECIT 2017), res.country(157,) Citations: N/A DOI: N/A A Study on Uncertainties in Software Project Management in Pakistan 2017 Sara Tanvir Mamoona Safdar Hanny Tufail Aimal Khan Muhammad Abbas International Conference on Engineering, Computing and Information Technology, res.country(157,) Citations: N/A DOI: https://www.researchgate.net/publication/330509417\_A\_study\_on\_Uncertainties\_in\_Software\_Project\_Management\_in\_Pakistan

2017

A Comparative Study of Types, Tools and Techniques in Solar Irradiance Forecasting

Kanza Sheikh Saad Rehman Muhammad Abbas Qaiser Chaudry Information Technologies, Systems And Networks, Chisinau, Moldova

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Quality of The Software Products and Their Successfulness.  Muazzam Khattak Maryam Gillani Muhammad Abbas Saad Rehman Ata Ullah  2nd International Conference on Information Technologies, Systems and Networks (ITSN-2017)  Citations: N/A  DOI: https://ibn.idsi.md/ro/vizualizare_articol/60414	2017
Tracking of Fixed Shape Moving Objects based on Modified Particle Filters  Haris Masood Saad Rehman Muazzam Khan Qaiser Javed M.Abbas M.Alam Rupert Young  19th International Conference on Computer and Information Technology, res.country(19,)  Citations: N/A  DOI: 10.1109/ICCITECHN.2016.7860202	2016
Systematic Literature Review: Ingenious Software Project Management while narrowing the impact aspects  Mudassar Adeel Ahmed Imran Ahsan Muhammad Abbas International Conference on Research in Adaptive and Convergent Systems RACS '16, res.country(233,)  Citations: N/A  DOI: 10.1145/2987386.2987422	2016
Traffic Event Detection from Road Surveillance Videos based on Fuzzy Logic  Fozia Mehboob Muhammad Abbas Richard Jiang  2016 SAI Computing Conference (SAI), res.country(231,)  Citations: N/A  DOI: 10.1109/SAI.2016.7555981	2016
Automated Vehicle Density Estimation from Raw Surveillance Videos  Fozia Mehboob Muhammad Abbas Muhammad Atif Tahir Richard Jiang Somaya Al-Maadeed Ahmed Bouridane  2016 SAI Computing Conference (SAI), res.country(231,)  Citations: N/A  DOI: 10.1109/SAI.2016.7555981	2016
Traffic Flow Estimation from Road Surveillance Videos  Fozia Mehboob Muhammad Abbas Resheed Almotaeryi Richard Jiang Somaya Al-Maadeed Ahmed Bouridane  2015 IEEE International Symposium on Multimedia (ISM), res.country(233,)  Citations: N/A  DOI: 10.1109/ISM.2015.14	2015
Identification of Risks in Pakistani IT Companies: A Survey Paper  Mishall Fatima Khan Dr. Muhammad Abbas Dr. Mahmood Anwar Khan  2014 IEEE 27th Canadian Conference on Electrical and Computer Engineering (CCECE), res.country(38,)  Citations: N/A  DOI: 10.1109/CCECE.2014.6900999	2014
Critical success factors assessment in Software Projects  Rabia Hashim Dr. Muhammad Abbas Muhhammad Hashim  IEEE Technically Co-Sponsored Science and Information Conference, res.country(231,)  Citations: N/A  DOI: https://ieeexplore.ieee.org/document/6661752	2013
Software Project Management in virtual Teams  Bakhtawar Seerat Marriam Samad Muhammad Abbas  2013 Science and Information Conference, res.country(231,)  Citations: N/A  DOI: https://ieeexplore.ieee.org/document/6661728	2013
Risks Factors Identification and Assessment in Virtual Projects of Software Industry: A Survey Study  Iqra Basharat Tayyaba Nafees Dr Muhammad Abbas  2013 Science and Information Conference, res.country(231,)  Citations: N/A  DOI: https://ieeexplore.ieee.org/document/6661735	2013
Risk Management System for ERP Software Projects  Muhammad Zaman Fakhar Dr. Muhammad Abbas Madiha Waris  2013 Science and Information Conference, res.country(231,)	2013

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