

## CVs of Academic Staff

Full name: Muhammed Basheer Jasser  
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Academic qualifications

Level	Name of Awarding Institution and Country	Year Awarded
Ph.D of Computer Science	University Putra Malaysia	2018
Master of Computer Science (Software Engineering)	University Putra Malaysia	2013
Bachelor in Computer Engineering	University of Aleppo	2009

i Current Professional Membership:

- Member, Institute of Electrical and Electronics Engineers (IEEE)
- Member, IEEE Computational Intelligence Society
- Member, IEEE Computer Society
- Member, the Institute of Electronics, Information and Communication Engineers (IEICE)
- Member, Formal Methods Europe (Research Group)
- Member, Syrian Engineers Association

i Current Teaching and Administrative Responsibilities

Teaching at Sunway University

Programme	Subjects taught
Bachelor of Software Engineering (Hons), BSc (Hons) in Computer Science	CSC3209 Software Architecture and Design Patterns
Bachelor of Software Engineering (Hons), BSc (Hons) in Computer Science	SWE3053 Software Evolution and Maintenance

DIPLOMA IN INFORMATION TECHNOLOGY	PRG101D Concepts of Problem Solving
DIPLOMA IN INFORMATION TECHNOLOGY	PRG102D Basic Programming Concepts
BSc (Hons) in Computer Science	CSC2044 Concurrent Programming

Administrative at Sunway University: DCIS Research Council (Member)

Previous Employment

Name of Employer	Position Held	Start and End Date
Faculty of Computer Science and Information Technology, University Putra Malaysia	Research Fellow	02/2017-12/2018
Faculty of Computer Science and Information Technology, University Putra Malaysia	Research Assistant	02/2014-02/2017
Faculty of Computer Science and Information Technology, University Putra Malaysia	Developer of Composition in UML-B	07/2013-02/2014
Technical Computer Institute, Aleppo University, Syria	Lecturer	09/2010-02/2012
Aljasser Institute for Computer & IT, Syria	Instructor	01/2004-1/2012

Conferences and Training (past three years only, inclusive of the current year)

Date	Conference/Training Attended
2018	iCicSE-2018-INTERNATIONAL CONFERENCE ON INNOVATION OF COMPUTER SCIENCE AND ENGINEERING, Kuching, Sarawak, Malaysia
2019	APPLIED INFORMATICS INTERNATIONAL CONFERENCE AiC 2019, Penang, Malaysia
2019	WORKSHOP : Strategies follow in writing the citable index ISI WOS paper : "Multi-Layer Systematic Review", Penang, Malaysia

- v Research and Publications
- Current research: Formal Methods, Formal Specification, Formal Verification, Artificial Intelligence, Machine Learning
  - Muhammed Basheer Jasser, Mar Yah Said, Jamilah Din and Abdul Azim Abdul Ghani. A Survey on Refinement in Formal Methods and Software Engineering, International Journal of Advanced Trends in Computer Science and Engineering (IJATCSE), 2019.
  - Muhammed Basheer Jasser, Jamilah Din, Rodziah Atan and Yusmadi Yah Jusoh. The Measurement of Safety Criteria in Safety Critical Systems, International Journal of Advanced Trends in Computer Science and Engineering (IJATCSE), 2019.
  - Mohammed Ibrahim, Muhammed Basheer Jasser, Mohd Taufik Abdullah, and Azizol Abdullah, Formalization of IoT Digital Forensic Triage for Identification of IoT Devices under Investigation. International Journal of Engineering and Advanced Technology (IJEAT), 2019
  - Jamilah Din, Ilori Michael, and Muhammed Basheer Jasser, SOFTWARE REQUIREMENTS PRIORITIZATION TOOL USING A HYBRID TECHNIQUE. International Journal of Engineering and Advanced Technology (IJEAT), 2019.
  - Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. A method for matching models in UML-B. Journal of Theoretical and Applied Information Technology, Volume 96- No 3, February 2018.
  - Jamilah Din, Rodziah Atan, Yusmadi Yah Jusoh, and Muhammed Basheer Jasser. Towards Employing Metrics in Measuring the Quality of Software Safety Critical Systems and Managing their Development, International Journal of Engineering & Technology (IJET), Vol 7, No 4.31 (2018).
  - Jamilah Din, Ooi Chiew Wei, and Muhammed Basheer Jasser. Automated Code Optimizer as an Energy Assistant in Green Computing Applications, International Journal of Engineering & Technology (IJET), Vol 7, No 4.31 (2018).
  - Muhammed Basheer Jasser, Fatimah Sidi, Aida Mustapha and Abdulelah Khaled T Binhamid, Mining Students' Characteristics and Effects on University Preference Choice: A Case Study of Applied Marketing in Higher Education, International Journal of Computer Applications (0975 - 8887), Volume 67 - No. 21, April 2013

- Muhammed Basheer Jasser, Mohamad Sarmini, and Rauf Yaseen. "Ant Colony Optimization (ACO) and a Variation of Bee Colony Optimization (BCO) in Solving TSP Problem: A Comparative Study." *International Journal of Computer Applications* 96.9 (2014).
- Ali Dehghantanha Mohammed Ibrahim, Mohd Abdullah, and Muhammed Basheer Jasser, Formal Approach for Investigating SPIT Scenario, 3RD CMI - GTUC INTERNATIONAL CONFERENCE-APPLICATIONS OF MOBILE COMMUNICATIONS IN AFRICA: PROSPECTS & CHALLENGES, 2014
- Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. Towards Shared Variable Decomposition Support in Rodin UML-B, Information Technology Colloquium , FSKTM, UPM, (INTEC), (2015).
- Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. A method of shared-variable decomposition in UML-B. *Journal of Systems and Software*, (Submitted)
- Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. A method of pattern reuse in UML-B, (Submitted)
- Muhammed Basheer Jasser, Jamilah Din, Mar Yah Said, and Abdul Azim Abdul Ghani. A Survey on Decomposition in Formal Methods and Software Engineering, AiIC, Malaysia, 2019 (Submitted)
- Muhammed Siraj, Muhammed Basheer Jasser, Mohd. Izuan Hafez Hj. Ninggal, Nur Izura Udzir, Aziah Asmawi, Muhammad Daniel Hafiz Abdullah. Towards formal verification of Blockchain Consensus Mechanism, AiIC, Malaysia, 2019 (To be Submitted).
- Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. Extending UML-B language to support shared-variable decomposition, (To be Submitted).
- Muhammed Basheer Jasser, Mar Yah Said, Abdul Azim Abdul Ghani, and Pathiah Abdul Samat. A method of shared-variable composition in UML-B, (To Be Submitted).

vi Consultancy

### Scientific Journal and Conference Reviewer

Journal Referee (Technical Reviewer) (IEEE Access, IEEE)
iCiCSE-2018-INTERNATIONAL CONFERENCE ON INNOVATION OF COMPUTER SCIENCE AND ENGINEERING
MySec2018- Malaysian Software Engineering Conference

i **Community service**

UPMISA (Country Representative) at International Student Association at University Putra Malaysia

**Other relevant information**

### Industrial Experience and Projects

Project	Organization/Company	Years of Experience
Rodin (Event-B, UML-B)	Collaborative research development (University Putra Malaysia and University of Southampton)	2012-2019
Supporting Development of UML-B Models	University Putra Malaysia	2012-2019
Automated Shared-Event Decomposition Support for UML-B	University Putra Malaysia	2012-2013
Mining University Data for Decision Making	University Putra Malaysia	2012-2013
Shared-Event composition editor for UML-B	University Putra Malaysia	2013-2014
Employees Identity and Salary System	AlJasser Institute	2008-2009
A software development package metrics for safety critical systems	University Putra Malaysia	2017-2019

### ADMINISTRATIVE POSITIONS

Session Chair at iCiCSE-2018-INTERNATIONAL CONFERENCE ON INNOVATION OF COMPUTER SCIENCE AND ENGINEERING	2018
Supervisor of undergraduate students projects at Aleppo university (technical computer institute)	2010-2012
Director of Aljasser institute for computer and information technologies courses	2004-2011
Session Chair at AiIC-2019- APPLIED INFORMATICS INTERNATIONAL CONFERENCE	2019

### **Honours and awards**

Malaysian Technical Cooperation Program scholarship (MTCP) for postgraduate studies	2014- 2017
International Graduate Research Fellowship (IGRF) (University Putra Malaysia)	2014-2018
Best Paper Award- AiIC-2019- APPLIED INFORMATICS INTERNATIONAL CONFERENCE	2019