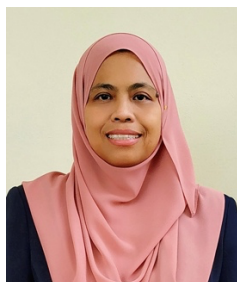




## CURRICULUM VITAE



Nor Asilah Wati Abdul Hamid (PhD, SMIEEE)  
Head of Laboratory,  
Laboratory of Computational Sciences and Mathematical Physics,  
Institute for Mathematical Research,  
Universiti Putra Malaysia, 43400 UPM Serdang, Selangor D.E.

Associate Professor,  
Department of Communication Technology and Network,  
Faculty of Computer Science and Information Technology,  
Universiti Putra Malaysia, 43400 UPM Serdang, Selangor D.E.

Tel: +603 9769 1749 | email: [asila@upm.edu.my](mailto:asila@upm.edu.my)

## **A. Personal Details**

Full Name: Nor Asilah Wati Abdul Hamid Department:

Communication Technology & Network Faculty:

Computer Science & Information Technology

Field of Specialization: Distributed, Parallel and High Performance Computing Staff

Number: A02337

Identity Card Number: 751105-10-5632

Date of Birth: 5<sup>th</sup> November 1975 Gender:

Female

Race: Malay Citizenship:

Malaysia

Current Address: 13 Jalan Sari Ilmu 1/1, Alam Sari, Kajang 43000, Selangor.

Contact: Office: 03-97691749 Fax: 03-89466576

Mobile : 019 2277763

E-mail: asila@upm.edu.my

Current Position: Associate Professor

Grade: DS54

## **B. Education and Academic Qualification**

Degree	University Awarded	Year
Phd	University of Adelaide	2008
MSc	Universiti Putra Malaysia	2001
Bachelor	Universiti Teknologi Malaysia	1998

### C. Employment

Employer	Designation	Department	Start Date	End Date
UPM	Tutor, Lecturer/ Senior Lecturer/ Associate Professor	FSKTM	2001	To present
George Washington University	Visiting Scholar	Institute for Massively Parallel and Computing Technology (IMPACT)	June 2011	June 2013
Northern Virginia Community College, Annandale, 8333 Little River Turnpike, Annandale, VA 22003, USA.	Adjunct Faculty	Computer Science	Hired. But decline the offer.	April 2013
Diplomatic Language Services, 1901 N. Ft Myer Dr, 6th Floor, Arlington VA, 22209, USA.	Malay Language Teacher	Malay Language Dept.	Commence on December 13th 2012. Temp/Substitu te	January 2013
Cybernetics College, Kuala Lumpur	Lecturer	Computer Science	July 1999	July 2000
Software Technology Institute, UTM Kuala Lumpur.	System Analyst	Software Developer	June 1998	June 1999

### D. Administrative

#### i. Administrative Duties

Organization	Position	Start Date	End Date
Laboratory of Computational Sciences and Mathematical Physics, Institute for Mathematical Research, Universiti Putra Malaysia.	Head of Laboratory	June 2021	Present
Research Group of Network Parallel Distributed Computing	Head	April 2018	2021
Industrial Unit FSKTM	Head	January 2015	January 2018
CUDA Teaching Centre, University Putra Malaysia.	Principle Investigator	January 2015	January 2020

ii. **Other Relevant Appointment**

<b>Organization</b>	<b>Position</b>	<b>Start Date</b>	<b>End Date</b>	<b>Expertise</b>
EU-ASEAN: future collaborations and funding opportunities for using HPC for Covid-19 research	Malaysian representative	Julai 2021	Present	High Performance and Distributed Computing
Asia Pacific Advanced Network (APAN) Asia Pacific Research Platform (APRP) Workgroup.	Member	2021	Present	Distributed Computing
Center for Parallel and Distributed Computing Curriculum Development and Educational Resources (CDER) TCPP, IEEE	Early Adopters / Member	Ogos 2014	Ogos 2015	Parallel Computing
Institute of Mathematical Science (INSPEN)	Expert reference	2013	To present	Distributed High Performance Computing
Institute of Mathematical Science (INSPEN)	Deputy Chairperson, 6th Workshop on High Performance Computing	2011	2011	Distributed High Performance Computing
Internal Auditor for Universiti Putra Malaysia (2009-2011).	Internal Auditor	2009	2011	
Institute of Mathematical Science (INSPEN)	Chairperson, 5th Workshop on High Performance Computing	2010	2010	Distributed High Performance Computing
Mixed Mod Master Science, Faculty of Computer Science, Universiti Sains Malaysia	External Examiner	2009	2010	Distributed High Performance Computing
IEEE Access Journal	Reviewer	2017	To present	Distributed High Performance Computing
Plos One Journal	Reviewer	2017	To present	Distributed High Performance Computing
Journal on Wireless Communications and Networking	Reviewer	2007	To present	Wireless Network
Journal of Information & Communication Technology (JICT), Universiti Utara Malaysia.	Reviewer	2008	To present	Distributed High Performance Computing

## E. Academic Awards and International Recognition

<b>Name of awards</b>	<b>Title</b>	<b>Award Authority</b>	<b>Award Type</b>	<b>Year</b>
CUDA Teaching Center	CUDA Teaching Centre	NVIDIA, USA	International	2015-2017
Early Adopter Awards	Early Adopter Awards	TCPP/CDER Curriculum Initiative supported by NSF for US institutions and Intel grants for international institutions to Georgia State University.	International	2015
ASC Student Supercomputer Challenge	Prize for Excellence	Asian Supercomputing Student Supercomputer Challenge	International	2015
UPM Award	Excellent Service Award	UPM	National	2008, 2014, 2015, 2016, 2017, 2018, 2019
Academic Awards	UPM Scholarship for Post-Doctoral at George Washington University, USA.	UPM	National	2003-2007
Academic Awards	UPM Scholarship for PhD study at University of Adelaide, Australia.	UPM	National	2003-2007
Research Award	Bronze medal	Invention, Research and Innovation Exhibition	National	2010
UPM Award	Excellent Service Award	UPM	National	2002 and 2010
Golden Key	Golden Key National Honour	Golden Key	National	1998
UTM	Dean's List	UTM	National	1996-1997

## F. Committee members

No.	Title	Level(International/National/University/Faculty/Department)	Year
1	PI	CUDA Teaching Centre, NVIDIA USA.	Active
2	Senior Member	Institute of Electrical and Electronics Engineers (IEEE)	Active
3	Member	Technical Committee on Parallel Processing (TCPP)	Active
4	Member	Ahli Akademik UPM	Active
5	Research Fellow	Institute of Mathematical Science (INSPEM)	Active

## G. Publications (Recent 5 years)

**H-Index**      **Scopus = 13, Google Scholar = 14**

1. S. Z. Koohi, N. A. W. A. Hamid, M. Othman and G. Ibragimov, "HATS: Heterogeneity-Aware Task Scheduling," in *IEEE Transactions on Cloud Computing*, 2022, doi: 10.1109/TCC.2022.3184081. (Top 10% Q1)
2. Manglayev, T., Kizilirmak, R.C., Kho, Y.H. *et al.* AI Based Power Allocation for NOMA. *Wireless Pers Commun* **124**, 3253–3261 (2022). <https://doi.org/10.1007/s11277-022-09511-6>
3. Koohi, S.Z., Abdul Hamid, N.A.W., Othman, M. and Ibragimov, G., 2021. ROA-CONS: Raccoon Optimization for Job Scheduling. *Symmetry*, 13(12), p.2270
4. Farid, M., Latip, R., Hussin, M. and Hamid, N.A.W.A., 2021. A fault-intrusion-tolerant system and deadline-aware algorithm for scheduling scientific workflow in the cloud. *PeerJ Computer Science*, 7, p.e747.
5. Ling, Y.T., Sani, N.F.M., Abdullah, M.T. and Hamid N.W.A. Metamorphic malware detection using structural features and nonnegative matrix factorization with hidden markov model. *J Comput Virol Hack Tech* (2021). <https://doi.org/10.1007/s11416-021-00404-z>
6. Koohi, S.Z., Abdul Hamid, N.A.W., Othman, M. and Ibragimov, G., 2021. ROA-CONS: Raccoon Optimization for Job Scheduling. *Symmetry*, 13(12), p.2270.
7. Farid, M., Latip, R., Hussin, M. and Abdul Hamid, N.A.W., 2020. A survey on QoS requirements based on particle swarm optimization scheduling techniques for workflow scheduling in cloud computing. *Symmetry*, 12(4), p.551.
8. Farid, M., Latip, R., Hussin, M. and Hamid, N.A.W.A., 2020. Scheduling scientific workflow using multi-objective algorithm with fuzzy resource utilization in multi-cloud environment. *IEEE Access*, 8, pp.24309-24322
9. Samual, J., Hussin, M., Hamid, N.A.W.A., Mustafa, M.R. and Abdullah, A., 2020. AWARENESS OF ENERGY CONSUMPTION IN CLOUD DATA CENTERS: A SURVEY ON EMPLOYEE ENGAGEMENT IN ENERGY MANAGEMENT. *Journal of Critical Reviews*, 7(8), pp.1295-1301.
10. Ling, Y.T., Sani, N.F.M., Abdullah, M.T. and Hamid, N.A.W.A., 2019. Nonnegative matrix factorization and metamorphic malware detection. *Journal of Computer Virology and Hacking Techniques*, 15(3), pp.195-208.
11. Manglayev, T., Kizilirmak, R.C. and Hamid, N.A.W.A., 2019. Gpu accelerated pic and sic for ofdm-noma. *Electronics*, 8(3), p.257.
12. Aldailamy, A.Y., Hamid, N.A.W.A. and Abdulkarem, M., 2018. Distributed indexing: performance analysis of solr, terrier and katta information retrievals. *Malaysian Journal of Computer Science*, pp.87-104.

13. Manglayev, T., Kizilirmak, R.C., Kho, Y.H. and Hamid, N.A.W.A., 2018. GPU accelerated successive interference cancellation for NOMA uplink with user clustering. *Wireless Personal Communications*, 103(3), pp.2391-2400
14. Koochi, S.Z., Hamid, N.A.W.A., Othman, M. and Ibragimov, G., 2018. Raccoon optimization algorithm. *IEEE Access*, 7, pp.5383-539.
15. Majid, A.R.M.A., Hamid, N.A.W.A., Rahiman, A.R. and Zafar, B., 2018. GPU-based Optimization of Pilgrim Simulation for Hajj and Umrah Rituals. *Pertanika Journal of Science & Technology*, 26(3).
16. Koochi, S.Z., Hamid, N.A.W.A., Othman, M. and Ibragimov, G., 2018. On modelling parallel programmes for static mapping: A comparative study. *Pertanika J. Sci. Technol.*, 26(2), pp.523-543.
17. Najim, A.O., Hamid, N.A.W.A., Hanapi, Z.M. and Ahmad, I., 2017. Comparative Study of Packet Scheduling Algorithm in LTE Network. *J. Comput. Sci.*, 13(12), pp.756-76

#### H. Research Grant

No.	Title	Role (PI/Co-researcher)	Year	Sponsor/Grant and Amount (RM)	Status
1.	A Drones Collision Avoidance Framework using Federated Reinforcement Learning and Software-Defined Network (SDN)"	PI	May 2022 – May 2025	AFOSR USD 80,000.00	Ongoing International Grant
2.	Building a High Bandwidth Distributed High Performance Computer (HPC)	Member (Malaysia)	April 2022 – April 2023	Trans-Eurasia Information Network (TEIN) 150,000.00 Euro	Ongoing International Grant
3.	European Mathematical Society - Emerging Research Center of Excellence (ems_erce)	PI	1 January 2022 – 31 Disember 2022	ERCE Grant Euro 3,500.00	International Grant Ongoing
4.	An Automated Text Summarisation Algorithm on GPU using Parallel Multi Objective Optimisation Algorithm to Improve Real-Time Text Summarisation on a Cloud System	PI	September 2021 – 6 September 2023	FRGS RM75,000.00	Ongoing
5.	Minimizing Cost-Makespan for Multi-objective Workflow Scheduling using Hybrid Heuristic Algorithm laaS Cloud	PI	Dec 2020 – Nov 2022	PUTRA RM50,000.00	Ongoing

6.	Enhanced Clustering Algorithms to Improve Inefficiency of Computational and Execution Time for Big Data Mining Using Parallel Computing on GPGPU.	PI	November 2017 - November 2019	PUTRA RM 48,000.00	Completed
7.	Workflow Scheduling in Cloud Computing Using Particle Swarm Optimization for QoS Requirement	Co-researcher	January 2018	Putra Grant RM50,000.00	Completed
8.	Energy-Aware Scheduling Using Dynamic Scaling Theor in Cloud Datacenter	Co-researcher	January 2018	Putra (IPS) RM24,000.00	Completed
9.	A Hybrid Parallel Algorithm for OpenMP, MPI and UPC on Multicore Cluster Supercomputers.	PI	1 Disember 2014 - 31 Mei 2016	FRGS FRGS (5524664), RM 85,000.00	Completed
10.	High Throughput Sequencing and Analysis for Biomarker Development and Application	Co-researcher	2 Dec 2013 – 1 Dec 2015	PUTRA-IPB GP-IPB (9413601), RM 163, 840.00	Completed
11.	Award for CUDA Teaching Centre for Universiti Putra Malaysia by NVIDIA, USA.	PI	Januari 2015	In-kind - 4 GPU - 10 GPU Books - USD 1200 (Bajet for Tutor) In total the amount is RM 45,000.00	Completed
12.	Award for Early Adopters from Center for Parallel and Distributed Computing Curriculum Development and Educational Resources (CDER) TCPP, IEEE	PI	Ogos 2014	Ogos 2015 In-kind USD1000	Completed
13.	Prize for Excellence for Asia Supercomputer (SC) Student Challenge	Co-researcher	Asian Supercomputing Student Supercomputer Challenge	International  In-kind Intel Phi GPU card RM3000.00	Completed
14.	MPI Performance Analysis on Corvus	PI	2010	RUGS, RM30,000.00	Completed



## I. Copyright

No.	Name of writer (s)	Title	Organizer	Date
1.	Nor Asilah Wati Abdul Hamid, Muhammad Ainul Yakin Zubi, Nazirah Ali, Muhammad Taufik Abdullah, Iskandar ishah, Kweh Yeah Lun, Salfarina Abdullah	Industrial Training System	UPM	2016
2.	Ho Chai Ling, Mohamad Mahboubian, Kathiresan Gopal, Zuriati Ahmad Zukarnain, Nor Asilah Wati Abdul Hamid, Rohaya Latip, Nurul Fiza Mat Isa, Paramweswari Navasivayam	Putra BioInformatic Portal	UPM	2017

## J. Consultation Activities

No.	Name of Project/Program	Amount	Year	Status (Completed/ On Going)
1.	Program Latihan Pensijilan HCNA 50 Pelajar Setahun Selama 5 Tahun	Rm500,000.00	2016	Completed
2.	CUDA Teaching Center	Inkind Rm45,000.00	2015	Completed
3.	CDER Curriculum Initiative on Parallel Distributed Computing. (Center for Parallel and Distributed Computing Curriculum Development and Educational Resources (CDER))	Stipend USD 1000	2014	Completed
4.	Asian Supercomputing Competition	Inkind Rm3000	2014	Completed