

Ahmad Hakiim Jamaluddin

Ph.D. in Mathematics and Statistics

UNSW Data Science Hub (uDASH) | School of Mathematics and Statistics

UNSW Sydney, Australia

Email: ahmadhakiimjamaluddin@gmail.com | Website: hakiimj.github.io | LinkedIn: linkedin.com/in/hakiimj

Summary

A recent Ph.D. in Mathematics and Statistics graduate at UNSW Sydney, affiliated with the Statistical Computing Laboratory, UNSW Data Science Hub, UNSW AI Institute and the School of Mathematics and Statistics at UNSW Sydney. Experienced in academic, consultation, and professional roles at UNSW's School of Mathematics and Statistics, School of Biomedical Sciences, School of Education, and StatsCentral as well as other institutions including University of Technology Sydney, Macquarie University and Canterbury Institute of Management. Young academic specialising in Statistics and Data Science at Universiti Putra Malaysia. Former technical accountant (data modeling) at RHB Bank Berhad and CIM engineer (data engineering) at Osram Opto-Semiconductors (M). Recently in 2025, appointed as Education Sector Lead for AI Talent Working Group, National Artificial Intelligence Office (NAIO), Malaysia, and Associate Research Fellow in AI healthcare projects at Hospital Kajang. Passionate about leveraging data-driven insights to solve complex problems, seeking research, collaboration, and industry project opportunities. Currently, he serves as a research officer at the School of Mathematics and Statistics, UNSW Sydney. He will join Universiti Putra Malaysia as a Senior Lecturer in Statistics and Data Science.

Education

- **2021–2025:** Ph.D. in Mathematics and Statistics, UNSW Sydney, Australia.
- **2017–2019:** Master of Science, Statistics, Universiti Utara Malaysia (UUM), Malaysia.
- **2012–2016:** Bachelor of Science with Honours, Industrial Statistics, UUM, Malaysia (1st Class Honours, CGPA: 3.87/4.00).
- **2011–2012:** Malaysian Matriculation, Pure Sciences (Mathematics, Physics, Chemistry, Biology), CGPA: 4.00/4.00.
- **2009–2010:** Malaysian Education Certificate (SPM), Pure Sciences, Grade: 7A+, 2A.

Recent Achievements and Involvement

- **2025:** Nominated for the Outstanding PhD Theses Award, UNSW Sydney.
- **2025:** Academic Peer List, Department of Mathematics, Universitas Airlangga, Indonesia.
- **2025:** Leader, Education Sector, AI Talents Working Group, National AI Office (NAIO), Ministry of Digital Malaysia.
- **2025:** AI Associate Researcher, Hospital Kajang, Malaysia.
- **2025:** Mentor, UNSW Sydney team, SAS Curiosity Cup.
- **2024:** Mentor, UNSW Sydney team, EY Joint Actuarial Case Competition.
- **2023:** Organising Committee Member, Mathematics and Statistics UNSW Postgraduate Conference.
- **2021–2023:** Session Chairperson, Mathematics and Statistics UNSW Postgraduate Conference.
- **2023:** One-Minute Thesis, Postgraduate Research Showcase, Best for School of Mathematics and Statistics, UNSW Sydney.
- **2023:** CHUBB Data Hackathon, CHUBB Insurance Australia Limited, 1st Runner-Up.
- **2023:** Innovator Pro Artificial Intelligence Competition, UNSW Sydney, 2nd Runner-Up.
- **2023:** Think-Tank Artificial Intelligence Policy Competition, University of Sydney, 2nd Runner-Up.

Awards and Scholarships

- **2021–2025:** Ph.D. Mathematics and Statistics Scholarship, Ministry of Higher Education Malaysia.
- **2021:** Perdana Fellowship, Ministry of Youth and Sports Malaysia.
- **2021:** Statistical Data Science Winter School Scholarship, AMSI.
- **2021:** Conference on Artificial Intelligence & Data-Driven Innovations (AIDDI2021) Scholarship, MSORSM.
- **2019:** Statistics (Data Science) Young Academic Scheme Award, Universiti Putra Malaysia.
- **2016:** Chancellor Gold Medal Award (Best overall undergraduate student), UUM.
- **2016:** Vice Chancellor Gold Medal Award (Best Industrial Statistics undergraduate student), UUM.
- **2016:** 1st Place, Internship Project, “Unstructured Data Analytics for Marketing Analytics,” UUM.
- **2016:** 1st Place, Final Year Project, “Shrimp Quality Management,” UUM.
- **2012–2016:** Dean’s List Award, UUM.
- **2012–2016:** Undergraduate Scholarship, Ministry of Higher Education Malaysia and UUM.
- **2014:** Excellent Service Award, UUM Student’s Representative Council.

Leadership Experience

- **National AI Office Malaysia (NAIO)** (March 2025 – June 2025)
Education Sector Lead, AI Talent Working Group, Malaysia.
- **Office of Minister, Prime Minister's Department, Malaysia** (October 2021 – November 2021)
Perdana Fellow (Economy), Putrajaya, Malaysia.
Mentored by Ministry of Economy, YBM Dato' Sri Mustapa bin Mohamed.
- **Universiti Utara Malaysia** (2013 – 2014)
Faculty Representative to Student's Representative Council.
President of Quantitative Sciences Association.
- **Malaysian High School** (2010)
President of Mathematics Society.
President of School Teenage Cadet.

Professional Experience

- **Universiti Putra Malaysia** (October 2019 – Present)
Young Academic, Department of Mathematics & Statistics, Selangor, Malaysia.
- **UNSW Sydney** (March 2022 – Present)
Research Officer, School of Mathematics and Statistics (July 2025 – Present).
Casual Academic (Statistics for Social and Life Sciences), School of Mathematics and Statistics (March 2022 – Present).
Casual Academic (Health Data Science), School of Biomedical Sciences, Sydney, Australia (March 2023 – 2024).
Project Advisor (Work Integrated Learning, WIL), Collaboration with SAS Institute Australia (August 2024 – November 2024).
Assistant Consultant, StatsCentral, Mark Wainwright Analytical Centre (May 2022 – December 2022).
Casual Staff, School of Education (March 2022 – December 2022).
- **University of Technology Sydney** (July 2024 – October 2024)
Casual Academic (Marketing Research Methods), Business School, Sydney, Australia.
- **Canterbury Institute of Management** (February 2024 – June 2024)
Casual Lecturer (Business Statistics), School of Business, Sydney, Australia.
- **Macquarie University** (February 2022 – May 2022)
Casual Academic (Probability and Statistics), School of Mathematical and Physical Sciences, Sydney, Australia.
- **Monash University Malaysia** (January 2019 – January 2020)
Casual Staff (Research Methodology), School of Business, Kuala Lumpur, Malaysia.
- **Universiti Utara Malaysia** (2016 – 2019)
Associate Fellow, Centre for Testing, Measurement & Appraisal, Kedah, Malaysia.
- **RHB Banking Group** (2018)
Technical (Analytics) Accountant, Kuala Lumpur, Malaysia.
- **Osram Opto-Semiconductors (M)** (2016)
CIM Engineer, Penang, Malaysia.

Presentation Experience

- **SupercomputingAsia (SCA)**, Sydney, Australia, *Symbolic Data Analysis*, 2024.
- **Early Career & Student Statisticians Conference (ECSSC)**, Christchurch, New Zealand, *Bayesian Gaussian Mixture Models via Symbolic Data Analysis*, 2024.
- **Australian Data Science Network Conference (ADSN)**, Perth, Australia, *Optimal Designs for Univariate Histograms*, 2024.
- **UNSW Science Postgraduate Research Showcase**, Sydney, Australia, *Optimal Designs for Univariate Histograms*, 2023–2024.
- **Malaysia Hall Sydney Open Day**, Sydney, Australia, *Data Science, What, Why and How*, 2024.
- **MathStats Postgraduate Conference**, Sydney, Australia, *Symbolic Data Analysis Advances*, 2021–2022.
- **AgriVoltaics 2020**, Perpignan, France, *Machine Learning for Agrivoltaic in Malaysia*, 14 October 2020.
- **Social Enterprise for Individuals with Autism**, Malaysia, *Systematic Review of Social Entrepreneurship*, 22 August 2019.
- **TEDxUUM**, Malaysia, TEDx Speaker, *Statistics, Why and How* 13 March 2018.

Computer Skills

- **Quantitative Software:** R, Python, SQL, SAS, RapidMiner, SPSS, AMOS, SmartPLS, ADANCO, HLM, Review Manager.
- **Qualitative Software:** NVivo, QDA Miner Lite.
- **Documentation Software:** LaTeX, MS Office.

Workshops and Certifications

- **Sydney Workshop on Mathematics of Data Science**, School of Mathematics and Statistics, University of Sydney, 2024.
- **Python Workshop**, School of Mathematics and Statistics, UNSW Sydney, 2021.
- **Review Manager (Meta-Analysis)**, Monash University Malaysia (Clinical School), 2019.
- **NVivo**, StatsWork, 2019.
- **SmartPLS & AMOS**, MPWS, 2018.
- **SAS (Programming, Enterprise Guide & Enterprise Miner)**, SAS Institute, 2018, 2016.
- **R**, DataCamp (MDEC), 2016.

Professional Involvement

- **UNSW AI Institute**, Fundamental Data Science Team, Member, 2025 – Present.
- **UNSW Data Science Hub (uDASH)**, Fundamental Data Science Team, Core Member, 2021 – Present.
- **Royal Statistical Society (RSS)**, Student Member, 2023 – Present.
- **Statistical Society of Australia (SSA)**, Student Member, 2022 – Present.
- **Society for Industrial and Applied Mathematics (SIAM)**, Student Member, 2023 – Present.
- **Perdana Fellow Alumni Association (PFAA)**, Member, 2021 – Present.
- **Malaysia Board of Technologies (MBoT)**, Member, 2021 – Present.
- **Institut Statistik Malaysia (ISM)**, Member, 2020 – Present.
- **Persatuan Matematik dan Sains Malaysia (PERSAMA)**, Member, 2020 – Present.
- **Management Science/Operational Research Society of Malaysia (MSORSM)**, Member, 2020 – Present.

Publications

Artificial Intelligence

- **Jamaluddin, A. H.**, Jamaluddin, F., Jamaluddin, F., & Jamaluddin, F. (2025). Malaysia's AI-driven education landscape: Policies, applications, and comparative insights for a digital future. *STEM Education*. Manuscript submitted for publication.

Statistics

- **Jamaluddin, A. H.**, & Mahat, N. I. (2020). Validation assessments on resampling method in imbalanced binary classification for linear discriminant analysis. *Journal of Information and Communication Technology*, 20(1), 83–102.
- **Jamaluddin, A. H.**, & Mahat, N. I. (2019). The effects of resampling methods on linear discriminant analysis for data set with two imbalanced groups: An empirical evidence. *Advances and Applications in Statistics*, 59(1), 17–42.

Applied Statistics

- Othman, N. F., Ya'acob, M. E., Lu, L., **Jamaluddin, A. H.**, Mat Su, A. S., Hizam, H., Shamsudin, R., & Jaafar, J. N. (2023). Advancement in agriculture approaches with agrivoltaics natural cooling in large scale solar PV farms. *Agriculture*, 13(4), 854.
- Anuar, N., **Jamaluddin, A. H.**, & Abu, A. Y. (2023). Imagery as alternative therapy of depression: A systematic literature review (SLR). *Journal for ReAttach Therapy and Developmental Diversities*, 6(9s2), 105–112.
- Roslan, N., Ya'acob, M. E., Jamaluddin, D., Hashimoto, Y., Othman, M. H., Iskandar, A. N., Ariffin, M. R., Ibrahim, M. H., Mailan, J., **Jamaluddin, A. H.**, Mail, M. F., Aliah, B. S. N., & Lu, L. (2021). Dye-sensitized solar cell (DSSC): Effects on light quality, microclimate, and growth of *Orthosiphon stamineus* in tropical climatic condition. *Agronomy*, 11(4), 631. <https://doi.org/10.3390/agronomy11040631>
- Othman, N. F., Ya'acob, M. E., Mat Su, A. S., Jaafar, J. N., Hizam, H., Shahidan, M. F., **Jamaluddin, A. H.**, Chen, G., & Jalaludin, A. (2020). Modeling of stochastic temperature and heat stress directly underneath agrivoltaic conditions with *Orthosiphon stamineus* crop cultivation. *Agronomy*, 10(10), 1472. <https://doi.org/10.3390/agronomy10101472>
- Jamil, N. S., Ahmad, M., & **Jamaluddin, A. H.** (2021). Tensile properties of natural fibre reinforced polymer composite foams: A systematic review. *Journal of Advanced Industrial Technology and Application*, 2(1), 28–35.

Systematic Review

- Anuar, N., **Jamaluddin, A. H.**, & Abu, A. Y. (2023). Imagery as alternative therapy of depression: A systematic literature review (SLR). *Journal for ReAttach Therapy and Developmental Diversities*, 6(9s2), 105–112.
- Jamil, N. S., Ahmad, M., & **Jamaluddin, A. H.** (2021). Tensile properties of natural fibre reinforced polymer composite foams: A systematic review. *Journal of Advanced Industrial Technology and Application*, 2(1), 28–35.