

## DEPARTMENT OF PARASITOLOGY FACULTY OF MEDICINE

The Department of Parasitology, Faculty of Medicine, Universiti Malaya, comprises 25 dedicated personnel, including 17 academic lecturers and approximately 30–40 postgraduate students.

We deliver comprehensive Medical Parasitology education to students across multiple programmes, including the Bachelor of Medicine and Bachelor of Surgery (MBBS), Bachelor of Biomedical Science, Master of Pathology (MPath), Master of Medical Parasitology and Entomology (MMPE), as well as an elective course. Over the years, we have produced hundreds of Master's and PhD graduates, many of whom are international scholars who have gone on to contribute significantly to global health.

On top of that, this department is highly active in research, securing various research grants and producing impactful research outputs through the years. It is also the hub of several well-respected and impactful scientists, with 4 of its academic staff being the Stanford/Elsevier's top 2% scientists worldwide in 2025.

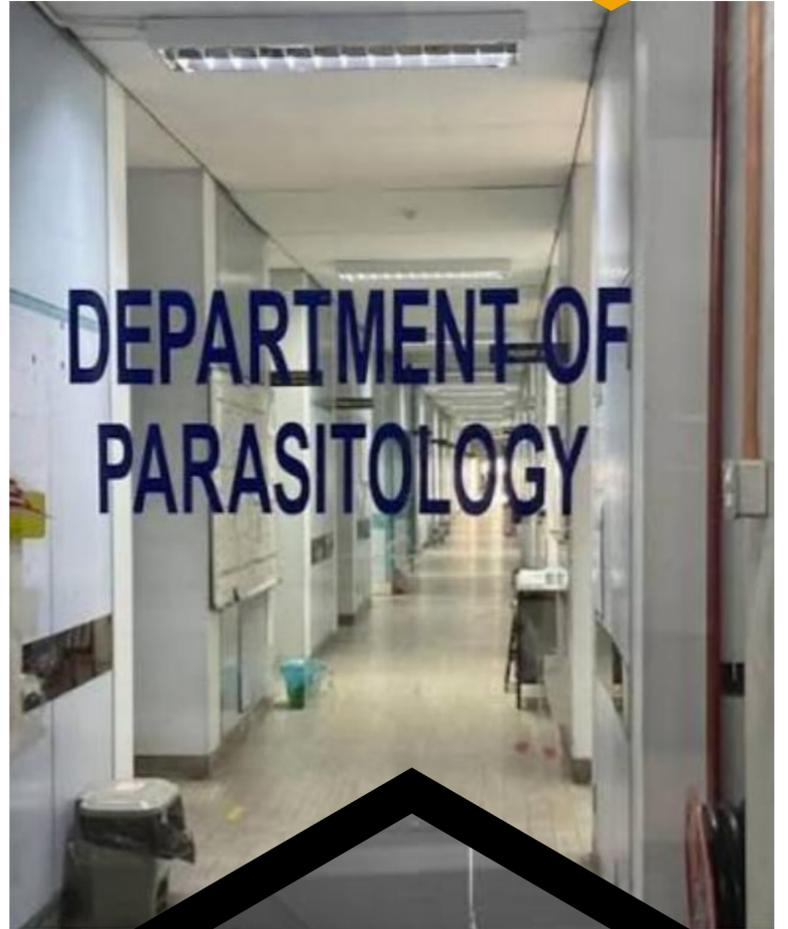
The department organized a series of workshops and academic events in 2025, including microscopy training workshop, forensic entomology workshop, malaria workshop, and an intervarsity quiz, all of which attracted substantial public interest. International promotion of these activities enhances the department's global visibility and recognition, while facilitating academic collaboration and the expansion of research opportunities worldwide.



### VISIT OUR WEBSITE

[https://medicine.um.edu.my/  
parasitology-department](https://medicine.um.edu.my/parasitology-department)

**NEWSLETTER 2025**



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# FOREWORD BY THE HEAD OF DEPARTMENT

**Prof. Dr. Lau Yee Ling**

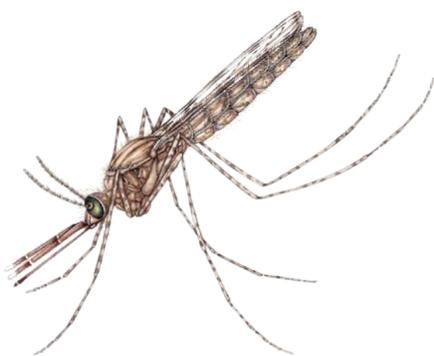


The Department of Parasitology, Faculty of Medicine, Universiti Malaya is dedicated to delivering excellence in education and to conducting high-quality research that contributes meaningfully to the well-being of communities. Over the years, the department has nurtured and developed hundreds of professionals for careers in healthcare and life sciences within academia, as well as in related industries. The department has consistently been ranked among the top three departments in the faculty in terms of research publications, reflecting its strong commitment to scholarly excellence.

Academic staff and students have made significant contributions to both academia and the wider community, and their efforts have been recognized through numerous local and international research awards. In addition, the department offers a Master of Medical Parasitology and Entomology programme to both local and international students, aimed at advancing specialized knowledge and strengthening research competencies in modern tropical medicine. The department's research activities encompass a broad range of parasitological disciplines, including protozoa, nematodes, medically important arthropods, and vector control, with a strong emphasis on both modern and traditional approaches to tropical medicine.

# Academic staff

## Prof. Datin Dr. Indra Vythilingam Honorary Professor



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Research interest: Medical entomology, vectors for malaria, dengue, JE & filariasis

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**Datin Dr Indra Vythilingam** is a Professor in the Department of Parasitology, Faculty of Medicine, Universiti Malaya, where she has served since September 2011. Prior to joining Universiti Malaya, she worked at the Institute for Medical Research (IMR), Malaysia, and the Environmental Health Institute, Singapore. At Universiti Malaya, she played a pivotal role in the design and establishment of the Arthropod Containment Level 2 (ACL2) Laboratory in the Department of Parasitology.

Dr Indra is internationally recognised for her leadership in research on vectors of malaria and dengue. She pioneered the incrimination of *Plasmodium knowlesi* vectors in the modern era and was instrumental in establishing that *P. knowlesi* infects humans across all states in Peninsular Malaysia. She also introduced a proactive dengue surveillance paradigm that detects infected mosquitoes prior to reported human cases, a strategy validated through a cluster randomised controlled trial.

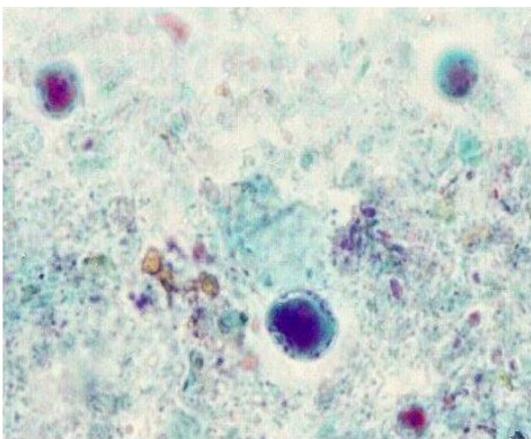
She has authored over 170 scientific papers in peer-reviewed international and local journals, contributed ten book chapters, and published one book. Since 2012, she has successfully supervised 11 PhD and four MSc graduates. In recognition of her outstanding contributions to parasitology and tropical medicine, she received the Sandosham Medal from the Malaysian Society of Parasitology and Tropical Medicine (MSPTM) in 2006. In 2017, she was awarded Malaysia's Research Star Award for Tropical Diseases by the Ministry of Higher Education. She has served as President of the MSPTM in 1998 and 2004 and, most recently, received the SOMA Global Leadership Award 2025 for her contributions to understanding malaria and dengue transmission in South Asia.

In 2025, Dr Indra was invited as a plenary speaker at major regional and international events, including the FAOPMA-Pest Summit (Malaysia), Indonesia–Malaysia Joint Webinar on World Mosquito Day, a capacity-building workshop under the Genetic Modification Advisory Committee (GMAC), and the 18th SOMA International Conference of Medical Arthropodology in India. She has also delivered invited lectures for international postgraduate programmes coordinated by Mahidol University (Thailand), University of Montpellier (France), Universitas Gadjah Mada (Indonesia), Juntendo University (Japan), and Kasetsart University (Thailand). She has served as an external PhD examiner for Bharathiar University, India.

Dr Indra was appointed as a WHO malaria consultant for Lao PDR from 1999 to 2002, where her work led to the first incrimination of *Anopheles dirus* as a malaria vector in the country. She served on the WHO Expert Advisory Panel on Vector Biology and Control from 1998 to 2026 and as a member of the WHO Vector Control Advisory Group (VCAG) from 2013 to 2016. She was Editor of *Tropical Biomedicine* (2006–2014), overseeing its achievement of ISI indexing, and currently serves on the editorial board of *Parasites & Vectors*. She has been listed among Stanford University's Top 2% Scientists globally from 2022 to 2025.

# Academic staff

## Prof. Dr. Suresh Kumar Honorary Professor



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Research interest: *Blastocystis*, drug trials & parasite biology, diagnostic parasitology

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Professor Dr. Suresh Kumar Govind completed his PhD from the National University of Singapore in 1994. He became a lecturer at the Department of Parasitology, Faculty of Medicine, University of Malaya, and Associate Professor in 2001 and a full Professor in 2006. He also served as the Head of the Department of Parasitology, UM from 2015 to 2019.

His special focused dedication was on *Blastocystis* and for the past 25 years have generated more than 140 scientific papers, presented more than 270 conference papers, and written several chapters in publications by the WHO. He has supervised more than 100 elective, diploma, graduate and post-graduate students including at doctorate level. His expertise in *Blastocystis* has enabled him to be appointed as reviewer for internationally refereed journals and is responsible for placing the organism for the first time in the fact list of the WHO publication on the drinking water guidelines. He was the winner of the National Young Scientist Award, Malaysian Toray Grant Award, Commonwealth Scholarship Award, ITEX Gold Innovative Award (National), ITEX gold medal (International), Malaysian Society of Parasitology and Tropical Medicine Silver Medal, the Prime Minister's Productivity Award, the prestigious Malaysian Toray Science Award as well as winning a few times the University Malaya excellence award. He was conferred the global Malayalee Award, National Educators Award from the Association of Private Institutions for research and Fellow to the Malaysian Academy of Science in 2015. He won the Parija Oration Award from the Indian Academy of Tropical Parasitology and Sandosham Medal Award from MSPTM in 2016 and 2017, respectively, for his outstanding contribution to the field of Parasitology.

He has served as an expert member for the Drinking Water guidelines committee for the World Health Organization since 2004. He has also served as an International Consultant for Indian Ocean Center for Education in Human Values, Mauritius. He has been appointed by the Prime Minister of Malaysia to be a member of the National Unity Consultative Council (NUCC) and the committee for inter-faith promotion (JKMPKA) a board member to IKLIN and currently the Chairman of Board of Trustees for the Yayasan Perpaduan Malaysia. Prof Dr Suresh Govind was the former President of the Sathya Sai International Organization, Malaysia, an organization dedicated to the promotion of human values, service and national unity. He is currently the International coordinator for community engagement for 120 countries for the World Sathya Sai International Organization as well as the Coordinator for the Friendship Group of Inter Religious Service, consisting of members from all the major religious groups in Malaysia.

# Academic staff

## Prof. Dr. Yvonne Lim Ai Lian



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Research interest: Protozoa & helminth, gut and skin microbiota, indigenous health, molecular epidemiology, waterborne parasites (*Cryptosporidium*, *Giardia*)

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Professor Dr. Yvonne Lim Ai Lian is the Associate Deputy Vice-Chancellor (Academic and International) at Universiti Malaya and a Senior Professor in the Department of Parasitology, Faculty of Medicine. She is also a member of the University Senate. A Fellow and former Council Member of the Academy of Sciences Malaysia (ASM). She was the co-chair of the APRU Asia Pacific Women in Leadership (APWiL) Programme and currently serves on the International Advisory Committee of the Association of Pacific Rim Universities.

Throughout her distinguished career, she has held several key leadership roles at both university and national levels, including Deputy Dean (Research) at the Faculty of Medicine, Director of the International Relations Office, and Associate Vice-Chancellor of Global Engagement at Universiti Malaya. She has also served as President of the Malaysian Society of Parasitology and Tropical Medicine and as a Council Member of the Academy of Sciences Malaysia.

Her research focuses on deciphering the intricate host-parasite-environment interactions that contribute to disease in indigenous and underserved communities, aiming to develop multi-targeted solutions. Additionally, she investigates the diversity of gut and skin microbiomes across populations spanning various socioeconomic and ecological landscapes, from traditional to industrialized societies.

For nearly three decades, she has dedicated her work to studying infectious diseases among the Orang Asli (indigenous) communities of Peninsular Malaysia, collaborating closely with Hospital Orang Asli Gombak. Her contributions to national policy, including the Orang Asli Development Policy (DPOA), reflect her deep commitment to community welfare.

Her collaboration with New York University led to a groundbreaking discovery, published in *Science* (2016), revealing how low levels of helminth (worm) infections promote the growth of probiotic gut microbiota. Her gut microbiome research has since expanded to studies among HIV and cancer patients. More recently, in partnership with the National Institutes of Health (NIH) in the USA, she has deepened investigations into parasitic infections, gut microbiome dynamics, and the relationship between skin infections and the skin microbiome which resulted in a publication in *Cell* (2025).

Her work is supported by numerous national and international grants, including the prestigious US NIH R01 grants. She was recently awarded another NIH R01 grant as the principal investigator. She has published over 250 peer-reviewed scientific articles, contributed to nine book chapters, and authored three books. As a dedicated mentor, she has supervised more than 40 postgraduate students to completion and hosted researchers through extensive collaborations with institutions in the US, UK, Australia, Germany, Japan, the Philippines, Thailand, Indonesia, and Singapore. She has also held visiting research and academic positions at leading institutions, including the Scottish Parasite Diagnostic and Reference Laboratory in Glasgow, Scotland; the Department of Veterinary Science at the University of Melbourne, Australia; the Massachusetts Institute of Technology (MIT), USA; and the Department of Molecular Parasitology and Tropical Diseases at Taipei Medical University, Taiwan.

She has earned numerous accolades, including the MSPTM Medal for outstanding young scientists, the Universiti Malaya Excellent Lecturer Award for Science Disciplines, the Top Research Scientists of Malaysia Award and inducted as a Fellow of the Academy of Sciences Malaysia. She has been consistently recognized in Stanford University's list of the top 2% of scientists globally in her field. She was also awarded the Fulbright Scholar Award for a fellowship at the Laboratory of Parasitic Diseases at NIAID, NIH, USA. More recently, she received the prestigious Sandosham Gold Medal Award, the highest honour from the Malaysian Society of Parasitology and Tropical Medicine, in recognition of her outstanding contributions to parasitology and tropical medicine.

Deeply passionate about her work with the Orang Asli communities, she remains committed to inspiring and empowering her colleagues and students to reach their fullest potential.

# Academic staff

## Prof. Dr. Lau Yee Ling



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diagnostic parasitology  
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Professor Dr. Lau Yee Ling is currently the Head of the Department of Parasitology at Universiti Malaya (UM) and is a leading figure in molecular parasitology. She began her academic career in 2008 as a lecturer at Monash University Sunway Campus while awaiting her PhD viva. During her time at Monash, she was awarded two Monash University Research Grants that supported her early work in molecular parasitology. In 2009, she returned to Universiti Malaya as a Senior Lecturer, obtained tenure in 2010, and was subsequently promoted to Associate Professor in 2013 and Professor in 2019. In the same year, she was appointed a Fellow of the Academy of Sciences Malaysia.

Professor Lau's research focuses primarily on *Plasmodium knowlesi*, a zoonotic malaria parasite of significant public health importance. Using advanced molecular techniques, her work aims to identify, detect, and characterize malaria parasites in both human and animal hosts. Her research has contributed substantially to understanding parasite transmission and host interactions, supporting the development of improved malaria control and prevention strategies.

She has collaborated extensively with local and international researchers, resulting in more than 289 ISI-indexed journal publications. Her work has achieved over 5,100 Web of Science citations with an H-index of 36. Professor Lau has secured numerous prestigious research grants at both national and international levels, including NIH R01, UKRI-MOHE, Wellcome Trust, ASEAN-India Collaborative R&D Scheme, GCRF GIAA Impact Fund, High Impact Research Grant, FRGS, LRGS, and E-science grants. Her total research funding exceeds RM10 million. She also holds multiple intellectual property rights related to rapid molecular diagnostics for dengue, malaria, and COVID-19.

A dedicated mentor, Professor Lau has successfully supervised 17 master's and 24 PhD graduates and is currently supervising 2 master's and 11 PhD students. Her commitment to postgraduate training continues to shape future leaders in parasitology and biomedical research.

In addition to research and teaching, she has contributed extensively to academic leadership and administration. She has served as Head of the Grant Management Unit within the Health and Translational Medicine Cluster, evaluated national and international research grants, and established the Science Café in 2017 to strengthen research communication between clinicians and scientists. She has also served on multiple university committees, including biosafety, biosecurity, animal experimentation, and quality management.

Professor Lau has played a significant role in scientific publishing as Editor-in-Chief of the *Journal of Health and Translational Medicine* (2009–2024), and currently serves as Editor-in-Chief of the *Asia Pacific Journal of Molecular Biology & Biotechnology* and Associate Editor for *BMC Infectious Diseases*. She is also a frequent reviewer for high-impact journals. Highly regarded internationally, Professor Lau is a sought-after speaker and consultant and has held leadership roles in professional societies, including President of the Malaysian Society for Biochemistry and Molecular Biology (2019–2023). Her excellence has been recognized through numerous awards, including ASM Top Research Scientist Malaysia 2024, MSMBB Best Scientist Award 2023, and repeated inclusion in Stanford–Elsevier's Top 2% Scientists list (2023–2025).

# Academic staff

## Prof. Dr. Hesham M. Al- Mekhlafi



Hesham Al-Mekhlafi has a PhD in public health (UM, 2009), master's degrees in medical science (parasitology) (UKM, 2004) and in applied statistics (UM, 2012) as well as a bachelor's degree in medical laboratories (Yemen, 1997). Since early 2000s, he has been actively engaged in research on the epidemiology and prevention of infectious diseases including malaria, neglected tropical diseases, NTDs (such as soil-transmitted helminthiasis, schistosomiasis, leishmaniasis and dengue fever), and waterborne parasites. He joined the department of parasitology, Universiti Malaya in 2009 as a senior lecturer and promoted to associate professor in 2012. In 2016, he joined Jazan University, Saudi Arabia and promoted to full professor in 2022. He re-joined Universiti Malaya in July 2023.

He has taught several courses in parasitology, epidemiology, biostatistics, and research methodology at undergraduate and postgraduate levels. He has established passionate research teams that involved diligent postgraduate students, enthusiastic colleagues, and inspiring national and international collaborators. The research dedicated to helping vulnerable rural and aboriginal communities in Malaysia and other countries including Yemen, Nigeria and Libya against the NTDs, malaria and other infectious diseases. He has published more than 160 articles in ISI & Scopus indexed journals; with h-index of 44 (WoS).

Prof. Hesham has been a member of several academic, scientific and administrative councils and committees. He is a member of the editorial boards of several renowned journals, and a regular reviewer for many peer-reviewed journals as well as a panel member of assessors for various national and international research grant schemes and postgraduate programs. He has been listed among the Top 2% scientists in the world in the field of tropical medicine in 2020–2025 for both singular year and career-long citation impact by Stanford University through Scopus-Elsevier.

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Research interest: neglected tropical diseases, waterborne parasites, malaria, health education, molecular epidemiology

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## Academic staff

### Dr. Karshini A/P Jeya Pirathaba



Dr. Karshini is deeply passionate about diagnostic microbiology and parasitology, specializing in the development of diagnostic tools and technologies for identifying pathogens responsible for parasitic diseases. After obtaining her Master's in Pathology (Microbiology) in 2022, she gained valuable experience as a medical microbiologist at Hospital Kuala Lumpur and Hospital Queen Elizabeth, Kota Kinabalu. Driven by her dedication to advancing diagnostic methods, she joined the Department of Parasitology in December 2023 to further her research and teaching. Currently, she serves as a medical lecturer at the University of Malaya and the coordinator of the Parasitology Diagnostic Unit at the University Malaya Medical Centre, where she continues to innovate in the field of parasitology diagnostics. . Dr. Karshini is a certified yoga teacher and actively teaches yoga, merging her interests in health and wellness with her scientific expertise.



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Research interest: medical parasitology

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# Academic staff

## Dr. Cheong Fei Wen



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Research interest: Molecular cloning, malaria,  
protein expression, epitope mapping,  
genome editing  
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Cheong Fei Wen obtained her Bachelor Degree in Biomedical Science (with distinction) from Universiti Malaya (UM), Malaysia. She passed her PhD with distinction and is currently holding the post of senior lecturer in the Department of Parasitology, Faculty of Medicine, UM.

Since PhD study, she explored into several malaria-related aspects, including protein expression of the *Plasmodium knowlesi* merozoite surface proteins; immunogenicity study using animal model; and epitope mapping. Her current research interests include phenotypic and genotypic measures on *Plasmodium* sp. resistance against anti-malarials, immunogenicity profiling of potential malarial vaccine candidates, and genome engineering in *P. knowlesi* using CRISPR-Cas9 system.

With her deep passion in research, she has been successfully awarded to attend several international workshops including Ungku Omar-Newton Fund Researcher Links Workshop: Neglected Disease in SEA: Building Capacity in Epidemiological Modelling (Universiti Malaya, Malaysia & Imperial College London, UK) and Wellcome Genome Campus Advanced Course: Malaria Experimental Genetics (WGCAC, UK). She is involved in 13 research projects, with total grant amount exceeding RM 2.2 million. With that, she has published 35 articles in ISI-indexed journals.

She is currently the assistant editor of the Journal of Health and Translational Medicine (JUMMEC), academic editor of Asia Pacific Journal of Molecular Biology and Biotechnology (APJMBB), and editorial board member of Tropical Biomedicine. She was the council member for Malaysian Society of Parasitology and Tropical Medicine (MSPTM) in 2019-2020.

She received excellent service certificate and excellent service award, UM in 2019 and 2024, respectively. She has been appointed as Programme Coordinator and assisted the department to develop a new Master by Coursework programme (Master of Medical Parasitology and Entomology, MMPE). She is the committee member of Quality Assurance Programme - Quality Committee, Faculty of Medicine (FOM) since 2020. With her interest in academic curriculum, she has been appointed as Programme Quality Assurance Expert (ProQAE) of FOM in 2021, and ProQAE of UM in 2024 to assist in programme curriculum related matters. In 2025, she holds the positions as FOM Deputy Quality Manager (ProQAE and stakeholders' feedback), GECC coordinator (UM), and UMREC subcommittee (UM).

## Academic staff

### Dr. Wahib Mohammed Mohsen Atroosh



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Research interest: Malaria, malaria epidemiology & genotyping, antimalarial drug resistance.

Link: <https://umexpert.um.edu.my/wahib.html>

Dr. Wahib M. Atroosh, hailing from Yemen, is a senior lecturer in the Department of Parasitology at Universiti Malaya (UM), where he has been a faculty member since 2019. He began his academic journey in the same department, completing his Master's degree in 2012, and subsequently pursued a PhD, which he earned with Distinction in 2017. Dr. Wahib's research focuses primarily on *Plasmodium falciparum*, the parasite responsible for the majority of severe malaria cases in humans, known for its high mortality rate and increasing resistance to antimalarial drugs. His expertise includes monitoring antimalarial drug resistance through in vivo clinical trials and the application of molecular gene markers of drug resistance.

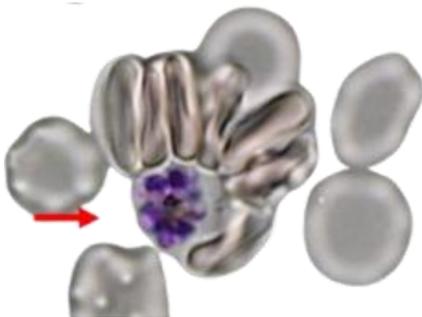
In addition to his primary research on malaria, Dr. Wahib collaborates with local and international research teams, including partnerships with the Medical Research Center at Jazan University in Saudi Arabia, the School of Biological Science at Universiti Sains Malaysia, and the College of Health Sciences, Nigeria. These collaborations explore the epidemiology, genotyping, and molecular characterisation of antimalarial drug resistance in *P. falciparum* isolates from both Saudi Arabia and Nigeria. Dr. Wahib's contributions to the field of parasitology extend to other areas, including research on cutaneous leishmaniasis intestinal protozoa, schistosomiasis, soil-transmitted helminths (STH), and parasite-related health education programs. He has also been involved in developing a novel gene marker aimed at differentiating *P. falciparum* isolates, enhancing the correctness of the in vivo malaria drug efficacy outcome.

Throughout his career at UM, Dr. Wahib has successfully secured internal and external research grants and contributed to 46 publications in indexed journals. His scholarly work has resulted in an h-index of 21 and a total of 1,845 citations. He was also awarded the Universiti Malaya Excellent Service Award (APC) for the year 2023. Dr. Wahib actively contributes to the academic community as a member of scientific and technical committees and serves as a judge at international conferences.

He is also a peer reviewer for several esteemed journals, including Scientific Reports, PLoS ONE, PLoS Neglected Tropical Diseases, Parasites & Vectors, Malaria Journal, Transactions of the Royal Society of Tropical Medicine and Hygiene, BMC Medicine, Pathogens and Global Health, and Tropical Biomedicine. His involvement in these roles underscores his commitment to advancing research and fostering collaboration in the field of parasitology.

# Academic staff

## Dr. Lee Wenn Chyau



Wenn-Chyau Lee received his BSc (Hons) degree in Biomedical Sciences from Universiti Malaya, Malaysia in 2011, and graduated with his PhD in Medical Sciences from Universiti Malaya in 2014. Subsequently, he joined Singapore Immunology Network (SIgN, A\*STAR) as a research fellow. He was appointed as SIgN fellow (young investigator) in 2018. He joined A\*STAR ID Labs as an investigator in 2021. Subsequently, he joined the Department of Parasitology, Faculty of Medicine, Universiti Malaya as a senior lecturer. Currently, he is also an adjunct investigator of A\*STAR ID Labs, Singapore.

As a parasitologist, he has involved in studies encompassing several medically important parasites. His main research interest revolves around the immuno-pathobiology of malaria. He has been investigating and deciphering the roles of rosetting (a phenomenon where a *Plasmodium*-infected red blood cell is stably adhered to uninfected red blood cells, forming a flower-like structure called 'rosette') in the pathogenesis of malaria. Besides, he is exploring the potential of applying different biocontrol strategies to eliminate vector-borne diseases. He has worked as a research fieldworker in different places including the Thai-Burmese Border, China, peninsular Malaysia and Malaysian Borneo. As different laboratory settings are equipped differently, he enjoys adapting and improvising facilities available in the field sites to conduct experiments, as well as coordinating the insectarium and Arthropod Containment Level 2 (ACL2) facility in the Faculty of Medicine, Universiti Malaya. To date, he has published (as first/ corresponding author) in reputable journals such as *Blood*, *Frontiers in Immunology*, *Frontiers in Cellular and Infection Microbiology*, *eLife*, *EBioMedicine*, *Entomologia Generalis*, and *Trends in Parasitology*. Apart from reviewing manuscripts for various journals, as well as evaluating grant proposals for local and overseas funders, he is also an associate editor of *Frontiers in Microbiology* and one of the editorial board members for the journal *Decoding Infection and Transmission*.

He has involved in various teaching activities for students from different programs in Universiti Malaya, such as the Bachelor of Medicine, Bachelor of Surgery (MBBS), Bachelor of Biomedical Science, Master of Pathology (MPATH), and Master of Medical Parasitology and Entomology, as well as the students from overseas institutes, such as the Faculty of Public Health, Mahidol University, Thailand; and the Faculty of Veterinary Medicine, Universitas Airlangga, Indonesia. Besides participating as the coordinator for courses and several projects in the department, he is also the instructor of the microscopy training for the Diploma in Tropical Medicine and Hygiene (DTM&H) co-organized by the University of Glasgow and Universiti Malaya. He served as a moderator in "Implementation Research (*WPR-facilitated*)", a Massive Open Online Course (MOOC) by RTC-TDR-WHO in 2025. He has been a member of the Research Management Unit (RMU), Faculty of Medicine, Universiti Malaya since 2022. He is also a member of the A\*STAR Global Network (A\*GN), Singapore, the Malaysian Society for Biochemistry and Molecular Biology (MSBMB), and the Malaysian Society of Parasitology and Tropical Medicine (MSPTM).

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Research interest: Malaria immuno-pathobiology, host-parasite interactions, vector biocontrol

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# Academic staff

## Dr. Tan Tiong Kai



Tan Tiong Kai (Stanley) received his bachelor's degree in Conservation and Biodiversity Management from the Universiti Malaysia Terengganu in 2010. He then earned his PhD from the Universiti Malaya in 2016, for his studies on nematology and drug resistance. Following the completion of his PhD study, he was enrolled as a Post-Doctoral Fellow at Biodiversity Research Center, Academia Sinica, Taipei, Taiwan. Subsequently, Dr. Tan was appointed as a Post-Doctoral Research Fellow at Faculty of Medicine, Universiti Malaya. Currently, he is a senior lecturer at the Department of Parasitology, Faculty of Medicine, Universiti Malaya.

His current research interests include:

(1) Epidemiology of blood and gastrointestinal parasites and vector-borne diseases; and (2) Medico-veterinary parasitology and entomology, particularly in the aspects of anthelmintic and insecticide resistance.

Dr Tan also actively involves in one of the oldest professional societies in Malaysia, the Malaysian Society of Parasitology and Tropical Medicine (MSPTM). He serves as the Honorary Secretary for the 61<sup>st</sup> MSPTM Council 2024-2026. He was Honorary Secretary for the 56th Council of MSPTM 2019/2020; and Honorary Assistant Secretary for the 55th Council of MSPTM 2018/2019.

In addition, he is also a Managing Editor of Tropical Biomedicine, an ISI-indexed journal for parasitology, entomology, tropical medicine and other aspects of biomedical research.

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Research interest: Vector-borne diseases, filariasis, helminthiasis & protozoan diseases, anthelmintic resistance

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## Academic staff

### Dr. Arutchelvan A/L Rajamanikam



Dr. Arutchelvan Rajamanikam is a Senior Lecturer at the Department of Parasitology, Faculty of Medicine, Universiti Malaya, where he leads the Emerging Pathogen Laboratory and the Microbiome Molecular Laboratory. Over the past decade, he has established a strong reputation in parasitic infectious diseases, with landmark contributions to understanding *Blastocystis* sp. pathogenicity, gut microbiota interactions, and drug resistance. His work has appeared in high-impact journals and is supported by more than RM2 million in national and international research funding.

In recent years, Dr. Arutchelvan has significantly expanded his research portfolio into protozoan parasite culture and intestinal parasite genomics. His team now routinely cultivates axenic cultures of *Blastocystis* sp. and *Acanthamoeba* spp., opening new avenues for studying parasite–bacteria synergy, virulence traits, and host environmental adaptation. These culture-based platforms are complemented by advanced genomic approaches, including whole-genome sequencing and transcriptomic profiling, enabling deeper exploration of parasite gene functions, metabolic capabilities, and evolutionary signatures. This integrated culture–genomics framework is positioning the department as a regional leader in experimental parasitology and molecular pathogen research.

Beyond research, Dr. Arutchelvan is actively involved in scientific leadership. He serves as an affiliate of the Young Scientist Network–ASM, a council member of the Malaysian Society of Molecular Biology and Biotechnology, and a working group member under the EU-COST Action for *Blastocystis*. His continued commitment to mentorship, scientific communication, and community health initiatives reflects his broader impact on Malaysia’s biomedical landscape.

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Research interest: Intestinal parasitology, host-parasite interaction, gut microbiota, data analytics, parasite genomics

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## Academic staff

### Dr. Junaid Olawale Quazim



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Research interest: Zoonotic filariasis

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<https://umexpert.um.edu.my/junaid-quazim.html>

Dr. Junaid Olawale Quazim is a senior lecturer at the Department of Parasitology, Faculty of Medicine, Universiti Malaya, Kuala Lumpur. He obtained his PhD in Medical Parasitology from the Universiti Malaya (UM) in 2018. Prior to this, he did his Bachelor's and Master's degrees in Nigeria before he joined academics, at Federal University Kashere, Gombe State, Nigeria, as a Lecturer in 2012.

He got scholarship from the Nigerian Government for his PhD programme in 2014. Hence, he went back to Nigeria after his PhD to continue his job as a Lecturer until he joined the Department of Parasitology, Faculty of Medicine, Universiti Malaya in May, 2023 as a senior lecturer.

Dr. Junaid's work centers on mosquito-borne parasitic diseases (malaria and filariasis), zoonotic filariasis, interactions between the parasites, hosts and vectors, and immunology. Presently, he has an international collaboration with Humboldt Research Hub-Center for Emerging & Re-emerging Infectious Diseases (HRH-CERID) at Ladok Akintola University of Technology (LAUTECH), Ogbomoso Oyo State, Nigeria, working on 'Molecular Surveillance for HRP2/3 Gene Deletion in Nigeria'. He has published over 20 articles in various categories of journals.

Currently as a Principal Investigator, he has a National grant (Fundamental Research Grant Scheme, FRGS040-2024) and an internal grant (Early Career Research Grant, BKP035-2023-ECR). He has one (1) PhD student, three (3) Master's by research students, and one (1) Master's by course work student under his supervision. Meanwhile, he has graduated three (3) Master's student (external) and one (1) Master's by course work student, likewise he has graduated several final year project students (external).

# Academic staff

## Dr. Aida Syafinaz Mokhtar



Dr. Aida Syafinaz Mokhtar earned her all three of her degrees; a Bachelor of Biomedical Science (2009), Master of Medical Science in Molecular Microbiology (2012), and PhD in Parasitology (2017), from Universiti Malaya (UM). She later completed her postdoctoral training at the UM Centre of Innovation & Commercialisation (now the UM Centre of Innovation & Enterprise, UMCIE), where she contributed to ISO 13485 (Medical Devices) accreditation efforts aimed at translating UM's life science technologies into market-ready innovations.

She began her academic career in 2021 as an Assistant Professor in the Department of Microbiology at Manipal University College Malaysia (MUCM), before joining the School of Biology at Universiti Teknologi MARA (UiTM), Negeri Sembilan Branch, in 2022 as a Senior Lecturer.

In 2023, Dr. Aida returned to UM to join the Department of Parasitology, where she continues to pursue her passion for research on medically important ectoparasites affecting underprivileged communities. Her ongoing work focuses on head lice infestation in children, including the detection of associated microorganisms using metagenomic approaches. In addition, she is actively involved in studies on ectoparasites of cats and dogs, investigating their microbial communities and potential tick-borne pathogens of public and veterinary health significance.



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Research interest: Metagenomics of medically-important ectoparasites

Link:

<https://www.webofscience.com/wos/author/record/JPK-7476-2023>

# Academic staff

## Dr. Rajiv Ravi



Tel: 03 - 79674755

Email: [rajivravi@um.edu.my](mailto:rajivravi@um.edu.my)

Research interest: vector-borne diseases, dengue

Link:

<https://umexpert.um.edu.my/rajivravi.html>

Ts. Dr. Rajiv Ravi is a Researcher and Senior Lecturer from the Department of Parasitology, Faculty of Medicine, University Malaya (UM). Professional Technologist (Ts) certified under (MBOT), Biotechnology specialist. Rajiv Ravi completed his undergraduate in the field of Biotechnology in 2010 and venture into Parasitology in the field of applied parasitology in University Science Malaysia (2013). He has been active in understanding the role, life cycles, prevalences, morphology and molecular identifications parasites in aquatic environment, mainly *Zeylanicobdella argumensis*, *Neobenedenia melleni*, *Acanthocephala*, and *Caligus clemensi*.

Further completed Molecular Parasitology Doctoral Research (PhD) in University Science Malaysia in the year (2018). He then pursued his Postdoctoral work in collaborative research project from Vector Control Research Unit (VCRU) USM & UMK on the establishment of various bioinsecticides against *Aedes* mosquitoes. The notable achievements in his term were from the invention of Nano-Azo's Mosquito Control, published 2019 in Berita Harian Malaysian Newspapers under the segment of Varsity. Additionally, won Gold Medals in ITEX, MTE 2019 and Invited Judge Panel for MTE Invention and Innovation Award Category, 2020. Moving on from there he, joined private academic university as a Lecturer, and secured Principal Investigator(PI) for KPT Research Grants Title, Larvicidal activities of *Areca catechu* L. extracts against *Aedes* (Diptera) (FRGS) worth RM70,100 and Co-Researcher for MOF research grant title, Superfood Spirulina worth RM284,000.

Next in his career progression, he moved his achievements as Head of Biology Department for Sumitomo Chemicals under the Environmental Health and Technology Centre (EHTC), working with new active developments and data generations for HCRL, Tarkazuka, Japan Research Sumitomo Institutions. He also played major role as New Idea Development (NID) coordinator for Environmental Health Technology Centre (EHTC), Asia Pacific and Japan.

### Consultancy Projects:

- Product Registration Kao, KAO MALAYSIA SDN BHD, Professional Consultant (Ir., Ar., Sr., Ts., dsbnya)
- 16 Oct 2024 - 19 Oct 2024 (*National*)
- Product Registrations for Kao (Malaysia) Sdn Bhd
- 30 Apr 2024 - 30 Jun 2024 (*National*)

# Academic staff

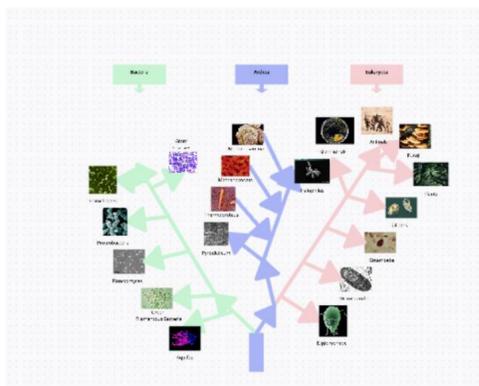
## Dr. Lai Meng Yee



Dr. Lai Meng Yee graduated with Bachelor of Science degree (Microbiology) in 2006 from Universiti Sains Malaysia. She obtained her Master of Biotechnology in 2011 and Doctorate degree in 2018 from Universiti Malaya. She served as post-doc research fellow at the Department of Parasitology, Faculty of Medicine from 2019 to 2024. She is currently serving as a senior lecturer at the same department since July 2024. Dr. Lai's area of expertise are molecular parasitology, molecular epidemiology and diagnostic kit development.

Dr. Lai carries out host parasite interaction study to investigate the relationship between parasites and its' host cell receptors/ligands. She successful find out the potential host cell binding partner of *Toxoplasma gondii* during the invasion. Dr. Lai is also interested in exploring the mechanisms of malaria infections and the interactions between infected patients and malaria parasite invasion using a molecular epidemiology approach. She also interested to investigate the distribution of zoonotic malaria parasites, originally transmitted from non-human primates through mosquito bites.

Other than that, Dr. Lai also works on the identification and differentiation of human malaria and zoonotic malaria parasites using various molecular techniques, such as real-time PCR analysis, recombinase polymerase amplification (RPA) and Loop-mediated isothermal amplification (LAMP). By employing these molecular techniques, Dr. Lai has developed numerous diagnostic methods for malaria, SARS-CoV-2, and dengue. These methods and primers had been patented. Dr. Lai's dedication and hard work have resulted in more than 40 ISI-Cited publications, making substantial contributions to science and technology. Dr Lai also also have been awarded a few times for the innovation in research including Gold, and Medal prizes from Korea Creative Invention Contest, CIC 2017, Cabaran Inovasi Inklusif 2018 Zon Tengah, World Invention Innovation Contest (WiC) 2018, International Invention Innovation Competition in Canada, iCAN 2022 and Inovasi Kreativiti Teknologi Keusahawanan dan Masyarakat (organized by Ministry of Higher Education Malaysia and Universiti Malaysia Kelantan).



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Research interest: molecular parasitology, molecular epidemiology and diagnostic kit development

Link:

<https://umexpert.um.edu.my/mengylai11.html>

To date, she has published more than 40 ISI-cited publications with total citations index of 443 and H-index of 14. Also, she has assisted more than 25 PGs in their research projects. 2 Master and 1 PhD students have completed their study. Recently, she is awarded a research grant from the Ministry of Higher Education Malaysia, to further her zoonotic malaria research.

Overall, Dr. Lai's steadfast dedication to scientific research and innovation has propelled significant progress in disease detection and prevention, highlighting her as an outstanding young scientist and a role model for the scientific community.

# Academic staff

## Dr. Tania Ivorra



Tel: 03-7967 4745

Email: [tania@um.edu.my](mailto:tania@um.edu.my)

Research interest: forensic entomology,  
medical and veterinary entomology

Link: <https://www.linkedin.com/in/tania-ivorra/>

Dr. Tania Ivorra received her BSc degree in Biology from the University of Alicante, Spain in 2009, and her Master's degree in Forensic Analysis from the University of Basque Country, Spain, in 2010. She graduated with her PhD in Forensic Entomology from the University of Alicante, Spain, in 2015. After several years in industry, she joined Universiti Teknologi MARA in 2020 as a postdoctoral researcher. Subsequently, she was appointed as a research fellow at the same institution in 2022. Currently, she is a senior lecturer in the Department of Parasitology, Faculty of Medicine, University of Malaya, and she has been an honorary collaborator in the Department of Environmental Sciences and Natural Resources at the University of Alicante, Spain, since 2019.

As an entomologist, she has been involved in studies of several medically important insects. Her primary research interests focus on the ecology, distribution, and development of insects with medical, veterinary and forensic significance. She has particularly investigated the role of *Synthesiomyia nudiseta*, a necrophagous fly species, in forensic investigations, and how its development can help the postmortem interval estimation in indoor cases. Additionally, she has been researching about aquatic forensic entomology, comparing various aquatic scenarios with terrestrial habitats. She has also collaborated on projects involving black soldier flies (*Hermetia illucens*) in Spain and Malaysia. Her experience includes working as a field researcher in various locations, including Spain and peninsular Malaysia. Besides, she has conducted professional trainings in techniques and equipment such as micro-computed tomography scan (micro-CT) at the Natural History Museum in London and confocal laser scanning microscope (CLSM) at Nicolaus Copernicus University in Poland, among others. Her attachments at the Forensic Department of Hospital Sungai Buloh and Chiang Mai University in Thailand have furthered her training as a forensic entomologist. To date, she has published as the first or corresponding author in reputable journals such as *International Journal of Legal Medicine*, *Acta Tropica*, and *Journal of Medical Entomology*.

She has been involved in teaching activities for students in various programs at Universiti Teknologi MARA and Universiti Malaya, as well as for students from overseas institutions, such as the National University of Singapore, Murdoch University in Australia, and the University of Alicante in Spain. She has participated in several forensic cases involving insects through the Legal Medicine Institute of Alicante, Spain, and Hospital Sungai Buloh, Malaysia. She has been a member of respectable forensic entomology associations, such as the European Association of Forensic Entomology (EAFE) since 2010 and the North American Forensic Entomology Association (NAFEA) since 2019.

# Academic staff

## Dr. Norhidayu Sahimin



Dr. Norhidayu Sahimin is a senior lecturer in the Department of Parasitology at the Faculty of Medicine, currently seconded to the Higher Institution Centre of Excellence (HiCoE), Tropical Infectious Diseases Research and Education Centre (TIDREC), Universiti Malaya. She joined TIDREC as a post-doctoral research fellow in 2019 and became a senior lecturer on the 1st June 2021. Dr. Norhidayu serves as the Head of the Tick Cell Biobank (Asia Outpost) at TIDREC, one of four global biobank laboratories that provide tick cell lines for research and education. She has conducted training on tick cell lines for international researchers from the Korea Virus Research Institute (KVRI) and Chittagong Veterinary and Animal Sciences University (CVASU), Bangladesh.

Dr. Norhidayu has secured several international grants and is the Principal Investigator (PI) of research funded by the Institute of Research for Development (IRD), France, amounting to €20,000 (~RM87,000). Additionally, she leads the internationally funded training program by IRD for students titled "One Health Practice in Southeast Asia: Introduction to One Health," which is funded for €19,000 (~RM86,000). Dr. Norhidayu is also a co-researcher on international grants from the Wellcome Trust, KIRIN Holdings Japan, and the Korea National Institute of Health (KNIH). On a national level, she is the Principal Investigator (PI) for the Fundamental Research Grant Scheme 2021 (FRGS) (RM 137,000) and the SUKUK grant 2023 (RM 626,437) from the Ministry of Higher Education Malaysia. She has also received community funding from the Malaysian Society of Parasitology and Tropical Medicine (MSPTM) 2019 (RM 5,000) and Tenaga Nasional Berhad (TNB) 2021 (RM 22,200).

Recently, Dr. Norhidayu secured the Universiti Malaya Research Excellence Grant (UMREG) 2024 (RM 100,000) and the Poverty Research Lab, Ungku Aziz Centre for Development Studies 2.0 2024 (RM 10,000). Dr. Norhidayu has published 36 peer-reviewed papers, with the majority as the first author, and is currently supervising 12 students (5 PhD and 7 Master's students). Dr. Norhidayu has also obtained certifications in Good Clinical Practice (GCP), Collaborative Institutional Training Initiative (CITI Training), Basic GMP Training for Sterile Manufacturing, Biorisk Training for BSL-2 and BSL-3, Biosafety in Field Specimen Sampling Training, and Responsible Care and Use of Laboratory Animals Course (RCULAC). Dr. Norhidayu's extensive research contributions, leadership in biobank initiatives, and dedication to international training and student mentorship underscore her vital role in advancing vector-borne diseases and infectious diseases research at both regional and global levels.

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Research interest: ectoparasites, endoparasites, zoonosis, migrant workers/refugees, urban poor-related problems

Link:

<https://umexpert.um.edu.my/ayusahimin.html>

# Support staff



**Azura Sengah**  
Administrative Assistant



**Awang Bhukhari Matsat**  
Administrative Assistant



**Muhammad Nabil Fikri Hashim**  
Operation Assistant



**Mohd Redzuan Ahmad Naziri**  
Medical Laboratory Technologist



**Sharifah Nor Akmar Syed Mohd**  
Medical Laboratory Technologist



**Mohd Khairul Bin Roslan**  
Medical Laboratory Technologist



**Siti Aisah Samion**  
Medical Laboratory Technologist

# Diagnostic unit

## Medical Laboratory Technologist (UMMC staff)



Hasidah binti Omar



Wan Hafiz bin Wan Ismail



Farikha binti Sarip

- **Parasitology Diagnostic Unit** is the diagnostic division stemming from the Department of Parasitology.
- It is a component of the “Unit Pengurusan Makmal”, University of Malaya Medical Centre (UMMC).
- It offers the following services:
  - Malaria detection
  - Microfilariae detection
  - Filariasis IgG
  - Schistosomiasis IgG
  - Amoebiasis IgG
  - Echinococcosis IgG
  - Toxoplasmosis IgG & IgM
  - Toxocariasis IgG
  - Cysticercosis IgG
  - Strongyloidiasis IgG
  - *Acanthamoeba* culture
  - Identification of dipteran larvae/ ectoparasites/ helminths
  - Stool FEME
  - Urine/ vaginal discharge examination (parasite detection)
  - *Leishmania donovani* detection (bone marrow smear)
  - PCR for toxoplasmosis
  - PCR for malaria

# Post-doctoral researchers



**Dr. Yap Nan Jiun**  
Molecular epidemiology & parasite  
characterization  
nanjiunyap@um.edu.my



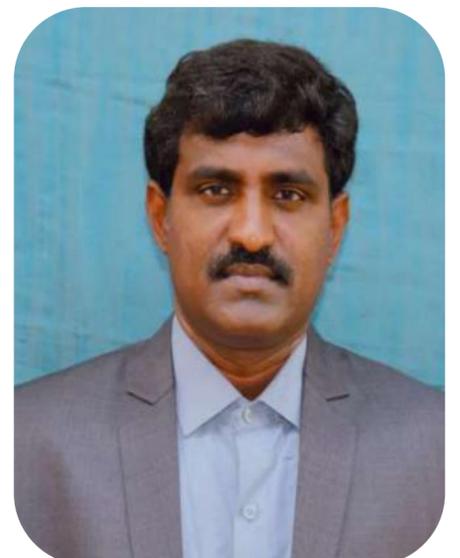
**Dr. Tee Mian Zi**  
Intestinal helminth infections & gut  
microbiome  
mianzi@um.edu.my



**Dr. Phang Wei Kit**  
Disease modelling & spatial  
epidemiology  
weikitphang@gmail.com



**Dr. Er Yi Xian**  
Dermatophyte and  
ectoparasite biology with  
host-microbiome interactions  
eryixian93@um.edu.my



**Dr. Lekkala Ravindar**  
Organic Synthesis and Medicinal  
Chemistry  
ravindarlekkala@um.edu.my

# Research Grants

Principal Investigator (PI)	Grant
Prof. Dr. Yvonne Lim Ai Lian	<ul style="list-style-type: none"> <li>Association of skin microbial dysbiosis and host genetics with fungal skin infections among underserved communities; FRGS (FRGS: FP017-2021), 2021 - 2024: PI</li> <li>Early life effects on later life biological outcomes, evolutionary and molecular mechanisms; NSF grant (IF056-2022), 2022 - 2025: PI</li> <li>The skin microbiome and fungal infections of indigenous Malaysians; NIH (IF045-2024); 2024-2029; PI.</li> <li>Lifestyle effects on Cytomegalovirus prevalence and health outcomes in the Orang Asli; Partnership Grant (MG021-2024); 2024-2025; PI</li> <li>UK-MY Going Global Partnership Grant for Innovative Partnerships. PIE for HEAL (Partnership In Equality for Health Education to combat soil transmitted helminth infections); Partnership Grant (1Jan 2025-31 Dec 2025): PI</li> </ul>
Prof. Dr. Lau Yee Ling	<ul style="list-style-type: none"> <li>Socioecological dynamics of zoonotic and vector-borne diseases in changing landscapes implications for surveillance and control; Wellcome Trust Award (IF050-2022), 2022 - 2026: PI</li> <li>Unravelling rodent malaria gametocytogenesis to unlock a zoonotic transmission model; Wellcome Discovery Award (IF006-2023), 2023 – 2028: PI</li> <li>The changing landscape of human and zoonotic malaria in Southeast Asia, NIH (IF076-2024), 2024-2029: PI</li> <li>Development of loop-mediated isothermal amplification-lateral flow assay for rapid diagnosis of zoonotic malaria, PRGS (PR002-2024), 2024-2026: PI</li> <li>International Funding Mypair : Protecting High Risk Groups From <i>Plasmodium knowlesi</i> Malaria (IF030-2025), 202-2027: PI</li> </ul>
Dr. Karshini Jeya Pirathaba	<ul style="list-style-type: none"> <li>Prevalence and diagnostic insights of intestinal parasitic infections in two Malaysian hospitals with varying levels of endemicity; BKP, 2025 – 2026: PI</li> </ul>
Dr. Cheong Fei Wen	<ul style="list-style-type: none"> <li>Decipher the effect of genetic polymorphisms in <i>Plasmodium knowlesi</i> duffy binding protein alpha on parasite fitness using CRISPR-Cas9 system; FRGS (FRGS: FP025-2023), 2023 – 2026: PI</li> </ul>
Dr. Wahib M. Atroosh	<ul style="list-style-type: none"> <li>Elucidating <i>Plasmodium knowlesi</i> malaria parasite preference to <math>\beta</math>-thalassemic erythrocytes in Malaysia; FRGS (FRGS: FP037-2024), 2024-2026: PI</li> </ul>
Dr. Lee Wenn Chyau	<ul style="list-style-type: none"> <li>Investigation on the susceptibility of <i>Aedes aegypti</i> to insecticides and dengue viruses after the infection of <i>Wolbachia</i>; FRGS (FRGS: FP026-2022), 2022 – 2025: PI</li> <li>Effect of Insulin-like Growth Factor Binding Protein 7 (IGFBP7) on the vascular pathobiology of malaria; UMREG (UMREG007-2023), 2024 – 2027; PI</li> <li>Effect of human periostin (OSF-2) on rosetting phenomenon and phagocytosis of <i>Plasmodium</i>-infected erythrocytes; ICGEB (IF057-2024), 2024 – 2026; PI</li> <li>Effect of human periostin (OSF-2) on the cytoadherence dynamics of malaria parasites within the host vasculature; Partnership Grant (MG041-2024), 2024 – 2025; PI</li> </ul>
Dr. Tan Tiong Kai	<ul style="list-style-type: none"> <li>Susceptibility assessment and insecticidal molecular resistance mechanism of neonicotinoid insecticides in <i>Aedes aegypti</i>; BKP (BKP017-2023-ECR), 2023 – 2025: PI</li> <li>Unravelling the anthelmintic mechanism of antilatoxin B in multi-drug resistant <i>Haemonchus contortus</i>; FRGS (FRGS- FP039-2024), 2024 - 2026: PI</li> </ul>
Dr. Arutchelvan Rajamanikam	<ul style="list-style-type: none"> <li>Exploring the dynamic duo of <i>Blastocystis</i> sp. and intestinal bacteria in inflammation, oxidative damage and activating WNT signaling pathway for colorectal cancer (CRC) aggravation; BKP (BKP015-2023-ECR), 2023 – 2025: PI</li> <li>Development of a precision medicine approach for the eradication of <i>Blastocystis hominis</i> infection: a proof-of-concept study; (International fund: EMLES Bioventures, IF034-2024, 2024 – 2025; PI</li> </ul>
Dr. Junaid Olawale Quazim	<ul style="list-style-type: none"> <li>Zoonotic <i>Brugia filariasis</i> in Klang: a multi-faceted approach to prevalence, vectors, and transmission risk factors; BKP (BKP035-2026-ECR), 2023-2025: PI</li> <li>Evaluation of pyriproxyfen as a novel vector control against simian malaria; FRGS (FRGS:FP040-2024), 2024 - 2026: PI</li> </ul>
Dr. Aida Syafinaz Mokhtar	<ul style="list-style-type: none"> <li>DNA barcoding of <i>Pediculus humanus capitis</i> and characterization of its potential associated pathogens among underprivileged children; (FRGS: FP038-2024, 2024-2026): PI</li> <li>Molecular Survey Of Permethrin Resistance In Head Lice Collected From Underprivileged Children In Klang Valley; (MSPTM Community Grant: PVU004-2025, 2025-2027): PI</li> <li>Ecological and 16S rRNA Metagenomic Profiling of Tick-Borne Pathogens in <i>Rhipicephalus linnaei</i>; (BKP-ECR 2025: BKP104-2025-ECRG, 2025-2027): PI</li> </ul>
Dr. Rajiv Ravi	<ul style="list-style-type: none"> <li>Improved applications of space spray for <i>Aedes</i> resistant strains; (PPRN Fund, PPRN001A-2024/ PPRN001B-2024, 2024 - 2025): PI</li> <li><i>Areca catechu</i> effervescent tablet against <i>Aedes</i> (Diptera:Culicidae); UM Living Labs Grant (LL2024JNZ020), 2024 – 2025: PI</li> <li>Potentials of Areca Catechu Linn Repellence Gel Formulation Cream against <i>Aedes Aegypti</i> Mosquitoes; (2025-2026): PI</li> <li>Investigation Of The Repellent Efficacy Of Kao Products (commercially Launched In Thailand In 2022 Having The Brand Name Biore Guard Mos B1ock Serum); (2025-2026): PI</li> </ul>
Dr. Tania Ivorra	<ul style="list-style-type: none"> <li>Investigating the effects of fire and chemicals agents on postmortem interval estimation through a forensically important fly, <i>Synthsiomyia nudiseta</i>; BKP, 2024 – 2025: PI</li> </ul>
Dr. Lai Meng Yee	<ul style="list-style-type: none"> <li>Development of multiplex RT-PCR for the detection of zoonotic malaria; BKP, 2024-2026: PI</li> </ul>

**Amount of new research fundings secured in 2024: RM 207,291.37**

**Total amount of active grants in the department: RM 7,162,285.48**

# Protégé

In 2025, there were 43 active research projects handled by students of different programs and degrees, under the supervision of our principal investigators.

## PhD students

No.	Name of candidate	Studentship registration number	Project title	Supervisor	Recruited year
1	Freddy Franklin A/L Anthony Joseph	17218454	Studies to elucidate the association between gut microbiome and immunity in persons with mental illness	Prof. Dr Suresh Kumar Dr. Arutchelvan Rajamanikam Assoc. Prof. Dr. Chandramathi A/P samudi @ Raju (Dept. Med Microbiology)	2020
2	Siti Waheeda Binti Mohd Zin @Zain	17020182/3	Epidemiology and study of candidate neural tube defects gene variants in Malaysia	Dr. Wahib Atroosh Associate Prof. Dr. Azizi Abu Bakar (UKM) Prof. Dr. Nicholas Greene (UCL, UK) Dr. Noraishah Mydin Abd Aziz (UPM)	2020
3	Shahhaziq Shahari	17219544/1	The biodiversity of <i>Plasmodium knowlesi</i> in wild macaques from Peninsular Malaysia and the establishment of a <i>Plasmodium knowlesi</i> in vitro culture	Prof. Dr. Lau Yee Ling	2020
4	Nur Zulaikha Binti Zulkefli	S2135943/1	In vitro and ex vivo anti-plasmodial activity of <i>Vernonia amygdalina</i> against <i>Plasmodium knowlesi</i>	Prof. Dr. Lau Yee Ling Dr. Cheong Fei Wen	2022
5	Rishitharan A/L Subramaniam	17093309/3	Evaluation of the effect of genetic polymorphisms in <i>Plasmodium knowlesi</i> duffy binding protein alpha on parasite survival using CRISPR-Cas9	Dr. Cheong Fei Wen Prof. Dr. Lau Yee Ling	2024
6	Muhammad Hafizu Sulaiman	23076795/1	Exploring vector dynamics, host variability, and transmission risk factors of zoonotic <i>Brugia filariasis</i> in Klang Valley, Malaysia	Dr. Junaid Olawale Quazim Prof. Dr. Lau Yee Ling	2024
7	Chin Joo Yie	U2004192/2	Effect of Insulin-like growth factor binding protein 7 (IGFBP7) on the vascular pathobiology of malaria	Dr. Lee Wenn Chyau Prof. Dr. Lau Yee Ling Prof. Dr. Jamal I-Ching Sam (Dept. Med Microbiology)	2024
8	Zulhisham Zulzahrin	22058086/2	Vector biology characterization of <i>Wolbachia</i> -infected <i>Aedes aegypti</i>	Dr. Lee Wenn Chyau Prof. Dr. Lau Yee Ling Prof. Dr. Jamal I-Ching Sam (Dept. Med Microbiology)	2024
9	Nabel Darwish Binti Zuhaidi	24088149/1	Epigenetic control of gametocytogenesis by heterochromatin protein 1 in <i>Plasmodium knowlesi</i>	Dr. Cheong Fei Wen Prof. Dr. Lau Yee Ling	2025
10	Yoel Bi William	23107674/1	Genetic diversity and immunogenicity of key proteins in <i>Plasmodium knowlesi</i> erythrocyte invasion: PkRIPR and PkCyRPA	Prof. Dr. Lau Yee Ling Dr. Lai Meng Yee	2025
11	Nurul Farah Nadia binti Rusly	23050893/2	Epidemiology, zoonotic potential, and genomic analysis of <i>Strongyloides stercoralis</i> among Orang Asli communities in Malaysia	Prof. Dr. Hesham M. Al-Mekhlafi Prof. Dr. Yvonne Lim Ai Lian Dr. Wahib M. Atroosh Dr. Arutchelvan Rajamanikam	2025
12	Kirushmita A/P Anbualakan	24087681/1	Anti-protozoal drugs sensitivity and its associated drug-parasite interaction in xenic and axenic <i>Blastocystis</i> sp. isolates	Dr. Arutchelvan Rajamanikam Prof. Dr. Suresh Kumar Govind Assoc. Prof. Dr. Chandramathi A/P Samudi @ Raju (Dept. Med Microbiology) Dr. Kayatri A/P Govindaraju (Dept. Pharmaceutical)	2025
13	Kang Jun Quan	24212114/1	Evaluation of DEET impregnated wristbands and anklets as personal protection method against vectors of non-human primate malaria	Prof. Dr. Lau Yee Ling Prof. Datin Indra Vythilingam Dr. Nantha Kumar Jeyaprakasam (UKM)	2025

## MSc (research mode) students

No.	Name of candidate	Studentship registration number	Research project	Supervisor	Recruited year
1	Sheivanya Gayatri Kuppusamy	17205510/2	Studies to investigate the <i>Blastocystis</i> sp.-bacteria synergy in the aggravation of colorectal cancer	Dr. Arutchelvan Rajamanikam Assoc. Prof. Dr. Chandramathi A/P samudi @ Raju (Dept. Med Microbiology)	2024
2	Muhammad Luqman Nul-HaKIM Bim Rohaizad	23094543/1	Susceptibility assessment and insecticidal molecular resistance mechanism of neonicotinoid insecticides in <i>Aedes aegypti</i>	Dr. Tan Tiong Kai Prof. Dr. Yvonne Lim Ai Lian Assoc. Prof. Dr. Low Van Lun (TIDREC)	2024
3	Adriana Zahanuddin	22082834/1	DNA barcoding of <i>Pediculus humanus capitis</i> and characterization of its potential associated pathogens among underprivileged children	Dr. Aida Syafinaz Mokhtar Prof. Dr. Lau Yee Ling	2024
4	Zainab Rahman	23101492/1	Repellency of <i>Areca catechu</i> linn gel formulations against <i>Aedes</i> mosquitoes	Dr. Rajiv Ravi Dr. Junaid Olawale Quazim	2024
5	Sanjeevi Nair Gopalan	23087239/1	Elucidating <i>Plasmodium knowlesi</i> malaria parasite preference to $\beta$ -thalassaemic erythrocytes	Dr. Wahib Atroosh Prof. Dr. Hesham al-Mekhlafi Prof. Dr. Lau Yee Ling	2024
6	Lim Li Yang	24053327/1	Unravelling the anthelmintic mechanism of antillatoxin B in <i>Haemonchus contortus</i>	Dr. Tan Tiong Kai Prof. Dr. Yvonne Lim Ai Lian Assoc. Prof. Dr. Low Van Lun (TIDREC)	2024
7	Liaw Hon Kit	23100855/1	Vectors of zoonotic non-human primate malaria: Biology and Control	Prof. Dr. Lau Yee Ling Prof. Datin Indra Vythilingam Dr. Nantha Kumar (UKM)	2025
8	Chiew Zi Yan	U2004928/2	Optimizing <i>In Vitro</i> Production of <i>Plasmodium knowlesi</i> Gametocytes	Dr. Cheong Fei Wen Prof. Dr. Lau Yee Ling	2025
9	Fachrunnisa binti Izzat	24209065/1	Development and evaluation of <i>Areca catechu</i> Linn-based repellent gel against <i>Aedes Aegypti</i> mosquitoes	Dr. Rajiv Ravi Dr. Junaid Olawale Quazim	2025
10	Hemma A/P M Rabindran	24205556/2	The prevalence and diagnostic insights of intestinal parasitic infections in two Malaysian Hospitals with varying levels of endemicity	Dr. Karshini Jeya Pirathaba Dr. Arutchelvan Rajamanikam	2025
11	Intan Adibah binti Salim	24207607/1	Evaluation of larvicidal, enzymatic and sterilizing activity of pyriproxyfen as a potential control measure for simian malaria vector	Dr. Junaid Olawale Quazim Dr. Rajiv Ravi	2025
12	Nurin Dayana binti Mazlan	24217049/1	Development of multiplex real-time PCR for the detection of zoonotic malaria	Prof. Dr. Lau Yee Ling Dr. Lai Meng Yee	2025
13	Sasha Kerridge Kimbrough	24212557/1	The effects of fire and bleach on postmortem interval through a forensically important fly, <i>Synthesiomyia nudiseta</i>	Dr. Tania Ivorra Assoc. Prof. Dr. Heo Chong Chin (UiTM)	2025
14	Kok Jing Shun	24078008/1	Ectoparasitosis in the indigenous people of Malaysia: An integrated study of epidemiology, genetic divergence, and associated bacterial symbionts	Prof. Dr. Yvonne Lim Ai Lian Dr. Er Yi Xian	2025

## MSc (coursework mode) students

### Master of Medical Parasitology and Entomology Program

No.	Name of candidate	Studentship registration number	Research project	Supervisor	Year
1	Nurul Nadiha binti Mohd Tamrin	24087730/1	Evaluation of larvicidal activities of insect growth regulator pyriproxyfen on laboratory <i>Anopheles cracens</i> larvae	Dr. Junaid Olawale Quazim	2024
2	Pebly Qiuke Paul James	24200881/1	Elucidating the influence of bacterial symbionts on drug resistance in protozoan parasites	Dr. Arutchelvan Rajamanikam Dr. Karshini Jeya Pirathaba	2025
3	Lin Yiyu	25068385/1	Development of loop-mediated isothermal amplification for the detection of Leucosphyrus group mosquito in Malaysia	Prof. Dr. Lau Yee Ling Dr. Lai Meng Yee	2025

## BSc students (FYP projects)

### Biomedical Science Program, Universiti Malaya

No.	Name of candidate	Studentship registration number	Research project	Supervisors	Recruited year
1	Rachel Ng Jie Yee	U22005357	Study to investigate influence of <i>Blastocystis</i> sp. on <i>Klebsiella pneumoniae</i> biofilm formation and its phenotypic characteristics	Dr. Arutchelvan Rajamanikam Ap. Dr. Chandramathi (Dept. Medical Microbiology)	2025
2	Mirya Milana Maisara binti Maishaf Rizal	U2102107/2	Influence of Pathogenic and Non-Pathogenic <i>Acanthamoeba</i> spp. on Biofilm Formation and Phenotypic Traits of <i>Klebsiella pneumoniae</i>	Dr. Arutchelvan Rajamanikam Dr. Karshini Jeya Pirathaba	2025
3	Muhammad Ielhan bin Mohd Nujhan	U2101712	Reciprocal Phenotypic Changes in <i>Acanthamoeba</i> sp. and <i>Pseudomonas aeruginosa</i> Co-cultures	Dr. Arutchelvan Rajamanikam Dr. Karshini Jeya Pirathaba	2025
4	Nur Hanan Humaira binti Zamzam	U2101146/2	Molecular identification of hookworm infection among Orang Asli in Peninsular Malaysia	Dr. Tan Tiong Kai Dr. Tee Mian Zi	2025
5	Muhammad Nasreen bin Suhaimi	U2101233	Effect of extracts from tiger milk mushroom <i>Lignosus rhinocerus</i> on malaria parasites	Dr. Lee Wenn Chyau Prof. Dr. Fung Shin Yee (Dept. Mol. Medicine)	2025
6	Shanis Fariyah binti Ros Azizi	U2102238	Effect of water temperatures on the gender ratio of emerged adults by <i>Wolbachia</i> -infected <i>Aedes aegypti</i> (WIA) and <i>Wolbachia</i> -uninfected <i>Ae. aegypti</i> (WUA)	Dr. Lee Wenn Chyau	2025
7	Lim Yi Jun	22005340	Effect of IGFBP7 on cytoadherence interactions between monocytes and endothelial cells during malaria pathogenesis	Dr. Lee Wenn Chyau	2025
8	Muhammed Nur Iman bin Mohammed Syafiei	U2101363/2	Effect of OSF-2 on phagocytosis of <i>Plasmodium</i> -infected erythrocytes by host phagocytes	Dr. Lee Wenn Chyau	2025
9	Siti Nursyazziana binti Nordin	U2100833/2	Effect of dengue virus (DENV) on cytoadherence dynamics of human endothelial cells	Dr. Lee Wenn Chyau	2025
10	Nur Liyana Nor Sham	U2101390/2	Development of loop-mediated isothermal amplification-lateral flow (LAMP-LF) for rapid and accurate diagnosis of zoonotic malaria	Prof. Dr. Lau Yee Ling Dr. Lai Meng Yee	2025
11	Nur Syafiqah binti Rakhidin	U2100829/2	The impact of submersion in different water types on pupal survival and adult emergence of <i>Chrysomya megacephala</i>	Dr. Tania Ivorra Dr. Aida Syafinaz Mokhtar	2025
12	Nur Najihah Al-Ashari binti Saiful Nizam	U2100835/2	Ecological study of larval competition between <i>Chrysomya rufifacies</i> and <i>Chrysomya megacephala</i> under controlled co-existence conditions in Malaysia	Dr. Tania Ivorra Dr. Aida Syafinaz Mokhtar	2025
13	Farhanah Afrina Maisarah binti Fawzy	U2101955/2	List of forensically important insects collected from carcasses in Universiti Malaya, Malaysia	Dr. Tania Ivorra Dr. Aida Syafinaz Mokhtar Dr. Ilyana Hassya binti Azmannizam (UM Agroforestry, Deputy Vice-chancellor (research and Innovation))	2025

# Publications (Dec 2024 – 29 Dec 2025)

1. Zulzahrin, Z., Azman, I. K., Mohd S, N. A. S., Naziri, M. R. A., Roslan, M. K., Lau, Y. L., Chan, Y. F., Sam, I-C, Vythilingam, I., Lee, W-C. (2025). Effect of thermal stress on the aquatic stages of wAlbB *Wolbachia*-infected *Aedes aegypti*. *Entomologia Generalis* 45(1): 145-151. doi: 10.1127/entomologia/2024/2946
2. Martínez-Sánchez, A., Ivorra, T., Velásquez, Y., Cerdá-Ortega, L., Ibáñez, C., & Rojo, S. (2025). Dietary and competition effects on life history attributes of *Chrysomya megacephala* and *Lucilia sericata* (Diptera: Calliphoridae) in south-west Europe. *International Journal of Legal Medicine*, 139(3), 1423–1436. doi:10.1007/s00414-025-03425-1
3. Mulenga M, Rajamanikam A., Kumar S., Muhammad SB, Bhasu S, Samudid C, Sabri AQM, Seera M, Eke CI. (2025). Revolutionizing colorectal cancer detection: A breakthrough in microbiome data analysis. *PLoS One* 20(1), e0316493. doi: 10.1371/journal.pone.0316493
4. Martínez-Sánchez, A., Ivorra, T., Roberts, L. C., Giner, S., Beringola, L. M., Cano, P. M., & Rojo, S. (2025). The oriental latrine fly *Chrysomya megacephala* (Fabricius, 1794) (Diptera: Calliphoridae) as a new forensic indicator in SW Europe. *International Journal of Legal Medicine*, 10.1007/s00414-025-03489-z. Advance online publication. doi: 10.1007/s00414-025-03489-z
5. Abushattal, M. A. K., Sale, S., Subramaniam, S., Mohamad Taib, M. N. A., Rajamanikam, A., Termizi, F. H. M., Hassan, N. H., & Mad' Atari, M. F. (2025). The effects of LED Spectra on synthesis of antiparasitic bioactive compound in *Eurycoma longifolia* hairy root culture against *Blastocystis* Sp. *Scientific Reports*, 15(1), 14662. doi:10.1038/s41598-025-99906-9
6. Phong, Z-Y., Chin, J-Y., Ng, Y. L., Zakaria, N. I., Azman, S. N. A., Kosaisavee, V., Renia, L., Lee, W-C. (2025). The role of periostin (OSF-2) in the cytoadherence phenomena mediated by malaria parasites. *Frontiers in Cellular and Infection Microbiology*, 15. doi:10.3389/fcimb.2025.1599872
7. Nguyen, T., Nguyen, S., Nguyen, V., Na, S., Moon, R.W., Sattabongkot, J., Lau, Y.L., Park, W., Chun, W., Lu, F., Lee, S., Han, J., Han, E. (2025). A novel micronemal protein MP38 is involved in the invasion of merozoites into erythrocytes. *mBio* 16, e03917-24. doi:10.1128/mbio.03917-24
8. Lau, Y. L., Abdullah, M. L., & Lai, M. Y. (2025). Rapid detection of zoonotic malaria using room-temperature stable and ready-to-use colorimetric LAMP reagents. *Acta Tropica*, 267, 107678. Advance online publication. <https://doi.org/10.1016/j.actatropica.2025.107678>
9. Lai, M. Y. & Lau, Y. L. (2025). Rapid detection of knowlesi malaria using room-temperature stable and ready-to-use colorimetric LAMP reagents. *American Journal of Tropical Medicine and Hygiene*. Accepted.
10. GBD 2021 Diarrhoeal Diseases Collaborators\* (2025). Global, regional, and national age-sex-specific burden of diarrhoeal diseases, their risk factors, and aetiologies, 1990–2021, for 204 countries and territories: a systematic analysis for the Global Burden of Disease Study 2021. *Lancet Infectious Diseases*, 25(5): 519-536. [https://doi.org/10.1016/S1473-3099\(24\)00691-1](https://doi.org/10.1016/S1473-3099(24)00691-1). Al-Mekhlafi HM is one of the GBD 2021 Diarrhoeal Diseases Collaborators.
11. Lee, S., Son, Y., Hwang, J., Kim, M. S., GBD 2021 Dietary Iron Deficiency Collaborators\*, Il Shin, J., Yon, D. K., & Kassebaum, N. J. (2025). Global, regional and national burden of dietary iron deficiency from 1990 to 2021: a Global Burden of Disease study. *Nature Medicine*, 10.1038/s41591-025-03624-8. Advance online publication. <https://doi.org/10.1038/s41591-025-03624-8>. Al-Mekhlafi HM is one of the GBD 2021 Dietary Iron Deficiency Collaborators.
12. Er, Y.X., Lee, S.C., Aneke, C., Conlan, S., Muslim, A., Deming, C., Che, Y., Yap, N.J., Tee, M.Z., Abdull-Majid, N., Shahrizal, S., Leong, K.F., Han, J., Shen, Z., Than, L.T.L., Park, M., Sayed, I.M., NISC Comparative Sequencing Program, Seyedmousavi, A., Kong, H.H., Loke, P., Segre, J.A., Lim, Y.A.L. (2025). *Trichophyton concentricum* fungal infections and skin microbiomes of Indigenous Peninsular Malaysians. *Cell*, 188, 1-18. <https://doi.org/10.1016/j.cell.2025.05.034>.
13. Abdull-Majid, N., Yap, N.J., Tee, M.Z., Er, Y.X., Ngui, R., Lim, Y.A.L. (2025). Evidence of submicroscopic malaria parasitemia, soil-transmitted helminths, and their coinfections among forest-fringed Orang Asli communities in Peninsular Malaysia. *American Journal of Tropical Medicine and Hygiene*, 112(6), 1391-1399. <https://doi.org/10.4269/ajtmh.24-0718>
14. Tan, P. Y., Lim, C. C., Seng, K. B. H., Loganathan, R., Lim, Y. A., Teng, K. T., Mohd Johari, S. N., Selvaduray, K. R., & Ramli, N. (2025). Red palm olein supplementation as a potential preventive solution for xerophthalmia among vitamin A-deficient primary schoolchildren: a cluster randomized controlled trial. *European Journal of Clinical Nutrition*, 10.1038/s41430-025-01620-2.
15. Kazim, A. R., Low, V. L., Tan, T. K., Yin, V. W., Noh, A. A. M., Heo, C. C., & Nasir, D. M. (2025). Morphological and genetic discrepancy of *Rhipicephalus* sp. (Acari: Ixodidae) collected from the ricefield rat, *Rattus argentiventer*, in Peninsular Malaysia. *Experimental & Applied Acarology*, 95(1), 11. <https://doi.org/10.1007/s10493-025-01036-4>
16. Jamaluddin, N. F., Brovkina, O., Nor Rashid, N., Al-Maleki, A. R., Lim, Y. A., Tan, M. P., Lee, S. C., Duvallet, C., Corzett, C. H., Alm, E., Groussin, M., Poyet, M., & Ibrahim, F. (2025). Gut microbiota profiles of peninsular Malaysian populations are associated with urbanization and lifestyle. *Scientific Reports*, 15(1), 24066. <https://doi.org/10.1038/s41598-025-07117-z>
17. Sidi Omar, S. F. N., Lim, Y. A. L., Syaza Zafirah, A. R., Muslim, A., Ayub, Q., Amin-Nordin, S., Joseph, V. N. M. S., Musa, S., Jinam, T., & Ngui, R. (2025). Characterisation of gut microbiota in Malaysian cancer patients using V3-V4 region of 16S rRNA gene sequencing. *Scientific Reports*, 15(1), 21723. <https://doi.org/10.1038/s41598-025-06983-x>
18. Jones, A.K., Ivorra, T. & Heo, C.C. Potential Sludge Consumption by Black Soldier Fly Larvae (*Hermetia illucens*) After Fresh Waste Pretreatment. *Waste Biomass Valor* (2025). <https://doi.org/10.1007/s12649-025-03159-6>
19. GBD 2023 Cancer Collaborators\* (2025). The global, regional, and national burden of cancer, 1990–2023. *Lancet* (online first). DOI: 10.1016/S0140-6736(25)01635-6. \*Al-Mekhlafi HM is one of the GBD 2023 Cancer Collaborators.
20. GBD 2023 Vaccine Coverage Collaborators\* (2025). Global, regional and national trends in routine childhood vaccination coverage from 1980 to 2023 with forecasts to 2030: a systematic analysis for the Global Burden of Disease Study 2023. *Lancet*, 406 (10500), 235-260. \*Al-Mekhlafi HM is one of the GBD 2023 Vaccine Coverage Collaborators.
21. Zulkefli NZ, Cheong FW., Amir A, Lau YL. (2025). *Vernonia amygdalina* (Delile) exhibits in vitro anti-plasmodial activities against *Plasmodium knowlesi*. *Tropical Biomedicine*, 42(3), 242-249.
22. GBD 2023 Causes of Death Collaborators (2025). Global burden of 292 causes of death in 204 countries and territories and 660 subnational locations, 1990-2023: a systematic analysis for the Global Burden of Disease Study 2023. *Lancet*, 406(10513), 1811–1872. [https://doi.org/10.1016/S0140-6736\(25\)01917-8](https://doi.org/10.1016/S0140-6736(25)01917-8). \*Al-Mekhlafi HM is one of the GBD 2023 Causes of Death Collaborators.
23. GBD 2023 Demographics Collaborators (2025). Global age-sex-specific all-cause mortality and life expectancy estimates for 204 countries and territories and 660 subnational locations, 1950-2023: a demographic analysis for the Global Burden of Disease Study 2023. *Lancet*, 406(10513), 1731-1810. [https://doi.org/10.1016/S0140-6736\(25\)01330-3](https://doi.org/10.1016/S0140-6736(25)01330-3). \*Al-Mekhlafi HM is one of the GBD 2023 Demographics Collaborators.
24. GBD 2023 Disease and Injury and Risk Factor Collaborators (2025). Burden of 375 diseases and injuries, risk-attributable burden of 88 risk factors, and healthy life expectancy in 204 countries and territories, including 660 subnational locations, 1990-2023: a systematic analysis for the Global Burden of Disease Study 2023. *Lancet*, 406(10513), 1873–1922. [https://doi.org/10.1016/S0140-6736\(25\)01637-X](https://doi.org/10.1016/S0140-6736(25)01637-X)

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25. Yang, J., Bhasu, S., Ali, G., Govindasamy, T., Aziz, M. A., & Rajamanikam, A. (2025). Ecological Health and Freshwater Pathogen Using eDNA Metabarcoding: A Preliminary Assessment for Environmental Surveillance Development in Malaysia. *Microorganisms*, 13(9), 2055. <https://doi.org/10.3390/microorganisms13092055>.
26. Zaini, N. A., Ivorra, T., Rosman, N., Kurahashi, H., & Heo, C. C. (2025). A preliminary study of insect, bacterial, and fungal communities associated with *Sus scrofa* carrion in a tropical rainforest. *International journal of legal medicine*, 10.1007/s00414-025-03598-9. Advance online publication. <https://doi.org/10.1007/s00414-025-03598-9>
27. Tiong, J. Y., Hasikin, K., Ngui, R., Divis, P. C. S., Loo, C. K., Lai, K. W., Cheong, F. W., & Wan Sulaiman, W. Y. (2025). Insights into AI-Driven malaria diagnosis: A systematic review with implications for *Plasmodium knowlesi*. *Acta tropica*, 271, 107842. Advance online publication. <https://doi.org/10.1016/j.actatropica.2025.107842>
28. Lai, M. Y., & Lau, Y. L. (2025). Establishment of a visual mixed-dye loop mediated isothermal amplification assay for detecting *Plasmodium knowlesi*. *Acta tropica*, 269, 107752. <https://doi.org/10.1016/j.actatropica.2025.107752>
29. Bertran-Cobo, C., Dumont, E., Noordin, N. R., Lai, M. Y., Stone, W., Tetteh, K. K. A., Drakeley, C., Krishna, S., Lau, Y. L., & Wassmer, S. C. (2025). *Plasmodium knowlesi* Infection Is Associated With Elevated Circulating Biomarkers of Brain Injury and Endothelial Activation. *The Journal of infectious diseases*, 231(5), e966–e975. <https://doi.org/10.1093/infdis/jiae553>
30. Lee YK, Lee PY, Lau YL, Ng CJ, Ng WL, Chiew TK, Abdullah A, Vadivelu J, Amir A, Tan CPL, Chin CKL. (2025). Using a virtual patient system to improve medical students' confidence in clinical diagnosis: a controlled study. *Journal of Applied Research in Higher Education*, 17(3), 1125-1138. <https://doi.org/10.1108/JARHE-01-2024-0005>
31. Er, Y. X., Leong, K. F., Foong, H. B. B., Abdul Halim, A. A., Kok, J. S., Yap, N. J., Tan, Y. C., Tay, S. T., & Lim, Y. A. (2025). Dermatophytoses Caused by Trichophyton indotineae: The First Case Reports in Malaysia and the Global Epidemiology (2018-2025). *Journal of fungi (Basel, Switzerland)*, 11(7), 523. <https://doi.org/10.3390/jof11070523>
32. Vinnie-Siow, W. Y., Low, V. L., Chai, H. C., Lim, Y. A., & Tan, T. K. (2025). Proteomic analysis unveils host-parasite interactions in *Aedes togoi* infected with *Dirofilaria immitis* and *Brugia pahangi*. *PloS one*, 20(7), e0326693. <https://doi.org/10.1371/journal.pone.0326693>
33. Franck, M., Tanner, K.T., Tennyson, R.L., Daunizeau C, Ferrucci L, Bandinelli S, Trumble BC, Kaplan HS, Aronoff JE, Stieglitz J, Kraft TS, Lea AJ, Venkataraman VV, Wallace IJ, Lim YAL, Ng KS, Yeong JPS, Ho R, Lim X, Mehrjerd A, Charalambous EG, Aiello AE, Pawelec G, Franceschi C, Hertel J, Fulop T, Lemoine M, Gurven M, Cohen AA. (2025). Nonuniversality of inflammaging across human populations. *Nat Aging* 5, 1471–1480 (2025). <https://doi.org/10.1038/s43587-025-00888-0>
34. Longtin, A., Watowich, M. M., Sadoughi, B., Petersen, R. M., Brosnan, S. F., Buetow, K., Cai, Q., Cayo Biobank Research Unit, Gurven, M. D., Higham, J. P., Highland, H. M., Huang, Y. T., Kaplan, H., Kraft, T. S., Lim, Y. A. L., Long, J., Melin, A. D., Montague, M. J., Roberson, J., Ng, K. S., ... Lea, A. J. (2025). Cost-effective solutions for high-throughput enzymatic DNA methylation sequencing. *PLoS genetics*, 21(5), e1011667. <https://doi.org/10.1371/journal.pgen.1011667>
35. AbuBakar, N., Behnke, J. M., Sahimin, N., Kang, X., Mohd Shahar, S. N., Lim, Y. A. L., & Mohd Zain, S. N. (2025). The dengue disquisition: A low-cost public housing conundrum in Klang Valley, Malaysia. *PloS one*, 20(1), e0317349. <https://doi.org/10.1371/journal.pone.0317349>
36. Bin Wan Mohd Nor, W. M. F. S., Kwong, S. C., Fuzi, A. A. M., Said, N. A. B. M., Jamil, A. H. A., Lee, Y. Y., Lee, S. C., Lim, Y. A., & Chung, I. (2025). Linking microRNA to metabolic reprogramming and gut microbiota in the pathogenesis of colorectal cancer (Review). *International journal of molecular medicine*, 55(3), 46. <https://doi.org/10.3892/ijmm.2025.5487>
37. Kazim, A.R., Nasir, D.M., Tan, T.K., Vinnie-Siow, W.Y., Noh, A.A.M., Heo, C.C., Low, V.L. (2025). New host record and redescription of *Amblyomma cordiferum* nymphs and larvae infesting Malaysian house rats (*Rattus rattus diardii*) in Peninsular Malaysia, with molecular evidence of Rickettsia, Borrelia, and Bartonella. *Acta Tropica*, 261, 107496. <https://doi.org/10.1016/j.actatropica.2024.107496>
38. Ganasen, T., Mohd-Azami, S. N. I., Khoo, J. J., Peng, T. L., Johari, J., Sahimin, N., Ya'cob, Z., AbuBakar, S., & Loong, S. K. (2025). Rodent-borne zoonotic diseases in Southeast Asia: A narrative review. *Tropical Biomedicine*, 42(2), 100–122. <https://doi.org/10.47665/tb.42.2.003>
39. Nur-Aliah, N. A., Ivorra, T., Tabatabaei, M., Mohsin, H. F., & Heo, C. C. (2025). Assessing landfill wastes as a sustainable feeding substrate for black soldier fly larvae. *Environmental entomology*, nvaf079. Advance online publication. <https://doi.org/10.1093/ee/nvaf079>
40. Ba-Alawi, E., Azzani, M., Alsaidi, N. A., Atroosh, W. M., Anaam, B. T., Roslan, D., Ali-Saeed, R., & Noman, S. (2025). Barriers to cervical cancer screening among immigrant Yemeni women in Malaysia. *BMC cancer*, 25(1), 4. <https://doi.org/10.1186/s12885-024-13310-6>
41. Jeyaprakasam, N. K., Phang, W. K., Shahari, S., & Vythilingam, I. (2025). *Plasmodium cynomolgi*: potential emergence of new zoonotic malaria in Southeast Asia. *Parasites & Vectors*, 18(1), 151. <https://doi.org/10.1186/s13071-025-06784-1>
42. Mase, R. S., Vythilingam, I., Fornace, K., Othman, H., Liu, X., Jaafar, A. J., Shahar, M. K., Abdul Rahman, N. A., Khairul Azman, A. H., & Jeyaprakasam, N. K. (2025). Impact of environmental factors on the bionomics of *Anopheles* mosquito vectors of zoonotic malaria: A narrative review. *One health*, 21, 101141. <https://doi.org/10.1016/j.onehlt.2025.101141>
43. Phang, W.K., Jeyaprakasam, N.K., Pramasivan, S., Suli, Z., Tam, J.Z., Abdul Hamid, M.H., Abdullah, M.L., Isman Rohimly, A.A., Ashrat, N., Chuang, T., Nguitragool, W., Vythilingam, I., & Lau, Y.L. (2025). Multi-pronged surveillance to understand the spatiotemporal correlations among macaques, vectors and humans in *Plasmodium knowlesi* malaria transmission. *Parasites and Vectors* 18, 439. doi: 10.1186/s13071-025-07082-6.
44. Subramaniam, R., Chiew, Z.Y., Zuhaidi, N.D., Lau, Y.L., & Cheong, F.W. (2025). Induction of gametocytogenesis in human malaria parasites: from stress to genome editing. *Frontiers in Microbiology*, 16. doi: 10.3389/fmicb.2025.1688506.
45. Mendonca, D., Tan, Y-Z., Lor, Y-X., Ng, Y-J., Siyadatpanah, A., Lim, C-L., Norouzi, R., Pandey, R., Lee, W-C., Bodade, R., Brandon-Mong, G-J., Labana, R.V., Jimoh, T.O., Verma, A.K., Hailu, T., Saravanabhavan, S.S., Sherasiya, A., Oliveira, S.M.R., Girol, A.P., Nissapatorn, V., & Pereira, M.L. (2025). A review on phytochemistry, ethnopharmacology, and antiparasitic potential of *Mangifera indica* L. *Pharmaceuticals* 18(10), 1576. doi: 10.3390/ph18101576.
46. Wallace, I.J., Felson, D.T., Kraus, V.B., Neogi, T., Haugen, I.K., Huebner, J.L., Sena, C.M.T., Kivell, T.L., Holowka, N.B., Worthington, S., Lim, Y.A.L., Venkataraman, V.V., Kraft, T.S., & Leo, A.J. (2025). Dampened inflammation and reduced risk of osteoarthritis among non-industrialized societies. *Osteoarthritis and Cartilage*, (in press). doi: 10.1016/j.joca.2025.09.014.
47. Porusia, M., Chotklang, D., Mohd Yatim, S.R., Purnamasari, S., Ramadhani, D.S., Cahyani, P., Nabila, K.N., Aulia, A.K., Mokhtar, A.S., Low, V.L., & Sahimin, N. (2025). Household pesticide use in Southeast Asia: a comparative survey of knowledge, attitudes, and practices in Indonesia, Thailand and Malaysia. *Journal of Integrated Pest Management* (Accepted). doi: 10.1093/jipm/pmaf039.
48. Tan, T.K., Low, V.L., Lim, Y.A.L., Ser, H.R., Boyd, M., Sivapragasam, G., & Kaur, R. (2025). First report of *Giardia duodenalis* assemblages A and B in wild hornbills. *Tropical Biomedicine*, 42(3), 356-360. doi: 10.47665/tb.42.3.015.
49. Amelia-Yap, Z.H., Low, V.L., Azman, A.S., Sam, S.S., Teoh, B.T., Vinnie-Siow, W.Y., Tan, T.K., & Hassandarvish, P. (2025). Effect of secondary metabolites from *Streptomyces* sp. KSF103 on dengue virus 2 replication competency in C6/36 cells and identification of potent dengue virus 2 inhibitors. *Tropical Biomedicine*, 42(3), 291-300. doi: 10.47665/tb.42.3.007.

# Publications (Dec 2024 – 29 Dec 2025) Con't

50. Hafizu, M.S., Junaid, O.Q., Sagara, R., Ravi, R., Fong, M.Y., Vythilingam, I., & Lau, Y.L. (2025). Zoonotic brugian filariasis past and present trends in Malaysia: A systematic review and proportionate meta-analysis. *Scientific Reports* (accepted). doi: 10.1038/s41598-025-21328
51. Mokhtar, A.S., Norza, N.A.H., Zahanuddin, A., Sahimin, N., & Lau, Y.L. (2025). Short Communication: Molecular evidence of knockdown resistance (kdr) mutations in the head lice (*Pediculus humanus capitis*) collected from disadvantaged children in Klang Valley, Malaysia. *Tropical Biomedicine* (Accepted).
52. Tan, P.Y., Loganathan, R., Lee, S.C., Johari, S.N.M., Teng, K., Selvaduray, K.R. & Lim, Y.A-L. (2025). Red palm olein biscuit supplementation modulates gut microbiota in vitamin A deficient rural Malaysian schoolchildren: a randomised controlled trial. *Nat Commun* **16**, 9341. doi:10.1038/s41467-025-64395-x
53. Yang, J.; Bhasu, S.; Rajamanikam, A. (2025). Charting the Future: Advanced Technologies for Sustainable Parasite Control in Aquaculture. *Int. J. Mol. Sci.* **26**,10738. <https://doi.org/10.3390/ijms262110738>
54. Lee, I.L., Yap, N.J., Tee, M.Z., Abdull-Majid, N., Er, Y.X., Lim, Y.A.L. (2025). Pre- and post COVID-19 pandemic evaluation of soil-transmitted helminth infections among the Kensiu Negrito indigenous community. *Tropical Biomedicine*. **42**(3): 236-241.
55. Ravindar, L., ...Lau, Y.L.(2025). Recent developments in synthesis and antimalarial activities of chalcone hybrids. *Bioorganic & Medicinal Chemistry*.
56. Joo-Yie Chin, Muhammed-Nur-Iman Mohammed-Syafiei, Yi-Jun Lim, Gordon Xue-Zhen Chong, Muhammad-Nasreen Suhaimi, Zhi-Ying Phong, Yee Ling Ng, Lau Yee Ling, Jamal I-Ching Sam, Laurent Rénia, Wenn-Chyau Lee. (2025). Effect of periostin (OSF2) on phagocytosis of Plasmodium -infected erythrocytes. *Frontiers in Microbiology*.
57. Zahanuddin, A., Rahim, F. F., Lau, Y. L., Mokhtar, A. S. (2025). Microbial Metagenomics and Genetic Diversity Exploration of Head Lice (*Pediculus humanus capitis*) from Disadvantaged Children in Klang Valley Districts: Linking Socio-Sanitary Factors to Microbial Profile Variation. *Tropical Biomedicine* (Accepted)
58. Latif, E.N.M., Adlan A.S.A., Lau, Y.L., Cheong, F.W. Characterisation of erythrocyte binding activity of *Plasmodium cynomolgi* duffy binding protein haplotypes from *Macaca fascicularis* in Peninsular Malaysia. *Acta Tropica*. **2026**, 273: 107939.
59. Marimuthu, N., Chimplee, S., Saravanabhavan, S.S., Labana, R.V., Sowri, V.V.R., Jimoh, T.O., Lee, W-C., Hailu, T., Brandon-Mong, G-J., Boonroumkaew, P., Jaronwitchawan, T., Mitsuwan, W., Lim, C.L., Koh, R.Y., Chandramathi, S., Nawaz, M., de Lourders Pereira, M., Wiart, C., Oliveira, S.M.R., Nissapatorn, V. (2025). A synergistic nanoformulation of propolis and chlorhexidine against *Acanthamoeba*: encapsulation efficiency, release kinetics, and safety evaluation. *Peer J*. **13**:e20493 <http://doi.org/10.7717/peerj.20493>
60. Nurul Nabila Rosli, Yee Ling Lau, Meng Yee Lai. (2025). A cold-chain free loop-mediated isothermal amplification test for detection of human malaria in point-of-care settings. *Diagnostic Microbiology and Infectious Disease*. <https://doi.org/10.1016/j.diagmicrobio.2025.117237>
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62. Al-Adhroey AH, Robied NH, Al-Yemeni HA, Mahdi KS, Al-Gbri MA, Herran OA, Alobahi TA, Al-Ansi YA, Amer AH, Al-Kholani MA, Al-Mekhlafi HM\*. Prevalence and associated risk factors of pediculosis capitis among female primary schoolchildren in Dhamar City, Yemen. *Journal of Parasitic Diseases*. **2025**; <https://doi.org/10.1007/s12639-025-01889-x>

# Chapters in book (2025)

1. Tyagi BK and Vythilingam I. 2025. History of mosquito research. Mosquitoes of India. Edited by Tyagi. CRC Press Taylor and Francis Group.
2. Dhiraj Saha, Minu Bharati, Priyanka Raj, Abhisekh Subba, Manas Pratim Modak, Abhirup Saha, Subhajit Das, E. Pushpalatha, Indra Vythilingam, Nazni bt. Hj. Wasi Ahmad, R.S. Sharma, B.K. Tyagi. 2025 Insecticide resistance. Mosquitoes of India. Edited by Tyagi. CRC Press Taylor and Francis Group

# Publications: summary

Name of Journal	IF by WoS	Rank by JIF category	Tier	Number of papers published
<i>Lancet</i>	88.5	Medicine, general & internal: 1/332	Q1	5
<i>Nature Medicine</i>	58.7	Biochemistry & molecular biology: 1/313	Q1	1
<i>Cell</i>	42.5	Biochemistry & Molecular Biology: 3/319	Q1	1
<i>Lancet Infectious Diseases</i>	31	Infectious diseases: 1/137	Q1	1
<i>Nature Ageing</i>	19.4	Geriatrics & gerontology: 1/73	Q1	1
<i>Nature Communications</i>	15.7	Multidisciplinary sciences: 10/136	Q1	1
<i>Osteoarthritis and Cartilage</i>	9	Orthopedics: 2/140	Q1	1
<i>International Journal of Molecular Medicine</i>	5.8	Medicine, research & experimental: 39/195	Q1	1
<i>International Journal of Molecular Sciences</i>	4.9	Biochemistry & molecular biology: 72/320	Q1	1
<i>Frontiers in Cellular and Infection Microbiology</i>	4.8	Microbiology: 32/163	Q1	1
<i>Pharmaceuticals</i>	4.8	Chemistry, medicinal: 18/72	Q1	1
<i>mBio</i>	4.7	Microbiology: 33/163	Q1	1
<i>Entomologia Generalis</i>	4.6	Entomology: 4/110	Q1	1
<i>Frontiers in Microbiology</i>	4.5	Microbiology: 38/163	Q1	2
<i>Journal of Infectious Diseases</i>	4.5	Infectious diseases: 19/137	Q1	1
<i>One health</i>	4.5	Infectious diseases: 19/137	Q1	1
<i>Microorganisms</i>	4.2	Microbiology: 46/163	Q2	1
<i>Journal of Fungi</i>	4	Mycology: 8/32	Q1	1
<i>Scientific Reports</i>	3.8	Multidisciplinary sciences: 25/136	Q1	4
<i>PLoS Genetics</i>	3.7	Genetics & Heredity: 51/191	Q2	1
<i>Parasites &amp; Vectors</i>	3.5	Parasitology: 5/47	Q1	2
<i>BMC Cancer</i>	3.4	Oncology: 118/326	Q2	1
<i>European Journal of Clinical Nutrition</i>	3.3	Nutrition & dietetics: 45/112	Q2	1
<i>Bioorganic &amp; Medicinal Chemistry</i>	3	Chemistry, organic: 12/57	Q1	1
<i>Waste and Biomass Valorization</i>	2.8	Environmental sciences: 206/374	Q3	1
<i>Journal of Integrated Pest Management</i>	2.7	Entomology: 17/110	Q1	1
<i>PLoS One</i>	2.6	Multidisciplinary sciences: 44/136	Q2	3
<i>Acta Tropica</i>	2.5	Parasitology: 14/47	Q2	6
<i>Peer J</i>	2.4	Multidisciplinary sciences: 47/136	Q2	1
<i>International Journal of Legal Medicine</i>	2.3	Medicine, legal: 6/22	Q2	3
<i>Diagnostic Microbiology and Infectious Disease</i>	1.8	Infectious Diseases: 95/137	Q3	1
<i>American Journal of Tropical Medicine &amp; Hygiene</i>	1.6	Tropical Medicine: 18/28	Q1	2
<i>Journal of Applied Research in Higher Education</i>	1.6	Education & Educational Research: 280/756	Q2	1
<i>Environmental Entomology</i>	1.5	Entomology: 44/110	Q2	1
<i>Experimental &amp; Applied Acarology</i>	0.86	Entomology: 38/110	Q2	1
<i>Tropical Biomedicine</i>	0.8	Parasitology: 44/47	Q4	7

# Other Publications

## Rubrica FOM Bulletin

### THE UNIVERSITY OF GLASGOW DIPLOMA IN TROPICAL MEDICINE AND HYGIENE (DTM&H) MICROSCOPY TRAINING 2025: KUALA LUMPUR

Written by Dr. Lee Wenn Chyau (Department of Parasitology)



The microscopy training was conducted on 19th-20th February 2025, from 9am to 5pm, at the MD2 Laboratories in the Faculty of Medicine, Universiti Malaya, Malaysia. This annual training was the third collaboration between the University of Glasgow and Universiti Malaya, with the aim of providing an effective, intensive, and hands-on-based microscopy training for the participants with clinical background.

Universiti Malaya is one of the five microscopy training centers for the diploma programme of Tropical Medicine and Hygiene (DTM&H) by University of Glasgow. The event was coordinated by Dr. Wenn-Chyau Lee from the department of Parasitology, assisted by six experienced parasitologists (Dr. Amirah Amir, Dr. Karshini Pirathaba, Mr. Mohd Redzuan Ahmad Naziri, Mdm. Aisah Samion, Mr. Mohd. Khairul Roslan, and Mdm. Sharifah Nor Akmar Syed Mohd). 21 participants from different parts of the world (Malaysia, Singapore, Myanmar, Bangladesh, India, Egypt, United Kingdom, Australia, and New Zealand) registered for this training workshop.

To facilitate lab-based learning, participants were divided into groups. The training was divided into 4 segments, started with a basic introduction of compound light microscope, and the rules of handling the light microscope. The participants were provided with specimens mounted on glass slides for attempts of microscopic examination. This was followed by the training of stool sample processing, where the participants were offered opportunities to make wet mounts using stool samples. The participants were requested to find parasites available in the stool samples. The training on the first day ended with a quiz session, where discussions and exchanges of ideas were done. On the second day, the training started with demonstration of blood sample processing, where the participants acquired skills of preparing blood smears, fixing and staining of smears using Giemsa and Field's solutions. The participants also learnt how to perform rapid diagnostic test kits to diagnose malaria. The final segment of the training revolved around arthropods, where participants were presented with various medically important arthropods, and tips to identify medically important arthropods were shared. By the end of the event, all participants passed the assessment of microscopy skills. The participants actively discussed with the instructors throughout the session, and group activities were arranged to facilitate interactive learning in this training. Besides, a separate specimen demonstration hall was set up, so that participants can revise their diagnostic parasitology knowledge with actual specimens. Succinctly, the 2025 DTM&H microscopy training concluded successfully with complete coverage of the planned syllabus for the event.

# Seminars

## Proposal defense seminars

No.	Name of presenter	Title of presentation	Date
1.	Adriana binti Zahanuddin (22082834/1)	DNA barcoding of <i>Pediculus humanus capitis</i> and characterization of its potential associated pathogens among underprivileged children	8 Jan 2025
2.	Rishitharan A/L Subramaniam (17093309/3)	Leveraging CRISPR-Cas9 genome editing to evaluate the effect of genetic polymorphisms in <i>Plasmodium knowlesi</i> duffy binding protein alpha on parasite survival	8 Feb 2025
3.	Lim Yi Yang (24053327/1)	Unravelling the anthelmintic mechanisms of antillatoxin B in <i>Haemonchus contortus</i>	11 June 2025
4.	Muhammad Luqman Nul-Hakim bin Rohaizad (23094543/1)	Susceptibility assessment of acetamiprid and imidacloprid and evaluation of post selection pressure protein expression in <i>Aedes aegypti</i> Larvae	11 June 2025
5.	Zainab Rahman (23101492/1)	Larvicidal efficacy of a botanical effervescent tablet formulated from <i>Areca Catechu</i> nut extracts against <i>Aedes Aegypti</i> and <i>Aedes Albopictus</i>	18 June 2025
6.	Sanjeevi Nair A/P Gopalan (23087239/1)	Elucidating <i>Plasmodium knowlesi</i> malaria parasite preference to B-thalassaemic erythrocytes	23 Jul 2025
7.	Hemma Rabindran (24205556/1)	Prevalence and diagnostic insights of intestinal parasitic infections in two Malaysian hospitals with varying levels of endemicity by incorporating an AI based diagnostic approach	24 Sept 2025
8.	Fachrunnisa binti Izzat (24209065/1)	Potentials of <i>Areca Catechu</i> Linn repellence gel formulation cream against <i>Aedes Aegypti</i> mosquitoes	8 Oct 2025
9.	Intan Adibah Salim (24207607/1)	Evaluation of the larvicidal, enzymatic and sterilizing activity of pyriproxyfen as a potential control measure for simian malaria vectorach	8 Oct 2025
10.	Sasha Kimbrough (24212557/1)	The effects of fire and bleach on postmortem interval through a forensically important fly, <i>Synthesiomyia nudiseta</i>	3 Dec 2025
11.	Chiew Zi Yan (U2004928/2)	Optimizing <i>in-vitro</i> production of <i>Plasmodium knowlesi</i> gametocytes	9 Dec 2025
12.	Nabel Darwish binti Zuhaidi (24088149/1)	Epigenetic control of gametocytogenesis by heterochromatin protein 1 in <i>Plasmodium knowlesi</i>	9 Dec 2025
13.	Yoel Bi William (23107674/1)	Genetic diversity and immunogenicity of key proteins in <i>Plasmodium knowlesi</i> erythrocyte invasion: PkRIPR and PkCyRPA	10 Dec 2025
14.	Liaw Hon Kit (23100855/1)	Vectors of zoonotic non-human primate malaria: Biology and control	10 Dec 2025

# Seminars

## Confirmation seminars

No.	Name of presenter	Title of presentation	Date
1	Chin Joo Yie (U2004192/2)	Effect of insulin-like growth factor binding protein 7 (IGFBP7) on the vascular pathobiology of malaria	13 Oct 2025

## Candidature defense seminars

No.	Name of presenter	Title of presentation	Date
1.	Tan Khee Hui (23060775/2)	To investigate the infection of <i>Plasmodium knowlesi</i> (UM04 strain) in <i>Anopheles cracens</i>	25 June 2025
2.	Zulhisham bin Zulzahrin (22058086/2)	Vector Biology Characterization of Wolbachia-infected <i>Aedes aegypti</i>	30 Jul 2025
3.	Zainab Rahman (23101492/1)	Larvicidal efficacy of a botanical effervescent tablet formulated from <i>Areca Catechu</i> nut extracts against <i>Aedes Aegypti</i> and <i>Aedes Albopictus</i>	10 Nov 2025
4.	Adriana binti Zahanuddin (22082834/1)	DNA barcoding of <i>Pediculus humanus capitis</i> and characterization of its potential associated pathogens among underprivileged children	17 Dec 2025

## Thesis seminars

No.	Name of presenter	Title of presentation	Date
1.	Freddy Franklin A/L Anthony Joseph (17218454/1)	Studies to establish the association between gut parasitic infection, gut microbiota, and immunity in individuals with different severity of schizophrenia: A special focus on <i>Blastocystis</i> sp.	30 Jul 2025

# Journal Clubs

No.	Name of Speaker	Title	Date
1	Prof. Dr. Hesham Al-Mekhlafi	The Global Burden of Disease: From data to policy (Breakfast@UMHealth)	15.01.2025
2	Mr. Tung Chee Hong (NextGene Scientific Sdn. Bhd.)	Advancements in sequencing technology: Where are we heading?	26.02.2025
3	Dr. Aida Syafinaz Mokhtar	Sharing Session: Sakura Science Exchange Programme, Nagasaki, Japan	26.03.2025
4	Ikari Shodoku	Innovative Pest Control & Public Health Solutions: Ikari Shodoku's Approach	23.04.2025
5	Dr. Arutchelvan Rajamanikam	Breakfast@UMHealth: Can a harmless organism be turned harmful?: Role of gut microbiota.	07.05.2025
6	Prof. Dr. Amam Zonaed Siddiki	Parasite genomics and big data studies	20.05.2025
7	Prof. Dr. Anabel Martínez-Sánchez	Unlocking the role of forensic entomology in myiasis: A study of two human cases from Spain	28.05.2025
8	Dr. Cheong Fei Wen	Breakfast@UMHealth	9.07.2025
9	Mr. Wong Shek Ting (Aseptec Sdn. Bhd.)	Seeing the unseen: Life-cell imaging of parasites	7.08.2025
10	Dr. Junaid Olawale	Sustainable elimination of zoonotic filariasis in Pulau Carey: Integrating one health and multisectoral approaches	30.9.2025
11	Dr. Karshini Jeya Pirathaba	A simple practice. A meaningful pause	30.12.2025

# Journal Clubs

**Journal Club@** Department of Parasitology Faculty of Medicine

**HEALer** Heat • Engage • Act • Lead

## Breakfast@UMHealth

LIVE WEBINAR SERIES

Wednesday, 15th Jun 2022 | 8:00-9:30 AM | LIVE ZOOM

**The Global Burden of Disease: From Data to Policy**

**Prof. Dr. Hesham Mahyoub Al-Mekhlafi** *Speaker*  
Professor, Department of Parasitology, Faculty of Medicine, Universiti Malaya

**Dr. Arutchelvan Rajamanikam** *Moderator*  
Senior Lecturer, Department of Parasitology, Faculty of Medicine, Universiti Malaya

EPISODE 14 | 2025

MMA C is not approved for this session.

**Journal Club@** Department of Parasitology Faculty of Medicine

**NextGene**

VIRTUAL & PHYSICAL SEMINAR

## Advancement in sequencing technology

### Where are we heading

\*Certificate will be provided to the participants.

26th February 2025 (Wednesday) | 10.00 – 11.00 am | Dewan CP Ramachandran, Department of Parasitology, Universiti Malaya (UM) | Virtual: <https://shorturl.at/3vTUF>

**Topics Covered**

- Evolution of sequencing: From its roots to today's cutting-edge innovations
- Demystifying Next Generation Sequencing (NGS) terminology: Speak the language of sequencing like a pro
- NGS Sequencing Platforms: Discover the technologies transforming genomics
- Long-Read Sequencing: Why longer reads mean greater insights
- Applications of NGS: Real-world breakthroughs in infectious disease, medicine, biology, and beyond
- Single-Cell Sequencing: Zoom into cellular diversity like never before

**Speaker**

**Mr Tung Chee Hong**  
Field Application Manager, Next Gene Scientific

**Journal Club@** Department of Parasitology Faculty of Medicine

**Sharing Session:**  
SAKURA SCIENCE EXCHANGE PROGRAM, NAGASAKI, JAPAN

The Department of Parasitology relishes successful participation in Sakura Science Exchange Program 2025 that took place in Nagasaki, Japan. Hosted by Dr. Tomonori Hoshi from the Institute of Tropical Medicine, Nagasaki University, 7 postgraduate students from the Department of Parasitology led by Dr. Aida Syafinaz Mokhtar engaged in scientific exchange in tropical medicine focusing on ticks research during the 7-day trip.

- Date: 26th March 2025
- Time: 12.00pm - 1.00pm
- Venue: Dewan CP Ramachandran

SAKURA SCIENCE EXCHANGE PROGRAM  
SCIENTIFIC EXCHANGE FOR YOUNG RESEARCHERS IN TROPICAL MEDICINE RESEARCH  
NAGASAKI, JAPAN: 23.02.25 - 01.03.25

NEKKEN

## CONTROL & PUBLIC HEALTH SOLUTIONS: IKARI SHODOKU'S APPROACH

Venue: Dewan CPI, Department of Parasitology, Faculty of Medicine, Universiti Malaya  
Date: 23 April 2025  
Time: 12.00 - 1.00 pm

Presented by: MR. H. Gene Ikari S.

**Journal Club@** Department of Parasitology Faculty of Medicine

## PARASITE GENOMICS & BIG DATA STUDIES

This talk will explore how high-throughput sequencing, genome-wide association studies, and large-scale data analytics are being used to unravel parasite biology. Don't miss this opportunity to gain insights into cutting-edge research approaches shaping the future of infectious disease control.

Tuesday 20 May 2025

**Journal Club@** Department of Parasitology Faculty of Medicine

## Breakfast@UMHealth

LIVE WEBINAR SERIES

Wednesday, 9th July 2025 | 8:00-9:00 AM | LIVE ZOOM

**Revolutionizing Malaria Research: CRISPR-Cas9 in the Genome Editing of Plasmodium**

**Dr. Cheong Fei Wen** *Speaker*  
Senior Lecturer, Department of Parasitology, Faculty of Medicine, Universiti Malaya

**Dr. Arutchelvan Rajamanikam** *Moderator*  
Senior Lecturer, Department of Parasitology, Faculty of Medicine, Universiti Malaya

**Journal Club@** Department of Parasitology Faculty of Medicine

## Seeing the Unseen: Live-Cell Imaging of Parasites

DATE: 7th August 2025

**JOIN US!**

- Molecular-scale spatial resolution (~20 nm)
- Real-time live-cell imaging
  - Imaging of host-parasite interactions
  - Track parasite intracellular dynamics

**ASEPTIC Sdn Bhd** LABORATORY & PROCESS EQUIPMENTS

**ONI**

BIODATA

**Journal Club@** Department of Parasitology Faculty of Medicine

## UNLOCKING THE ROLE OF FORENSIC ENTOMOLOGY IN MYIASIS: A study of two human cases from Spain

Wednesday 29 May 2025 | 10.00 - 11.00 am | Dewan CP Ramachandran, Department of Parasitology

**Journal Club@** Department of Parasitology Faculty of Medicine

## Fundamentals of Next-generation Sequencing and Principle of Nanopore Technologies

07/10/2025 | 9:30 AM - 11:00 AM

Department of Parasitology Faculty of Medicine, Universiti Malaya

Invited Speaker: **Dr. Parsakorn Tapaopong**, Faculty of Tropical Medicine, Mahidol University

For Inquiries: Dr. Phang Wei Kit (weikit@um.edu.my / +6017-8355228)

**Journal Club@** Department of Parasitology Faculty of Medicine

## WHEN THE BREATH CHANGES, THE EMOTION FOLLOWS. A CONVERSATION ON BREATH AND FEELINGS

A SIMPLE PRACTICE TO CHANGE YOUR NEW YEAR

30 December 2025 | 11.00AM-12.00PM | CP I, Dept of Parasitology

By: **Dr. Karshini Jeya Pirathaba**

# Our workshops in year 2025

## FEBRUARY 2025

### THE UNIVERSITY OF GLASGOW DIPLOMA IN TROPICAL MEDICINE AND HYGIENE (DTM&H) MICROSCOPY TRAINING 2025: KUALA LUMPUR

Written by Dr. Lee Wenn Chyau (Department of Parasitology)



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## MAY 2025



**FORENSIC ENTOMOLOGY WORKSHOP 2025:  
DIPTERA IDENTIFICATION FOR  
FORENSIC INVESTIGATIONS**

**27/05/2025  
8:00 AM - 4:30 PM**

Department of Parasitology  
**FACULTY OF MEDICINE,  
UNIVERSITI MALAYA**

**Instructor:  
Prof. Dr. Anabel Martinez-Sánchez  
University of Alicante (Spain)**

**REGISTER NOW** 

<https://forms.gle/HBUShcclhtD7INIZ9>



**Closing date for registration:  
21 May 2025**



**Early bird fee: RM 100  
(ends 5 May 2025)  
Workshop fee: RM 150**

For further information:  
forensic-entomology@um.edu.my

## AUGUST 2025

### 5TH INTERNATIONAL MALARIA WORKSHOP



## CURRENT TOOLS TO COMBAT MALARIA

28th July - 1st August 2025 (5 days)

RM1,000 (Local), USD450 (International)

(30% discount for UM staff & students)



#### Hands-on training on:

- Mosquito collection, dissection & identification
- Culturing Plasmodium parasites (Pf/Pk)
- Microscopic & molecular diagnosis of malaria
- Detection of drug resistance molecular markers
- Using GIS for mapping incidence & risk factors
- Phylogenetic analysis

**D DEPARTMENT OF PARASITOLOGY  
FACULTY OF MEDICINE  
UNIVERSITI MALAYA  
KUALA LUMPUR**

**REGISTER BY  
20 JULY 2025**

**(Extended)**



The **five-day** workshop provides participants with the tools, techniques and resources needed for controlling and monitoring malaria

Only 20 seats, early registration is strongly recommended

Contact: Dr. Rajiv Ravi ([rajivravi@um.edu.my](mailto:rajivravi@um.edu.my))

+6-03-7967 4745

## OCTOBER 2025



**8<sup>th</sup> INTERVARSITY PARASITOLOGY QUIZ & ORATORICAL COMPETITION**

**18 OCTOBER 2025 (SAT)  
0900-1600**



**PRE-SELECTION**

- 3 contestants per team
- All teams
- 3 levels questions

**ORATORICAL**

- One contestant per team
- 3-minute speech
- No Q&A session
- 3 winners

**GRAND FINALE**

- 5 teams
- 3 levels questions
- 3 team winners

**CASH PRIZES**

Register by:  
**24 August 2025**

RM 400/local team  
USD 100/International team

**Organized by:**  
Department of Parasitology  
Faculty of Medicine  
Universiti Malaya  
Malaysia  
[medicine.um.edu.my/parasitology-department](mailto:medicine.um.edu.my/parasitology-department)

**Venue:** Dewan Jemerlang  
Faculty of Medicine, UM

**Contact:**  
[junaid.quazim@um.edu.my](mailto:junaid.quazim@um.edu.my)  
+603 79674790/+601111748554

# Congratulations

Congratulations on reaching this incredible milestone!

Wishing you continued success in the future.



# Award recipients in year 2025



**Prof. Dr. Yvonne Lim Ai Lian**  
Appointed as Associate Deputy Vice-Chancellor (Academic and International) Universiti Malaya



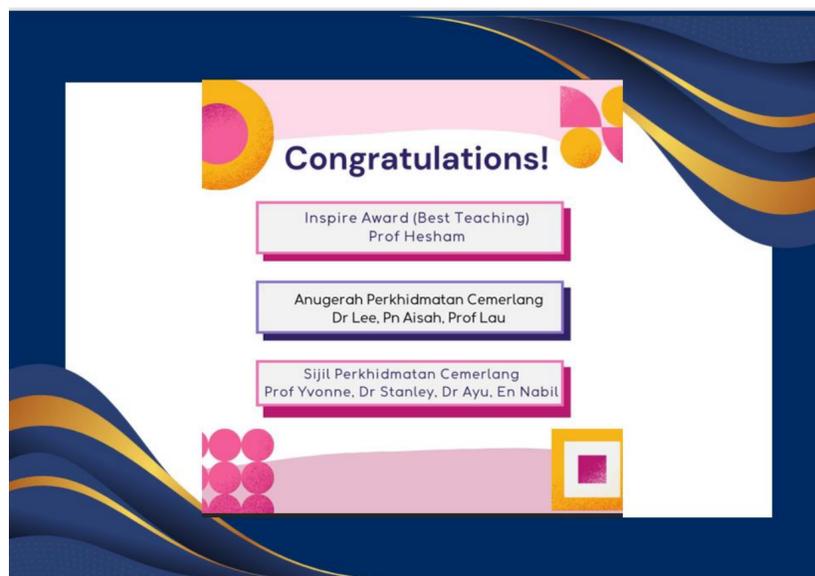
**Prof. Dr. Lau Yee Ling**  
Top Research Scientist Malaysia 2024



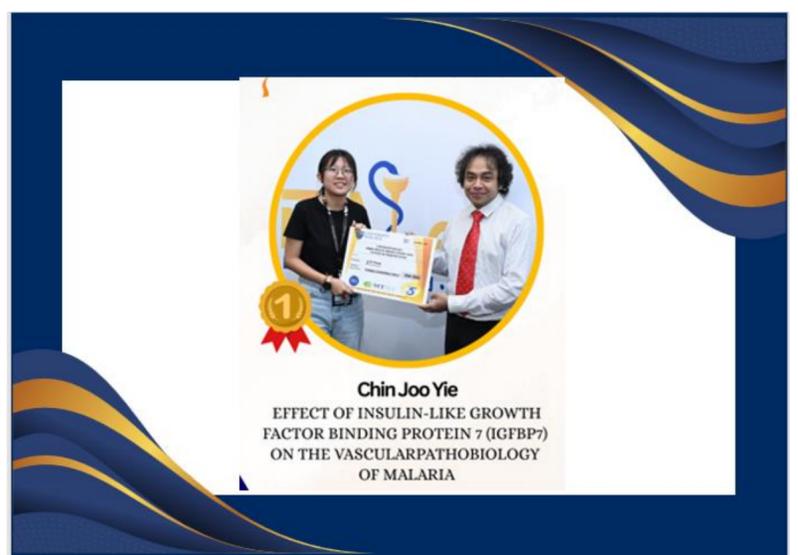
**Dr. Aida Syafinaz Mokhtar**  
Best Oral Presenter (1st Place) at the 5th International Conference for Bioengineering for Health & Environment, 9-10<sup>th</sup> October 2025, Manipal University College Malaysia.



**Prof. Dr. Hesham Mahyoub Sarhan Al-Mekhlafi**  
Inspire Award Teaching and Learning



**Inspire Award, APC & SPC recipients**



**Chin Joo Yie**  
Champion  
3 Minute Thesis (UM3MT) Competition Faculty of Medicine  
2025

# Limelight



# Limelight

## THE UNIVERSITY OF GLASGOW DIPLOMA IN TROPICAL MEDICINE AND HYGIENE (DTM&H) MICROSCOPY TRAINING 2025: KUALA LUMPUR

Written by Dr. Lee Wann Chyau (Department of Parasitology)



Strim Sekarang Melalui [tonton](#)



**PROFESOR DR. YVONNE LIM AI LIN**  
Penolong Naib Canselor (Akademik dan Antarabangsa)

**MINGGU ANTARABANGSA UNIVERSITI MALAYA 2025**  
SELASA | 28 OKTOBER 2025  
10.00 PAGI - 11.00 PAGI

HIDUPKAN PAGI  
f @ d @mhi\_tv3



**3MT**  
**Congratulations!**  
Faculty of Medicine Level  
UM 3 Minute Thesis Competition 2025



**1**  
**Chin Joo Yie**  
EFFECT OF INSULIN-LIKE GROWTH FACTOR BINDING PROTEIN 7 (IGFBP7) ON THE VASCULARPATHOBIOLOGY OF MALARIA



**2**  
**Geetha A/P B. Anbalagan**  
FEASIBILITY OF THE OTAGO EXERCISE PROGRAM FOR PEOPLE WITH DEMENTIA



**3**  
**Waqiyuddin Hilmi Hadrawi**  
STOPPING DENGUE IN ITS TRACKS

HOSTED BY:  
FAKULTI SAINS KOMPUTER DAN TEKNOLOGI MAKLUMAT  
Faculty of Computer Science and Information Technology



## Graduates attended the 65<sup>th</sup> convocation ceremony of Universiti Malaya, 2025

### PhD

- Dr. Eira Nurfarisha binti Mohd Latif
- Dr. Er Yi Xian
- Dr. Manal Ali Saleh Al-Ashwal



### MSc (research)

- Nurmanisha binti Abdull Majid

### MSc (Master of Medical Parasitology and Entomology Program)

- Anis Amira Azhar
- Nurul Izzah Mohd Azmi
- Sharifah Nor Akmar Syed Mohd



# Newsletter Editorial Board

## Editor

Dr. Lai Meng Yee

## Acknowledgements

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En. Awang Bhukhari Matsat

En. Muhammad Nabil Fikri Hashim

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**Website:** <https://medicine.um.edu.my/parasitology-department>

# MASTER OF MEDICAL PARASITOLOGY AND ENTOMOLOGY

- ✓ One-year master degree by coursework
- ✓ Affordable (Local RM40K; International USD15K)
- ✓ Renowned and highly experienced faculty
- ✓ Guided hands-on practical sessions  
(eg. microscopy, molecular techniques, insect ID & dissections)
- ✓ Engaging and interactive learning sessions
- ✓ Exciting field trips offer real-world experience  
(eg. community engagement, entomology, forensic entomology)
- ✓ Cutting-edge approaches in research  
(eg. CRISPR, RNAseq, GIS, LAMP)
- ✓ Expert supervision on research project
- ✓ A gateway towards PhD level program
- ✓ Accredited by MQA  
(but not other professional bodies)

## More information:

Department of Parasitology  
Faculty of Medicine  
Universiti Malaya

 [medicine.um.edu.my/parasitology-department](http://medicine.um.edu.my/parasitology-department)

**Application Period:**  
Sep-Jan & Feb-Aug

**Program starts:**  
March & October

### Financial support:

Hadiah Latihan Persekutuan (HLP), Kementerian Kesihatan Malaysia  
MARA - Graduate Excellence Programme (GrEP)  
The Malaysian Technical Cooperation Programme (MTCP)  
Malaysia International Scholarship (MIS) by MOHE



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