

SPARKLE WORKSHOP

Mathematical Modelling of Infectious Diseases

Monash University Malaysia

Venues: Rooms 9501 & 6217

DAY 1 — 21st September 2026

08:30 – 09:00 *Breakfast*

09:00 – 09:15 **Opening remarks**
Prof Erniel Barrios

09:15 – 12:15 **Introduction to mathematical modelling in infectious diseases** 9501
Ms Tyas Widayati

12:15 – 14:00 *Lunch*

14:00 – 16:00 **Modelling using differential equations in R** 9501
Dr Bimandra Djaafara

16:00 – 17:00 **Modeling environmental persistent pathogen in the ICU** 9501

DAY 2 — 22nd September 2026

08:30 – 09:00 *Breakfast*

09:00 – 12:00 **Designing a model to suit the pathogen** 9501
Ms Tyas Widayati

12:00 – 14:00 *Lunch*

14:00 – 16:00 **Artificial Intelligence-Driven Integrated Prognostic Modelling in Oral Cancer** 9501
Dr Mogana Darshini, Kavilashini Alagenthran

16:00 – 16:30 **Housekeeping announcement for the day** 9501

DAY 3 — 23rd September 2026

08:30 – 09:00 *Breakfast*

09:00 – 12:00 **Fitting models in R** 6217
Dr Bimandra Djaafara

12:00 – 14:30 *Free afternoon / catch-up session*

14:30 – 16:30 **Seminar: Mathematical Modelling of Infectious Diseases** 6217
Dr Nur Alia Johari, Dr Hamimatunnisa Johar, Prof Kenneth Lee, Lim Jing Sheng, Dr Polly Yap

DAY 4 — 24th September 2026

08:30 – 09:00 *Breakfast*

09:00 – 12:00 **Vector-borne disease modelling** 6217
Dr Kartika Saraswati

12:00 – 14:00 *Lunch*

14:00 – 16:00 **Vector-borne disease modelling in R** 6217
Dr Kartika Saraswati

16:00 – 17:00 **Dengue Persistence in the 21st Century: Molecular Pathogenesis & Virology** 6217
A/P Vinod Balasubramaniam

DAY 5 — 25th September 2026

08:30 – 09:00 *Breakfast*

09:00 – 12:00 **Modelling interventions and their effect on diseases** 9501
Ms Dewi Christina

12:00 – 12:15 **Closing remarks** 9501
A/P Ewilly Liew

12:15 onwards *Lunch and free afternoon / Friday prayers*

QUICK REFERENCE GUIDE

Venue Legend

9501 Room 9501
6217 Room 6217

Location & Dates

Monash University Malaysia
21st – 25th September 2026