



## Tan Wei Ting

Affiliate, Neurosurgery

### Bio

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#### BIO

Wei Ting graduated from University Malaya under the Department of Biomedical Engineering (Bachelor & Master's). Apart from multidisciplinary (tissue engineering, medical imaging, computational biology) research experience, she has worked in startups, industry, clinics, and medical centres with exposure to rehabilitation robotics, TCM in fertility, and clinical trials.

Her past undergraduate research experience includes

1. Dr Belinda Murphy's Tissue Engineering Lab to assist in cell culturing and cytotoxicity testing
2. Asian Cardiac Laboratory under Dr Lim Einly for medical imaging-based investigation of flow energetics and vortex parameters in heart attack patients

For master's research, funded under Newton Advanced Fellowship in collaboration with Imperial College London's Prof Xu group and UTM's Dr Mohd Jamil's group.

1. Research focus: investigating the risk factor of distal stent induced new entry in aortic dissection patients using both simplified and patient-specific models.
2. Presented in local and international conference, published peer review studies and has reviewed paper relevant to the project.

With curiosity for knowledge, arts, philosophy, and the sciences, she often diving into new fields, moves across disciplines, and combines several areas of knowledge. She gained both lab-based and computational skills, for example: bioinformatics, pharmacokinetic modelling, cell staining, confocal microscopy, FRET cell transfection, live cell imaging, image processing, high-performance computing, quantum algorithms, etc.

At MSU, she is part of the Tau Beta Pi National Honor Society and Cloud Computing Foundations (CCF) Program. For the cloud program, her interest is in applying a hybrid quantum-classical computational framework to small-molecule drug development. She is currently a PhD student in Biomedical Engineering from Michigan State University, performing computational analysis and exploring quantum algorithms for biomedical applications in cell and gene regulatory networks.

Wei Ting has been active in learning more about different facets of medicine and often engages with researchers and physicians. She has gained familiarity with neurological disease (e.g. autism, Parkinson's, and Alzheimer's) from different perspectives (e.g., rehabilitation robotics, brain simulation, and psychiatry). She is invited to join the Neurobehavior and Neuroscience Methods Workshop (SPRINT/Stanford) in 2026.