





Thank you for supporting the collaboration on regenerative immunology between The Chinese University of Hong Kong (CUHK) and the University of Manchester (UoM). This e-newsletter aims to keep you abreast of some of the joint projects between the two universities in regenerative immunology, the latest development of our universities in the field and some funding opportunities.

You are most welcome to provide updates on your joint work for sharing in the future issues. Please also feel free to engage other colleagues who may be interested in joining the collaboration. For enquiries, please contact Ms. Olivia Kwok at CUHK (oliviakwok@cuhk.edu.hk) or Ms. Annette Barber at UoM (Annette.Barber@manchester.ac.uk).

Spotlight on Researchers



Professor Tao Wang

Professor Anna Blocki

Chipping in on Disease Modelling

Professor Tao Wang, Professor of Molecular Medicine School of Biological Sciences, UoM and

Professor Anna Blocki, Assistant Professor
Institute for Tissue Engineering and Regenerative Medicine (iTERM), and
School of Biomedical Sciences, Faculty of Medicine, CUHK

With common interest in the organs, researchers from UoM and CUHK have paired up to study the engineering of vascularised diseased models using microfluidic chips with focus on neurovascular and lung diseases.

Professor Tao Wang's research interests lie in the molecular basis of cardiovascular diseases, focusing on genetic small vessel disease and vascular dementia. Professor Anna Blocki holds an interest in creating complex tissue-specific microenvironments and micro-tissues *in vitro*. In particular, she is interested in the engineering of vascularised tissues. Following the joint symposium in regenerative immunology last December, Professor Wang and Professor Blocki have identified synergy in their research and started working together.

In the project, the duo will apply microfluidic chips to model neurovascular interactions and blood-brain barrier function, as well as other disease models on chips. The project will study the physiological processes, as well as pathophysiological diseases, including cellular and molecular interactions in high resolution and over time. It will improve understanding of the disease mechanisms, with a view to identifying therapeutic targets and conducting drug tests in the future. Experiments are being conducted and they plan to apply for seed funding to take forward their collaboration.

Updates



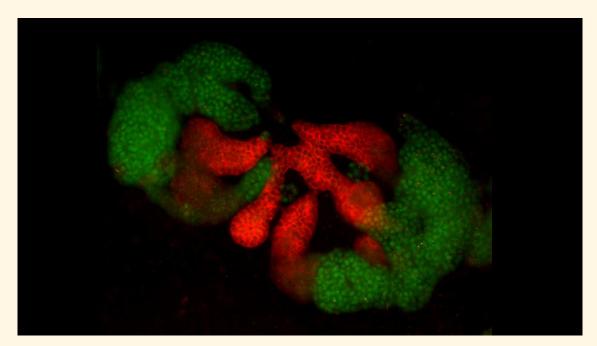


Professor Rocky S. Tuan

Professor Gang Li

CUHK Vice-Chancellor Professor Rocky S. Tuan and CU Medicine Professor Gang Li Named Fellows of Orthopaedic Research Society

<u>Professor Rocky S. Tuan</u>, Vice-Chancellor and President, and <u>Professor Gang Li</u> of the Department of Orthopaedics and Traumatology of CUHK were named <u>2021</u> <u>Fellows of the Orthopaedic Research Society</u> for their outstanding achievements in musculoskeletal research. They are the first scholars in Hong Kong to earn this prestigious honour.



Early development of human pluripotent stem cell kidney pre-organoids showing the metanephric mesenchyme (green) interacting with early nephron/collecting duct precursors (red).

UoM: Wellcome Hope Leap Success

Professor Adrian Woolf, Professor Sue Kimber and Dr Jason Wong from the School of Biological Sciences and Manchester Regenerative Medicine Network at UoM have recently been awarded funding of US\$3.7 million from the Wellcome Leap Human Organs Physiology and Engineering initiative (HOPE), founded by the Wellcome Trust for the project 'Engineering functional human kidneys and urinary tracts'. The project brings kidney, pluripotent stem cell and surgical expertise to address the challenge of generating human renal tracts from stem cells and use them to treat models of kidney disease. The research will pave the way to developing regenerative medicine therapies to treat people with failing kidneys, a condition that affects several million people around the world.

Funding Opportunities



Association of Commonwealth Universities Fellowships (Deadline: 8 June)

The Association of Commonwealth Universities (ACU) Fellowships are now open for application. The fellowships support partnerships between academic and professional staff at ACU member universities, including CUHK and UoM. The funding is intended for virtual collaboration only and will not fund physical travel. Each fellowship provides funding of up to £5,000.



Royal Society - International Exchanges Schemes (Deadline: 10 June)

Two International Exchanges Schemes offered by the Royal Society are now calling for applications. The schemes provide funding support for visits to stimulate collaborations, including those between scientists in the UK and Hong Kong. The schemes cover a number of disciplines within natural sciences, including but not limited to biological research, chemistry, engineering, mathematics and physics. Up to £12,000 will be awarded under the schemes.