Beyond Insulin:

Innovative research in T1D prevention and cure



Speaker's name: A/Prof Stuart Mannering

Seminar date: Thursday, 21st September 2023, 1-2pm AEST

Seminar title: Type 1 diabetes: the T cells' perspective

Zoom connection details: https://us02web.zoom.us/j/5056623028

About the speaker: A/Prof Stuart Mannering leads the human T-cell laboratory at SVI. His group's work focuses on identifying the targets of human T-cell responses that cause T1D. Their long-term goals are to develop T-cell biomarkers and antigen-specific therapies to prevent T1D.

Stuart, and his collaborators, developed the first dye dilution assays, efficient human T-cell cloning methods, identified

the first neoepitope in T1D, isolated human isletinfiltrating T cells, showed that islet-infiltrating T cells recognize HIPs and discovered that full-length Cpeptide is a major autoantigen in human T1D.

He has received: a JDRF Advanced Postdoc Fellowship, a JDRF Career Development Award, a JDRF-Macquarie Foundation Diabetes Global Research Innovation Award, a Diabetes Australia Millennium Award and a JDRF-Australia T1D

CRN Innovation Award. Currently, he is supported by grants from JDRF, JDRF-A, the

Helmsley Foundation and MRFF.

Brief outline of seminar content: This talk will discuss one of the fundamental outstanding questions in the immunology of T1D – how and why does the immune system attack the insulin producing cells? A/Prof Mannering will present his personal perspective on this question. He will review work done by his group, investigating the targets of human autoimmune T cell responses in T1D, which address this question. Finally, the prospects and obstacles for applying this emerging knowledge to improving therapies for people with T1D will be discussed.

For more information about the seminar series, please contact Michelle So mso@svi.edu.au