

C3 / Pedal the Cause 2016

"Detecting Correlates of Vaccine Responses in Allogeneic Hematopoietic Stem Cell Transplant Recipients"

Principal Investigators:

Randy Taplitz, PhD (Moores Cancer Center at UC San Diego Health) Shane Crotty, PhD (La Jolla Institute for Allergy and Immunology)

Abstract:

Vaccines decrease the risk of infection by working with the body's natural defenses to develop immunity or protection against disease. Patients with cancer and other diseases affecting the immune system may lose immunity to those diseases against which they have previously been vaccinated and also may have reduced ability to develop immunity to a new vaccination. Hematopoietic cell transplant (HCT) is a procedure that replaces defective or damaged cells in patients whose normal blood cells have been affected by cancer. PEDAL15 funds will allow scientists to measure vaccine-specific immunity before and after vaccination with the pneumococcal and Tdap vaccines, which are given at standardized times in the year after HCT. Ultimately, this effort is expected to lead to better vaccination strategies which will in turn lead to decreased infections due to vaccine-preventable diseases in this vulnerable patient population, as well as contribute to our understanding of immune recovery after HCT.