



“Identifying Regulators of an Altered Peptidoglycan On the Surface of Tumor Cells”

Date & Time: Wednesday, June 12 | 1:00PM - 2:00PM PT
Hybrid: LSC3 & Zoom

From the lab of: Dr. Calvin Roskelley, Professor, Department of Cellular & Physiological Sciences

Presented by: Dr. Calvin Roskelley, Erin Bell & Aidan Gallant

Overexpression of the highly glycosylated cell surface mucin podocalyxin is a prognostic marker of poor clinical outcome in multiple solid tumor types. We have identified a tumor-specific alteration of podocalyxin glycosylation that can be targeted using a novel antibody drug conjugate. The emergence of this altered peptidoglycan on podocalyxin is associated with immune cold tumors and a transition to an aggressive partial epithelial-to-mesenchymal phenotype. Therefore, we carried out a genome-wide CRISPR-based screen in an attempt to identify regulators of this altered, tumor-specific peptidoglycan which and we are now working to validate a focused group of hits from that screen.