

CDB SEMINAR

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The University of Texas, MD Anderson Cancer Center, Houston, Texas, USA

Thursday, March 13, 2014 16:00~17:00 Seminar Room A7F

The Two Faces of Hippo : Mammalian Hippo Signaling in Tissue Homeostasis and Disease

Summary

The Hippo signaling pathway is an emerging growth control and tumor suppressor pathway that regulates cell proliferation and stem cell functions. Defects in Hippo signaling and hyperactivation of its downstream effectors YAP and TAZ contribute to the development of many diverse solid tumors. These observations have led to the suggestion that inhibition of YAP and TAZ activity may be a novel means to aid in the treatment and/or prevention of cancers that exhibit deregulated Hippo signaling. In contrast to their oncogenic roles, YAP and TAZ can also play beneficial roles in stimulating tissue repair and regeneration following injury. Thus, activation of YAP and TAZ may be useful in situations where transient stimulation of cell proliferation and survival would aid repair and regeneration of tissues. In our laboratory, we are taking a genetic approach to identify essential roles for Hippo signaling in mammalian development, homeostasis and disease. Recent ongoing studies that highlight the role of Hippo signaling in development, tumor suppression, and regeneration will be discussed.

Host: Yas Furuta Animal Resources and Genetic Engineering, CDB

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