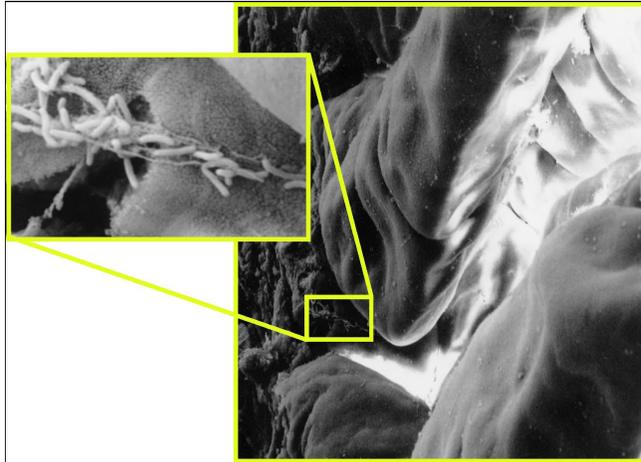




Study of the life cycle of pathogenic *Vibrio cholerae*



The success of *Vibrio cholerae* as a water-borne pathogen is dependent in part on its successful dissemination and transmission. However, the transition between aquatic environments and human GI tract is extremely stressful to *V. cholerae* and requires appropriate gene expression and phenotypic changes to promote survival and growth. Insight into these changes enhances our understanding of the biology of this pathogen and may aid vaccine development and environmental control measures. Using a variety of genetic methods and animal models, we find that gene expression during infection is dynamic, and that certain gene expression changes late in the infection of the small intestine serve to prepare *V. cholerae* for dissemination and transmission. We used a genetic selection to explore the signaling and gene regulation that is occurring during the late stage of infection, and through this, found a global regulator of dissemination genes.

Dr. Andrew Camilli

Tufts University

Host: Dr. Alan Davidson

Date: Monday September 30, 2013

Time: 4:00 p.m.

Place: FitzGerald Building
150 College Street
Room 103