

Chemical and Synthetic Biology Approaches to Protein Engineering and Proteomics

Presented by: **Alborz Mahdavi PhD**
Co-Founder and CEO of Protomer Technologies, Pasadena, CA

TUESDAY, FEBRUARY 20, 2018, 4:00–5:00 PM

WHERE: Research Conference Center, 734 Fairmount Avenue, Pasadena, CA 91105

ABOUT THE TALK:

Proteins mediate many essential functions in cells, and methods to profile cellular proteins are of great interest for biological discovery. The engineering of new proteins is important for development of new biologics. This talk will be an overview of artificial amino acids technology as a general platform for both tagging and engineering proteins. The first part of the talk will discuss new research tools that we have developed utilizing artificial amino acids for tracking and identifying proteins in cells and tissues. The second part of the talk will discuss Protomer's efforts to engineer new therapeutic proteins for applications in diabetes including a number of novel insulins. This talk will discuss some work done by Protomer's team on developing novel insulins.

LEARNING OBJECTIVES:

This talk will be an overview of artificial amino acids technology as a general platform for both tagging and engineering proteins. You can expect to develop an overview of how artificial amino acids are used for both in basic research as well as for engineering new biologics for human health applications.

AUDIENCE:

This talk can be attended by general audience, clinicians, basic science researchers as well as those interested in applied research and industry applications may find the material relevant and useful.



ABOUT THE SPEAKER:

Dr. Mahdavi is the co-founder and CEO of Protomer Technologies, a preclinical stage biotechnology company focusing on diabetes and metabolic disorders. He is the recipient of the Juvenile Diabetes Research Foundation international prize for developing novel insulins. Protomer's early success in this area led to major grants in diabetes research as well as a partnership with Sanofi. Protomer has been with HMRI from its early inception and has been fortunate to benefit from interactions with investigators at HMRI. Prior to starting Protomer, Dr. Mahdavi completed his PhD as a Rosen scholar at Caltech working with Prof. David Tirrell in chemistry. His doctoral research won the Caltech's Demetriades best PhD thesis prize, and he was recipient of the National Science and Engineering Research Council of Canada (NSERC) post-graduate scholarship. Dr. Mahdavi was the founding chair of the bioengineering lecture series at Caltech and he currently holds a guest position in the division of chemistry at Caltech. Prior to this Dr. Mahdavi was a member of Prof. Robert Langer's group at MIT, where he made novel tissue adhesive technologies which were licensed to a MIT spinout called Gecko Biomedical. Gecko Biomedical recently received approval of its first product in Europe and is on track for its clinical developments in the US.

