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From: Inform
Subject: EM: Keck Science Seminar Announcement

From: Yount, Velda

KECK SCIENCE DEPARTMENT SEMINAR

“Inhibiting BamA to Understand Outer Membrane Protein Folding”

**Steven Rutherford, Principal Scientist
Genentech
Department of Infectious Diseases**

Friday, September 30, 2022

12:15-1:15pm

Burns Lecture Hall (B31)

Keck Science Center

“Light refreshments will be served prior to seminar”

Abstract: The folding and insertion of integral β -barrel proteins into the outer membrane is critical for viability and pathogenesis in Gram-negative bacteria. The central component of the β -barrel assembly machine (BAM), BamA, is an essential outer membrane protein that interacts with four lipoproteins, BamBCDE. While genetic and structural information has provided a framework for understanding β -barrel protein folding, the fundamental mechanism by which BAM engages substrates and catalyzes folding is still unresolved. We have discovered novel BamA inhibitors and employed these antibacterial molecules to characterize outer membrane protein folding. Our structural and physiological studies provide novel insight into β -barrel protein folding and further validate BamA as a potential antibacterial target.

Keck Department

Seminar!

Inhibiting BamA to Understand Outer Membrane Protein Folding

Steven Rutherford

Genentech

**Principal Scientist, Department of Infectious
Diseases**



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Burns Auditorium
Keck Science Department**

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