

Emerson Center Lectureship Award Symposium

The Rise and Promise of Artificial Molecular Machines Based on the Mechanical Bond



October 16, 2018,
Oxford Road Building Presentation Room

AWARD WINNER &
KEYNOTE SPEAKER

Prof. Fraser Stoddart,
Northwestern University



The Rise and Promise of Artificial Molecular Machines Based on the Mechanical Bond

Stoddart-group's research interests lie beyond the chemistry of the molecule that has led to the template-directed synthesis (based on molecular recognition and self-assembly processes) of a wide range of mechanically interlocked molecules, bistable variants of which have found their way in the form of switches into molecular electronic devices and drug delivery systems. In terms of molecular structure, Stoddart-group's research straddles the size regime from the meso-molecular scale all the way up to the nano-scopic, microscopic and macroscopic levels: it includes fully synthetic polymers and metal-organic frameworks. Stoddart-group also embraces radical chemistry in both the supramolecular and mechano-stereochemical domains.



**Nobel-2016
Chemistry**

INVITED SPEAKERS

EVENTS SCHEDULE



Khalid Salaita
Department of
Chemistry,
Emory University

1:30 – 2:00

OPENING CEREMONY & AWARD PRESENTATION

2:00 – 3:00

**Fraser Stoddart: The Rise and Promise of
Artificial Molecular Machines Based on the Mechanical Bond**

3:00 – 4:00

**Khalid Salaita: Speedy DNA machines are on a roll:
synthetic motors that consume chemical energy to generate
mechanical work**



Nathaniel Rosi
Department of
Chemistry,
University of Pittsburgh

4:00 – 4:15

COFFEE BREAK

4:15 – 5:15

**Nathaniel Rosi: Leveraging molecular-level control
of peptide constructs to direct the synthesis, structure, and
properties of nanoparticle superstructures**



Craig L. Hill
Department of
Chemistry,
Emory University

5:15 – 6:15

**Craig Hill: Multicomponent, multifunctional
systems for solar energy conversion, decontamination and
purification**

**Go-
SPONSORS:**



6:15 – 6:30

CLOSING

6:30 – 9:00

DINNER (by invitation)

REGISTRATION:

CONTACT:

**DEPARTMENT OF CHEMISTRY
THE HIGHTOWER FOUNDATION;**

**Registration
is free.**

<http://www.emerson.emory.edu/conferences/form/register.html>

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