

# Grignard-Wittig Lecture

GDCh and SFC in collaboration with UniCat

Please note updates of events on [www.unicat.tu-berlin.de](http://www.unicat.tu-berlin.de)

Lecturer:

**Prof. Michel Che**, University Pierre et Marie Curie,  
Surface reactivity laboratory, Paris , France

Title:

**Bridging the gap between homo- and heterogeneous catalysis: solid oxides as supermolecular ligands**

Abstract:

After a short introduction highlighting the functioning of rhodium complexes in the homogeneous single-site hydroformylation of olefins and the 16 - 18 e- reactivity rule, the gap between homo- and heterogeneous catalysis will be identified. Supported catalysts are generally prepared by deposition of transition metal complexes (TMC, precursors of the catalytically active phase) in aqueous solutions on solid oxides of large surface area. It will be shown that it is possible, thanks to the careful design of the coordination sphere of the TMC, to show that the solid oxide is a weak sigma donor - pi donor mono-, bi- or tridentate supermolecular ligand, which can be introduced in the spectrochemical series of molecular ligands. A spectrochemical series of oxide supports can even be proposed in the context of interfacial coordination chemistry.

Please find more on Prof. Michel Che on

<http://www.rsc.org/ScienceAndTechnology/Awards/CentenaryPrizes/CurrentWinner1.asp>

[http://versita.com/m\\_che](http://versita.com/m_che)

[http://www.ae-info.org/ae/User/Che\\_Michel](http://www.ae-info.org/ae/User/Che_Michel)

Date:

**Wednesday, February 8, 2012**

Time:

**5:15 pm - around 6:45 pm**

Location:

**TU Berlin,  
Institute of Chemistry,  
Straße des 17. Juni 115,  
10623 Berlin  
Building C,  
Lecture Hall C 264**

Organiser:

**Prof. Joachim Sauer (HUB)**

Coffee and tea will be served thirty minutes prior to the lecture start.

**Guests are cordially invited to attend!**

Prof. Dr. Matthias Driess, Chair of the Cluster of Excellence UniCat