Julius-Maximilians-
UNIVERSITÄT
WÜRZBURG

Kolloquium der Physikalischen und Theoretischen Chemie

Dienstag, 07.02.2012 **Hörsaal D, Chemie Zentralbau, 17:15 Uhr**

Sprecher: Gregor Jung
Universität des Saarlandes

Thema: Proton Transfer Reactions in ultrasensitive fluorescence spectroscopy

Abstract:

Although single-molecule detection by means of fluorescence is state-of-the-art for more than two decades, its application to chemical reaction is hardly performed, most likely due to the lacking availability of appropriate fluorescent dyes. The few yet performed experiments show already that single-molecule chemistry has the potential to map the potential energy surfaces (PES) of chemical transformations in condensed phase.
However, finer structures of the PES are blurred due to the limited time resolution of single-molecule experiments. To overcome this limitation in an example, we modify molecules for excited-state proton transfer (ESPT) like the paradigmatic molecule pyranine. Photophysical properties of novel photoacids found by solvatochromism and spectroscopic investigations will be presented and discussed with respect to our long-term aim.

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Weitere Informationen unter
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