Orbitals reactivity and mechanisms

ECTS
3 crédits

Composante
UFR Chimie, UFR des Sciences fondamentales et biomédicales

Volume horaire
24h

Période de l'année
Semestre 2

En bref

- **Langue(s) d'enseignement:** English
- **Forme d'enseignement :** Cours TD
- **Ouvert aux étudiants en échange:** Non

Présentation

DESCRIPTION

The first part of this course gives a brief presentation of molecular orbital theory (Hückel for conjugated p-systems)

then addresses pericyclic reactions and different methods (Dewar-Zimmermann, Woodward-Hofmann rules and Fukui's method)

used to rationalize many aspects of these reactions. The second part is dedicated to stereoelectronic effects and their importance

in explaining the molecular shape, conformation, stability, reactivity and selectivity. The last part addresses the reaction mechanism

determination aiming to prepare you to (1) elucidate the mechanism of chemical reactions based on kinetic and thermodynamic principles and collected data, and (2) be able to evaluate mechanistic arguments made in the literature.

HEURES D'ENSEIGNEMENT

Orbitals reactivity and mechanisms	Cours Magistral	12h
Orbitals reactivity and mechanisms	Travaux Dirigés	12h

PRÉ-REQUIS NÉCESSAIRES

Prior organic courses in years 1-3, in particular year 3 courses of organic chemistry and physical

chemistry

En bref

CONTACTS

Responsable pédagogique
Hamid Dhimane
hamid.dhimane@u-paris.fr

Pour en savoir plus, rendez-vous sur > u-paris.fr/choisir-sa-formation

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