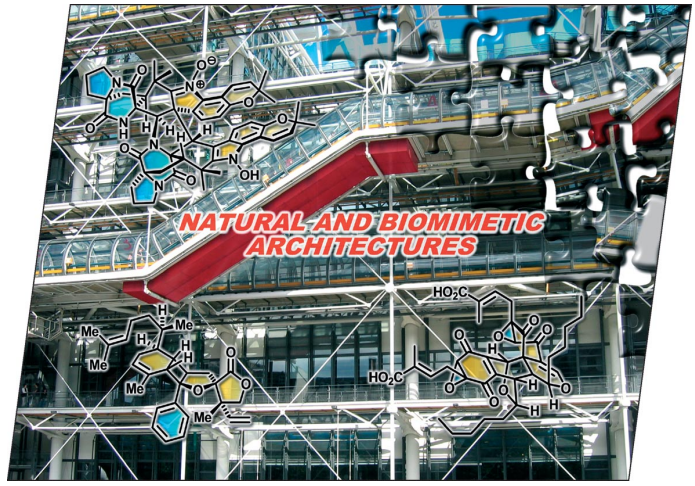
CONTENTS

COVER PICTURE

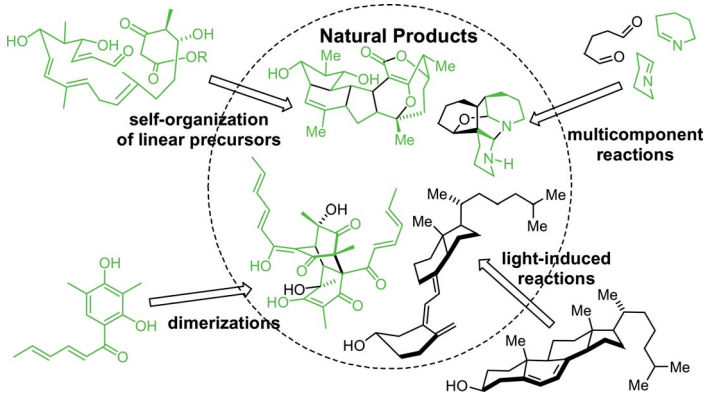
The cover picture shows three representative structures of complex natural products. They exemplify the main topic discussed in the Microreview by E. Gravel and E. Poupon on p. 27 ff: To what extent can natural substances be assembled spontaneously in nature? The modular architecture of the Pompidou Centre for modern art and creation in Paris has been chosen as a background. Indeed, this masterpiece of architectural design has obvious references to the complexity of living systems.



MICROREVIEW

Biomimetic Chemistry

Keywords: Natural products / Biogenesis / Biomimetic synthesis / Molecular complexity / Molecular diversity

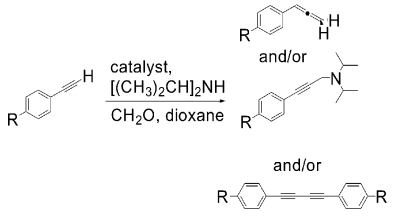


In some cases, complex structures of natural products can be generated with surprising spontaneity, through self-construction mechanisms. Rearrangements of linear molecules, light-induced reactions, dimerizations and multi-component reactions can explain the formation of secondary metabolites through the intrinsic reactivity of their precursors.

SHORT COMMUNICATIONS

Allenes from Arylacetylenes

Keywords: Allene / Homologation / Mannich reaction / Copper(I) catalyst / Alkyne dimerization



The effect of varying the anionic component of a copper(I) catalyst in the homologation of terminal arylacetylenes to allenes by the Mannich reaction was investigated. Varying amounts of allenes, Mannich bases and dimers were obtained depending on the nature of the anionic component of the copper catalyst.

