

Editors' Choice

This week the ChemInform editors have been strongly impressed by the following remarkable study:

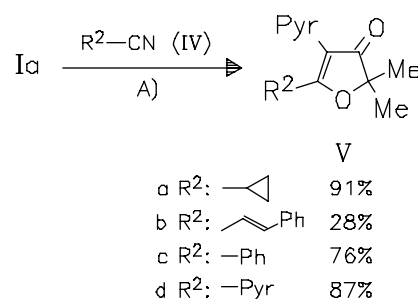
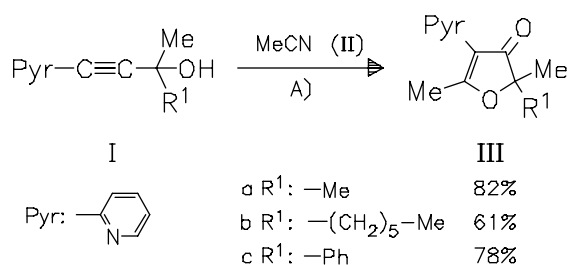
Furan derivatives

R 0060

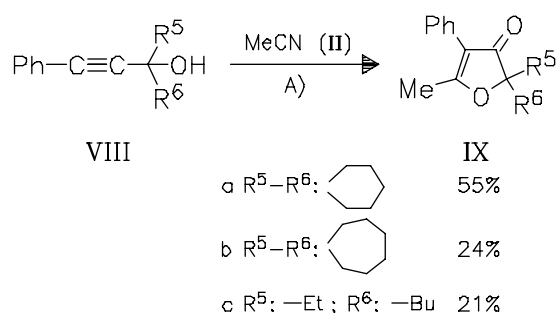
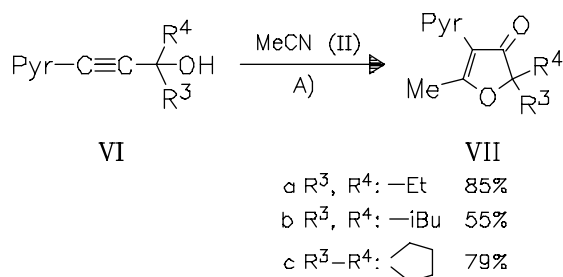
DOI: 10.1002/chin.201208128

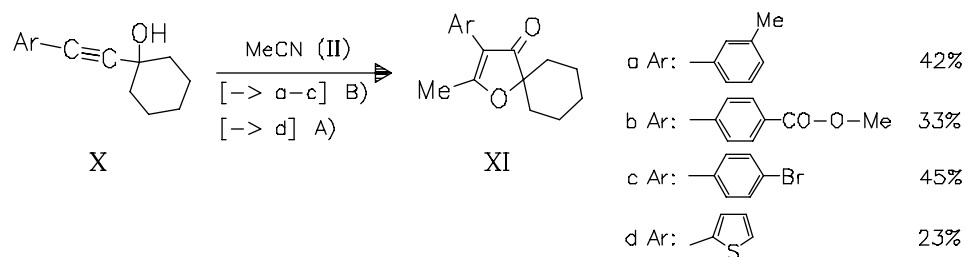
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Carbon Dioxide Triggered and Copper-Catalyzed Domino Reaction: Efficient Construction of Highly Substituted 3(2H)-Furanones from Nitriles and Propargylic Alcohols. — The reaction is triggered by cycloaddition of CO₂, where one of the oxygens is incorporated into the furanone structure. Internal alkynes bearing an alkyl instead of an aryl residue or a terminal alkyne moiety do not react but lead to decomposition. — (QI, C.; JIANG*, H.; HUANG, L.; YUAN, G.; REN, Y.; Org. Lett. 13 (2011) 20, 5520-5523, <http://dx.doi.org/10.1021/ol202241r>; Sch. Chem. Chem. Eng., South China Univ. Technol., Guangzhou, Guangdong 510640, Peop. Rep. China; Eng.) — H. Simon



A): 2 MPa CO₂, 2 equiv. H₂O, 0.5 equiv. DBU, 20 mol% CuI (cat.), neat, 70°C, [24 h]





B): 6 MPa CO₂, 2 equiv. H₂O, 0.5 equiv. DBU, 20 mol% CuI (cat.), neat, 100°C, [24 h]

