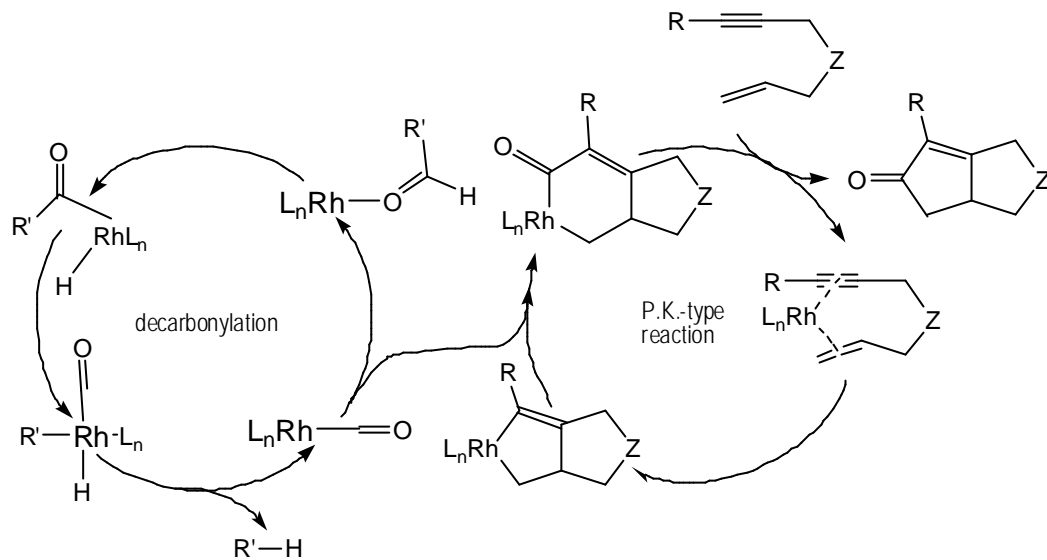


4. Multimetallkatalysatoren in der Organischen Chemie (1)

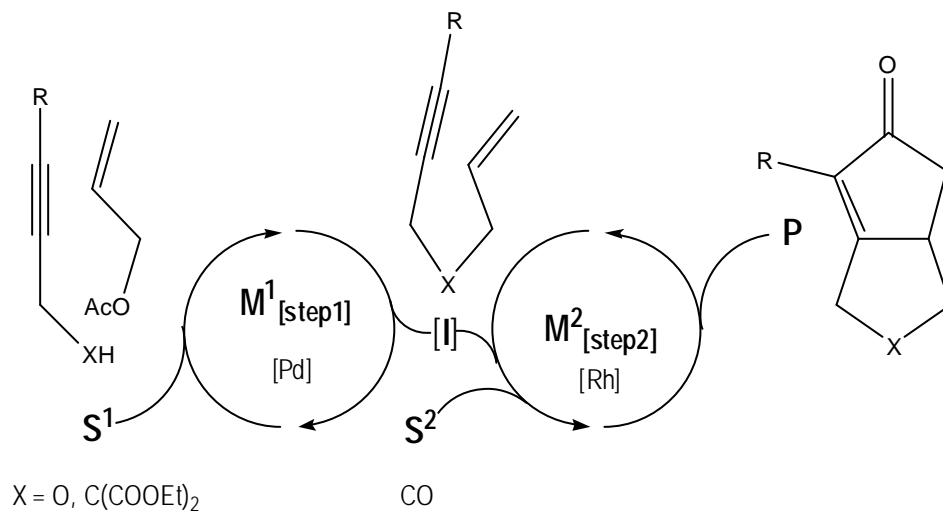
Kreuzkupplungen

(7) Pauson-Khand-Reaktion, kat. Varianten



[T. Shibata, *Org. Lett.* **2002**, 4, 1619-21]

Tandemreaktion:



[N. Jeong, *J. Am. Chem. Soc.* **2000**, 122, 10220-1]