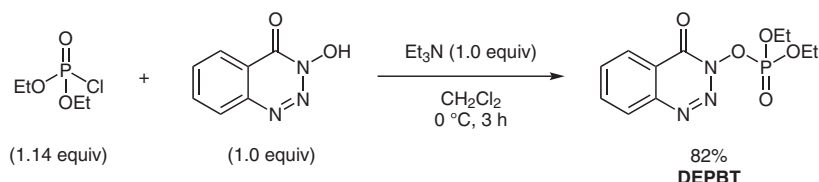


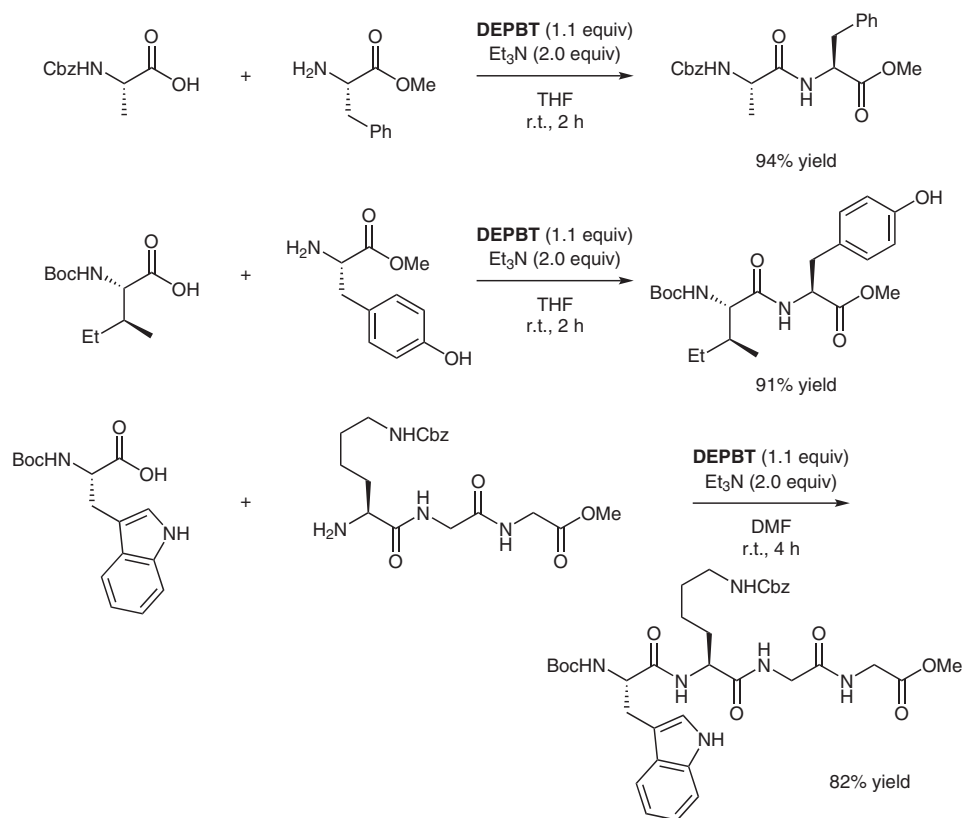
H. LI, X. JIANG, Y.-H. YE, C. FAN, T. ROMOFF, M. GOODMAN* (UNIVERSITY OF CALIFORNIA AT SAN DIEGO, USA AND PEKING UNIVERSITY, BEIJING, P. R. OF CHINA)
3-(Diethoxyphosphoryloxy)-1,2,3-benzotriazin-4(3H)-one (DEPBT): A New Coupling Reagent with Remarkable Resistance to Racemization
Org. Lett. **1999**, *1*, 91–93, DOI: 10.1021/ol990573k.

Phosphate-Reagent-Mediated Peptide Coupling Reactions

Preparation of the coupling reagent:



Selected examples for peptide coupling reactions:



Significance: Peptide coupling reagents are extremely important in peptide synthesis. In 1999, Goodman and co-workers reported the development of the phosphate reagent 3-(diethoxyphosphoryloxy)-1,2,3-benzotriazin-4(3H)-one (DEPBT) as a coupling reagent that can be easily prepared from diethyl chloridophosphate and 3-hydroxy-1,2,3-benzotriazin-4(3H)-one.

Comment: By using DEPBT as a coupling reagent, various peptides can be synthesized in excellent yields.

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