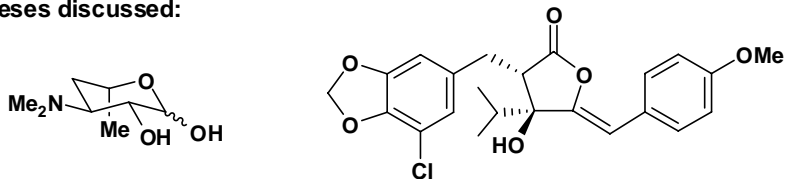


Statistics for *J. Org. Chem.* 1984, Volume 49, Issues 1-26:

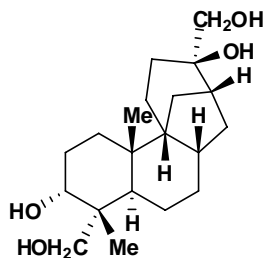
- 1313 Papers
- 14 Herbert C. Brown
- 8 Albert Padwa
- 8 Leo A. Paquette
- 7 Dale L. Boger
- 7 George A. Olah
- ...
- 4 Samuel J. Danishefsky
- 1 Elias J. Corey

Syntheses discussed:

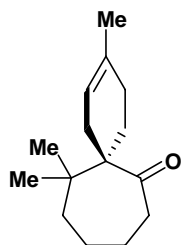


5-*epi*-Desosamine

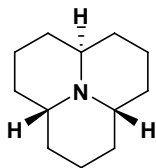
Cyanobacterin



(±)-Aphidicolin

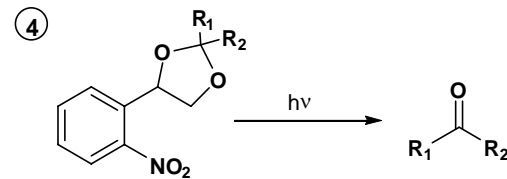
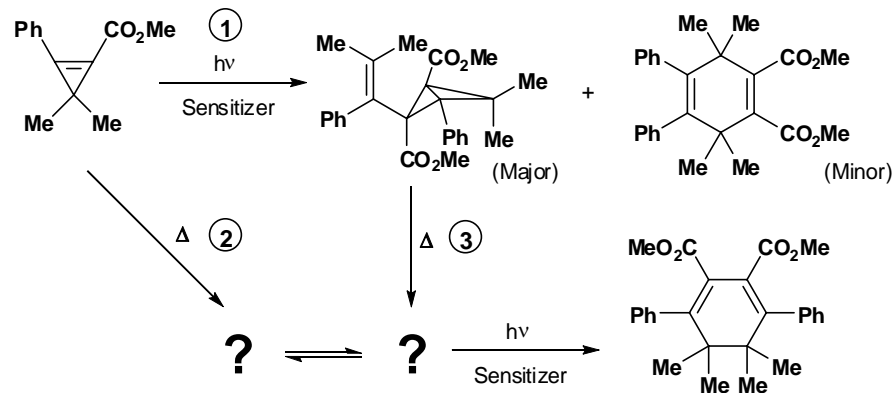


(±)-β-Chamigrene

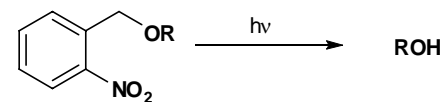


Perhydropyrido[2,1,6-*de*]quinolizines

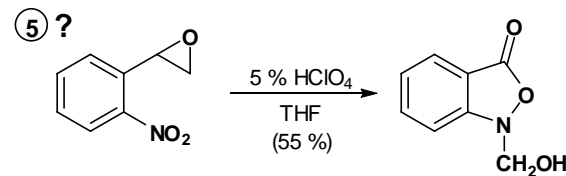
Problems of the Day:



Alternatively:



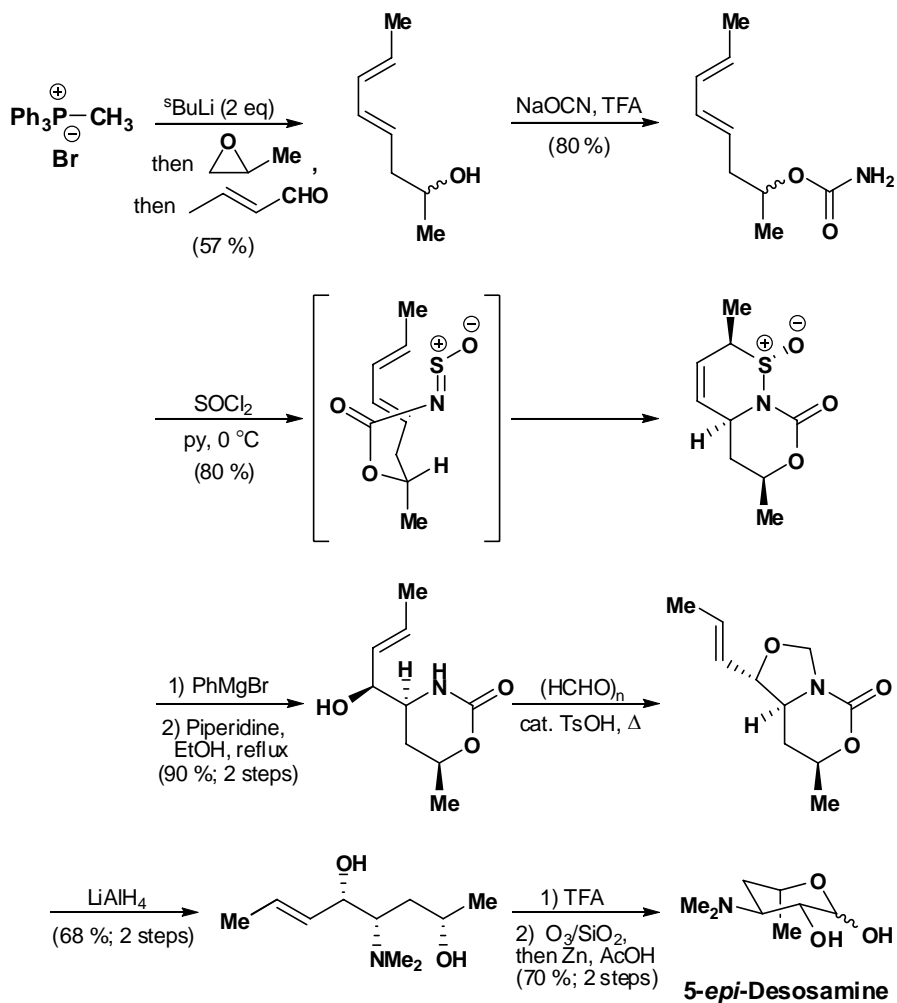
Mechanism and side product?



(Disclaimer: The proposed mechanism is neither discussed in the paper nor in the references, and thus the answer given is merely an opinion/suggestion.)

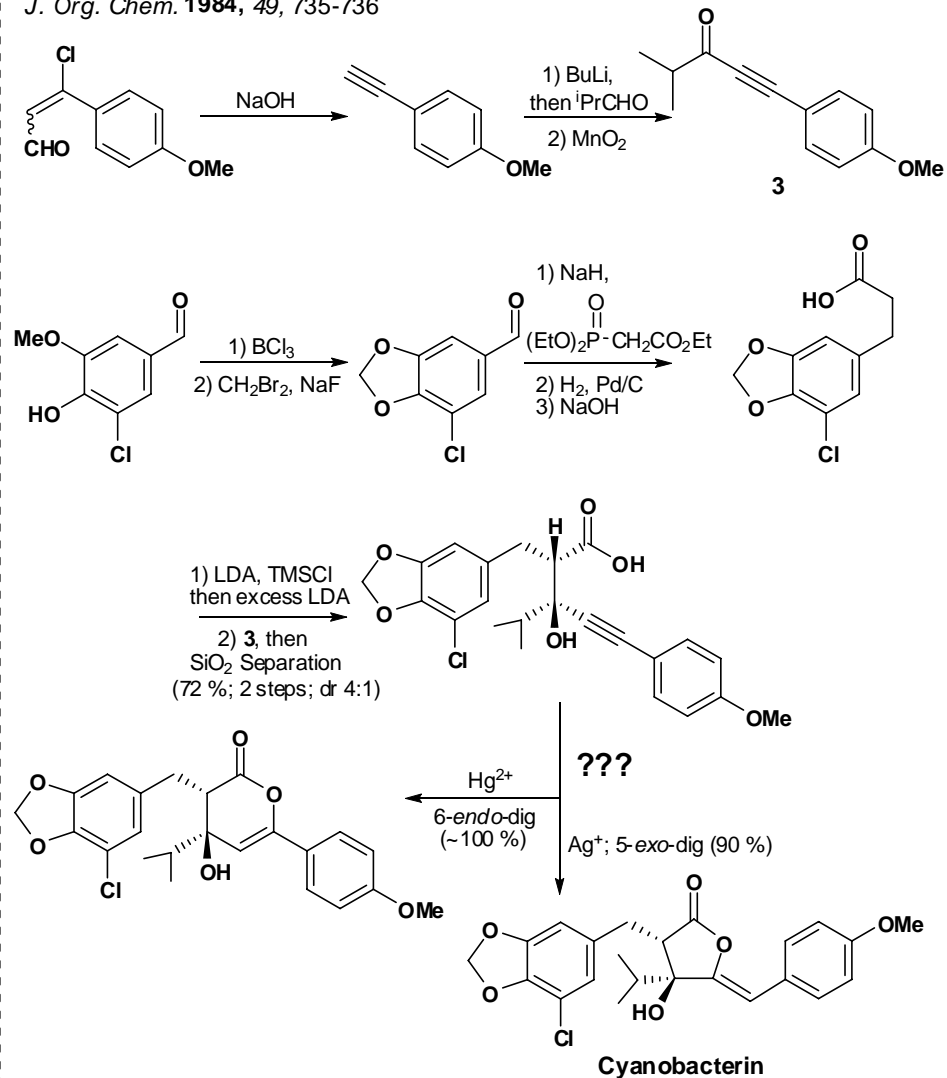
Synthesis of 5-*epi*-Desosamine via a Stereoselective Intramolecular *N*-Sulfinyl Diels-Alder Cycloaddition

S. W. Remiszewski, R. R. Whittle and S. M. Weinreb*
J. Org. Chem. **1984**, *49*, 3243-3244



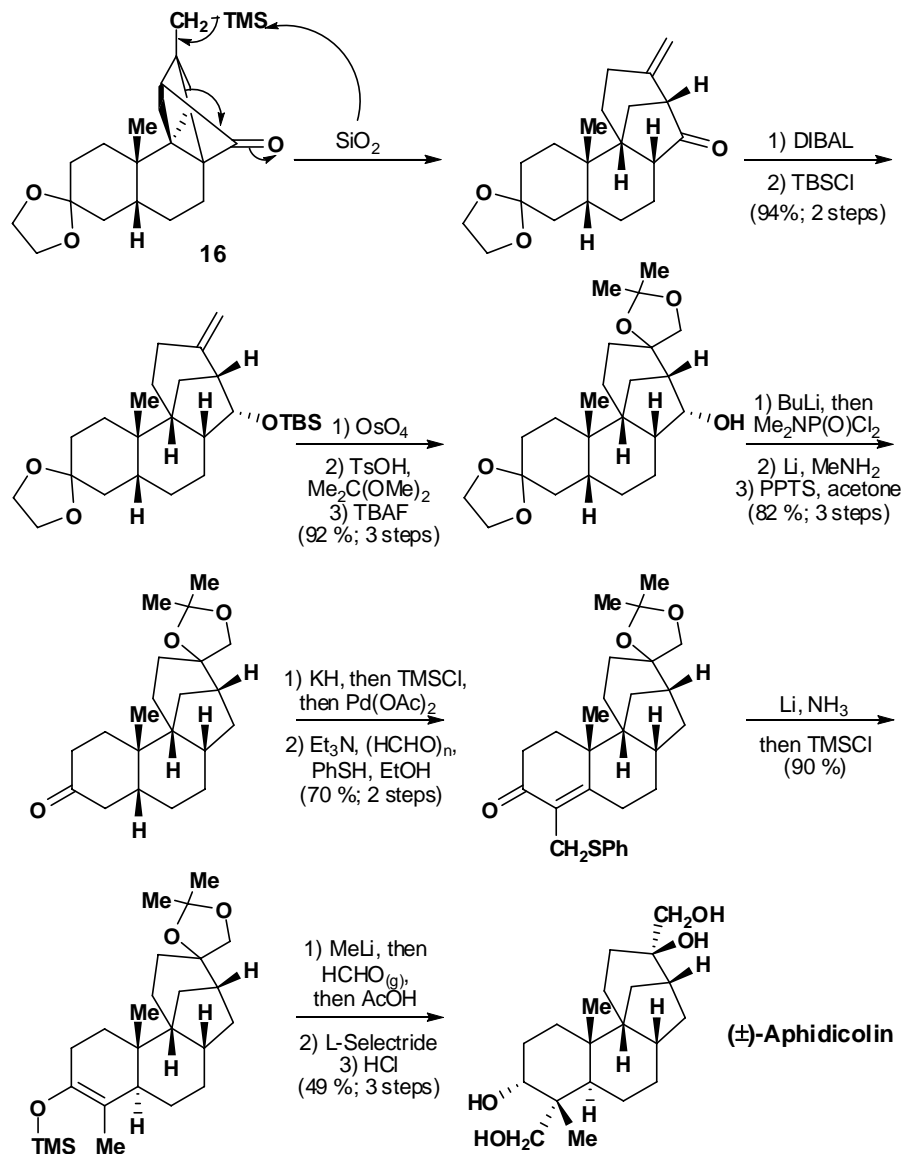
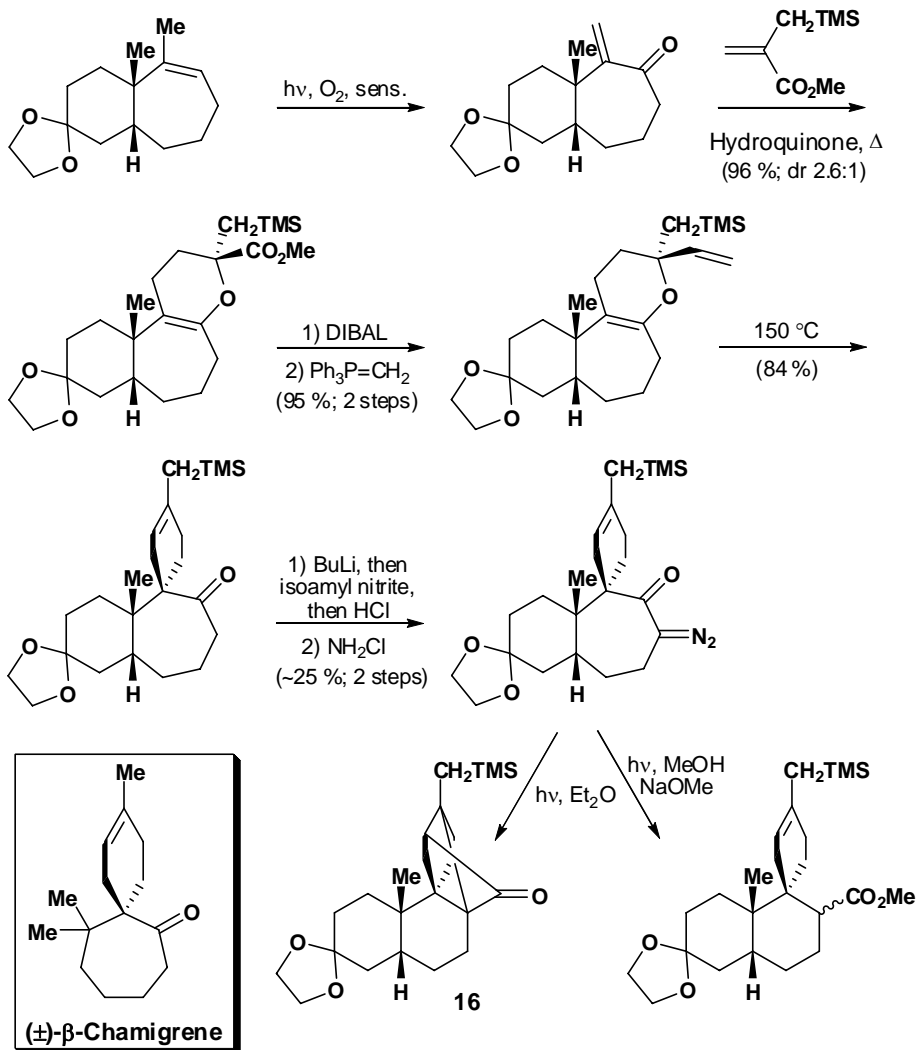
Total Synthesis and X-Ray Structure Determination of Cyanobacterin

T. -T. Jong, P. G. Williard* and J. P. Porwoll
J. Org. Chem. **1984**, *49*, 735-736



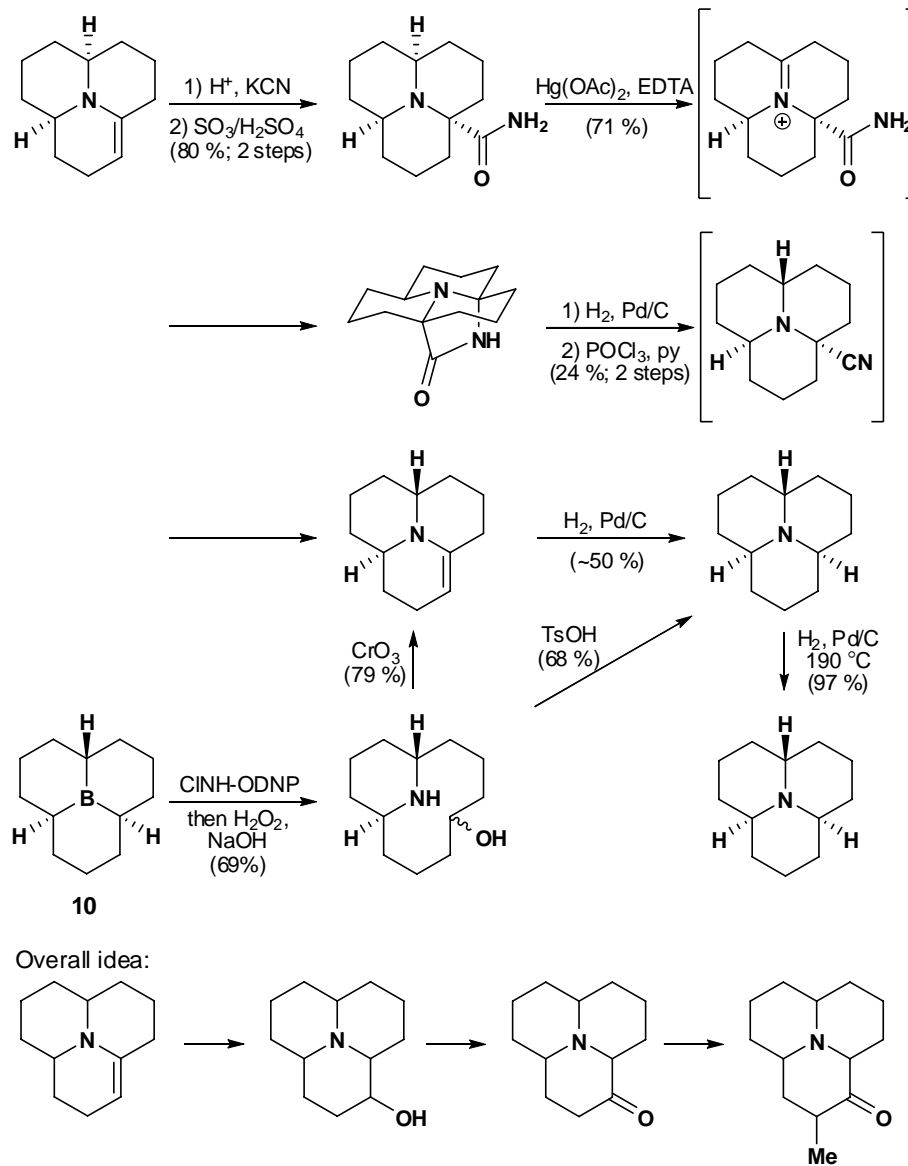
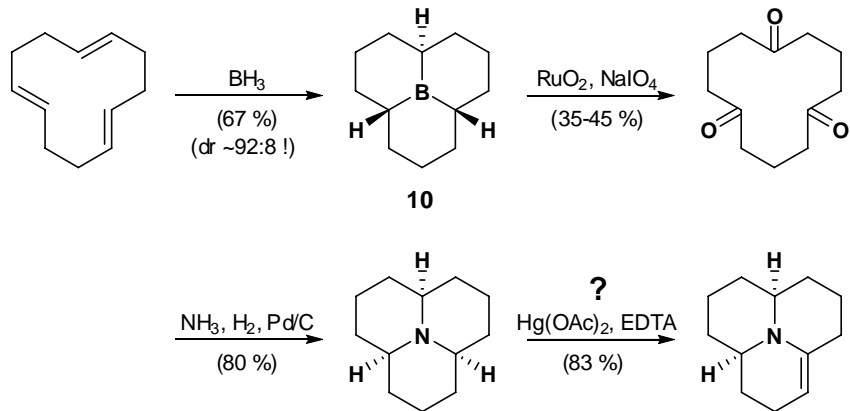
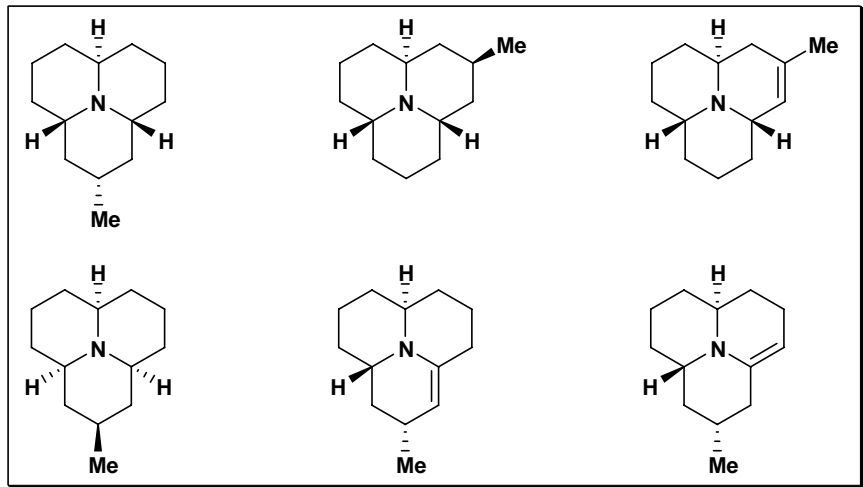
Total Synthesis of (±)-Aphidicolin and (±)-β-Chamigrene

R. E. Ireland,* W. C. Dow, J. D. Godfrey and S. Thaisrivongs
J. Org. Chem. **1984**, *49*, 1001-1013



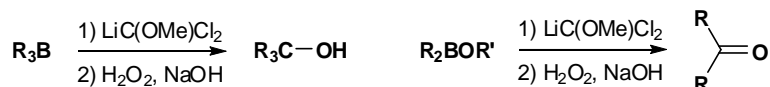
Stereo- and Regioselective Total Synthesis of the Hydropyrido[2,1-*d*]quino-
lizine Ladybug Defensive Alkaloids

R. H. Mueller,* M. E. Thompson, R. M. DiPardo
J. Org. Chem. **1984**, *49*, 2217-2231



Herbert C. Brown (Purdue U.)

1) One-carbon extension into a carboxylic acid: *J. Org. Chem.* **1984**, *49*, 892-898



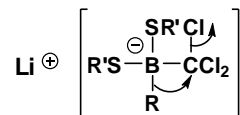
J. Am. Chem. Soc. **1971**, *93*, 2070-2071 *J. Am. Chem. Soc.* **1975**, *95*, 6876-6877

Analogous reaction was unsuccessful with *bis*-boronic esters:

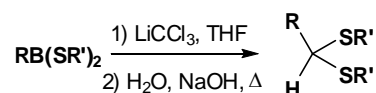


Does not form

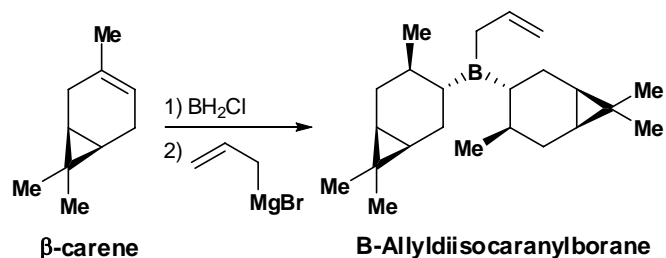
via a boron-ate complex:



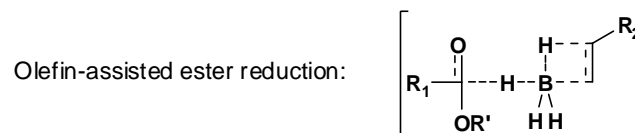
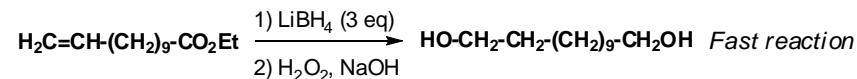
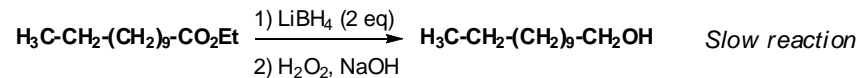
Also:



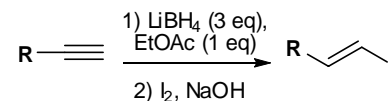
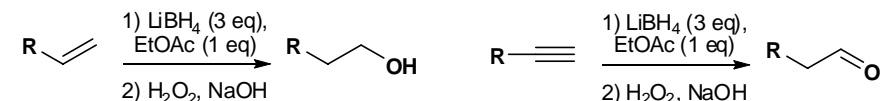
2) Enantioselective allylation: *J. Org. Chem.* **1984**, *49*, 4089-4091



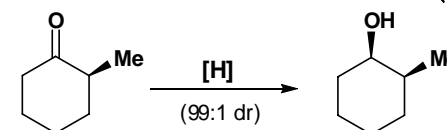
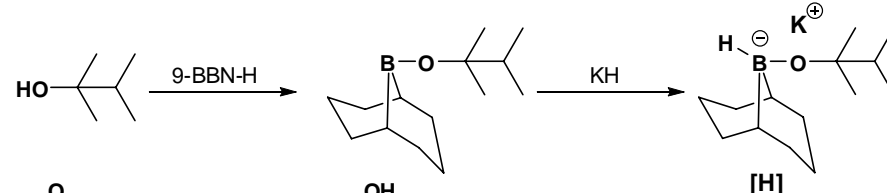
3) LiBH_4 reduction of olefins in the presence of esters: *J. Org. Chem.* **1984**, *49*, 3891-3898; 4822-4827



Deliberately add an ester to reduce olefins:



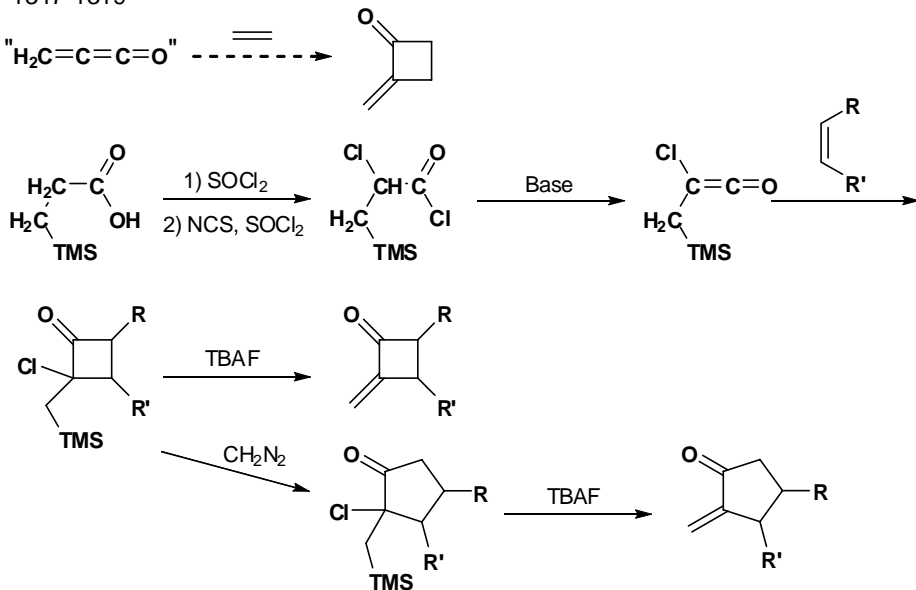
4) Stereoselective cyclic ketone reductions: *J. Org. Chem.* **1984**, *49*, 2073-2074



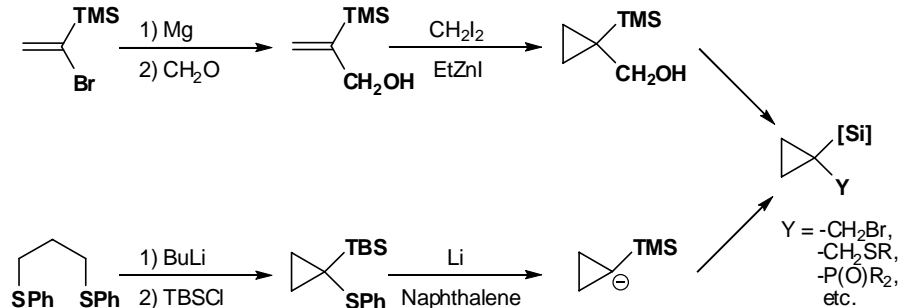
Often better selectivities than Selectrides!

Leo A. Paquette (Ohio State U.)

1) Methylene ketene equivalents in [2+2] cycloadditions: *J. Org. Chem.* **1984**, *49*, 1317-1319

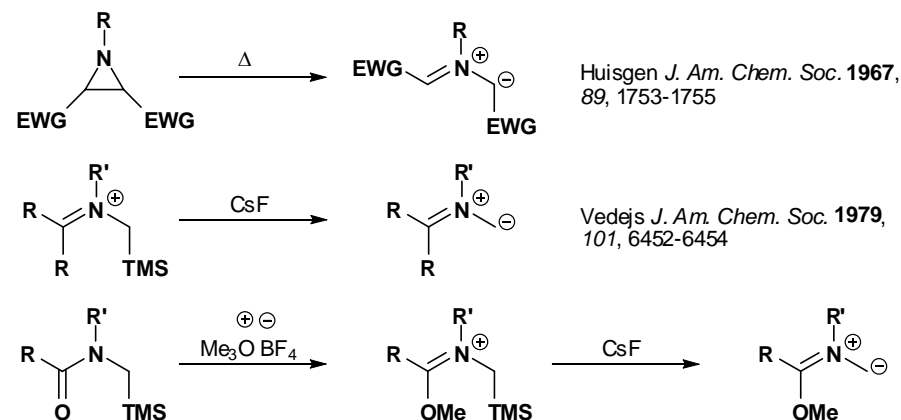


2) Trimethylsilyl cyclopropanes in synthesis: *J. Org. Chem.* **1984**, *49*, 3604-3609; 3610-3617; 3618-3621



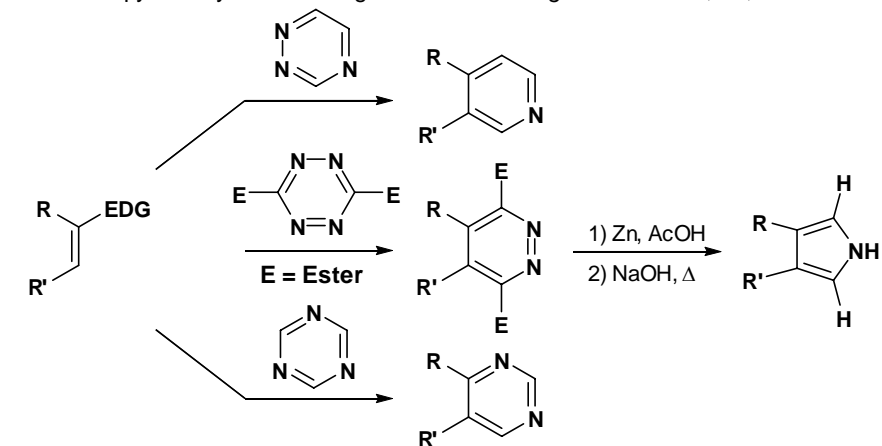
Albert Padwa (Emory U.)

Generation of azomethine ylides from amides: *J. Org. Chem.* **1984**, *49*, 3314-3322



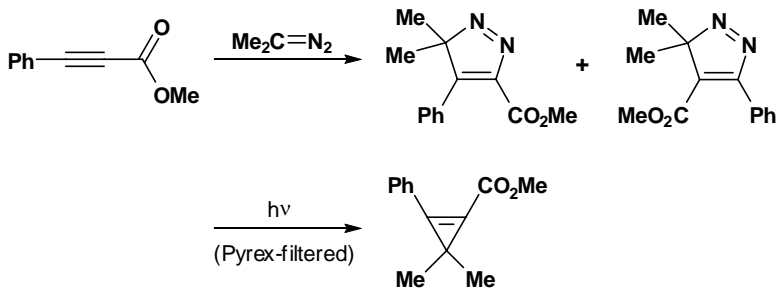
Dale L. Boger (U. of Kansas)

Studies in pyrrole synthesis using tetrazines: *J. Org. Chem.* **1984**, *49*, 4405-4409

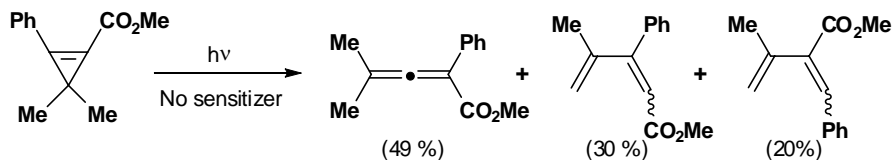


Cycloaddition Reactions of Strained Ring Systems. Photochemistry of 1-Phenyl-2-carbomethoxy-3,3-dimethylcyclopropene

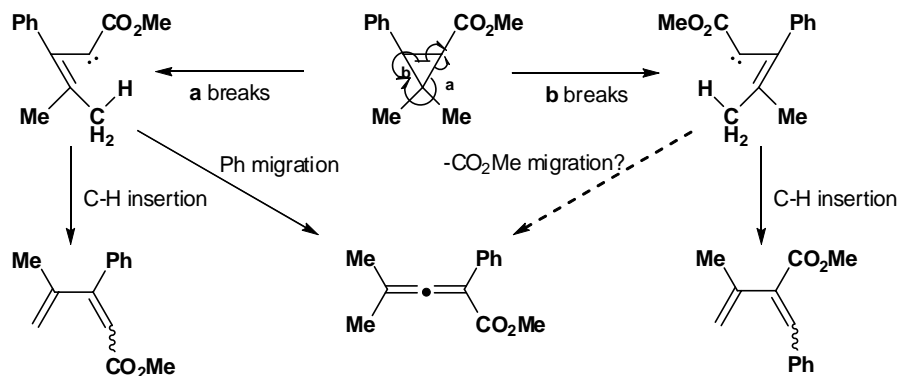
A. Padwa* and G. D. Kennedy
J. Org. Chem. **1984**, *49*, 4344-4352



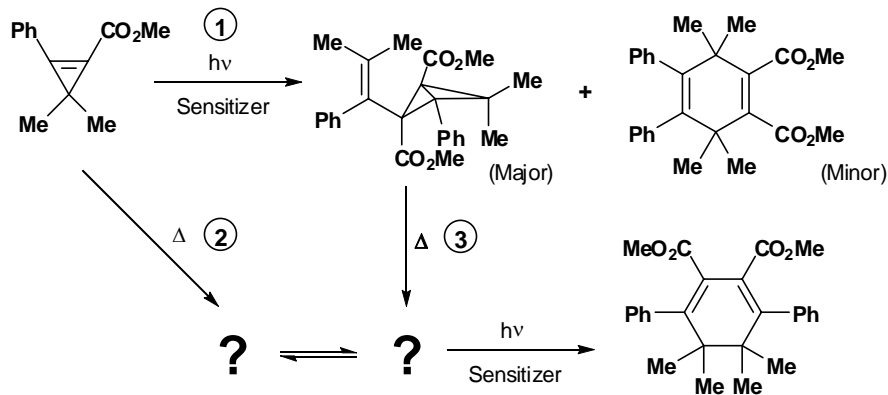
Electronically excited singlet state generation via direct photolysis:



Mechanism: Excited singlet, generates a vinyl carbene

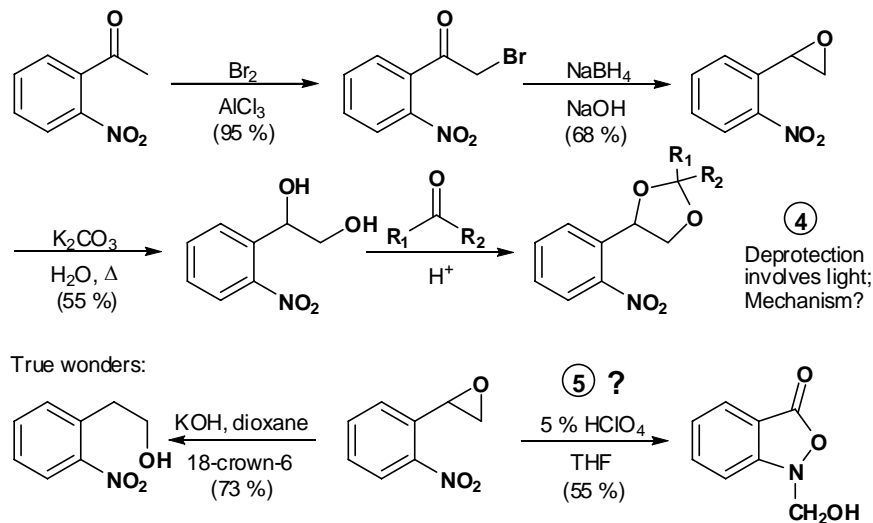


Electronically excited triplet state generation via sensitized photolysis:



Antibacterial Benzisoxazolones. An Unusual Rearrangement Product from *o*-Nitrostyrene Oxide en Route to the Photolabile Carbonyl Protecting Group (*o*-Nitrophenyl)ethylene glycol

W. Wierenga,* A. W. Harrison, B. R. Evans and C. G. Chidester
J. Org. Chem. **1984**, *49*, 438-442



True wonders:

