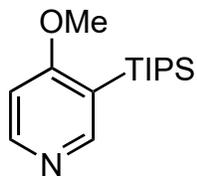


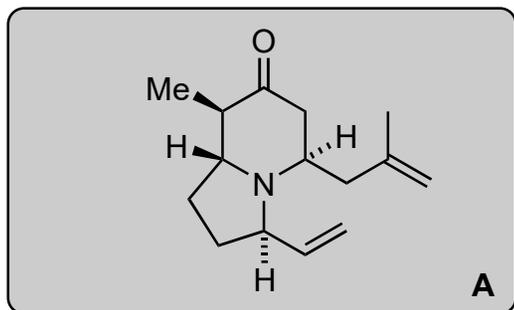
Concise Total Synthesis of the Frog Alkaloid (-)-205 B

Tsukanov, S. V.; Comins, D. L.

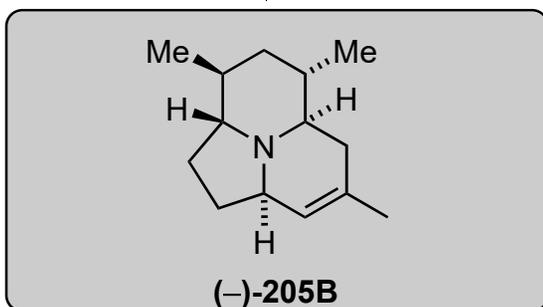
Angew. Chem. Int. Ed. **2011**, 50, 8626. DOI: 10.1002/anie.201103596



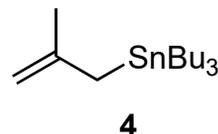
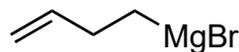
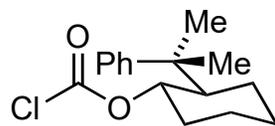
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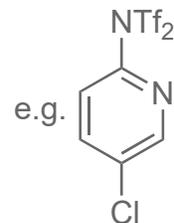
7-11



- 1) **1** then **2** then HCl
- 2) NaOMe, MeOH then HCl
- 3) **3**, Grubbs II
- 4) $[\text{Pd}_2(\text{dba})_3]$, $\text{P}(\text{tBu})_3$, Cs_2CO_3 , 75 °C
- 5) LDA, MeI then LDA
- 6) **4**, TFAA



- 7) Grubbs II
- 8) NaHMDS, HMPA, MeI
- 9) Li, NH_3 , isoamyl alcohol
- 10) thiocarbonyldiimidazole, DMAP
- 11) AIBN, HSnBu_3 , PhSeSePh



0) Draw a reagent developed by Comins

- 1) HINT: HCl promotes one step
- 2) What are the two roles of HCl?

- 4) Name of reaction? Tsuji-Trost
- 5) HINT: additional LDA improves d.r.

9) Name a few reasons these conditions might have been chosen.

11) What is the role of PhSeSePh ?

9: Hindered carbonyl resistant to condensation; product alcohol prone to elimination; avoid epimerization.
11: React with HSnBu_3 to generate more reactive HSePh , accelerating trapping of alkyl radical intermediate.