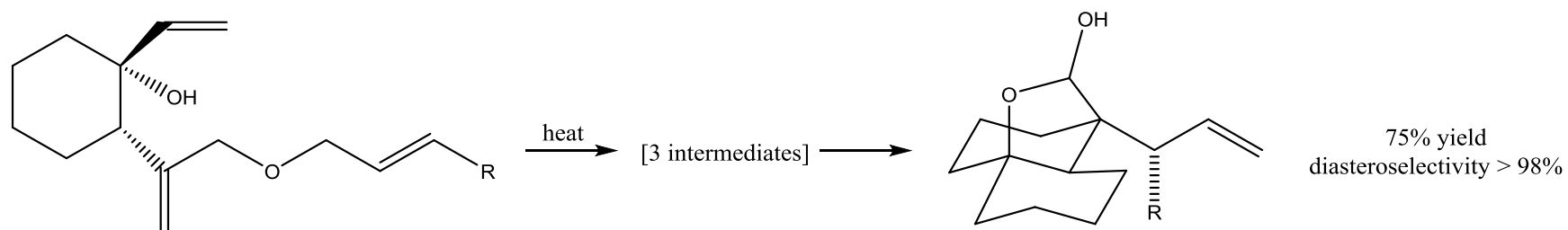
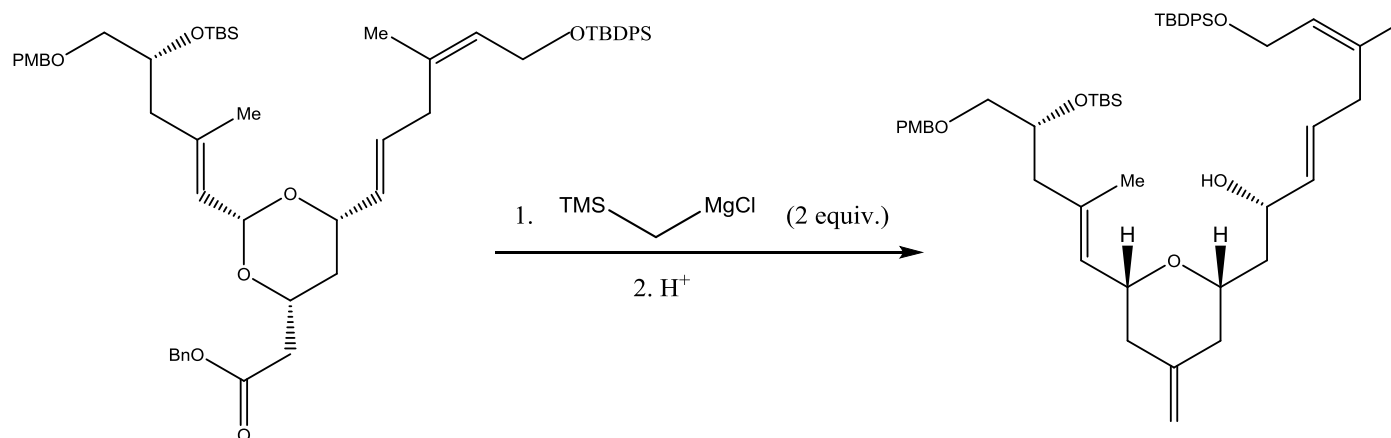


## Exercise 10

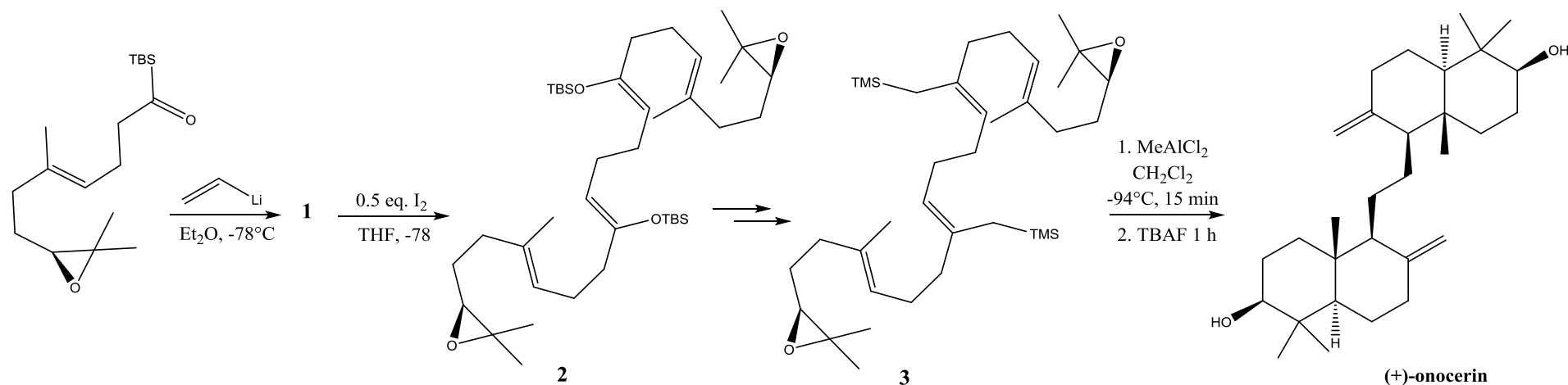
**E1.** Provide a mechanism for this cascade reaction. Take care of three dimensional structures and transition state representation. Denissova, I. *Organic Lett.* **2002**, *4*, 1371



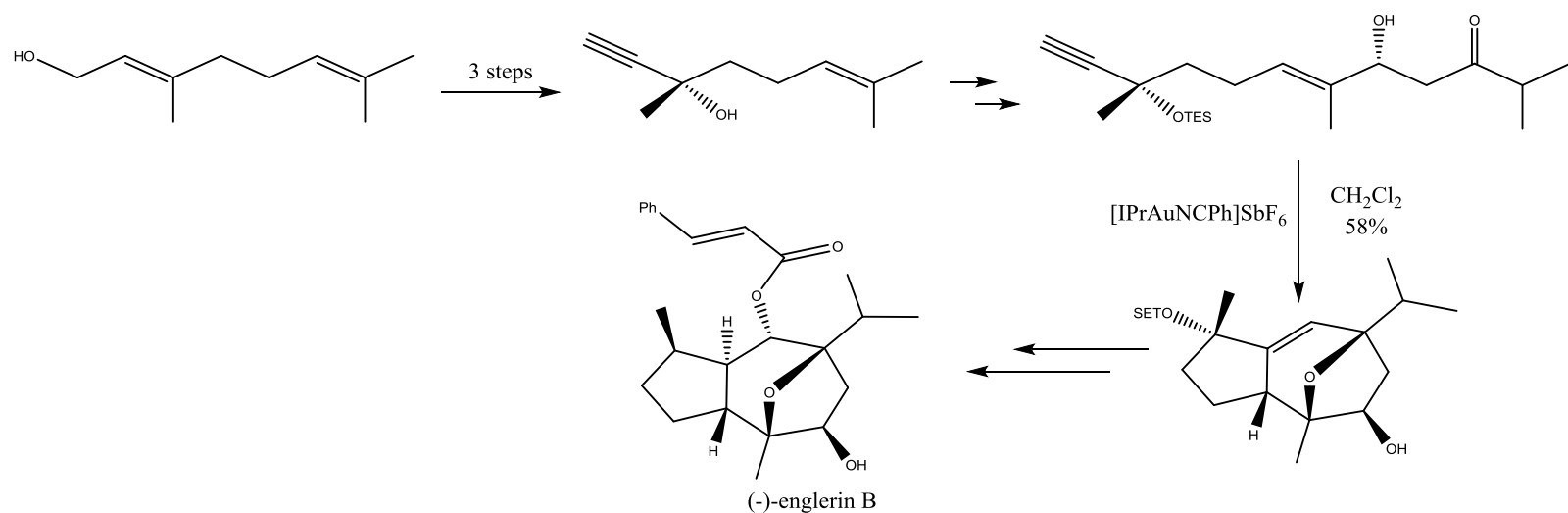
**E2.** Provide a mechanism which rationalizes the observed stereochemistry. Floreancig, P, E. *Angew. Chem.* **2005**, *44*, 3485



**E3.** The first two step sequence was proposed to proceed via unisolated anion "1". Propose a mechanism until 2 and a mechanism from 3 to onocerin. Corey. *J. Am. Chem. Soc.* **2002**, *124*, 11290



**E4.** Propose a synthetic way to obtain the alkyne in 3 steps, then, propose mechanism for the gold(I) reaction. Molawi, K; Echavarren, A, M; *Angew. Chem. Int. Ed.* **2010**, *49*, 3517



**E5.** Provide a mechanism of this Pd(0)-catalyzed intramolecular reaction of allylic acetates with allenic moiety.

Yamamoto, K; Doi, Takayuki; *J. Org. Chem.* **1996**, *61*, 2602.

