

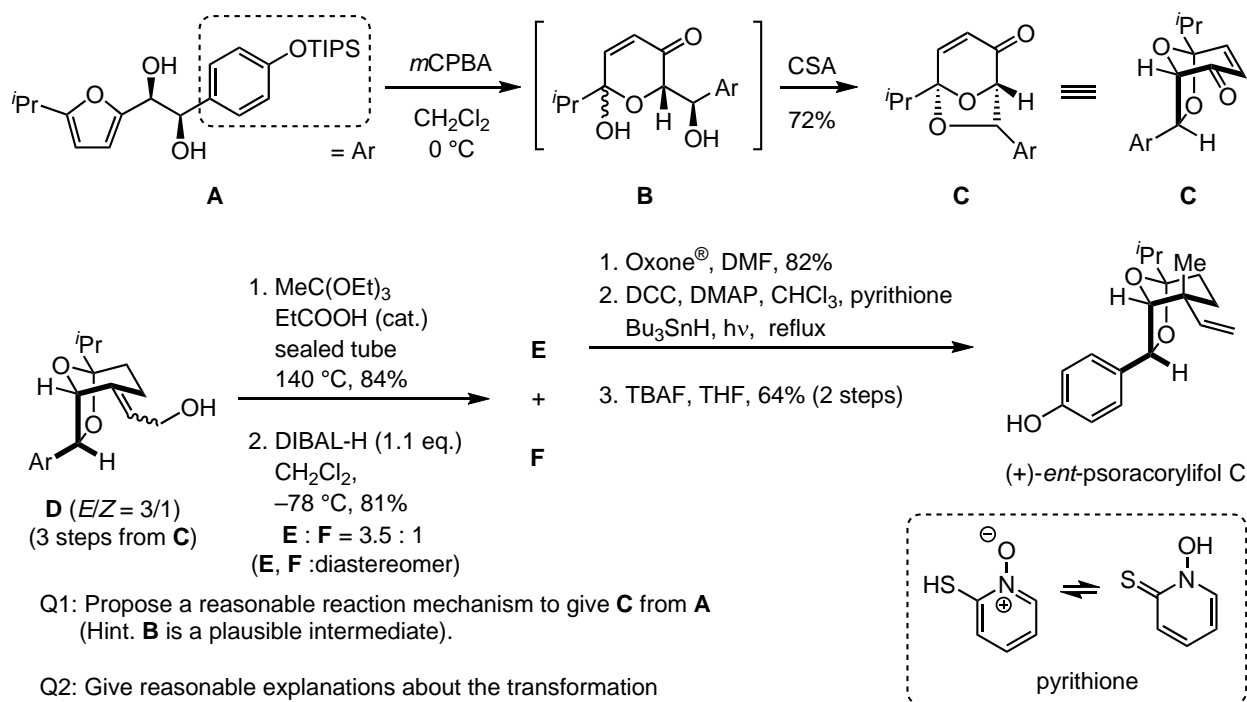
(S)-Taniguchi lactone

Q1: Propose a scalable enantioselective route to (S)-Taniguchi lactone.

Q2: Propose an enantioselective route to (S)-Taniguchi lactone starting from (E)-2-butene-1,4-diol.

Kieseritzky, F.; Wang, Y.; Axelson, M.

Org. Process Res. Dev. 2014, **18**, 643



Q1: Propose a reasonable reaction mechanism to give **C** from **A** (Hint. **B** is a plausible intermediate).

Q2: Give reasonable explanations about the transformation from **D** to (+)-*ent*-psoracorylifol **C**.