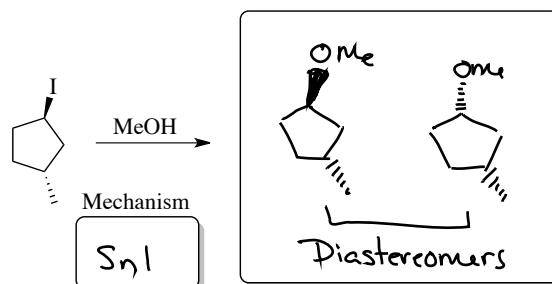
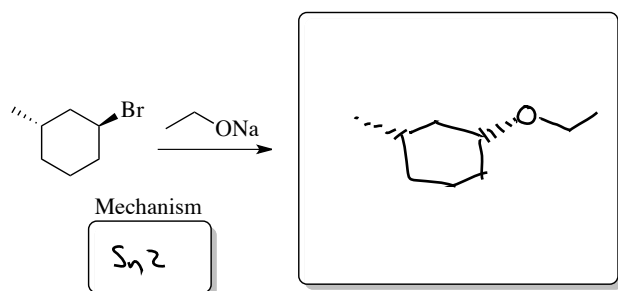
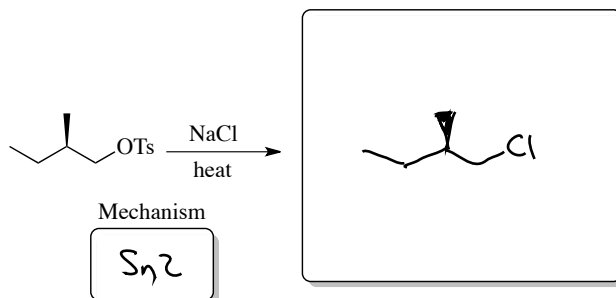
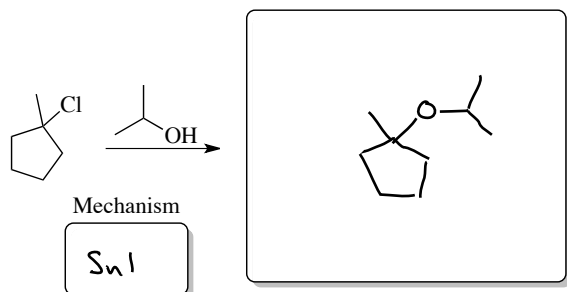
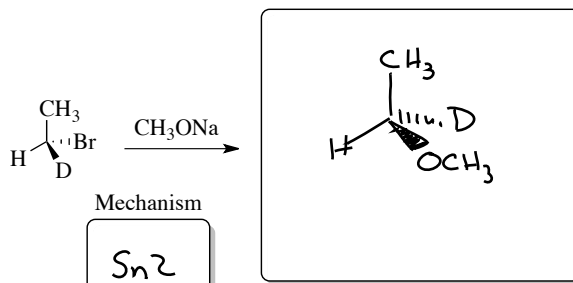
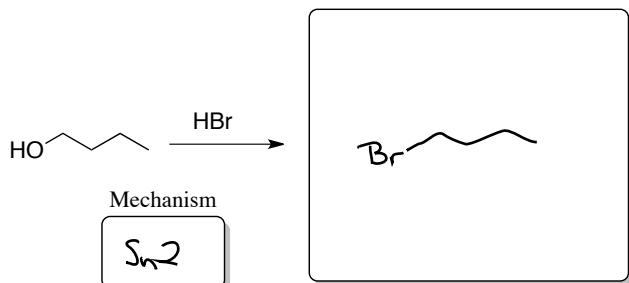
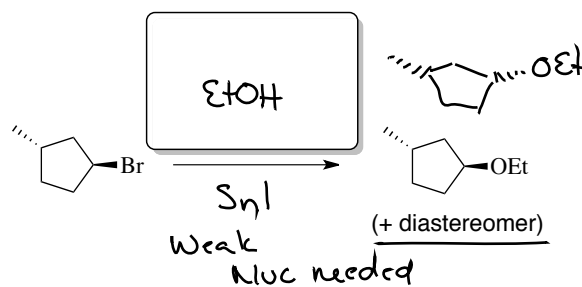
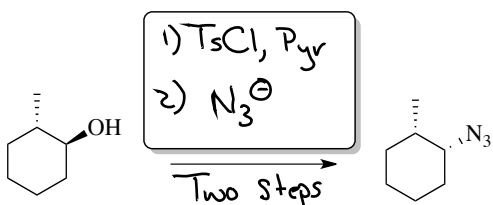
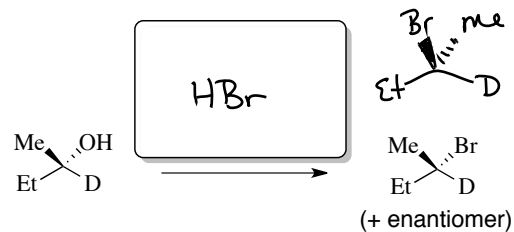
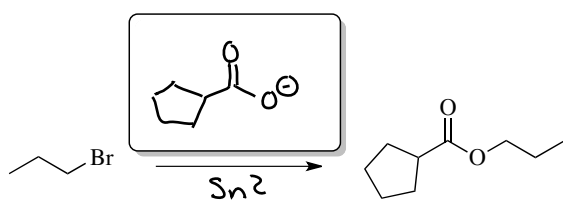


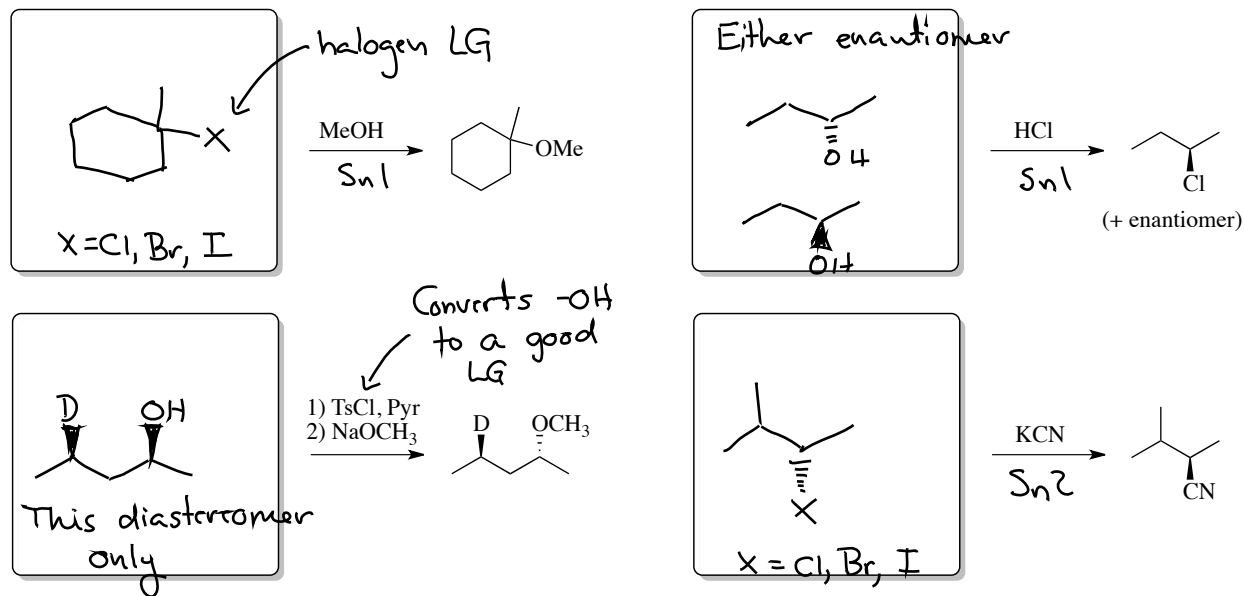
1. Predict the *substitution* product(s) and the mechanism (Sn1 or Sn2) for each of the following reactions.



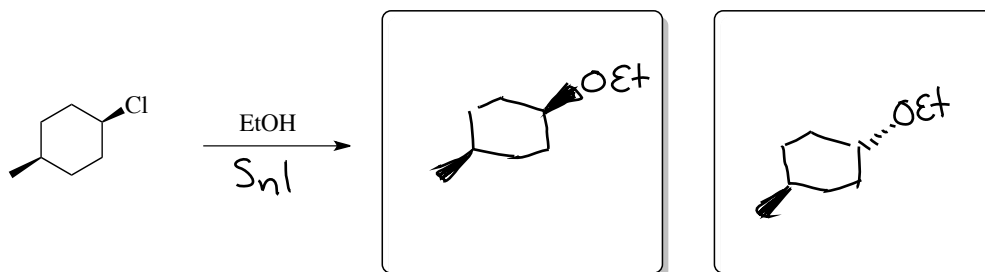
2. Predict the reagent or set of reagents used in each of the following substitution reactions.



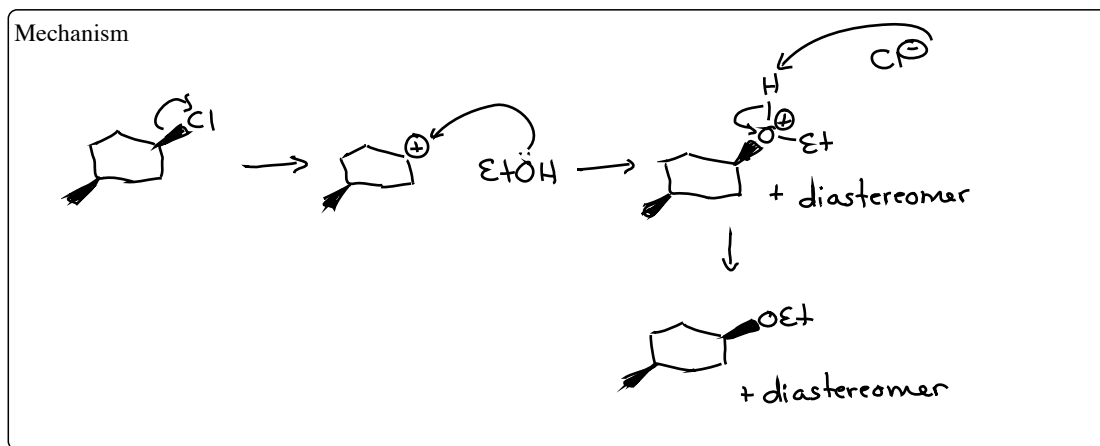
3. Predict the starting material for each of the following substitution reactions.



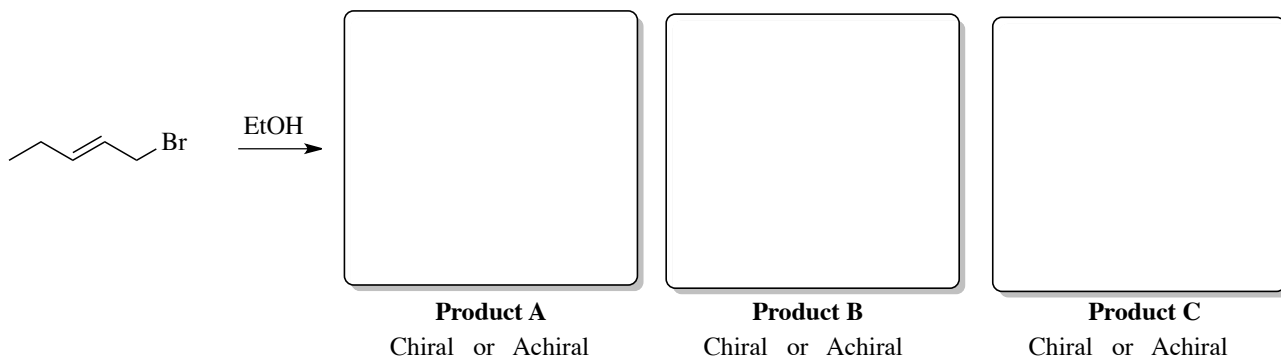
4. The following reaction produces two different products. 1) What are they? 2) Are the products chiral or achiral and why? 3) What is the stereochemical relationship between each of the products? 4) Write a complete mechanism for the formation of the products.



Are the products chiral? No → No chiral centers
Relationship: diastereomers



5. The following reaction produces three different products. 1) What are they? 2) Are the products chiral or achiral and why? 3) What is the stereochemical relationship between each of the products? 4) Write a complete mechanism for the formation of the products.



Relationship between A and B? _____

Relationship between B and C? _____

Relationship between A and C? _____

Mechanism