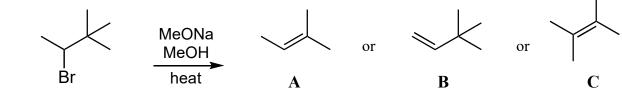
4A) (10 pts) For each of the following pairs of reactions, indicate which one will be faster and <u>briefly</u> explain why. If you expect no significant difference in the reaction rates, say so. **No explain = no credit.**

$Br ext{H}_2O ext{OH}$	a. CH_3SNa SCH_3
b. H ₂ O OH mechanism name? which is faster (a, b or neither)? explain:	b. CI CH ₃ SNa ether mechanism name? which is faster (a, b or neither)? explain:

4B) (5 points) Predict which would be the major product formed, and explain your choice. What reaction mechanism do you expect to take place? No explain = no credit.



major product? explain: