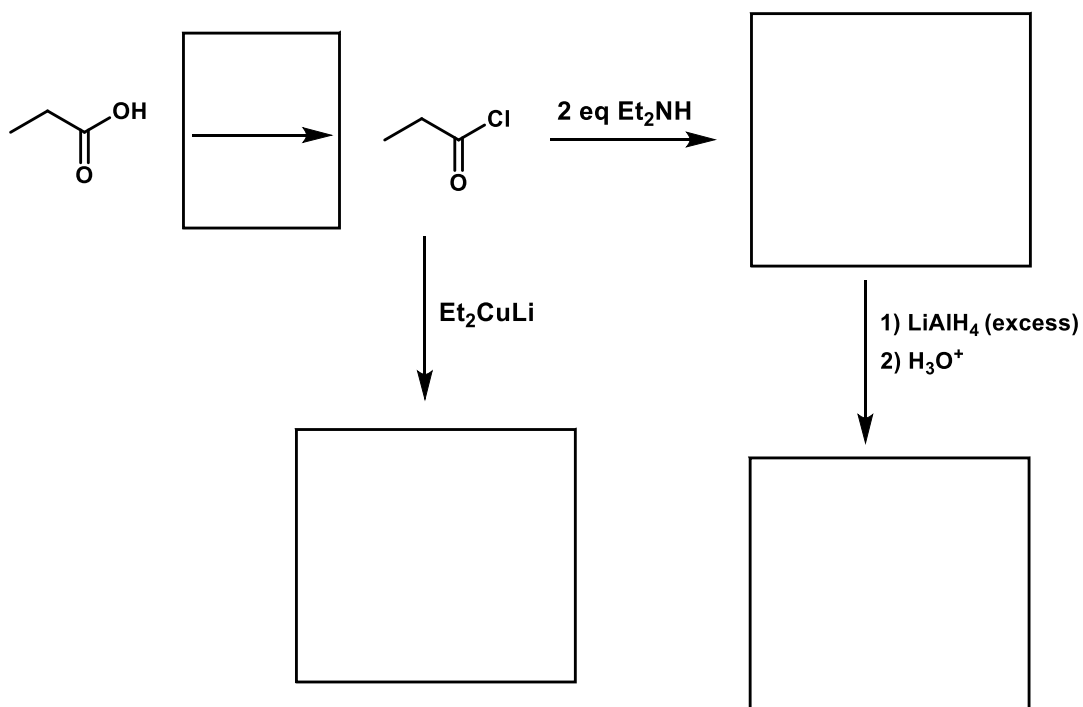
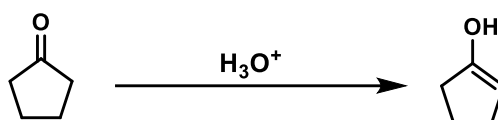


1. Fill in the missing products, reactants, or reagents below.



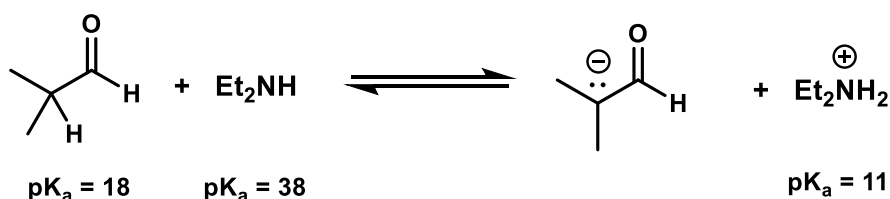
Et = ethyl group

2. 🎁 Give me 🎁 a 👤 step-wise 🧑🔬❤️ mechanism ❤️🧑🔬 for the 🚀 following 🚀 glow-up 🦋👉👉👉🦋



If you're enjoying this quiz, don't forget to like and subscribe and click the 🔔 so you don't miss out on future quiz content. I noticed in my analytics that less than 12% of people who take a quiz are subscribers 😬

3. For their 🦊 lab 🦊 synthesis project, a 👤 student 👤 plans to use 🦊👉👉👉🦊  $\text{Et}_2\text{NH}$  🦊 as a 📦 base to form an 🧑🔬 enolate ion 🧑🔬, as shown by the ⚡ reaction ⚡ below 📌. Is their plan 💯 bussin 💯 or 💩 sus 💩? Use 🧐 pKa values 🧐 to justify the 🟢🧐🦊 or 🟡🧐🦊 with a  $K_{\text{eq}}$  🦊. Francium, Francium, no 🦊. (🦊👉👉👉🦊 hint: one of the given pKa values is not relevant 🦊👉👉👉🦊)



$K_{\text{eq}} =$

Explanation:

Who got ratio'd? The enolate or the aldehyde?