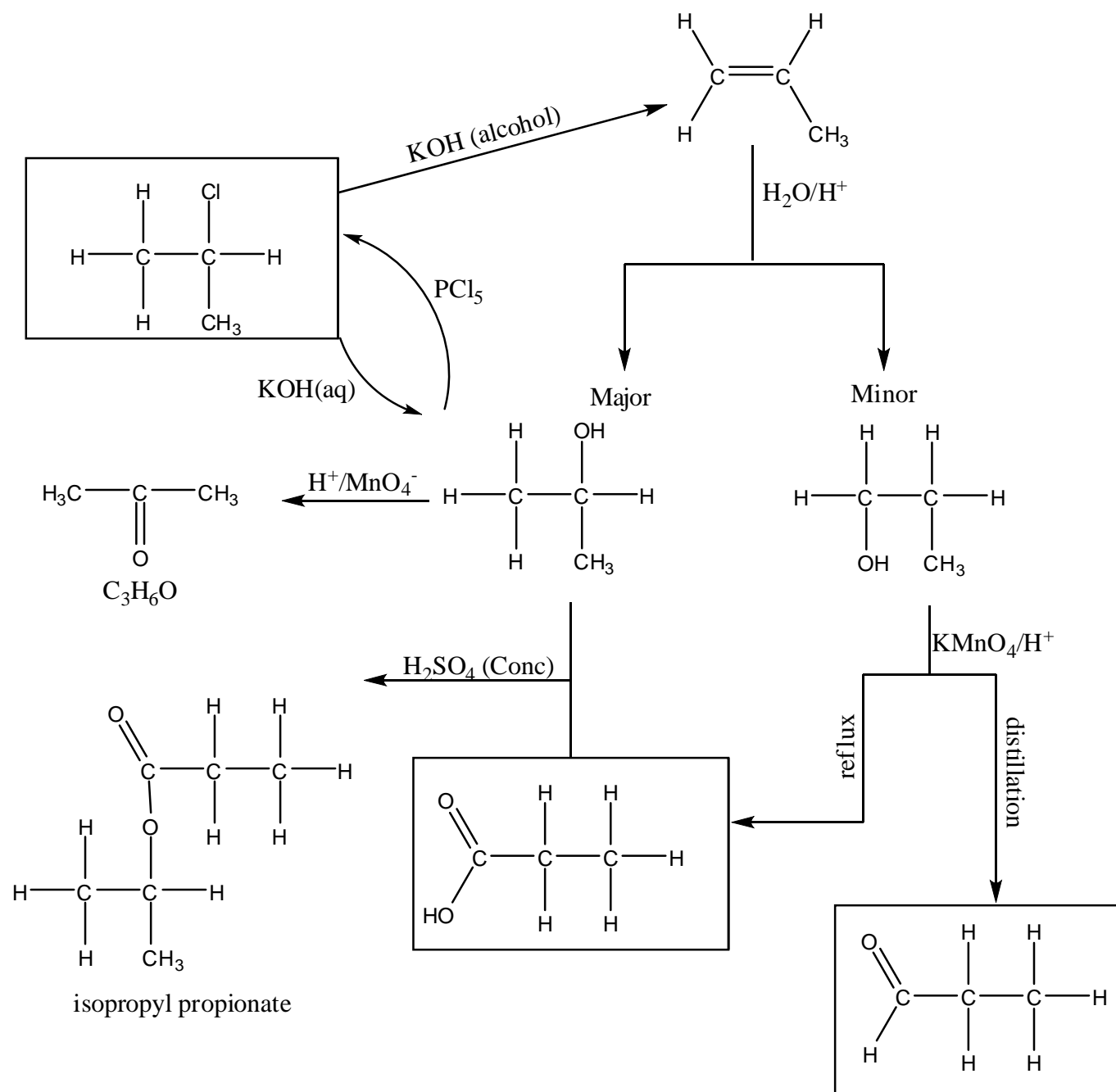


Question One- Complete the table

Description	Type of reaction
One group is replaced by another	Substitution
A functional group gains oxygen or loses hydrogen (electrons are also lost in the process)	Oxidation
Groups were removed and a double bond is formed	Elimination
Double bond is broken by inserting atoms (or groups) into the molecule	Addition
Two molecules are joined together by removing a smaller molecule	Condensation
Proton transfer	Acid and Base
Bond is broken by inserting water	Hydrolysis

Question Two- Complete the reaction scheme



Question Three

With diagrams, explain the differences between reflux and distillation

Reflux is an experimental set up where a condenser is placed directly on top of the reaction vessel. The purpose for reflux is to provide the reaction with heat while not allowing any vapour to escape. Any vapour formed by the reaction will be condensed by the condenser and drop back down to the reaction vessel.

Distillation is an experimental set up where a condenser is placed on the side of the reaction vessel. The purpose for distillation is to separate two liquid in the reaction vessel because of their difference in boiling point. The substance with the lower boiling point will vaporized and travel to the condenser where as it condenses, it transferred into another vessel.

