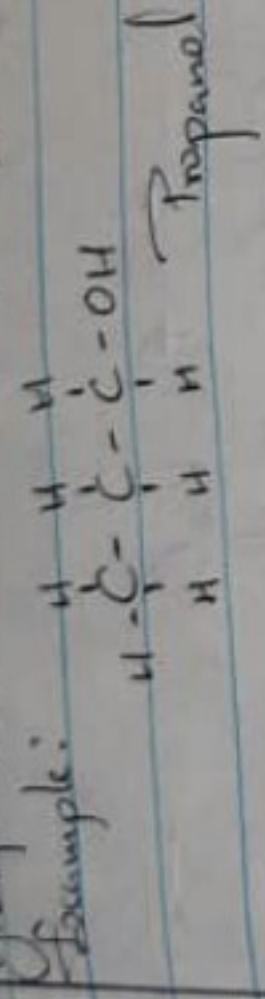


Assignment

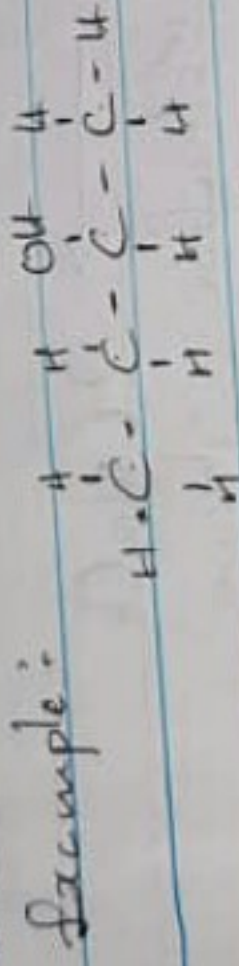
Primary Alcohol

This is a class of alcohol which has the hydroxyl, -OH group connected to a primary carbon



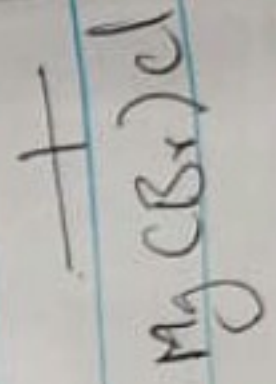
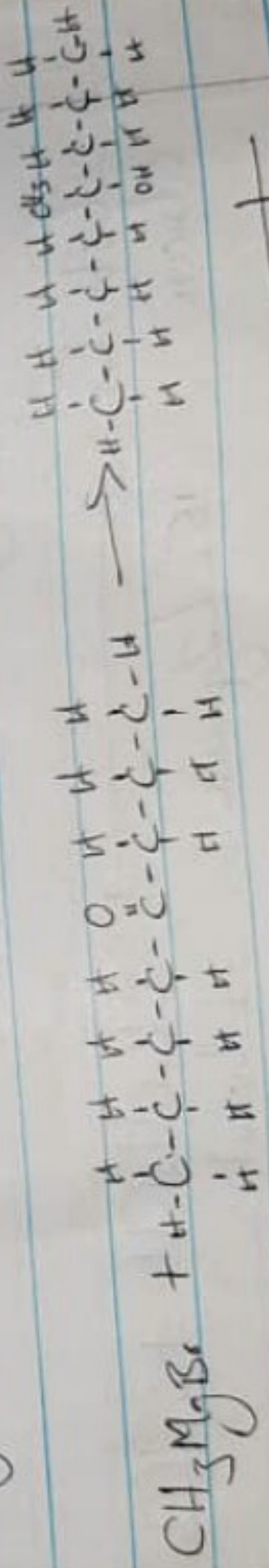
Secondary Alcohol

This is also a class of alcohol which the hydroxyl group, -OH is attached to a secondary carbon atom which has two other carbon atoms attached to it.



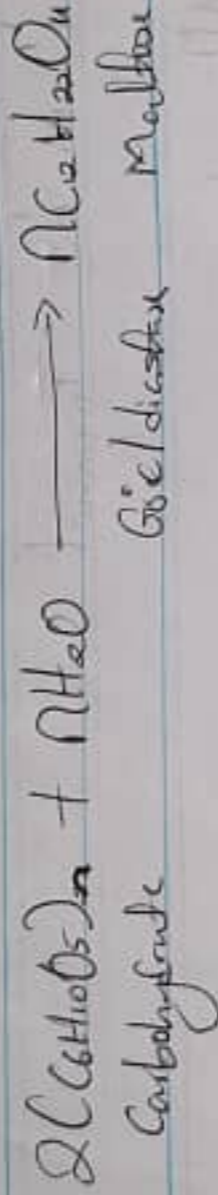
Butan-2-ol

II Grignard Synthesis of

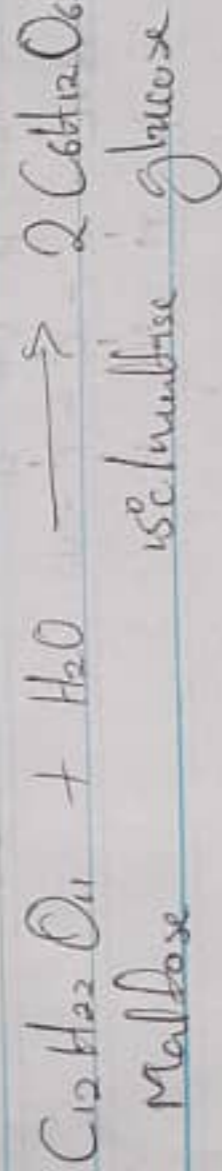


Industrial Manufacture of Ethanol

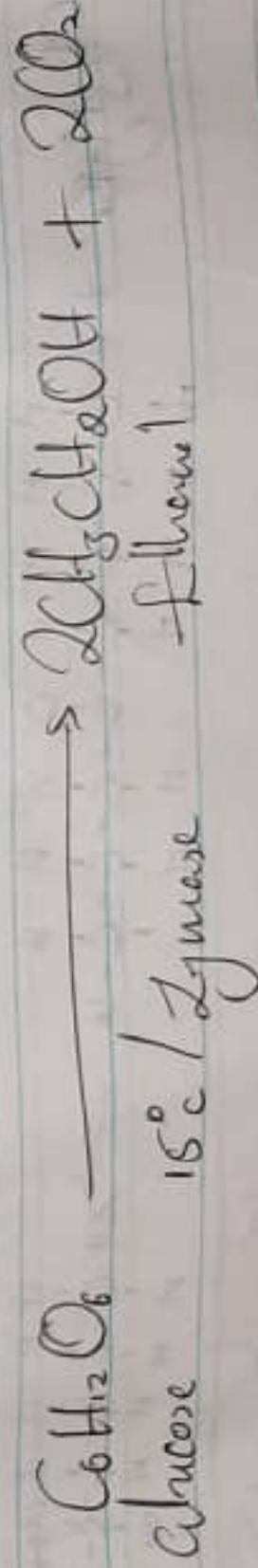
Carbohydrate such as starch are major group of natural compounds that can be made to yield ethanol by the biological process of fermentation. The biological catalyst enzymes found in yeast break down the carbohydrate molecules into ethanol to give a yield of 93%. The starch containing materials include molasses, potatoes, cereals, rice and on warming with malt to 60°C for a specific period of time are converted into maltose by the enzyme diastase contained in the malt.



The maltose is broken down into glucose on addition of yeast which contains the enzyme maltase and at a temperature of 15°C.

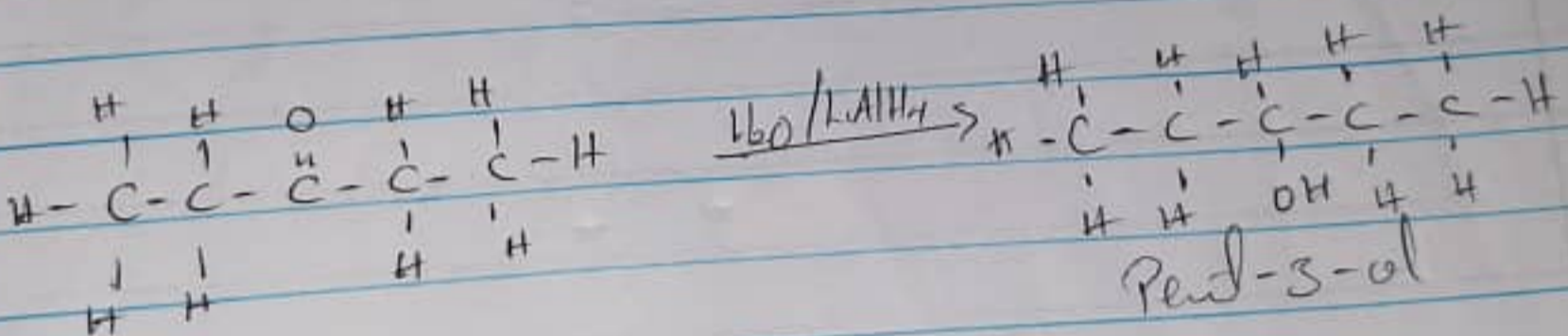
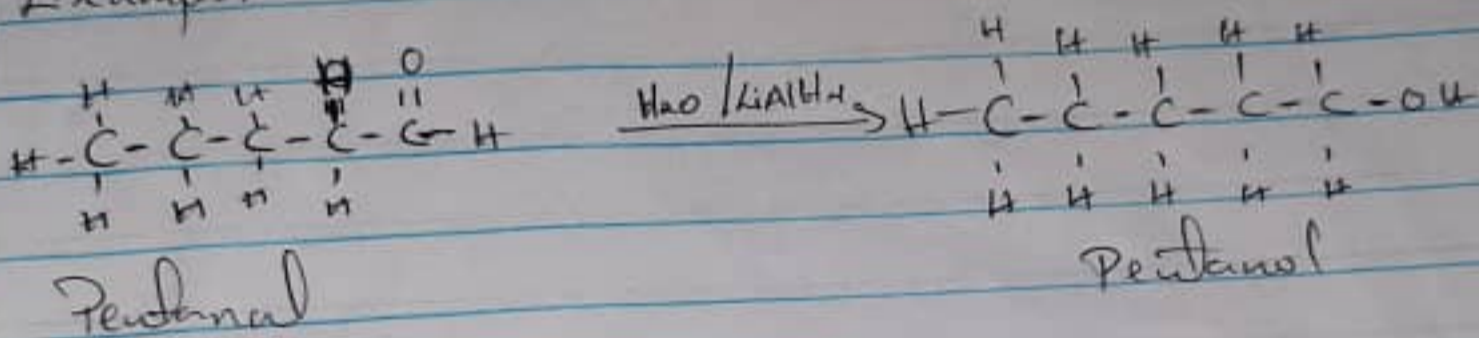


The glucose at constant temperature of 15°C is then converted into alcohol by the enzyme Zymase contained also in the yeast.



4) Product from reduction of an Alkanone is: Secondary alcohol
 Product from reduction of an Alkanal is: Primary alcohol

Example:



Pent-3-ol