Comparison of effect on pretreatment of SAA and percolation to Enzymatic Hydrolysis



The effectiveness of pretreatment by Percolation and Soaking Aqueous Ammonia(SAA) with cellulosic biomass Emty Fruit Bunch (EFB) and Rice straw on sugar conversion was investigated. The pretreatment of cellulosic biomass is to remove or destroy structural hindrance to enzymatic hydrolysis. This promote the rate of hydrolysis and increase yield of fermentable sugars.

Rice straw was pretreated by using SAA 15wt.% aqueous ammonia solution. EFB was pretreated by using 10wt.% and 20wt.% aqueous ammonia solution for percolation and SAA. these pretreatments conducted at desired temperatures and reaction time to product of the fermentable sugars from enzymetic hydrolysis.