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(54) Title: PROCESS FOR SEPARATING PRODUCT GAS USING CARBONYLATION PROCESSES

(57) Abstract: The present invention is related to separating product gas using a carbonylation reactor in which the carbon monox-
ide is consumed to produce acetic acid, and hydrogen and carbon dioxide are recovered. The recovered hydrogen may be further pur-
ified to reduce the concentration of carbon oxides. The present invention provides improved methods for converting product gas or
syngas to ethanol.



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