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(54) Title: FISCHER-TROPSCH CATALYST ENHANCEMENT

(57) **Abrégé/Abstract:**

A process of enhancing both the activity and the methane selectivity of a Dispersed Active Metal ("DAM") hydrogenation catalyst is disclosed wherein the DAM undergoes low temperature oxidation in a slurry phase to form an oxidized catalyst precursor that is unique in comparison to those formed by conventional high temperature deactivation processes. The oxidized catalyst precursor, which is stable, is subsequently reduced to form an enhanced catalyst by treatment with hydrogen-containing gas at elevated temperature. The process is useful in a wide variety of DAMs formed by art-recognized techniques. The process is equally applicable to the enhanced catalyst formed from the oxidized precursors and their use in hydrogenation reactions.



