Novel Catalysts for Conversion of Liquid Hydrocarbon

N. V. Lisitsyn, D. Yu. Murzin, E. A. Vlasov, A. Yu. Postnov, M. M. Sychev, S. V. Myakin, and L. A. Nefedova

St. Petersburg State Technological Institute (Technical University), Moskovskii pr. 26, St. Petersburg, 190013 Russia e-mail: ap1804@yandex.ru

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Abstract—A catalytic system $NiO-Al_2O_3$ of conversion of C_{6+} hydrocarbon fractions obtained after separation of the target natural raw materials was improved by a method of mechanical activation and modification of CeO_2 . The resulting modified catalyst system of a $NiO-BaO-CoO_2-Al_2O_3$ structure is characterized by high activity and stability during operation and also it demonstrates an oxidative activity. Structural characteristics and morphology of the modified catalytic system of hydrocarbon conversion were analyzed by adsorption methods, scanning electron microscopy, laser-dispersive and X-ray analysis.

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