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عنوان مقاله:

Modeling and Identification of Catalytic Reformer Unit using Locally Linear Model Trees

محل انتشار:

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خلاصه مقاله:

This paper presents a Neuro-fuzzy based method using local linear model trees (LOLIMOT) train algorithm for nonlinear identification of a catalytic reformer unit in oil refinery plant. This unit include highly nonlinear behaviour and it is complicated to obtain an accurate physical model. There for, it is necessary to use such appropriate method providing suitable while preventing computational complexities. LOLIMOT algorithm as an incremental learning algorithm has been used several time as a well-known method for nonlinear system identification and estimation. For comparison, Multi Layer Perceptron (MLP) and Radial Bases Function (RBF) neural networks as well-known methods for nonlinear system identification and estimation are used to evaluate the performance of LOLIMOT. The results presented in this paper clearly demonstrate that the LOLIMOT is superior to other methods in identification of nonlinear system such as catalytic reformer unit (CRU

کلمات کلیدی:

Locally Linear Model Tree, Nonlinear Identification, Catalytic Reformer Unit

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