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Liquid-liquid extraction data of methyl ethyl ketone from
n-hexane using ethylene glycol at 298.15-313.15 K

Midong Shi, Liping Wang, Gaoyin He, Fan Gan, Xuemin Yu, Qingsong Li *

The State Key Lab of Heavy Oil Processing, College of Chemical Engineering,

China University of Petroleum – East China,

Qingdao, Shandong 266580, China

ABSTRACT: In order to remove methyl ethyl ketone from the lower fractions of C_6 in the high temperature Fischer-Tropsch synthetic oil, the liquid-liquid equilibrium (LLE) experiments for methyl ethyl ketone + n-hexane + ethylene glycol were carried out and the LLE data were measured at 298.15, 303.15, 308.15 and 313.15 K under atmospheric pressure. The analysis results demonstrated the feasibility of separating methyl ethyl ketone from n-hexane using ethylene glycol with the extraction method. Moreover, the NRTL and UNIQUAC models were successfully applied to correlate the LLE data with RMSD' values of 0.0197 and 0.0313, respectively, which indicated that NRTL model showed a higher accuracy.

Key words: Liquid-liquid equilibria; methyl ethyl ketone; n-hexane; ethylene glycol

Corresponding Author

*E-mail: licup01@163.com.

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