Accepted Manuscript

Thermodynamics and selectivity of separation based on activity coefficients at infinite dilution of various solutes in ionic liquid [HMMIM][BF₄]

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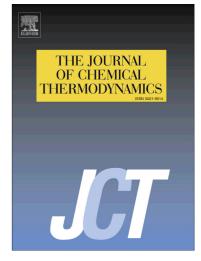
 PII:
 S0021-9614(18)30379-3

 DOI:
 https://doi.org/10.1016/j.jct.2018.05.017

 Reference:
 YJCHT 5416

 To appear in:
 J. Chem. Thermodynamics

Received Date:20 April 2018Revised Date:14 May 2018Accepted Date:15 May 2018



Please cite this article as: Z-Z. He, J-Y. Zhai, H. Mu, M. Zhang, Y. Yu, J-L. Zheng, Y-H. Jiao, M-L. Ge, R-X. Wu, Thermodynamics and selectivity of separation based on activity coefficients at infinite dilution of various solutes in ionic liquid [HMMIM][BF₄], *J. Chem. Thermodynamics* (2018), doi: https://doi.org/10.1016/j.jct.2018.05.017

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HIGHLIGHTS

- ► Measurements of activity coefficients at infinite dilution using GLC.
- ► The (gas-liquid) partition coefficients were calculated.
- ► The excess thermodynamic functions, entropies, and Gibbs energies were calculated.
- ► The solubility parameter of the IL [HMMIM][BF₄] was determined.
- Selectivity and capacity for hexane (*i*)/benzene (*j*), cyclohexane (*i*)/benzene (*j*).
- ► The linear free energy relationship (LFER) analysis of the results was performed.

- 1. The Title: Thermodynamics and selectivity of separation based on activity coefficients at infinite dilution of various solutes in ionic liquid [HMMIM][BF₄]
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