Supporting Information:

Treatment of Coffee Husk with Ammonium-Based Ionic Liquids: Lignin Extraction, Degradation, and Characterization

Leta Deressa Tolesa^a, Bhupender S. Gupta^a, and Ming-Jer Lee^a*

^aDepartment of Chemical Engineering, National Taiwan University of Science and Technology, 43 Keelung Road, Section 4, Taipei 106-07, Taiwan



Figure S1 Field emission-scanning electron microscope micrographs for coffee husk (a-c), [DIPEA][Ac] extracted lignin (d-f) and carbohydrates enriched materials (g-i) (h: \times 500; a, b, d, g: \times 2,000; c, e, f, i: \times 10,000).



Figure S2 HSQC NMR spectrum of lignin fraction extracted by IL at 120 °C after 4 h treatment.