

Supplementary Information

“Ammonia Capture from Gas Phase by Encapsulated Ionic Liquids” by J. Lemus, J. Bedia, C. Moya, N. Alonso-Morales, Miguel A. Gilarranz, J. Palomar*, J.J. Rodriguez.

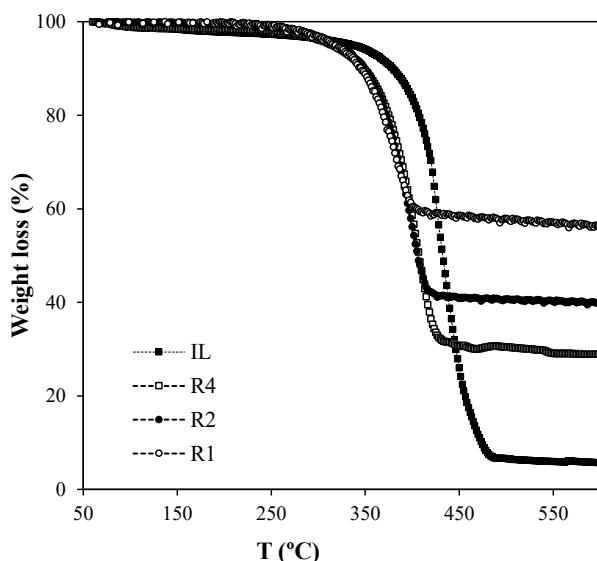


Figure S1. Dynamic thermogravimetric curve (TGA) of ENIL-R_n prepared with EtOHmimBF₄ and neat EtOHmimBF₄ (nitrogen atmosphere, 10 °C·min⁻¹).

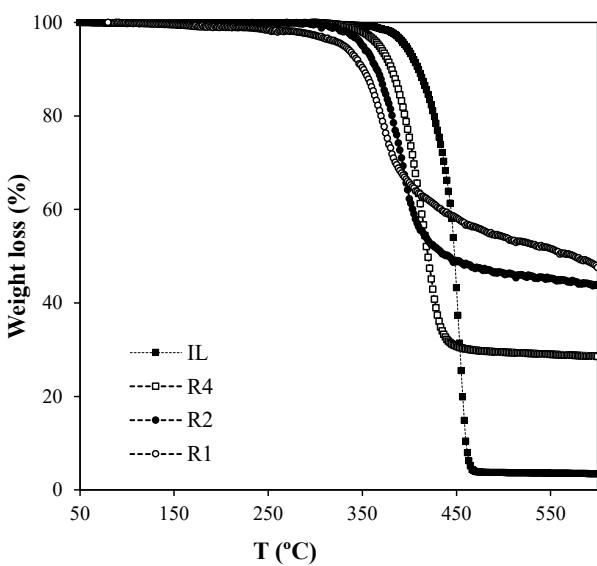


Figure S2. Dynamic thermogravimetric curve (TGA) of ENIL-R_n prepared with CholineNTf₂ and neat CholineNTf₂ (nitrogen atmosphere, 10 °C·min⁻¹).

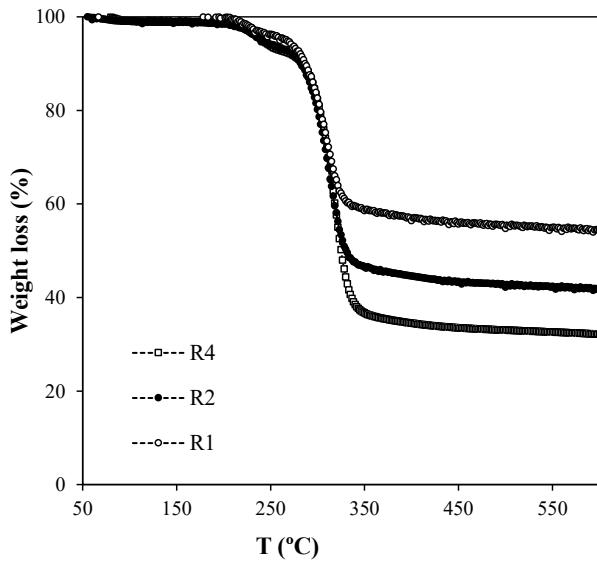


Figure S3. Dynamic thermogravimetric curve (TGA) of ENIL-R_n prepared with $(\text{EtOH})_3\text{MeNMeSO}_4$ (nitrogen atmosphere, $10 \text{ }^{\circ}\text{C} \cdot \text{min}^{-1}$).

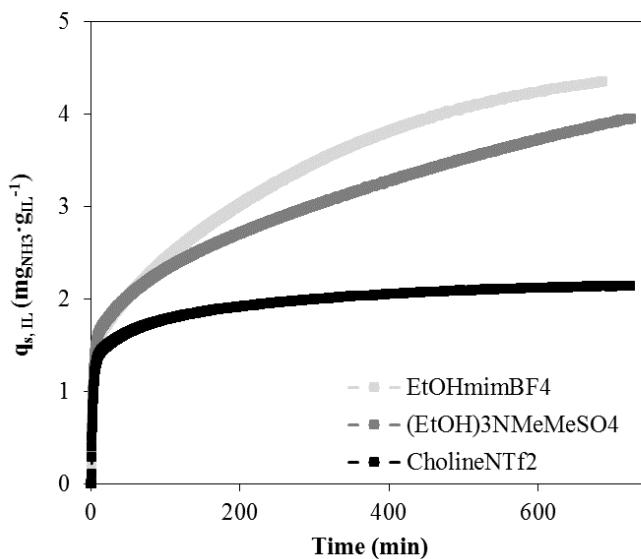


Figure S4. Experimental NH_3 absorption curves for ILs, (■) EtOHmimBF_4 , (■) $(\text{EtOH})_3\text{MeNMeSO}_4$ and (■) CholineNTf₂ (2000 ppmv of inlet NH_3 concentration, 50 $\text{mL} \cdot \text{min}^{-1}$, 500 mg of IL, 30 $^{\circ}\text{C}$.*)

*Ammonia absorption experiments were carried out in a TGA analyzer (Mettler Toledo Instrument, TGA/SDTA851e model) with a weight range of 0–1000 mg and a resolution of 0.1 mg. The temperature of the sample was maintained at 30°C using a regulated external bath (Huber minisat 125).

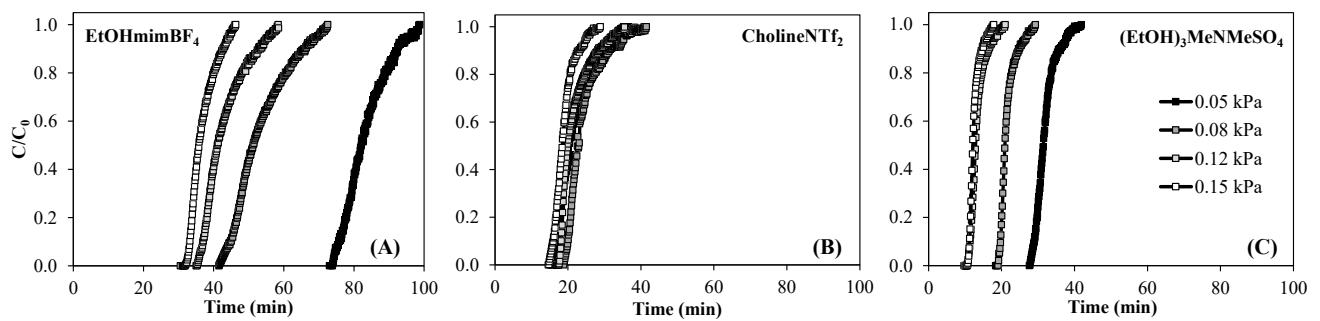


Figure S5. Experimental breakthrough curves of obtained at different inlet NH₃ concentration and ENILs-R4 prepared with (A) EtOHmimBF₄, (B) CholineNTf₂ and (C) (EtOH)₃MeNMeSO₄ (20 mL·min⁻¹, bed length: 5 cm, 30 °C).