

1 **Supplementary Information**

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9 **A validated analytical method to measure metals dissolved in deep**
10 **eutectic solvents**

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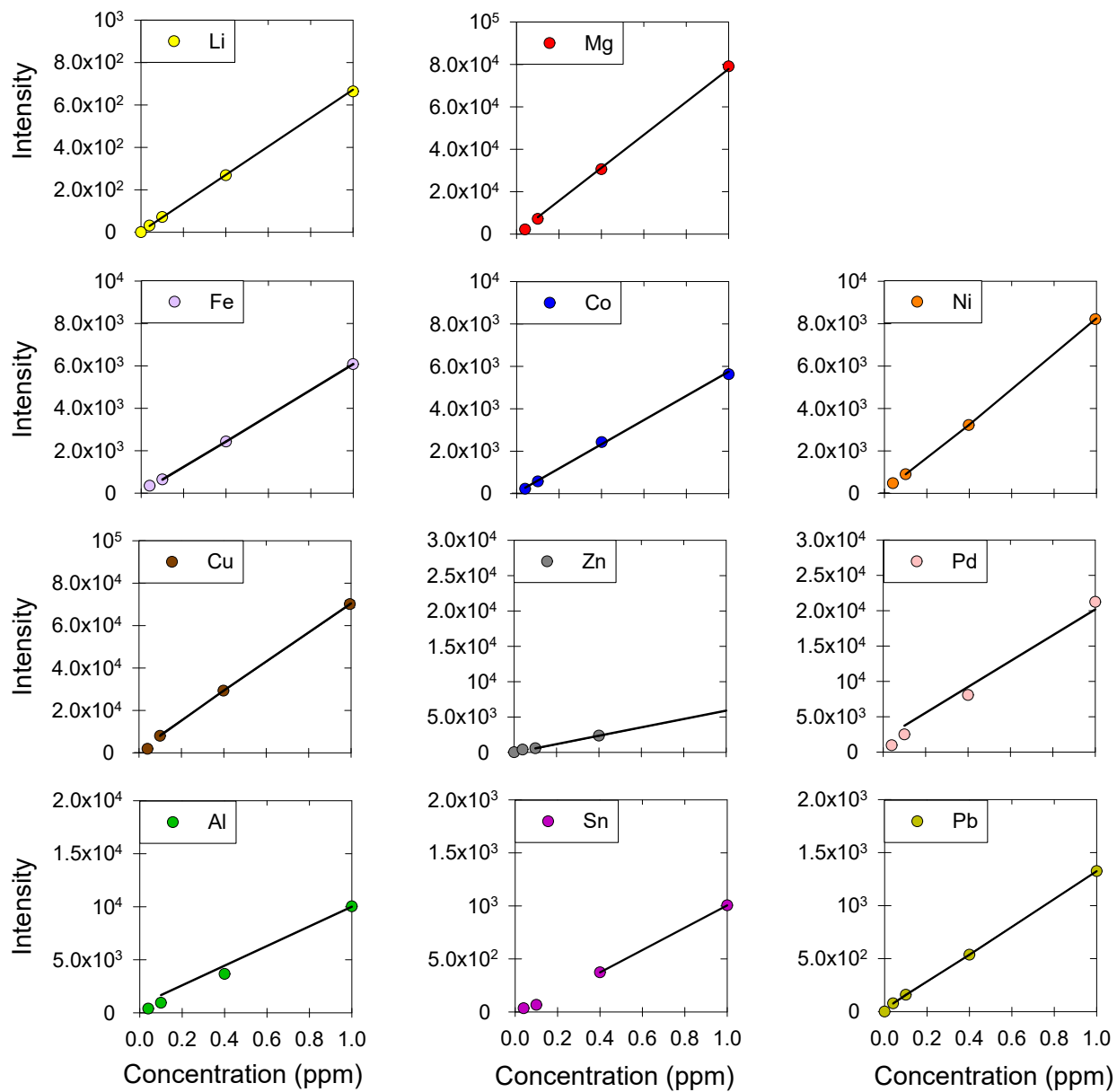
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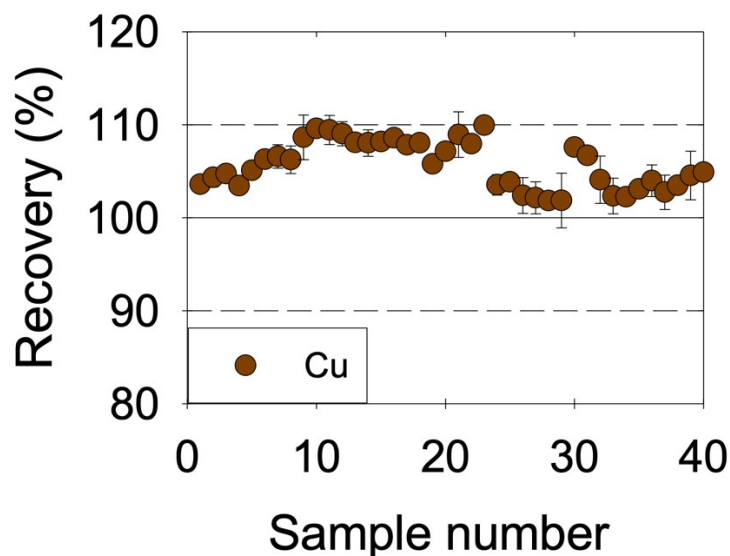
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27 **Figure S1:** Calibration curve data at the 0.01, 0.04, 0.1, 0.4, 1 $\mu\text{g/mL}$ concentration levels, which
 28 were contracted in Figure 2, for Li, Mg, Fe, Co, Ni, Cu, Zn, Pd, Al, Sn, and Pb in ChCl:EG:I_2 . The
 29 markers represent the data points corresponding to the intensity-concentration values of each
 30 sample. The black straight line represents the linear part of each calibration curve, as obtained
 31 from the linear regression equations, R^2 values, and the F-test results.

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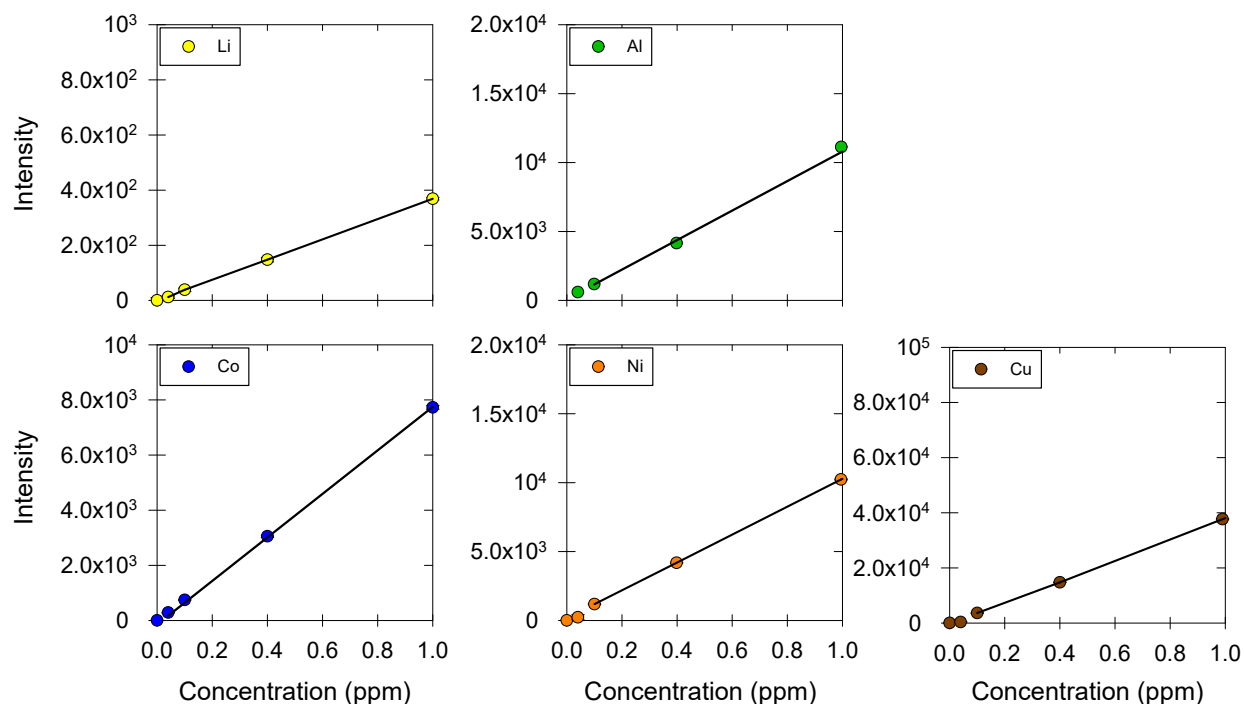
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35 **Figure S2:** Inter-run precision of the analytical method developed for the determination of Cu in
 36 $\text{ChCl}:\text{EG}:\text{I}_2$. Measurements of 40 samples of $2 \mu\text{g}/\text{mL}$ were obtained at different days in a 2-month
 37 period and the accuracy (as % recovery) of the analytical method for each element was estimated.
 38 The acceptability criterion for the recovery was within 90–110%.

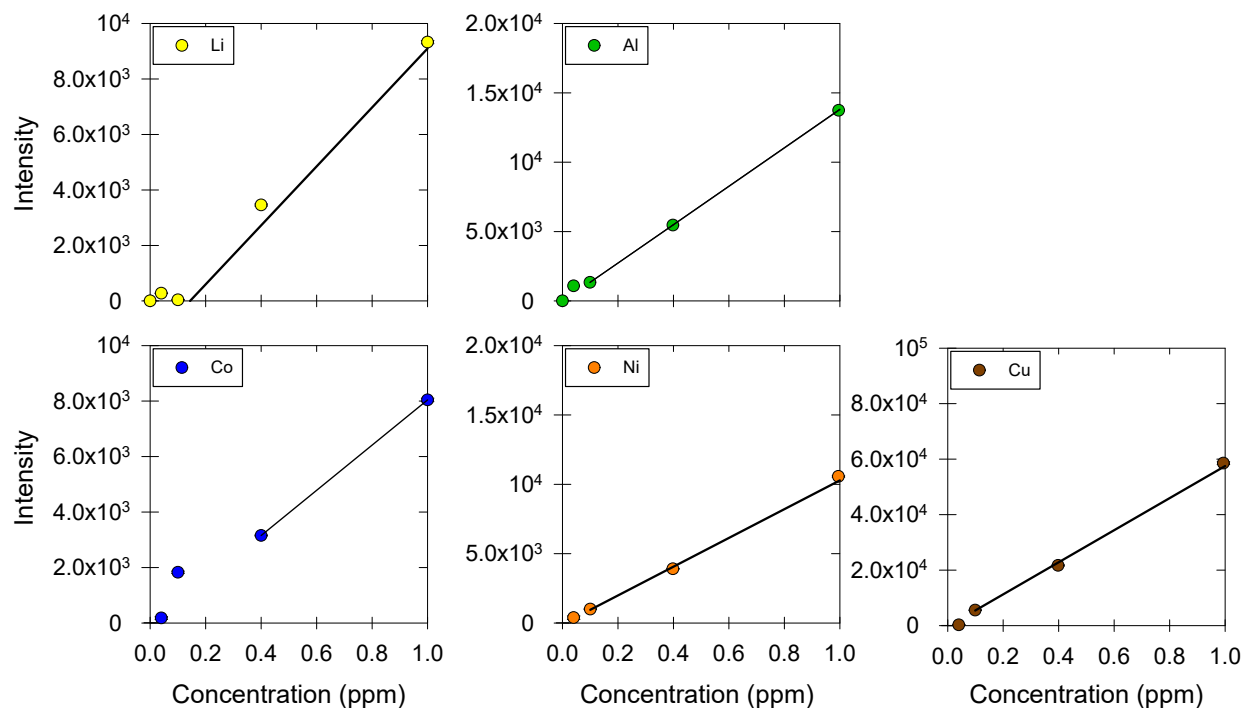
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41 **Figure S3:** Calibration curve data at the 0.01, 0.04, 0.1, 0.4, $1 \mu\text{g}/\text{mL}$ concentration levels, which
 42 were contracted in Figure 5, for Li, Co, Ni, Cu, and Al in $\text{ChCl}:\text{EG}$. The markers represent the data
 43 points corresponding to the intensity-concentration values of each sample. The black straight line
 44 represents the linear part of each calibration curve, as obtained from the linear regression
 45 equations, R^2 values, and the F-test results.

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49 **Figure S4:** Calibration curve data at the 0.01, 0.04, 0.1, 0.4, 1 $\mu\text{g}/\text{mL}$ concentration levels, which
50 were contracted in Figure 6, for Li, Co, Ni, Cu, and Al in ChCl:LA. The markers represent the data
51 points corresponding to the intensity-concentration values of each sample. The black straight line
52 represents the linear part of each calibration curve, as obtained from the linear regression
53 equations, R^2 values, and the F-test results.