

Supplementary Materials

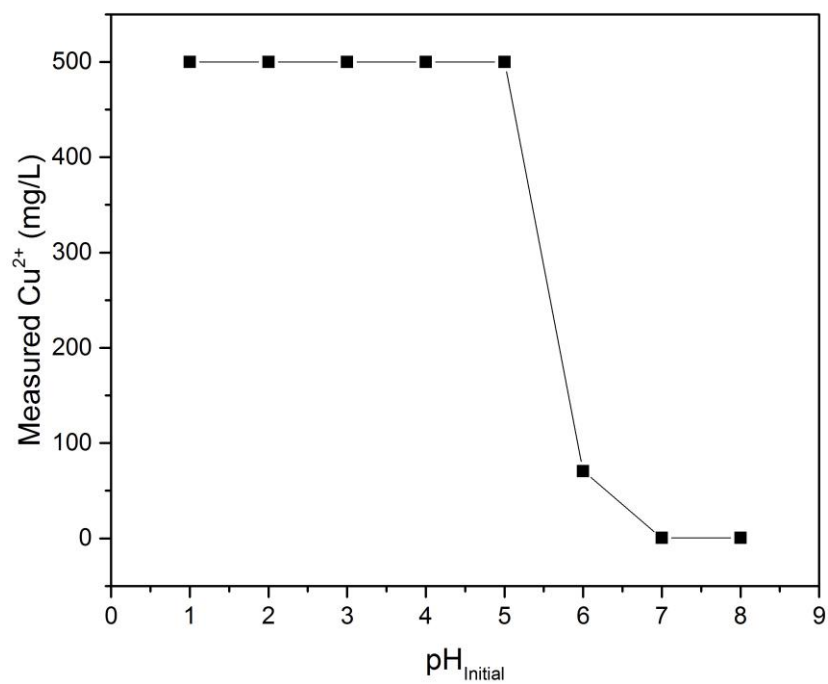


Figure. S1. Effect of solution pH on the measured concentration of Cu^{2+} (Target Cu^{2+} concentration: 500 mg/L).

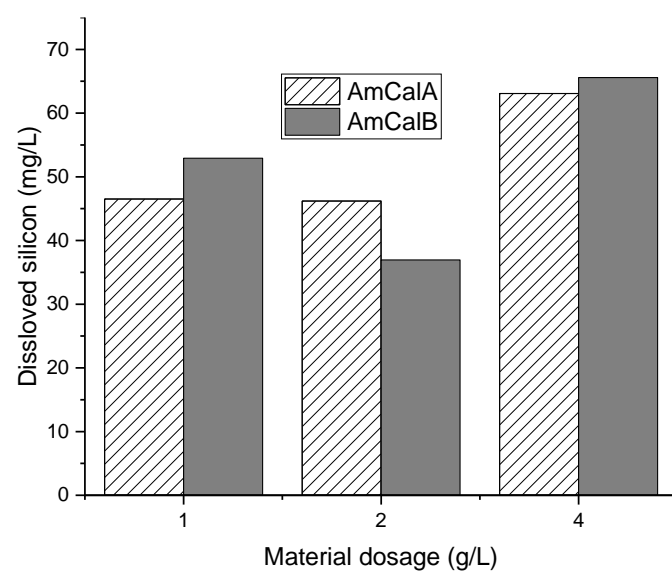


Figure S2: Effect of material dosage on the dissolved silicon (Initial pH:5, initial Cu²⁺ concentration: 700 mg/L, reaction duration: 20 h)

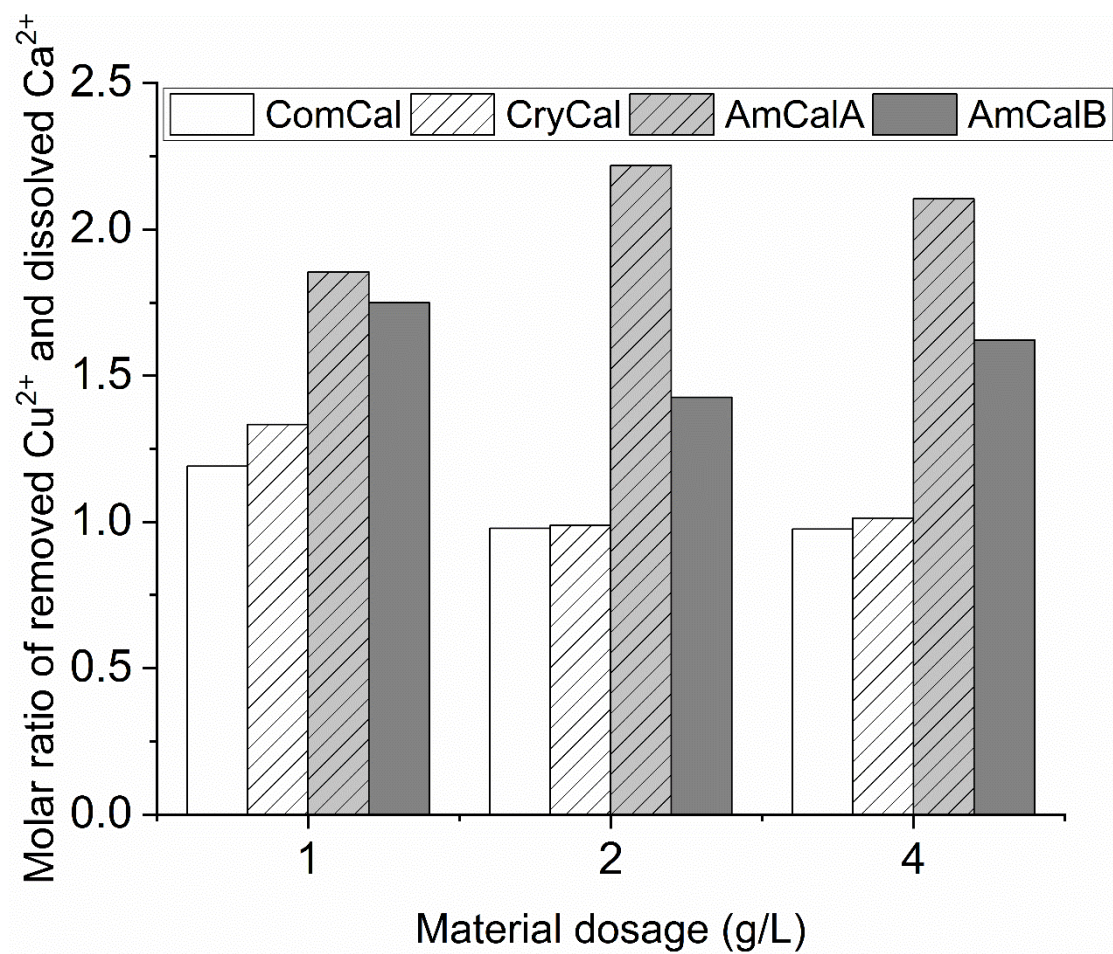


Figure S3: Molar ratio of removed Cu^{2+} and dissolved Ca^{2+} with different material dosages.