

Supporting Information

Preparation and Selective Adsorption of Cationic Dyes with Succinic

Anhydride-Functionalized Glucose-Based Carbon Microspheres

Weiyu Liu^a, Mengxin Liu^a, Mei Qin^a, Wenhui Rao^a, Yijun Xie^b and Chuanbai Yu^{a,*}

^a College of Materials Science and Engineering, Guilin University of Technology (GUT), Guilin 541004, China.

^b Institute of Nanochemistry and Nanobiology, School of Environmental and Chemical Engineering, Shanghai University, Shanghai 200444, China

*Corresponding authors. Email addresses: ycb2008@glut.edu.cn (Chuanbai Yu)

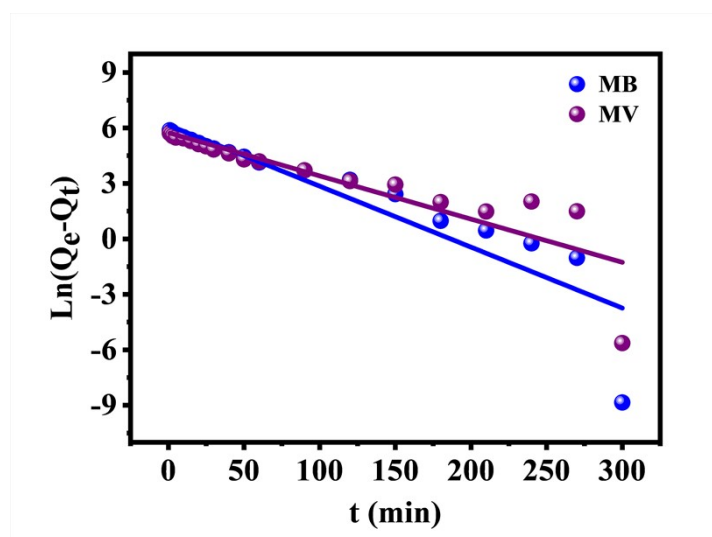


Fig. S1. Kinetic fitting results of pseudo-first-order models of MB and MV by SA-CMS.

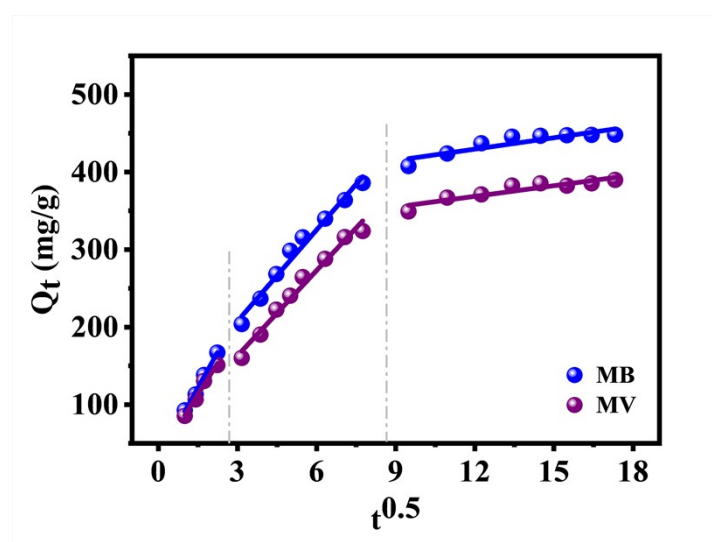


Fig. S2. Fitting result of the intraparticle diffusion model of MB and MV by SA-CMS.

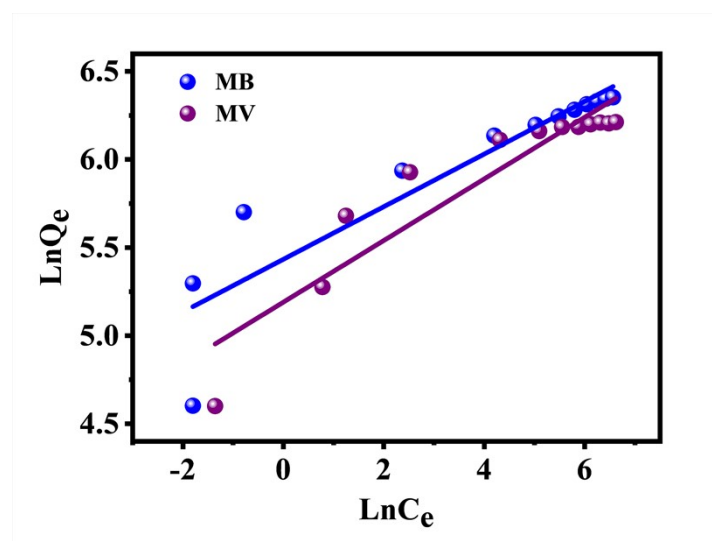


Fig. S3. Isotherm fitting results of Freundlich isotherm models of MB and MV by

SA-CMS.

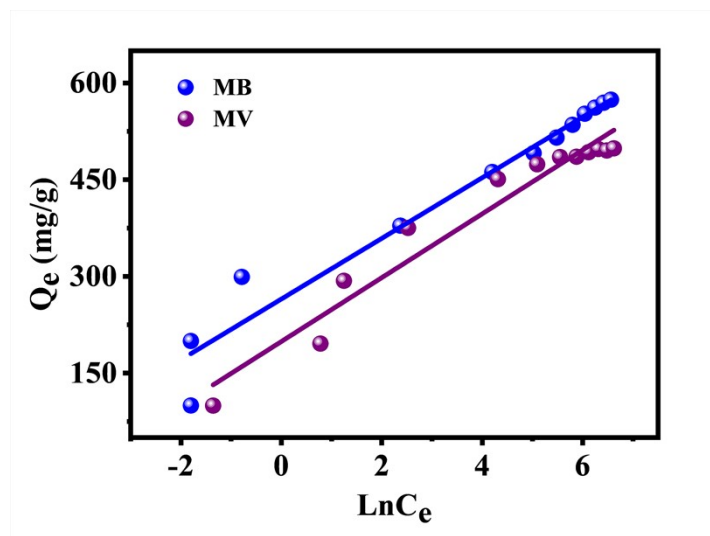


Fig. S4. Isotherm fitting results of Temkin isotherm models of MB and MV by SA-CMS.

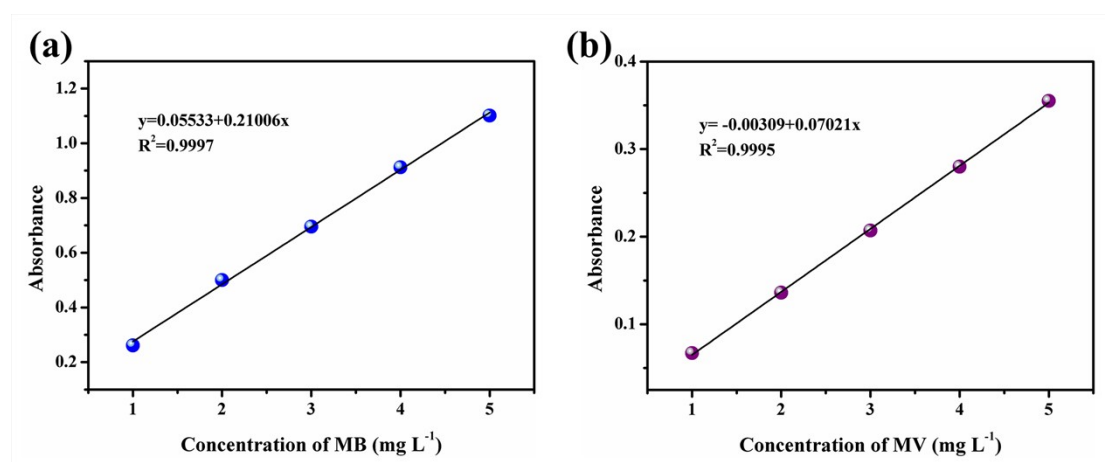


Fig. S5. Standard curve of (a) MB and (b) MV.

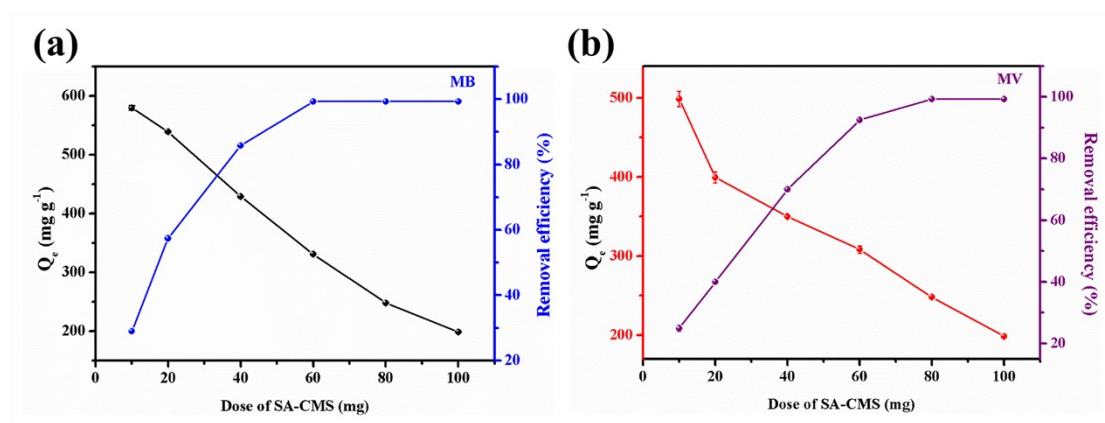


Fig. S6. Comparison of adsorption properties of SA-CMS with different adsorption materials for (a) MB and (b) MV.

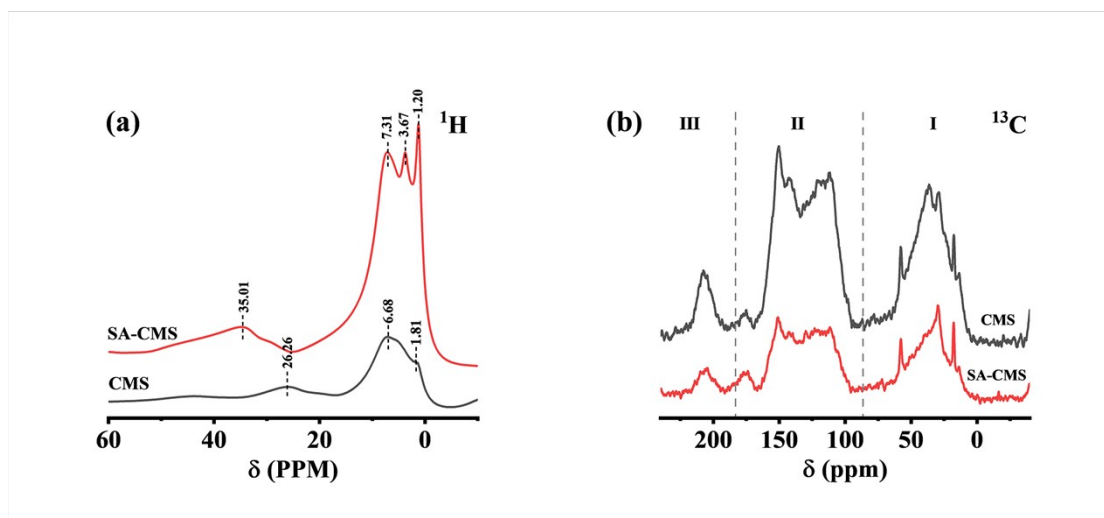


Fig. S7. ssNMR spectra of CMS and SA-CMS: (a) ^1H NMR spectra, (b) ^{13}C NMR spectra.

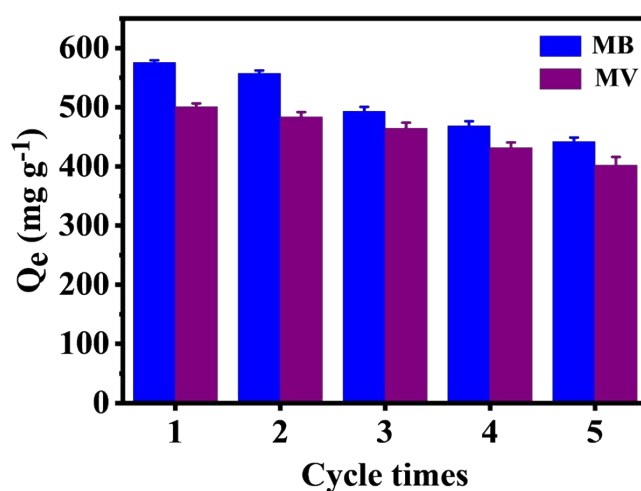


Fig. S8. Adsorption capacities of the SA-CMS in five adsorption-desorption cycles (Desorption in 2M HCl for 4 h).

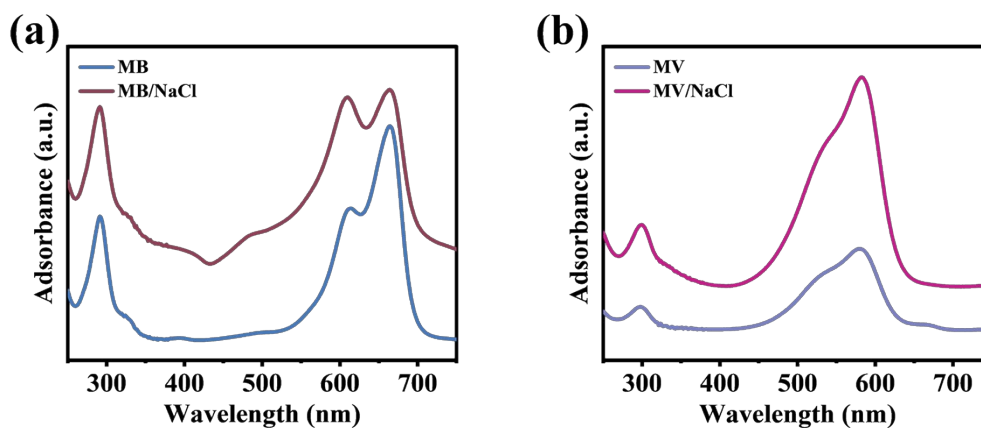


Fig. S9. (a) Comparison of UV-vis before and after adding NaCl to MB, (b)

Comparison of UV-vis before and after adding NaCl to MV.