Electronic Supplementary Material (ESI) for RSC Advances.

Porous Peony-like α-Fe_2O_3 Hierarchical Micro/nanostructures: Synthesis, Characterization and its Lithium Storage Properties

Tao Yang, Yangai Liu, Zhaohui Huang*, Qian Yang, Yongbo Chen, Meiling Hu, Ming Guan, Minghao Fang*

School of Materials Science and Technology, China University of Geosciences (Beijing), Beijing 100083, P.R. China

Supporting Information

* Corresponding author: Y. G. Liu, Tel.: +86-010-82322186, Fax: +86-010-82322186.
E-mail address: liuyang@cugb.edu.cn.

* Corresponding author: Z. H. Huang, Tel.: +86-010-82322186, Fax: +86-010-82322186.
E-mail address: huang118@cugb.edu.cn.

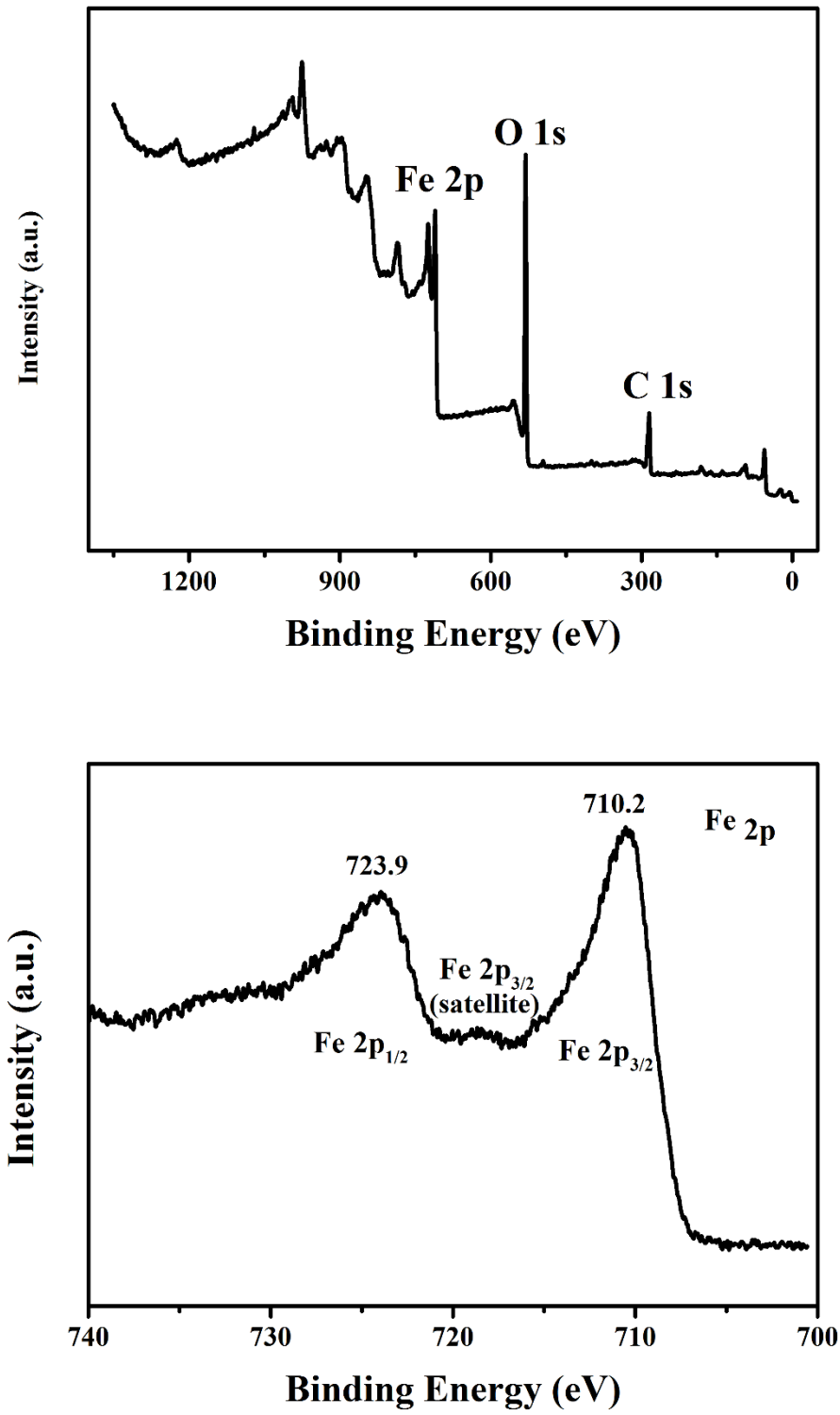

Figure S1 X-ray photoelectron spectroscopy of peony-like $FeCO_3$ microflowerss: a) the survey scan, and high resolution scans of the iron edges.

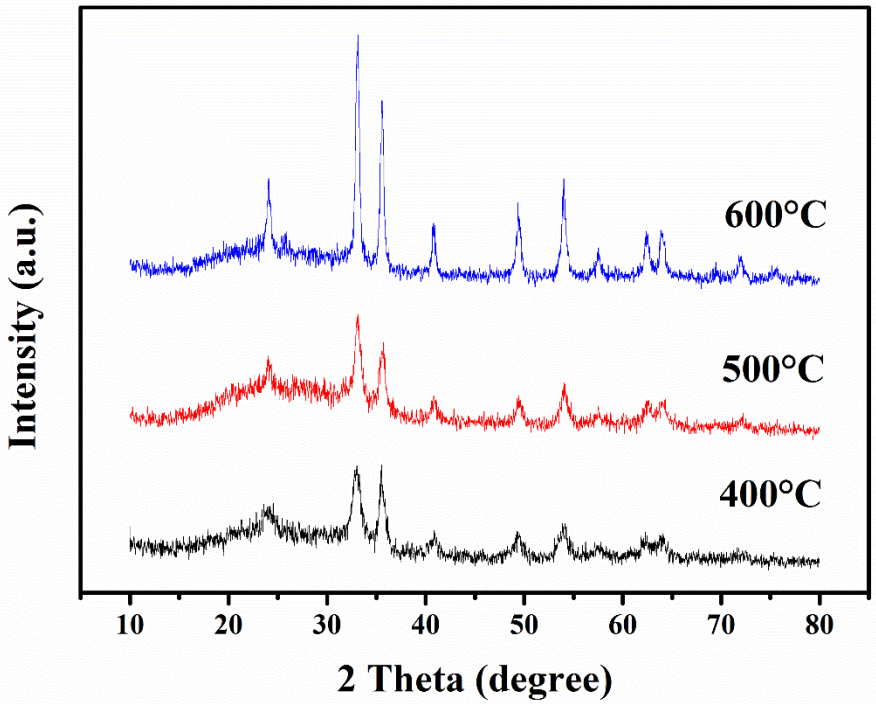

Figure S2 XRD patterns of the products heated at different temperature.

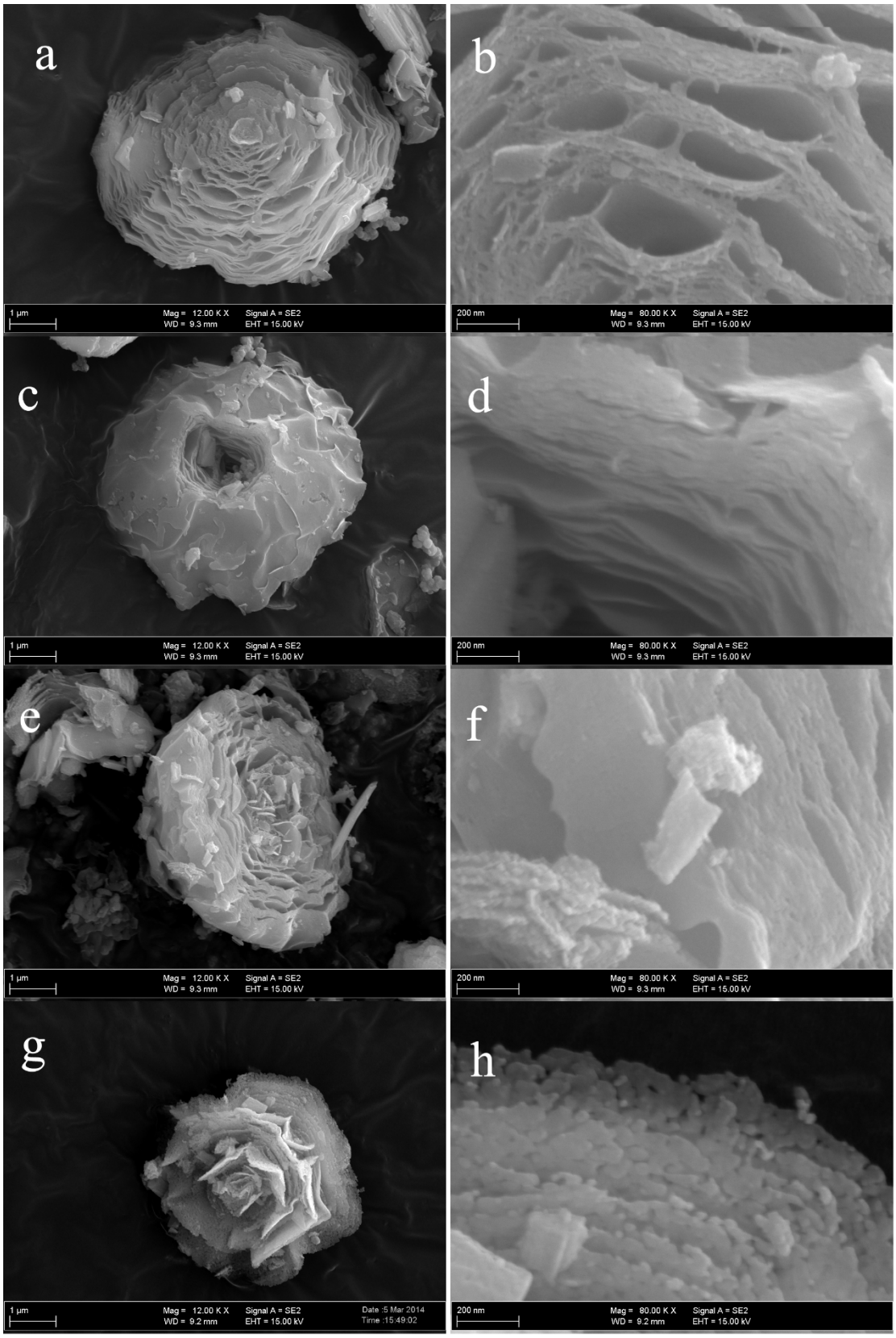

Figure S3 SEM images of the products heated at different temperature: (a-d) 400 °C; (e, f) 500 °C; (g, h) 600 °C.

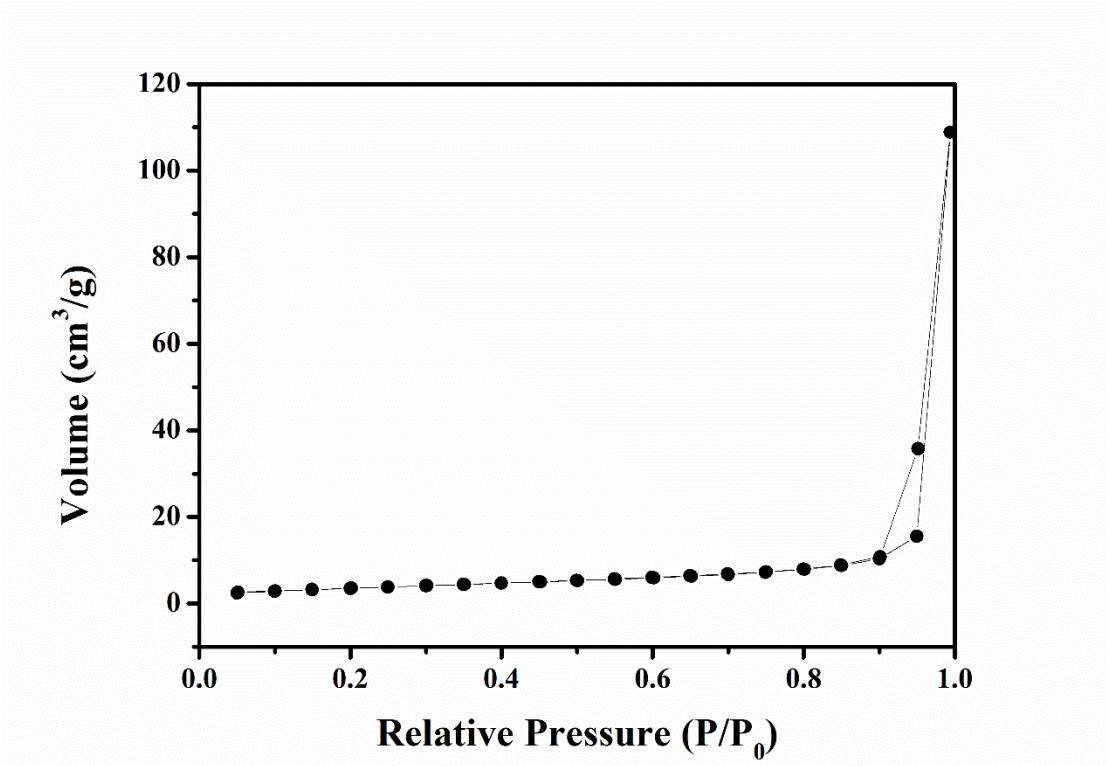

Figure S3 BET nitrogen adsorption–desorption isotherms for hierarchical α-Fe_2O_3 microflowers.