Uniform Hierarchical MoO₂/carbon Spheres with Super Cycling Performance for Lithium Ion Batteries

Hao-Jie Zhang, Tian-Hao Wu, Kai-Xue Wang,^{*} Xue-Yan Wu, Xiao-Ting Chen,

Yan-Mei Jiang, Xiao Wei and Jie-Sheng Chen*

School of Chemistry and Chemical Engineering, Shanghai Jiao Tong University,

Shanghai, China

Email: k.wang@sjtu.edu.cn and chemcj@sjtu.edu.cn



Figure S1. SEM image of carbon spheres. The size of the carbon spheres are

approximately 1.5 μ m in diameter.



Figure S2. TEM image of carbon spheres. The carbon spheres have smooth surfaces.



Figure S3. SEM images of $MoO_2/C-550$.



Figure S4. SEM images of MoO₂/C-600.



Figure S5. SEM images of MoO₂/C-700.





Figure S6. TEM and EDS images of MoO₂/C-600.



Figure S7. Cycling performance of MoO_2/C -700 at a current density of 1.0 A/g over a potential range of 0.01-3.0 V.



Figure S8. Coulombic efficiency of $MoO_2/C-600$ at a current density of 1.0 A/g over a potential range of 0.01-3.0 V.



Figure S9. CV curves of MoO_2/C -550 at a scan rate of 0.5 mV/s over a potential range of 0.01~3.0 V.



Figure S10. CV curves of MoO_2/C -700 at a scan rate of 0.5 mV/s over a potential range of 0.01~3.0 V.