

Selenium Heteroatom-doped Mesoporous Carbon as Efficient Air-breathing Electrode for Rechargeable Lithium-Oxygen Battery

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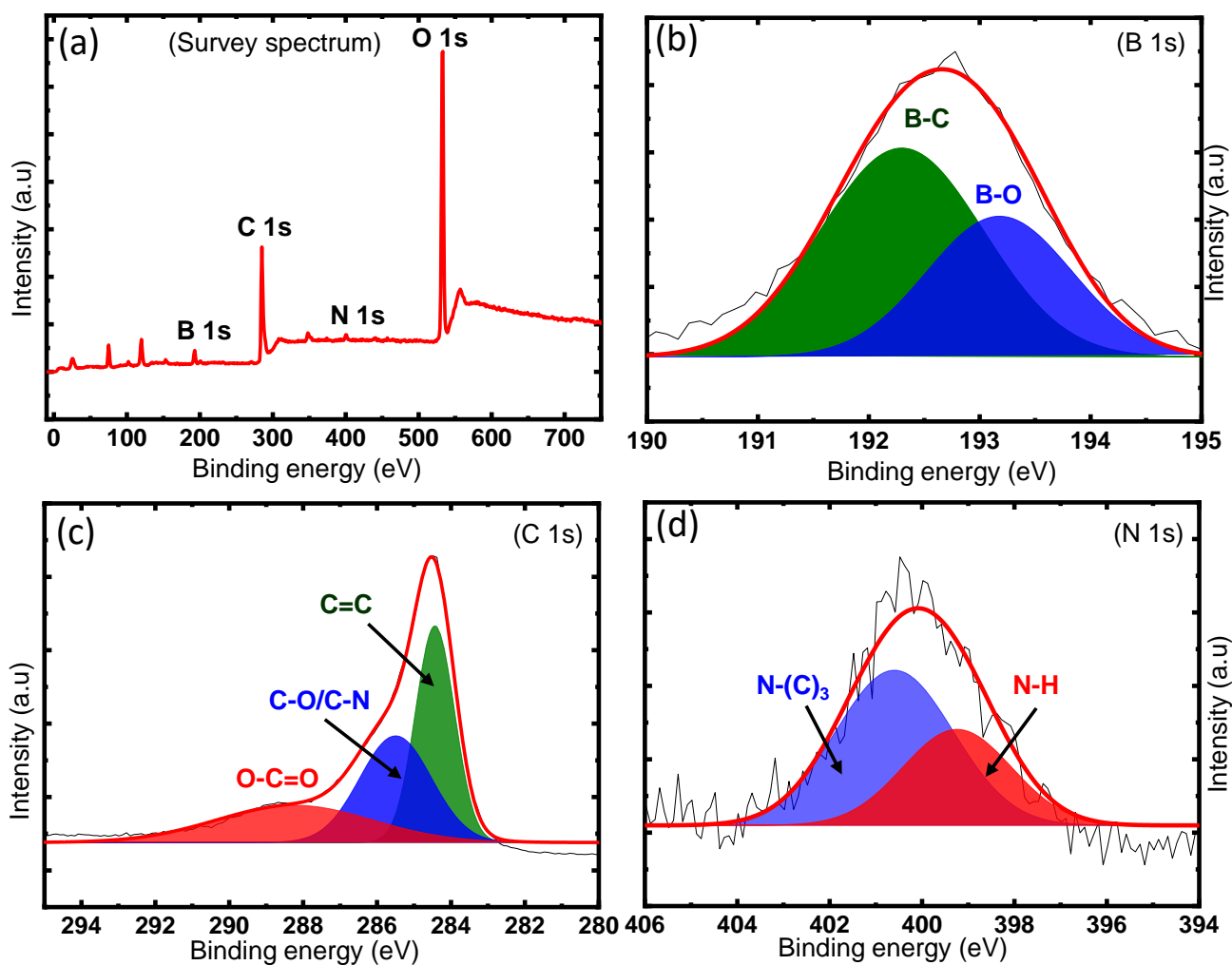


Fig. S1 (a) XPS survey spectrum and (b-d) Deconvoluted scan-profiles of B 1s, C 1s, and N 1s peaks recorded for the boron-doped carbon derived from the spent disposable papercups.

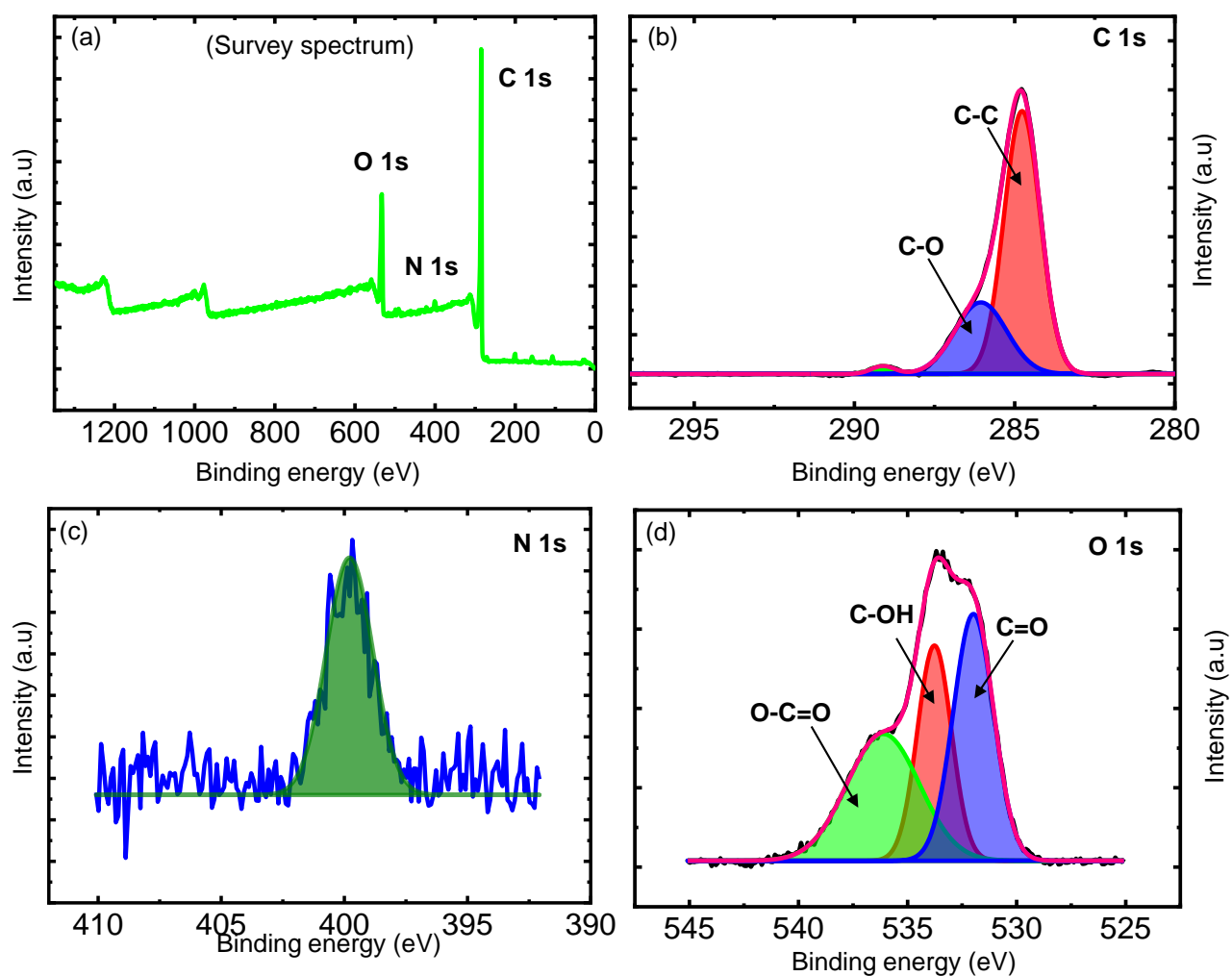


Fig. S2 (a) XPS survey spectrum and (b-d) Deconvoluted scan-profiles of C 1s, N 1s and O 1s peaks recorded for the nitrogen-doped carbon derived from the spent disposable papercups.

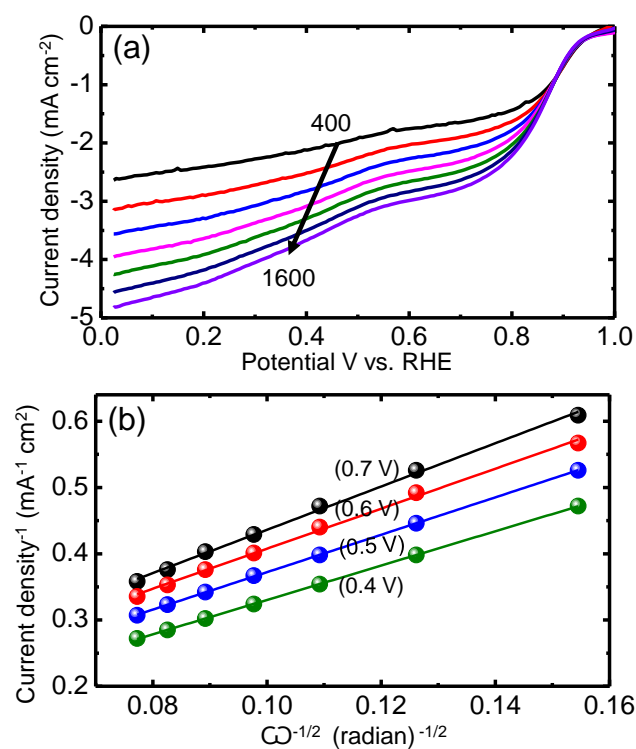


Fig. S3 (a) Electrode-speed dependent LSV profiles of the boron-doped carbon electrocatalyst at a scan rate of 10 mV s^{-1} , (b) K-L plots at different potentials constructed from the LSV plots of the boron-doped carbon electrocatalyst.

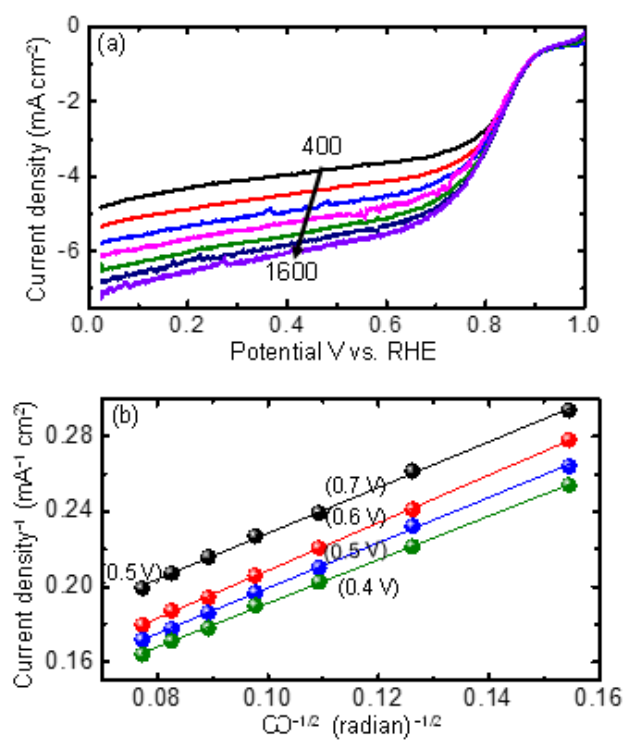


Fig. S4 (a) Electrode-speed dependent LSV profiles of the nitrogen-doped carbon electrocatalyst at a scan rate of 10 mV s⁻¹, (b) K-L plots at different potentials constructed from the LSV plots of the nitrogen-doped carbon electrocatalyst.