Electronic Supplementary Information

Porous $Pt-NiO_x$ Nanostructure with Ultrasmall Building Blocks and Enhanced Electrocatalytic Activity for Ethanol Oxidation Reaction

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Fig. S1 EDS spectrum of $Pt-NiO_x/C$.



Fig. S2 A representative TEM image of the home-made Pt/C structure.



Fig. S3 A comparison of SAED patterns of $Pt-NiO_x/C$ and Pt-Ni/C. The dashed lines show the diffraction rings of carbon black and fcc crystalline structures.



Fig. S4 EDS spectrum of Pt-Ni/C.



Fig. S5 CO-stripping profiles of Pt-NiO_x/C, Pt-Ni/C and Pt/C catalysts at 20 mV·s⁻¹ in an aqueous solution of 0.5 M H_2SO_4 .