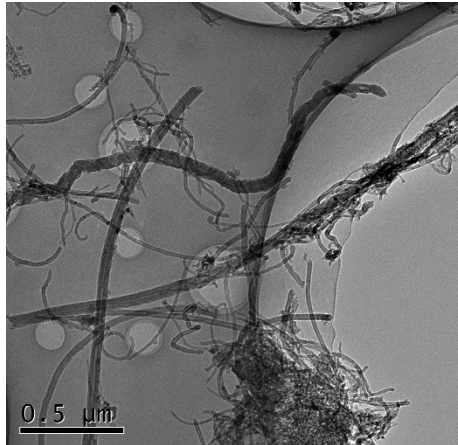
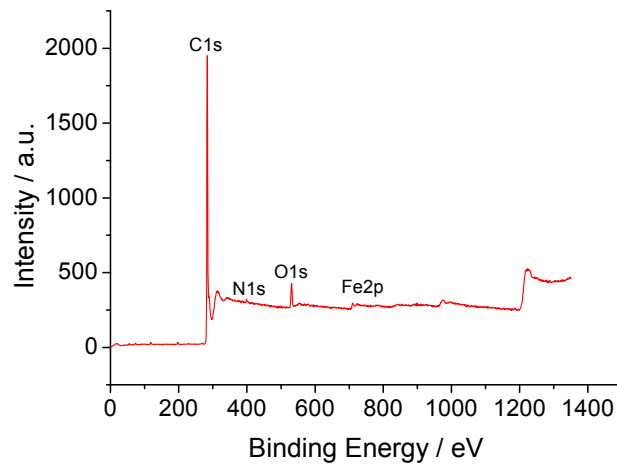


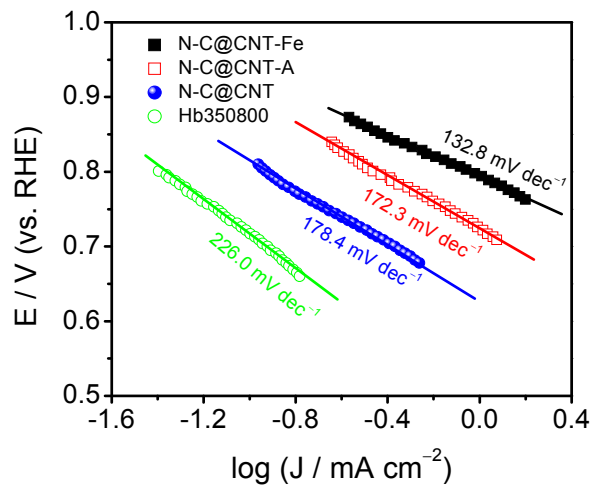
## Supplementary Materials



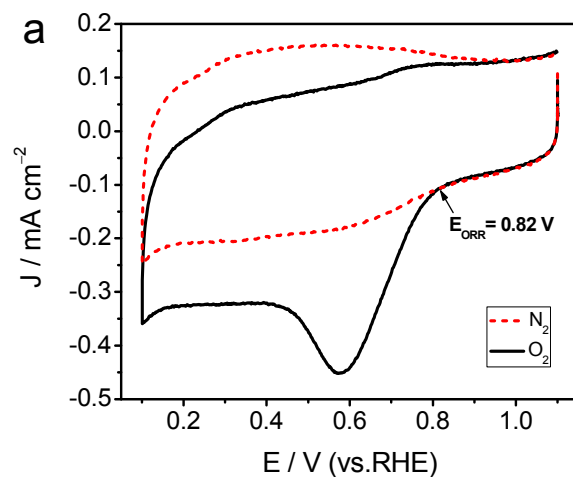
**Figure S1.** Low-resolution TEM image of N-C@CNT-Fe.



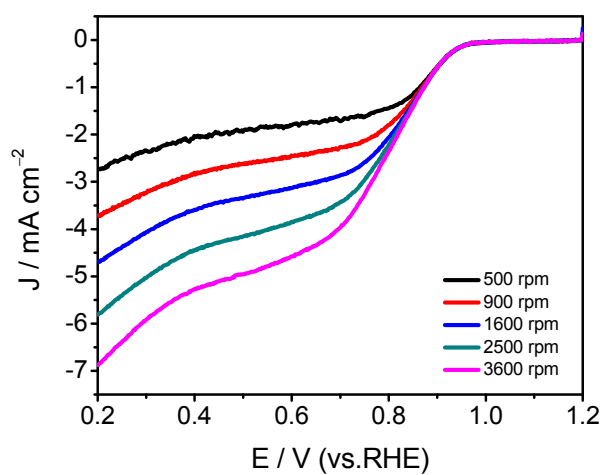
**Figure S2.** XPS survey of N-C@CNT-Fe catalyst.



**Figure S3.** Tafel curves of Hb350800, N-C@CNT, N-C@CNT-Fe and N-C@CNT-A for ORR in O<sub>2</sub>-saturated 0.1 mol l<sup>-1</sup> HClO<sub>4</sub> solution.



**Figure S4.** CV curve of N-C@CNT in O<sub>2</sub> and N<sub>2</sub>-saturated 0.1 mol l<sup>-1</sup> HClO<sub>4</sub> solution.



**Figure S5.** LSV curves for ORR of N-C@CNT-Fe in 0.1 mol l<sup>-1</sup> KOH solution at different rotation rates (400–3600 rpm).