Supplementary Data

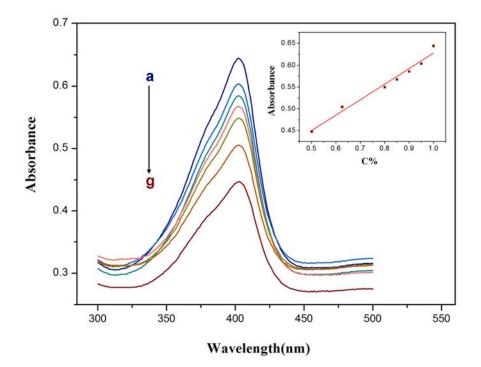


Fig. S1 UV–vis spectra of HRP solution with different concentration: (a) 0.2, (b) 0.19, (c) 0.18, (d) 0.17, (e) 0.16, (f) 0.125 and (g) 0.1 mg mL⁻¹. Inset: plot of absorption peak at 402 nm versus relative concentration of HRP.

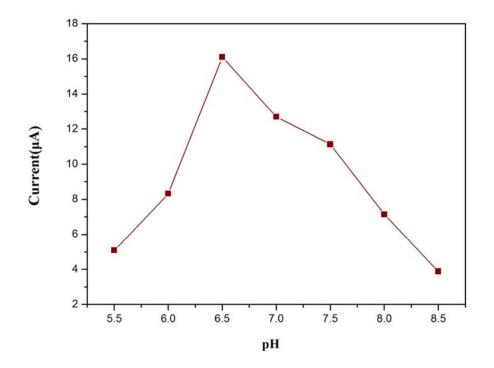


Fig. S2 Current response of Nafion/HRP/TN-3/ITO electrode to 100 μ M H₂O₂ in 0.1 M PBS with different pH values at -0.95 V.

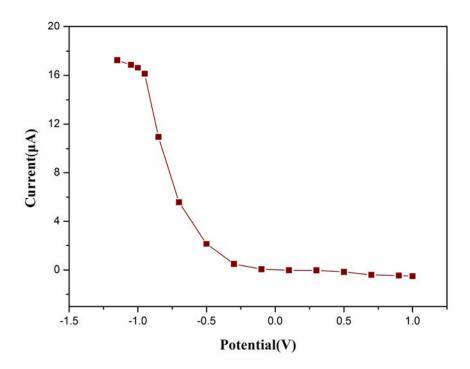


Fig. S3 Current response of Nafion/HRP/TN-3/ITO electrode to $100 \ \mu M \ H_2O_2$ in 0.1 M PBS with different applied voltage.

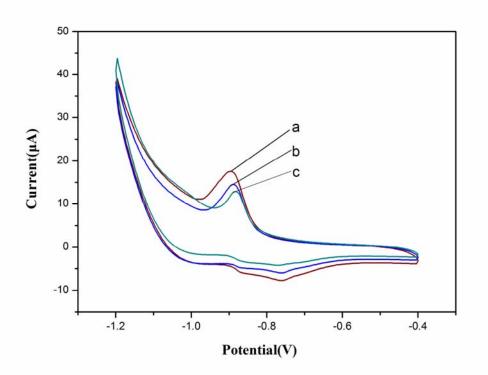


Fig. S4 CVs of (a) Nafion/HRP/TN-3/ITO electrode, (b) Nafion/HRP/TN-2/ITO electrode and (c) Nafion/HRP/TN-1/ITO electrode in 0.1 M PBS at a scan rate of 0.1 V s⁻¹.