

Electronic Supporting Information

Vertically aligned and ordered one-dimensional mesoscale polyaniline

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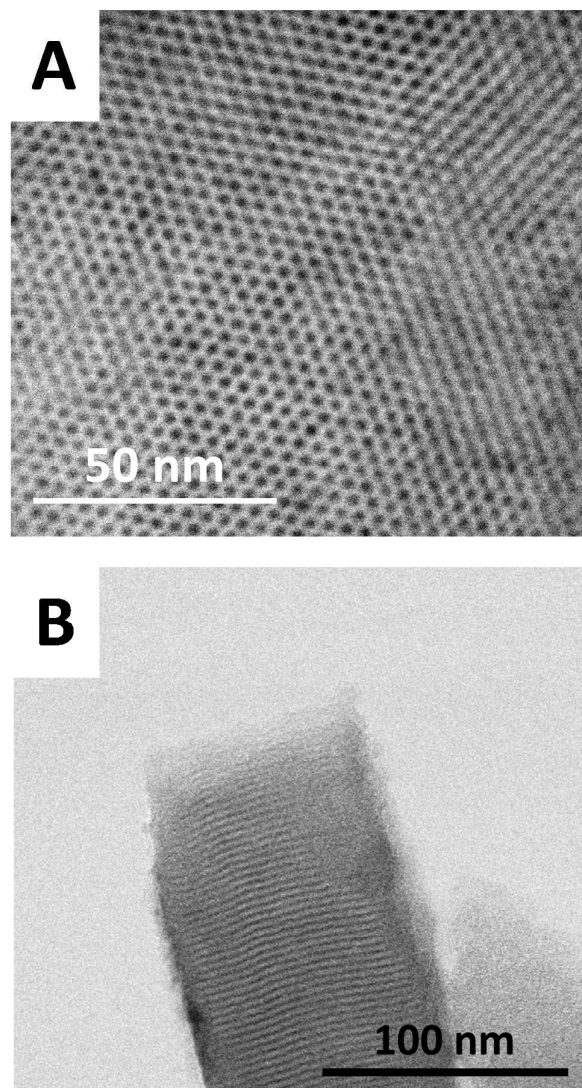


Figure S11: STEM micrographs of a mesoporous silica template (SiO₂-100): (A) top view and (B) cross-section.

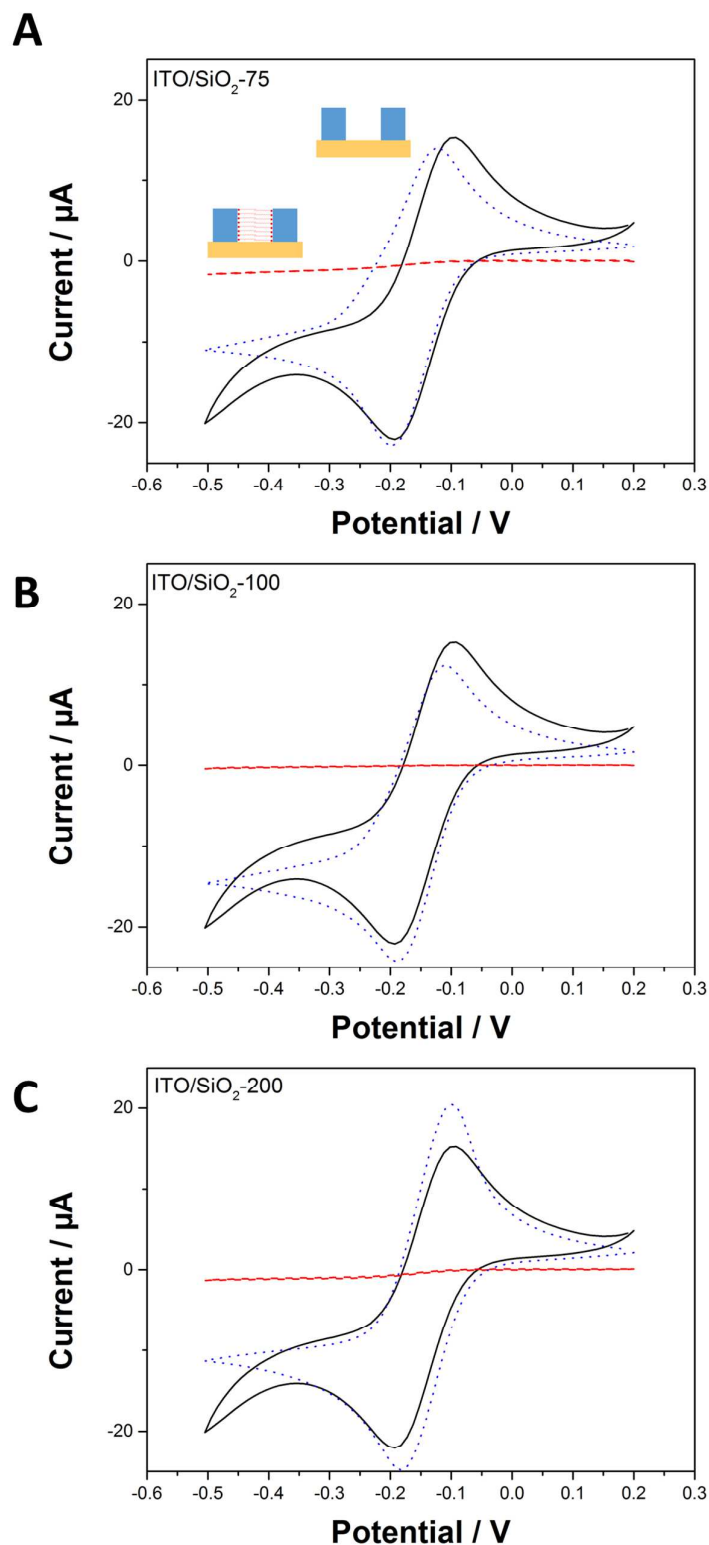


Figure S12: Cyclic voltammograms recorded in 1 mM $[\text{Ru}(\text{NH}_3)_6]^{3+}$ (+0.1 M NaNO_3) solution using ITO electrodes covered with mesoporous silica films prepared from sol solutions containing TEOS at various concentrations (A, 75 mM; B, 100 mM; C, 200 mM), respectively before (dashed red curves) and after surfactant removal (dotted blue curves); black curve is the response of bare ITO.

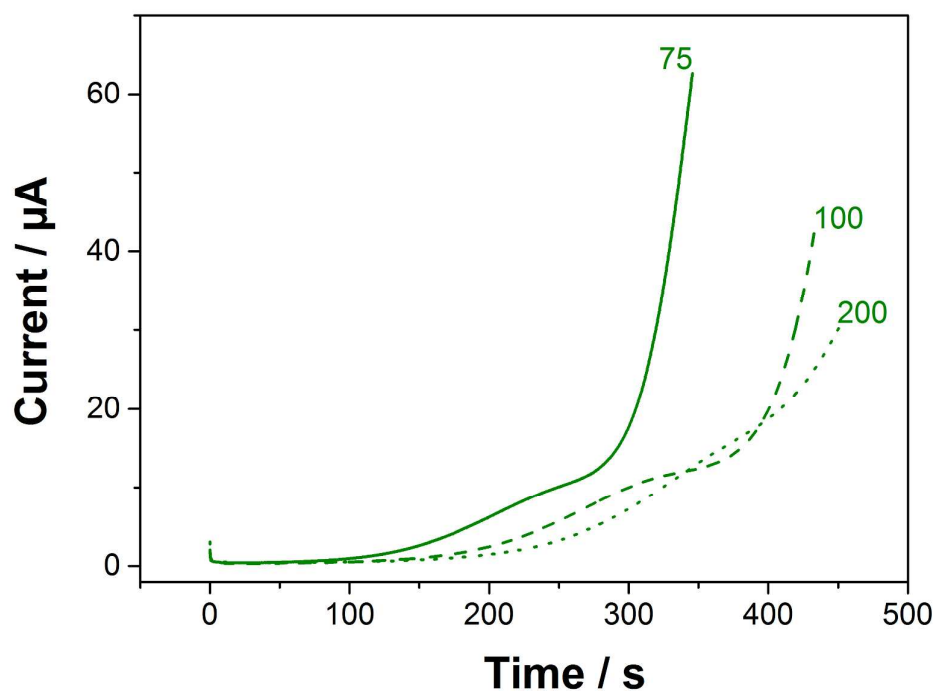


Figure SI3: Potentiostatic electropolymerization of PANI at ITO electrodes modified with SiO₂-75, SiO₂-100, and SiO₂-200 templates (up to $Q = 3\text{mC}$), as performed from a solution made of 0.1 M aniline in 0.5 M H₂SO₄, by applying a constant potential of +0.85 V.

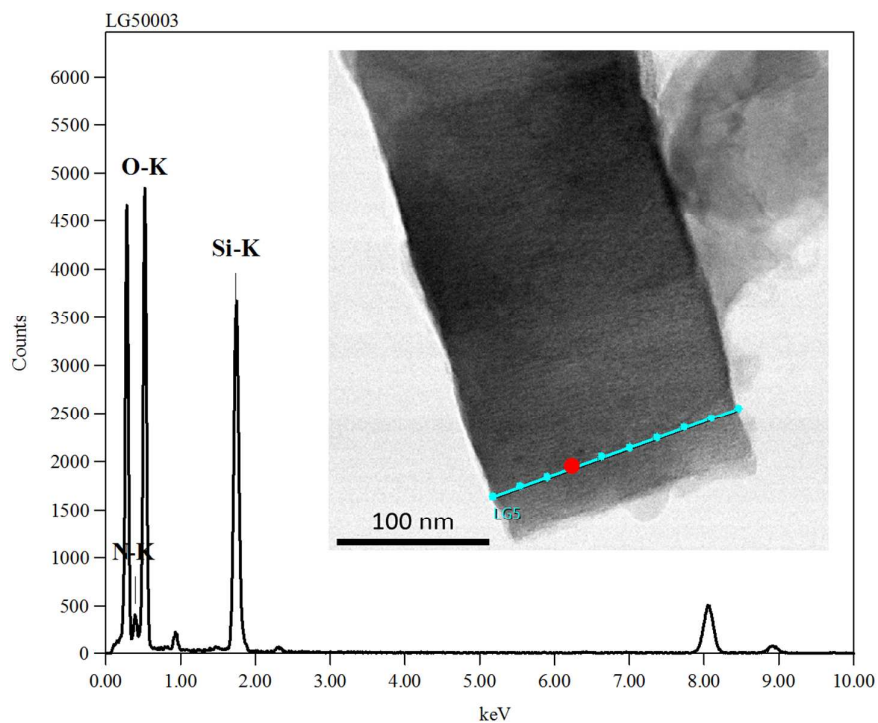


Figure SI4: Typical EDS spectra recorded at a localized place (red point on the blue line) on the cross-section TEM view for a SiO₂-200/PANI nanocomposite.