

Electronic Supplementary Information (ESI)-I

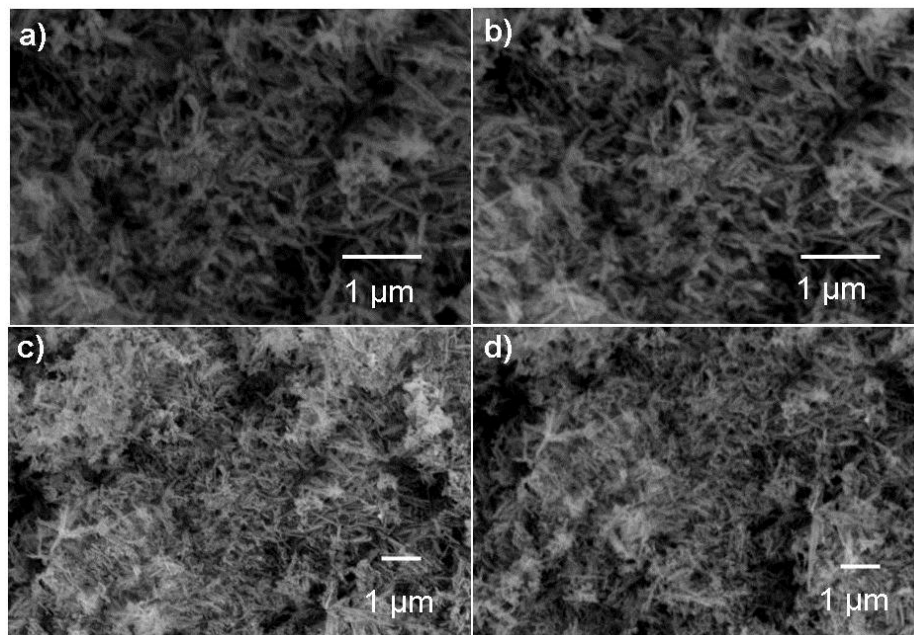


Figure S-I. SEM images of a) MC-5, b) MC-10, c) MC-20 and d) MC-50 (scale bar represents 1 μm)

ESI-2

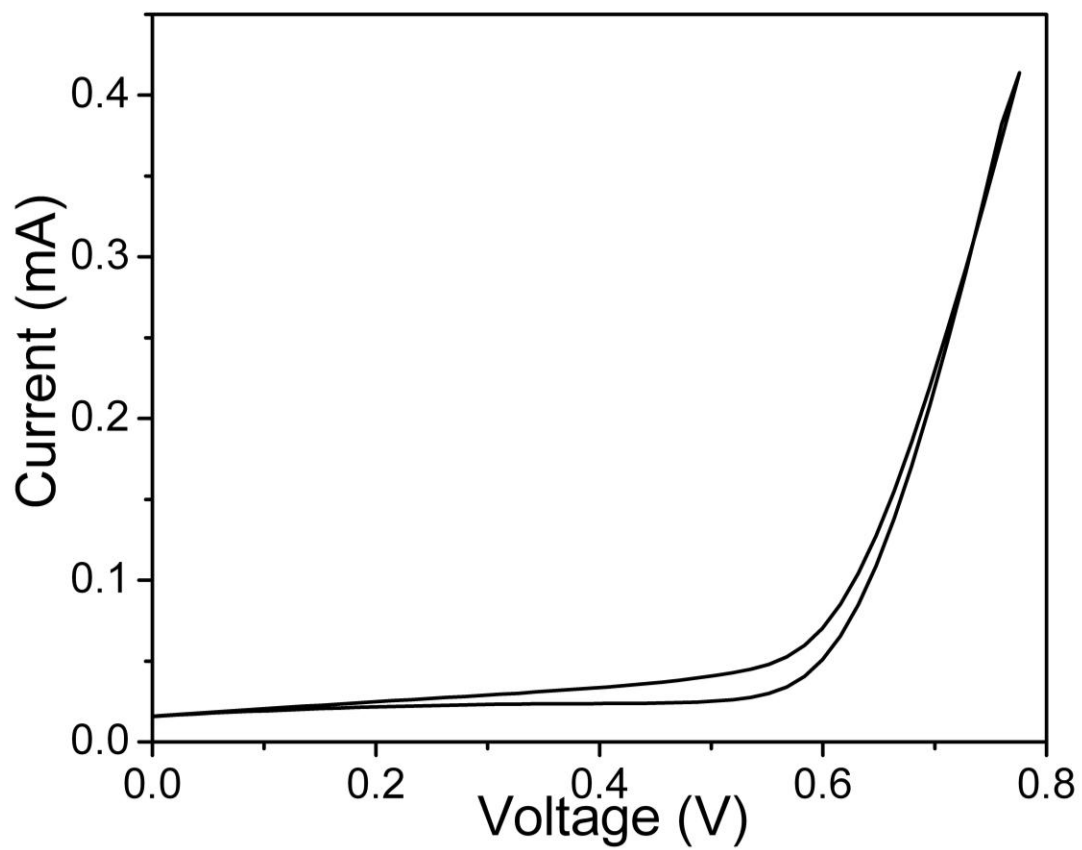


Figure S-2. Cyclic voltammetry curve of bare titanium substrate at 1 mVs⁻¹ scan rate.

ESI-3

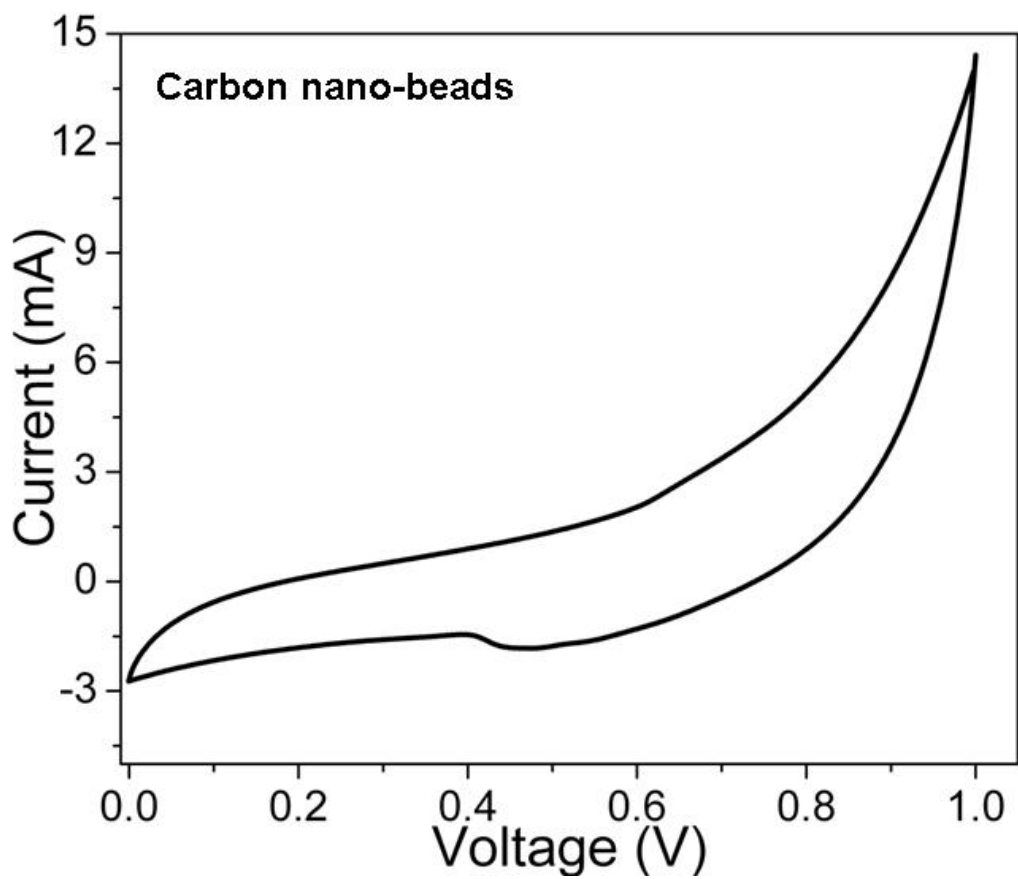


Figure S-3. Typical cyclic voltammetric curve of camphoric carbon nanobeads at 50 mVs^{-1} scan rate.

ESI-4

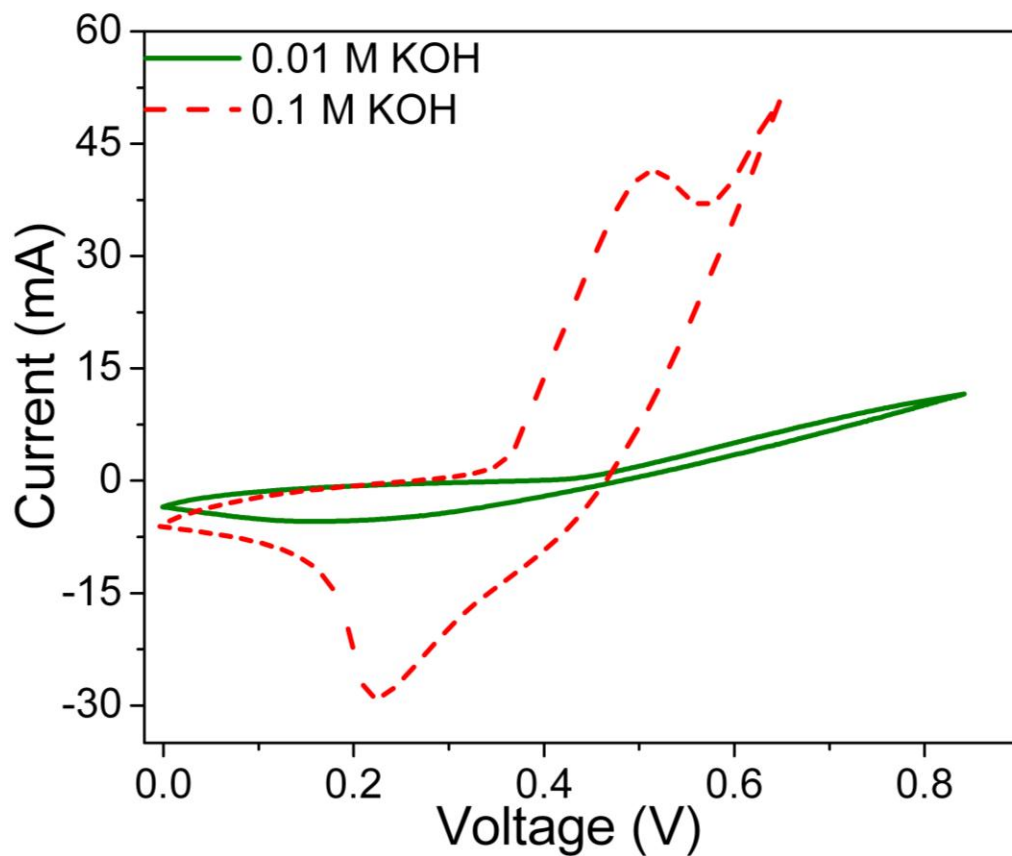


Figure S-4. CV curves of MC-10 electrode in different molar concentration KOH electrolyte at 10 mVs⁻¹ scan rate.

ESI-5

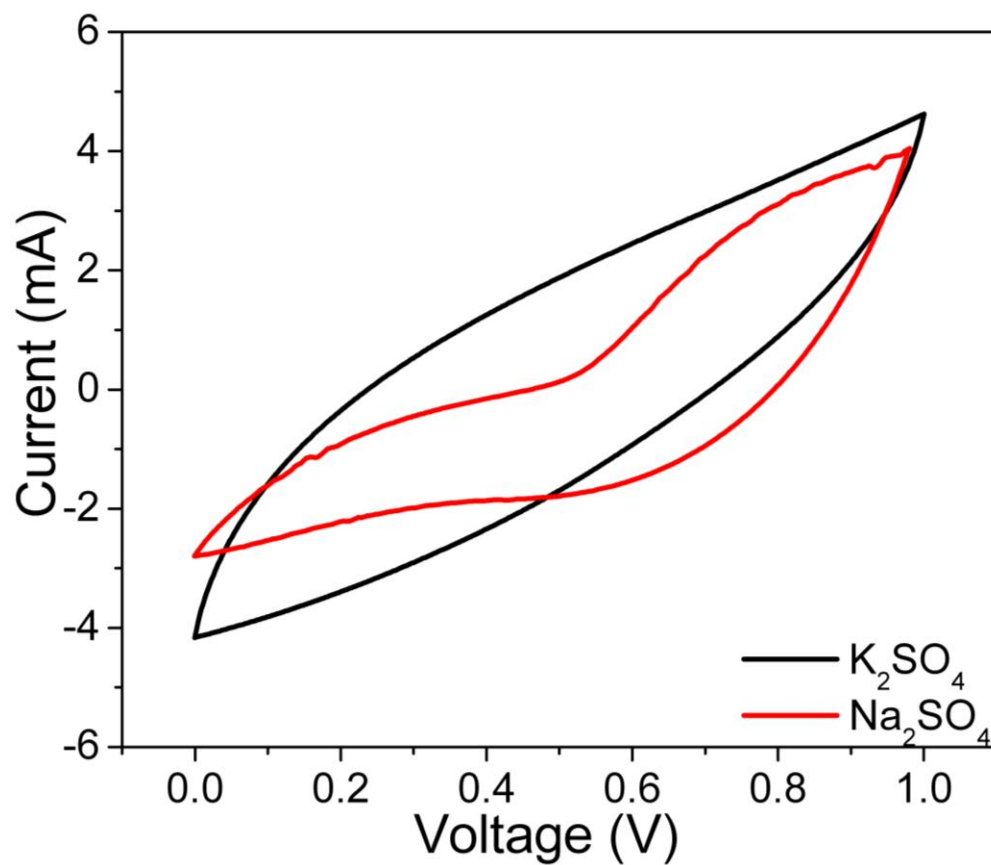


Figure S-5. CV curves in Na_2SO_4 and in K_2SO_4 electrolytes at 10 mVs^{-1} scan rate. The area under the CV curve in K_2SO_4 was found to be larger as compare to Na_2SO_4 which could be attributed lower hydrated radius of K^+ ions.

ESI-6

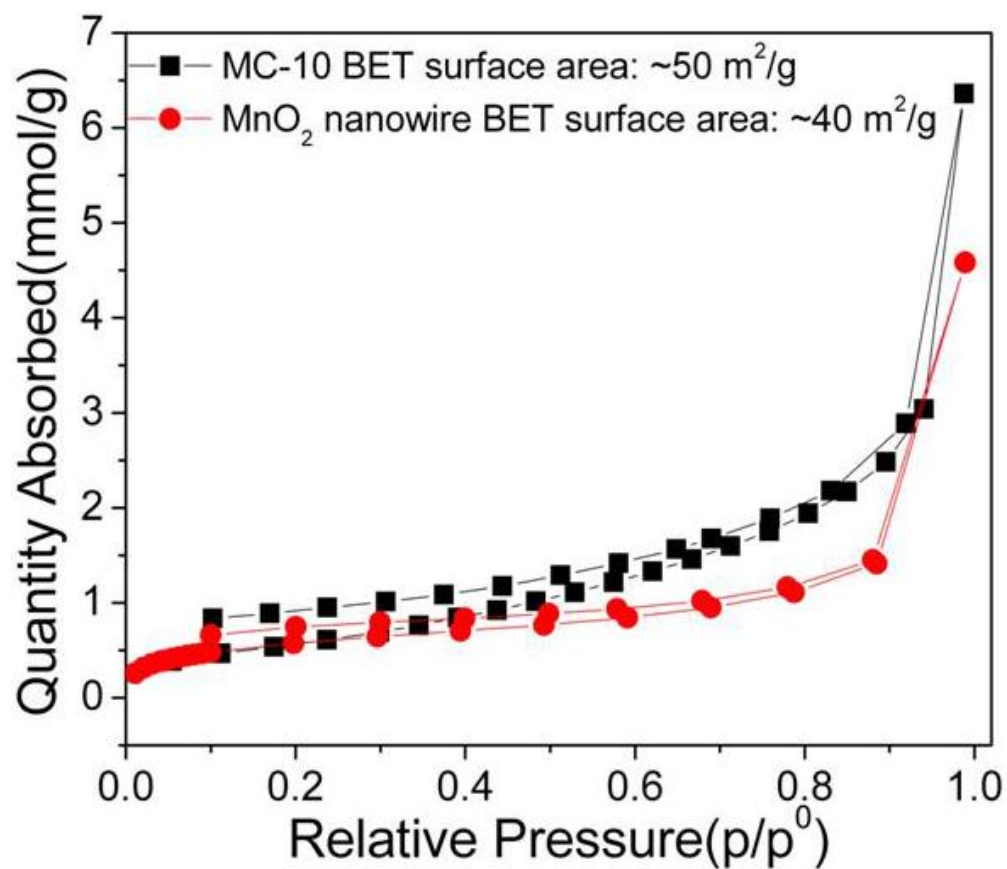


Figure S-6. BET analysis of MnO₂ nanowires and MC-10 electrodes.