

**Electronic Supplementary Information (ESI)**

**Ion adsorption on the Inner surface of Single-walled Carbon Nanotubes  
used as Electrodes for Electric Double-Layer Capacitors**

**Ayar Al-zubaidi,<sup>a</sup> Tsuyoshi Inoue,<sup>a</sup> Tomohiro Matsushita,<sup>a</sup> Yosuke Ishii<sup>a</sup> and Shinji Kawasaki<sup>\*a</sup>**

<sup>a</sup> Department of Materials Science and Engineering, Nagoya Institute of Technology, Gokiso-cho,  
Showa-ku, Nagoya, Aichi, 466-8555 Japan. Tel: +81-52-735-5221 Fax: +81-52-735-5221

\* Corresponding Author email: [kawasaki.shinji@nitech.ac.jp](mailto:kawasaki.shinji@nitech.ac.jp)

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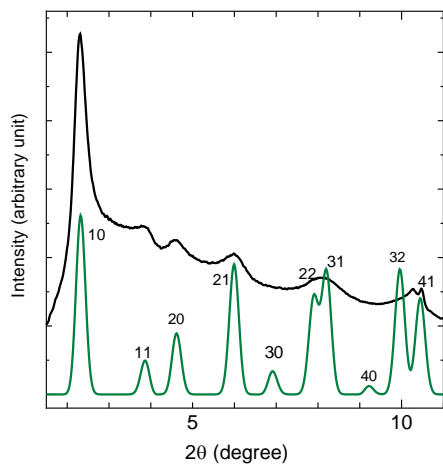


Figure S1. XRD for sample (A) SWCNTs

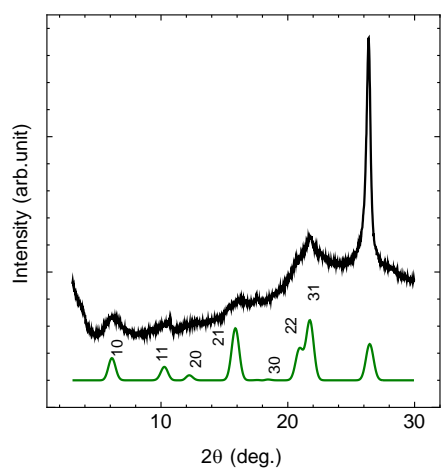


Figure S2. XRD for sample (B) SWCNTs

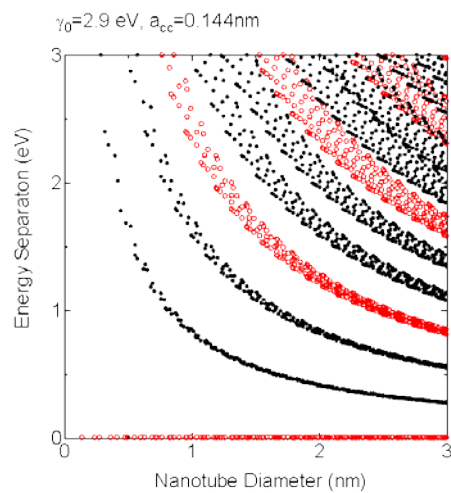


Figure S3. Kataura plot

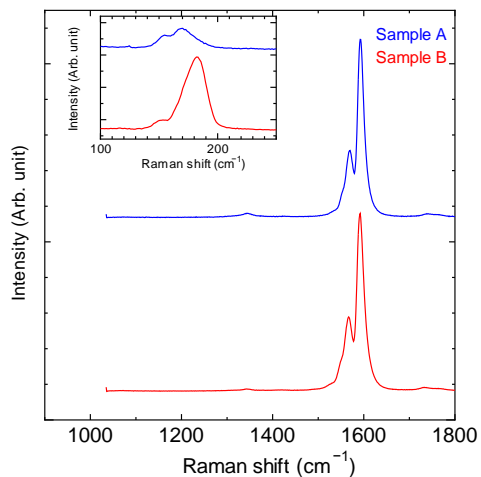


Figure S4. Raman spectra for open-end A and B SWCNTs

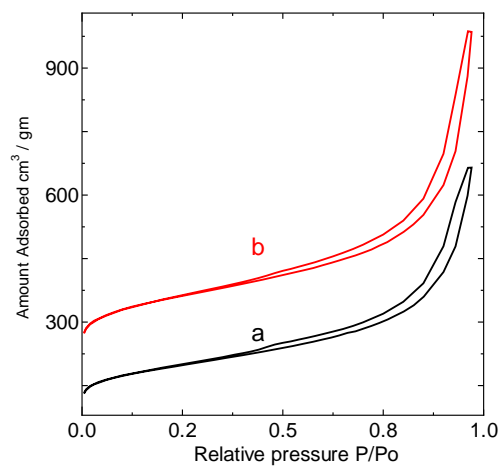


Figure S5. Nitrogen adsorption isotherms for A SWCNTs (a) closed-end (b) open-end

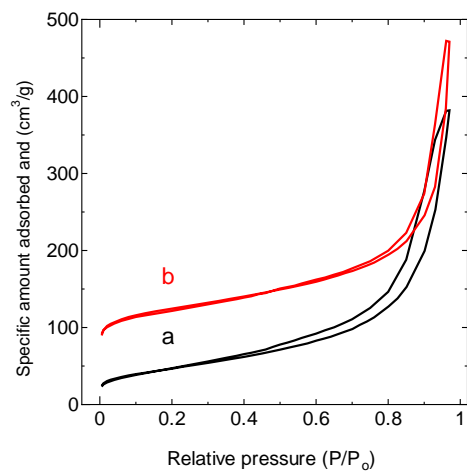


Figure S6. Nitrogen adsorption isotherms for B SWCNTs (a) closed-end (b) open-end

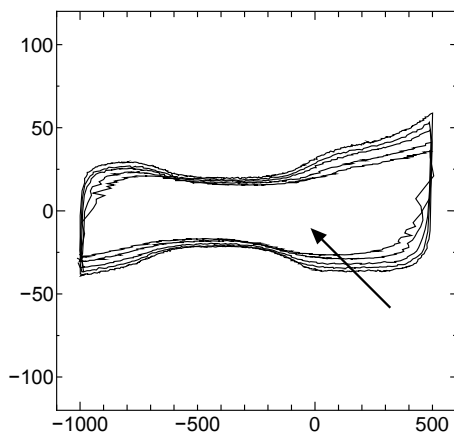


Figure S7. Cyclic Voltammograms depicting current (I) at scan rates ( $v$ ) of 5, 10, 20, 50, and 100 mV/s for closed-end sample A SWCNTs in TEMABF<sub>4</sub>/PC.

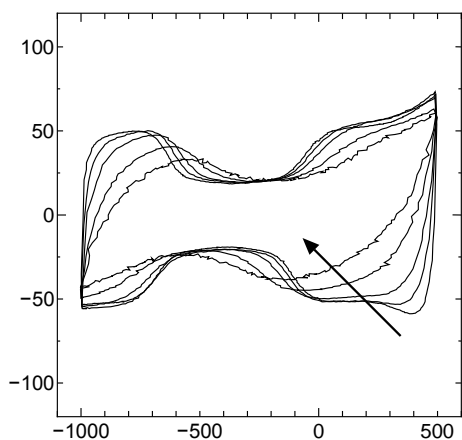


Figure S8. Cyclic Voltammograms depicting current (I) at scan rates ( $v$ ) of 5, 10, 20, 50, and 100 mV/s for open-end sample A SWCNTs in TEMABF<sub>4</sub>/PC.

**Table S1.** The Brunauer–Emmett–Teller (BET) surface area of the SWCNT samples used

B	Closed-end	Open-end
$S_{\text{BET}}$ [m <sup>2</sup> /g]	169	400
A	Closed-end	Open-end
$S_{\text{BET}}$ [m <sup>2</sup> /g]	629	1011

**Table S2.** The total ohmic resistance for both types of SWCNTs

	H <sub>2</sub> SO <sub>4</sub>	NaCl	TEMABF <sub>4</sub> /PC
Closed-end SWCNT	0.005	0.01	0.037
Open-end SWCNT	0.005	0.028	0.055