

Supplementary Data

Ultrahigh volumetric capacitance of squeezable three-dimensional bicontinuous nanoporous graphene

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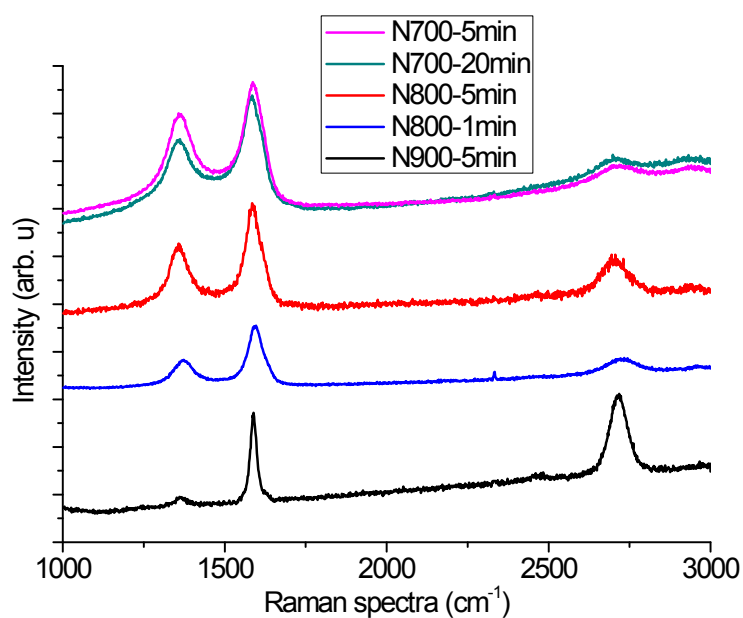


Figure S1. Raman spectra of the CVD-grown graphene samples with different CVD conditions.

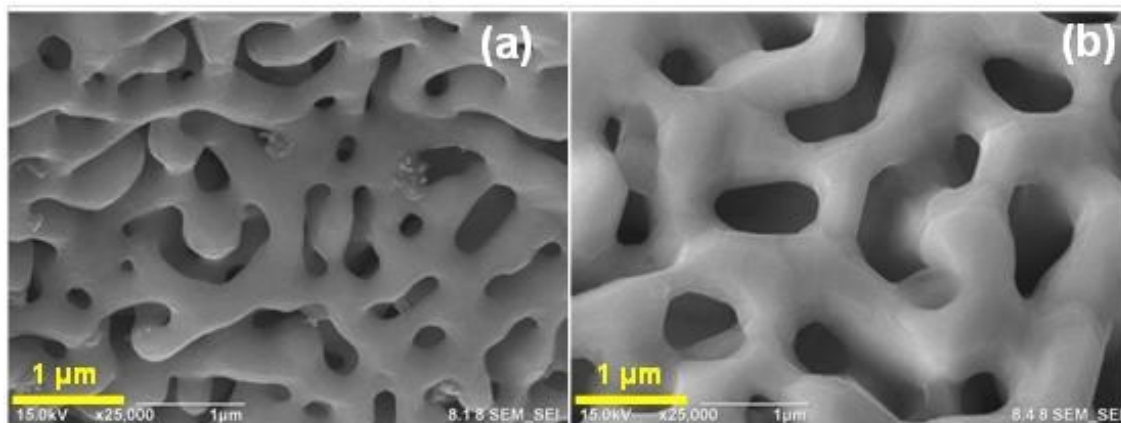


Figure S2. SEM micrographs of the np-graphene@np-Ni grown at: (a) 800 °C for 5 min; and (b) 900 °C 5 min).

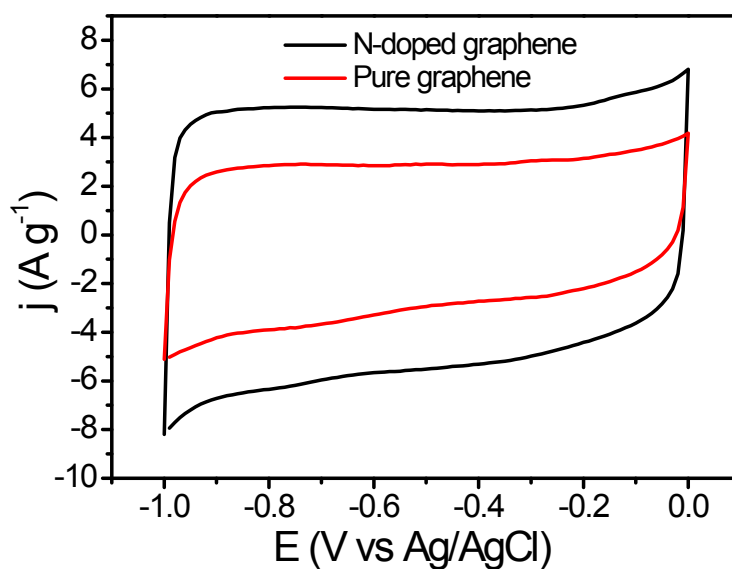


Figure S3. CV curves of the N-doped graphene and pure graphene grown at 800°C for 5 min. Scan rate: 100 mV s⁻¹. The two samples have a similar pore size. The obvious current response is solely from the N-doping effect.

Table S1. Comparison of the volumetric capacitance of the N-doped nanoporous graphene with previously reported carbon-based materials.

Materials	C_v (F cm⁻³)	Electrolyte	Reference
self-assembled porous monolithic graphene	376	6M KOH	1
Low-temperature treated graphene	470	6M KOH	2
liquid-mediated dense graphene	~250	1M H ₂ SO ₄	3
vacuum-assisted self-assembled graphene	177	(EMIM BF ₄) in acetonitrile	4
graphene/carbon nanotube composite	165	1 M tetraethyl ammonium tetrafluoroborate (TEABF ₄)	5
seaweeds carbon	180	1M H ₂ SO ₄	6
ordered mesoporous carbon	107	6M KOH	7
carbon sphere	170	1M KOH	8
N-doped nanoporous graphene	~300	2M KOH	This work

References in Table S1

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