Systematic tuning of pore morphologies and pore volumes in macroporous materials by freezing

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Electronic Supporting Information
**Fig. S1** The random porous structure of SCMC by freezing a 1wt % SCMC aqueous solution in a freezer and then freeze drying.
Fig. S2 Pore size distribution of emulsion-templated porous SCMC as measured by mercury intrusion porosimetry at different volume percentage of internal phase in the emulsions. (A) 0 v/v %. (B) 20 v/v %. (C) 40 v/v %. (D) 60 v/v %. (E) 75 v/v %.
**Fig. S3** The porous surface of silica beads calcined from PVA-HS30 beads.
Fig. S4 Porous zirconia/PVA composites with tuned pore morphology and porosity, prepared from emulsion-templated PVA beads. (A) 0 v/v %. (B) 20 v/v. (C) 40 v/v %. (D) 60 v/v. (E) 75 %.