

Electronic Supporting Information

Flexible Aerogels based on Interpenetrating Network of Bacterial Cellulose and Silica by a Non-Supercritical Drying Process

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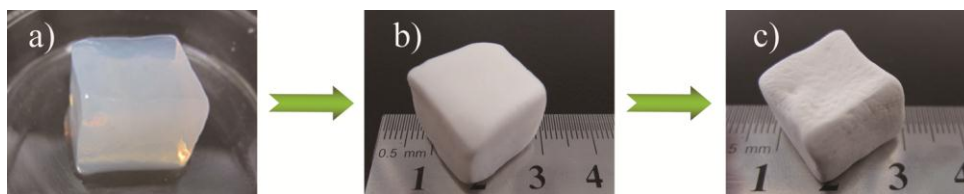


Fig. S1 Photographs of a) BC hydrogel, b) BC matrix and c) BC-silica CAs (SiO_2 about 90% w/w, Run 5).

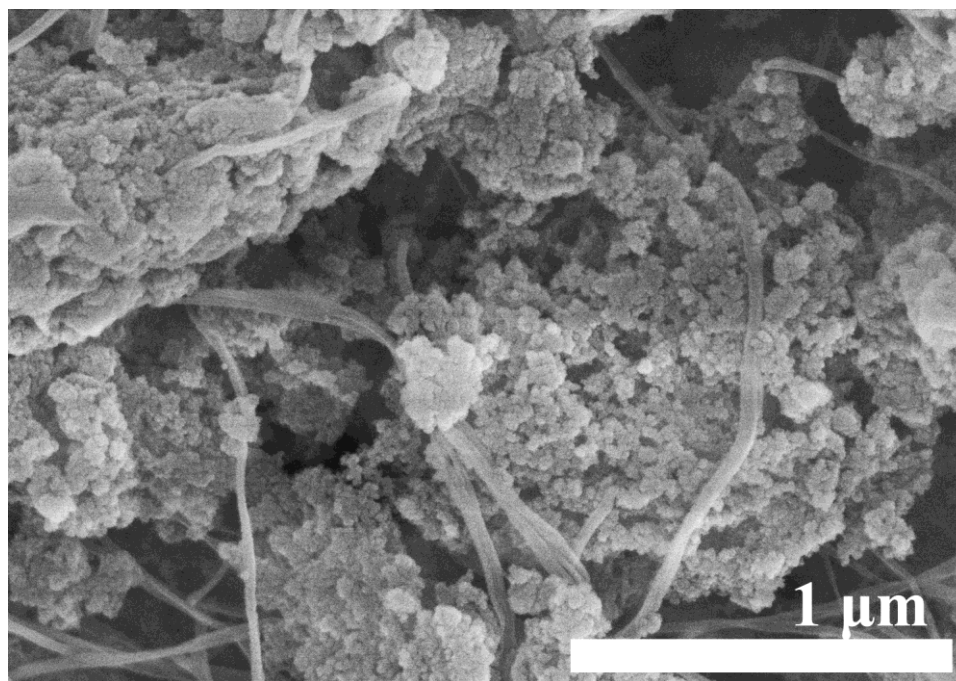


Fig. S2 SEM image of BC-silica CAs (SiO_2 about 90% w/w, Run 5)

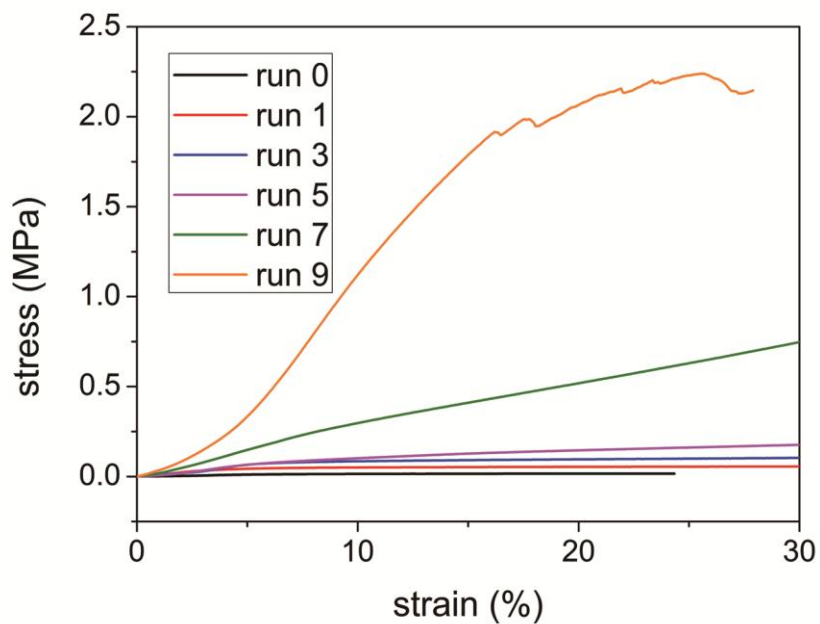


Fig. S3 The stress-strain curves of pure BC matrix and BC-silica CAs.

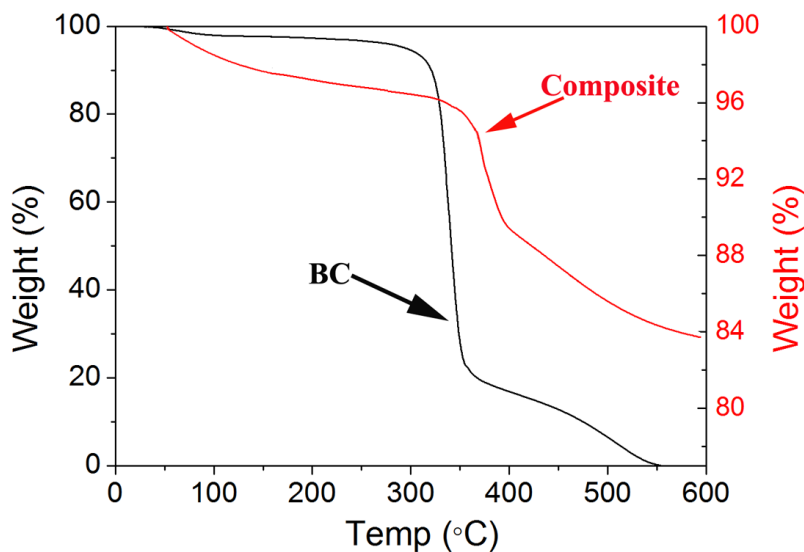


Fig. S4 Thermogravimetry analysis (TGA, 10 °C min⁻¹ heating) curve of pure BC matrix (run 0) and CAs (run 5). The soft slope weight decrease from 50 °C to 300 °C is caused from adsorbed water.

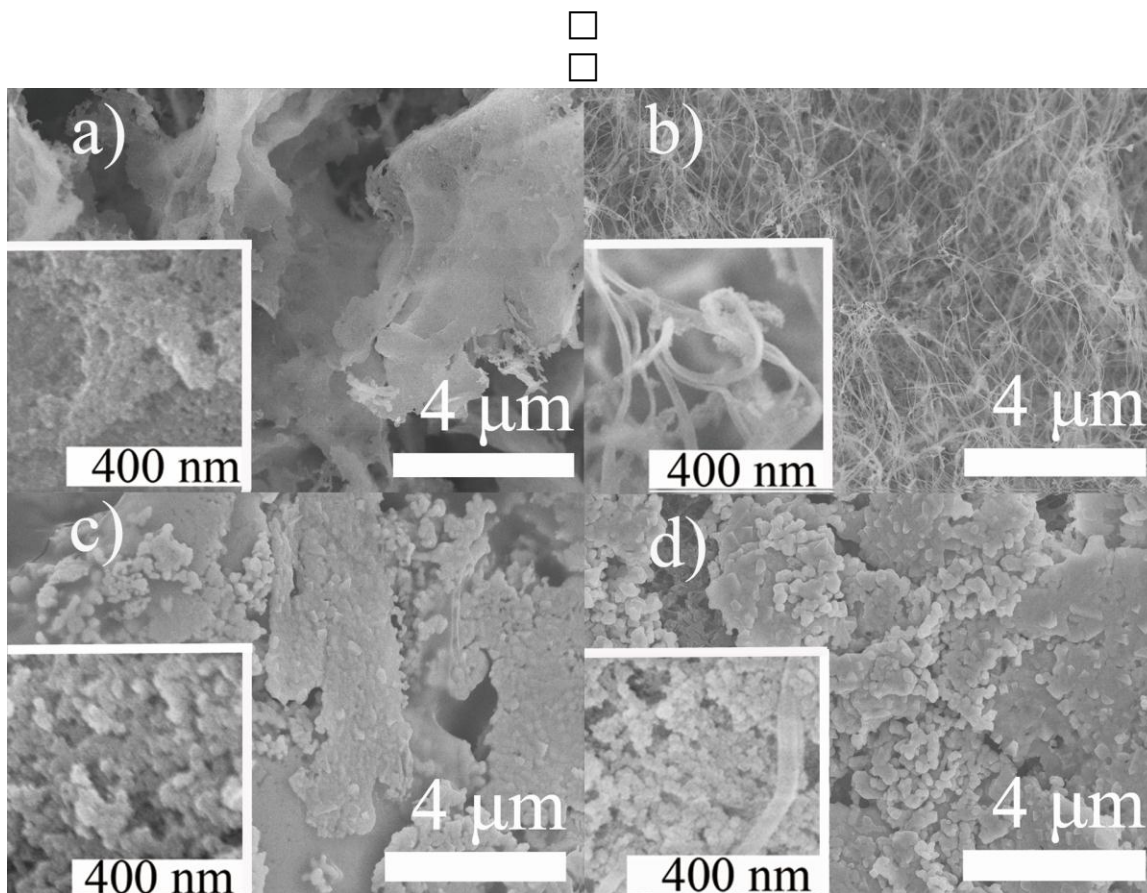


Fig. S5 Magnified image of Fig. 3: a) and b) are silica aerogels and CAs based on 0.19 mol L⁻¹ TEOS respectively. c) and d) are silica aerogels and CAs based on 1.68 mol L⁻¹ TEOS respectively.

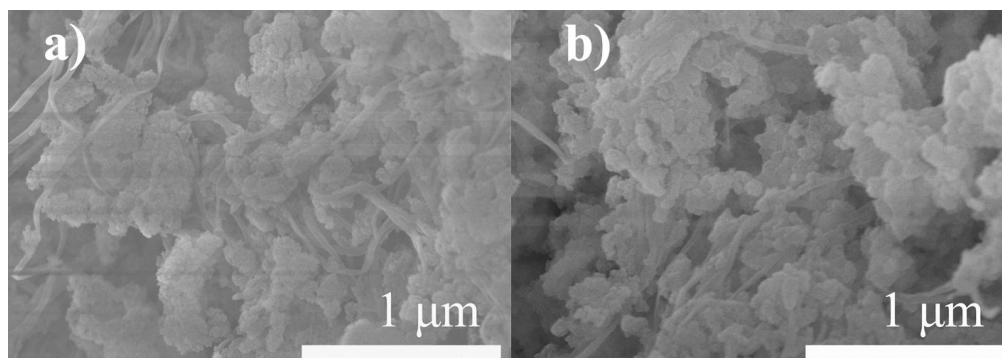


Fig. S6 The SEM images of CAs (SiO₂ about 90% w/w, Run 5) a) before and b) after hydrophobization treatment.