Supporting Information

Particles with Coordinated Patches and Windows from Oil-in-Water Emulsions

by Cho et al.

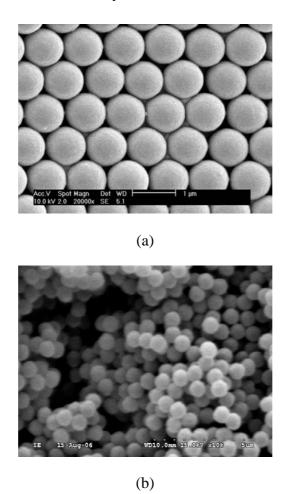


Figure S1. Electron microscope images of building block particles for PS patchy particles. (a) Scanning electron micrograph of 830-nm cross-linked PS microspheres (Sulfonated, Scale bar is 1 μ m) (b) Scanning electron micrograph of 800-nm cross-linked PS microspheres (Amidinated, Scale bar is 5 μ m)

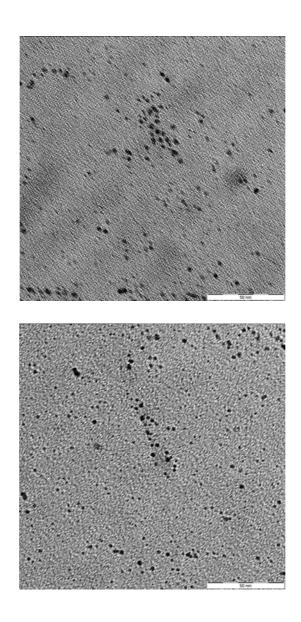
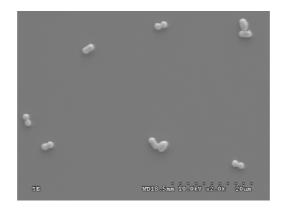
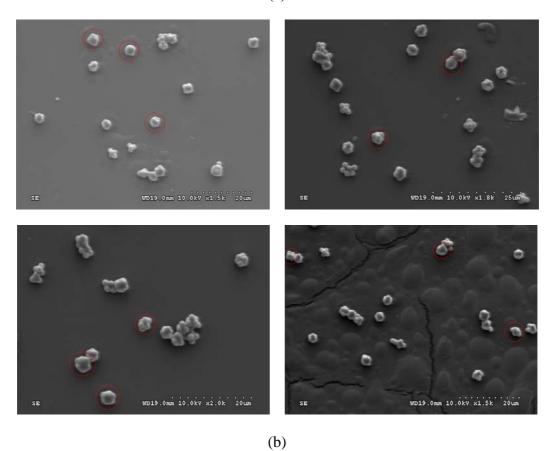


Figure S2. TEM images of 4-nm gold nanoparticles (Scale bar is 50 nm.)



(a)



(0,

Figure S3. (a) Scanning electron micrograph of patchy particles of silica micro-clusters encapsulated PS homopolymers for n = 2 and (b) for various n with some non-minimal second moment structures.

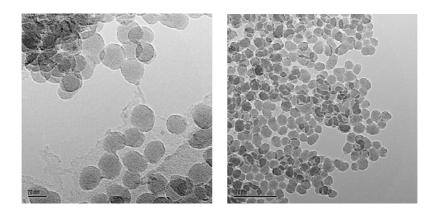
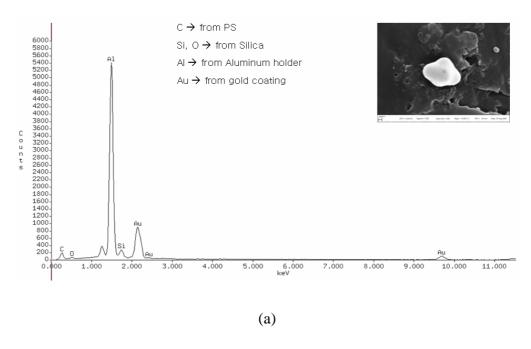


Figure S4. Transmission electron micrographs of 30-nm organo-silica nanoparticles (Scale bars are 20 and 100 nm, respectively.)



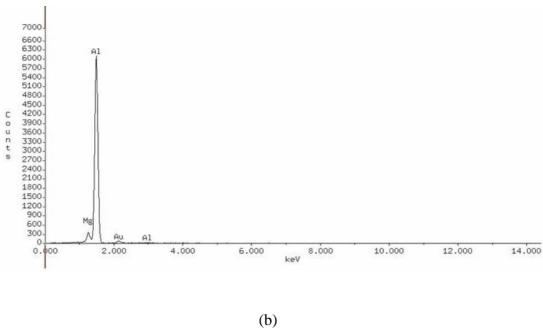


Figure S5. Elemental analysis of the composite particles: (a) EDS result of composite particle of PS microspheres and silica nanoparticles, (b) EDS result of aluminum holder without samples

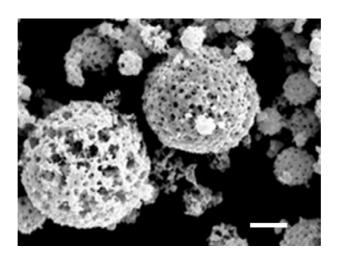


Figure S6. SEM image of hollow gold architectures obtained from gold nanoparticles and polystyrene microspheres (Scale bar is 3 μ m.)

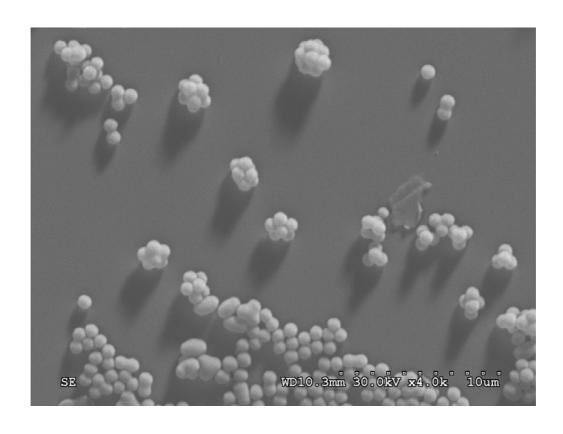
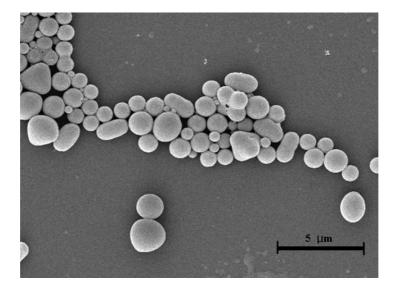
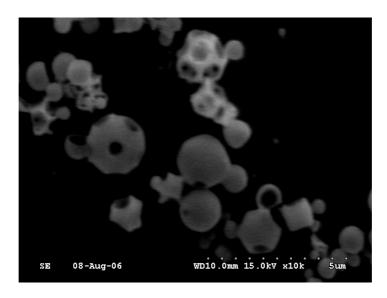


Figure S7. SEM image of PS patchy particles produced from polydisperse emulsion droplets (Scale bar is 10 µm.)



(a)



(b)

Figure S8. SEM images of PS composite particles and their inverse clusters produced from polydisperse emulsion droplets (Scale bars are 5 μm .)