

SUPPORTING INFORMATION

Optical Properties of Anisotropic Core-Shell Pyramidal Shaped Particles

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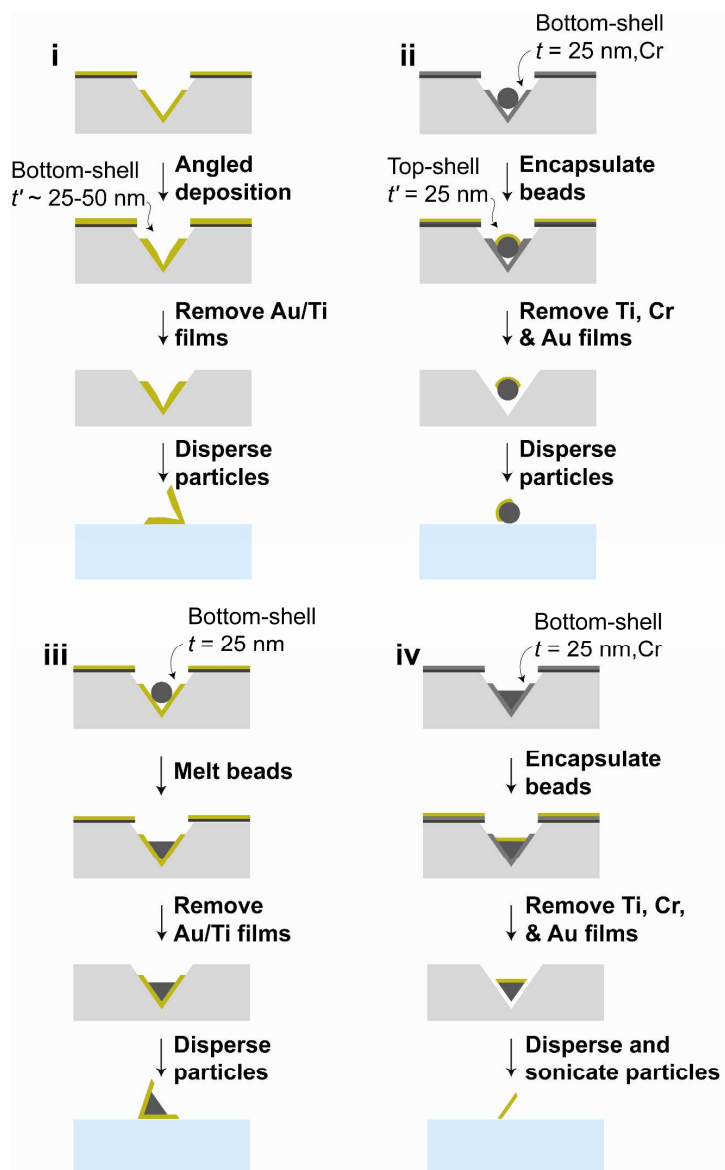


Figure S1. Schematic diagrams of the fabrication of individual core-shell components: (i) Au bottom-shell; (ii) spherical PS bead with Au top-shell; (iii) Au bottom-shell with melted PS; and (iv) flat Au top-shell.

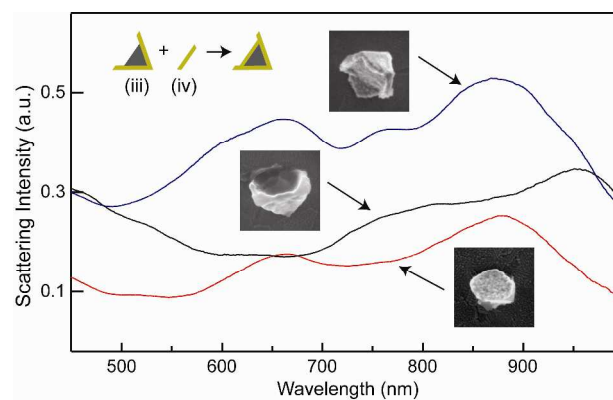


Figure S2. Single-particle scattering spectra from Fig. 2 and Fig. 3B under $n = 1.51$.

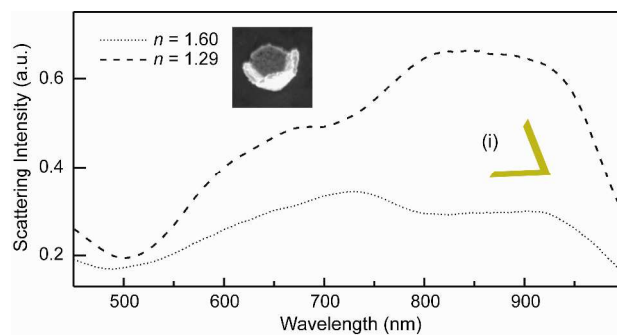


Figure S3. Single-particle scattering spectra of (i) Au bottom-shells under bulk $n = 1.29$ and 1.60. SEM image are 600 x 600 nm.

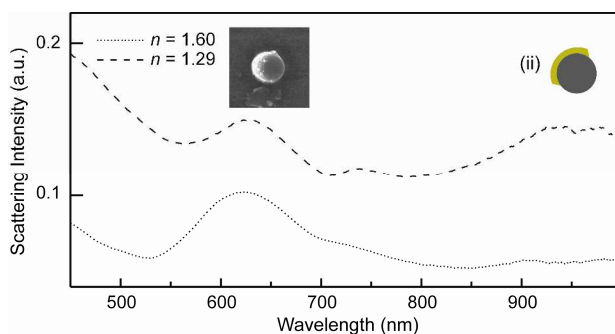


Figure S4. Single-particle scattering spectra of (ii) spherical PS bead with Au top-shell under bulk $n = 1.29$ and 1.60. SEM image are 600 x 600 nm.

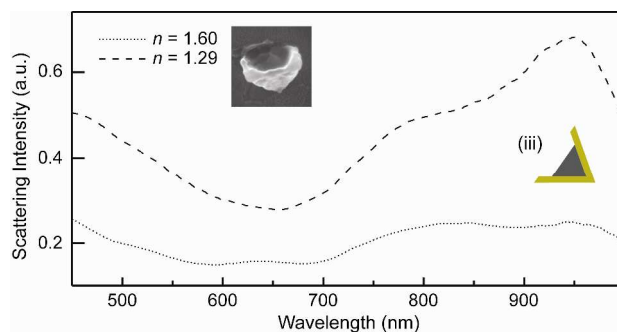


Figure S5. Single-particle scattering spectra of (iii) Au bottom-shell with melted PS bead under bulk $n = 1.29$ and 1.60 . SEM image are 600×600 nm.

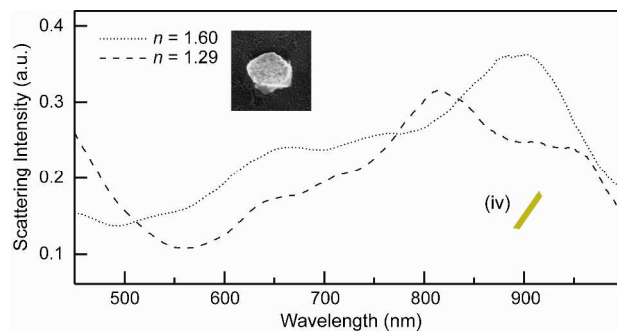


Figure S6. Single-particle scattering spectra of (iv) flat Au top-shell under bulk $n = 1.29$ and 1.60 . SEM image are 600×600 nm.

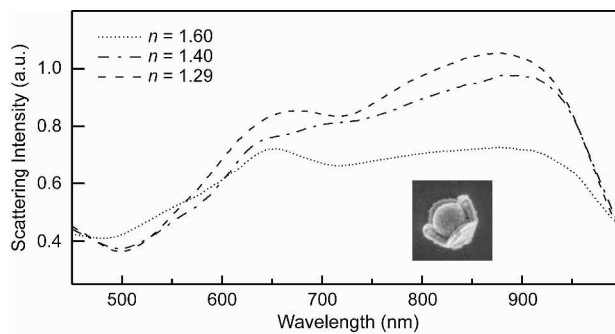


Figure S7. Refractive index response of Au-SiO₂-Au particles under different refractive indices ($n = 1.29, 1.40$, and 1.60). SEM image is 600×600 nm.