

Supporting Information:



Figure S1. Left: Photography of bipyramid colloidal solution. Right: Photography of a slide with PSS capped deposited bipyramids

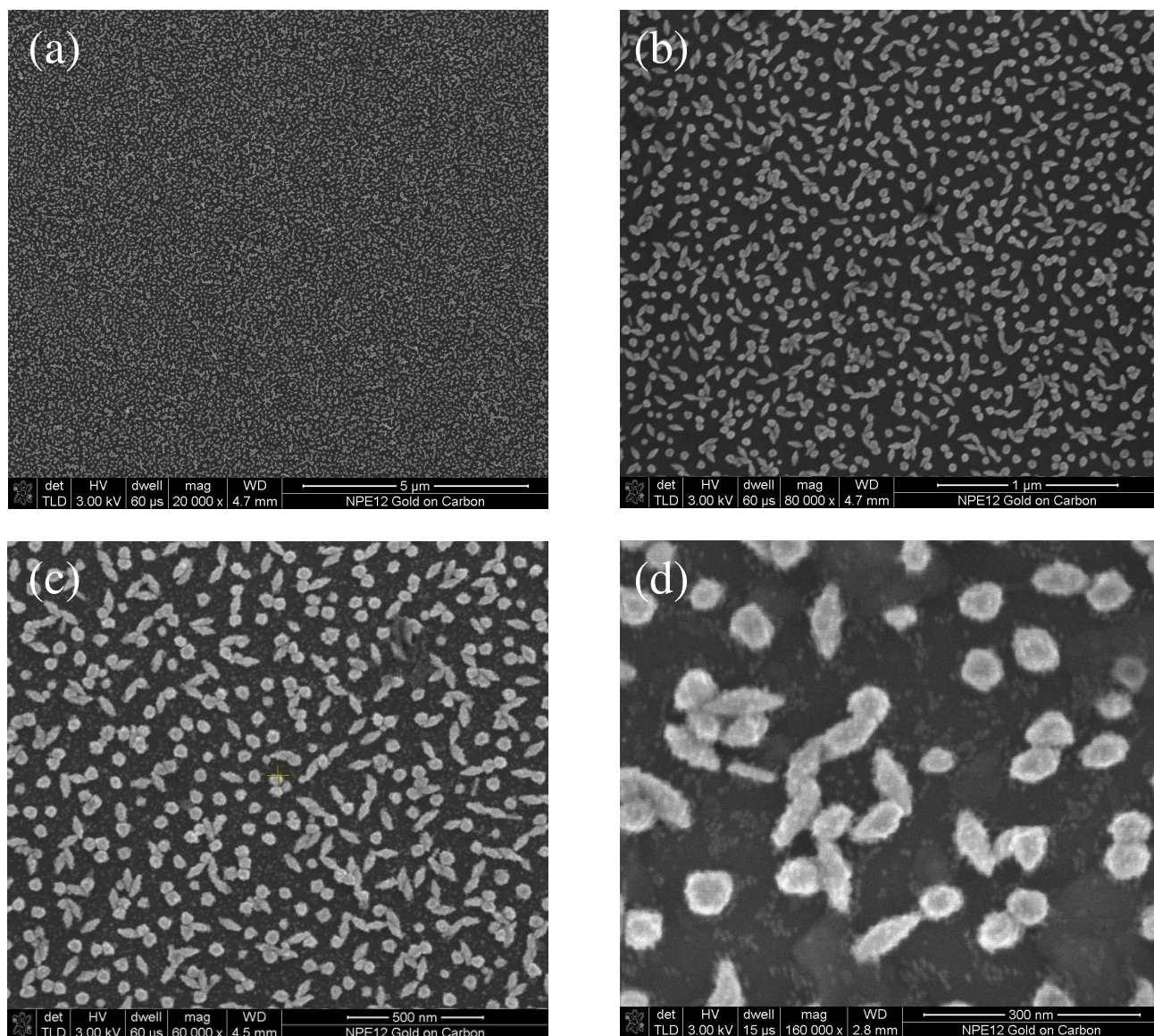


Figure S2. (a-b): SEM pictures of PSS capped gold nanoparticles deposited on a silicon substrate. Magnifications are 10 000 X and 40 000 X. (c-d): SEM pictures of deposited gold nanoparticles with anchored quantum dots. Magnifications are 30 000 X and 80 000 X.

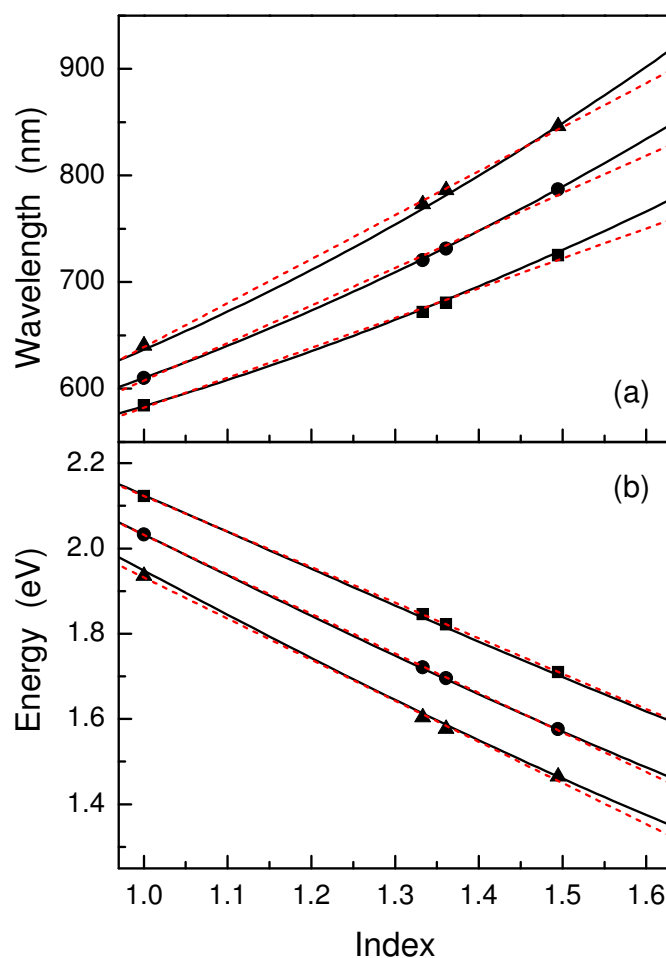


Figure S3. Calculated SPR wavelength (a) and energy (b) of prolate ellipsoids in the quasi-static model for several aspect ratio ($R = 3$ (■), 3.5 (●) and 4 (▲)) as a function of the optical index of an homogeneous environment (air, water, ethanol and toluene). The dotted lines represent linear fits of the computed data. The full lines are the Plasmon resonance calculated using a smooth fitted curve of literature data (ref.21) for the real part of the gold dielectric constant.^{6, 23}