

Supplementary Material, Fig S-1. Plasmon shift assays to analyze gold nanoparticle stability in presence of NaCl. The gold nanoparticles were analyzed in UV/VIS/NIR spectrophotometer for stability in presence NaCl, using scanning wavelength range (400-800nm). <u>A</u>-Water Blank. <u>B</u>-Normal gold nanoparticles in water (colloidal form λ -max 525). <u>C</u>-Gold nanoparticles, added 125mM NaCl (stability changed λ -max > 525). <u>D</u>-Gold nanoparticles, added 250mM NaCl (stability changed, start aggregating). <u>E</u>-Gold nanoparticles, added 500mM NaCl (stability changed, more aggregation). <u>F</u>-Gold nanoparticles, added 1M NaCl (stability changed, complete aggregation).