Supplementary Material (ESI) for Nanoscale

N,N-Dimethylformamide-Stabilized Gold Nanoclusters as a Catalyst for the Reduction of 4-Nitrophenol

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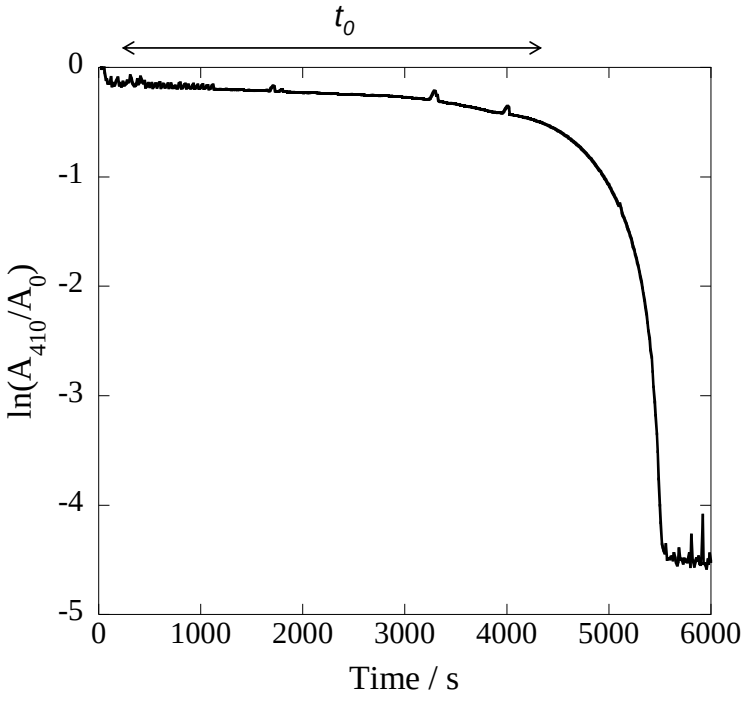

Figure S1. Plot of $\ln(A_{410}/A_0)$ versus time for the reduction of PNP in water over DMF-stabilized Au NCs with an excess amount of $NaBH_4$ in aqueous media at 298K. (Reaction conditions: [Au] = 1μM (based on amount of gold atoms), [$NaBH_4$] = 0.2 M, and [PNP] =1 $\times 10^{-4}$ M. Before the experiment, we used the degassing sample solution by N_2 gas.

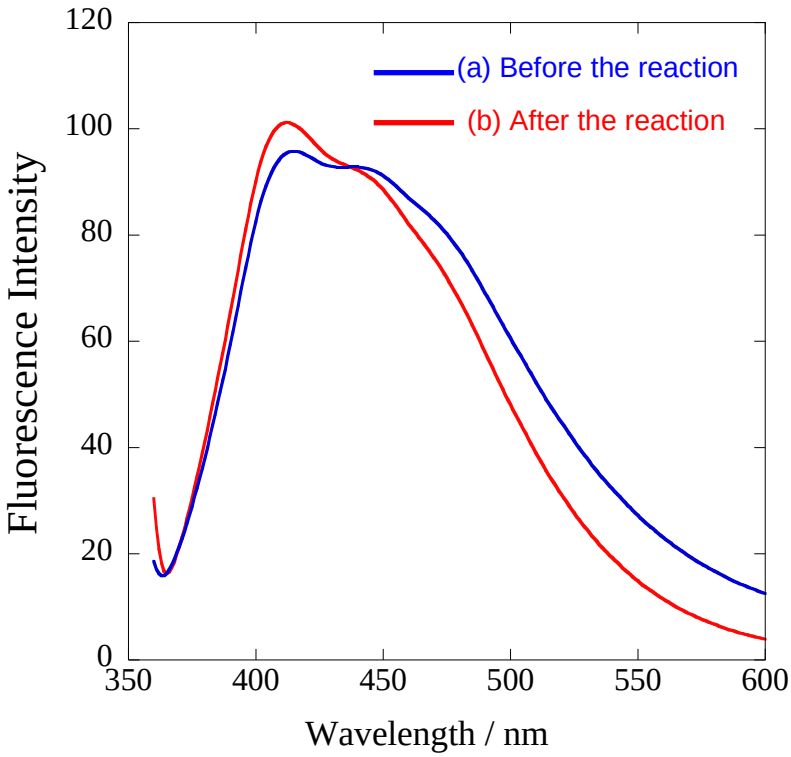

Figure S2. Fluorescence spectra of the DMF-stabilized Au NCs in water (a) before the reaction and (b) after the reaction.

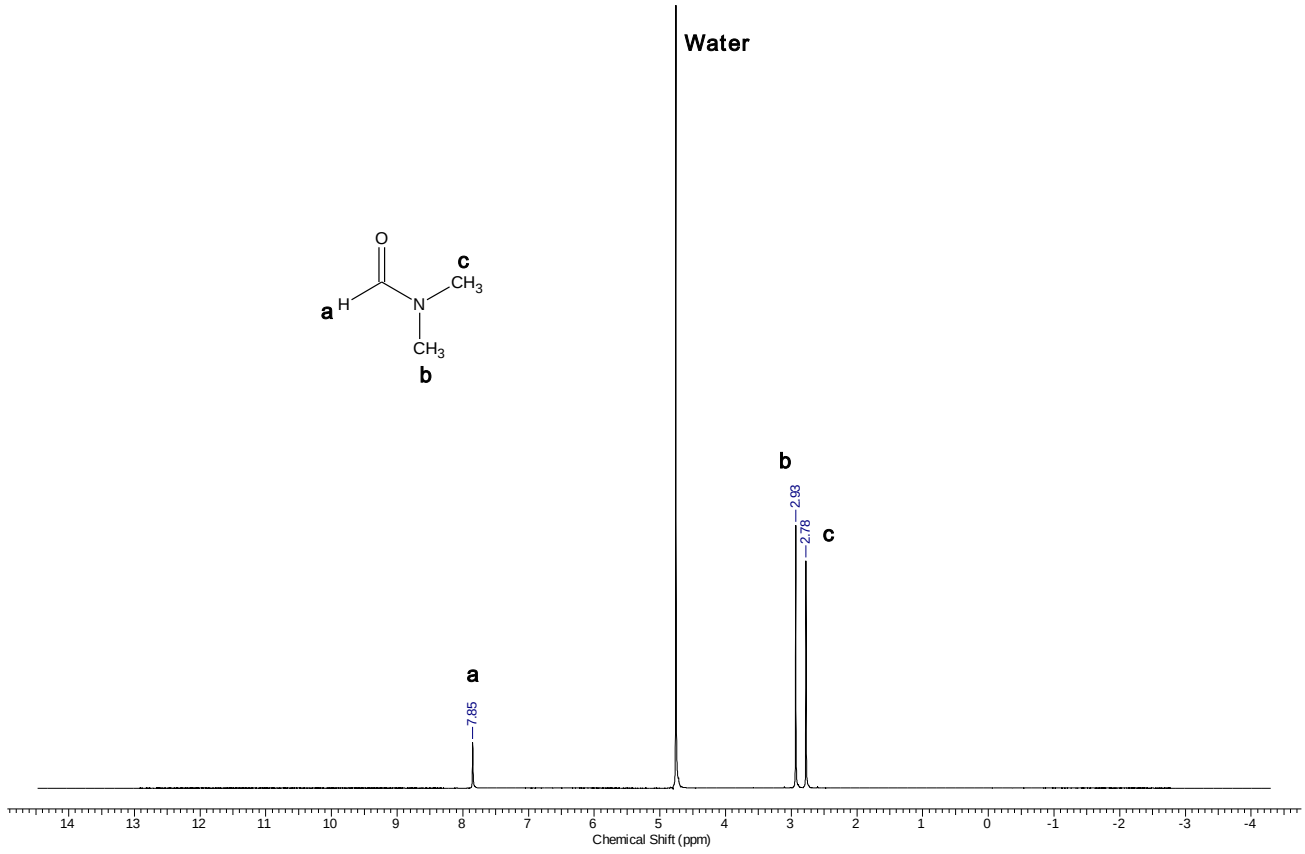

Figure S3. The H^1-NMR spectrum of 0.1 M DMF in D_2O.

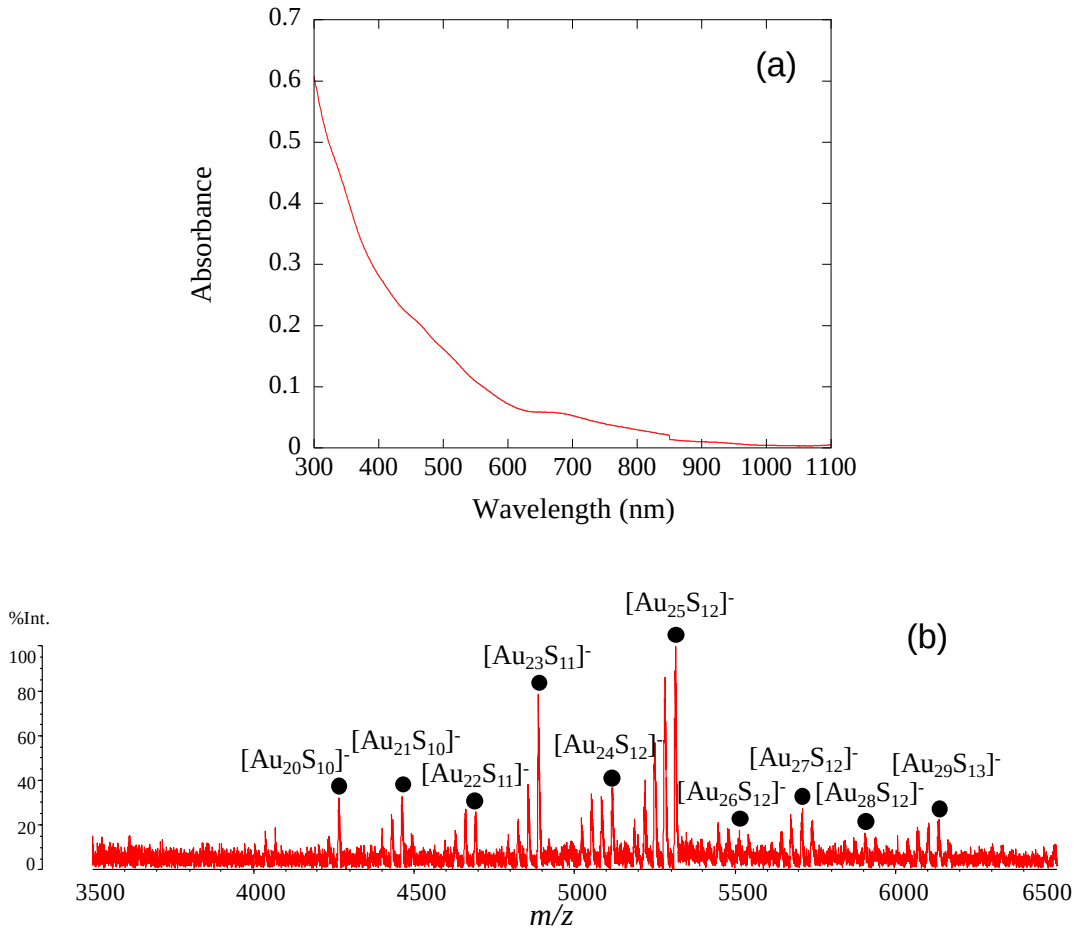

Figure S4. (a) UV–vis absorption spectrum in water and (b) MALDI-MS spectrum of glutathione-stabilized Au NCs : $Au_{25}(SG)_{18}$ NCs.