Submitted to small NANO MICRO

Supporting Information

Facile Synthesis, Silanization and Biodistribution of Biocompatible Quantum Dots

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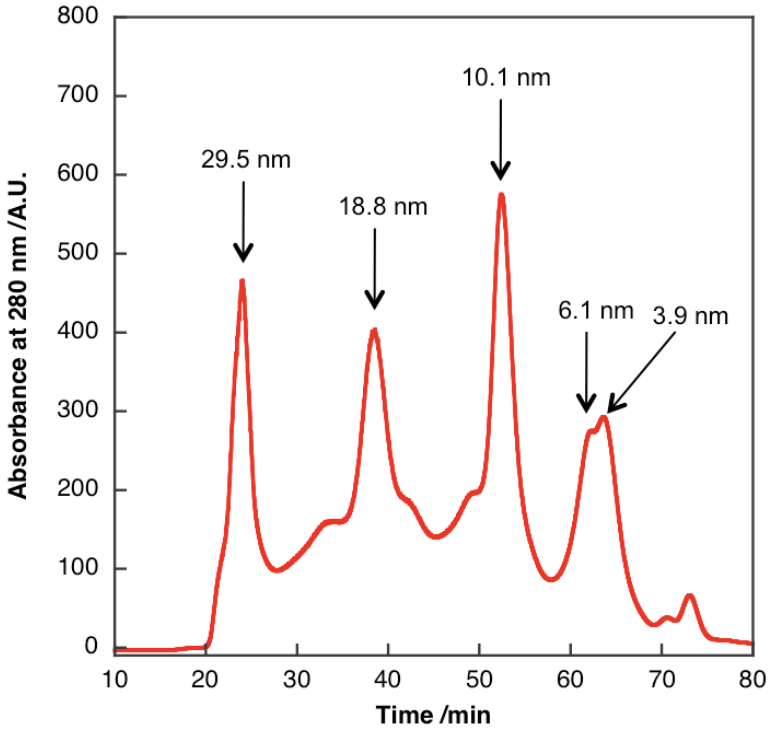

Figure S1. Size exclusion chromatography of protein standards including blue dextran (29.5 nm), thyroglobulin (18.8 nm), alcohol dehydrogenase (10.1 nm), ovalbumin (6.1 nm), and lysozyme (3.9 nm).

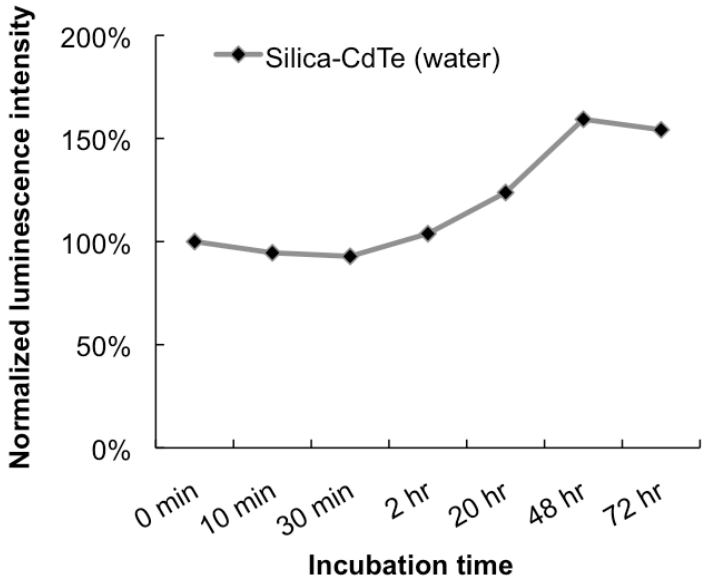

Figure S2. Stability of silica-coated QDs in water. QDs were incubated in water at 37 °C over a 72-hr time course. The stability of QDs were evaluated by monitoring the change of luminescence intensity during incubation.

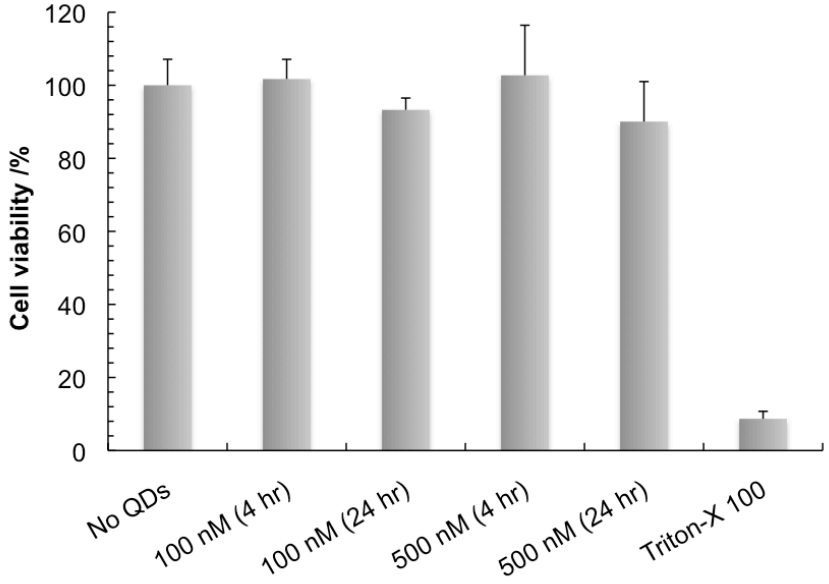

Figure S3. Cytotoxicity of silica-coated QDs. HeLa cells were incubated with 100 nM and 500 nM QDs for 4 hr and 24 hr and the cell viabilities were measured using a CCK-8 assay.

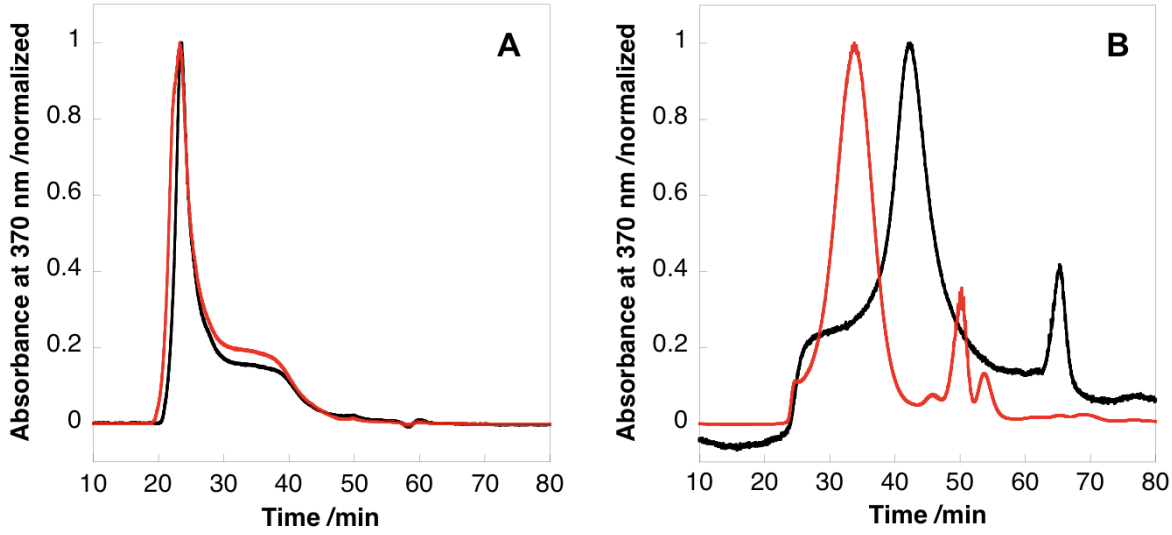

Figure S4. Non-specific adsorption of silica-coated QDs (A) and Invitrogen QD605 (B) with serum proteins characterized by size exclusion chromatography (black: original QDs; red: QDs incubated with FBS). 500 nM QDs were mixed with equal volume of 100% fetal bovine serum (FBS final concentration: 50%) and incubated for 4 hours at 37 °C.

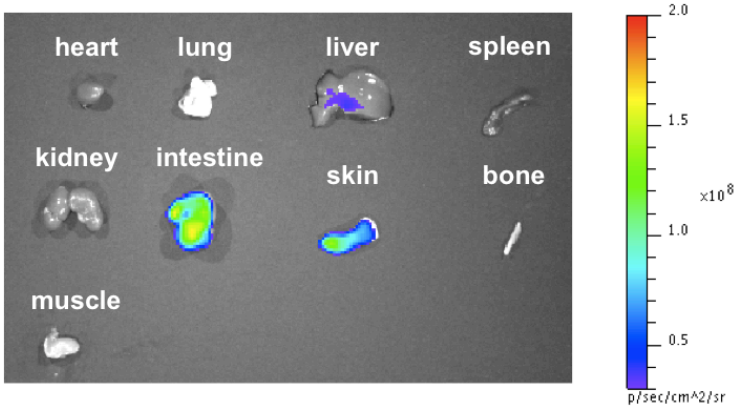

Figure S5. Fluorescence image of organs and tissues excised from the mouse injected with 1X PBS.

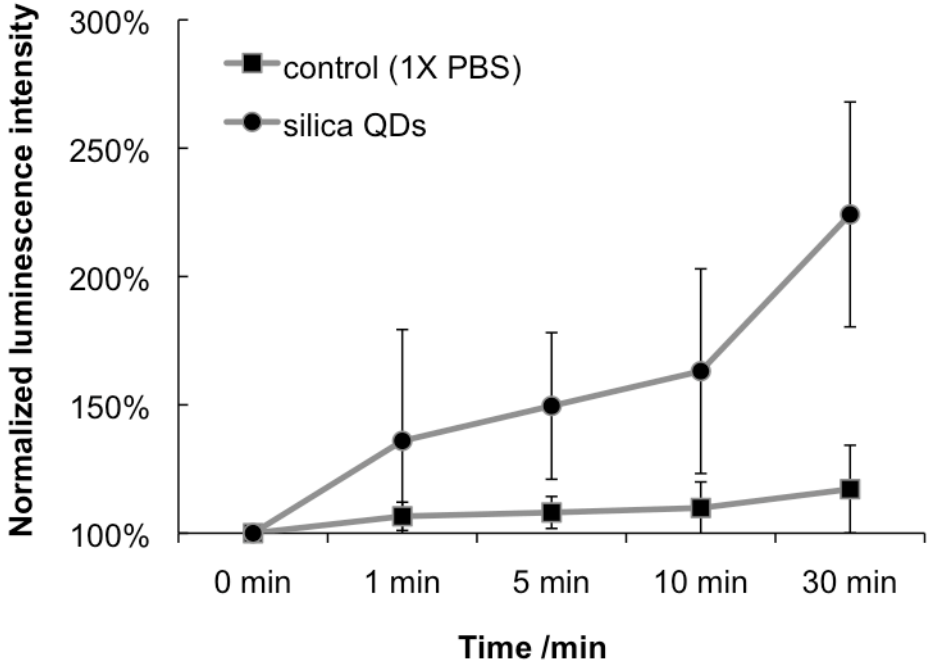

Figure S6. A comparison of the bladder fluorescence of the mouse injected with silica-coated QDs and the mouse injected with 1X PBS.