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# Supplementary Information

## Triple detection modes for $Hg^{2+}$sensing based on NBD-fluorescent and colorimetric sensor and its potential in cell imaging

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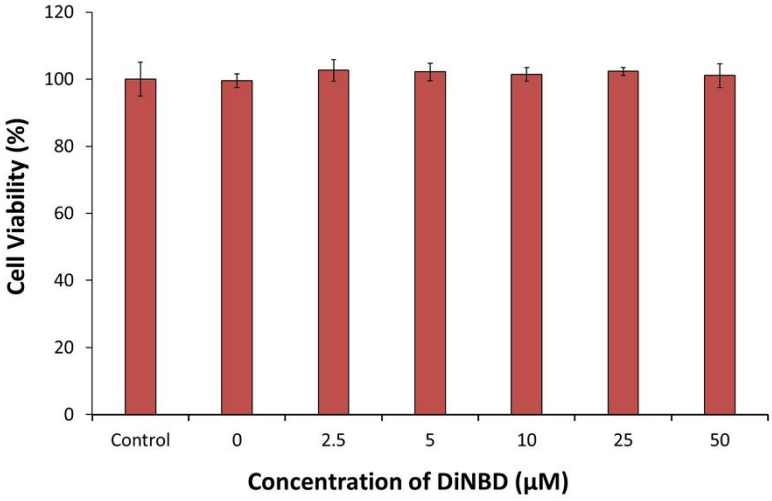


**Fig. S1.** Cell viability values (%) estimated by Prestoblue™ Cell Viability reagent versus incubation concentrations of **DiNBD**. HeLa cells were incubated with **DiNBD** (2.5−50 μM) for 30 min (10% DMSO in PBS), and further cultured in growth media for 24 h before the cell viability assay. After 24 h culture, **DiNBD** remained within the cells but did not affect HeLa cell viability.

## Cell viability assay

Cell survival of HeLa after treatment with **DiNBD** was measured using Prestoblue™ Cell Viability reagent (invitrogen, USA) according to the manufacturer's protocol. In brief, cells were seeded in 96 well plate at 20 kcells/well and incubated overnight. Cells were treated with different concentrations of **DiNBD** (10% DMSO in phenol red free DMEM) ranging from 2.5−50 μM, and two negative controls of DMEM alone or DMEM with 10% DMSO, then incubated for 30 min. Cells were washed twice followed by 24 h incubation in growth media. The media was replaced with 10% Prestoblue reagent in fresh media and incubated for 2 hours. Data values were measured as OD reading at 570 nm with reference subtraction at 600 nm. Data were expressed as mean ± SD of triplicate experiments. Cell viability was calculated using the following formula: $100\times[(OD_{570}$ of treated sample)/($OD_{570}$ of untreated sample (DMEM alone))]. Cell morphology and retaining of **DiNBD** within the cells at the maximum concentration test of 50 μM **DiNBD** was visualized under inverted phase contrast/fluorescence microscope (Olympus CKX53/ DP27-2, 100W mercury burner).