Supporting Information

Fluorescent probes for "off-on" sensitive and selective detection of mercury ions and L-cysteine based on graphitic carbon nitride nanosheets

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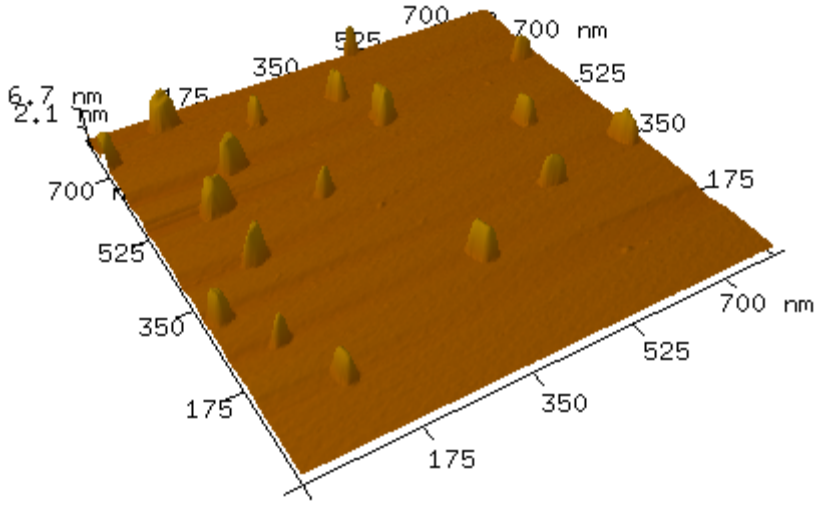

Fig. S1 The AFM 3D image of surface morphology of CNNS.

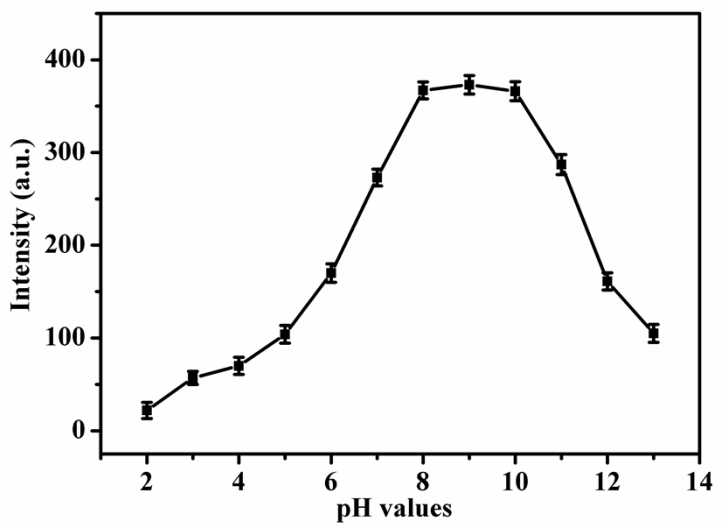

Fig. S2 The fluorescence intensity of CNNS with various pH values (from 2.0 to 13.0).

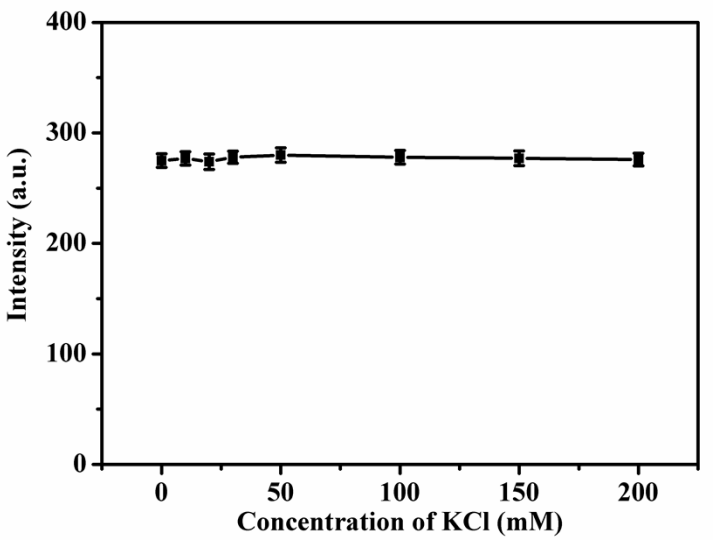

Fig. S3 The fluorescence intensity of CNNS with different KCl concentrations (from 0 to 200 mM).

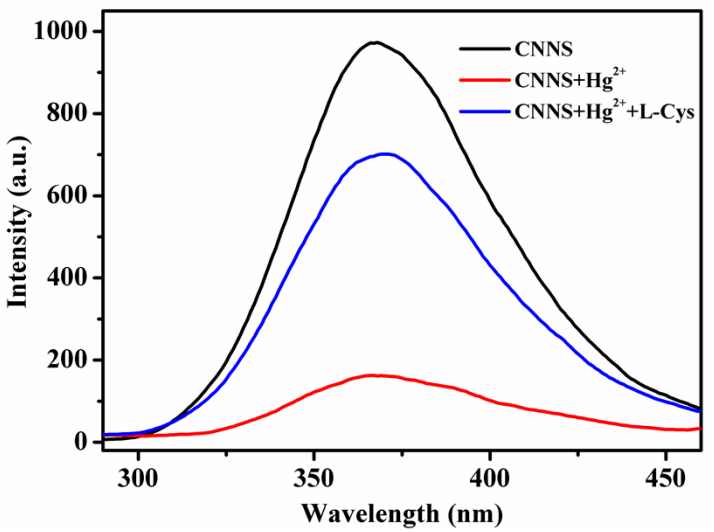

Fig. S4 Fluorescence spectra of CNNS, CNNS + Hg^{2+} and CNNS + Hg^{2+} + L-Cys.

Table S1 Experimental results for determination of Hg^{2+} and L-Cys in practical samples.

Sample	Add Hg^{2+} (μM)	Add L-Cys (μM)	Found (μM)	Recover (%)	RSD (%)
	1.0	0	0.97	97.0	0.79
Tap water	2.0	0	1.96	98.0	1.24
	3.0	0	3.03	101.0	1.67
	1.0	0	1.02	102.0	0.96
Well water	2.0	0	1.97	98.5	1.49
	3.0	0	2.96	98.7	1.86
	0	1.0	1.03	103.0	0.84
Tap water	0	2.0	2.06	103.0	1.66
	0	3.0	3.06	102.0	1.24
	0	1.0	1.03	103.0	1.51
Well water	0	2.0	1.97	98.5	1.68
	0	3.0	2.92	97.3	0.83