Supplementary Material

Cation-mediated fluorescence enhanced hydrogel for sensitive detection of uranyl ion in water

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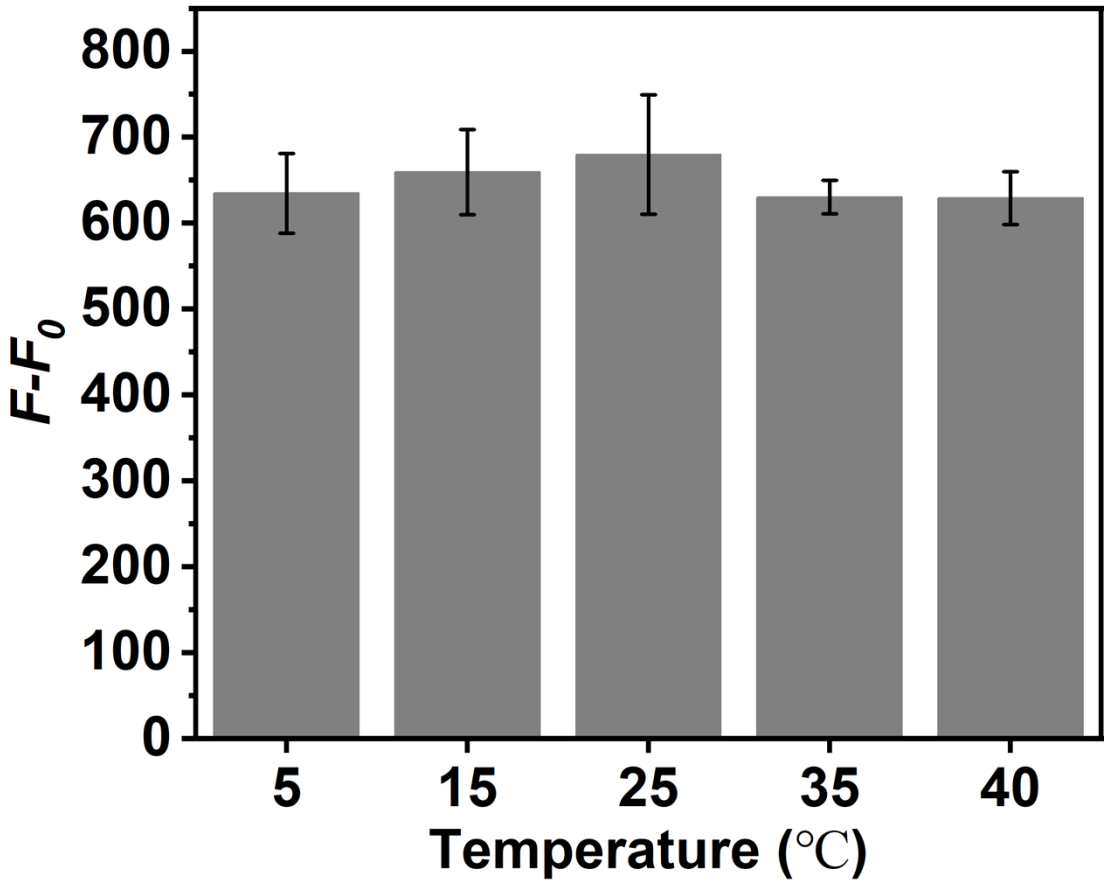

Fig. S1 Fluorescence intensity changes of the Eu^{3+}-K6MUPA-AAm hydrogel after 20 min reaction with 50 nM UO_2^{2+} for 20 minutes at different temperatures.

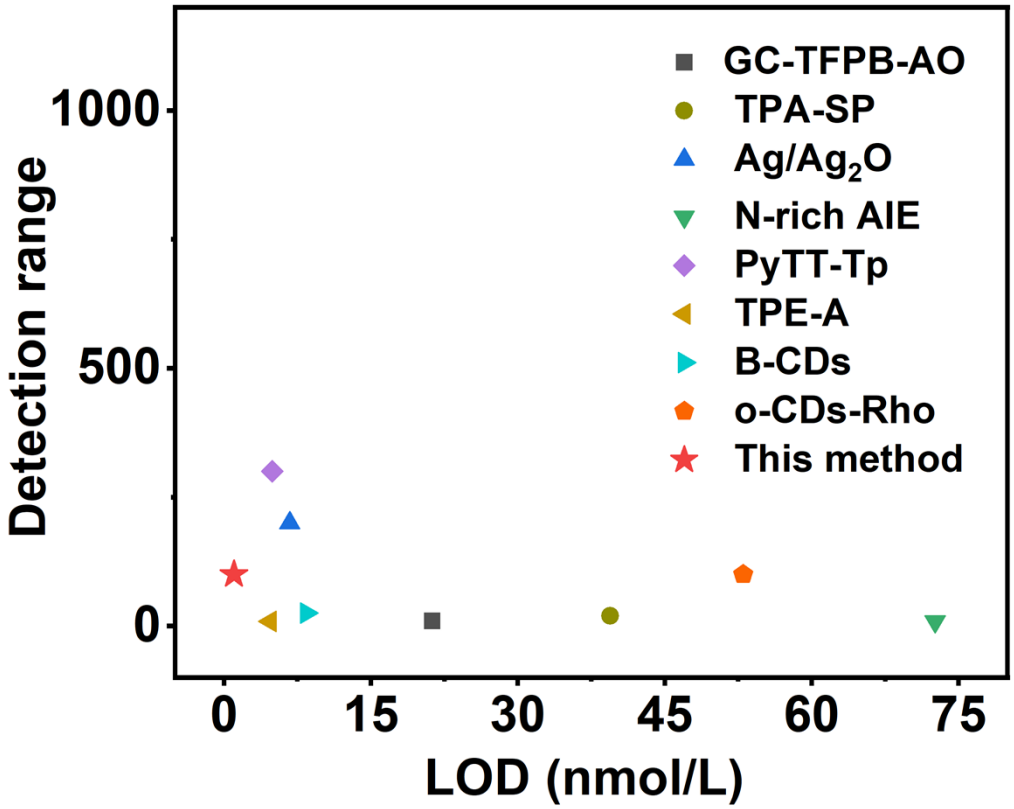

Fig.S2 Comparison of the proposed sensor with others fluorescent sensor.

Table S1 Comparison of UO_2^{2+} detection materials reported in literature and this work.

Material	Detection limit (nmol/L)	Linear range (nmol/L)	Reference
GC-TFPB-AO	21.25	50−500	[1]
TPA-SP	39.4	50-1000	[2]
Ag/Ag_2O	6.7	10-2000	[3]
N-rich AIE	72.6	100-900	[4]
PyTT-Tp	4.92	15–4500	[5]
TPE-A	4.7	50-450	[6]
B-CDs	8.4	200-5000	[7]
o-CDs-Rho	53	1000-100000	[8]
Eu^{3+}-K6MUPA-AAm hydrogel	1	1-100	This experiment

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