supporting information

Enhanced Photocatalytic Properties of $ZnFe_2O_4$ doped $ZnIn_2S_4$ Heterostructure under Visible Light Irradiation

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Table S1. The detail of nitrogen adsorption/desorption measurements for bare $ZnIn_2S_4$, $ZnFe_2O_4$ and the ZFO-ZIS composites

Sample	$S_{BET}/(m^2/g)$	Average pore size/(nm)	Pore volume/(cm^3/g)
Pure $ZnIn_2S_4$	77.5668	5.96610	0.115693
Pure $ZnFe_2O_4$	138.9283	15.24611	0.529529
1 wt% ZFO-ZIS	170.8030	5.99078	0.255811
2.5 wt% ZFO-ZIS	167.8726	5.55760	0.233242
5 wt% ZFO-ZIS	104.1173	6.28131	0.163498
10 wt% ZFO-ZIS	75.8783	7.53702	0.142974
30 wt% ZFO-ZIS	65.8286	8.7084	0.143315
50 wt% ZFO-ZIS	132.1181	8.23138	0.271879

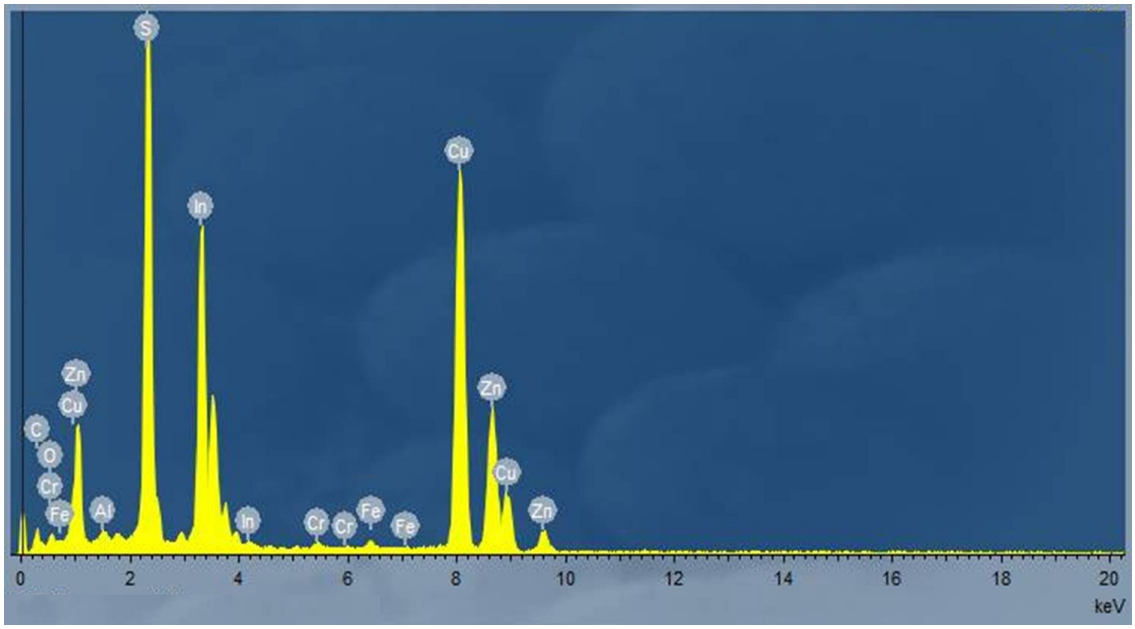

Figure S1. EDS spectrum of 2.5wt% ZFO-ZIS composites

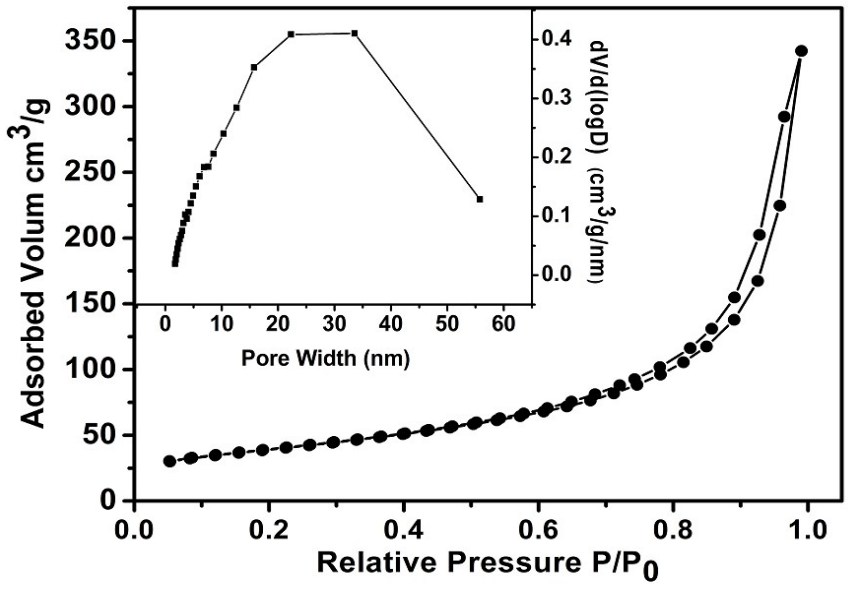

Figure S2. N_2 adsorption–desorption isotherms of pure $ZnFe_2O_4$ and the pore size distributions of the $ZnFe_2O_4$ in illustrations.

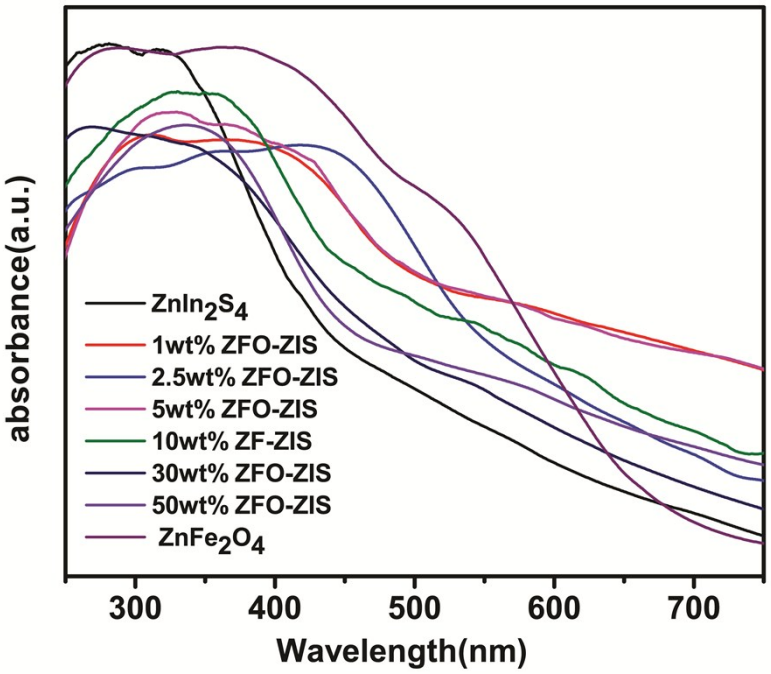

Figure S3. The UV-vis diffuse reflectance spectra of the $ZnIn_2S_4$,$ZnFe_2O_4$ and ZFO-ZIS.

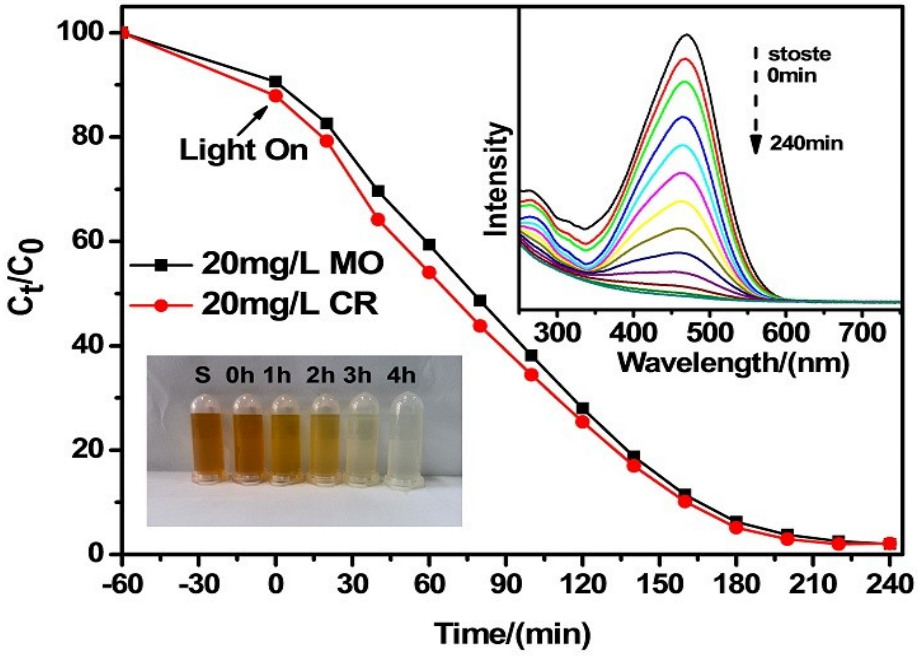

Figure S4. Decolorization of wastewater containing 20 mg/L methyl orange and 20 mg/L Congo red using the 2.5wt% ZFO-ZIS.