

## **Electronic Supplementary Information**

# **Preparation of Thiadiazole Modified UiO-68-CdS Composites for RhB Degradation under Visible Light Irradiation**

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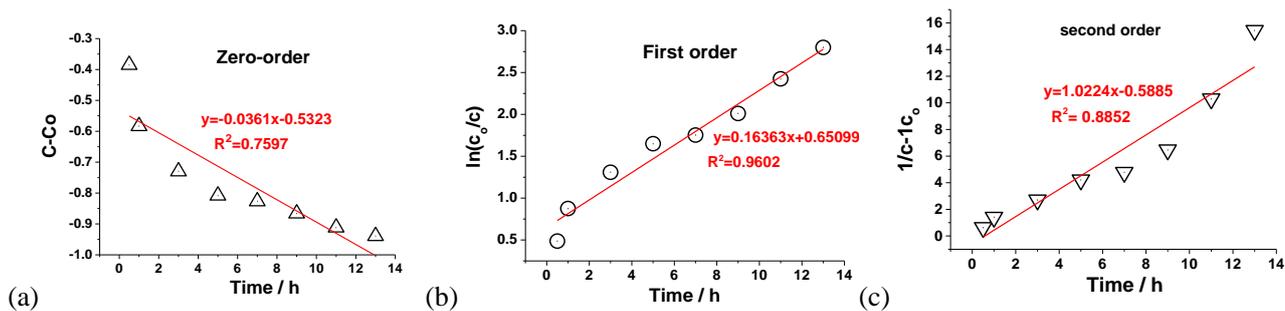


Figure S1. Kinetic analysis for the RhB photo degradation with CdS@UiO68-N<sub>2</sub>S, experimental data were fitted with zero-order, first-order and second-order models.

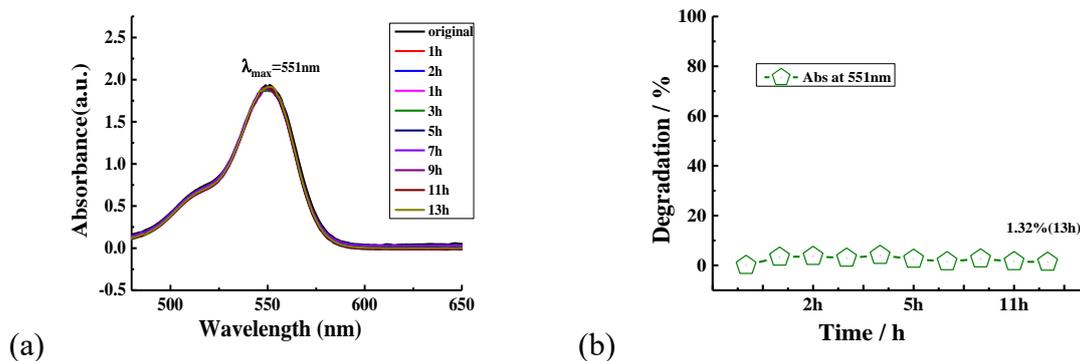


Figure S2. Photocatalytic degradation pattern of RhB without catalyst (a) and the curve of degradation rate with time (b)

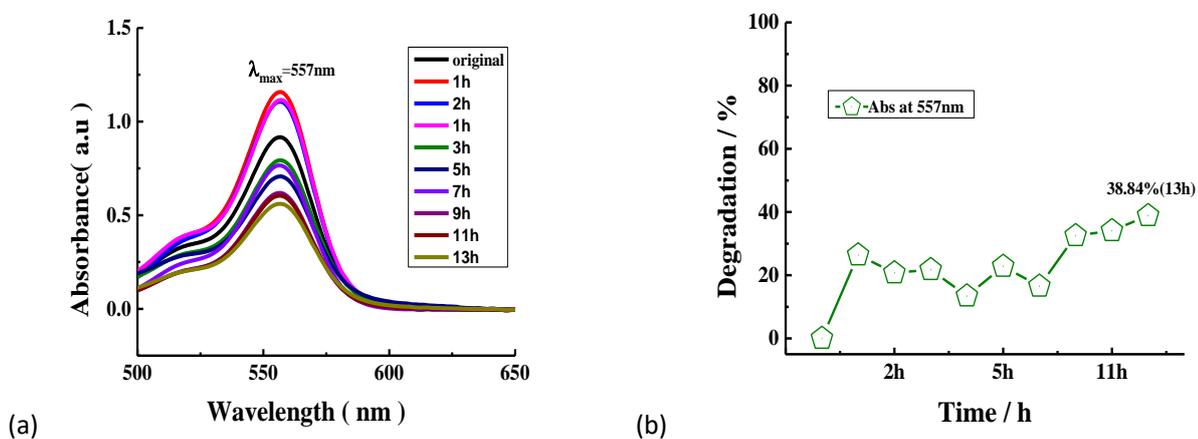
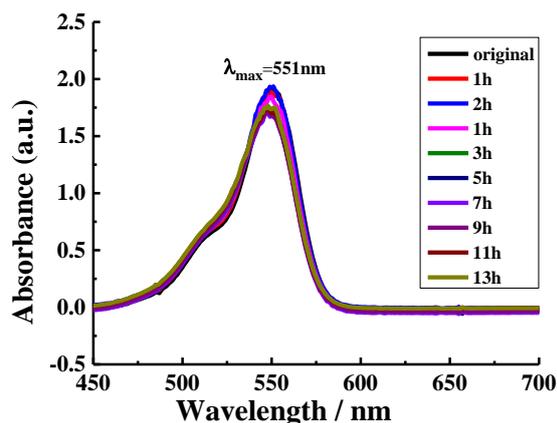
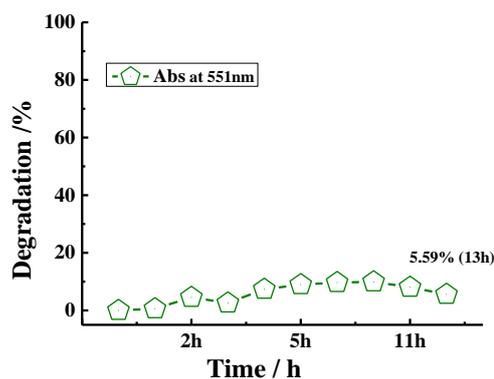


Figure S3. Photocatalytic degradation pattern of RhB by UiO-68N<sub>2</sub>S (a) and the degradation rate of RhB with time (b)

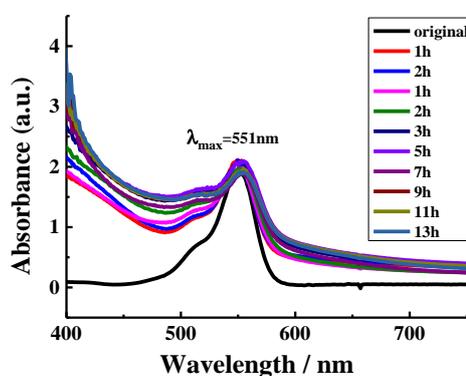


(a)

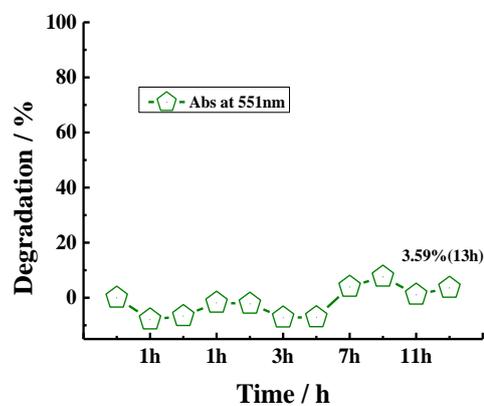


(b)

Figure S4. Photocatalytic degradation pattern of Rh B by CdS (a) and the degradation rate of RhB with time.

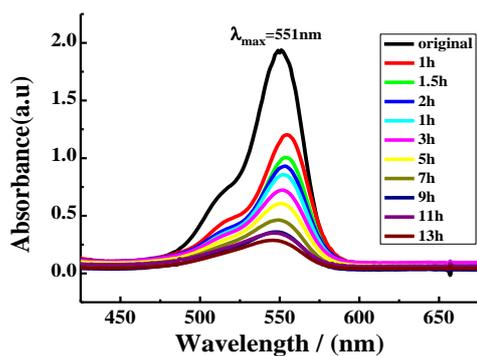


(a)

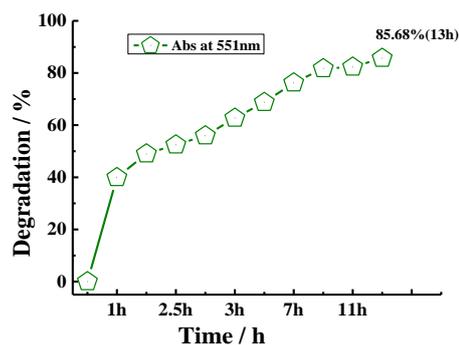


(b)

Figure S5. Photocatalytic degradation pattern of RhB by CdS@UiO-68N<sub>2</sub>S in the presence of p-benzoquinone (a) and its degradation rate with time (b)



(a)



(b)

Figure S6. Photocatalytic degradation pattern of RhB by CdS@UiO-68N<sub>2</sub>S in the presence of tert-butanol (a) and its degradation rate with time (b)