

# Supporting Information

## In-situ Aggregation of ZnSe Nanoparticles into Supraparticles: Shape Control and Doping Effects

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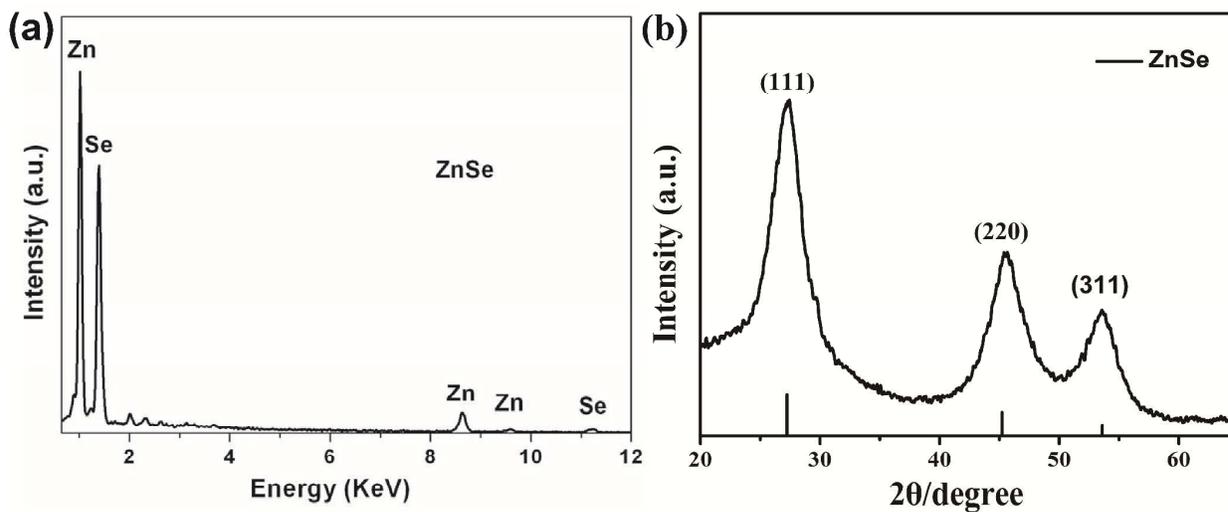
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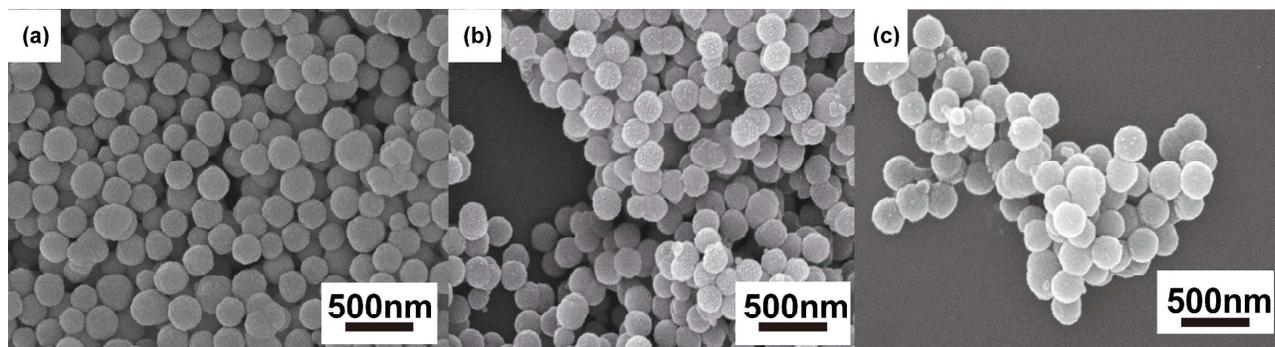
**Table S1.** The result of ICP-AES measurements for magnetic Fe<sub>3</sub>O<sub>4</sub>@ZnSe SPs.

Sample	Zn Concentration (g/ml)	ZnSe/(ZnSe+Fe <sub>3</sub> O <sub>4</sub> ) molar ratio	Fe Concentration (g/ml)	Fe <sub>3</sub> O <sub>4</sub> /(ZnSe+Fe <sub>3</sub> O <sub>4</sub> ) molar ratio
1	2.26	87	0.681	13
2	1.10	73	0.594	27

**Figures:**



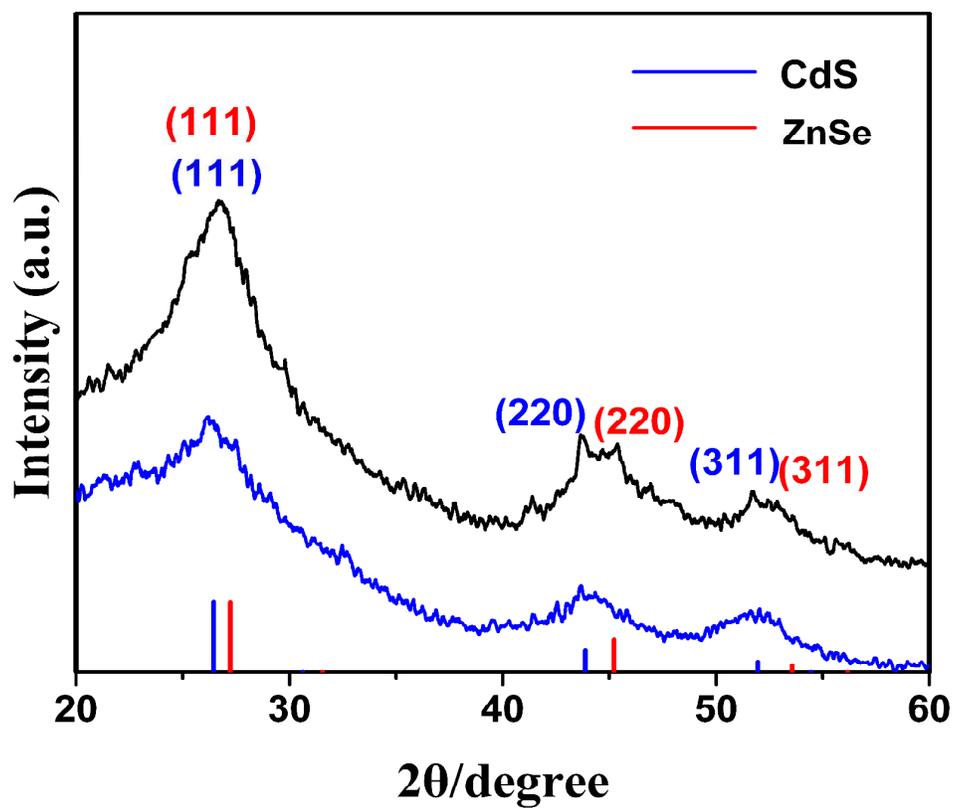
**Figure S1.** (a) EDS and (b) XRD spectrum of ZnSe SPs.



**Figure S2.** SEM images of magnetic  $\text{Fe}_3\text{O}_4@\text{ZnSe}$  SPs with  $\text{Fe}_3\text{O}_4/(\text{ZnSe}+\text{Fe}_3\text{O}_4)$  molar ratio of (a) 0%, (b) 13% and (c) 27%.



**Figure S3.** Photograph of ZnSe SPs and  $\text{SiO}_2@\text{ZnSe}$  SPs.



**Figure S4.** XRD patterns of CdS NPs (black line) and CdS@ZnSe SPs (blue line) and their corresponding standard patterns.