

## **Sialic acid-targeting multifunctionalized silicon quantum dots for synergistic photodynamic and photothermal cancer therapy**

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### Contents

Table S1. Zeta potential and loading efficiency of Ce6.....	2
Figure S1. Fluorescence of SiQDs before and after surface functionalization .....	2
Figure S2. Photothermal evaluations of SiQDs@PDA.....	2
Figure S3. Photothermal conversion efficiency .....	3
Figure S4. Confocal fluorescence images of SiQDs@PDA/PBA-treated cells.....	4
Figure S5. The temperature changes of tumor sites .....	4

Table S1. Zeta potential and loading efficiency of Ce6

Sample	Zeta potential (mV) <sup>a</sup>	Ce6 % <sup>b</sup>
SiQDs@PDA	-23.23	N.A.
SiQDs@Ce6	-25.67	7.9
SiQDs@Ce6/PBA	-25.94	7.9

<sup>a</sup> Determined by the Marvin Zeta potential analyzer; <sup>b</sup> Weight percentage of Ce6 in nanoparticles calculated from the calibration curve  $Y = 0.006388x + 0.05082$ ,  $R^2=0.9992$ ; N.A. means not applicable.

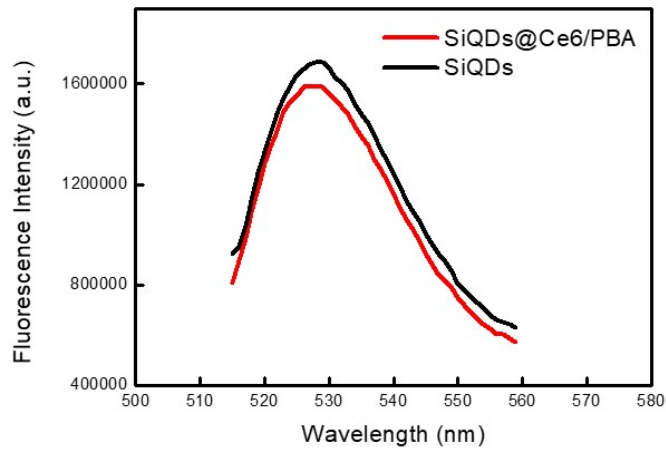


Figure S1. Fluorescence of SiQDs before and after surface functionalization with Ce6 and PBA

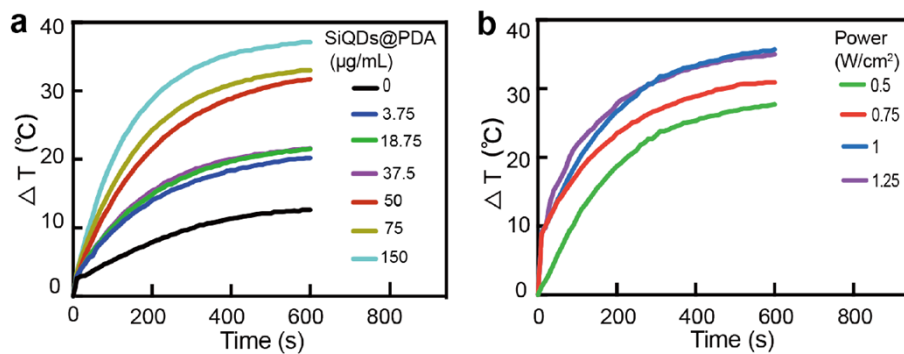


Figure S2. Photothermal evaluations of SiQDs@PDA. (a) Temperature increments ( $\Delta T$ ) of SiQDs@PDA as a function of illumination time under different nanoparticle concentrations; (b)  $\Delta T$  changes of SiQDs@PDA with time under different power intensity of 808 nm laser

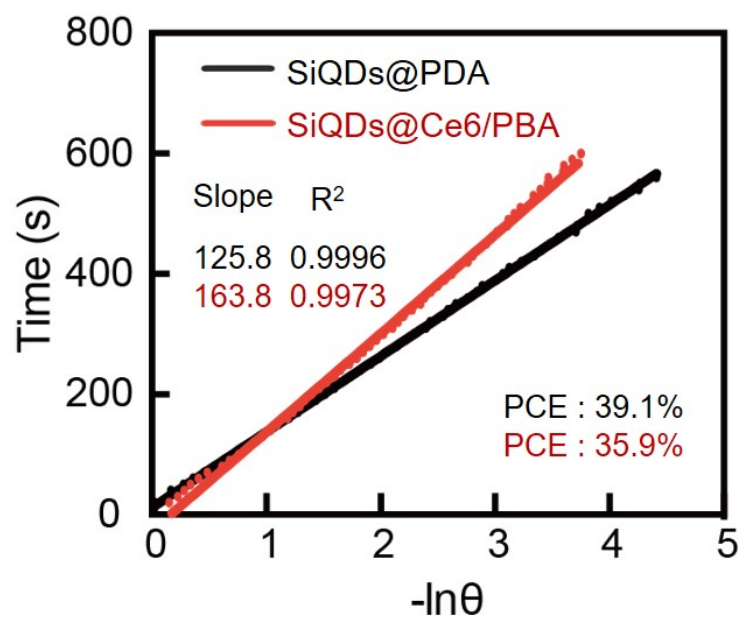


Figure S3. Photothermal conversion efficiency of SiQDs@PDA and SiQDs@PDA/PBA

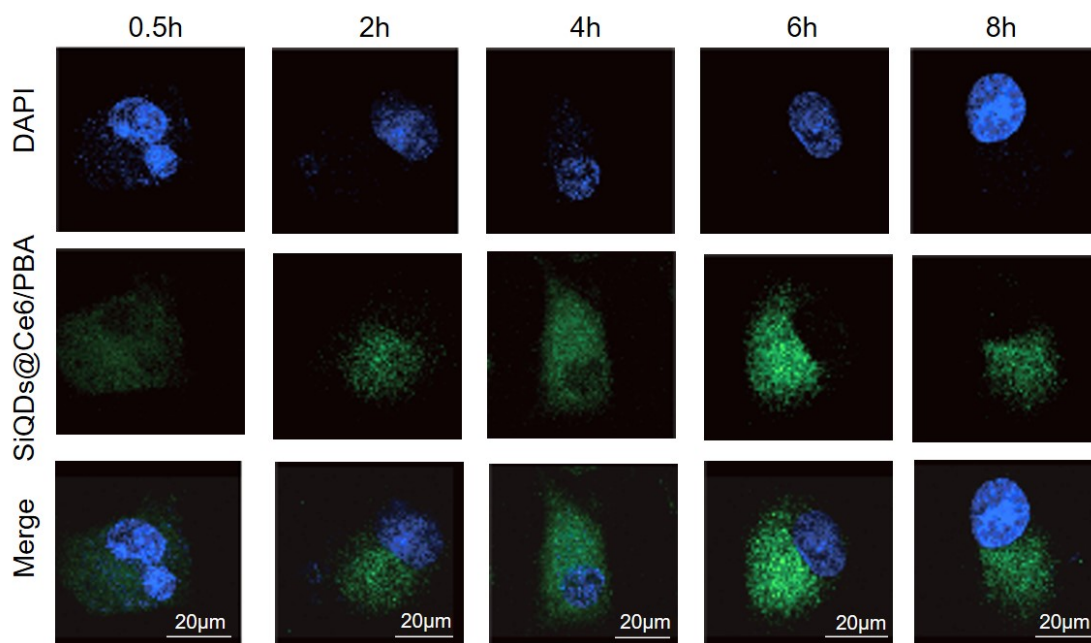


Figure S4. Confocal fluorescence images of SiQDs@PDA/PBA-treated cells at different time intervals.

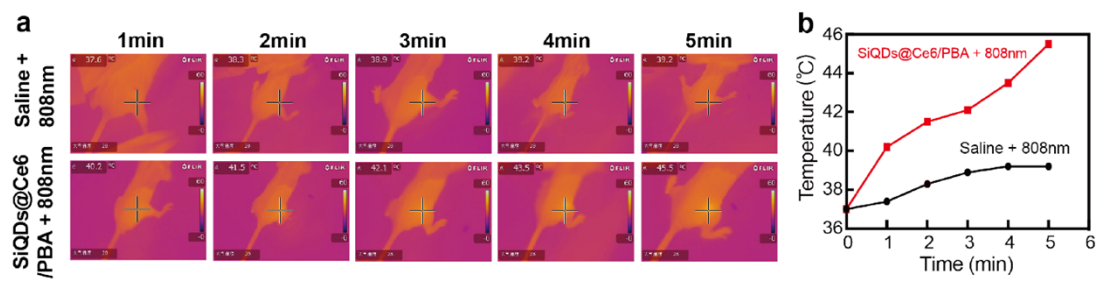


Figure S5. The temperature changes of tumor sites at different time points post-i.v.-injection with saline or SiQDs@PDA/PBA