

## **Polymer-DNA assembled Nanoflower for Targeted Delivery of Dolastatin-Derivatived Microtubule Inhibitors**

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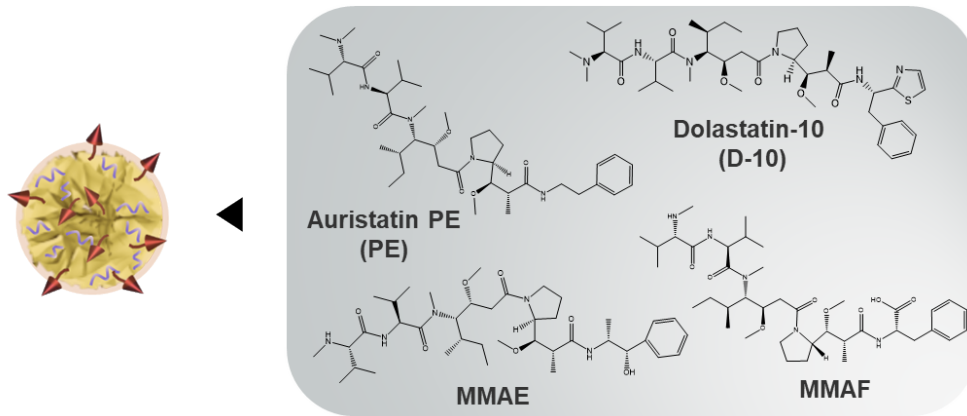
## Supplementary Data

**Table S1.** Drug loading performance of the nanoflower.

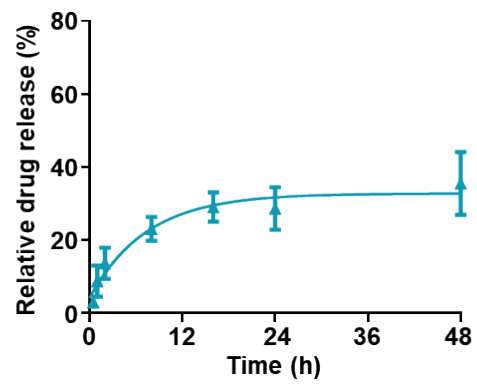
Name of the nanoflower	Drug (MW)	LC <sup>1</sup> (μg/mL)	EE <sup>2</sup> %	Diameter (μm)
PN@PE	701.98	433 ± 19	86.5 ± 3.8	1.74 ± 0.58
PN@D-10	785.09	407 ± 23	81.3 ± 4.6	1.33 ± 0.31
PN@MMAE	731.96	351 ± 34	75.1 ± 6.8	1.16 ± 0.48
PN@MMAE (PN@M)	717.98	426 ± 25	85.6 ± 5.0	0.92 ± 0.29

**Table S2.** DNA sequences of the template.

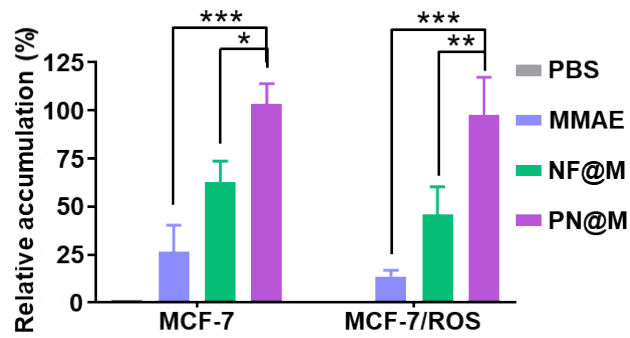
Name	Sequence (5'-3')
<b>Template</b>	Phosphate- CATATCCCTAGGGATATGTCTAACCGTACAGTATTTTCCCGGCGG CGCAGCAGTTAGATTTGTTGGTACGTTAATACGACT
<b>Anti-Sgc8 aptamer</b>	ATCTAACTGCTGCGCCGCCGGGAAAATACTGTA
<b>Cy5-aptamer</b>	Cy5-ATCTAACTGCTGCGCCGCCGGGAAAATACTGTA



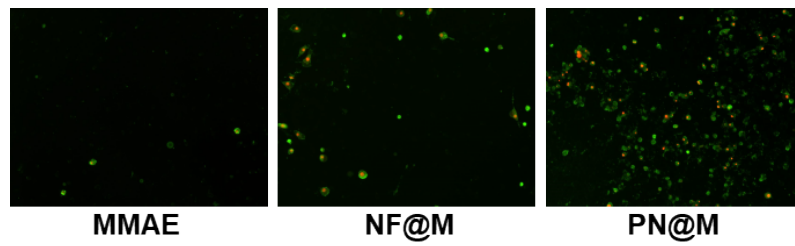
**Figure 1.** Illustration of the drug-loaded nanoflower.



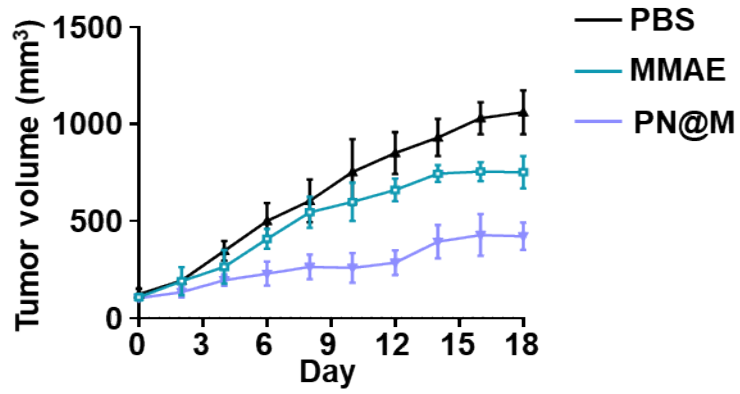
**Figure 2.** Release of MMAE in PBS at 37 °C.



**Figure 3.** Relative MMAE accumulation in cells. The accumulation efficacy was measured by quantifying MMAE through HPLC. (\*\* P < 0.01; \*\*\* P < 0.001; \*\*\*\* P < 0.0001).



**Figure 4.** Cell apoptosis imaging. MCF-7/ROS cells were stained with Annexin V-FITC and PI after being cultured with different drugs.



**Figure 4.** Tumor volume changes during the treatment of different drugs.