Facile fabrication of a near-infrared responsive nanocarrier for spatiotemporally controlled chemophotothermal synergistic cancer therapy

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Fig. S1 The images of NGO (left) and rNGO (right).

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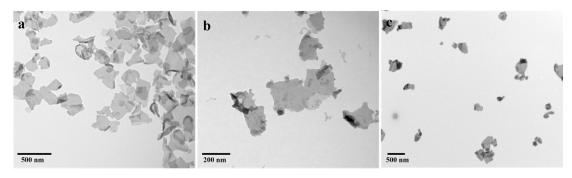
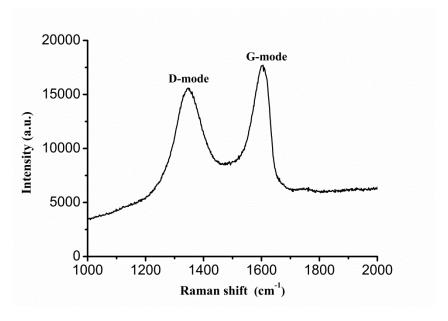


Fig. S2 TEM images of rNGO@mSiO $_2$ (a) and rNGO@mSiO $_2$ @pNIPAM-co-pAAm (b, c)

NIPAM (g)	AAm (g)	LCST (°C)
1.90	0.1	33
1.80	0.1	36
1.80	0.18	41

Table S3 The LCST of rNGO@mSiO₂@pNIPAM-co-pAAm in different composition ratios.



 $Fig. \ S4\ The\ Raman\ spectrum\ of\ rNGO@mSiO_2@pNIPAM-co-pAAm.$

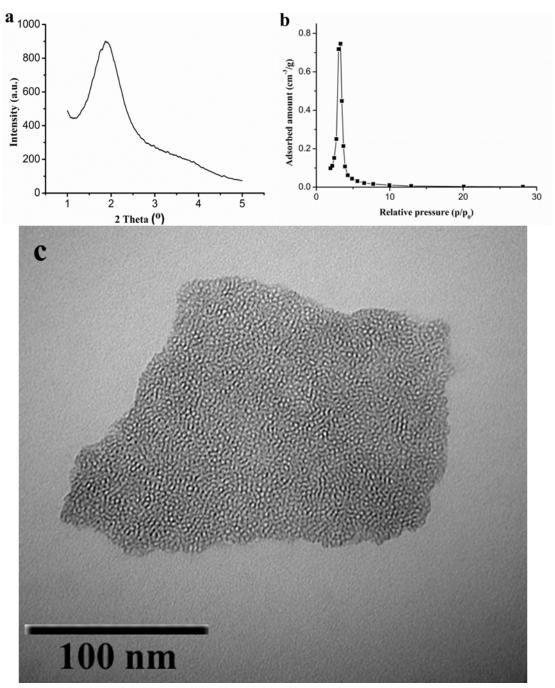


Fig. S5 The small-angle XRD pattern (a), pore size distribution (b) and amplifying TEM image (c) of $rNGO@mSiO_2$.

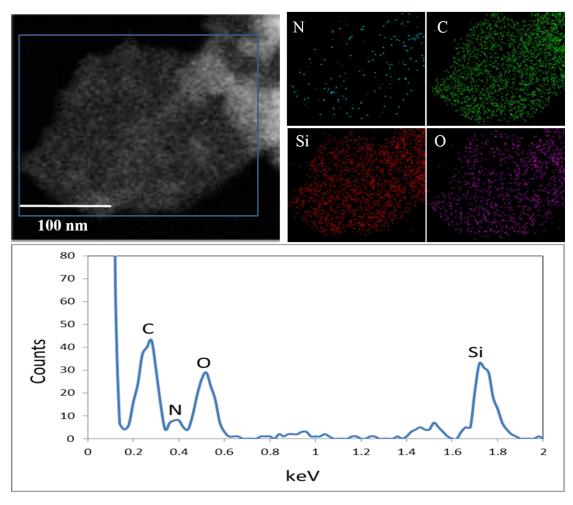


Fig. S6 The TEM-EDS images of rNGO@mSiO2@pNIPAM-co-pAAm

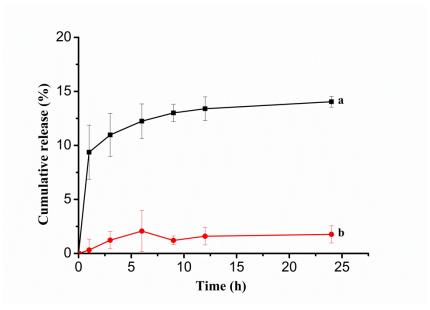
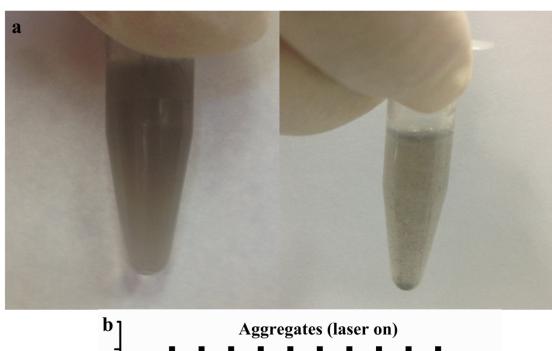


Fig. S7 The release of loaded DOX from rNGO@mSiO $_2$ @pNIPAM-co-pAAm in 24 h at pH=7.4 and 50 °C (a) or 37 °C (b).



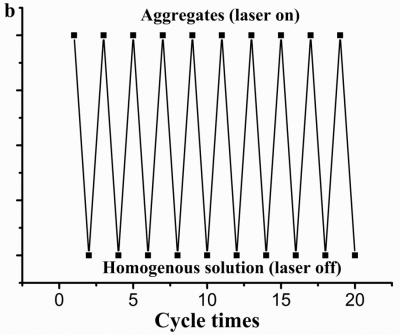
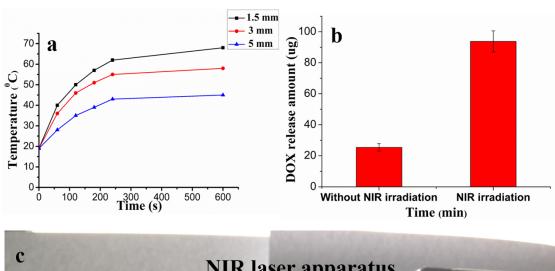


Fig. S8 The images of rNGO@mSiO $_2$ @pNIPAM-co-pAAm dispersing in the PBS buffer without (a, left) and with (a, right) NIR irradiation; the stability of reversible transformation ability (b).



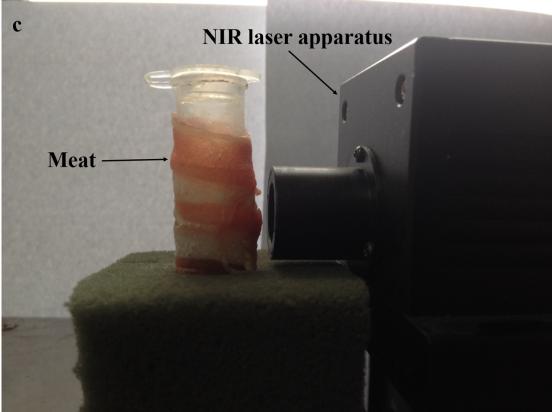
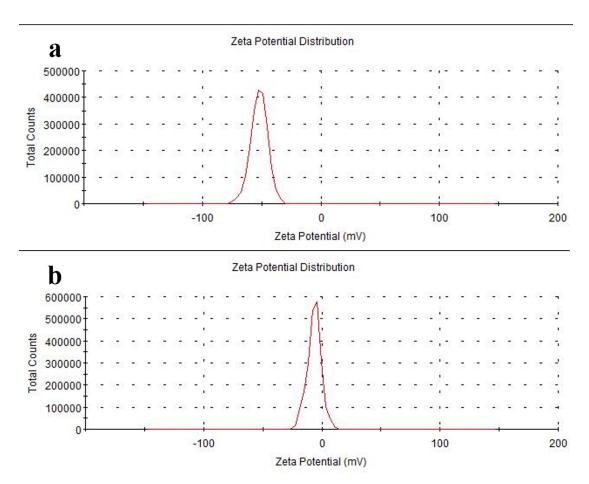


Fig. S9 The change of temperature of rNGO@mSiO₂@pNIPAM-co-pAAm solution encompassed by different thickness of fresh meat (a), the simulative in vivo drug release behavior (b) and photo of simulative in vivo application (c).



 $Fig. \ S10 \ The \ zeta \ potential \ of \ rNGO@mSiO_2(a) \ and \ rNGO@mSiO_2@pNIPAM-co-pAAm \ (b).$

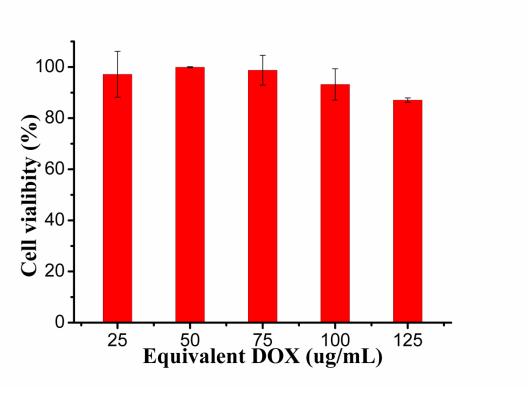


Fig. S11 The viability of HeLa cells incubated with different amounts of rNGO@mSiO $_2$ in 24 h.