

Supporting Information

Ovalbumin-modified Nanoparticles Increases the Tumor Accumulation by Tumor Microenvironment-Mediated “Giant”

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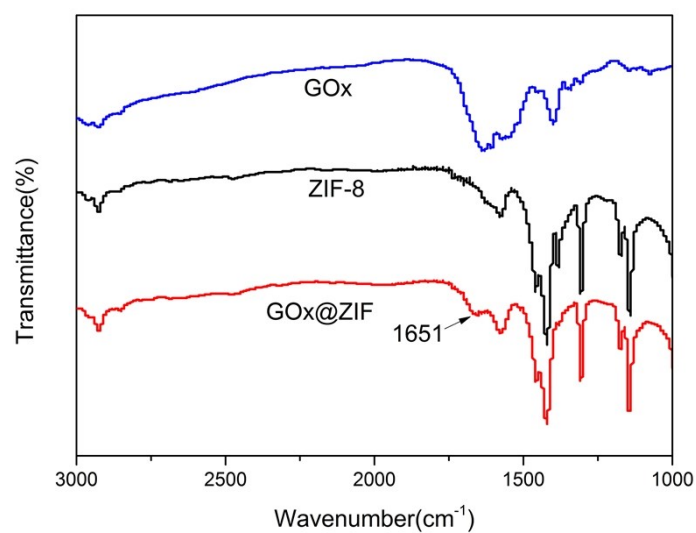


Fig. S1. FTIR spectra of different preparations

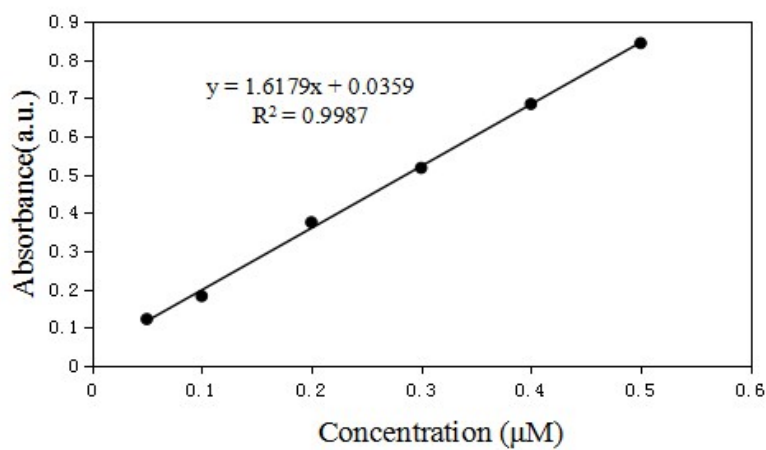


Fig. S2. The standard curve of BSA for BCA Protein Assay Kit.

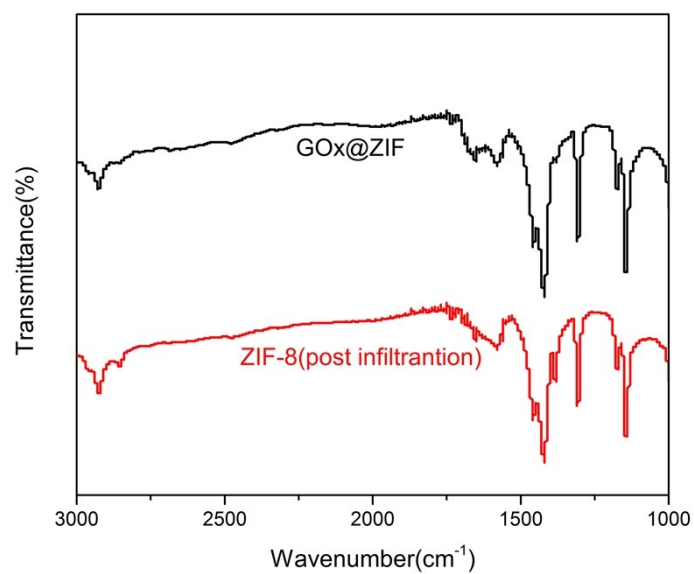


Fig. S3. FTIR spectra of GOx@ZIF, ZIF-8 post incubated with GOx after washing.

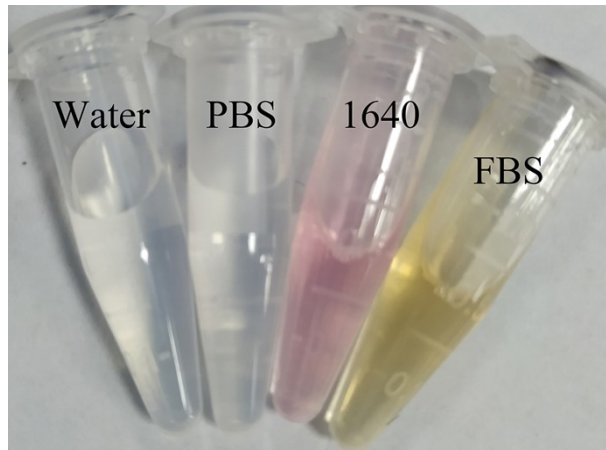


Fig. S4. Digital Photo of the GOx@ZIF-OVA dispersed in DI water, PBS, 1640 culture medium and FBS for 24 h.



Fig. S5. Digital photos of ZIF-8, GOx@ZIF and GOx@ZIF-OVA at pH 5.0 after 24 h.

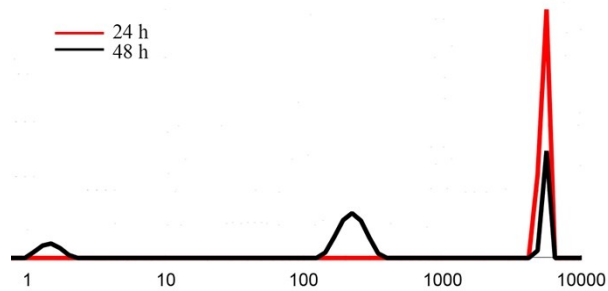


Fig. S6. The particle size of GOx@ZIF-OVA at pH 5.0 after 24 and 48 h.

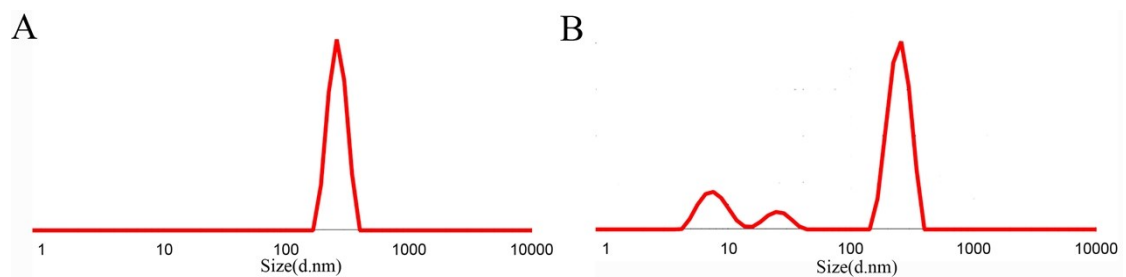


Fig. S7. The particle size of GOx@ZIF-BSA at pH (A) 7.4 and (B) 5.0.

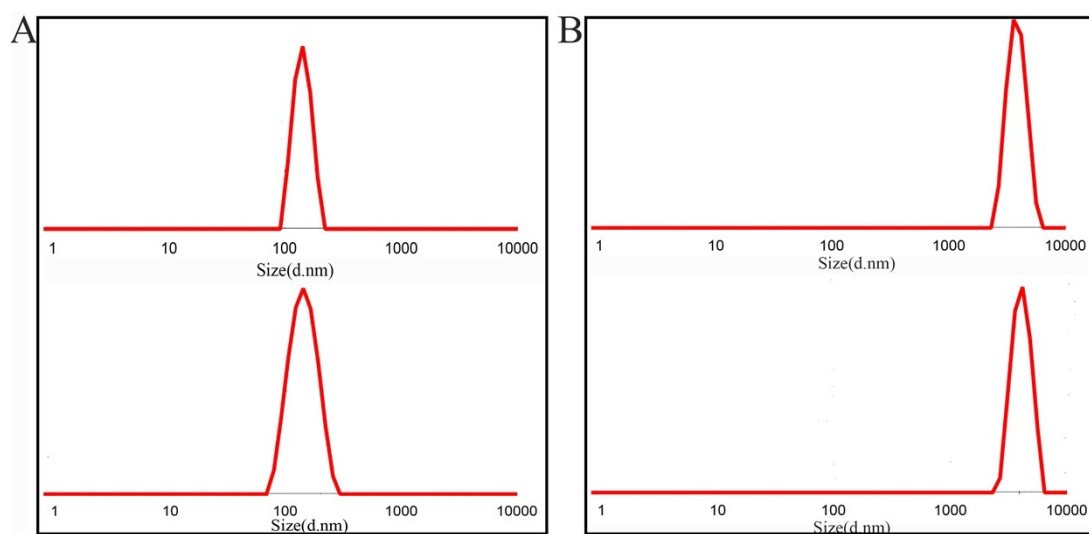


Fig. S8. After incubation with BSA, the particle size of GOx@ZIF-OVA at pH (A) 7.4 and (B) 5.0.

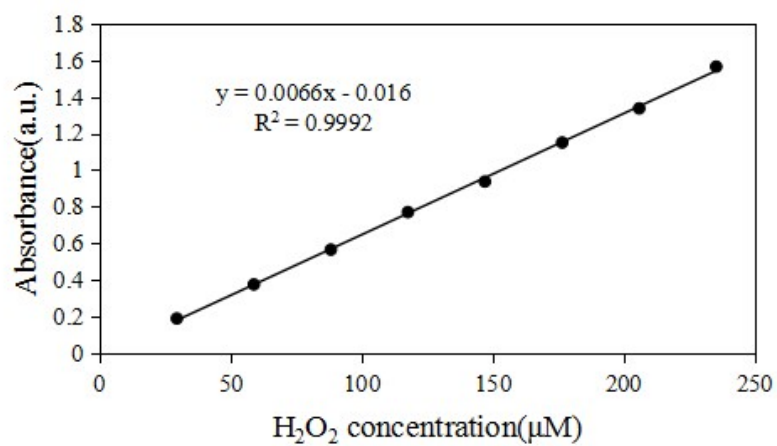


Fig. S9. The standard curve of H₂O₂ by UV-vis absorbance at 400 nm with titanium potassium oxalate.

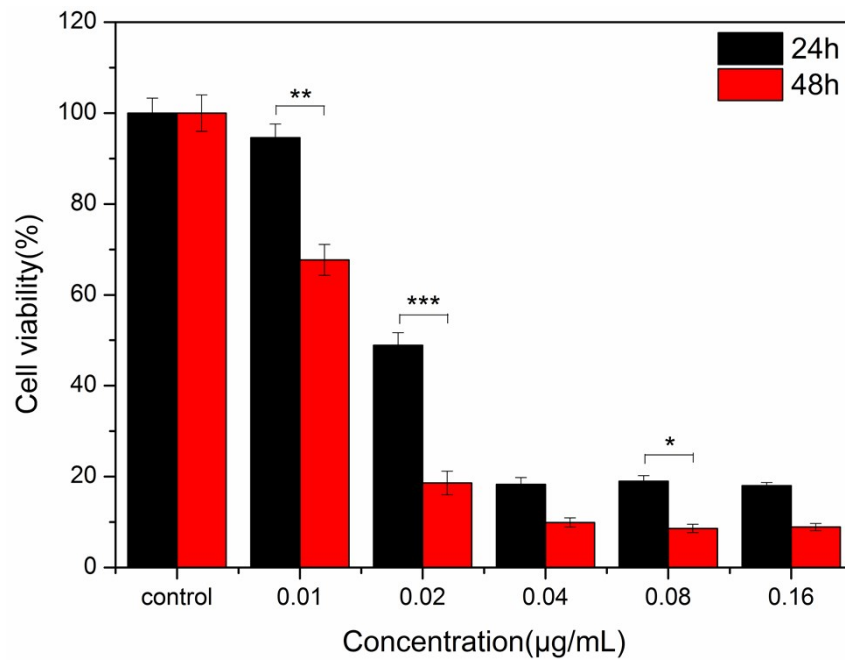


Fig. S10. Cytotoxicity test. Cell viabilities of 4T1 cells incubated with GOx at different concentrations for 24 and 48 h (n=6). * $P < 0.05$, ** $P < 0.01$, *** $P < 0.001$.

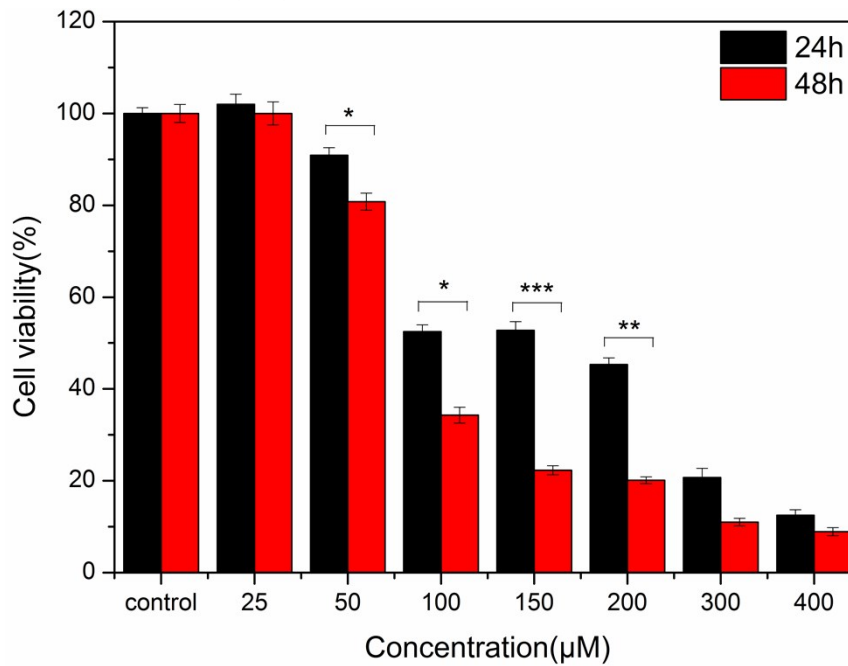


Fig. S11. Cytotoxicity test. Cell viabilities of 4T1 cells incubated with H₂O₂ at different concentrations for 24 and 48 h (n=6). * $P < 0.05$, ** $P < 0.01$, *** $P < 0.001$.

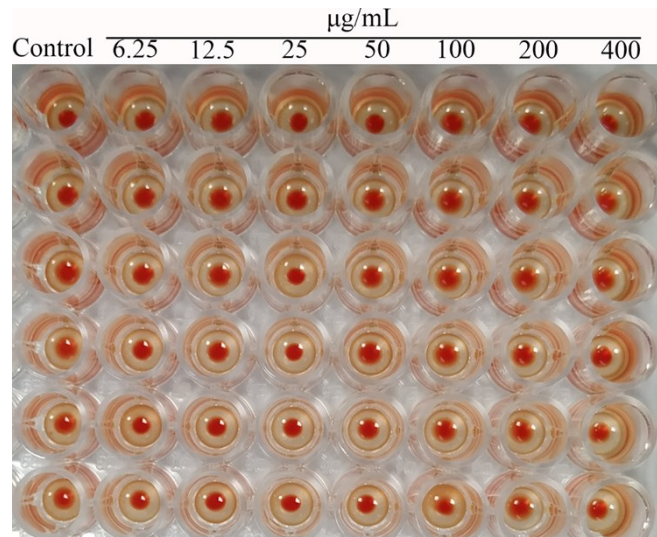


Fig. S12. Hemagglutination assay of the GOx@ZIF-OVA. The control group was treated by PBS only. Negative result forms red dot in the center, while positive result shows uniform reddish color across the entire well.

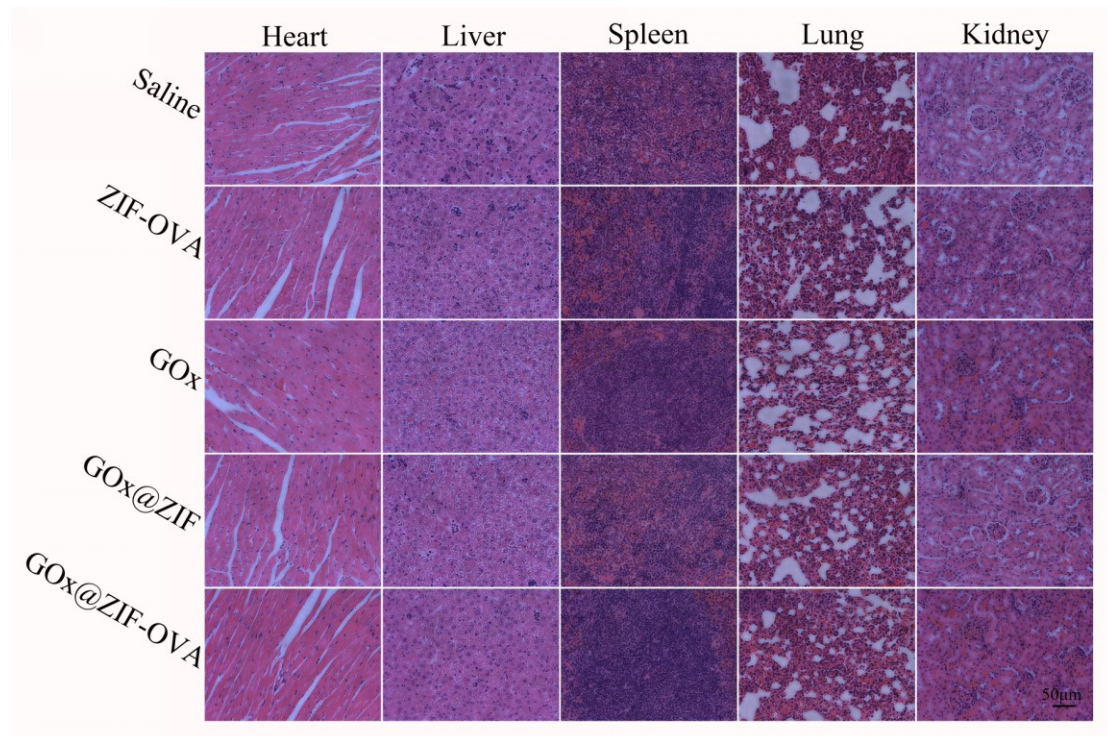


Fig. S13. H&E staining of major organs and tumors in different groups.

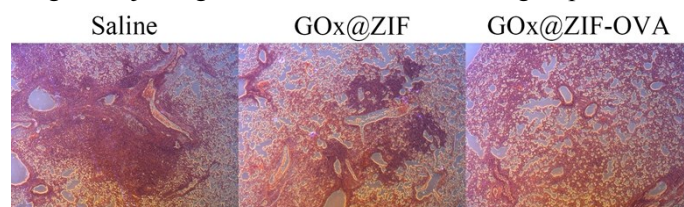


Fig. S14. H&E staining results of lung tissues in already formed metastatic model (n = 6).