Electronic Supplementary Material (ESI) for Analytical Methods.

Supporting Information

SERS-fluorescence bimodal nanoprobes for in vitro imaging of fatty acid responsive receptor GPR120

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Content:

Fig. S1 FT-IR spectra of PEGs and GPR120 antibody.

Fig. S2 Biocompatibility of the SERS-fluorescence bimodal nanoprobe.

Fig. S3 Fluorescence imaging of CD36 and GPR120 (+) cells incubated with nanoprobes.

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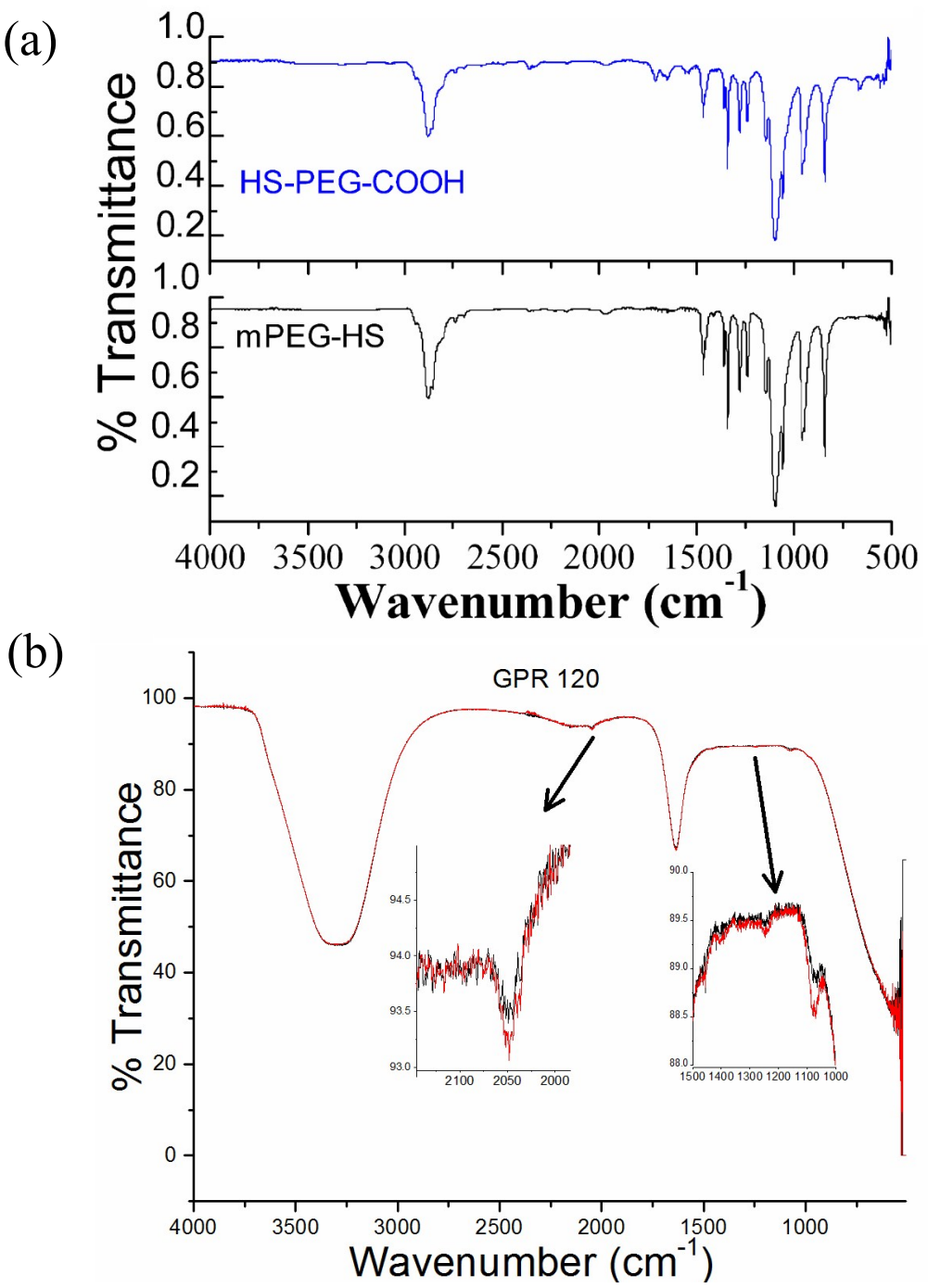

Fig. S1 FT-IR spectra of (a) HS–PEG–COOH, mPEG-HS and (b) GPR120 antibody.

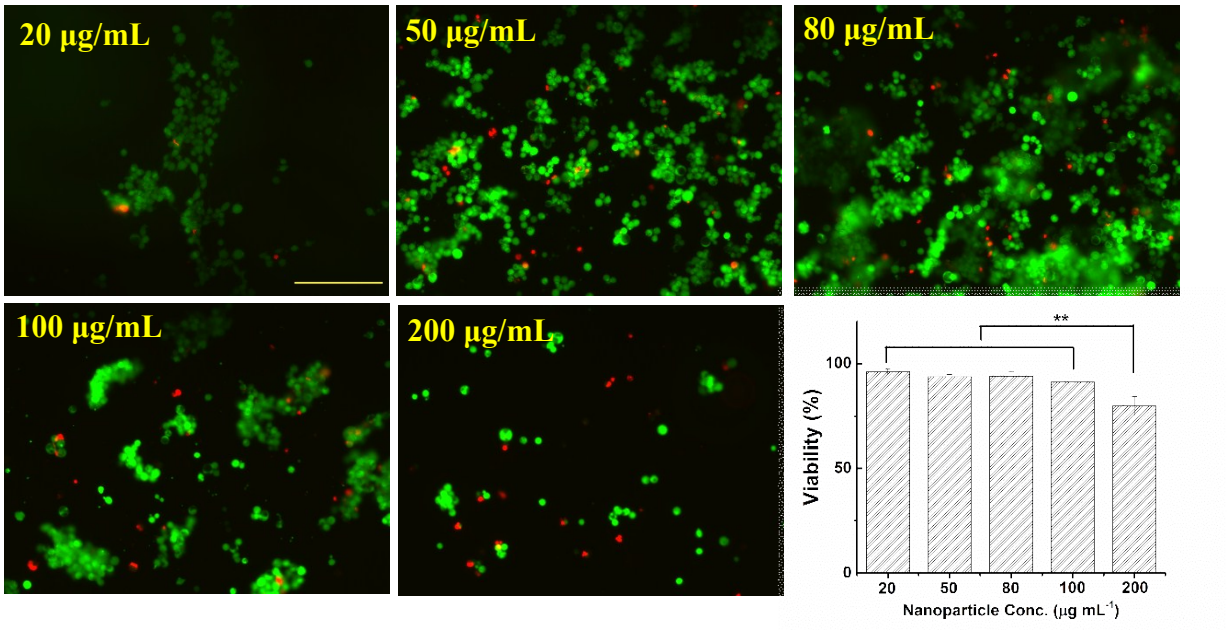

Fig. S2 Viability of GPR120 (+) cells with 24-hr incubation of $CaMoO_4:Eu^{3+}$@AuNR-MBA-Ab nanoprobe at concentrations of 20, 50, 80, 100, and 200 µg/mL. Green fluorescence presented live cells, whereas red fluorescence showed dead or membrane-damaged cells. Over 300 cells were counted for each treatment condition. Scale bar: 200 µm. **P<0.001.

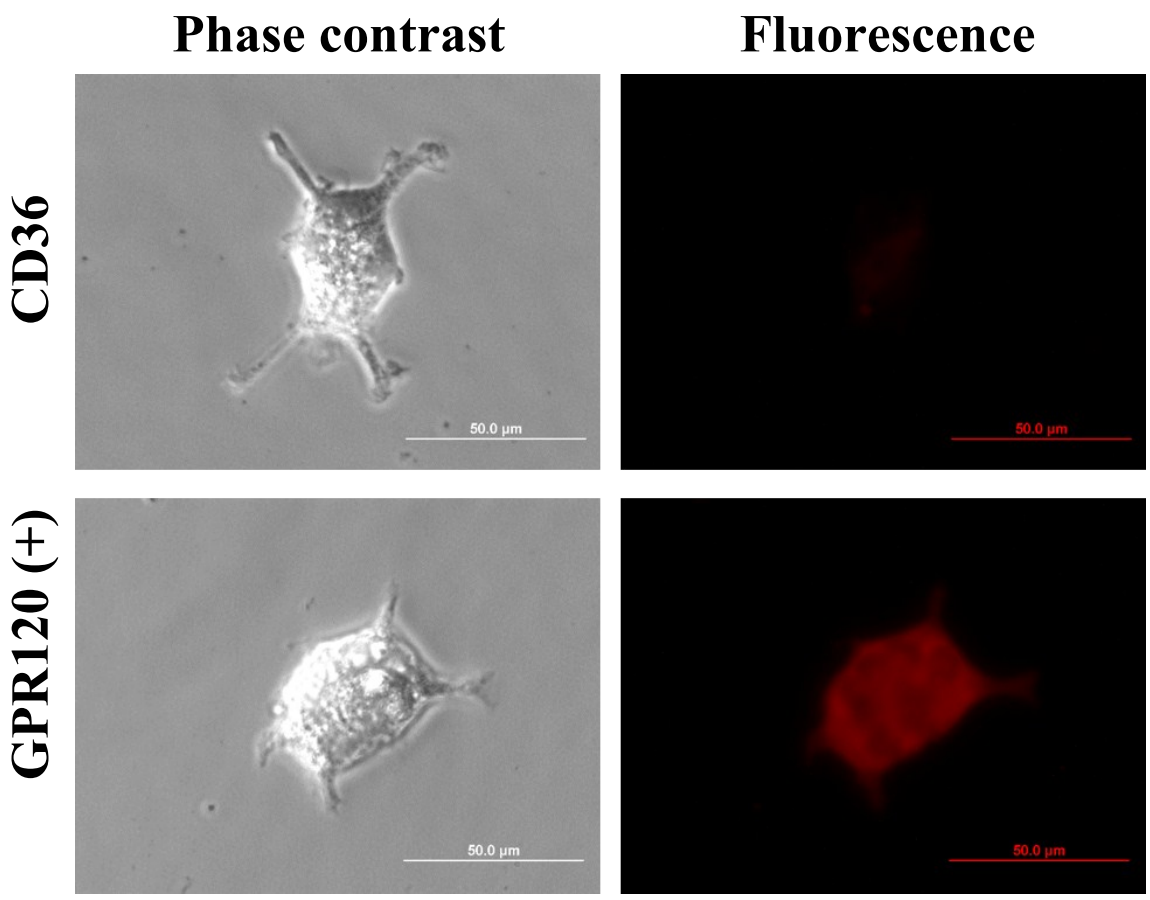

Fig. S3 Phase contrast and corresponding fluorescence images of single CD36 and GPR120 (+) cells incubated with $CaMoO_4:Eu^{3+}$@AuNR-MBA-Ab nanoprobes for 24 hr.

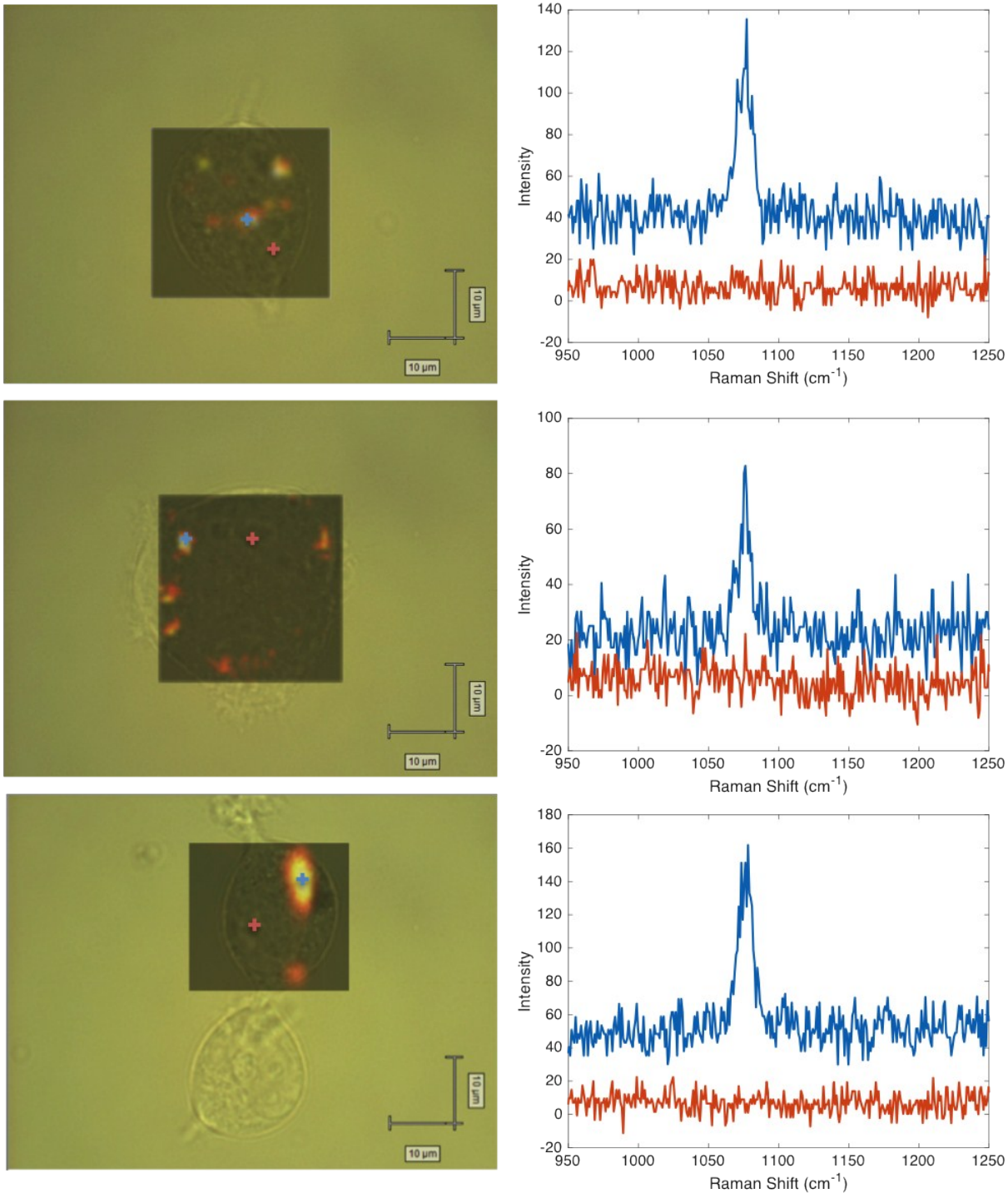

Fig. S4 Additional SERS maps (left) of GPR120 (+) cells incubated with $CaMoO_4:Eu^{3+}$@AuNR-MBA-Ab nanoprobes and spectra (right) extracted at blue and red crosses in the corresponding maps. Raman mappings were generated by the selection of peak 1078 cm^{-1}.