Supplementary Materials

Investigation of Nano-Bio Interactions within a Pancreatic Tumor Microenvironment for the Advancement of Nanomedicine in Cancer Treatment

Abdulaziz Alhussan [1], Kyle Bromma [1], Ece Pinar Demirci Bozdoğan [1], Andrew Metcalfe [2], Joanna Karasinska [2], Wayne Beckham [1,3], Abraham Alexander [3], Daniel J. Renouf [2], David F. Schaeffer [4] and Devika B.

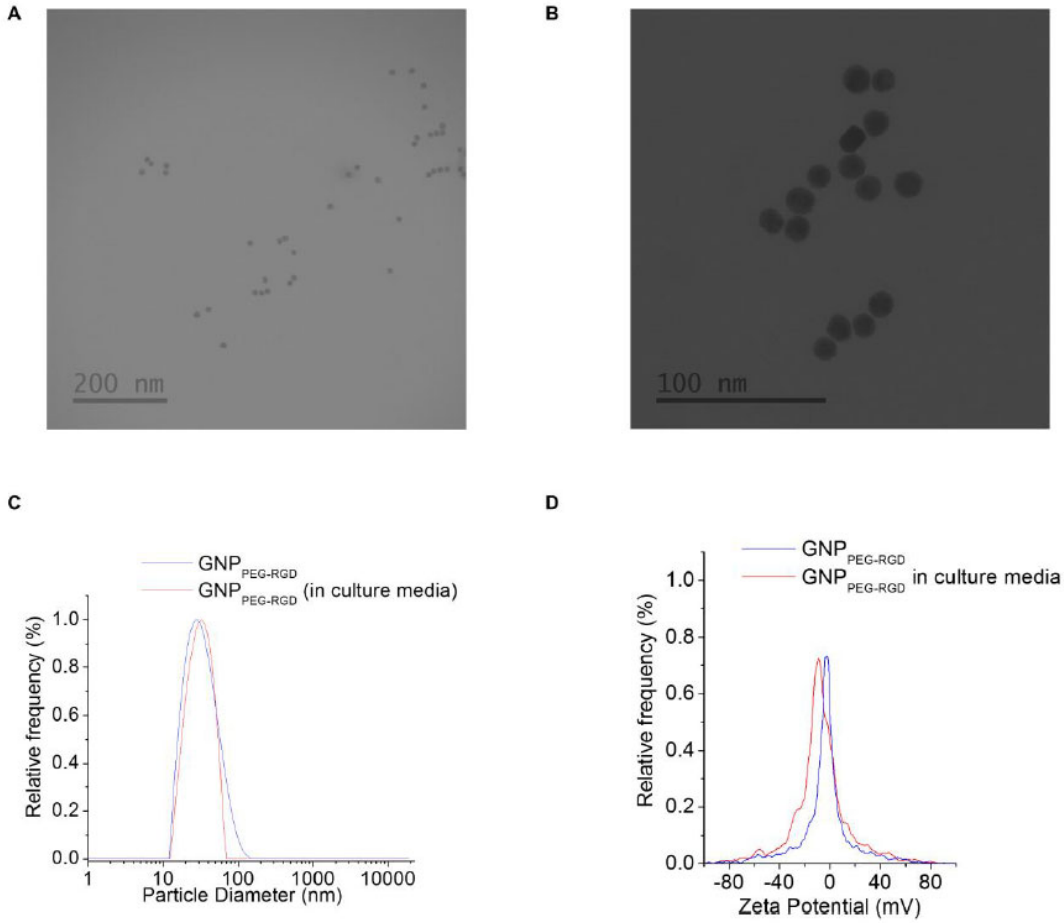

Figure S1. Characterization of gold nanoparticles. A–B) Transmission electron microscopy images of as-made gold nano-parti-cles. C–D) Verifying the stability of GNPs in tissue culture media for an incubation time period of 24 hrs using dynamic light scattering and zeta-potential measurements, respectively.

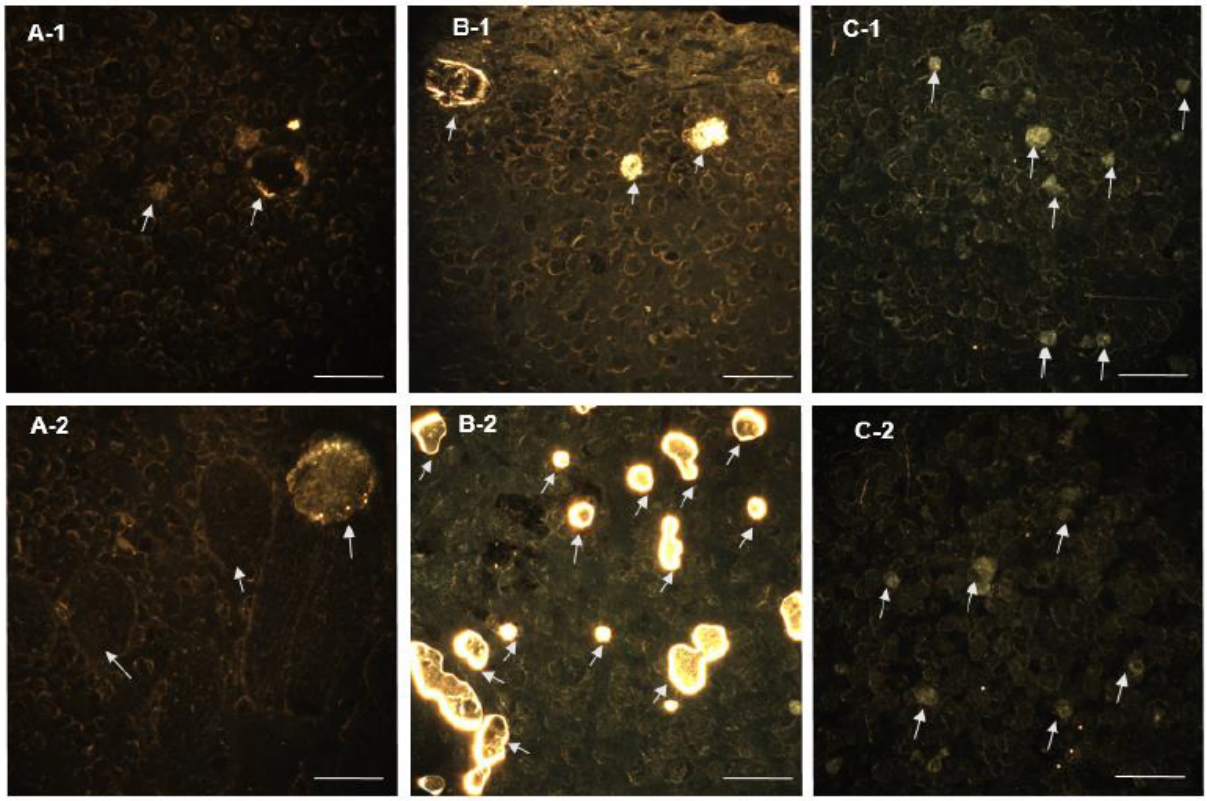

Figure S2. Uptake and retention of GNPs in tumor tissue. **A–C)** Distribution of GNPs in a tumor after 2, 24, and 48 hrs after intravenous injection of GNPs, respectively. Scale bar is 40 μm. Cross-section of blood vessels within the tissue are marked with arrows.

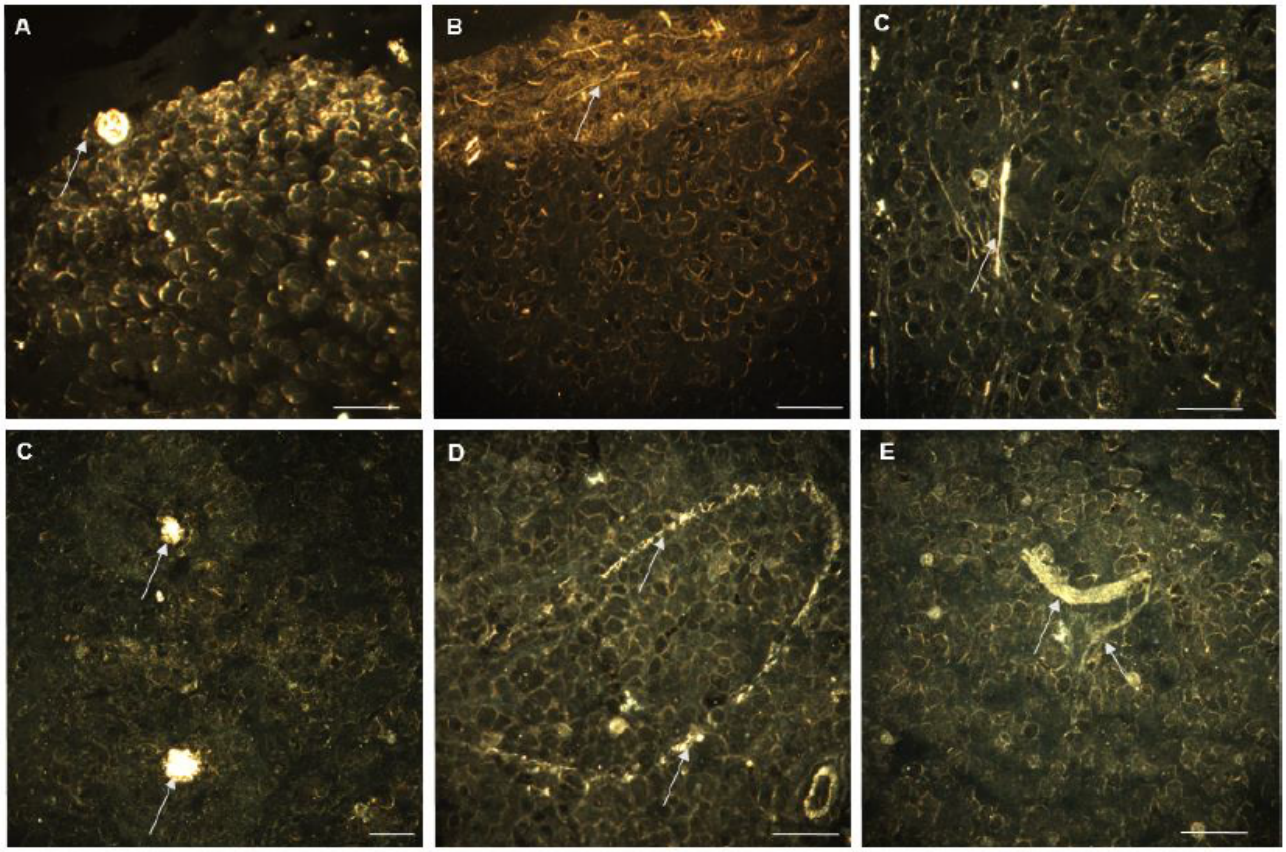

Figure S3. GNP distribution in blood vessels and cells within the tissue after 24 hrs of GNP injection. Scale bar is 40 μm. Cross-section of blood vessels within the tissue are marked with arrows. .

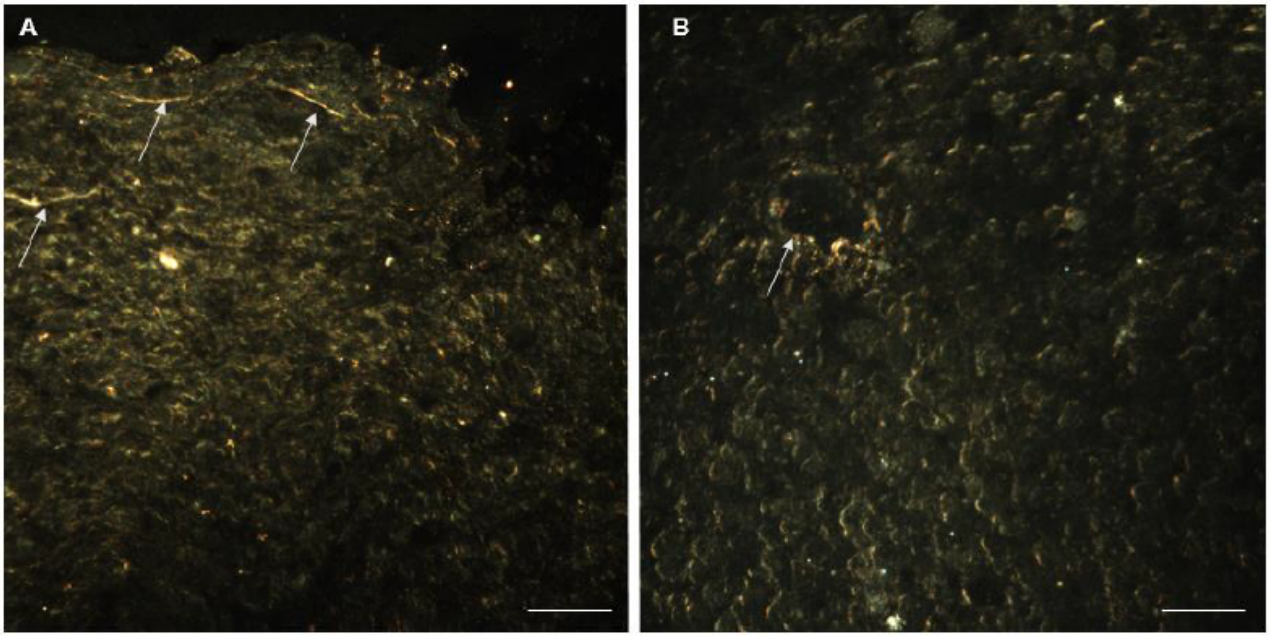

Figure S4. GNP distribution in blood vessels and cells within the tissue after 72 hrs of GNP injection. Scale bar is 40 μm. Cross-section of blood vessels within the tissue are marked with arrows.