

Supplementary Material

Polymer-Functionalized Mitochondrial Transplantation to Fibroblasts Counteracts a Pro-Fibrotic Phenotype

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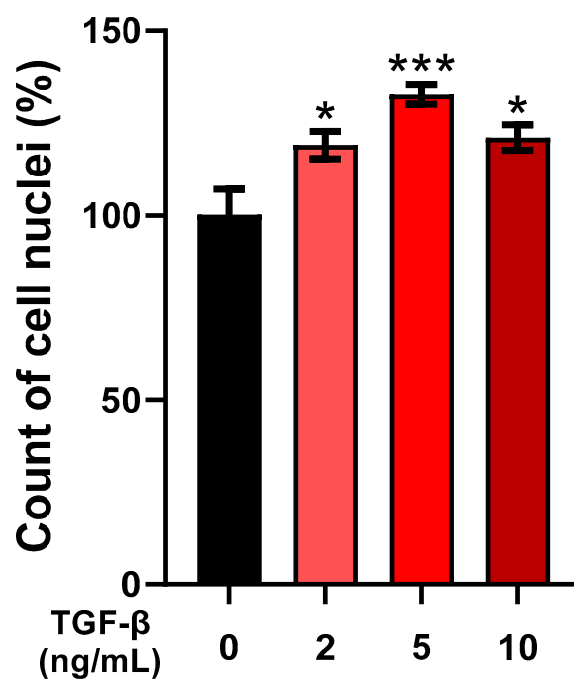


Figure S1. Effect of TGF- β on fibroblast proliferation. Fibroblast proliferation 24 h after TGF- β treatment as determined by DAPI cell counting ($n = 3$). Results were normalized to the 0 ng/mL TGF- β group. * $p < 0.05$; *** $p < 0.001$ vs 0 ng/mL TGF- β group.

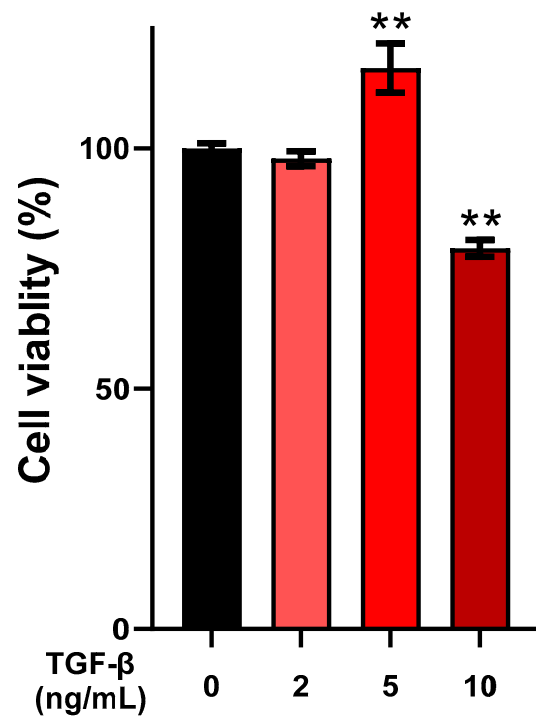


Figure S2. Effect of increasing concentrations of TGF- β on fibroblast viability. Fibroblast viability 24 h after TGF- β treatment as determined by MTT assay ($n = 3$). Results were normalized to the 0 ng/mL TGF- β group. ** $p < 0.01$ vs 0 ng/mL TGF- β group.

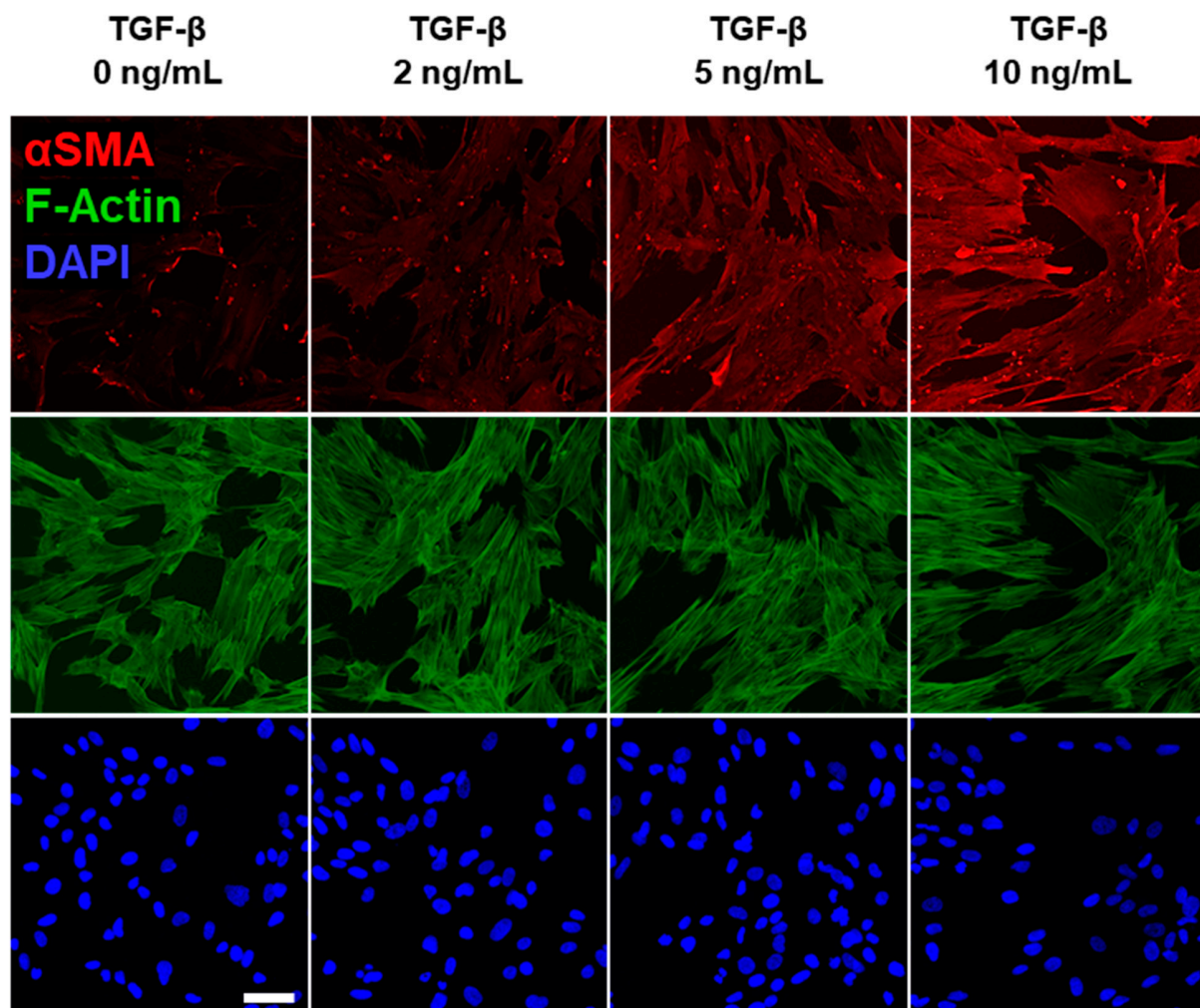


Figure S3. Effect of TGF- β on the expression of the myofibroblast marker α -SMA. Representative immunofluorescence micrographs highlighting expression of α -SMA in TGF- β -stimulated fibroblasts. α -SMA appears red, F-actin is represented in green, and nuclei are highlighted by DAPI staining. The scale bar represents 100 μ m.

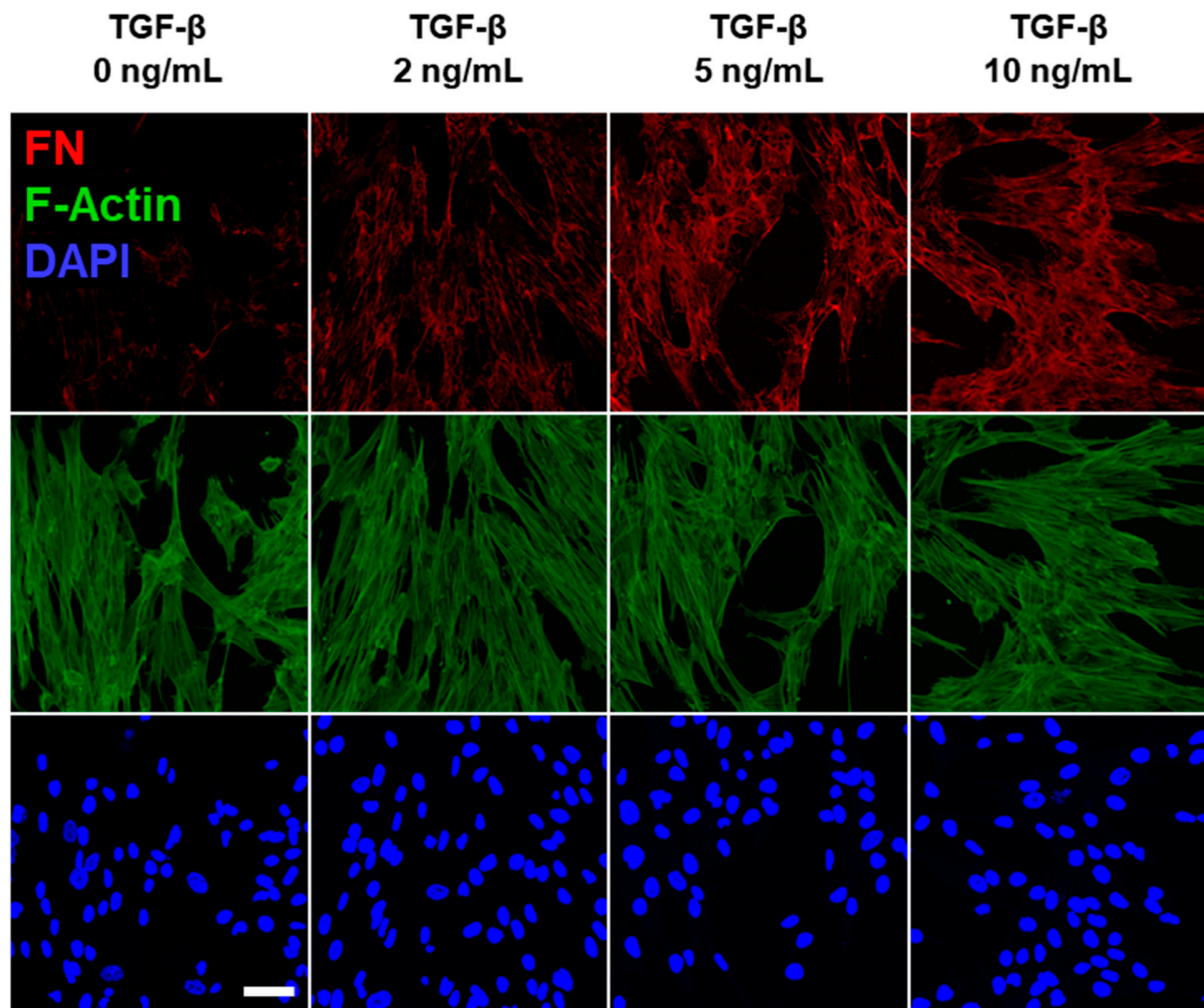


Figure S4. Effect of TGF- β on the expression of the extracellular matrix protein fibronectin (FN). Representative immunofluorescence micrographs highlighting expression of FN in TGF- β -stimulated fibroblasts. FN appears red, F-actin is represented in green, and nuclei are highlighted by DAPI staining. The scale bar represents 100 μ m.

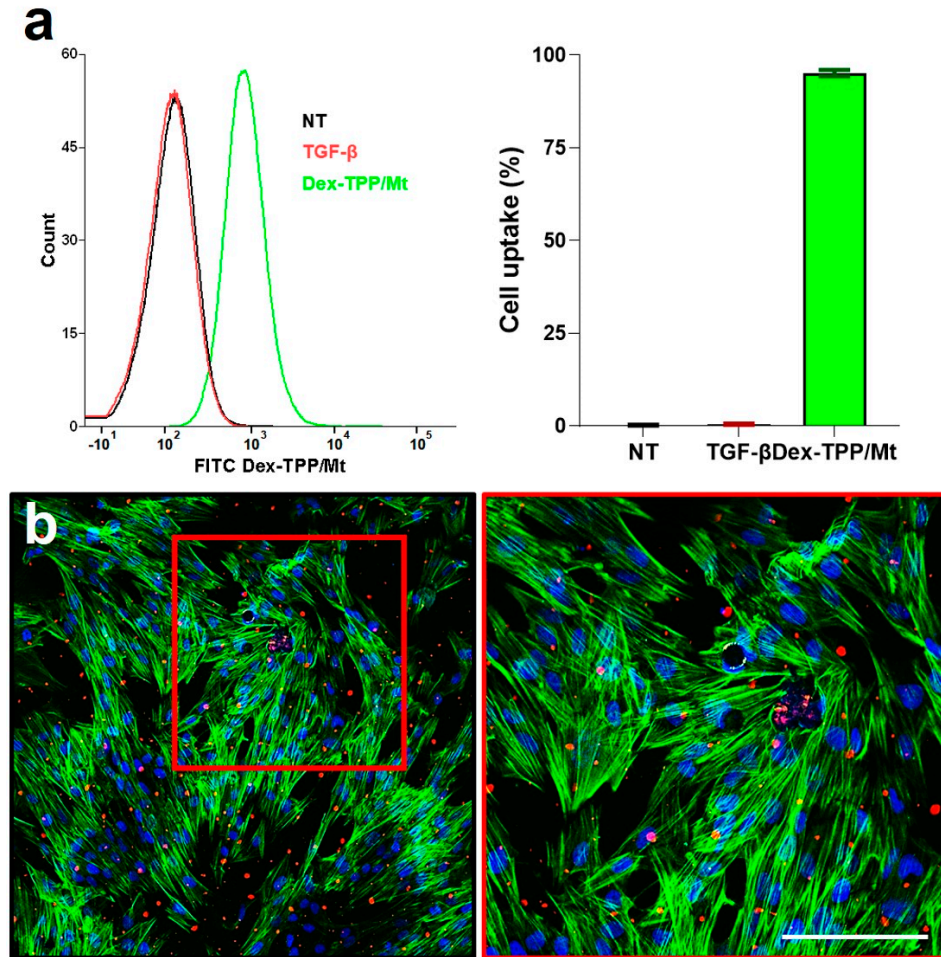


Figure S5. Dex-TPP/Mt uptake in TGF- β -stimulated fibroblasts. **a)** Flow cytometry histogram and percentage of TGF- β -stimulated fibroblasts with FITC-labeled Dex-TPP/Mt-associated fluorescence at a timepoint of 24 h ($n = 3$). **b)** Representative confocal microscopy images of TGF- β -stimulated fibroblasts treated with FITC-labeled Dex-TPP/Mt for 24 h. FITC-labeled Dex-TPP/Mt appear as red, F-actin is represented by green, and DAPI-stained nuclei appear as blue. The scale bar represents 100 μ m.

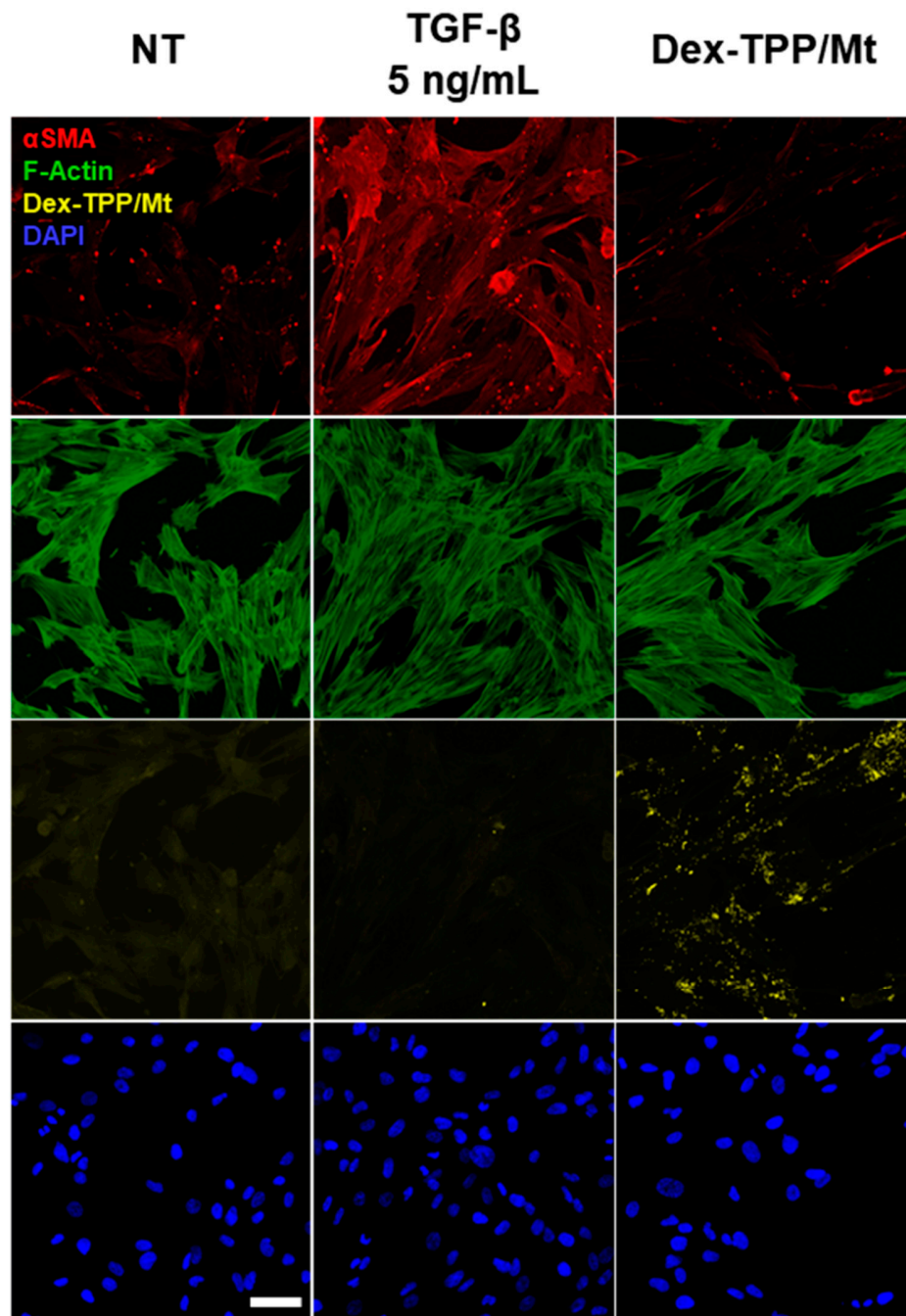


Figure S6. Effect of Dex-TPP/Mt treatment on the expression of the myofibroblast marker α SMA. Representative immunofluorescence micrographs highlighting expression of α SMA in non-treated fibroblasts (NT), TGF- β -stimulated fibroblasts (TGF- β), and TGF- β -stimulated fibroblasts treated with FITC-labeled Dex-TPP/Mt for 24 h. α SMA appears red, F-actin is represented in green, FITC-labeled Dex-TPP/Mt appear yellow, and nuclei are highlighted by DAPI staining. The scale bar represents 100 μ m.

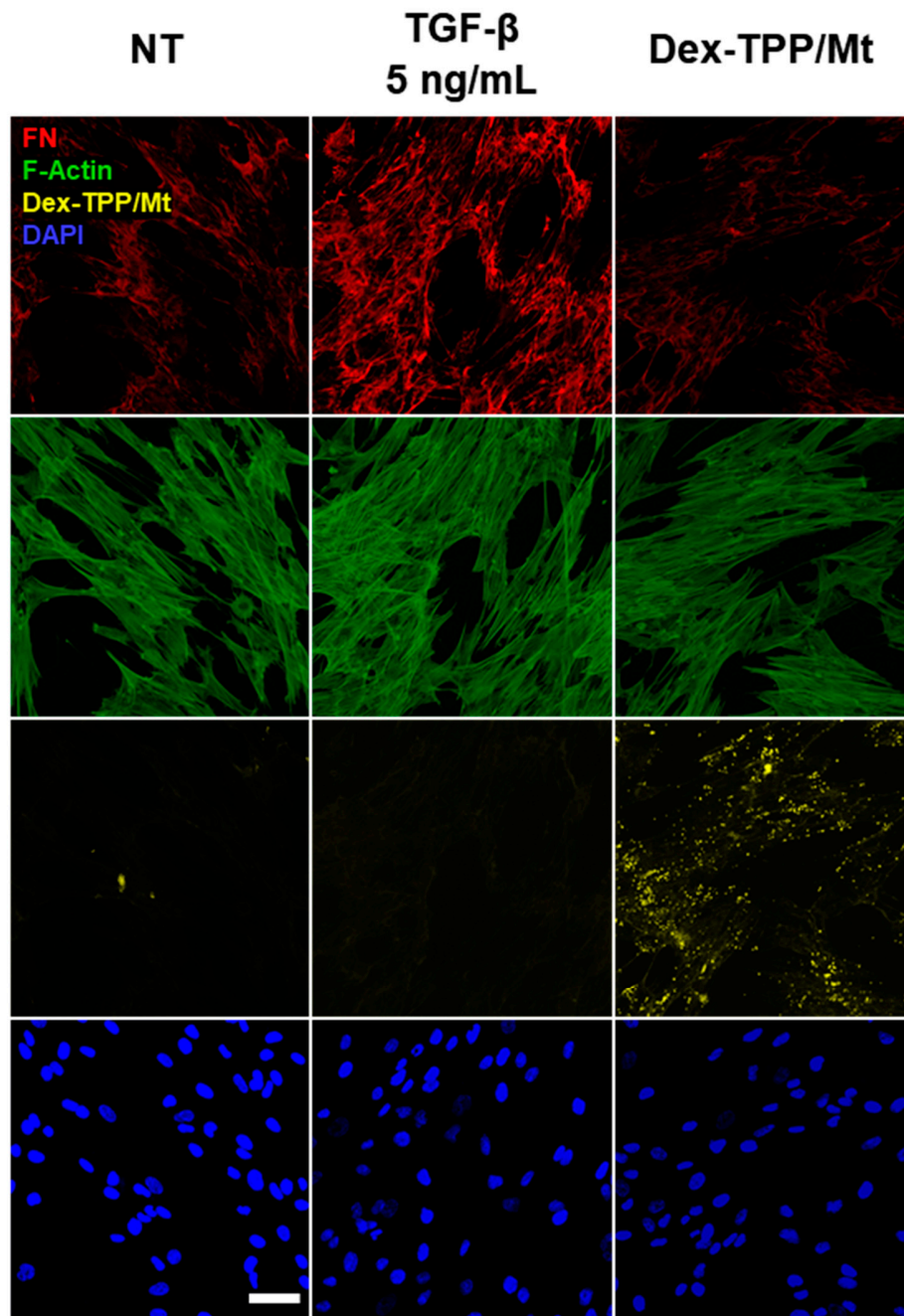


Figure S7. Effect of Dex-TPP/Mt treatment on the expression of the extracellular matrix protein fibronectin (FN). Representative immunofluorescence micrographs highlighting expression of α SMA in non-treated fibroblasts (NT), TGF- β -stimulated fibroblasts (TGF- β), and TGF- β -stimulated fibroblasts treated with FITC-labeled Dex-TPP/Mt for 24 h. FN appears red, F-actin is represented in green, FITC-labeled Dex-TPP/Mt appear yellow, and nuclei are highlighted by DAPI staining. The scale bar represents 100 μ m.