

Supplementary Materials

Phenotypic Heterogeneity and Plasticity of Cancer Cell Migration in a Pancreatic Tumor Three-Dimensional Culture Model

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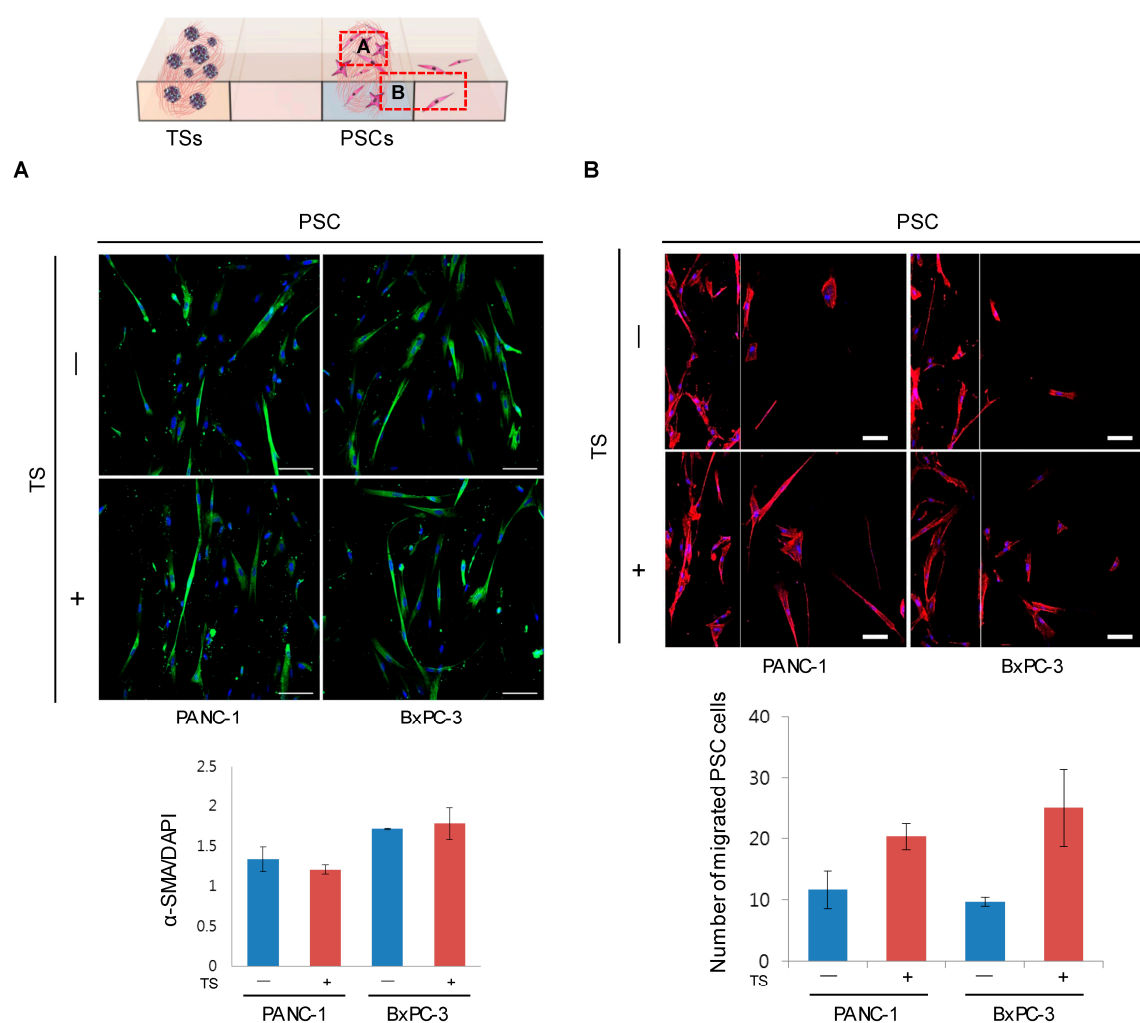


Figure S1. Expression of α -SMA and migration of PSCs when co-cultured with or without tumor spheroids (TSs). No significant difference in the level of α -SMA (**A**) and number of cells migrated out of collagen channels (**B**) under TSs co-culture conditions. Cells were grown for 5 days in collagen-supported microchannel chips. Scale bar: 100 μ m.

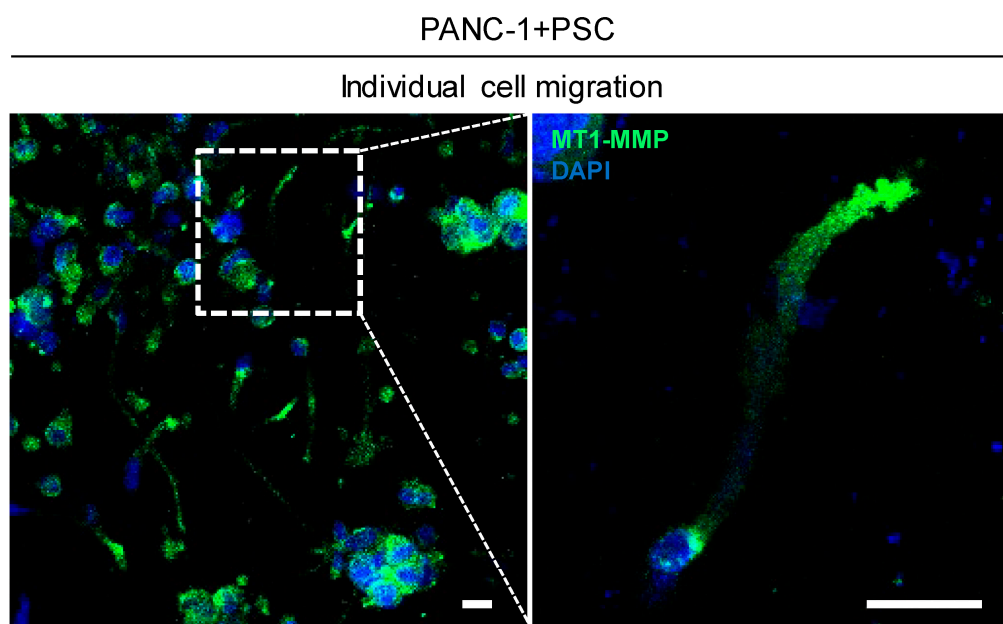


Figure S2. Expression of MT1-MMP in PANC-1 cells migrating with invadopodia. Cells were cultured in a 3D collagen matrix for 5 days and immunostaining was performed without a permeabilization step. Scale bar: 20 μ m.

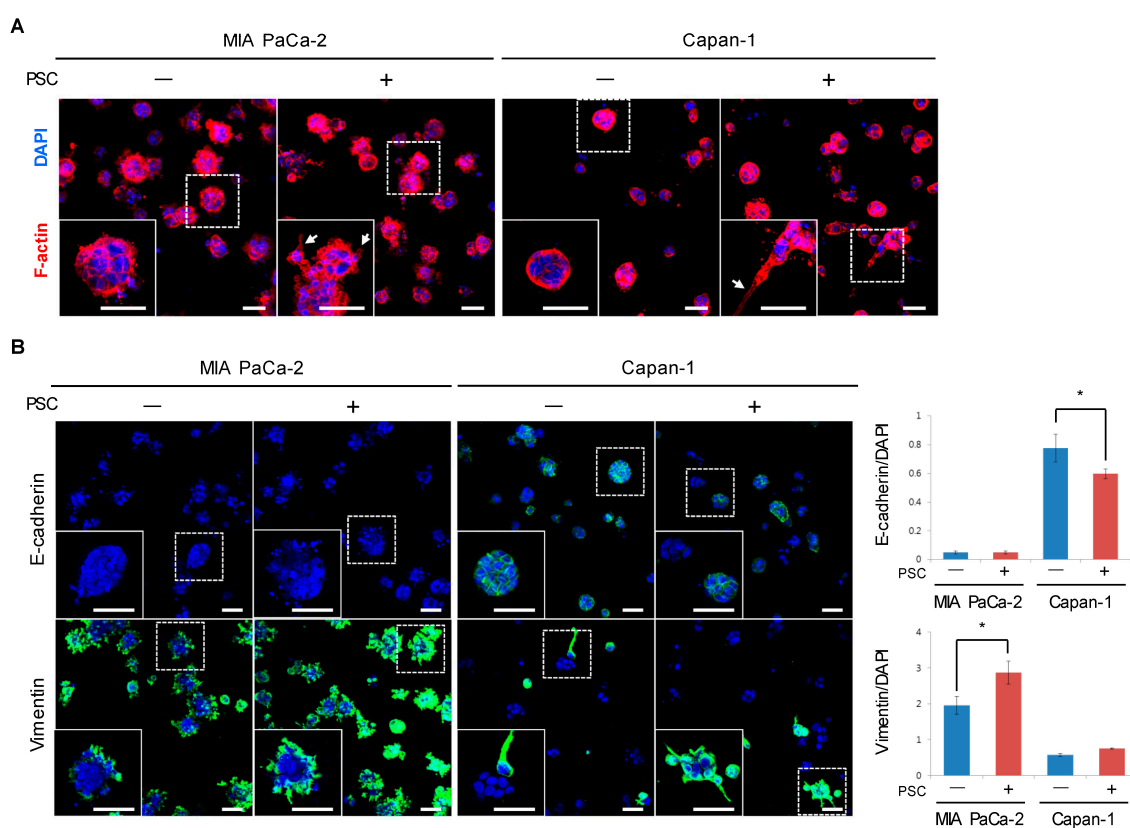


Figure S3. Formation of tumor spheroids (TSs) of MIA PaCa-2 and Capan-1 cells and expression of EMT markers when co-cultured with or without PSCs. (A) Morphology of membrane protrusion shown by actin-based podia (white arrow). (B) Expression of EMT marker proteins E-cadherin and

vimentin. Cells were grown for 5 days in collagen-supported microchannel chips and stained with F-actin, E-cadherin, vimentin and DAPI. Scale bar: 50 μ m. * $p < 0.05$.

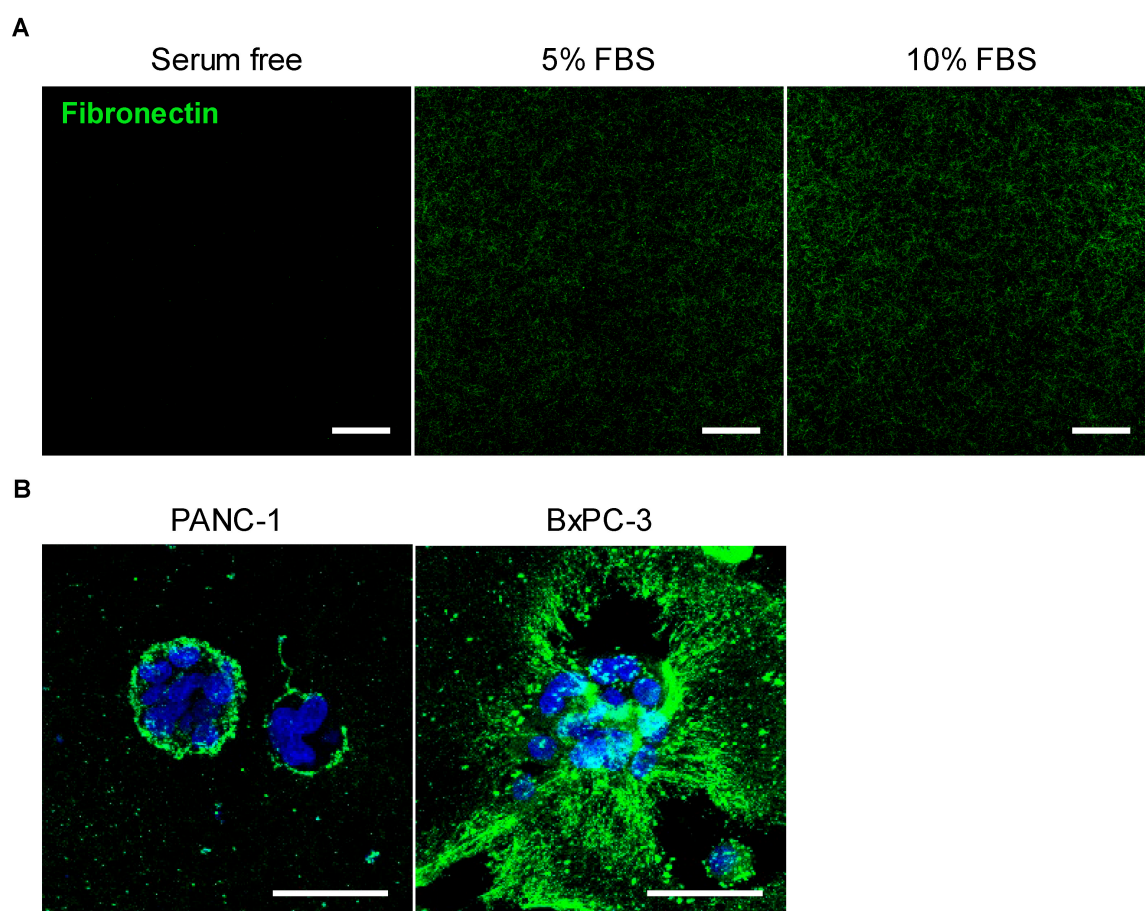


Figure S4. (A) Expression of fibronectin with or without serum in a cell-free collagen matrix. (B) Expression of fibronectin in regions close to the TSs of PANC-1 and BxPC-3 cells. Immunostaining was performed at day 5 of culture. Scale bar: 50 μ m (A, B).



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