biosensors

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Article

Development of an optically induced dielectrophoresis (ODEP) microfluidic system for high-performance isolation and purification of bacteria

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Supplementary Figure

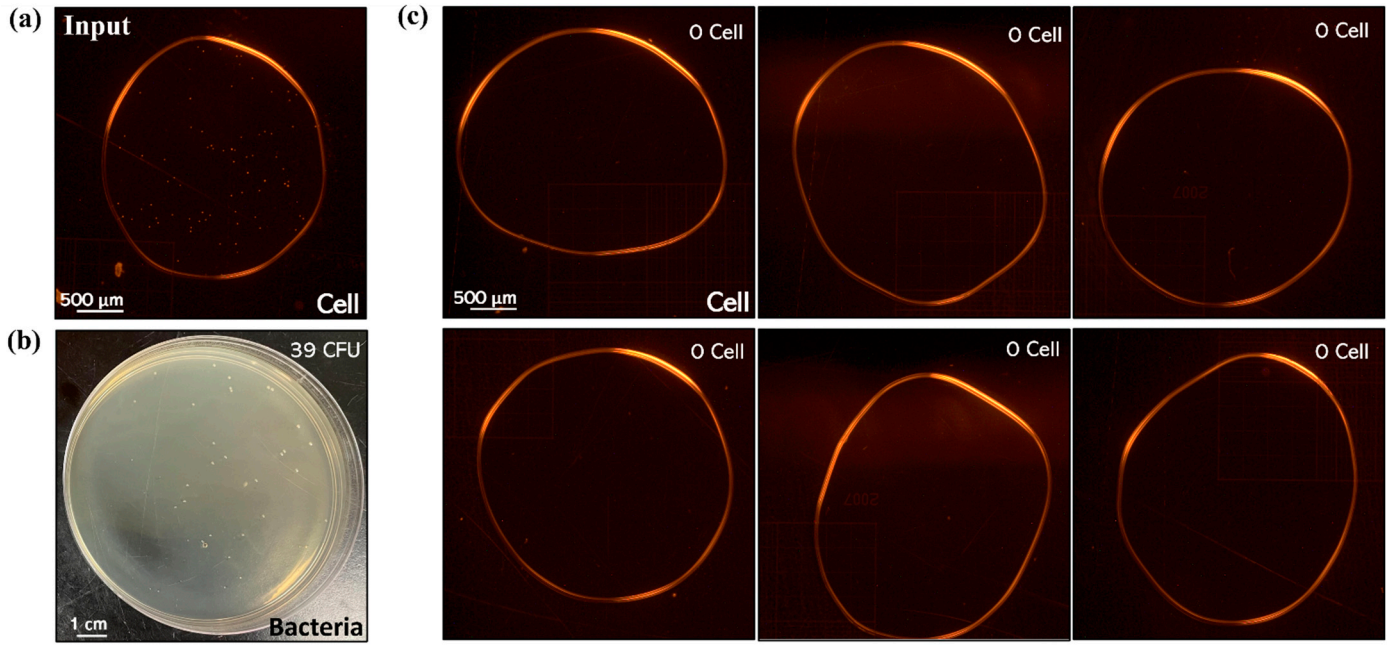

Figure S1. (a) The microscopic observation of cells in 1µm of prepared sample (containing the SW620 cancer cells pre-stained with calcein red-orange-dye) before loading into the ODEP microfluidic system, **(b)** the photograph of bacteria culture of the processed sample (the 1:1 case study) harvested from the downstream part of main microchannel, and **(c)** the microscopic observations (six views) of cells in the processed sample harvested from the downstream part of main microchannel (demonstrating no cell was found in the processed sample).

Supplementary Video

Supplementary video S1 The video clip of the flowing cells trapped, and transported by the designed dynamic circular light image array with uniform front line design

Supplementary video S2 The video clip of the flowing cells trapped, and transported by the designed dynamic circular light image array with jagged front line design

Supplementary video S3 The video clip demonstrating the use of the proposed ODEP-based method for the isolation and purification of bacteria from a mixture sample containing cells and bacteria