Electronic Supplementary Information

A tunable 3D optofluidic waveguide dye laser via two centrifugal Dean flow streams

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Simulation results of the confinement by 2D liquid waveguide and 3D liquid waveguide:

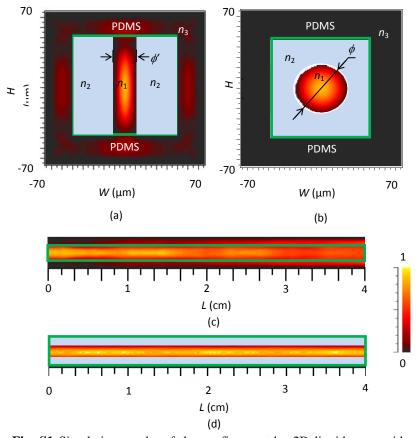


Fig. S1 Simulation results of the confinement by 2D liquid waveguide and 3D liquid waveguide. The cross-sectional intensity at the end of (a) 2D waveguide, and (b) 3D waveguide. The intensity field along the waveguide length in the vertical direction of (c) 2D waveguide, and (d) 3D waveguide. Insides green line: liquids. Outside the green line: PDMS. The light blue areas represent the DI water claddings.

The relationship of the volume ratio of the liquid core and the parameter ϕ :

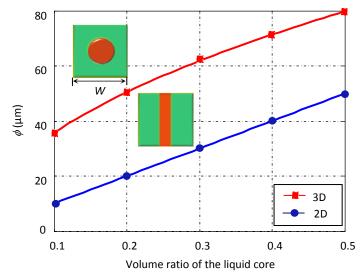


Fig. S2 The relationship of the volume ratio of the liquid core and the parameter ϕ .