

Abstract Submitted  
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**Slip length measurement using BBM** ADIB AHMADZADEGAN, CRAIG SNOEYINK, Mechanical Engineering Department of Texas Tech University — We will be presenting experimental characterizations of slip lengths of fluids in nano/micro channels. These channels are becoming increasingly important in sensor and separations applications. However, crucial questions still remain on the mechanisms that govern slip-length behavior. We used Bessel Beam microscopy (BBM), a novel super-resolution imaging system, in conjunction with TIRF system. These two, together led us to be able to do Particle Tracking Velocimetry with significantly higher accuracy than previously possible. We will be presenting results demonstrating the feasibility of this approach and advantages that make this method unique.

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