

High-school physics activities in microfluidics: Flow and diffusion in multiphase aqueous solutions

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My project was to find a way to facilitate a better understanding fluid properties in the high school classroom. Through microfluidics, I was able to create an activity that promotes critical thinking and introduces a branch of science that is gaining popularity due to its variety of uses across industries.

By creating a functional microfluidic chip in a classroom, I will be able to successfully illustrate principles of fluid dynamics to my students, including flow rate, viscosity, laminar flow, and diffusion between two solutions. This project has really rejuvenated my drive to promote research to my students and encourage them to ask questions and try new things.

