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# analytical chemistry

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## Multi-Dimensional Separations of Polymers



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**ON THE COVER:** At the heart of a comprehensive two-dimensional liquid chromatograph (LC × LC) is a switching valve with two loops for storage and re-injection of fractions from the first-dimension effluent. Graphic supplied by Petra Aarnoutse.

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**Mass Spectrometric Detection of Nanoparticle Host–Guest Interactions in Cells**

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**Effects of Protein–Ligand Interactions on Hydrogen/Deuterium Exchange Kinetics: Canonical and Noncanonical Scenarios**

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**Pneumatic Microvalve-Based Hydrodynamic Sample Injection for High-Throughput, Quantitative Zone Electrophoresis in Capillaries**

Ryan T. Kelly,\* Chenchen Wang, Sarah J. Rausch, Cheng S. Lee, and Keqi Tang