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Nonequilibrium Dynamics of Polymer Translocation

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When a flexible chain is pulled or sucked, it can initially respond only locally, and sequential nonequilibrium processes with large conformational distortion follow in line with the propagation of tensile force along the chain backbone. This is a generic dynamical response property of polymers, the understanding of which provides us with a viewpoint to capture an essential aspect of the driven translocation process. In the meeting, I will summarize a basic framework to analyze the nonequilibrium dynamics of driven translocation process alongside of recent progresses.

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