DIS 2015
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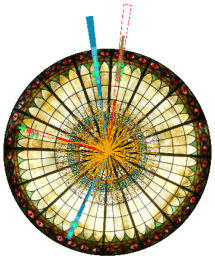

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NNLL Resummation of Event-Shapes in e^+e^- Annihilation

Thursday 30 April 2015 12:00 (25 minutes)

Event shape observables are essential tools for studying the behaviour of high energy QCD. Yet in the region where soft and collinear gluon emission is most dominant, standard perturbation theory is rendered unreliable and the series must be resummed to all orders in the strong coupling. We have recently developed a general method for the resummation of event shapes, in e+e- annihilation, at next-to-next-to-leading logarithmic accuracy. We implement the novel method semi-numerically and reproduce four already-known predictions, as well as producing three new results. We match our findings to fixed-order results, up to NNLO.

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