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RG-improved resummation of super-leading logarithms

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The higher-order behavior of logarithmically enhanced contributions in non-global LHC observables is very intricate, in particular as double-logarithmic corrections – so-called super-leading logarithms (SLLs) – arise first at high orders in perturbation theory.

Their all-order resummation has been understood recently by means of a factorization formula in soft-collinear EFT.

In this talk, I will discuss improvements in the resummation of SLLs, including a renormalization-group treatment with a running coupling constant, as well as corrections from higher-order Glauber exchanges.

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