## **QCD Evolution 2024**



ID contributo: 12 Tipo: non specificato

## SIDIS at small x: Sudakov double logs from NLO corrections

martedì 28 maggio 2024 09:30 (30 minuti)

We calculate the next to leading order corrections to SIDIS at small Bjorken x using the color glass condensate formalism. We first show that all UV and soft divergences cancel. We then show that collinear divergences are absorbed into DGLAP evolution of quark-hadron fragmentation function while the rapidity divergences are absorbed into BK/JIMWLK evolution of dipoles. We finally show that imposing a kinematic constraint on the radiated gluon allows one to extract the Sudakov double log contributions in the high  $Q^2$  limit.

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Classifica Sessioni: Tuesday