

Physics Division Seminar

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Probing Polarized Parton Distribution Functions at the EIC

Host: José Repond

Monday, March 11, 2019 – 203, R150, 3:30 PM

We discuss the phenomenology of polarized inclusive jet production in electron-proton collisions at a future Electron-Ion Collider (EIC). Our study uses the flexible parton-level code DISTRESS which predicts EIC cross sections at next-to-leading order in perturbative QCD including all relevant partonic channels and resolved photon contributions. We elucidate the role of different kinematic regions in probing different aspects of proton and photon structure and study the impact of the EIC collision energy on the measurement of polarized parton distribution functions.