Quantum chromodynamics: string theory meets collider physics



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Reggeon transition vertices from the gauge invariant effective action

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We investigate the derivation of reggeon transition vertices from Lipatov's gauge invariant effective action for high energy processes in QCD. In particular we address the question of longitudinal integrations in order to reduce the vertices into the required purely transverse form. We present a momentum space derivation of the BFKL-kernel and verify the vanishing of the 2 to 3 reggeon transition vertex. In addition we show first results on the derivation of the 2 to 4 reggeon transition vertex.

Primary author: Mr HENTSCHINSKI, Martin (University of Hamburg)

Co-authors: Prof. BARTELS, Jochen (University of Hamburg); Prof. LIPATOV, Lev (University of Hamburg)

Presenter: Mr HENTSCHINSKI, Martin (University of Hamburg)

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