

Stony Brook University
The Graduate School

Doctoral Defence Announcement

Abstract

Aspects of Perturbative QFT

by

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This thesis consists of three parts. The first is devoted to the calculation of multiplicity of two-gluon production in heavy ion collisions in the framework of Colour Glass Condensate. The second exhibits a finite basis for the perturbative correlation functions at a given loop order. The third demonstrates that the number of integrations in a perturbative amplitude can be reduced in half in even dimensions, and provides explicit formula for such a reduction in the (2,2) signature.

Date: April 22, 2014

Time: 10:30 am

Place: YITP-Common Room

Program: Physics

Dissertation Advisor: George Sterman