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## Wavefunctions and Yukawa couplings on Resolutions of C^N/Z\_N Orbifolds

Wednesday, 4 December 2019 17:20 (15 minutes)

We propose matter wavefunctions on resolutions of C^N/Z\_N singularities with magnetic fluxes. In this talk, we first discuss the resolution of magnetized T^2/Z\_N orbifold models. In the blow-down limit of T^2/Z\_N orbifolds, the obtained wavefunctions of chiral zero-modes result in those on the magnetized T^2/Z\_N orbifold models, but only the wavefunctions of Z\_N-invariant zero-modes receive the blow-up effects around fixed points of T^2/Z\_N orbifolds. Such blowup effects change the selection rules and Yukawa couplings among the chiral zero-modes as well as the modular symmetry, in contrast to those on the magnetized T^2/Z\_N orbifold models. We also discuss the matter wavefunctions on resolutions of K3 orbifolds.

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Session Classification: Short talks