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Prakash Belkale* (belkale@email.unc.edu), CB #3250, Phillips Hall, UNC-Chapel Hill, Chapel Hill, NC 27599, and **A. Gibney** and **S. Mukhopadhyay**. *Nonvanishing of conformal blocks divisors on the moduli space of curves.*

Conformal blocks (associated to a simple complex Lie algebra, n representations and a level ℓ) form vector bundles on the moduli spaces of stable pointed curves. One can view them as generalizing classical invariant theory, while at the same time being objects associated to the moduli of curves. They give rise to nef line bundles in genus 0.

After a brief introduction to conformal blocks I will discuss recent work (joint with Gibney and Mukhopadhyay) on the nonvanishing properties of these divisors (in genus 0). We view the non-vanishing question as a higher Chern class generalization of the non vanishing statements of classical invariant theory (Horn, Saturation conjectures). (Received September 23, 2014)