APR12-2012-000402

Abstract for an Invited Paper for the APR12 Meeting of the American Physical Society

Standard model Higgs boson search results with the full Tevatron dataset¹

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The Tevatron's program of colliding protons and anti-protons at a center-of-mass energy of 1.96 TeV ended in September of 2011 after more than 25 years of data collection. I will describe the recent efforts of the CDF and D0 collaborations to maximize their sensitivity to the Higgs boson using the complete dataset. The sensitivity of the LHC experiments at CERN is quickly surpassing the Tevatron in most new physics searches; however, in some Higgs decay channels, such as searches in the b b-bar final state, the Tevatron results will remain competitive for quite some time. I will focus the talk on the Tevatron results with the full dataset, but will also discuss the complementarity of the information that will be provided by the Tevatron and LHC experiments.

¹on behalf of the CDF and D0 collaborations