

Abstract Submitted
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Search for Scalar and Vector Third Generation Leptoquarks with one τ Decaying to an Electron TAKASHI AKIMOTO, University of Tsukuba —
At Run II of the Fermilab Tevatron, the CDF experiment provides good sensitivity for either discovery or setting limits on 3rd generation scalar and vector leptoquark (LQ_3) pair-production, where each leptoquark decays $LQ_3 \rightarrow \tau b$. The estimated cross section at the Tevatron for this process is 1 pb for scalar (vector) LQ_3 masses of 135 (~ 200 , depending on coupling) GeV/ c^2 . We perform a search for such production in the $(\tau \rightarrow e) + \tau_h$ channel using about 400 pb $^{-1}$ of data taken at $\sqrt{s} = 1.96$ TeV.

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