Abstract Submitted for the APR05 Meeting of The American Physical Society

**CP violation in**  $B \to D^{(*)} \overline{D^{(*)}}$  **decays** TIMOFEI PIATENKO, Caltech, BABAR COLLABORATION — The BaBar experiment at the Stanford Linear Accelerator Center is designed to make precision tests of the Standard Model of elementary particle physics. One of the main goals is to measure the angles of the unitarity triangle, which describes the mixing of quark flavors by the weak interaction. Charged and neutral  $B \to D^{(*)} \overline{D^{(*)}}$  decays provide a mechanism for constraining the unitarity triangle as well as studying the phenomenon of CP violation. We study these decay modes using BaBar's data sample of 237 million  $B\bar{B}$  pairs.

> Christopher Hearty University of British Columbia

Date submitted: 11 Jan 2005

Electronic form version 1.4