

Abstract Submitted
for the MAR11 Meeting of
The American Physical Society

ARPES Studies on $FeTe_{1-x}Se_x$ ¹ HONGBO YANG, ZHIHUI PAN, GENDA GU, PETER JOHNSON, Condensed Matter Physics and Materials Science Department, Brookhaven National Laboratory, MICHAEL WEINERT, Department of Physics, University of Wisconsin - Milwaukee — Angle-resolved Photoelectron Spectroscopy (ARPES) is used to study the electronic structure of Fe based superconductor, $FeTe_{1-x}Se_x$. Detailed comparisons are made between the measured Fermi surfaces and first principles FLAPW calculations. In particular we explore the origin of a Dirac like cone at the center of the Brillouin zone.

¹The work at Brookhaven is supported by the Department of Energy, that at the University of Wisconsin - Milwaukee by the National Science Foundation.

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Date submitted: 27 Nov 2010

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