

Abstract Submitted  
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**The evolution of electronic structure of  $\text{Bi}_2\text{Sr}_{2-x}\text{Bi}_x\text{CuO}_{6+\delta}$  revealed by ARPES** ZHIHUI PAN, P. BISHAY, P. RICHARD, M. NEUPANE, Z. WANG, H. DING, Boston College, H.-H WEN, Institute of Physics and National Lab for Condensed Matter Physics China —  $\text{Bi}_2\text{Sr}_{2-x}\text{Ln}_x\text{CuO}_{6+\delta}$  (Ln is a trivalent element) is a good candidate to investigate the effects of charge doping and potential disorder to the properties of the high-Tc cuprates. High-quality single crystals of  $\text{Bi}_2\text{Sr}_{2-x}\text{Bi}_x\text{CuO}_{6+\delta}$  (Bi-Bi2201) have been synthesized over a wide substitution range ( $0 < x < 0.6$ ) where the sample evolves from an overdoped superconductor to an insulator. We will report our ARPES results on the evolution of electronic structure of Bi-Bi2201.

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