

Abstract Submitted  
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**High Temperature Resistivity in the Sr-122 Iron Pnictides and in the Electron-Doped Cuprates** PAUL BACH, SHANTA SAHA, KEVIN KIRSHENBAUM, JOHNPIERRE PAGLIONE, RICHARD GREENE, Center for Nanophysics and Advanced Materials, University of Maryland — The electrical resistivity in the Sr-122 iron-pnictides and electron-doped cuprates were measured up to 800K. A resistivity saturation at the Mott-Ioffe-Regel limit was observed in the  $SrFe_2As_2$  system, both in the parent compound and at several dopings, Ni=0.14, Ni=0.18, Co=0.3. Below this limit, but above the Debye temperature, the resistivity increases linearly. The electron-doped cuprates, PCCO and NCCO, were also measured at high temperatures. The resistivity does not saturate, showing a violation of the Mott-Ioffe-Regel limit consistent with other cuprate systems. This contrasts strongly with the 122's more typical metallic behavior. Supported by NSF grant DMR-0653535.

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