

# Origin of the upturn in resistivity in cuprates probed by thermal conductivity

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We report low temperature thermal conductivity measurements in the cuprate superconductor LSCO for samples with a doping  $x$  between 0.125 and 0.15. In this doping range, spin-density-wave order coexisting with superconductivity can be induced by applying a magnetic field [1,2]. We study the impact of this order on the conduction of  $d$ -wave quasiparticles by measuring the residual thermal conductivity  $\kappa_0/T$  in the  $T \rightarrow 0$  limit, as a function of doping and magnetic field.

[1] B. Khaykovich *et al.*, Phys. Rev. B **71** 220508 (2005).

[2] J. Chang *et al.*, Phys. Rev. B **78** 104525 (2008).