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Two fluid analysis of La and Cd doped CeIrIn₅. NICHOLAS BERRY, University of California Irvine, ANDREA BIANCHI, Universite de Montreal, ZACHARY FISK, University of California Irvine — The heavy fermion superconductor CeIrIn₅ has been shown to have a ground state dependence on Cd doping which induces antiferromagnetism while suppressing superconductivity. This system provides an interesting regime in which to study the onset of the heavy fermion superconducting and antiferromagnetic ground states as well as the interplay between the different electronic interactions at low temperatures. The Two Fluid Model has quantified the energy scales in the related La doped CeCoIn5. We attempted a two fluid analysis on specific heat and susceptibility measurements of La and Cd doped CeIrIn₅ single crystals.

Nicholas Berry UCI

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