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Effect of disorder on sign reversing s-wave pair state for Fepnictides VIVEK MISHRA, G. BOYD, S. GRASER, P. J. HIRSCHFELD, Department of physics, University of Florida, Gainesville, FL-32611, USA. — In this work, we consider a phenomenological model for sign changing s-wave order parameters appropriate for the ferropnic superconductors. We consider both magnetic and non-magnetic impurities within the Born approximation, and study the effects of this disorder on transport properties in superconducting state. We compare our results with experimental data for Fe-pnictides, where such a sign-changing s-wave state may be realized.

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