The Pressure Coefficients of the Superconducting Order Parameters at the Ground State of Ferromagnetic Superconductors

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We investigated the pressure coefficients of the superconducting order parameters at the ground state of ferromagnetic superconductors based on the microscopic single band model by Linder et al.[1,2] The superconducting gaps (i) with the line node and (ii) similar to the ones seen in the thin film of A2 phase in liquid ^{3}He were used. Our numerical results are in qualitative agreement with experimental observations. This study shows that we would be able to estimate the pressure coefficients of the superconducting and magnetic order parameters at the ground state of ferromagnetic superconductors.

1. Linder et al., Phys. Rev. B**76**, 054511 (2007).
2. Linder et al., Phys. Rev. B**77**, 184511 (2008).

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