On the semi-classical analysis of the groundstate energy of the Dirichlet Pauli operator

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Abstract

Motivated by a recent paper by Ekholm–Kowarik–Portmann, we analyze the semi-classical analysis of the ground state energy of the Dirichlet-Pauli operator. Tunneling effect can be measured with some analogy with the semi-classical analysis of the small eigenvalues of a Witten Laplacian, as analyzed in papers by Helffer-Sj[']ostrand, Helffer-Klein-Nier, Helffer-Nier, The presented works are in collaboration with Mikael Persson Sundqvist (Lund) and Hynek Kowarik (Brescia).

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