Ann. Scuola Norm. Sup. Pisa Cl. Sci. (5) Vol. IV (2005), 319-355

Improved estimates for the Ginzburg-Landau equation: the elliptic case

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Abstract. We derive estimates for various quantities which are of interest in the analysis of the Ginzburg-Landau equation, and which we bound in terms of the GL-energy E_{ε} and the parameter ε . These estimates are local in nature, and in particular independent of any boundary condition. Most of them improve and extend earlier results on the subject.

Mathematics Subject Classification (2000): 35J60 (primary); 35B40, 35Q40, 31B35, 46E35 (secondary).