Turkish Journal of Physics

phys@tubitak.gov.tr

Scientific Journals Home Page

A Mean Field Model With Two Order Parameters for Three-Phase Coexistence Near the Tricritical Point

S. SALİHOĞLU
Department of Physics, İstanbul Technical University,
80626 Maslak, İstanbul-TURKEY

Abstract: This study gives a mean field model with two order parameters for three-phase coexistence near the multicritical point. The critical exponents calculated from our model are the tricritical exponents for the order parameters, susceptibility and the specific heat. Hence, our mean field model describes adequately the tricritical behaviour of a system in the region of three-phase coexistence.