Abstract Submitted
for the MAR06 Meeting of
The American Physical Society

Quantum phase transition from a valence bond crystal to an antiferromagnet[1] KENNETH GRAHAM, University of Michigan, Dept. of Physics, SAMUEL MOUKOURI, University of Michigan, Dept. of Physics and Michigan Center for Theoretical Physics — We use the recently proposed two-step density-matrix renormalization group to study a ground state phase transition from a dimerized phase to a Néel phase in a frustrated spatially anisotropic Heisenberg and $t - J$ models. We compute critical exponents for the gap and correlation functions.

[1]We thank the NSF for support via grant no. DMR-0426775.

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Date submitted: 30 Nov 2005 Electronic form version 1.4