# Abstract

JENSEN, Arne (Aalborg University)

"Perturbation of embedded eigenvalues for Schrödinger type operator"

I will present a survey of recent results on perturbation of embedded eigenvalues for Schrödinger type operators. The operator is assumed to have a non-degenerate eigenvalue embedded in the continuous spectrum. A perturbation with a small coupling constant is added. We investigate the fate of the eigenstate under this perturbation. In many cases it turns into a metastable state. With this metastable state is associated a resonance and a corresponding decay law, at least for sufficiently small coupling constants.

The results have been obtained in collaboration with H. Cornean (Aalborg University), V. Dinu and G. Nenciu (Romanian Academy, Bucharest).