TAKAFUMI AKAHORI, Shizuoka university
Uniqueness of ground states for combined power-type nonlinear scalar field equations

We consider the uniqueness of ground states for combined power-type nonlinear scalar field equations with the Sobolev critical exponent and large frequency parameter. For five and higher dimensions, the uniqueness of the ground states had been proved. In this talk, I give a uniqueness result for three and four dimensions. This study is motivated and inspired by that by Coles and Gustafson (Publ.Res.Inst.Math.Sci.56 (2020), pp.647-699).