Abstract

In this talk, we study the topological invariants of the parabolic Sp(2n,R)-Higgs bundle. Each topological invariant gives us a component of the moduli space of parabolic Sp(2n,R)-Higgs bundle. We prove that all of these components are connected. The basic tools we use are two correspondences: 1. the correspondence between parabolic Higgs bundle and orbifold Higgs bundle, 2. the BNR correspondence. Joint work with Georgios Kydonakis and Lutian Zhao.