

Contribution ID: 63 Type: Poster

## Search for a Standard Model Higgs in the mass range 200-600 GeV in the channel H->ZZ->llqq with the ATLAS detector

Wednesday, 11 April 2012 19:00 (20 minutes)

This talk describes the search for the Standard Model Higgs boson decaying via the channel  $H \to ZZ \to l + l - qq$ , where l = e or mu.

The analysis was developed considering separately two Higgs boson mass ranges: High Mass (200-600GeV) and, for the first time, the Low Mass range (120-200GeV)

using 4.7 fb-1 of pp collision data recorded by the ATLAS experiment at the LHC.

Events with two b-tagged jets, which have a better signal-to-background ratio, are treated as a separate channel to improve the sensitivity of the search.

**Primary author:** Dr SANCHEZ PINEDA, Arturo (NAPOLI)

Presenter: Dr SANCHEZ PINEDA, Arturo (NAPOLI)

Session Classification: Sessione poster

Track Classification: Fisica del Modello Standard e oltre