Contribution ID: **84** Type: **not specified**

Measuring the CP properties of the Higgs sector at electron-positron colliders

Wednesday, 17 March 2021 11:20 (20 minutes)

The violation of the CP symmetry is one of Sakharov's conditions for the matter/anti-matter asymmetry of the Universe. Currently known sources of CP violation in the quark and neutrino sectors are insufficient to account for this. Is CP also violated in the Higgs sector? Could the 125 GeV mass eigenstate be a mixture of even and odd CP states of an extended Higgs sector, or is CP explicitly violated in Higgs interactions? With what precision could such effects be measured at future electron-positron colliders? These questions will be discussed in the light of the latest and ongoing studies at ILC and CLIC.

Time Zone

Europe/Africa/Middle East

Primary author: AGATONOVIC-JOVIN, Tatjana (University of Belgrade (RS))

Co-authors: Dr BOZOVIC JELISAVCIC, Ivanka (VINCA Institute of Nuclear Sciences, University of Belgrade); JEANS, Daniel (KEK); Mr KACAREVIC, Goran (VINCA Institute of Nuclear Sciences, University of Belgrade); Dr SMILJANIC, Ivan (VINCA Institute of Nuclear Sciences, University of Belgrade); Dr MILUTINOVIC DUMBELOVIC, Gordana (VINCA Institute of Nuclear Sciences, University of Belgrade); Ms VUKASINOVIC, Natasa (VINCA Institute of Nuclear Sciences, University of Belgrade); Dr STEVANOVIC, Jasna (Department of Physics, Faculty of Science, Kragujevac University, Kragujevac, Serbia); Dr RADULOVIC, Mirko (Vinca Institute of Nuclear Sciences, University of Belgrade)

Presenter: AGATONOVIC-JOVIN, Tatjana (University of Belgrade (RS))

Session Classification: PD1/PD3: Theoretical Developments / Physics Analyses

Track Classification: Physics and Detectors Tracks: PD3: Physics Analyses