The 7th international conference on particle physics and astrophysics



Contribution ID: 19 Type: Oral talk

Annihilation of lepton and hadron interactions

Wednesday, 23 October 2024 11:10 (20)

Physicists carry out experiments at the modern accelerators with constantly increasing energy to find out new phenomena and approaches to understanding of internal hadron structure and also answer many questions emerged before them. These experiments agree well on the modern theory of strong interactions, quantum chromodynamics, but there are some results in cosmological observations that can not be explained in this theory and require new approaches and experiments. In that way the increasing of measurement precision and rare event registration, building of other theoretical models and just to name a few can help. Also we think that more detailed analysis of the known interactions can make more clear structure of matter. Multiparticle production is one of such studies in high energy physics. We offer the single view to describe annihilation processes of leptons and hadrons. It is based on both QCD quark-gluon jets and phenomenological description of hadronization.

Primary author(s): Dr. KUTOV, Andrei (JINR); KOKOULINA, Elena (JINR); Mrs. SHAKHVOROSTOVA, Elizaveta (MSU); Mrs. SARKAR, Krittika (Calcutta University, College Square); Mrs. GORELKINA, Tatiana (Peter the Great St. Petersburg Polytechnic University); Prof. NIKITIN, Vladimir (JINR); Mr. POPOV, Vsevolod (JINR); Mrs. SHOUSHA, Yara (Alexandria University); Mrs. CABALLERO DURAN, Yeiris (Higher Institute of Technologies and Applied Sciences, Havana University)

Presenter(s): KOKOULINA, Elena (JINR)
Session Classification: HEP Experiment

Track Classification: High energy physics: experiment