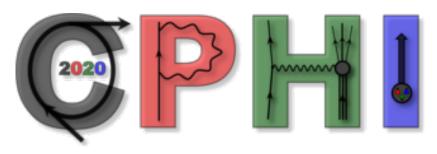
Correlations in Partonic and Hadronic Interactions - 2020 (CPHI-2020)



Contribution ID: 8 Type: not specified

Universality-breaking effects in e+ehadroproduction

Monday, 3 February 2020 17:25 (25 minutes)

Recent BELLE measurements provide the cross section for single hadron production in e+e- annihilations, differential in the hadron transverse momentum with respect to the thrust axis. Universality breaking effects due to process-dependent soft factors make it very difficult to relate this cross section to that corresponding to hadron-pair production in e+e- annihilations, where TMD fragmentation functions are defined through the so-called "square-root definition". I will examine this correspondence in the framework of CSS factorization and provide the sketch of a scheme that might allow to relate 1-jet to 2-jet e+e- cross sections, neatly separating soft and collinear non-perturbative effects from the terms which can be calculated using a perturbative approach.

Primary author: SIMONELLI, Andrea (University of Torino and INFN Torino)

Co-authors: Prof. BOGLIONE, Mariaelena (University of Turin); GONZALEZ H., J. Osvaldo (University of

Turin)

Presenter: SIMONELLI, Andrea (University of Torino and INFN Torino)

Session Classification: Afternoon