Measurement of inclusive jet cross section and jet fragmentation in pp collisions with ALICE experiment at the LHC

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Jet reconstruction and jet structure variables provide important information to study the interaction between hard scattered partons and the Quark-Gluon Plasma. This talk presents the measurement of the inclusive cross-section for fully reconstructed jets in pp collisions at $sqrt{s}=2.76$ TeV, which provides an essential reference for jet measurements in Pb-Pb collisions at the same $sqrt{s_{NN}}$. In addition, we report the inclusive cross section and jet structure measurements for charged particle jets in pp collisions at $sqrt{s}=7$ TeV. These measurements utilize the ALICE central barrel tracking system to detect charged particles with good efficiency above 150 MeV/c, together with the Electromagnetic Calorimeter (EMCal). The jet cross section and structure measurements are compared to theoretical calculations.

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