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Multiplicity dependence of intra-jet properties in pp collisions at \sqrt{s} = 13 TeV with ALICE

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Recent results in high-multiplicity pp collisions show features similar to those that are associated with the formation of a quark-gluon plasma in heavy-ion collisions [1]. Investigating the modification of the intra-jet properties as a function of event multiplicity in pp collisions can provide deeper insight into the nature of these effects. We will present the recent measurements of multiplicity dependence of charged-particle jet properties (average charged particle multiplicity and fragmentation functions) for leading charged-particle jets. Jets are reconstructed using anti- $k_{\rm T}$ jet finding algorithm with radius parameter R=0.4 in the jet $p_{\rm T}$ range from 5 - 110 GeV/c at midrapidity in pp collisions at $\sqrt{s}=13$ TeV with ALICE.

[1] Vardan Khachatryan et al. Phys. Lett. B 765 (2017), JHEP 09 (2010)

Session

Heavy Ions and QCD

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