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Neutral Pion-Hadron Correlations in Pb-Pb Collisions at $\sqrt{s_{NN}}$ = 5.02 TeV at the LHC Measured with ALICE[1] MICHAEL OLIVER, Yale University, ALICE COLLABORATION — One of many ways to measure the modification of jets in heavy ion collisions is through two-particle correlations of hadrons, especially when the trigger is a high p_{T} hadron. Then, one can study how the distributions of particles in the near-side and recoiling away-side jets are modified by the nuclear medium found in such collisions. This analysis pursues this goal by measuring π^0 -hadron correlations with high p_{T} π^0s using the ALICE electromagnetic calorimeter and charged particles measured with the ALICE central barrel trackers. These correlations are measured with varying trigger momenta and event centralities. Additionally, the correlations are measured in separate bins of trigger angle with respect to the 2nd order event plane, both in order to apply the reaction plane fit method for background subtraction and in order to measure path-length dependent modification of jets.

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