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## Measurement of direct photons in pp and Pb-Pb collisions with ALICE

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Direct photons are an important probe in diagnosing the highly excited state of nuclear matter created in heavy-ion collisions: They allow access to various stages of the collision including the initial state.

The ALICE detector is equipped with two high resolution electromagnetic calorimeters and a central tracking system that make it well suited to study direct photon production at low and intermediate  $p_t$ . In addition to classical calorimeter measurements the low  $p_t$  regime can be targeted via the measurement of photon conversion products by the ALICE TPC with high tracking efficiency.

In this talk the analysis of direct photon production in pp (at  $\sqrt{s} = 7$  TeV) and Pb-Pb (at  $\sqrt{s_{NN}} = 2.76$  TeV) collisions is presented. The inclusive photon and neutral pion spectrum is measured via photon conversions in the ALICE setup. From the neutral pion yield a decay photon cocktail is deduced. The signal is obtained by calculating the double ratio  $(\gamma/\pi^0)/(\gamma_{\text{decay}}/\pi^0)$ . Implications on the search for a direct photon excess at low  $p_t$  will be discussed.

**Primary author:** ALICE, Collaboration (CERN, Geneva, Switzerland)

**Co-author:** WILDE, Martin Rudolf (Westfaelische Wilhelms-Universitaet Muenster (DE))

**Presenter:** WILDE, Martin Rudolf (Westfaelische Wilhelms-Universitaet Muenster (DE))

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