

## Strangeness in Quark Matter 2019



Contribution ID: 25

Type: **Poster**

### Strange matter in SU(3) PNJL model: kaon-to-pion ratio along the phase transition line

*Tuesday 11 June 2019 18:45 (2 hours)*

The behavior of strange matter in the frame of the SU(3) Polyakov-loop extended Nambu-Jona-Lasinio model is considered. We discuss the appearance of a peak in the ratio of the number of strange mesons to non-strange mesons known as the “horn”. We showed that the rise in the ratio  $K^+/\pi^+$  appears in PNJL model when we build the  $K^+/\pi^+$  ratio along the phase transition diagram. We considered how the matter properties can affect to the behavior of the kaon-to-pion ratio.

#### Collaboration name

#### Track

QCD phase diagram and critical point

**Primary author:** FRIESEN, Alexandra (Joint Institute for Nuclear Research)

**Co-author:** Dr KALINOVSKY, Yuriy (Joint Institute for Nuclear Research)

**Presenter:** FRIESEN, Alexandra (Joint Institute for Nuclear Research)

**Session Classification:** Poster session with “aperitivo”