Workshop on Machine Learning for Cosmic-Ray Air Showers



Contribution ID: 19 Type: Talk

Open questions in deep learning techniques for the radio detection

Thursday, 3 February 2022 14:00 (45 minutes)

Nowadays the deep learning techniques are broadly applied for the processing of radio signals generated in air-showers. The majority of the implementations are based on the convolutional neural networks (CNN) running of 1D arrays containing finite waveforms with radio impulses. This approach has shown its feasibility and is able to be implemented for the both trigger- and high- levels of data collection and analysis. However there is a room for the improvement and some open questions. During my talk we reviewed the current progress in the field, pointed the important issues and their possible solutions, and shared and discussed ideas of the optimal application of this technique.

Type of Contribution

talk

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