

Transformers for collider analysis

Wednesday, 26 February 2025 09:30 (1 hour)

Attention-based Transformer networks have become increasingly prominent in collider analysis, delivering superior performance in tasks such as jet tagging. However, their high computational demands and substantial data requirements pose significant challenges. In this talk, I will explore the role of Transformer networks in LHC analysis, focusing on various attention mechanisms, including self-attention, cross-attention, and differential attention. Additionally, I will discuss different strategies for reducing network complexity while preserving high performance.

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