

(Accurate) Predictions for New Strong Dynamics at the LHC and Future Colliders

Tuesday, 6 September 2016 10:30 (45 minutes)

I will shortly discuss some “peculiar” aspects of the phenomenology of composite dynamics at the LHC and future colliders. First, I will show the implication of eta-like resonance decaying into top-quark pair in shedding light on the mechanism to generate SM-fermion masses, the importance of interference and QCD corrections in this search and a analysis of the limits and projections. Second, the eventual presence of near-degenerate composite vector resonances and their signals. Finally, I will discuss the dynamical generation of a broad scalar resonances, its importance in unitarizing weak boson scattering and a prescription to describe its line shape in a gauge invariant fashion.

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Session Classification: Composite dynamics