Some non-axion solutions to the strong CP problem and their phenomenology

Thursday 14 November 2024 11:50 (20 minutes)

While axions (which are very well-motivated) heavily dominate the amount of work currently done regarding the strong CP problem, alternatives ought to be systematically investigated, in order to assess what the strong CP problem really entails (and potentially update our theoretical biases). In this context, I will talk about solutions that rely on spontaneously broken spacetime symmetries, and various UV structures, such as copies of the Standard Model's fields and interactions, or appropriately designed extended Higgs sectors. If time allows, I will talk about their collider, flavor and early universe phenomenology.

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