

Positronium physics in the quantum world

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Studies of the matter-antimatter system known as positronium are inherently quantum insofar as they involve an exotic atom that can decay into photons, and whose properties are for all practical purposes fully described by quantum electrodynamics. As a result, it is very easy to get involved in the new game of adding the word “quantum” to things that do not need or even deserve it. As such I will describe some microwave spectroscopy of Ps quantum states, possibly involving some kind of quantum technology. I will also discuss other quantum-like things we can do with positronium, such as gravity measurements using interferometric methods.

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