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Kemmer Oscillator in Cosmic String Background

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Abstract : In this work, we aim to solve the two dimensional Kemmer equation including Dirac oscillator interaction term, in the background space-time generated by a cosmic string which is submitted to an uniform magnetic field. Eigenfunctions and eigenvalues of our problem have been found and the influence of the cosmic string space-time on the energy spectrum has been analyzed.

Keywords: Kemmer oscillator, cosmic string, Dirac oscillator, eigenfunctions

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