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Finite temperature effects for spin 1/2 charm baryons

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'Fit' independent methods are used to investigate temperature effects for the singly and doubly charmed spin 1/2 baryons on the anisotropic FASTSUM 'Generation 2L' ensembles. Thereafter we determine where it is appropriate to apply standard fitting procedures in order to report the change in mass as the temperature increases. The negative parity sector is observed to be more strongly effected by temperature than the positive parity. Finally we examine the parity doubling due to the (partial) restoration of chiral symmetry and find estimates for the pseudo-critical temperature which are in good agreement with the measurement from the renormalised chiral condensate.

Topical area

QCD at Non-zero Temperature

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