

Abstract Submitted
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Spectrum and structure of B_c mesons on the light-front¹ SHUO TANG, YANG LI, PIETER MARIS, JAMES VARY, Iowa State University — Recent measurements at LHC have renewed the theoretical interest in the production, spectrum and decay of charm-beauty (B_c) mesons. We solve for the low-lying ($b\bar{c}$) states using a light-front Hamiltonian with a confining interaction based on AdS/QCD holography plus one-gluon exchange that gives a good description of charmonium and botomonium[1, 2]. Without adjusting any parameters we find good agreement for the ground state B_c mass compared to experiment. We also discuss the spectrum below threshold, and compare our results with quark model calculations. The corresponding light-front wave functions can be used to calculate other observables such as the decays constants, distribution amplitudes, and GPDs. [1] Y. Li, P. Maris, and J.P. Vary, to appear in Phys. Rev. D; arXiv:1704.06968 [2] Y. Li, P. Maris, X. Zhao, and J.P. Vary, Phys. Lett. B **758**, 118 (2016)

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Shuo Tang
Iowa State University

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