

Photoproduction of J/Psi with dissociation of protons

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We present the cross sections for both electromagnetic and diffractive dissociation of protons for semiexclusive production of J/ψ mesons in proton-proton collisions at the LHC.

Differential distributions in missing mass (M_X), or single-particle variables related exclusively to the J/ψ meson are calculated for $s\sqrt{= 7$ TeV and 13 TeV. We compare the distributions for purely electromagnetic and purely diffractive proton excitations/dissociation. We predict cross sections for electromagnetic and diffractive excitations of similar order of magnitude.

The talk is based on

Semiexclusive production of J/ψ mesons in proton-proton collisions with electromagnetic and diffractive dissociation of one of the protons
Anna Cisek (Rzeszow U.), Wolfgang Schäfer, Antoni Szczurek (Cracow, INP). Nov 24, 2016. 19 pp.
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