

$\Xi_c(2790)$ $I(J^P) = \frac{1}{2}(\frac{1}{2}^-)$ Status: ***

A peak seen in the $\Xi'_c\pi$ mass spectrum. The simplest assignment, based on the mass, width, and decay mode, is that this belongs in the same SU(4) multiplet as the $\Lambda(1405)$ and the $\Lambda_c(2593)^+$, but the spin and parity have not been measured.

 $\Xi_c(2790)$ MASSES

The masses are obtained from the mass-difference measurements that follow.

 $\Xi_c(2790)^+$ MASSVALUE (MeV) **2789.2 ± 3.2 OUR FIT**DOCUMENT ID **$\Xi_c(2790)^0$ MASS**VALUE (MeV) **2792.0 ± 3.3 OUR FIT**DOCUMENT ID **$\Xi_c(2790) - \Xi_c$ MASS DIFFERENCES** **$m_{\Xi_c(2790)^+} - m_{\Xi_c^0}$** VALUE (MeV) **$318.2 \pm 3.2$ OUR FIT** **$318.2 \pm 1.3 \pm 2.9$** EVTSDOCUMENT IDTECNCOMMENTCSORNA 01 CLEO $e^+ e^- \approx \gamma(4S)$ **$m_{\Xi_c(2790)^0} - m_{\Xi_c^+}$** VALUE (MeV) **$324.0 \pm 3.3$ OUR FIT** **$324.0 \pm 1.3 \pm 3.0$** EVTSDOCUMENT IDTECNCOMMENTCSORNA 01 CLEO $e^+ e^- \approx \gamma(4S)$ **$\Xi_c(2790)$ WIDTHS** **$\Xi_c(2790)^+$ WIDTH**VALUE (MeV)**<15**CL%DOCUMENT IDTECNCOMMENTCSORNA 01 CLEO $e^+ e^- \approx \gamma(4S)$ **$\Xi_c(2790)^0$ WIDTH**VALUE (MeV)**<12**CL%DOCUMENT IDTECNCOMMENTCSORNA 01 CLEO $e^+ e^- \approx \gamma(4S)$ **$\Xi_c(2790)$ DECAY MODES**

Mode	Fraction (Γ_i/Γ)
$\Gamma_1 \quad \Xi'_c\pi$	seen

$\Xi_c(2790)$ REFERENCES

CSORNA

01 PRL 86 4243

S.E. Csorna *et al.*

(CLEO Collab.)
