$D_{s1}^*(2700)^\pm$ $I(J^P) = 0(1^-)$

$D_{s1}^*(2700)^+$ MASS

VALUE (MeV)	EVTS	DOCUMENT ID		TECN	COMMENT
2708.3$^{+4.0}_{-3.4}$ OUR AVERAGE					
2699 $^{+14}_{-7}$		[1] LEES	15C	BABR	$B \to D D^0 K^+$
2709.2$\pm$ 1.9$\pm$ 4.5	52k	[2] AAIJ	12AU	LHCB	$pp \to (DK)^+ X$ at 7 TeV
2710 $\pm$ 2 $^{+12}_{-7}$	10.4k	[3] AUBERT	09AR	BABR	$e^+ e^- \to D^{(*)} K X$
2708 $\pm$ 9 $^{+11}_{-10}$	182	BRODZICKA	08	BELL	$B^+ \to D^0 \overline{D}^0 K^+$

• • • We do not use the following data for averages, fits, limits, etc. • • •

2694 $\pm$ 8 $^{+13}_{-3}$		LEES	15C	BABR	$B^0 \to D^- D^0 K^+$
2707 $\pm$ 8 $\pm$ 8		LEES	15C	BABR	$B^+ \to \overline{D}^0 D^0 K^+$
2688 $\pm$ 4 $\pm$ 3		[4] AUBERT,BE	06E	BABR	10.6 $e^+ e^- \to D K X$

[1] From a combined analysis of $B^0 \to D^- D^0 K^+$ and $B^+ \to \overline{D}^0 D^0 K^+$.
[2] From the combined fit of the $D^+ K_S^0$ and $D^0 K^+$ modes in the model including the $D_{s2}^*(2573)^+$, $D_{s1}^*(2700)^+$ and spin-0 $D_{sJ}^*(2860)^+$.
[3] From simultaneous fits to the two DK mass spectra and to the total $D^* K$ mass spectrum.
[4] Superseded by AUBERT 09AR.

$D_{s1}^*(2700)^+$ WIDTH

VALUE (MeV)	EVTS	DOCUMENT ID		TECN	COMMENT
120 $\pm$11 OUR AVERAGE					
127 $^{+24}_{-19}$		[5] LEES	15C	BABR	$B \to D D^0 K^+$
115.8$\pm$ 7.3$\pm$12.1	52k	[6] AAIJ	12AU	LHCB	$pp \to (DK)^+ X$ at 7 TeV
149 $\pm$ 7 $^{+39}_{-52}$	10.4k	[7] AUBERT	09AR	BABR	$e^+ e^- \to D^{(*)} K X$
108 $\pm$23 $^{+36}_{-31}$	182	BRODZICKA	08	BELL	$B^+ \to D^0 \overline{D}^0 K^+$

• • • We do not use the following data for averages, fits, limits, etc. • • •

145 $\pm$24 $^{+22}_{-14}$		LEES	15C	BABR	$B^0 \to D^- D^0 K^+$
113 $\pm$21 $^{+20}_{-16}$		LEES	15C	BABR	$B^+ \to \overline{D}^0 D^0 K^+$
112 $\pm$ 7 $\pm$36		[8] AUBERT,BE	06E	BABR	10.6 $e^+ e^- \to D K X$

[5] From a combined analysis of $B^0 \to D^- D^0 K^+$ and $B^+ \to \overline{D}^0 D^0 K^+$.
[6] From the combined fit of the $D^+ K_S^0$ and $D^0 K^+$ modes in the model including the $D_{s2}^*(2573)^+$, $D_{s1}^*(2700)^+$ and spin-0 $D_{sJ}^*(2860)^+$.
[7] From simultaneous fits to the two DK mass spectra and to the total $D^* K$ mass spectrum.
[8] Superseded by AUBERT 09AR.

$D_{s1}^*(2700)^\pm$ DECAY MODES

	Mode
Γ_1	DK
Γ_2	$D^0 K^+$
Γ_3	$D^+ K_S^0$
Γ_4	$D^* K$
Γ_5	$D^{*0} K^+$
Γ_6	$D^{*+} K_S^0$

$D_{s1}^*(2700)^\pm$ BRANCHING RATIOS

$\Gamma(D^* K)/\Gamma(DK)$ Γ_4/Γ_1

VALUE	EVTS	DOCUMENT ID	TECN	COMMENT
0.91±0.13±0.12	10.4k	[9] AUBERT	09AR BABR	$e^+ e^- \to D^{(*)} K X$

[9] From the average of the corresponding ratios with $D^{(*)0} K^+$ and $D^{(*)+} K_S^0$.

$\Gamma(D^{*0} K^+)/\Gamma(D^0 K^+)$ Γ_5/Γ_2

VALUE	EVTS	DOCUMENT ID	TECN	COMMENT
• • • We do not use the following data for averages, fits, limits, etc. • • •				
0.88±0.14±0.14	7716	[10] AUBERT	09AR BABR	$e^+ e^- \to D^{(*)} K X$

[10] From the $D^{*0} K^+$ and $D^0 K^+$, where $D^{*0} \to D^0 \pi^0$.

$\Gamma(D^{*+} K_S^0)/\Gamma(D^+ K_S^0)$ Γ_6/Γ_3

VALUE	EVTS	DOCUMENT ID	TECN	COMMENT
• • • We do not use the following data for averages, fits, limits, etc. • • •				
1.14±0.39±0.23	2700	[11] AUBERT	09AR BABR	$e^+ e^- \to D^{(*)} K X$

[11] From the $D^{*+} K_S^0$ and $D^+ K_S^0$, where $D^{*+} \to D^+ \pi^0$.

$D_{s1}^*(2700)^\pm$ REFERENCES

LEES	15C	PR D91 052002	J.P. Lees *et al.*	(BABAR Collab.)
AAIJ	12AU	JHEP 1210 151	R. Aaij *et al.*	(LHCb Collab.)
AUBERT	09AR	PR D80 092003	B. Aubert *et al.*	(BABAR Collab.)
BRODZICKA	08	PRL 100 092001	J. Brodzicka *et al.*	(BELLE Collab.)
AUBERT,BE	06E	PRL 97 222001	B. Aubert *et al.*	(BABAR Collab.)