

$f_2(2010)$

$$I^G(J^{PC}) = 0^+(2^{++})$$

 $f_2(2010)$ MASS

VALUE (MeV)	DOCUMENT ID	TECN	COMMENT
2011^{+62}_{-76}	¹ ETKIN 88	MPS	22 $\pi^- p \rightarrow \phi \phi n$
• • • We do not use the following data for averages, fits, limits, etc. • • •			
$2062 \pm 6^{+10}_{-7}$	² ABLIKIM 22AS	BES3	$J/\psi(1S) \rightarrow \gamma \eta \eta'$
2005 ± 12	VLADIMIRSK...06	SPEC	40 $\pi^- p \rightarrow K_S^0 K_S^0 n$
1980 ± 20	³ BOLONKIN 88	SPEC	40 $\pi^- p \rightarrow K_S^0 K_S^0 n$
2050^{+90}_{-50}	ETKIN 85	MPS	22 $\pi^- p \rightarrow 2\phi n$
2120^{+20}_{-120}	LINDENBAUM 84	RVUE	
2160 ± 50	ETKIN 82	MPS	22 $\pi^- p \rightarrow 2\phi n$

¹ Includes data of ETKIN 85. The percentage of the resonance going into $\phi\phi 2^{++} S_2$, D_2 , and D_0 is 98^{+1}_{-3} , 0^{+1}_{-0} , and 2^{+2}_{-1} , respectively.

² From a Breit-Wigner fit involving 9 resonances and a resonating exotic $\eta_1(1855) \rightarrow \eta \eta'$ *P*-wave.

³ Statistically very weak, only 1.4 s.d.

 $f_2(2010)$ WIDTH

VALUE (MeV)	DOCUMENT ID	TECN	COMMENT
202^{+67}_{-62}	⁴ ETKIN 88	MPS	22 $\pi^- p \rightarrow \phi \phi n$
• • • We do not use the following data for averages, fits, limits, etc. • • •			
$165 \pm 17^{+10}_{-5}$	⁵ ABLIKIM 22AS	BES3	$J/\psi(1S) \rightarrow \gamma \eta \eta'$
209 ± 32	VLADIMIRSK...06	SPEC	40 $\pi^- p \rightarrow K_S^0 K_S^0 n$
145 ± 50	⁶ BOLONKIN 88	SPEC	40 $\pi^- p \rightarrow K_S^0 K_S^0 n$
200^{+160}_{-50}	ETKIN 85	MPS	22 $\pi^- p \rightarrow 2\phi n$
300^{+150}_{-50}	LINDENBAUM 84	RVUE	
310 ± 70	ETKIN 82	MPS	22 $\pi^- p \rightarrow 2\phi n$

⁴ Includes data of ETKIN 85.

⁵ From a Breit-Wigner fit involving 9 resonances and a resonating exotic $\eta_1(1855) \rightarrow \eta \eta'$ *P*-wave.

⁶ Statistically very weak, only 1.4 s.d.

 $f_2(2010)$ DECAY MODES

Mode	Fraction (Γ_i/Γ)
Γ_1 $\phi\phi$	seen
Γ_2 $K\bar{K}$	seen

$f_2(2010)$ BRANCHING RATIOS

$\Gamma(K\bar{K})/\Gamma_{\text{total}}$				Γ_2/Γ
VALUE	DOCUMENT ID	TECN	COMMENT	
seen	VLADIMIRSK...06	SPEC	$40 \pi^- p \rightarrow K_S^0 K_S^0 n$	

 $f_2(2010)$ REFERENCES

ABLIKIM	22AS	PR D106 072012	M. Ablikim <i>et al.</i>	(BESIII Collab.)
Also		PR D107 079901 (errat.)	M. Ablikim <i>et al.</i>	(BESIII Collab.)
VLADIMIRSK...	06	PAN 69 493	V.V. Vladimirovsky <i>et al.</i>	(ITEP, Moscow)
		Translated from YAF 69 515.		
BOLONKIN	88	NP B309 426	B.V. Bolonkin <i>et al.</i>	(ITEP, SERP)
ETKIN	88	PL B201 568	A. Etkin <i>et al.</i>	(BNL, CUNY)
ETKIN	85	PL 165B 217	A. Etkin <i>et al.</i>	(BNL, CUNY)
LINDENBAUM	84	CNPP 13 285	S.J. Lindenbaum	(CUNY)
ETKIN	82	PRL 49 1620	A. Etkin <i>et al.</i>	(BNL, CUNY)
Also		Brighton Conf. 351	S.J. Lindenbaum	(BNL, CUNY)