$\Xi_b(6087)^0$

$I(J^P) = \frac{1}{2}(\frac{3}{2}^-)$ Status: ***
J, P need confirmation.

$\Xi_b(6087)^0$ MASS

VALUE (MeV)	*DOCUMENT ID*		*TECN*	*COMMENT*
6087.2±0.2±0.5	[1,2] AAIJ	23AU	LHCB	pp at 7, 8, 13 TeV

[1] Observed in $\Xi_b^0\pi^+\pi^-$ channel with $\Xi_b^0 \to \Xi_c^+\pi^-$ and $\Xi_b^0 \to \Xi_c^+\pi^-\pi^+\pi^-$ and $\Xi_c^+ \to pK^-\pi^+$. Measured as mass difference, listed separately.

[2] AAIJ 23AU measures $m(\Xi_b(6087)^0) - m(\Xi_b^0) - 2m(\pi^\pm) = 16.20 \pm 0.20 \pm 0.06$ MeV. We have adjusted the measurement to our best values of $m(\Xi_b^0) = 5791.9 \pm 0.5$ MeV, $m(\pi^\pm) = 139.57039 \pm 0.00018$ MeV. Our first error is their experiment's error and our second error is the systematic error from using our best values.

$\Xi_b(6087)^0$ WIDTH

VALUE (MeV)	*DOCUMENT ID*		*TECN*	*COMMENT*
2.43±0.51±0.10	[1] AAIJ	23AU	LHCB	pp at 7, 8, 13 TeV

[1] Observed in $\Xi_b^0\pi^+\pi^-$ channel with $\Xi_b^0 \to \Xi_c^+\pi^-$ and $\Xi_b^0 \to \Xi_c^+\pi^-\pi^+\pi^-$ and $\Xi_c^+ \to pK^-\pi^+$

$\Xi_b(6087)^0$ DECAY MODES

	Mode	Fraction (Γ_i/Γ)
Γ_1	$\Xi_b^0\pi^+\pi^-$	seen

$\Xi_b(6087)^0$ BRANCHING RATIOS

$\Gamma(\Xi_b^0\pi^+\pi^-)/\Gamma_{total}$ **Γ_1/Γ**

VALUE	*DOCUMENT ID*		*TECN*	*COMMENT*
seen	AAIJ	23AU	LHCB	pp at 7, 8, 13 TeV

$\Xi_b(6087)^0$ REFERENCES

AAIJ 23AU PRL 131 171901 R. Aaij *et al.* (LHCb Collab.)