

Table 19.8 from (1978AJ03): Resonances in $^{15}\text{N}(\alpha, \gamma)^{19}\text{F}$ ^a

E_α (MeV \pm keV)	$\Gamma_{\text{c.m.}}$ (keV)	$\omega\Gamma_\gamma$ (eV)	J^π	E_x (MeV \pm keV)	Refs.
0.85	$(42.8 \pm 8.5) \times 10^{-6}$ ^b	$(6.0 \pm 1.0) \times 10^{-3}$	$\frac{5}{2}^-$	4.681 ± 1	(1972RO01)
1.385 ± 3		$(13 \pm 8) \times 10^{-3}$ ^c	$\frac{5}{2}^{(+)}$	5.105 ± 2	(1970AI01, 1976RO07)
1.678 ± 3		1.64 ± 0.16	$\frac{1}{2}^{(+)}$	5.337 ± 2	A, (1972RO33)
1.790		0.42 ± 0.09 ^c	$\frac{7}{2}^-$	5.427	(1970AI01)
1.839 ± 2	< 1	2.5 ± 0.4 ^c	$\frac{7}{2}^+$	5.465	A
1.883 ± 3	4 ± 1	4.2 ± 1.1 ^c	$\frac{3}{2}^+$	5.500	A
1.930		0.48 ± 0.11 ^c	$\frac{5}{2}^+$	5.54	(1970AI01)
2.035 ± 4		0.37 ± 0.09	$\frac{3}{2}^-$	5.620	(1972RO33)
2.441 ± 4		0.53 ± 0.13	$\frac{1}{2}^+$	5.938 ± 3	(1972RO33)
2.608 ± 2		2.70 ± 0.54	$\frac{7}{2}^+$	6.070 ± 1	(1972RO33)
2.631 ± 4		4.50 ± 0.90	$\frac{3}{2}^-$	6.088 ± 3	(1972RO33)
2.722 ± 2		2.40 ± 0.60	$\frac{7}{2}^-$	6.160 ± 1	(1972RO33)
2.873 ± 3		1.0 ± 0.2	$\frac{5}{2}^+$	6.282 ± 2	(1970AI01, 1977DI08)
2.935 ± 3		0.76 ± 0.15	$\frac{7}{2}^+$	6.330 ± 2	(1970AI01, 1977DI08)
3.1468 ± 1.5		1.7 ± 0.3	$\frac{3}{2}^+$	6.4976 ± 1.5	(1970AI01, 1977DI08)
3.1498 ± 1.5		2.3 ± 0.4	$\frac{11}{2}^+$	6.5000 ± 1.5	(1977DI08)
3.183 ± 2		2.4 ± 0.4	$\frac{3}{2}^+$	6.526 ± 2	(1977DI08)
3.218 ± 2		0.63 ± 0.13	$\frac{7}{2}^+$	6.554 ± 2	(1977DI08)
3.267 ± 2		1.6 ± 0.3	$\frac{9}{2}^+$	6.592 ± 2	(1977DI08)
3.511 ± 3		10.9 ± 1.5	$\frac{3}{2}^-$	6.785 ± 2	(1977DI08)
3.576 ± 3		1.0 ± 0.2	$\frac{5}{2}^-$	6.836 ± 2	(1977DI08)
3.645 ± 5		6.1 ± 1.3	$\frac{3}{2}^-$	6.891 ± 4	(1977DI08)
3.688 ± 3		9.7 ± 1.4	$\frac{7}{2}^-$	6.925 ± 2	(1977DI08)
3.993 ± 2		1.00 ± 0.12	$\frac{11}{2}^-$	7.1662 ± 0.7	(1973RO09, 1974UN01, 1977DI08, 1977FI06)
4.465		17.0 ± 2.7	$\frac{5}{2}^+; T = \frac{3}{2}$	7.538 ± 2	A, (1976RO07)
4.618		3.7 ± 0.9	$\frac{3}{2}^+; T = \frac{3}{2}$	7.659 ± 2	A, (1976RO07)
4.96 ± 3		2.3 ± 0.4	$\frac{7}{2}^+, \frac{9}{2}^+$	7.929	A
4.97 ± 3		3.1 ± 0.5	$\frac{11}{2}^+$	7.937	A
5.413 ± 5		0.53 ± 0.08	$\frac{13}{2}^-$	8.288 ± 2	(1974UN01, 1977FI06)
6.258 ± 5		0.91 ± 0.17	$\frac{11}{2}^+$	8.957 ± 2	(1974UN01, 1977FI06)
			$\frac{11}{2}^+$	9.27	(1977SY1A)
			$\frac{11}{2}^-$	9.88	(1977FI06)
7.75	< 3	d		(10.127 ± 2)	(1972WO15)
8.105	< 1	15.0 ± 3.0	$\frac{13}{2}^+$	10.411 ± 3	(1976SY01)
			$\frac{11}{2}^+$	11.217	(1977SY1A)

A: see references listed in [Table 19.7 of \(1972AJ02\)](#).

^a See also [Table 19.7](#) here.

^b $\Gamma_\alpha = 2.1 \pm 0.7$ meV, $\Gamma_\gamma = 40.7 \pm 8.1$ meV ([1972RO01](#)).

^c See [Table 19.7 in \(1972AJ02\)](#).

^d See ([1972WO15](#)); see also for the possibility of a neighboring resonance.