^{174}Yb(d,d′) 1967Bu21

History

Type	Author	Citation	Literature Cutoff Date
Full Evaluation	E. Browne, Huo Junde	NDS 87, 15 (1999)	1-Nov-1998

Target: enriched ^{174}Yb. Projectile: D, E=12 MeV, θ=90°, 125°. Measured scattered deuterons, s. Other: 1966El07.

^{174}Yb Levels

ΔE: ΔE<3 keV, but twice as high in 1.5-MeV region (1966Bu16,1967Bu21).

E(level)	J^{π}‡	E(level)	J^{π}‡	E(level)	J^{π}‡	E(level)	J^{π}‡
0.0#	0^+	1348		1760		2178[a]	2^+
79#	2^+	1380@	3^-	1778		2230[a]	3^+
252#	4^+	1629&	2^+	1801&	4^+		
523#	6^+	1696		1846			

† ΔE<3 keV, but twice as high in 1.5-MeV region (1966Bu16,1967Bu21).

‡ Authors′ spin, band, and quasiparticle configuration assignments are based on comparison between experimental and theoretical relative cross sections in (d,p) and (d,d′). Population intensity to 1800-keV level is consistent with a large two-quasiparticle ν 5/2[512] − ν 1/2[510] component in the γ-vibrational band.

$K^{\pi}=0^+$ g.s.-rotational band.

@ $K^{\pi}=2^-$ octupole-vibrational band.

& $K^{\pi}=2^+$ γ-vibrational band.

a $K^{\pi}=2^+$ band. Possible configuration=ν 5/2[512] − ν 1/2[510].