

$^{176}\text{Yb}(\text{n},\text{n}'\gamma)$ 1999De40

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	M. S. Basunia	NDS 107, 791 (2006)	15-Sep-2005

Other: 2000De59.

Target: 95.2% enriched ^{176}Yb . Projectile: Fast neutron beam from IR-8 reactor. Detector: HPGe. Measured: $E\gamma$, $I\gamma$, δ , $\gamma(\theta)$.

Energies were measured at 90° and the intensities were measured at 125° with respect to the neutron beam. The angular

distributions were measured at $\theta = 90^\circ, 105^\circ, 115^\circ, 125^\circ, 135^\circ, 142^\circ, \text{ and } 150^\circ$.

Both authors of 1999De40 are present in 2000De59.

 ^{176}Yb Levels

E(level) [†]	J^π [‡]	Ps [#]	Comments
0.0 [@]	0 ⁺		
82.137 ^{@ 15}	2 ⁺		
271.842 ^{@ 24}	4 ⁺	28	
564.09 ^{@ 4}	6 ⁺	12	
953.49 ^{@ 7}	8 ⁺	2	
1049.5 ^{g 5}	8 ⁻		J^π : From Adopted Levels.
1088.228 ^{e 17}	1 ⁻	8.4	
1132.106 ^{e 23}	2 ⁻	14	
1138.95 ^{& 4}	0 ⁺	4.8	
1193.311 ^{e 23}	3 ⁻	14.6	
1199.578 ^{& 24}	2 ⁺	15	
1260.894 ^{a 17}	2 ⁺	14.7	
1283.20 ^{e 5}	4 ⁻	5.5	
1336.378 ^{a 25}	3 ⁺	6.4	
1341.07 ^{b 3}	4 ⁺	21	Ps value suggests the presence of two close levels at an energy 1341 keV that are separated by less than 0.2 keV. In Figure 2 this level is shown in two bands $K^\pi=4_1^+$ and $K^\pi=0_2^+$ (1999De40). Evaluator shows only with band $K^\pi=4_1^+$, since for the other level no feeding or depopulating γ is available.
1409.60 ^{e 11}	5 ⁻	0.8	
1431.70 ^{f 3}	2 ⁻	7.7	
1435.50 ^{a 5}	4 ⁺	4.0	
1491.51 ^{b 13}	5 ⁺	1.9	
1498.73 ^{f 4}	3 ⁻	5.3	
1518.93 ^{c 7}	0 ⁺	1.7	
1540.7 3	(6 ⁺)	0.6	
1558.34 ^{a 7}	5 ⁺	1.3	
1575.28 5	(3)	4.2	
1588.55 ^{f 7}	4 ⁻	<2.6	
1609.97 ^{c 5}	2 ⁺	4.1	
1630.04 6		2.5	
1671.48 4	3	4.8	
1778.47 11	0 ⁺	0.66	
1798.09 6		2.95	
1819.24 ^{d 12}	1 ⁽⁺⁾	0.77	
1821.10 6		2.9	
1867.93 ^{d 10}	(2 ⁺)	1.3	
2027?			
2053.31 4			
2095?			

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$^{176}\text{Yb}(n,n'\gamma)$ **1999De40** (continued)

^{176}Yb Levels (continued)

<u>E(level)[†]</u>	<u>E(level)[†]</u>	<u>E(level)[†]</u>	<u>E(level)[†]</u>
2139?	2170?	2394?	2570?
2153.4 3	2245?	2530?	2705?

[†] Deduced by evaluator from a least-squares fit to the γ -ray energies.

[‡] From γ -ray angular distribution and Ps values.

Relative level population in (n,n' γ) reaction.

@ $K^\pi=0$ band.

& $K^\pi=0_2^+$ band.

^a $K^\pi=2_1^+$ band.

^b $K^\pi=4_1^+$ band. possible configuration: $\pi 1/2[411]+\pi 7/2[404]$.

^c $K^\pi=0_3^+$ band.

^d $K^\pi=1_1^+$ band. configuration: $\nu 7/2[633]-\nu 9/2[624]$.

^e $K^\pi=1_1^-$ band. configuration: $\nu 7/2[514]-\nu 9/2[624]$.

^f $K^\pi=2_1^-$ band. configuration: $\nu 5/2[512]-\nu 9/2[624]$.

^g $K^\pi=8_1^-$ band. configuration: $\nu 7/2[514]+\nu 9/2[624]$.

$\gamma(^{176}\text{Yb})$

<u>E_γ[†]</u>	<u>I_γ[‡]</u>	<u>$E_i(\text{level})$</u>	<u>J_i^π</u>	<u>E_f</u>	<u>J_f^π</u>	<u>Mult.[#]</u>	<u>δ^{&}</u>	<u>Comments</u>
82.13 2		82.137	2 ⁺	0.0	0 ⁺			
96.0 5		1049.5	8 ⁻	953.49	8 ⁺			
^x 106.8 3	0.39 9							
111.38 9	2.17 17	1199.578	2 ⁺	1088.228	1 ⁻			
^x 112.9 7	0.21 12							
^x 115.4 6	0.24 12							
122.01	0.53	1260.894	2 ⁺	1138.95	0 ⁺			
^x 130.0 6	0.07 6							
^x 132.00 15	0.97 10							$A_2=-0.39$ 13 $A_4=+0.03$ 20.
^x 133.0 3	0.23 8							
^x 138.0 7	0.06 4							
150.44 12	1.55 10	1491.51?	5 ⁺	1341.07	4 ⁺	M1+E2 [@]	+0.23 8	Also $\delta=+10$ +60 -10, 2nd value. $A_2=+0.09$ 6 $A_4=+0.15$ 8.
152.8 5	0.09 5	1588.55	4 ⁻	1435.50	4 ⁺			
^x 156.4 4	0.17 5							
172.8 ^a 3	0.40 ^a 7	1260.894	2 ⁺	1088.228	1 ⁻			
172.8 ^a 3	0.40 ^a 7	1671.48	3	1498.73	3 ⁻			
179.2 5	0.07 3	1588.55	4 ⁻	1409.60	5 ⁻			
189.69 3	100 5	271.842	4 ⁺	82.137	2 ⁺	E2		$A_2=+0.245$ 16 $A_4=-0.025$ 21.
^x 205.39 18	0.35 7							
208.1 10	0.22 6	1491.51?	5 ⁺	1283.20	4 ⁻			
^x 211.14 12	0.60 7							
215.5 3	0.70 7	1498.73	3 ⁻	1283.20	4 ⁻			
234.21 4	3.27 17	1575.28	(3)	1341.07	4 ⁺			Mult.: M1 or E1 in 1999De40 . $A_2=-0.18$ 6 $A_4=+0.11$ 7.
238.31 5	1.78 11	1431.70	2 ⁻	1193.311	3 ⁻	M1+E2 [@]	-0.40 +10-20	$A_2=-0.25$ 5 $A_4=+0.05$ 7.
239.80 5	1.75 11	1671.48	3	1431.70	2 ⁻	@		δ : 0.00 10. $A_2=-0.20$ 9 $A_4=+0.01$ 12.
^x 243.96 20	0.44 7							
247.32 19	0.36 7	1588.55	4 ⁻	1341.07	4 ⁺			

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$^{176}\text{Yb}(n,n'\gamma)$ 1999De40 (continued) $\gamma(^{176}\text{Yb})$ (continued)

E_γ^\dagger	I_γ^\ddagger	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult. #	$\delta\&$	Comments
$^{x}250.5\ 4$	0.07 4							
$^{x}259.62\ 16$	0.50 6							
$^{x}267.46\ 24$	0.22 5							
$^{x}273.9\ 4$	0.31 7							
$^{x}285.4\ 3$	0.11 4							
288.93 6	1.45 10	1630.04		1341.07	4 ⁺			$A_2=+0.19\ 4\ A_4=-0.04\ 8.$
292.25 3	12.0 6	564.09	6 ⁺	271.842	4 ⁺	E2		$A_2=+0.31\ 4\ A_4=-0.05\ 5.$
299.60 5	2.68 15	1431.70	2 ⁻	1132.106	2 ⁻	M1+E2 [@]	+0.09 +3 -6	Also $\delta=+1.8\ 3,$ 2nd value. $A_2=+0.23\ 5\ A_4=+0.01\ 7.$
305.34 ^a 12	0.63 ^a 6	1498.73	3 ⁻	1193.311	3 ⁻			
305.34 ^a 12	0.63 ^a 6	1588.55	4 ⁻	1283.20	4 ⁻			
$^{x}314.4\ 5$	0.12 5							
$^{x}320.12\ 21$	0.54 6							
322.30 16	0.94 8	1821.10		1498.73	3 ⁻			
330.42 5	1.78 11	1671.48	3	1341.07	4 ⁺	@		$\delta: -0.14\ 7$ and $-3.8\ +9-13.$
343.60 5	6.2 3	1431.70	2 ⁻	1088.228	1 ⁻	M1+E2 [@]	-0.11 2	$A_2=+0.04\ 6\ A_4=+0.05\ 9.$ Also $\delta=-2.10\ 10,$ 2nd value. $A_2=-0.285\ 16\ A_4=+0.025\ 23.$
$^{x}347.9\ 3$	0.17 4							
$^{x}357.7\ 2$	0.25 2							
366.60 5	2.36 13	1498.73	3 ⁻	1132.106	2 ⁻	M1+E2 [@]	0.00 5	$A_2=-0.18\ 4\ A_4=+0.02\ 6.$
$^{x}374.8\ 2$	0.18 4							
381.83 12	0.78 6	2053.31		1671.48	3			
389.40 ^a 5	1.96 ^a 11	953.49	8 ⁺	564.09	6 ⁺			
389.40 ^a 5	1.96 ^a 11	1821.10		1431.70	2 ⁻			
$^{x}392.19\ 4$	0.42 6							
395.27 8	1.42 9	1588.55	4 ⁻	1193.311	3 ⁻	M1+E2 [@]	+0.27 10	$A_2=+0.14\ 12\ A_4=0.0.$
410.54 ^a 6	2.12 ^a 11	1498.73	3 ⁻	1088.228	1 ⁻	E2		$A_2=+0.28\ 4.$
410.54 ^a 6	2.12 ^a 11	1671.48	3	1260.894	2 ⁺			
$^{x}414.8\ 2$	0.51 5							
$^{x}431.8\ 6$	0.19 5							
436.75 19	0.57 6	1630.04		1193.311	3 ⁻			
$^{x}443.9\ 8$	0.25 4							
$^{x}448.92\ 10$	0.78 6							
$^{x}451.5\ 5$	0.06 3							
457.02 5	2.95 15	1798.09		1341.07	4 ⁺			$A_2=+0.08\ 3\ A_4=+0.04\ 4.$
477.8 2	0.34 4	1671.48	3	1193.311	3 ⁻			
481.9 3	0.16 4	2153.4		1671.48	3			
498.3 2	0.36 6	1630.04		1132.106	2 ⁻			
$^{x}531.9\ 5$	0.26 4							
539.0	0.06	1671.48	3	1132.106	2 ⁻			$E_\gamma: 539.0\gamma$ transition is presented in Table 2, but not in Table 1 (1999De40).
$^{x}548.5\ 5$	0.12 3							
$^{x}560.2\ 2$	0.36 5							
$^{x}575.5\ 2$	0.24 5							
$^{x}587\ 2$	0.08 4							
$^{x}591\ 2$	0.07 4							
$^{x}624.5\ 10$	0.09 5							
$^{x}642.4\ 2$	0.16 4							
$^{x}646.4\ 4$	0.09 4							
$^{x}648.5\ 4$	0.12 6							
$^{x}712.0\ 10$	0.09 5							
$^{x}715.0\ 10$	0.10 5							
$^{x}719.0\ 10$	0.09 4							

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$^{176}\text{Yb}(n,n'\gamma)$ 1999De40 (continued) $\gamma(^{176}\text{Yb})$ (continued)

E_γ †	I_γ ‡	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult. #	δ &	Comments
^x 797.5 3	0.16 4							
^x 852.8 4	0.30 5							
921.48 5	1.68 10	1193.311	3 ⁻	271.842	4 ⁺	E1+(M2) @	0.00 5	A ₂ =-0.11 5 A ₄ =-0.04 6.
927.7	<0.05	1199.578	2 ⁺	271.842	4 ⁺			E _γ : 927.7 transition is presented in Table 2, but not in Table 1 (1999De40).
^x 933.0 10	0.24 4							
^x 940.6 3	0.34 5							
^x 955.34 13	0.53 5							
976.6 3	0.45 5	1540.7	(6 ⁺)	564.09	6 ⁺			
988.8 3	0.19 4	1260.894	2 ⁺	271.842	4 ⁺			
1006.11 4	3.53 18	1088.228	1 ⁻	82.137	2 ⁺	(E1+M2) @	0.0 +2 -8	A ₂ =-0.02 4 A ₄ =+0.02 6.
1011.35 4	6.4 3	1283.20	4 ⁻	271.842	4 ⁺	(E1+M2) @	-0.05 5	A ₂ =+0.29 3 A ₄ =-0.07 4.
1049.966 20	19.5 10	1132.106	2 ⁻	82.137	2 ⁺	(E1+M2) @	-0.02 5	A ₂ =+0.173 15 A ₄ =+0.029 21.
1056.81 3	4.83 3	1138.95	0 ⁺	82.137	2 ⁺			
1064.55 7	1.42 9	1336.378	3 ⁺	271.842	4 ⁺	M1+E2 @	-6 +9 -5	A ₂ =-0.04 4 A ₄ =+0.05 6.
1069.223 20	24.6 12	1341.07	4 ⁺	271.842	4 ⁺	M1+E2 @	-0.26 2	Also δ =+1.70 8, 2nd value. E _γ : Multiplete. A ₂ =+0.145 19 A ₄ =-0.01 3.
^x 1076.4 4	0.14 5							
^x 1080.3 2	0.32 5							
1088.245 20	16.1 8	1088.228	1 ⁻	0.0	0 ⁺	E1		A ₂ =-0.100 14 A ₄ =-0.010 20.
^x 1093.84 19	0.29 5							
1111.150 20	16.6 8	1193.311	3 ⁻	82.137	2 ⁺	E1+(M2) @	0.00 5	A ₂ =-0.207 13 A ₄ =-0.016 20.
1117.440 20	11.2 6	1199.578	2 ⁺	82.137	2 ⁺	M1+E2 @	+11 +5 -3	A ₂ =+0.002 18 A ₄ =-0.003 26.
^x 1125.5 3	0.10 3							
^x 1133.2 3	0.06 3							
1137.77 11	0.79 6	1409.60	5 ⁻	271.842	4 ⁺			
1163.65 4	2.45 13	1435.50	4 ⁺	271.842	4 ⁺	M1+E2 @	-1.2 3	A ₂ =-0.20 3 A ₄ =-0.08 4.
^x 1172.5 3	0.13 4							
1178.759 20	7.1 4	1260.894	2 ⁺	82.137	2 ⁺	M1+E2 @	+160 +0-130	A ₂ =-0.047 18 A ₄ =-0.006 26.
^x 1194.3 3	0.09 3							
1199.50 8	1.36 8	1199.578	2 ⁺	0.0	0 ⁺	E2		A ₂ =+0.19 5 A ₄ =-0.13 7.
^x 1208.7 5	0.11 3							
1219.7 10	0.10 3	1491.51?	5 ⁺	271.842	4 ⁺			
1226.91 14	0.77 5	1498.73	3 ⁻	271.842	4 ⁺	E1+M2 @	-0.04 +8 -4	A ₂ =-0.04 6 A ₄ =-0.03 7.
^x 1232.1 6	0.11 4							
^x 1236.4 8	0.10 4							
1254.235 20	6.4 3	1336.378	3 ⁺	82.137	2 ⁺	M1+E2 @		A ₂ =+0.076 15 A ₄ =+0.11 3. 1/ δ =+0.007 14 in 2000De59.
1258.95 4	2.92 15	1341.07	4 ⁺	82.137	2 ⁺	E2		I _γ : 1.92 in Table 2. A ₂ =+0.28 6 A ₄ =-0.03 8. A ₂ =+0.282 20 A ₄ =-0.08 3.
1260.875 23	6.3 3	1260.894	2 ⁺	0.0	0 ⁺	E2		
1269.0 10	0.11 5	1540.7	(6 ⁺)	271.842	4 ⁺			
^x 1273.0 10	0.11 5							
1286.49 6	1.33 6	1558.34	5 ⁺	271.842	4 ⁺	M1+E2 @		δ : >)0 ∞ A ₂ =-0.01 4 A ₄ =+0.015 6. E _γ : 1269.49 in Table 1 is a typo.
^x 1298.6 15	0.18 5							
1303.3 3	0.32 5	1575.28	(3)	271.842	4 ⁺			
^x 1319.8 5	0.20 5							
^x 1332.5 3	0.19 4							
1338.11 6	1.69 10	1609.97	2 ⁺	271.842	4 ⁺	E2		A ₂ =+0.12 3 A ₄ =+0.01 5.

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$^{176}\text{Yb}(n,n'\gamma)$ **1999De40** (continued) $\gamma(^{176}\text{Yb})$ (continued)

E_γ [†]	I_γ [‡]	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult.#	δ ^{&}	Comments
1349.45 15	0.76 6	1431.70	2 ⁻	82.137	2 ⁺	E1+M2+(E3)		$A_2=+0.34$ 8 $A_4=+0.04$ 10.
1353.36 8	1.60 9	1435.50	4 ⁺	82.137	2 ⁺	E2		$A_2=+0.29$ 5 $A_4=-0.13$ 6.
1358.1 4	0.17 5	1630.04		271.842	4 ⁺			
^x 1382.8 4	0.11 3							
^x 1392.40 19	0.48 5							$A_2=-0.26$ 9 $A_4=0.0$.
^x 1399.4 5	0.25 4							
1416.7	0.05	1498.73	3 ⁻	82.137	2 ⁺			E_γ : 1416.7 γ transition is presented in Table 2, but not in Table 1 (1999De40).
^x 1430.7 3	0.50 4							E_γ : Multiplete.
1436.79 6	1.74 10	1518.93	0 ⁺	82.137	2 ⁺	E2 [@]		$A_2=+0.03$ 3 $A_4=+0.00$ 5.
1493.12 11	0.58 5	1575.28	(3)	82.137	2 ⁺			
^x 1499.0 5	0.11 5							
^x 1501.5 2	0.30 5							
^x 1507.2 4	0.11 4							
1527.83 6	1.84 10	1609.97	2 ⁺	82.137	2 ⁺	M1+E2 [@]	-1.5 +9 -35	$A_2=-0.20$ 3 $A_4=+0.05$ 5. $A_2=+0.08$ 5 $A_4=+0.25$ 8.
^x 1543.88 12	0.85 6							
^x 1559.9 4	0.13 4							
^x 1570.05 10	0.75 6							$A_2=+0.12$ 7 $A_4=+0.15$ 9.
^x 1581.8 4	0.21 4							
1589.39 17	0.55 5	1671.48	3	82.137	2 ⁺			
1610.04 22	0.54 5	1609.97	2 ⁺	0.0	0 ⁺			
^x 1669.6 2	0.42 5							$A_2=-0.11$ 9 $A_4=+0.0$.
^x 1690.5 3	0.14 3							
1696.32 11	0.66 5	1778.47	0 ⁺	82.137	2 ⁺			$A_2=+0.03$ 8 $A_4=+0.0$. E_γ : Presented as unplaced γ in Table 1, but placed under 1778.47 keV level in Table 2 in 1999De40.
^x 1732.5 8	0.19 5							E_γ : Multiplete.
1737.1 3	0.44 5	1819.24	1 ⁽⁺⁾	82.137	2 ⁺			
^x 1759.90 16	0.57 5							
^x 1764.8 5	0.09 3							
1785.80 10	1.17 7	1867.93	(2 ⁺)	82.137	2 ⁺	(M1+E2) [@]	+0.02 +16-14	Also $\delta=+2.0$ +10 -5, 2nd value. $A_2=+0.19$ 8 $A_4=-0.01$ 11.
1819.23 13	0.90 7	1819.24	1 ⁽⁺⁾	0.0	0 ⁺	M1,E1		I_γ : 0.33 in Table 2. E_γ : Multiplete.
^x 1823.3 4	0.33 5							
^x 1859.3 2	0.51 5							
^x 1861.7 11	0.11 5							
1867.2 7	0.18 5	1867.93	(2 ⁺)	0.0	0 ⁺			I_γ : 0.80 in Table 2.
1898.3 ^b 3	0.40 5	2170?		271.842	4 ⁺			E_γ : Multiplete.
^x 1932.6 5	0.10 3							
^x 1937.4 2	0.68 5							$A_2=-0.14$ 5 $A_4=+0.0$.
^x 1938.8 7	0.13 5							
1945.3 ^b 3	0.59 5	2027?		82.137	2 ⁺			E_γ : Multiplete.
1973.3 ^b 2	0.20 5	2245?		271.842	4 ⁺			E_γ : Multiplete.
2012.9 ^b 3	0.34 5	2095?		82.137	2 ⁺			E_γ : Multiplete.
^x 2018.8 8	0.11 4							
2027.0 ^b 3	0.39 5	2027?		0.0	0 ⁺			
^x 2036.5 4	0.23 4							
2056.7 ^b 3	0.47 5	2139?		82.137	2 ⁺			E_γ : Multiplete.
^x 2080.6 3	0.44 5							
^x 2085.0 5	0.19 4							
2088.2 ^b 12	0.10 5	2170?		82.137	2 ⁺			

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$^{176}\text{Yb}(n,n'\gamma)$ **1999De40** (continued)

$\gamma(^{176}\text{Yb})$ (continued)

E_γ^\dagger	I_γ^\ddagger	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Comments
2094.5 ^b 5	0.12 3	2095?		0.0	0 ⁺	
^x 2117.8 6	0.40 16					E_γ : Multiplete.
2122.4 ^b 5	0.60 3	2394?		271.842	4 ⁺	E_γ : Multiplete.
^x 2137.2 2	0.55 5					
2163.1 ^b 2	0.31 4	2245?		82.137	2 ⁺	
^x 2183.5 3	0.13 3					
^x 2201.5 4	0.26 4					
^x 2217.2 3	0.12 3					
^x 2251.0 4	0.50 5					
^x 2253.8 8	0.26 5					
2258.5 ^b 8	0.28 5	2530?		271.842	4 ⁺	
^x 2281.1 4	0.52 6					
2298.3 ^b 3	0.41 5	2570?		271.842	4 ⁺	
2311.3 ^b 7	0.25 5	2394?		82.137	2 ⁺	E_γ : Multiplete.
^x 2315.0 7	0.10 5					
^x 2348.7 7	0.15 6					
^x 2354.4 5	0.35 5					
^x 2359.9 8	0.15 6					
^x 2364.5 6	0.08 5					
^x 2390.9 6	0.31 5					E_γ : Multiplete.
^x 2411.1 4	0.32 4					E_γ : Multiplete.
^x 2422.3 9	0.25 4					
^x 2429.0 8	0.18 4					
2432.0 ^b 6	0.42 5	2705?		271.842	4 ⁺	
^x 2442.1 6	0.38 4					
2448.3 ^b 6	0.30 5	2530?		82.137	2 ⁺	E_γ : Multiplete.
^x 2452.7 7	0.25 5					
^x 2457.3 10	0.15 6					
^x 2463.4 8	0.15 5					
^x 2475.5 8	0.10 5					
^x 2478.9 7	0.21 4					E_γ : Multiplete.
2487.9 ^b 8	0.15 5	2570?		82.137	2 ⁺	E_γ : Multiplete.
^x 2490.5 5	0.30 4					E_γ : Multiplete.
^x 2505.6 22	0.19 4					
^x 2566.8 5	0.30 6					
2622.3 ^b 5	0.12 5	2705?		82.137	2 ⁺	E_γ : Multiplete.
^x 2644.1 6	0.15 5					
^x 2661.3 6	0.10 5					
^x 2667.7 4	0.15 5					
^x 2694.7 17	0.10 5					
2704.6 ^b 13	0.15 5	2705?		0.0	0 ⁺	E_γ : Multiplete.
^x 2866.8 6	0.20 5					

† From 1999De40, measured at angle of 90° with respect to the beam direction.

‡ From 1999De40, measured at angle of 125° with respect to beam direction.

Assigned from δ and A2, A4 values in 1999De40, except otherwise noted.

@ Assigned by the evaluator from A2, A4, and δ values.

& From 1999De40.

^a Multiply placed with undivided intensity.

^b Placement of transition in the level scheme is uncertain.

^x γ ray not placed in level scheme.

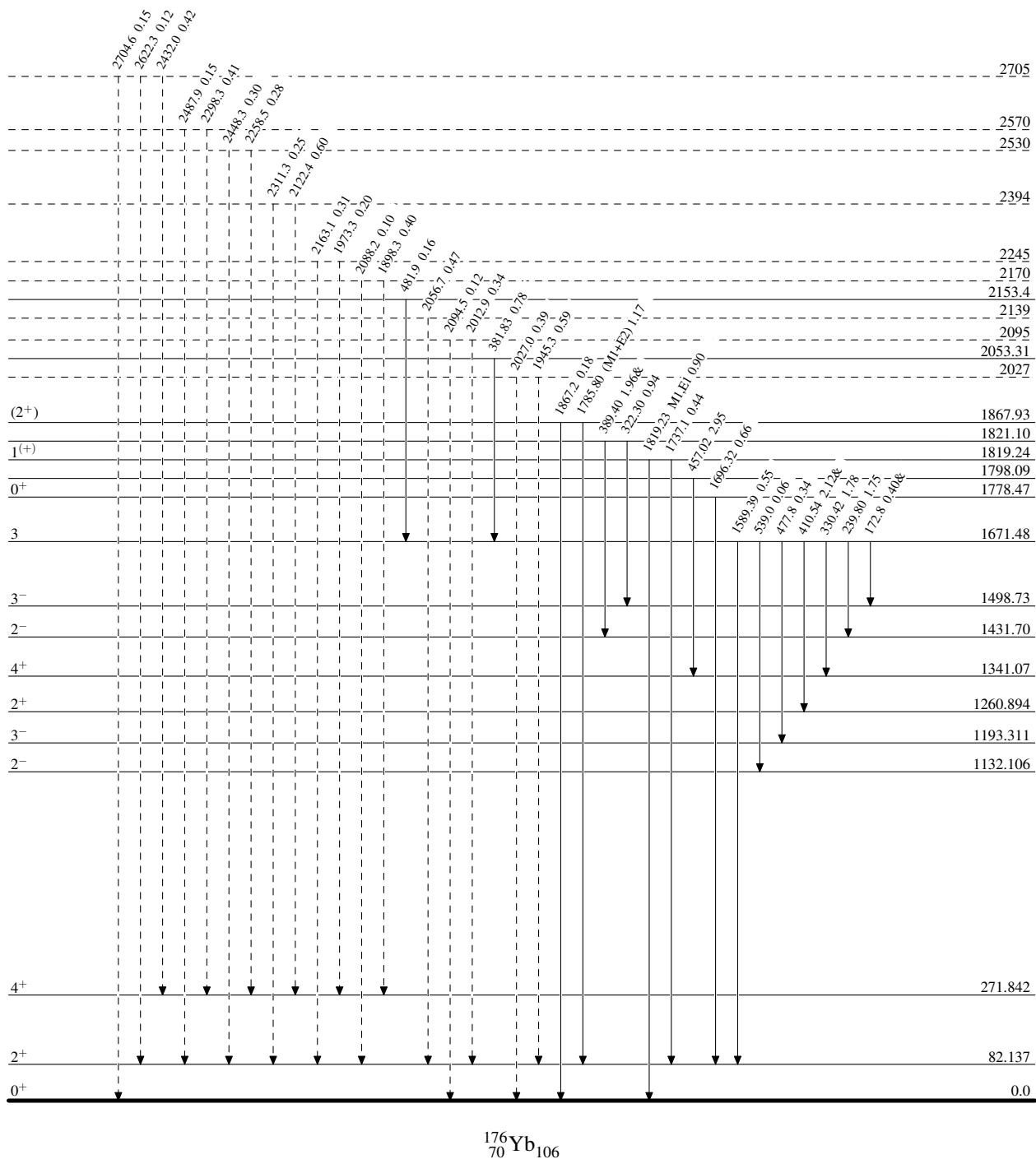
$^{176}\text{Yb}(n,n'\gamma)$ 1999De40

Level Scheme

Intensities: Relative I_γ
& Multiply placed: undivided intensity given

Legend

- $I_\gamma < 2\% \times I_\gamma^{max}$
- $I_\gamma < 10\% \times I_\gamma^{max}$
- $I_\gamma > 10\% \times I_\gamma^{max}$
- - - - - γ Decay (Uncertain)

 $^{176}_{70}\text{Yb}_{106}$

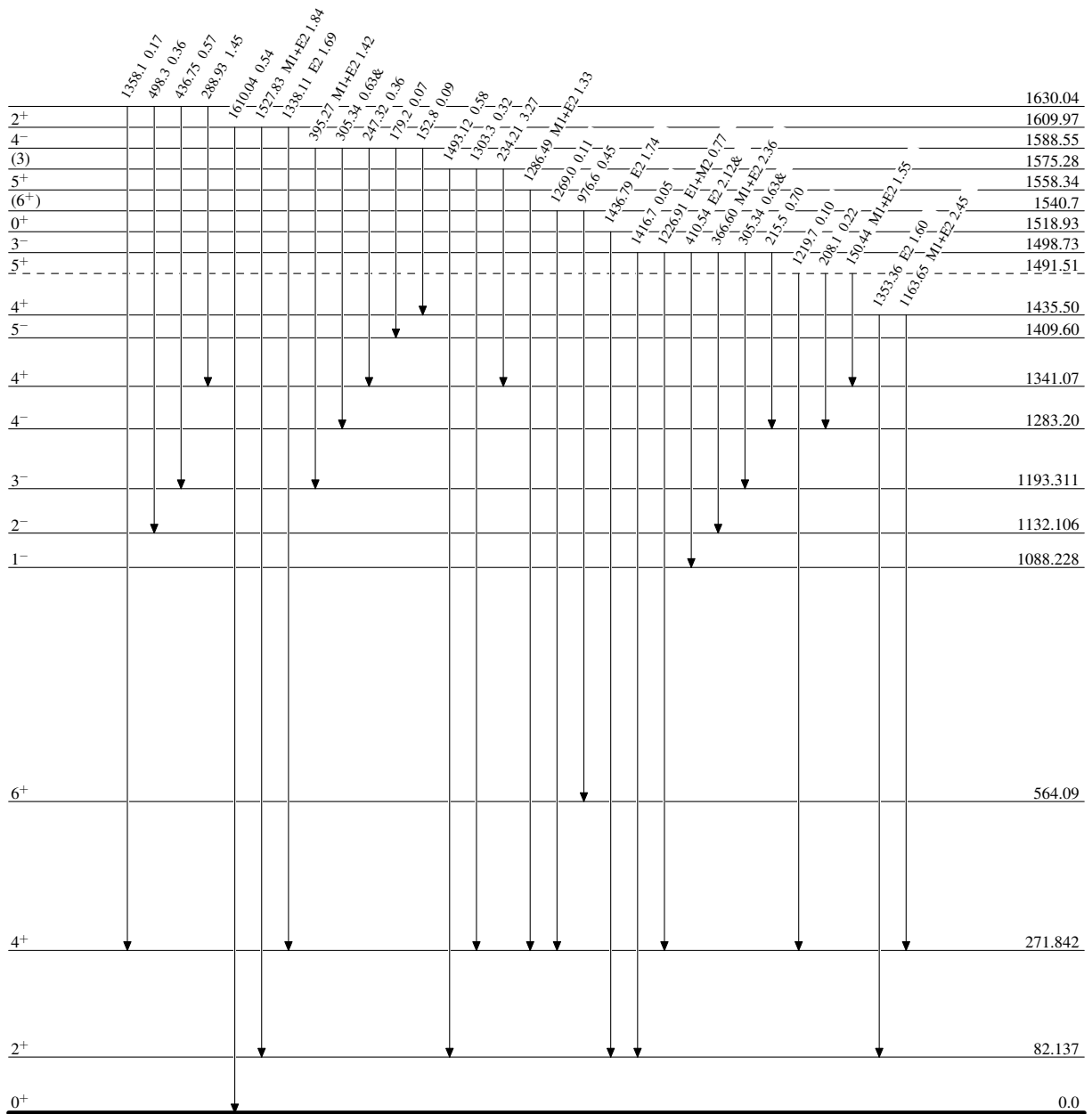
$^{176}\text{Yb}(n,n'\gamma)$ 1999De40

Level Scheme (continued)

Intensities: Relative I_γ
& Multiply placed: undivided intensity given

Legend

- $I_\gamma < 2\% \times I_\gamma^{max}$
- $I_\gamma < 10\% \times I_\gamma^{max}$
- $I_\gamma > 10\% \times I_\gamma^{max}$

 $^{176}_{70}\text{Yb}_{106}$

¹⁷⁶Yb(n,γ) **1999Dc40**

Level Scheme (continued)

Intensities: Relative I_γ
& Multiply placed: undivided intensity given

