

$^{70}\text{Zn}(^{36}\text{S,p4n}\gamma)$ 2001Ti08

Type	History		Literature Cutoff Date
	Author	Citation	
Full Evaluation	Jean Blachot	ENSDF	1-Jul-2006

2001Ti08: E=130 MeV. Measured $E\gamma$, $I\gamma$, $\gamma\gamma$, $\gamma\gamma(\theta)$ (DCO) and linear polarization using EUROGAM II spectrometer comprised of 54 Compton-suppressed Ge detectors including 30 large volume coaxial detectors and 24 four-element clover detectors.

 ^{101}Rh Levels

E(level) [†]	J ^π	T _{1/2}	Comments
0.0 ^e	1/2 ⁻		
157.40 [‡] 4	9/2 ⁺	4.34 d 1	T _{1/2} : from Adopted Levels for ^{101}Rh .
182.18 [#] 5	7/2 ⁺	1.91 ns 6	T _{1/2} ,E(level): from Adopted Levels for ^{101}Rh .
304.9 ^f 8	3/2 ⁻		
354.88 ^e 19	5/2 ⁻		
478.3 7	5/2 ⁺		
747.93 [#] 19	11/2 ⁺		
851.1 ^f 8	7/2 ⁻		
893.09 [‡] 18	13/2 ⁺		
898.58 ^e 25	9/2 ⁻		
1576.0 ^f 11	11/2 ⁻		
1603.7 ^e 3	13/2 ⁻		
1608.9 [#] 4	15/2 ⁺		
1778.66 [‡] 24	17/2 ⁺		
1843.0 8	(13/2 ⁻)		
2386.1 ^e 3	17/2 ⁻		
2586.6 [#] 5	19/2 ⁺		
2671.7 ^a 4	17/2 ⁻		
2780.9 [‡] 3	21/2 ⁺		
2785.0 5	17/2 ⁻		
2930.7 ^b 3	19/2 ⁻		
3119.5 ^a 3	21/2 ⁻		
3249.6 ^e 5	21/2 ⁻		
3425.1 ^b 4	23/2 ⁻		
3530.5 ^d 3	23/2 ⁻		
3744.2 ^a 4	25/2 ⁻		
3763.3 11	(23/2 ⁻)		
3874.9 [‡] 4	25/2 ⁺		
3890.0 [#] 6	(23/2 ⁺)		
3930.8 ^c 4	25/2 ⁻		
3994.2 8	(25/2 ⁻)		
4071.7 15	(25/2 ⁻)		
4236.6 ^b 4	27/2 ⁻		
4303.5 ^d 4	27/2 ⁻		
4384.4 [@] 9	(25/2 ⁺)		
4571.0 8			
4609.6 ^a 4	29/2 ⁻		
4773.4 ^{&} 6	(27/2 ⁺)		
4801.2 ^c 4	29/2 ⁻		
4825.0 [#] 7	(27/2 ⁺)		
4979.9 [‡] 6	29/2 ⁺		

Continued on next page (footnotes at end of table)

⁷⁰Zn(³⁶S,p4n γ) **2001Ti08** (continued)

¹⁰¹Rh Levels (continued)

E(level) [†]	J ^{π}	E(level) [†]	J ^{π}	E(level) [†]	J ^{π}	E(level) [†]	J ^{π}
5196.7 [@] 6	(29/2 ⁺)	6309.6 ^d 4	35/2 ⁻	8161.0 ^c 6	41/2 ⁻	10414.1 ^{&} 8	(47/2 ⁺)
5230.4 ^d 4	31/2 ⁻	6633.1 ^{&} 7	(35/2 ⁺)	8287.6 ^a 7	41/2 ⁻	10689.9 ^c 8	49/2 ⁻
5234.5 ^b 6	(31/2 ⁻)	6706.4 7	(35/2 ⁺)	8392.4 [@] 7	(41/2 ⁺)	11029.7 [@] 8	(49/2 ⁺)
5627.1 ^{&} 7	(31/2 ⁺)	6882.5 ^c 5	37/2 ⁻	8926.0 ^d 7	43/2 ⁻	12127.6 ^c 9	53/2 ⁻
5728.1 ^c 4	33/2 ⁻	6994.2 ^a 5	37/2 ⁻	9066.9 ^{&} 8	(43/2 ⁺)	12382.1 [@] 10	(53/2 ⁺)
5846.3 ^a 4	33/2 ⁻	7210.4 [@] 7	(37/2 ⁺)	9464.5 ^c 7	45/2 ⁻	13756.3 [@] 11	(57/2 ⁺)
5881.5 [#] 7	(31/2 ⁺)	7213.3 [‡] 9	37/2 ⁺	9507.6 ^a 12	45/2 ⁻	13833.6 ^c 14	57/2 ⁻
6082.8 [‡] 7	33/2 ⁺	7536.0 ^d 5	39/2 ⁻	9647.6 [@] 7	(45/2 ⁺)	15407.2 [@] 15	(61/2 ⁺)
6116.9 [@] 7	(33/2 ⁺)	7840.3 ^{&} 7	(39/2 ⁺)	10219.9 ^d 7	47/2 ⁻	17234.3 [@] 18	(65/2 ⁺)

[†] From least-squares fit to E γ 's. Based on authors' general statement, uncertainty is assumed as 0.2 for I γ >15, 0.5 for I γ =5-15, 1.0 keV for I γ <5.

[‡] Band(A): band based on 9/2⁺, α =+1/2.

Band(a): band based on 9/2⁺, α =-1/2.

@ Band(B): band based on (25/2⁺), α =+1/2.

& Band(b): band based on (25/2⁺), α =-1/2.

^a Band(C): band based on 17/2⁻, α =+1/2.

^b Band(c): band based on 17/2⁻, α =-1/2.

^c Band(D): band based on 23/2⁻, α =-1/2.

^d Band(d): band based on 23/2⁻, α =+1/2.

^e Band(E): gs band, α =+1/2.

^f Band(e): gs band, α =-1/2.

γ (¹⁰¹Rh)

DCO₁: gated by E2 transitions.

DCO₂: gated by $\Delta J=1$, dipole transition.

E γ	I γ	E _i (level)	J _i ^{π}	E _f	J _f ^{π}	Mult.	Comments
24.78 1		182.18	7/2 ⁺	157.40	9/2 ⁺	M1+E2	E γ ,Mult.: from Adopted Gammas for ¹⁰¹ Rh.
(47.7 [‡])		898.58	9/2 ⁻	851.1	7/2 ⁻		
(50.0 [‡])		354.88	5/2 ⁻	304.9	3/2 ⁻		
145.3 5	12	893.09	13/2 ⁺	747.93	11/2 ⁺		
145.4 5	13	2930.7	19/2 ⁻	2785.0	17/2 ⁻	D	DCO ₁ =0.73 11.
157.41 4		157.40	9/2 ⁺	0.0	1/2 ⁻	M4	B(M4)(W.u.)=933 3 E γ ,Mult.: from Adopted Gammas for ¹⁰¹ Rh.
169.5 5	6	1778.66	17/2 ⁺	1608.9	15/2 ⁺		
175.5 10	2	3425.1	23/2 ⁻	3249.6	21/2 ⁻	D	DCO ₂ =0.97 18.
188.5 2	75	3119.5	21/2 ⁻	2930.7	19/2 ⁻	M1+E2	DCO ₁ =0.73 5. pol=-0.24 17.
190.4 10	1	4801.2	29/2 ⁻	4609.6	29/2 ⁻		
194.4 10	1	2780.9	21/2 ⁺	2586.6	19/2 ⁺		
202.2 10	2	4773.4	(27/2 ⁺)	4571.0			
213.6 2	23	3744.2	25/2 ⁻	3530.5	23/2 ⁻	M1+E2	DCO ₁ =0.70 10. pol=-0.45 45.
239.0 10	1	1843.0	(13/2 ⁻)	1603.7	13/2 ⁻		

Continued on next page (footnotes at end of table)

$^{70}\text{Zn}(^{36}\text{S},\text{p}4\text{n}\gamma)$ **2001Ti08 (continued)** $\gamma(^{101}\text{Rh})$ (continued)

E_γ	I_γ	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult.	Comments
258.9 2	27	2930.7	19/2 ⁻	2671.7	17/2 ⁻	M1+E2	DCO ₁ =0.88 12. pol=-0.41 17.
281.1 10	3	3530.5	23/2 ⁻	3249.6	21/2 ⁻	D	DCO ₁ =0.63 14.
284.9 5	9	2671.7	17/2 ⁻	2386.1	17/2 ⁻		DCO ₁ =1.22 18. Mult.: $\Delta J=0$ transition.
(296.3 [‡])		478.3	5/2 ⁺	182.18	7/2 ⁺		
305.0 [†] 10		304.9	3/2 ⁻	0.0	1/2 ⁻		
305.5 2	70	3425.1	23/2 ⁻	3119.5	21/2 ⁻	M1+E2	DCO ₁ =0.82 12 for 305.5+306.1. pol=-0.27 8.
305.5 5	5	4236.6	27/2 ⁻	3930.8	25/2 ⁻		
306.1 2	20	4609.6	29/2 ⁻	4303.5	27/2 ⁻	D	DCO ₁ =0.82 12 for 305.5+306.1.
308.4 10	3	4071.7	(25/2 ⁻)	3763.3	(23/2 ⁻)		
318.9 2	70	3744.2	25/2 ⁻	3425.1	23/2 ⁻	M1+E2	DCO ₁ =0.79 11. pol=-0.29 10.
(320.8 [‡])		478.3	5/2 ⁺	157.40	9/2 ⁺		
354.7 2	100	354.88	5/2 ⁻	0.0	1/2 ⁻	E2	DCO ₁ =0.88 7.
372.8 2	23	4303.5	27/2 ⁻	3930.8	25/2 ⁻	D	DCO ₁ =0.77 11 for 372.8+373.0. DCO ₂ =0.91 14.
373.0 2	33	4609.6	29/2 ⁻	4236.6	27/2 ⁻	M1+E2	DCO ₁ =0.77 11 for 372.8+372.9. DCO ₂ =0.96 14. pol=-0.21 10.
389.2 10	4	4773.4	(27/2 ⁺)	4384.4	(25/2 ⁺)		
398.6 5	15	2785.0	17/2 ⁻	2386.1	17/2 ⁻		Mult.: $\Delta J=0$ transition. DCO ₁ =1.00 15. pol=+0.37 21.
400.5 5	12	3930.8	25/2 ⁻	3530.5	23/2 ⁻	D	DCO ₂ =1.03 16.
410.9 2	17	3530.5	23/2 ⁻	3119.5	21/2 ⁻	M1+E2	DCO ₁ =0.77 12. pol=-0.51 14.
423.3 5	8	5196.7	(29/2 ⁺)	4773.4	(27/2 ⁺)	D	DCO ₁ =0.53 10.
429.0 2	25	5230.4	31/2 ⁻	4801.2	29/2 ⁻	M1+E2	DCO ₁ =0.59 9. pol=-0.45 20.
430.3 5	8	5627.1	(31/2 ⁺)	5196.7	(29/2 ⁺)		
447.4 10	1	3119.5	21/2 ⁻	2671.7	17/2 ⁻		
463.1 5	6	6309.6	35/2 ⁻	5846.3	33/2 ⁻		
470.0 5	5	10689.9	49/2 ⁻	10219.9	47/2 ⁻		
489.2 5	8	6116.9	(33/2 ⁺)	5627.1	(31/2 ⁺)	D	DCO ₁ =0.53 7.
492.1 2	60	4236.6	27/2 ⁻	3744.2	25/2 ⁻	M1+E2	DCO ₁ =0.68 10. pol=-0.31 7.
494.3 10	1	3425.1	23/2 ⁻	2930.7	19/2 ⁻		
496.4 [†] 10		851.1	7/2 ⁻	354.88	5/2 ⁻		
497.6 5	13	4801.2	29/2 ⁻	4303.5	27/2 ⁻	D	DCO ₁ =0.79 12 for 497.6+497.8.
497.8 2	20	5728.1	33/2 ⁻	5230.4	31/2 ⁻	M1+E2	DCO ₁ =0.79 12 for 497.6+497.8. DCO ₂ =1.04 18. pol=-0.36 14.
503.8 5	6	7210.4	(37/2 ⁺)	6706.4	(35/2 ⁺)		
506.0 5	15	3930.8	25/2 ⁻	3425.1	23/2 ⁻	M1+E2	DCO ₁ =0.60 9. DCO ₁ =-0.33 18.
513.7 10	4	3763.3	(23/2 ⁻)	3249.6	21/2 ⁻	D	DCO ₁ =0.51 8.
516.2 5	6	6633.1	(35/2 ⁺)	6116.9	(33/2 ⁺)		
543.5 2	95	898.58	9/2 ⁻	354.88	5/2 ⁻	E2	DCO ₂ =1.32 19. pol=+0.16 7.
544.5 2	40	2930.7	19/2 ⁻	2386.1	17/2 ⁻		
550.8 10	2	6633.1	(35/2 ⁺)	6082.8	33/2 ⁺		
552.4 5	9	8392.4	(41/2 ⁺)	7840.3	(39/2 ⁺)		
559.5 5	10	4303.5	27/2 ⁻	3744.2	25/2 ⁻	D	DCO ₂ =0.90 15.

Continued on next page (footnotes at end of table)

$^{70}\text{Zn}(^{36}\text{S,p4n}\gamma)$ **2001Ti08 (continued)** $\gamma(^{101}\text{Rh})$ (continued)

E_γ	I_γ	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult.	Comments
564.3 2	20	4801.2	29/2 ⁻	4236.6	27/2 ⁻	D	DCO ₁ =0.57 11.
573.4 5	13	6882.5	37/2 ⁻	6309.6	35/2 ⁻	M1+E2	DCO ₂ =0.98 15. pol=-0.47 29.
576.8 10	1	4571.0		3994.2	(25/2 ⁻)		
577.3 5	7	7210.4	(37/2 ⁺)	6633.1	(35/2 ⁺)		
580.8 5	8	9647.6	(45/2 ⁺)	9066.9	(43/2 ⁺)		
581.0 5	12	6309.6	35/2 ⁻	5728.1	33/2 ⁻	M1+E2	DCO ₁ =0.69 11. pol=-0.71 37.
588.8 5	5	6706.4	(35/2 ⁺)	6116.9	(33/2 ⁺)		
590.5 2	17	747.93	11/2 ⁺	157.40	9/2 ⁺		
615.4 5	10	11029.7	(49/2 ⁺)	10414.1	(47/2 ⁺)		
619.9 10	3	5230.4	31/2 ⁻	4609.6	29/2 ⁻		
624.0 [#] 10	2 [#]	3744.2	25/2 ⁻	3119.5	21/2 ⁻		
624.0 [#] 5	11 [#]	8161.0	41/2 ⁻	7536.0	39/2 ⁻	D	DCO ₂ =0.92 18.
624.9 5	7	5234.5	(31/2 ⁻)	4609.6	29/2 ⁻		
630.6 5	6	7840.3	(39/2 ⁺)	7210.4	(37/2 ⁺)		
644.5 5	7	3425.1	23/2 ⁻	2780.9	21/2 ⁺	D	DCO ₂ =0.98 17.
674.2 5	10	9066.9	(43/2 ⁺)	8392.4	(41/2 ⁺)		
(677.4 ⁺)		1576.0	11/2 ⁻	898.58	9/2 ⁻		
704.9 2	90	1603.7	13/2 ⁻	898.58	9/2 ⁻	E2	DCO ₁ =1.03 8. pol=+0.36 9.
715.8 5	7	1608.9	15/2 ⁺	893.09	13/2 ⁺		
733.8 5	12	3119.5	21/2 ⁻	2386.1	17/2 ⁻	E2	DCO ₁ =1.00 15. pol=+0.32 22.
735.9 2	66	893.09	13/2 ⁺	157.40	9/2 ⁺	E2	DCO ₁ =0.95 8. pol=+0.87 25.
744.9 10	4	3994.2	(25/2 ⁻)	3249.6	21/2 ⁻		
749.7 2	25	3530.5	23/2 ⁻	2780.9	21/2 ⁺	E1	DCO ₁ =0.71 11. pol=+0.49 23. DCO ₁ =0.99 19.
751.7 5	9	6633.1	(35/2 ⁺)	5881.5	(31/2 ⁺)	Q	
766.2 5	13	10414.1	(47/2 ⁺)	9647.6	(45/2 ⁺)		
774.1 5	11	4303.5	27/2 ⁻	3530.5	23/2 ⁻	Q	DCO ₂ =1.46 22.
779.3 10	3	4773.4	(27/2 ⁺)	3994.2	(25/2 ⁻)		
782.3 2	85	2386.1	17/2 ⁻	1603.7	13/2 ⁻	E2	DCO ₁ =1.02 8. pol=+0.42 8.
808.0 5	8	2586.6	19/2 ⁺	1778.66	17/2 ⁺		
811.4 5	8	4236.6	27/2 ⁻	3425.1	23/2 ⁻	Q	DCO ₁ =1.09 16 for 811.4+811.6.
811.6 5	7	3930.8	25/2 ⁻	3119.5	21/2 ⁻	Q	DCO ₁ =1.09 16 for 811.4+811.6.
812.1 10	2	5196.7	(29/2 ⁺)	4384.4	(25/2 ⁺)		
853.6 10	3	5627.1	(31/2 ⁺)	4773.4	(27/2 ⁺)		
860.7 5	5	1608.9	15/2 ⁺	747.93	11/2 ⁺		
863.5 5	5	3249.6	21/2 ⁻	2386.1	17/2 ⁻	Q	DCO ₁ =1.15 17 for 863.4+865.4. DCO ₂ =1.59 27.
865.4 2	21	4609.6	29/2 ⁻	3744.2	25/2 ⁻	E2	DCO ₁ =1.15 17 for 863.4+865.4. DCO ₂ =1.63 24. pol=+0.38 25.
870.9 5	8	4801.2	29/2 ⁻	3930.8	25/2 ⁻		
885.8 2	65	1778.66	17/2 ⁺	893.09	13/2 ⁺	E2	DCO ₁ =1.18 10. pol=+1.13 29.
920.3 10	3	6116.9	(33/2 ⁺)	5196.7	(29/2 ⁺)		
926.9 5	12	5728.1	33/2 ⁻	4801.2	29/2 ⁻	E2	DCO ₁ =1.02 15 for 926.9+927.2. DCO ₂ =1.68 33. pol=+0.75 40.
927.2 2	17	5230.4	31/2 ⁻	4303.5	27/2 ⁻	Q	DCO ₁ =1.02 15 for 926.9+927.2.
935.1 5	9	4825.0	(27/2 ⁺)	3890.0	(23/2 ⁺)	Q	DCO ₁ =0.99 16.

Continued on next page (footnotes at end of table)

$^{70}\text{Zn}(^{36}\text{S},\text{p}4\text{n}\gamma)$ **2001Ti08** (continued) $\gamma(^{101}\text{Rh})$ (continued)

E_γ	I_γ	$E_i(\text{level})$	J_i^π	E_f	J_f^π	Mult.	Comments
941.6 10	2	2785.0	17/2 ⁻	1843.0	(13/2 ⁻)		
994.1 5	8	5230.4	31/2 ⁻	4236.6	27/2 ⁻	Q	DCO ₂ =1.60 24.
1002.4 2	60	2780.9	21/2 ⁺	1778.66	17/2 ⁺	E2	DCO ₁ =1.05 9. pol=+1.10 38.
1005.5 10	3	6633.1	(35/2 ⁺)	5627.1	(31/2 ⁺)		
1028.5 10	3	4773.4	(27/2 ⁺)	3744.2	25/2 ⁻		
1044.7 5	5	5846.3	33/2 ⁻	4801.2	29/2 ⁻		
1056.6 5	8	5881.5	(31/2 ⁺)	4825.0	(27/2 ⁺)	Q	DCO ₁ =1.04 16.
1068.1 5	15	2671.7	17/2 ⁻	1603.7	13/2 ⁻	E2	DCO ₁ =1.08 16. pol=+0.90 54.
1079.2 2	24	6309.6	35/2 ⁻	5230.4	31/2 ⁻	E2	DCO ₁ =1.26 19. pol=+0.95 52.
1079.8 5	5	6706.4	(35/2 ⁺)	5627.1	(31/2 ⁺)		
1093.6 5	14	7210.4	(37/2 ⁺)	6116.9	(33/2 ⁺)	Q	DCO ₁ =1.12 16 for 1093.6+1094.0.
1094.0 2	18	3874.9	25/2 ⁺	2780.9	21/2 ⁺	Q	DCO ₁ =1.12 16 for 1093.6+1094.0.
1103.0 5	5	6082.8	33/2 ⁺	4979.9	29/2 ⁺	Q	DCO ₁ =1.08 17 for 1103.0+1105.0.
1105.0 5	12	4979.9	29/2 ⁺	3874.9	25/2 ⁺	Q	DCO ₁ =1.08 17 for 1103.0+1105.0.
1109.2 5	9	3890.0	(23/2 ⁺)	2780.9	21/2 ⁺	D	DCO ₁ =0.74 12.
1118.2 5	10	5728.1	33/2 ⁻	4609.6	29/2 ⁻	Q	DCO ₁ =1.04 15.
1129.9 10	3	7213.3	37/2 ⁺	6082.8	33/2 ⁺	Q	DCO ₁ =1.00 19.
1145.6 10	1	4571.0		3425.1	23/2 ⁻		
1147.9 2	17	6994.2	37/2 ⁻	5846.3	33/2 ⁻	Q	DCO ₁ =1.06 15.
1154.5 2	17	6882.5	37/2 ⁻	5728.1	33/2 ⁻	Q	DCO ₁ =1.12 17.
1178.6 10	2	8392.4	(41/2 ⁺)	7213.3	37/2 ⁺		
1181.9 2	19	8392.4	(41/2 ⁺)	7210.4	(37/2 ⁺)	Q	DCO ₁ =0.97 16.
1207.5 5	10	7840.3	(39/2 ⁺)	6633.1	(35/2 ⁺)		
1220.0 10	4	9507.6	45/2 ⁻	8287.6	41/2 ⁻	Q	DCO ₁ =1.07 17. DCO ₂ =1.39 21.
1225.4 5	7	10689.9	49/2 ⁻	9464.5	45/2 ⁻	Q	DCO ₁ =1.16 17 for 1225.4+1226.2.
1226.2 2	22	7536.0	39/2 ⁻	6309.6	35/2 ⁻	E2	DCO ₁ =1.16 17 for 1225.4+1226.2.
1227.2 5	14	9066.9	(43/2 ⁺)	7840.3	(39/2 ⁺)		
1236.7 2	25	5846.3	33/2 ⁻	4609.6	29/2 ⁻	Q	DCO ₁ =1.26 19.
1255.1 2	16	9647.6	(45/2 ⁺)	8392.4	(41/2 ⁺)	Q	DCO ₁ =1.07 20.
1279.5 5	11	8161.0	41/2 ⁻	6882.5	37/2 ⁻	Q	DCO ₁ =0.96 14.
1293.4 5	9	8287.6	41/2 ⁻	6994.2	37/2 ⁻	Q	DCO ₁ =1.18 18 for 1293.4+1294.0.
1294.0 5	6	10219.9	47/2 ⁻	8926.0	43/2 ⁻	Q	DCO ₁ =1.18 18 for 1293.4+1294.0.
1303.4 5	14	9464.5	45/2 ⁻	8161.0	41/2 ⁻	Q	DCO ₁ =1.08 16.
1322.1 10	1	5196.7	(29/2 ⁺)	3874.9	25/2 ⁺		
1347.5 5	15	10414.1	(47/2 ⁺)	9066.9	(43/2 ⁺)		
1352.4 5	10	12382.1	(53/2 ⁺)	11029.7	(49/2 ⁺)		
1374.2 5	9	13756.3	(57/2 ⁺)	12382.1	(53/2 ⁺)		
1382.2 5	10	11029.7	(49/2 ⁺)	9647.6	(45/2 ⁺)		
1390.0 5	10	8926.0	43/2 ⁻	7536.0	39/2 ⁻	Q	DCO ₁ =1.10 18.
1437.7 5	6	12127.6	53/2 ⁻	10689.9	49/2 ⁻	Q	DCO ₁ =1.23 20. DCO ₂ =1.54 24.
1650.9 10	4	15407.2	(61/2 ⁺)	13756.3	(57/2 ⁺)		
1706.0 10	4	13833.6	57/2 ⁻	12127.6	53/2 ⁻	Q	DCO ₂ =1.74 30.
1827.1 10	4	17234.3	(65/2 ⁺)	15407.2	(61/2 ⁺)		

† Weak γ ray.‡ γ not seen by 2001Ti08.

Multiply placed with intensity suitably divided.

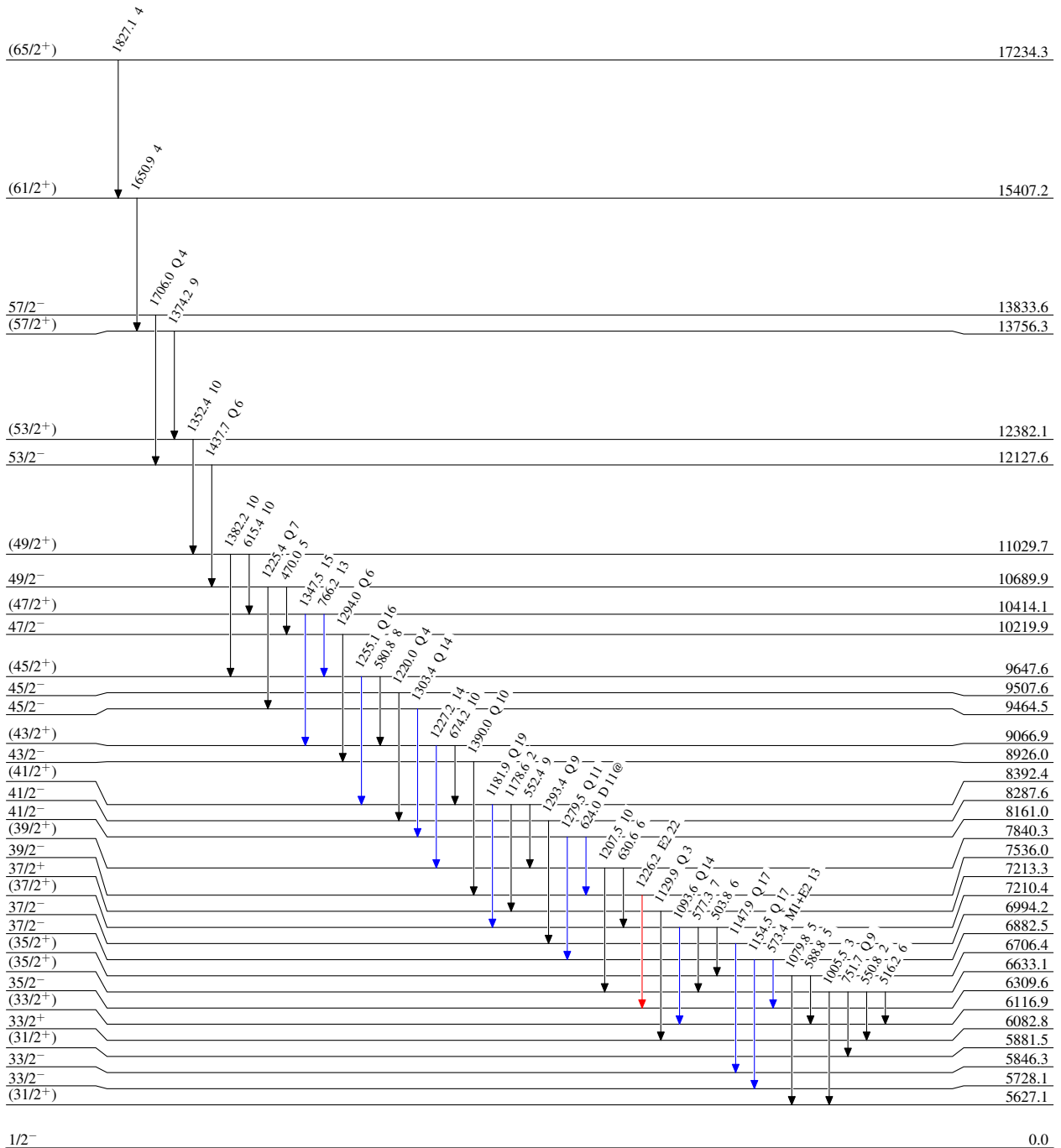
$^{70}\text{Zn}(^{36}\text{S,p}4n\gamma)$ 2001Ti08

Level Scheme

Intensities: Relative I_γ
@ Multiply placed: intensity suitably divided

Legend

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



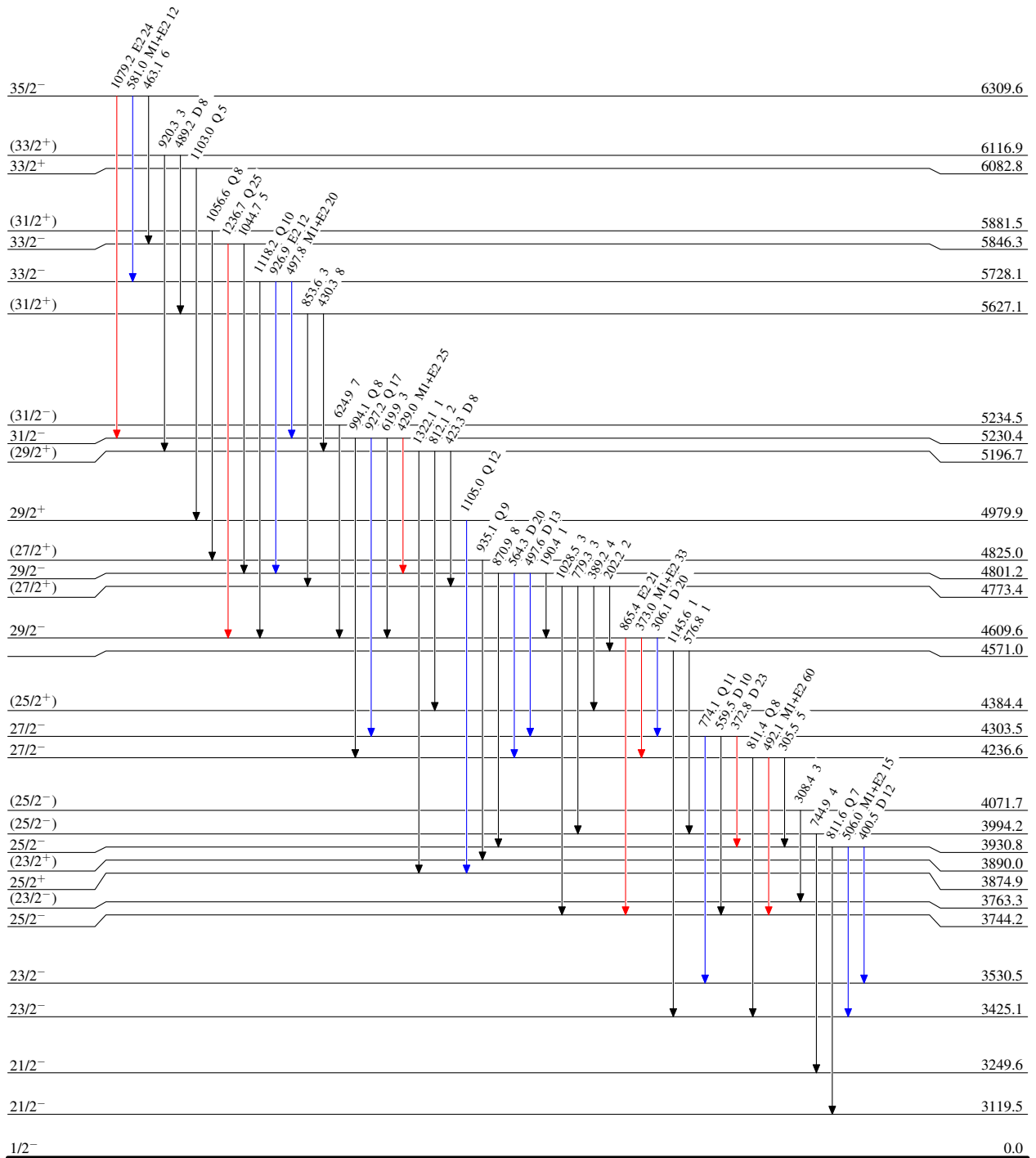
⁷⁰Zn(³⁶S,p4n γ) 2001Ti08

Level Scheme (continued)

Legend

Intensities: Relative I γ
@ Multiply placed: intensity suitably divided

- I γ < 2% \times I γ ^{max}
- I γ < 10% \times I γ ^{max}
- I γ > 10% \times I γ ^{max}



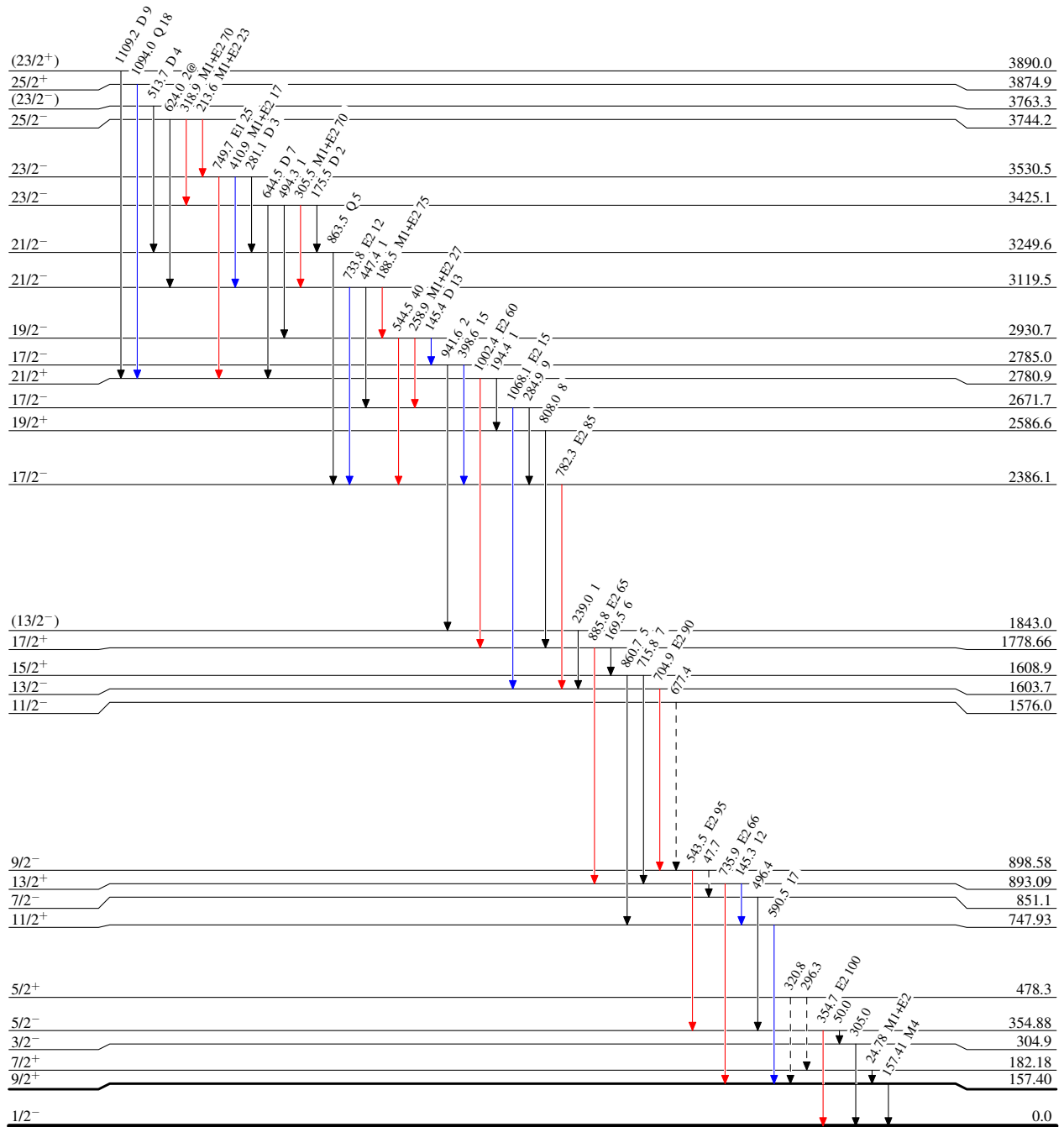
⁷⁰Zn(³⁶S,p4n γ) 2001Ti08

Level Scheme (continued)

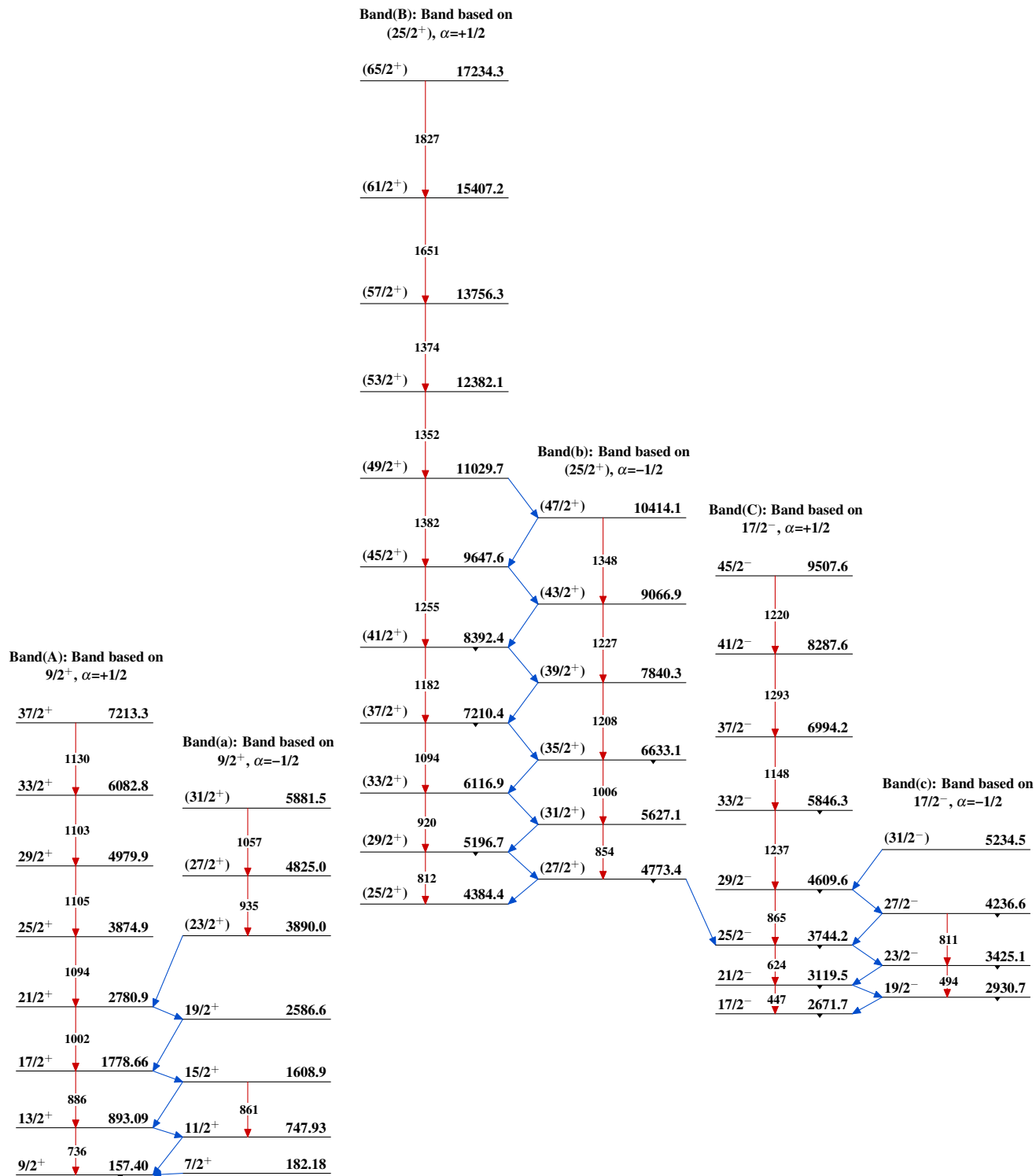
Intensities: Relative I γ
@ Multiply placed: intensity suitably divided

Legend

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



1.91 ns 6
4.34 d 1

$^{70}\text{Zn}(^{36}\text{S},\text{p}4\text{n}\gamma)$ 2001Ti08

$^{70}\text{Zn}(^{36}\text{S},\text{p}4\text{n}\gamma)$ 2001Ti08 (continued)Band(D): Band based on
 $23/2^-$, $\alpha=-1/2$ $57/2^-$ 13833.6

1706

 $53/2^-$ 12127.6

1438

 $49/2^-$ 10689.9

1225

 $45/2^-$ 9464.5

1303

 $41/2^-$ 8161.0

1280

 $37/2^-$ 6882.5

1154

 $33/2^-$ 5728.1

927

 $29/2^-$ 4801.2

871

 $25/2^-$ 3930.8Band(d): Band based on
 $23/2^-$, $\alpha=+1/2$ $47/2^-$ 10219.9

1294

 $43/2^-$ 8926.0

1390

 $39/2^-$ 7536.0

1226

 $35/2^-$ 6309.6

1079

 $31/2^-$ 5230.4

927

 $27/2^-$ 4303.5

774

 $23/2^-$ 3530.5Band(E): Gs band,
 $\alpha=+1/2$ $21/2^-$ 3249.6

864

 $17/2^-$ 2386.1

782

 $13/2^-$ 1603.7

705

 $9/2^-$ 898.58

544

 $5/2^-$ 354.88

355

 $1/2^-$ 0.0Band(e): Gs band,
 $\alpha=-1/2$ $11/2^-$ 1576.0 $7/2^-$ 851.1 $3/2^-$ 304.9