^{122}Te(n,γ) E=th 2000Bo24

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	Jun Chen	NDS 174, 1 (2021)	15-Apr-2021

2000Bo24,1999Bo31,1996Bo10: thermal neutrons were produced from the light-water reactor LWR-15 at Rez. Target was 88.4% enriched ^{122}Te. γ rays were detected with HPGe detectors. Measured Eγ, Iγ, γγ-coin. Deduced levels, absolute intensity.
1991Ho08: thermal neutrons were produced from the VVR-S reactor at Rez. Target was enriched $^{122}TeO_2$. γ rays were detected with a Ge(Li) detector. Measured Eγ, Iγ. Deduced levels, absolute intensity.

^{123}Te Levels

E(level)[†]	Jπ[&]	E(level)[†]	Jπ[&]	E(level)[†]	Jπ[&]
0.0	1/2+	1253.9 4	(3/2− to 9/2−)	1864.4 10	(3/2+,5/2+)
159.014 22	3/2+	1318.18 12	(1/2+,3/2+)	1887.54 14	(3/2)−
247.39 6	11/2−	1327.67 11		1903.41 16	(+)
384.27 6	(7/2−,9/2+)	1344.71 5	(3/2)−	1958.4 3	(3/2+,5/2+)
440.04 3	3/2+	1353.76 8	(5/2)+	1978.05 9	(3/2)−
489.81 5	7/2+	1414.17 9	(5/2+)	2020.63 12	1/2−,3/2−
505.40 4	5/2+	1422.87 11	(3/2+,5/2+)	2092.46 9	(1/2,3/2)
532.63 5	(7/2−)	1446.37 20	(3/2)+	2129.81 12	(3/2)−
599.10 5	1/2+	1484.0 5	(5/2−)	2158.15 5	1/2−,3/2−
688.00 4	3/2+	1557.18 16	(3/2)+	2197.32 17	(1/2+,3/2)
697.44 6	(7/2)+	1584.8 4	(3/2−,5/2,7/2+)	2621.73 17	(1/2+,3/2)
783.64 3	3/2+	1621.6?[@] 6		2644.2 4	(1/2,3/2)
862.06 5	(5/2)	1672.0 3		2686.7 5	1/2−,3/2−
870.97 22	(3/2+,5/2,7/2+)	1683.7 4	5/2−,7/2−	2726.24 17	(1/2,3/2)
879.63 8	(7/2−)	1693.59 20		2811.8 3	1/2−,3/2−
894.85 7	3/2+,5/2+	1732.5 3	(5/2+)	2937.5 3	1/2−,3/2−
996.13 11	(5/2)−	1759.57 5	(3/2)−	2946.7 3	(1/2,3/2)
1036.66 5	3/2+	1796.5 10	3/2−,5/2+	2957.3 8	(1/2,3/2)
1068.28 6	3/2+,5/2+	1807.66 5	(3/2−)	(6929.21[‡#] 5)	1/2+[#]
1097.71 8	(3/2−,5/2,7/2+)	1839.48 21	(1/2,3/2)		
1212.55 9	(3/2−,5/2+)	1854.1 3	(5/2+)		

† From a least-squares fit to γ-ray energies, assuming ΔEγ=1 keV where not given, unless otherwise noted.
‡ Neutron-separation energy from author′s value without a systematic error of about 80 eV.
\# s-wave capture.
@ Tentative level listed in Table 3 of 2000Bo24, without any additional information.
& From Adopted Levels, unless otherwise noted.

γ(^{123}Te)

Iγ normalization: From 2000Bo24; absolute intensities normalized with 1759.6 keV γ from 1991Ho08.

Eγ[†]	Iγ[†c]	Ei(level)	J^π_i	E_f	J^π_f
136.76 7	2.50 10	384.27	(7/2−,9/2+)	247.39	11/2−
148.35 5	0.53 3	532.63	(7/2−)	384.27	(7/2−,9/2+)
158.99 3	19.5 6	159.014	3/2+	0.0	1/2+
235.72 11	0.16 1	1097.71	(3/2−,5/2,7/2+)	862.06	(5/2)
247.80 9	0.14 1	688.00	3/2+	440.04	3/2+
259.1[&]	≈0.05[&]	1253.9	(3/2− to 9/2−)	996.13	(5/2)−
278.6[&]		783.64	3/2+	505.40	5/2+

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^{122}Te(n,γ) E=th 2000Bo24 (continued)

γ(^{123}Te) (continued)

E_γ[†]	I_γ[†c]	E_i(level)	J_i^π	E_f	J_f^π
281.01 3	1.49 6	440.04	3/2+	159.014	3/2+
285.28 4	8.26 25	532.63	(7/2−)	247.39	11/2−
329.37 4	5.30 16	862.06	(5/2)	532.63	(7/2−)
330.78 6	1.36 5	489.81	7/2+	159.014	3/2+
333[&]	≈0.14[&]	2092.46	(1/2,3/2)	1759.57	(3/2)−
343.2[&]		783.64	3/2+	440.04	3/2+
346.37 4	1.35 4	505.40	5/2+	159.014	3/2+
350.2[&]	≈0.08[&]	2158.15	1/2−,3/2−	1807.66	(3/2−)
351.4[&]		1212.55	(3/2−,5/2+)	862.06	(5/2)
372.21 15	≈0.03	862.06	(5/2)	489.81	7/2+
374.4[@] 5	≈0.08[@]	1253.9	(3/2− to 9/2−)	879.63	(7/2−)
380.8[@] 3	0.08[@] 2	870.97	(3/2+,5/2,7/2+)	489.81	7/2+
391.8[&]	≈0.03[&]	1253.9	(3/2− to 9/2−)	862.06	(5/2)
397.6[&]	≈0.06[&]	2158.15	1/2−,3/2−	1759.57	(3/2)−
404.8[@] 4	≈0.04[@]	894.85	3/2+,5/2+	489.81	7/2+
405.4[&]		1759.57	(3/2)−	1353.76	(5/2)+
409.6[&]	≈0.06[&]	1097.71	(3/2−,5/2,7/2+)	688.00	3/2+
415.9[&]	≈0.03[&]	1759.57	(3/2)−	1344.71	(3/2)−
421.9 2	0.22 6	862.06	(5/2)	440.04	3/2+
427.0[&]	≈0.05[&]	1422.87	(3/2+,5/2+)	996.13	(5/2)−
437.5[&] 3	≈0.14[&]	2197.32	(1/2+,3/2)	1759.57	(3/2)−
437.6[@] 1	0.29[@] 4	1036.66	3/2+	599.10	1/2+
440.01 6	8.04 24	440.04	3/2+	0.0	1/2+
454.2[&]	≈0.07[&]	1807.66	(3/2−)	1353.76	(5/2)+
454.4[@] 3	0.07[@] 2	894.85	3/2+,5/2+	440.04	3/2+
464.7[@] 2	0.12[@] 3	1344.71	(3/2)−	879.63	(7/2−)
474.12 10	0.24 2	1353.76	(5/2)+	879.63	(7/2−)
477.80 3	1.64 5	862.06	(5/2)	384.27	(7/2−,9/2+)
482.55 5	0.68 3	1344.71	(3/2)−	862.06	(5/2)
495.32 8	0.48 7	879.63	(7/2−)	384.27	(7/2−,9/2+)
505.38 10	3.26 13	505.40	5/2+	0.0	1/2+
525.0[@] 3	≈0.08[@]	1212.55	(3/2−,5/2+)	688.00	3/2+
529.01 3	2.31 5	688.00	3/2+	159.014	3/2+
534.7[@] 3	0.10[@] 3	1318.18	(1/2+,3/2+)	783.64	3/2+
538.42 5	0.62 5	697.44	(7/2)+	159.014	3/2+
546.79 10	0.14 4	1036.66	3/2+	489.81	7/2+
556.1[@] 1	0.26[@] 4	996.13	(5/2)−	440.04	3/2+
561[&]	≈0.09[&]	1344.71	(3/2)−	783.64	3/2+
562.71 18	0.12 2	1068.28	3/2+,5/2+	505.40	5/2+
565.15 15	0.19 1	1097.71	(3/2−,5/2,7/2+)	532.63	(7/2−)
578.42 15	0.14 1	1068.28	3/2+,5/2+	489.81	7/2+
596.43[@] 18	0.28[@] 6	1036.66	3/2+	440.04	3/2+
599.18 6	4.4 4	599.10	1/2+	0.0	1/2+
613.0[&]	≈0.07[&]	1212.55	(3/2−,5/2+)	599.10	1/2+
614.51[f] 10	0.34 7	2811.8	1/2−,3/2−	2197.32	(1/2+,3/2)
624.65 4	1.54 5	783.64	3/2+	159.014	3/2+
625.5[@]	[@]	1693.59		1068.28	3/2+,5/2+
628.16 14	0.23 3	1068.28	3/2+,5/2+	440.04	3/2+
632.27 15	0.16 4	879.63	(7/2−)	247.39	11/2−

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^{122}Te(n,γ) E=th 2000Bo24 (continued)

γ(^{123}Te) (continued)

E_γ [†]	I_γ [†c]	E_i(level)	J^π_i	E_f	J^π_f	Comments
666.6[&]	≈0.39[&]	2644.2	(1/2,3/2)	1978.05	(3/2)⁻	
687.91 *12*	0.23 *8*	688.00	3/2⁺	0.0	1/2⁺	
703.0[f]	0.02	862.06	(5/2)	159.014	3/2⁺	
706.0[&]	≈0.04[&]	1584.8	(3/2⁻,5/2,7/2⁺)	879.63	(7/2⁻)	
707.0[@] *2*	≈0.17[@]	1212.55	(3/2⁻,5/2⁺)	505.40	5/2⁺	
712.3[@] *3*	0.06[@] *2*	870.97	(3/2⁺,5/2,7/2⁺)	159.014	3/2⁺	
713.38[@] *9*	0.28[@] *4*	1097.71	(3/2⁻,5/2,7/2⁺)	384.27	(7/2⁻,9/2⁺)	
721.5[&]	≈0.06[&]	1584.8	(3/2⁻,5/2,7/2⁺)	862.06	(5/2)	
721.6[&]	≈0.06[&]	1253.9	(3/2⁻ to 9/2⁻)	532.63	(7/2⁻)	
735.86 *7*	0.98 *5*	894.85	3/2⁺,5/2⁺	159.014	3/2⁺	
736[&]		1732.5	(5/2⁺)	996.13	(5/2)⁻	
[x]741.2 *3*	0.06 *2*					
745.80 *12*	≈0.4	1344.71	(3/2)⁻	599.10	1/2⁺	
772.49 *9*	0.49 *5*	1212.55	(3/2⁻,5/2⁺)	440.04	3/2⁺	
[x]775.27[f] *11*	0.32 *4*					I_γ: partly may due to ^{124}Te (2000Bo24).
783.62 *4*	1.14 *5*	783.64	3/2⁺	0.0	1/2⁺	
812.12 *3*	0.97 *4*	1344.71	(3/2)⁻	532.63	(7/2⁻)	
812.8[@] *3*	0.13[@] *4*	1318.18	(1/2⁺,3/2⁺)	505.40	5/2⁺	
821.22[@] *8*	0.33[@] *3*	1353.76	(5/2)⁺	532.63	(7/2⁻)	
822.28[@] *11*	0.36[@] *5*	1327.67		505.40	5/2⁺	
[x]823.28 *12*	0.14 *4*					
828.4[&]	≈0.09[&]	1212.55	(3/2⁻,5/2⁺)	384.27	(7/2⁻,9/2⁺)	
832.2[&]	≈0.11[&]	1693.59		862.06	(5/2)	
839.16[@] *20*	0.15[@] *3*	1344.71	(3/2)⁻	505.40	5/2⁺	
842.8[&]	≈0.06[&]	2197.32	(1/2⁺,3/2)	1353.76	(5/2)⁺	
867.8[&]	≈0.07[&]	1253.9	(3/2⁻ to 9/2⁻)	384.27	(7/2⁻,9/2⁺)	
870.1[&]	≈0.11[&]	1557.18	(3/2)⁺	688.00	3/2⁺	
877.67 *7*	0.43 *4*	1036.66	3/2⁺	159.014	3/2⁺	
878.5[&]	≈0.04[&]	1318.18	(1/2⁺,3/2⁺)	440.04	3/2⁺	
880.7[&]	≈0.04[&]	1414.17	(5/2⁺)	532.63	(7/2⁻)	
881.7[&]	≈0.07[&]	1759.57	(3/2)⁻	879.63	(7/2⁻)	
888.29[@a] *17*	0.20[@] *4*	1327.67		440.04	3/2⁺	
[x]889.01 *11*	0.30 *3*					
897.49 *4*	1.39 *13*	1759.57	(3/2)⁻	862.06	(5/2)	
905.1 *3*	0.13 *2*	1344.71	(3/2)⁻	440.04	3/2⁺	
909.29 *6*	0.18 *3*	1068.28	3/2⁺,5/2⁺	159.014	3/2⁺	
917.6[@] *5*	≈0.06[@]	1422.87	(3/2⁺,5/2⁺)	505.40	5/2⁺	
919.6[&]	≈0.08[&]	2726.24	(1/2,3/2)	1807.66	(3/2⁻)	
925.4[&]	≈0.05[&]	1414.17	(5/2⁺)	489.81	7/2⁺	
927.3[&]	≈0.12[&]	1807.66	(3/2⁻)	879.63	(7/2⁻)	
933.1[f]		1796.5	3/2⁻,5/2⁺	862.06	(5/2)	E_γ: multiplet peak.
933.26 *20*	0.14 *2*	1422.87	(3/2⁺,5/2⁺)	489.81	7/2⁺	
945.61 *3*	1.39 *13*	1807.66	(3/2⁻)	862.06	(5/2)	
958.7[&]		1557.18	(3/2)⁺	599.10	1/2⁺	
968.91[a] *10*	0.18 *3*	1353.76	(5/2)⁺	384.27	(7/2⁻,9/2⁺)	
976.3[&]	≈0.18[&]	1854.1	(5/2⁺)	879.63	(7/2⁻)	
982.75 *12*	0.30 *5*	1422.87	(3/2⁺,5/2⁺)	440.04	3/2⁺	
992[&]	≈0.07[&]	1854.1	(5/2⁺)	862.06	(5/2)	

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^{122}Te(n,γ) E=th 2000Bo24 (continued)

γ(^{123}Te) (continued)

Eγ[†]	Iγ[†c]	Ei(level)	J^π_i	Ef	J^π_f
994.4[@] 5	≈0.11[@]	1484.0	(5/2−)	489.81	7/2+
1002.3[&]		1864.4	(3/2+,5/2+)	862.06	(5/2)
1005.0[&]	≈0.11[&]	1446.37	(3/2)+	440.04	3/2+
1026[&]	≈0.02[&]	1887.54	(3/2)−	862.06	(5/2)
1034.3[&]	≈0.04[&]	1732.5	(5/2+)	697.44	(7/2)+
1036.69 8	0.60 3	1036.66	3/2+	0.0	1/2+
1044.8[&]	≈0.09[&]	1732.5	(5/2+)	688.00	3/2+
1053.8[&]		1212.55	(3/2−,5/2+)	159.014	3/2+
1068.58 23	≈0.15	1068.28	3/2+,5/2+	0.0	1/2+
1070.8[@]	≈0.09[@]	1759.57	(3/2)−	688.00	3/2+
1079.5[@] 4	≈0.1[@]	1584.8	(3/2−,5/2,7/2+)	505.40	5/2+
1085.86[&f] 15	0.23[&] 4	2644.2	(1/2,3/2)	1557.18	(3/2)+
[x]1087.07 15	0.27 4				
1116.04[@] 12	0.32[@] 4	1978.05	(3/2)−	862.06	(5/2)
1118.7[&a] 3	≈0.14[&]	1557.18	(3/2)+	440.04	3/2+
1119.8[&] 3	≈0.16[&]	1903.41	(+)	783.64	3/2+
1129.5[@] 5	≈0.07[@]	2937.5	1/2−,3/2−	1807.66	(3/2−)
1133.2[&]	≈0.11[&]	1732.5	(5/2+)	599.10	1/2+
1144.9[&]	≈0.1[&]	1584.8	(3/2−,5/2,7/2+)	440.04	3/2+
1149.2[&]	≈0.07[&]	1683.7	5/2−,7/2−	532.63	(7/2−)
1158.4[@] 2	0.40[@] 4	2020.63	1/2−,3/2−	862.06	(5/2)
1158.93[@] 18	0.40[@] 6	1318.18	(1/2+,3/2+)	159.014	3/2+
1160.7[@] 2	≈0.06[@]	1759.57	(3/2)−	599.10	1/2+
1160.9[@] 2	0.13[@] 4	1693.59		532.63	(7/2−)
1166.6[@] 3	0.23[@] 4	1672.0		505.40	5/2+
1167.79[da] 18	0.23 4	1327.67		159.014	3/2+
1167.79[df] 18		2726.24	(1/2,3/2)	1557.18	(3/2)+
1178.8[&]	≈0.03[&]	1683.7	5/2−,7/2−	505.40	5/2+
1193.9[&]	≈0.08[&]	1353.76	(5/2)+	159.014	3/2+
1194.1[@] 4	≈0.07[@]	1683.7	5/2−,7/2−	489.81	7/2+
1197.4[&]		1796.5	3/2−,5/2+	599.10	1/2+
1200.7[&]	≈0.06[&]	1732.5	(5/2+)	532.63	(7/2−)
1204.4[&]	≈0.1[&]	1693.59		489.81	7/2+
1207.5[&]	≈0.10[&]	1807.66	(3/2−)	599.10	1/2+
1225.6[&]	≈0.05[&]	1759.57	(3/2)−	532.63	(7/2−)
1254.8[&]	≈0.13[&]	1759.57	(3/2)−	505.40	5/2+
1255.15 8	0.42 3	1414.17	(5/2+)	159.014	3/2+
1262.6[&]	≈0.02[&]	1422.87	(3/2+,5/2+)	159.014	3/2+
1267.72[‡] 15	0.27[‡] 3	2129.81	(3/2)−	862.06	(5/2)
1270.5[&]	≈0.09[&]	1958.4	(3/2+,5/2+)	688.00	3/2+
1274.9[&]	≈0.18[&]	1807.66	(3/2−)	532.63	(7/2−)
1287.4[@] 2	0.23[@] 4	1446.37	(3/2)+	159.014	3/2+
1288.9[&]	≈0.32[&]	1887.54	(3/2)−	599.10	1/2+
1290.2[&]	≈0.07[&]	1978.05	(3/2)−	688.00	3/2+
1292.5[@] 4	≈0.11[@]	1732.5	(5/2+)	440.04	3/2+
1318.3 3	0.43 6	1318.18	(1/2+,3/2+)	0.0	1/2+

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^{122}Te(n,γ) E=th 2000Bo24 (continued)

γ(^{123}Te) (continued)

E_γ[†]	I_γ[†c]	E_i(level)	J^π_i	E_f	J^π_f	Comments
1321.4[@] 3	0.19[@] 2	1854.1	(5/2$^+$)	532.63	(7/2$^-$)	
1323.9[&]	≈0.08[&]	1484.0	(5/2$^-$)	159.014	3/2$^+$	
[x]1329.6 5	0.11 2					
1335.9[&]	≈0.20[&]	2197.32	(1/2$^+$,3/2)	862.06	(5/2)	
1345[&]	<0.07[&]	1344.71	(3/2)$^-$	0.0	1/2$^+$	
1349.3[&]	≈0.04[&]	1854.1	(5/2$^+$)	505.40	5/2$^+$	
1354.5[&]	≈0.07[&]	1887.54	(3/2)$^-$	532.63	(7/2$^-$)	
1359.6[@] 3	≈0.2[@]	1958.4	(3/2$^+$,5/2$^+$)	599.10	1/2$^+$	
1373.6[&]	≈0.14[&]	2158.15	1/2$^-$,3/2$^-$	783.64	3/2$^+$	
1378.2[&]	≈0.08[&]	1978.05	(3/2)$^-$	599.10	1/2$^+$	
1384.6[&]	≈0.08[&]	1887.54	(3/2)$^-$	505.40	5/2$^+$	
1397.99[e@] 17	0.25[e@] 6	1557.18	(3/2)$^+$	159.014	3/2$^+$	
1397.99[e@] 17	0.25[e@] 6	1903.41	($^+$)	505.40	5/2$^+$	
1399.33[@] 24	0.21[@] 6	1839.48	(1/2,3/2)	440.04	3/2$^+$	
1412.6[&]	≈0.05[&]	1854.1	(5/2$^+$)	440.04	3/2$^+$	
1425[&]		1584.8	(3/2$^-$,5/2,7/2$^+$)	159.014	3/2$^+$	
1447.14 17	0.42 3	1887.54	(3/2)$^-$	440.04	3/2$^+$	
1468.5[&]	≈0.07[&]	1958.4	(3/2$^+$,5/2$^+$)	489.81	7/2$^+$	
1472[&]	≈0.10[&]	1978.05	(3/2)$^-$	505.40	5/2$^+$	
1538.6[&]	≈0.18[&]	1978.05	(3/2)$^-$	440.04	3/2$^+$	
[x]1549.76 14	0.35 3					
1597.3 4	≈0.1	2129.81	(3/2)$^-$	532.63	(7/2$^-$)	
1624.24 20	0.37 4	2129.81	(3/2)$^-$	505.40	5/2$^+$	
1651.9[&]	≈0.07[&]	2092.46	(1/2,3/2)	440.04	3/2$^+$	
1690.8[&]	≈0.07[&]	2197.32	(1/2$^+$,3/2)	505.40	5/2$^+$	
[x]1694.7[&#]	≈0.16[&#]					
1694.9[&]	≈0.12[&]	1854.1	(5/2$^+$)	159.014	3/2$^+$	
1718.73[a] 10	0.66 5	2158.15	1/2$^-$,3/2$^-$	440.04	3/2$^+$	
1730.4[&]	≈0.07[&]	1887.54	(3/2)$^-$	159.014	3/2$^+$	
1759.58 14	1.41 7	1759.57	(3/2)$^-$	0.0	1/2$^+$	
1759.8[@] 2	0.33[@] 8	2621.73	(1/2$^+$,3/2)	862.06	(5/2)	
1782.6[&]		2644.2	(1/2,3/2)	862.06	(5/2)	
1796.5[&]	≈0.05[&]	1958.4	(3/2$^+$,5/2$^+$)	159.014	3/2$^+$	
1807.77 10	0.46 4	1807.66	(3/2$^-$)	0.0	1/2$^+$	
1818.99 21	0.32 3	1978.05	(3/2)$^-$	159.014	3/2$^+$	
1838.8[@] 6	0.27[@] 5	1839.48	(1/2,3/2)	0.0	1/2$^+$	
1861.1 5	0.18 4	2020.63	1/2$^-$,3/2$^-$	159.014	3/2$^+$	
1864.19 18	0.56 5	2726.24	(1/2,3/2)	862.06	(5/2)	
1888.2[@] 6	0.30[@] 8	1887.54	(3/2)$^-$	0.0	1/2$^+$	
1933.57 11	0.69 5	2092.46	(1/2,3/2)	159.014	3/2$^+$	
1973.6[&]	≈0.08[&]	2129.81	(3/2)$^-$	159.014	3/2$^+$	E_γ: poor-fit, level-energy difference=1970.78.
1977.92 14	0.41 3	1978.05	(3/2)$^-$	0.0	1/2$^+$	
1999.04 4	1.95 6	2158.15	1/2$^-$,3/2$^-$	159.014	3/2$^+$	
2021.06 20	0.81 5	2020.63	1/2$^-$,3/2$^-$	0.0	1/2$^+$	
2023.2[&]	≈0.61[&]	2621.73	(1/2$^+$,3/2)	599.10	1/2$^+$	
2038[&]	≈0.04[&]	2197.32	(1/2$^+$,3/2)	159.014	3/2$^+$	
2115.2[&]	≈0.42[&]	2621.73	(1/2$^+$,3/2)	505.40	5/2$^+$	
2129.7[&]	≈0.29[&]	2129.81	(3/2)$^-$	0.0	1/2$^+$	

Continued on next page (footnotes at end of table)

^{122}Te(n,γ) E=th 2000Bo24 (continued)

$\gamma(^{123}Te)$ (continued)

E_γ[†]	I_γ[†c]	E_i(level)	J^π_i	E_f	J^π_f
2158.5[&]	≈0.23[&]	2158.15	1/2⁻,3/2⁻	0.0	1/2⁺
2197.6 *3*	0.34 *7*	2197.32	(1/2⁺,3/2)	0.0	1/2⁺
2567.1[&]	≈0.17[&]	2726.24	(1/2,3/2)	159.014	3/2⁺
2622[&]	≈0.46[&]	2621.73	(1/2⁺,3/2)	0.0	1/2⁺
2725[&]	≈0.33[&]	2726.24	(1/2,3/2)	0.0	1/2⁺
[x]3427.70[‡] *15*	0.38[‡] *5*				
[x]3572.3[‡] *4*	0.29[‡] *4*				
[x]3709.02[‡] *18*	0.37[‡] *4*				
3972[b]		(6929.21)	1/2⁺	2957.3	(1/2,3/2)
3982.4 *3*	0.19 *3*	(6929.21)	1/2⁺	2946.7	(1/2,3/2)
3991.5 *3*	0.38 *3*	(6929.21)	1/2⁺	2937.5	1/2⁻,3/2⁻
4117.3 *3*	0.30 *8*	(6929.21)	1/2⁺	2811.8	1/2⁻,3/2⁻
4203.0 *4*	0.92 *4*	(6929.21)	1/2⁺	2726.24	(1/2,3/2)
4242.4 *5*	0.58 *5*	(6929.21)	1/2⁺	2686.7	1/2⁻,3/2⁻
4285.1 *4*	0.18 *2*	(6929.21)	1/2⁺	2644.2	(1/2,3/2)
4307.7 *3*	0.58 *2*	(6929.21)	1/2⁺	2621.73	(1/2⁺,3/2)
4731.7 *3*	0.96 *3*	(6929.21)	1/2⁺	2197.32	(1/2⁺,3/2)
4770.70 *9*	2.60 *5*	(6929.21)	1/2⁺	2158.15	1/2⁻,3/2⁻
4797.3[a] *6*	0.43 *3*	(6929.21)	1/2⁺	2129.81	(3/2)⁻
4836.79 *11*	0.52 *3*	(6929.21)	1/2⁺	2092.46	(1/2,3/2)
4908.76 *23*	0.92 *2*	(6929.21)	1/2⁺	2020.63	1/2⁻,3/2⁻
4950.88 *23*	0.77 *3*	(6929.21)	1/2⁺	1978.05	(3/2)⁻
5041.1 *3*	0.45 *3*	(6929.21)	1/2⁺	1887.54	(3/2)⁻
5088.7 *5*	≈0.05	(6929.21)	1/2⁺	1839.48	(1/2,3/2)
5121.63 *10*	1.33 *3*	(6929.21)	1/2⁺	1807.66	(3/2⁻)
5169.55 *7*	2.26 *5*	(6929.21)	1/2⁺	1759.57	(3/2)⁻
5371[b]		(6929.21)	1/2⁺	1557.18	(3/2)⁺
5482.6 *8*	≈0.05	(6929.21)	1/2⁺	1446.37	(3/2)⁺
5584.45 *11*	1.27 *3*	(6929.21)	1/2⁺	1344.71	(3/2)⁻
5610.6 *3*	0.13 *4*	(6929.21)	1/2⁺	1318.18	(1/2⁺,3/2⁺)
5892.7 *3*	0.13 *4*	(6929.21)	1/2⁺	1036.66	3/2⁺
6329.6 *3*	0.18 *6*	(6929.21)	1/2⁺	599.10	1/2⁺
6424.6[f] *3*	≈0.01	(6929.21)	1/2⁺	505.40	5/2⁺
6489.0 *5*	0.06 *2*	(6929.21)	1/2⁺	440.04	3/2⁺
6770.17 *23*	0.16 *1*	(6929.21)	1/2⁺	159.014	3/2⁺
6928.9 *3*	0.08 *1*	(6929.21)	1/2⁺	0.0	1/2⁺

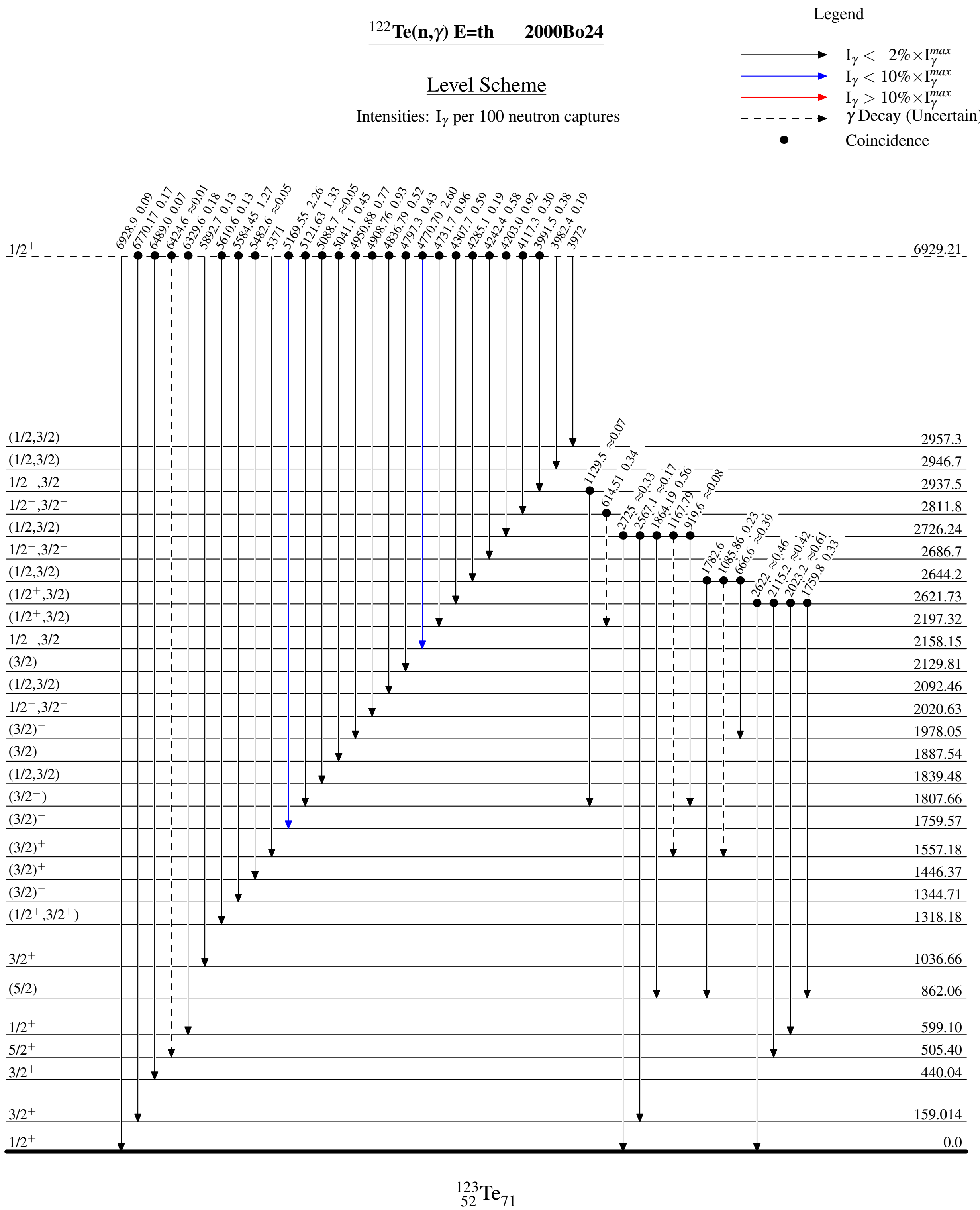
† From 2000Bo24, unless otherwise noted. Values in 2000Bo24 are taken by the authors from weighted average of their data and those of 1991Ho08, with their intensities normalized to I(1759.6γ)=1.41 *7* per 100 neutron captures in 1991Ho08.
‡ From 1991Ho08.
# 2000Bo24 proposed a 1694.7-keV γ-ray (from 2129.2 level to 440.01 level) from $\gamma\gamma$-coin. Evaluator unplaced this γ-ray because the energy difference is large (4.1 keV).
@ Energies and intensities determined from $\gamma\gamma$-coin (2000Bo24).
& Weak peaks observed in $\gamma\gamma$-coin only (2000Bo24).
a Poor fit. Uncertainty is doubled in the fitting.
b Not listed in Table 1 of 2000Bo24, but implied from levels which are noted from primary γ in Table 3.
c Intensity per 100 neutron captures.
d Multiply placed.

Continued on next page (footnotes at end of table)

^{122}Te(n,γ) E=th 2000Bo24 (continued)

γ(^{123}Te) (continued)

[e] Multiply placed with undivided intensity.
[f] Placement of transition in the level scheme is uncertain.
[x] γ ray not placed in level scheme.



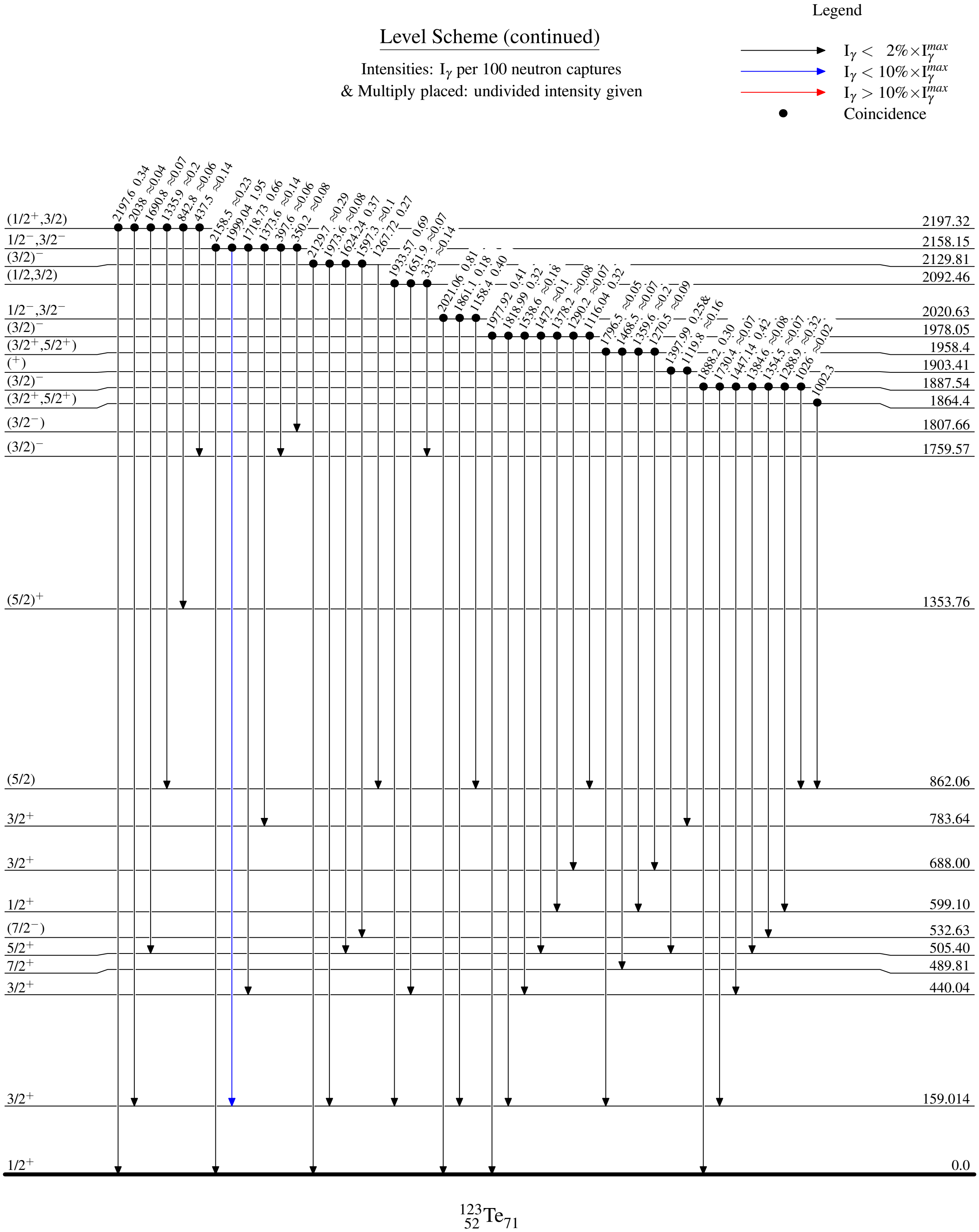
122Te(n,γ) E=th 2000Bo24
Level Scheme
Intensities: Iγ per 100 neutron captures
Legend
Iγ < 2%×Iγmax
Iγ < 10%×Iγmax
Iγ > 10%×Iγmax
γ Decay (Uncertain)
Coincidence
1/2+ 6929.21
(1/2,3/2) 2957.3
(1/2,3/2) 2946.7
1/2−,3/2− 2937.5
1/2−,3/2− 2811.8
(1/2,3/2) 2726.24
1/2−,3/2− 2686.7
(1/2,3/2) 2644.2
(1/2+,3/2) 2621.73
(1/2+,3/2) 2197.32
1/2−,3/2− 2158.15
(3/2)− 2129.81
(1/2,3/2) 2092.46
1/2−,3/2− 2020.63
(3/2)− 1978.05
(3/2)− 1887.54
(1/2,3/2) 1839.48
(3/2−) 1807.66
(3/2)− 1759.57
(3/2)+ 1557.18
(3/2)+ 1446.37
(3/2)− 1344.71
(1/2+,3/2+) 1318.18
3/2+ 1036.66
(5/2) 862.06
1/2+ 599.10
5/2+ 505.40
3/2+ 440.04
3/2+ 159.014
1/2+ 0.0
6928.9 0.09
6770.17 0.17
6489.0 0.07
6424.6 ≈0.01
6329.6 0.18
5892.7 0.13
5610.6 0.13
5584.45 1.27
5482.6 ≈0.05
5371
5169.55 2.26
5121.63 1.33
5088.7 ≈0.05
5041.1 0.45
4950.88 0.77
4908.76 0.93
4836.79 0.52
4797.3 0.43
4770.70 2.60
4731.7 0.96
4307.7 0.59
4285.1 0.19
4242.4 0.58
4203.0 0.92
4117.3 0.30
3991.5 0.38
3982.4 0.19
3972
1129.5 ≈0.07
614.51 0.34
2725 ≈0.33
2567.1 ≈0.17
1864.19 0.56
1167.79 ≈0.08
919.6
1782.6
1085.86 0.23
666.6 ≈0.39
2622 ≈0.46
2115.2 ≈0.42
2023.2 ≈0.61
1759.8 0.33
$^{123}_{52}Te_{71}$

^{122}Te(n,γ) E=th 2000Bo24

Level Scheme (continued)

Intensities: I_γ per 100 neutron captures

& Multiply placed: undivided intensity given



^{122}Te(n,γ) E=th 2000Bo24

Level Scheme (continued)

Intensities: I_γ per 100 neutron captures

& Multiply placed: undivided intensity given

Legend

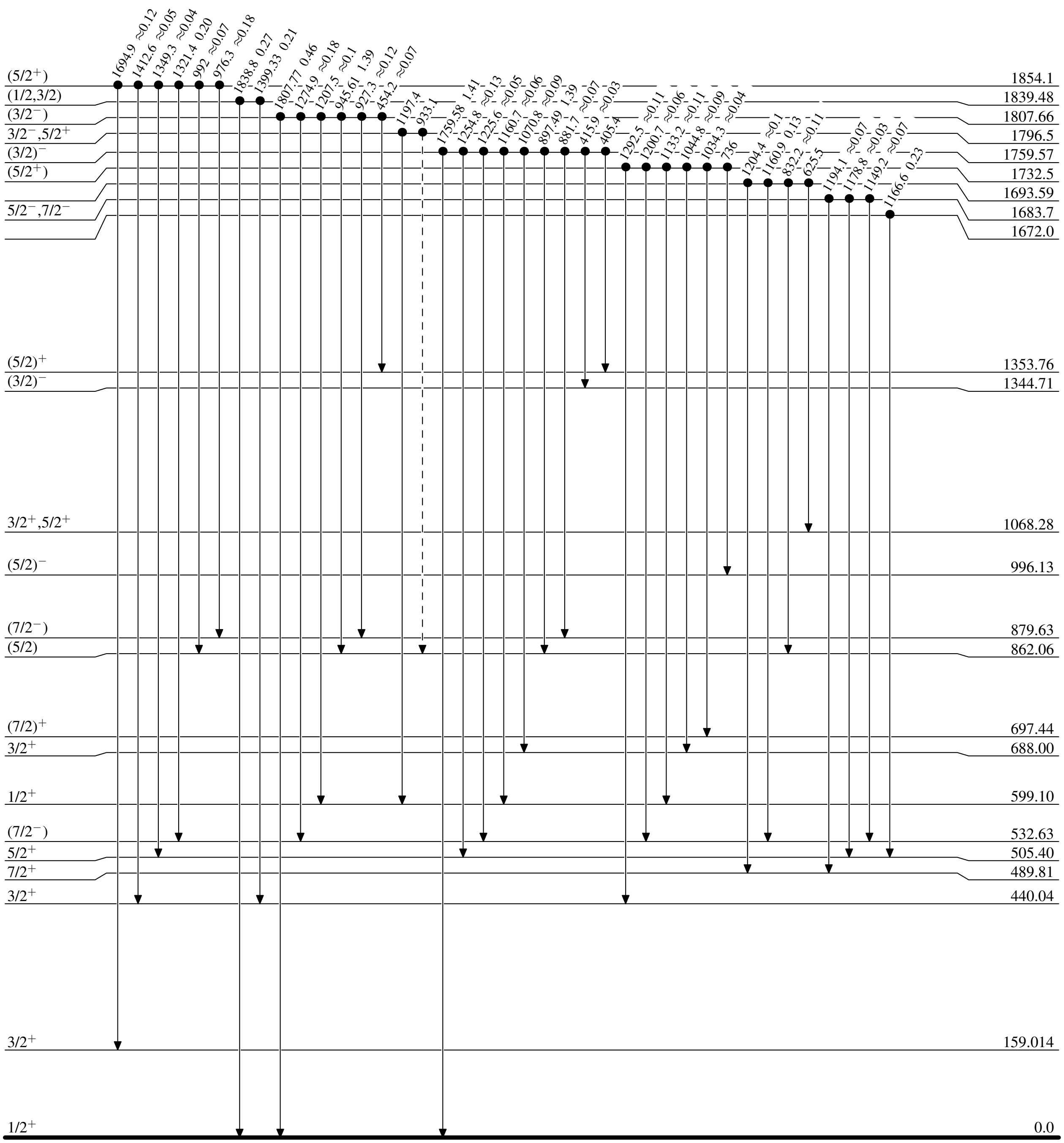
$I_\gamma < 2\% \times I_\gamma^{max}$

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

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

γ Decay (Uncertain)

Coincidence



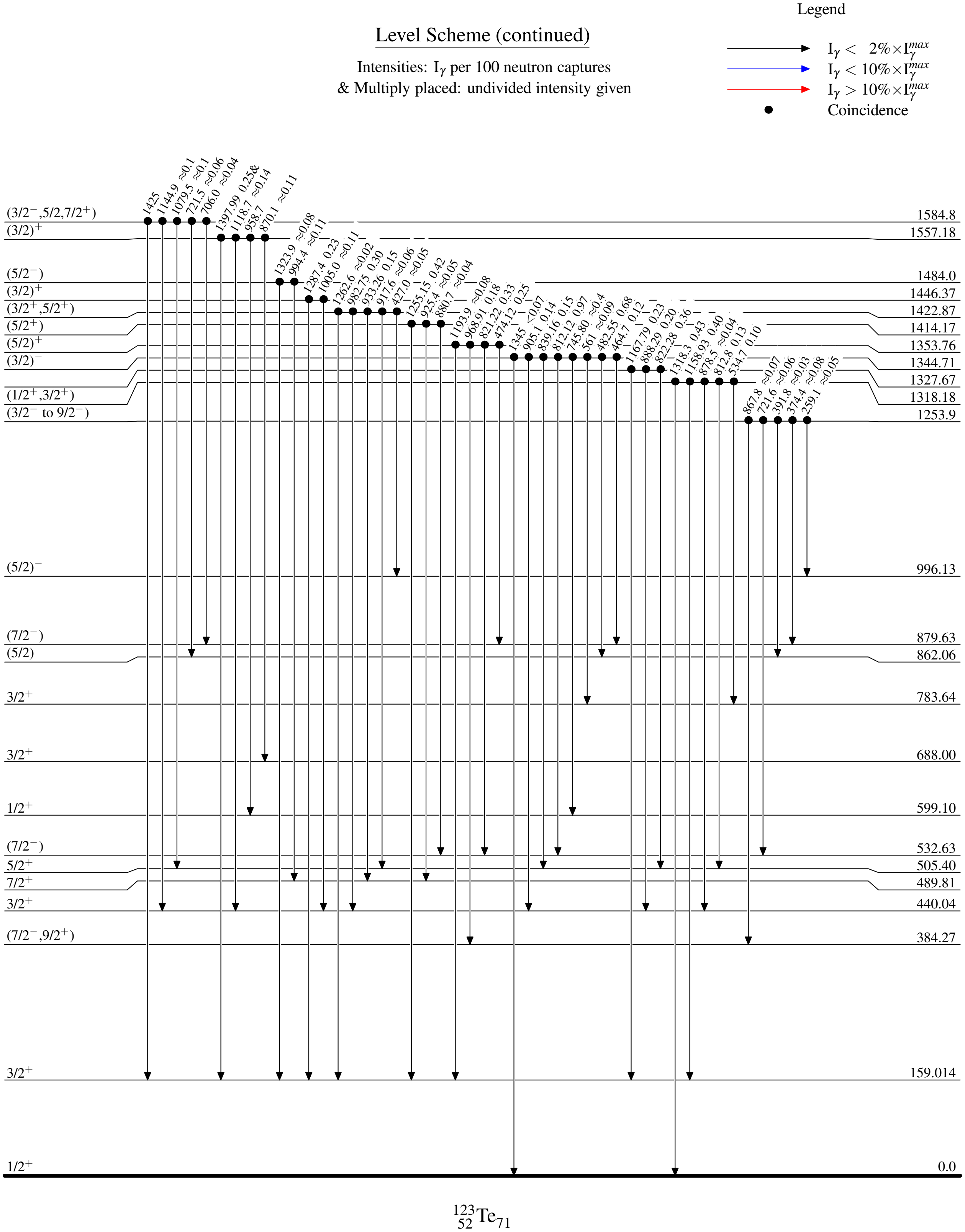
$^{123}_{52}Te_{71}$

^{122}Te(n,γ) E=th 2000Bo24

Level Scheme (continued)

Intensities: I_γ per 100 neutron captures

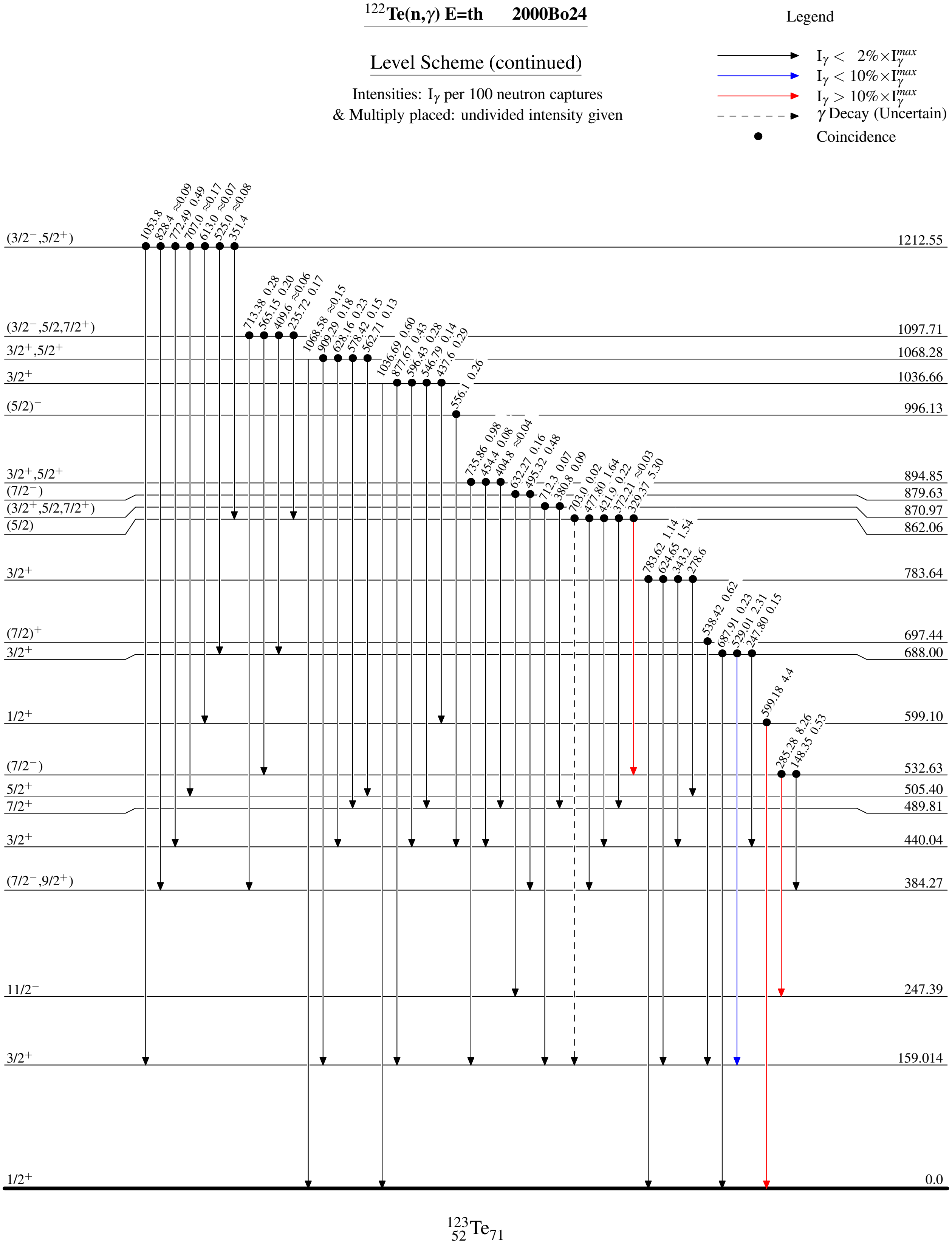
& Multiply placed: undivided intensity given



^{122}Te(n,γ) E=th 2000Bo24

Level Scheme (continued)

Intensities: I_γ per 100 neutron captures
& Multiply placed: undivided intensity given



$^{122}Te(n,\gamma)$ E=th 2000Bo24

Level Scheme (continued)

Intensities: I_γ per 100 neutron captures
& Multiply placed: undivided intensity given

Legend