^{121}Cs IT decay 1991Ge02

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	S. Ohya	NDS 111, 1619 (2010)	20-Jan-2009

Parent: ^{121}Cs: E=68.5 *3*; $J^{\pi}=9/2^{(+)}$; $T_{1/2}$=122 s *3*; %IT decay=17.0

Assignment for the 68.5, M3-isomeric transition was made by observation of Cs α(K)exp, K/L, and K x-rays.

^{121}Cs Levels

E(level)	J^{π}[†]	$T_{1/2}$	Comments
0.0	$3/2^{(+)}$	155 s *4*	$T_{1/2}$: from 1991Ge02. Others: 1969Ch18: 125.6 s *14* for a mixed source of (g.s.+isomer) of ^{121}Cs; 1981So06: 136 s *3* affected by admixture of isomeric state.
68.5 *3*	$9/2^{(+)}$	122 s *3*	$T_{1/2}$: from 1991Ge02. See comments on $T_{1/2}$ for g.s.

[†] From Adopted Levels.

$\gamma(^{121}Cs)$

E_γ	E_i(level)	J_i^{π}	E_f	J_f^{π}	Mult.	α[‡]	$I_{(\gamma+ce)}$[†]	Comments
68.5 *3*	68.5	$9/2^{(+)}$	0.0	$3/2^{(+)}$	M3	433 *11*	100	B(M3)(W.u.)=0.0504 *25* ce(K)/(γ+ce)=0.498 *13*; ce(L)/(γ+ce)=0.387 *11*; ce(M)/(γ+ce)=0.091 *4*; ce(N+)/(γ+ce)=0.0215 *8* ce(N)/(γ+ce)=0.0191 *8*; ce(O)/(γ+ce)=0.00237 *9*; ce(P)/(γ+ce)=6.34×10^{-5} *23* Additional information 1. Mult.: α(K)exp≥120. K/L=1.2 *3*.

[†] For absolute intensity per 100 decays, multiply by 0.17.

[‡] Total theoretical internal conversion coefficients, calculated using the BrIcc code (2008Ki07) with Frozen orbital approximation based on γ-ray energies, assigned multipolarities, and mixing ratios, unless otherwise specified.

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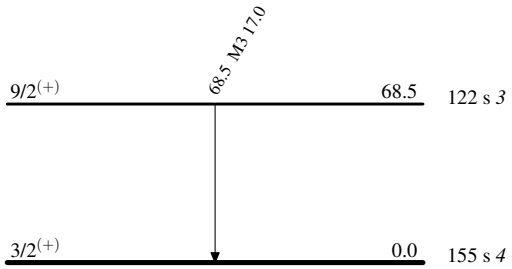
Decay Scheme

%IT=17.0



$^{121}_{55}Cs_{66}$