^{112}Cd(p,α) 1977SmZX,1978Ta06

History

Type	Author	Citation	Literature Cutoff Date
Full Evaluation	S. Kumar(a), J. Chen(b) and F. G. Kondev	NDS 137, 1 (2016)	31-May-2016

Target ^{112}Cd J^{π}(g.s.)=0^+.

1977SmZX: E=22 MeV polarized proton beam at KVI; semiconductor detectors, FWHM≤35 keV. Measured $\sigma(\theta)$. Deduced levels.

1978Ta06: E=22 MeV polarized proton beam was produced from a tandem accelerator at the University of Tsukuba. Target was 300 μg/cm^2 CdO (96% enriched). Reaction products were momentum analyzed by a magnetic spectrograph and detected by a solid-state detector in the focal plane. Measured $\sigma(\theta)$, analyzing powers. Deduced levels, J dependence from DWBA analysis.

Other measurements: 1966WeZZ, 1988Ku25.

^{109}Ag Levels

E(level)†	J^{π}#	L@	E(level)†	J^{π}#	L@	E(level)†	E(level)†
0	$1/2^-$	1	789 *11*			1515 *5*	2171‡ *14*
88 *3*			868 *6*	$5/2^-$	3	1570?	2228 *7*
133 *3*	$9/2^+$	4	929 *8*			1844 *7*	2350 *10*
312 *4*	$3/2^-$	1	1070?			1887 *6*	2471 *6*
415 *5*	$5/2^-$	3	1230?			1940‡ *10*	2522 *6*
704 *6*	$3/2^-$	1	1331 *6*			2043‡ *11*	

† From 1977SmZX.
‡ Possible multiplet.
# From analyzing powers with L+1/2 or L-1/2 transfers in 1978Ta06.
@ From DWBA analysis in 1978Ta06.