

Coulomb excitation 2002So03,2008Br18

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	E. A. Mccutchan	NDS 113, 1735 (2012)	1-Mar-2012

2008Br18: $^{108}\text{Pd}(^{68}\text{Ni}, ^{68}\text{Ni}'\gamma)$. ^{68}Ni beam produced by U(p,F) with $E(p) = 1.4$ GeV. Fission fragments laser ionized, mass separated and postaccelerated to 2.9 MeV/nucleon by REX-ISOLDE. Measured $E\gamma$, $I\gamma$, and particle- γ coincidences using eight Miniball detectors and a DSSD.

2002So03: $^{208}\text{Pb}(^{68}\text{Ni}, ^{68}\text{Ni}'\gamma)$. ^{68}Ni beam produced in the $^{58}\text{Ni}(^{70}\text{Zn}, X)$ reaction with $E(^{70}\text{Zn})=65.9$ MeV/nucleon. Fragments were separated with the LISE3 spectrometer and identified by ΔE and total E. Measured $E\gamma$, $I\gamma$ and particle- γ coincidences with four segmented HPGe detectors (FWHM=65 keV at 1 MeV) and two annular Si detectors. See also [2002Az01](#), [2000Az01](#), [2000Az03](#), [2000LeZZ](#), [2000LeZW](#), and [1999Le67](#).

 ^{68}Ni Levels

E(level)	$J\pi^\dagger$	Comments
0.0	0^+	
2033	2^+	B(E2) \uparrow =0.026 4 B(E2) \uparrow : weighted average of 0.0255 60 (2002So03) from $\sigma(0^+ \rightarrow 2^+) = 105$ mb 25, 0.026 6 (2002So03) relative to B(E2)(^{70}Zn)=0.148 7 and 0.028 +12-10 (2008Br18). Other: 0.029 7 earlier result from same experimental setup as 2002So03 given in 2000Az01, 2000Az03.

\dagger From the Adopted Levels.

 $\gamma(^{68}\text{Ni})$

E_γ	$E_i(\text{level})$	J_i^π	E_f	J_f^π
2033	2033	2^+	0.0	0^+

Coulomb excitation 2002So03,2008Br18Level Scheme