

Adopted Levels

Type	Author	History	Citation	Literature Cutoff Date
Full Evaluation	Wang Jimin and Huang Xiaolong		NDS 144, 1 (2017)	1-Mar-2016

$S(n)=1.585\times 10^4$ SY; $S(p)=1.56\times 10^3$ SY; $Q(\alpha)=-7.46\times 10^3$ SY [2017Wa10](#)
 Estimated uncertainties ([2017Wa10](#)): $\Delta S(n)=710$, $\Delta S(p)=640$, $\Delta Q(\alpha)=710$.

 ^{51}Ni LevelsCross Reference (XREF) Flags

A Ni($^{58}\text{Ni},X$)

<u>E(level)</u>	<u>J^π</u>	<u>$T_{1/2}$</u>	<u>XREF</u>	<u>Comments</u>
0	($7/2^-$)	23.8 ms 2	A	$\% \epsilon + \% \beta^+ = 100$; $\% \epsilon p = 87.2$ 8 (2007Do17); $\% \epsilon 2p = 0.5$ 2 (2012Au08) $\% \epsilon p$: Total proton branching ratio is from time spectrum of events with energy >900 keV in the charged-particle spectrum. Possible small contributions from delayed- α and delayed-2p decays are ignored. $\% \epsilon 2p$: With the total $\beta^+ p = 87.2\%$ 8 measured by 2007Do17 , the $\beta^+ 2p / \beta^+ 1p$ ratio is less than 5% in agreement with calculation by 1991De26 . $T_{1/2}$: By time correlation of implantation events due to ^{51}Ni and subsequent emission of protons and γ rays (2007Do17). Other: >200 ns (TOF, 1987Po04). J^π : $7/2^-$ from systematics in 2017Au03 . Theoretical calculations in 1997Mo25 suggest $3/2^-$.