

<sup>119</sup>Sn(d,p),(t,d),(pol d,p) [1964No06](#),[1975Ko19](#),[1979Ch08](#)

Type	Author	History	Citation	Literature Cutoff Date
Full Evaluation	K. Kitao, Y. Tendow and A. Hashizume		NDS 96,241 (2002)	1-Dec-2001

J<sup>π</sup>(<sup>119</sup>Sn)=1/2<sup>+</sup>.

Q(d,p)=6890 I2 ([1964No06](#)).

- (d,p) [1964No06](#): E=11-12 MeV, mag spectrograph.
- [1967Sc12](#): E=15 MeV, 40-60 keV(FWHM), deduced S
- (pol D,P) [1975Ko19](#): E=12 MeV; semi, σ(θ)  
θ=15°-135°, deduced S
- (t,d) [1979Ch08](#): E=4.25-5.75 MeV; semi, σ(θ)  
θ=120°-160°, deduced S

<sup>120</sup>Sn Levels

E(level) <sup>†</sup>	L <sup>@</sup>	S <sup>@</sup>	Comments
0.0	0	0.65	S: other: 1.30 (t,d).
1170	2	0.15	S: others: 0.18 if d3/2 <sup>+</sup> transfer in (pol d,p), uncertain by a factor of 3; 0.06 (t,d).
1875 <sup>#</sup>	0	0.039	E(level): 1875 in (t,d). S: other: 0.078 in (t,d).
2100			
2166 <sup>‡</sup>	0	0.023	E(level): 2160 in (t,d). S: other: 0.046 in (t,d).
2297 <sup>‡</sup>	0	0.072	
2355 <sup>#</sup>			
2421 <sup>#</sup>	2	0.52	E(level): 2421 in (t,d). S: other: 0.21 in (t,d).
2587 <sup>‡</sup>	0	0.32	E(level): 2587 in (t,d). S: other: 0.32 in (t,d).
2728 <sup>#</sup>	2	0.11	
2800 <sup>‡</sup>			
2835 <sup>‡</sup>	2	0.83	
2930 <sup>#</sup>	2	0.57	
2997 <sup>‡</sup>			
3160			
3210	2	0.030	
3290			
3390			
3470			
3550	2	0.14	L: value applies to unresolved 3550+3580 doublet.
3580			
3600			
3660			
3710	2	0.11	L: value applies to unresolved 3660+3710+3730 triplet.
3730			
3800			
3880	2	0.11	
3940			
3990			
4060	2	0.088	
4190	2	0.20	
4350			

Continued on next page (footnotes at end of table)

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$^{119}\text{Sn}(\text{d,p}),(\text{t,d}),(\text{pol d,p})$  [1964No06](#),[1975Ko19](#),[1979Ch08](#) (continued)

$^{120}\text{Sn}$  Levels (continued)

† Energy values are from (d,p) ([1964No06](#)), unless otherwise noted.

‡ Values are renormalized with a calibration curve using values (1171, 1875, 2097, 2355, 2421, 2728, and 2930) of Adopted Levels.

# Values from Adopted Levels.

@ From (d,p) ([1967Sc12](#)), unless otherwise noted.