

$^{77}\text{Se}(\text{d,p})$ 1965Li08

Type	Author	History	Citation	Literature Cutoff Date
Full Evaluation	Ameenah R. Farhan, Balraj Singh		NDS 110, 1917 (2009)	30-Jun-2009

E=15 MeV, enriched target, magnetic spectrograph, FWHM =40 keV; measured $\sigma(\theta)$ ($\theta=10^\circ$ to 50°); uncertainties in cross sections are 10% to 20%. DWBA calculations.

Others: 1985DoZZ, 1982DoZY, 1964Za04.

$J^\pi(^{77}\text{Se})=1/2^-$.

 ^{78}Se Levels

E(level)	L	(2J+1)S [†]	Comments
0	1	0.34	L=1, (2J+1)S=0.19 (1982DoZY). $\sigma(\text{max})=1.21$ mb/sr.
620	1	0.074	L=1, (2J+1)S=0.042 (1982DoZY). $\sigma(\text{max})=0.32$ mb/sr.
1320	(3)	0.27	L=3 (1982DoZY). $\sigma(\text{max})=0.12$ mb/sr.
1510	1	0.036	L=1 (1982DoZY). $\sigma(\text{max})=0.15$ mb/sr.
1880	3	0.1	$\sigma(\text{max})=0.04$ mb/sr.
2360	1	0.081	$\sigma(\text{max})=0.35$ mb/sr.
2560	(2)	0.031	$\sigma(\text{max})=0.10$ mb/sr.
2940	4	0.61	$\sigma(\text{max})=0.21$ mb/sr.
3130	1	0.40	$\sigma(\text{max})=1.94$ mb/sr.
3330	1+4	0.035,0.59	$\sigma(\text{max})=0.21$ mb/sr.
3460	(4)	1.65	$\sigma(\text{max})=0.59$ mb/sr.
3550	(3)	0.88	$\sigma(\text{max})=0.49$ mb/sr.
3690	2	0.38	$\sigma(\text{max})=1.26$ mb/sr.
3830	2	0.34	$\sigma(\text{max})=1.12$ mb/sr.
4120	0	0.68	$\sigma(\text{max})=1.74$ mb/sr.
4190	0	0.89	$\sigma(\text{max})=2.25$ mb/sr.
4360	2	0.57	$\sigma(\text{max})=2.38$ mb/sr.
4490	2	0.76	$\sigma(\text{max})=3.30$ mb/sr.
4590	2	0.33	$\sigma(\text{max})=1.37$ mb/sr.
4780	0	0.31	$\sigma(\text{max})=0.87$ mb/sr.
4910	2	0.28	$\sigma(\text{max})=1.29$ mb/sr.
4970	2	0.45	$\sigma(\text{max})=1.94$ mb/sr.
5120	0	0.29	$\sigma(\text{max})=0.80$ mb/sr.
5210	2	0.60	$\sigma(\text{max})=2.89$ mb/sr.
5360	(2)	0.27	$\sigma(\text{max})=1.31$ mb/sr.
5480	(2)	0.13	$\sigma(\text{max})=0.63$ mb/sr.
5610	2	0.29	$\sigma(\text{max})=1.49$ mb/sr.

[†] Uncertainties are 10% to 20%. 1965Li08 list S' factors also.