
 $^{197}\text{Au}(\text{n},\text{n}),(\text{n},\text{n}') \quad \textbf{1968Ba06}$

Type	Author	History	Citation	Literature Cutoff Date
Full Evaluation	Huang Xiaolong, Zhou Chunmei		NDS 104, 283 (2005)	1-Jan-2002

Others: [1965De11](#), [1986Ha31](#), [1985Ha02](#), [1984Br12](#).

[1968Ba06](#): E=0.13-1.5 MeV, measured inelastic cross sections (mb/sr, $\theta=90^\circ$) via tof spectra for incident $E(\text{n})\leq 1.5$ MeV.

See [1971Ba29](#) for complimentary (n,n' γ) measurements. Consistency observed between level energies, and differential n-cross section compared with $\text{I}\gamma$ deexcitation at incident n-energies.

Deduced optical model parameters (E=14.6 MeV), ([1986Ha31](#),[1985Ha02](#)).

 $^{197}\text{Au Levels}$

Multiple J values assigned from Hauser-Feshbach ([1968Ba06](#)) analysis of $\sigma(\text{n},\text{n}')$ results ([1968Ba06](#)).

Uncertainty=10 keV ([1968Ba06](#)).

E(level)	E(level)	E(level)	E(level)
0	511 <i>10</i>	940 <i>10</i>	1220 <i>10</i>
77 <i>10</i>	558 <i>10</i>	960? <i>10</i>	1243? <i>10</i>
268 [†] <i>10</i>	740 <i>10</i>	1055 <i>10</i>	
279 [†] <i>10</i>	855 <i>10</i>	1120 <i>10</i>	
409 <i>10</i>	888 <i>10</i>	1150 <i>10</i>	

[†] Unresolved ([1968Ba06](#)).