

$^{235}\text{U}(\text{n},\text{n}'\gamma)$ [1986Ke09](#)

Type	Author	History	Citation	Literature Cutoff Date
Full Evaluation	E. Browne, J. K. Tuli	NDS 122, 205 (2014)		1-Feb-2014

E(n)=100 to 500 keV, pulsed beam; γ rays: Ge(Li). Detected 129-keV γ ray (de-exciting the 129-keV ($J^\pi=5/2^+$) level in ^{235}U), measured excitation function. Deduced cross section was corrected for fission neutrons ([1986Ke09](#)).

E(n)= 3 MeV, preliminary report on 90 γ rays possibly from $^{235}\text{U}(\text{n},\text{n}'\gamma)$; Most of the I γ data are inconsistent with well established portions of the ^{235}U decay scheme ([1984BIZS](#)). Therefore, the evaluator has considered unreliable these γ rays.

 ^{235}U Levels

E(level) [†]	J^π	E(level) [†]	J^π	E(level) [†]	J^π	E(level) [†]	J^π
0	7/2 ⁻	225.41	9/2 ⁺	658.93	1/2 ⁻	1057.4	(7/2)
46.20	9/2 ⁻	393.2	3/2 ⁺	670.98	(7/2) ⁻	1116.21	(5/2 ⁻)
129.29	5/2 ⁺	445.7	7/2 ⁺	701.01	(7/2) ⁻		

[†] From Adopted Levels.

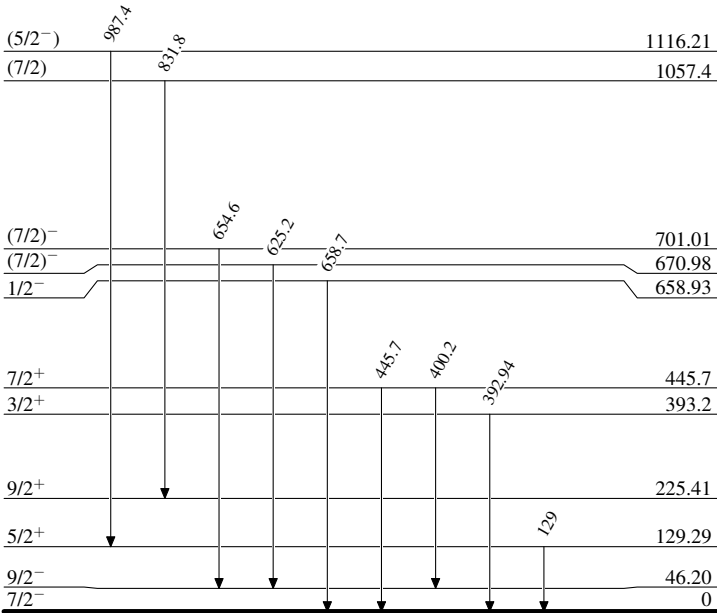
 $\gamma(^{235}\text{U})$

E_γ [†]	$E_i(\text{level})$	J^π_i	E_f	J^π_f
129	129.29	5/2 ⁺	0	7/2 ⁻
392.94 6	393.2	3/2 ⁺	0	7/2 ⁻
400.2 2	445.7	7/2 ⁺	46.20	9/2 ⁻
445.7 1	445.7	7/2 ⁺	0	7/2 ⁻
625.2 2	670.98	(7/2) ⁻	46.20	9/2 ⁻
654.6 3	701.01	(7/2) ⁻	46.20	9/2 ⁻
658.7 2	658.93	1/2 ⁻	0	7/2 ⁻
831.8 5	1057.4	(7/2)	225.41	9/2 ⁺
987.4 4	1116.21	(5/2 ⁻)	129.29	5/2 ⁺

[†] From [1984BIZS](#).

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Level Scheme



$^{235}_{92}\text{U}_{143}$