Adopted Levels

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	C. D. Nesaraja	NDS 146, 387 (2017)	31-Aug-2017

Q(β^-)=−2.94×10^3 *SY*; S(n)=6.79×10^3 *SY*; S(p)=2.25×10^3 *SY*; Q(α)=7.94×10^3 *SY* 2017Wa10
ΔQ(β^-)=−270, ΔS(n)=280, ΔS(p)=210, ΔQ(α)=100 (syst, 2017Wa10).

Identification:
1973Es02: ^{244}Es produced by ^{233}U(^{15}N,4n) reaction at the Berkeley, HILAC. The isotope was studied using α particle spectroscopy consisting of a series of Si-Au surface barrier detectors.

Theoretical studies:
2017So11: Calculated α decay half-life.
2015GH03: Calculated β-delayed fission half-life.
2009Mo18: Calculated fission barrier heights.
1997Mo25: Calculated partial half-lives for α and β decays.
1995Mo29: Calculated deformations parameters.

^{244}Es Levels

Cross Reference (XREF) Flags

A ^{248}Md α decay

E(level)†	$T_{1/2}$	XREF	Comments
0.0	37 s *4*	A	%ε=96 *+2−3*; %α=4 *+3−2* Alpha and electron capture branchings were derived by 1973Es02 from alpha counts from ^{244}Es and from ^{244}Cf decays, assuming that ^{244}Cf decays 100% by α. Delayed fission following electron-capture decay to ^{244}Cf was observed by 1980Ga07 and by 2002Sh02. Relative probability for electron-capture delayed fission, defined as the ratio of number of delayed fission events to the number of electron-capture events, was obtained by 2002Sh02 from measured fission counts/^{244}Cf alphas to be 0.00012 *4*. Delayed fission events were identified by the half-life of ^{244}Es, the ε parent. Cross sections for ^{244}Es production and for delayed fission were measured, and the relative delayed-fission probability was deduced by 1980Ga07 to be about 0.00010. $T_{1/2}$: Measured by 1973Es02 from alpha counts. Other measurements: 40 s *5* (1971EsZY), 38 s *11* (from delayed-fission counts) (2002Sh02).
200 *SY*		A	E(level): ΔE=150 (sys).
240 *SY*		A	E(level): ΔE=150 (sys).

† Level energies are calculated from Qα(^{248}Md)=8700 *150* (syst, 2017Wa10) and the measured Eα′s.