

Adopted Levels

| Type | Author | History | Citation | Literature Cutoff Date |
|-----------------|-------------------------|---------|---------------------|------------------------|
| Full Evaluation | Balraj Singh, E. Browne | | NDS 109,2439 (2008) | 31-Jul-2008 |

$Q(\beta^-) = -2.33 \times 10^3$ syst; $S(n) = 6.7 \times 10^3$ syst; $S(p) = 2.77 \times 10^3$ syst; $Q(\alpha) = 7.20 \times 10^3$ syst [2012Wa38](#)
 Note: Current evaluation has used the following Q record \$ -2370 syst 6690 syst 2820 syst 7060 syst [2003Au03](#).
 $\Delta Q(\beta^-) = 250$, $\Delta S(n) = 280$, $\Delta S(p) = \Delta Q(\alpha) = 180$ (syst, [2003Au03](#)).
 Assignment: ²³²Th(¹⁴N,6n) excitation functions ([1980Ga07](#)), ²⁴¹Am(³He,4n) ([1983Ga05](#)).
 Probability of delayed fission = 1.0×10^{-5} ([1980Ga07](#)); $1.3 \times 10^{-5} + 18-7$ ([1983Ga05](#)).

²⁴⁰Bk Levels

Cross Reference (XREF) Flags

A ²⁴⁴Es α decay (37 s)

| E(level) | T _{1/2} | XREF | Comments |
|----------------------|------------------|------|---|
| 0 | 4.8 min 8 | A | $\% \epsilon + \% \beta^+ = ?$; $\% \epsilon SF = 0.0020$ 13 T _{1/2} : from 1983Ga05 other: 5 min 2 (1980Ga07). $\% \epsilon \approx 100$, as adopted by 1980Ga07 , but systematics (1972E121 , 2003Au02) suggest 10% for α decay. β^+ or ϵ decays were not observed. 2001Mo07 calculated T _{1/2} for α -decay as 37.5 h. |
| 2.4×10^2 10 | | A | E(level): calculated from the observed $E\alpha = 7570$ 20 from ²⁴⁴ Es α -decay (1973Es02) and $Q(\alpha)(^{244}\text{Es}) = 7940$ 100 (syst, 2003Au03). |