

Adopted Levels

Type	Author	History Citation	Literature Cutoff Date
Full Evaluation	Y. A. Akovali	NDS 77,433 (1996)	1-Feb-1996

$Q(\beta^-)=3871$ 13; $S(n)=4352$ 17; $S(p)=6283$ 17; $Q(\alpha)=4163$ 20 [2012Wa38](#)

Note: Current evaluation has used the following Q record 3671 91 4591 92 6447 syst 4108 syst [1995Au04](#).

Assignment: Th(600-MeV p) mass separation ([1975Ra03](#),[1975We23](#),[1986Bo35](#)).

 ^{226}Fr Levels

E(level)	J^π	$T_{1/2}$	Comments
0.0	1^-	49 s 1	$\% \beta^- = 100$ $\mu = +0.0712$ 14; $Q = -1.35$ 2 (1989Ra17) J^π : from atomic beam laser spect (1985Co24); parity is from the proton and neutron configurations assigned from the experimental Q. The log ft values for β^- transitions to the 0^+ , 2^+ , 1^- and 2^- states in ^{226}Ra are consistent with $\pi = +$ or $-$. The recommended μ , Q values by 1989Ra17 are from $\mu = +0.071$ 2, $Q = -1.35$ 2 (1985Co24), and $\mu = +0.0712$ 14 (1986Du16). The authors of 1986Ek02 calculate $\mu = +0.4$, $Q = -1.2$ for $K=0$, $J=1$: π 3/2[532], ν 3/2[631] configuration, and they attribute the disagreement between the theoretical and experimental μ 's to small admixtures of other configurations. Isotope shift = -34401 1 MHz (1985Co24). Change in the mean square charge radius relative to ^{212}Fr was deduced by 1987Co19 to be 1.43700 4 fm^2 . $T_{1/2}$: from measured $T_{1/2}$ values: 48 s 1 (1975Ra03), 49 s 1 (1986Bo35). Other measurements: 1969Ha03 , 1981Ku02 .