U(p,X),²³²Th(¹⁵N,X) 1970Ar27

	History		
Туре	Author	Citation	Literature Cutoff Date
Full Evaluation	J. H. Kelley, C. G. Sheu and J. E. Purcell	NDS 198,1 (2024)	1-Aug-2024

1966Po09,1974Bo05: U(p,X). In (1966Po09) a 5.3 GeV proton beam from the Bevatron impinged on a 26 mg/cm² uranium target, and in (1974Bo05) a 4.8 GeV proton beam impinged on 28 mg/cm² uranium target. The products were identified by a Δ E-E telescope. ¹³Be was not observed; in the later work an upper limit of \approx 10 ns was set for the life-time.

1970Ar27: ²³²Th(¹⁵N,X) E=145 MeV. The particle instability of ¹³Be was deduced. The fragmentation products emitted at θ =40° resulting from bombardment of a metalic 20 mg/cm² ²³²Th target were analyzed using a magnetic spectrograph and set of silicon detectors (assumed Δ E-E). No events could be attributed to either ¹³Be or ¹⁴Be, while 500 and 30 events were expected based on the ¹²Be yield that was observed. It is known from later work that ¹⁴Be is particle bound.

1986Gi10: A study of fragmentation products produced in reactions of 44 MeV/nucleon ⁴⁰Ar ions on a 160 mg/cm² tantalum target confirmed the particle instability of ¹³Be.

¹³Be Levels

Comments

E(l	evel)
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0?

E(level): Level not observed. Particle instability confirmed.

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