^{252}Md

Eskola discovered ^{252}Md in the 1973 paper "Studies of mendelevium isotopes with mass numbers 248 through 252" (1973Es01). ^{12}C and ^{13}C beams with a maximum energy of 10.4 MeV/u from the Berkeley heavy-ion linear accelerator bombarded ^{241}Am and ^{243}Am targets. Recoil products were transported with a rapid flowing helium gas onto a wheel which periodically rotated in front of a series of Si-Au surface barrier detectors. " Because of the long half-life of ^{252}Fm most of the counts in 7.04-MeV peak originate from ^{252}Md produced in previous bombardments with ^{13}C ions. The decay curve of the ^{252}Fm in daughter spectra combined from four bombardments with 72−88 MeV ^{13}C ions is plotted in [the figure]. A value of 140±50 sec is derived for the half-life of ^{252}Md by a least-squares analysis. This is considerably shorter than the 8-min value reported by Donets, Schegolev, and Ermakov." This earlier reported half-life mentioned in the quote (1965Do09) was not credited with the discovery because of the large discrepancy with the correct value of 2.3(8) min measured by Eskola.

Adapted from reference (2013Th02)

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