

⁷⁸Y

The discovery of ⁷⁸Y is credited to Yennello et al. with their 1992 paper “New Nuclei Near the Proton-Drip Line Around Z = 40” ([1992Ye04](#)). At the National Superconducting Cyclotron Laboratory at Michigan State University, a 70 MeV/A ⁹²Mo beam was produced by the K1200 cyclotron and impinged on a ⁵⁸Ni target. ⁷⁸Y was identified with the A1200 fragment analyzer by measuring the time-of-flight and energy loss of the fragments. “The mass spectra for residues with Z from 39 to 44 are shown in [the figure] with the new isotopes marked by arrows. Although both ⁸⁴Mo and ⁸⁶Mo have been previously observed, no reference to the identification of ⁸⁵Mo was found. The other new isotopes observed in this study are ⁷⁸Y, ⁸²Nb, ⁸⁶Tc, and ^{89,90}Ru.”

Adapted from reference ([2012Ny02](#))

[1992Ye04](#) S. J. Yennello, J. A. Winger, T. Antaya, W. Benenson *et al.*, Phys. Rev. C **46**, 2620 (1992).

[2012Ny02](#) A. Nystrom and M. Thoennessen, At. Data Nucl. Data Tables **98**, 95 (2012).

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