

¹⁷⁸Pt

Siivola first observed ¹⁷⁸Pt in 1966 and reported his results in “Alpha-active Platinum Isotopes” (1966Si08). The Berkeley Heavy Ion Linear Accelerator HILAC was used to bombard ^{168,170,172}Yb and ^{162,164}Er targets with beams of ¹⁶O and ²⁰Ne, respectively. The reaction products were deposited on an aluminum plate by helium gas flow. Alpha-particle decay was measured with a surface barrier counter and the isotopes were identified by excitation function measurements. “We conclude that the reaction observed in the ¹⁶O + Yb bombardments at 106 MeV excitation energy is (¹⁶O,8n), and the others, with their maxima at 93 and 80 MeV, are (¹⁶O,7n) and (¹⁶O,6n), respectively. This and the regular behaviour of the Yb(¹⁶O,xn) reactions give unambiguously the mass numbers down to ¹⁷⁶Pt.”

Adapted from reference (2011Am01)

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