

^{147}Tm

In 1982, Klepper et al. announced the discovery of ^{147}Tm in “Direct and beta-delayed proton decay of very neutron-deficient rare-earth isotopes produced in the reaction $^{58}\text{Ni}+^{92}\text{Mo}$ ” (1982K103). A 4.6 MeV/u ^{58}Ni beam from the GSI UNILAC bombarded a ^{92}Mo target and ^{147}Tm was formed in the $^{92}\text{Mo}(^{58}\text{Ni},p2n)$ fusion-evaporation reaction. Reaction products were separated with the GSI on-line mass separator and implanted into carbon foils which were placed in front of surface barrier detector telescopes recording subsequent proton emissions. “Using the reaction $^{58}\text{Ni}+^{92}\text{Mo}$, a 1055 keV, 0.42 s proton activity was observed and preliminary assigned to ^{147}Tm .”

Adapted from reference (2013Fr10)

1982K103 O. Klepper, T. Batsch, S. Hofmann, R. Kirchner *et al.*, *Z. Phys. A* **305**, 125 (1982).

2013Fr10 C. Fry and M. Thoennessen, *At. Data Nucl. Data Tables* **99**, 520 (2013).

Please cite this abstract as: “FRIB Nuclear Data Group, *Discovery of Nuclides Project*, Isotope Database, doi:[10.11578/frib/2279152](https://doi.org/10.11578/frib/2279152)”