

Answers:

7) mass # = 15

atomic # = 7

protons = 7

neutrons = 8

electrons = 10

20) Gamma rays for all 3 questions

29) P: [Ne] $3s^2 3p^3$

Mo: [Kr] $5s^2 4d^4$

Pb: [Xe] $6s^2 4f^{14} 5d^{10} 6p^2$

30) Br: [Ar] $4s^2 3d^{10} 4p^5$

Te: [Kr] $5s^2 4d^{10} 5p^4$

V: [Ar] $4s^2 3d^3$

33) Cl: 7

K: 1

Cr: 2