

- 28 A piece of zinc in a photocell is used in a simple circuit to demonstrate the photoelectric effect. The zinc is exposed to radiation that has a frequency above its threshold frequency, causing a current in the circuit.

Which statements are correct?

- 1 The current is directly proportional to the frequency of the radiation.
- 2 The current is directly proportional to the intensity of the radiation.
- 3 The maximum kinetic energy of the emitted electrons is directly proportional to the intensity of the radiation.

A 1 and 3

B 1 only

C 2 and 3

D 2 only

- 29 The equation shows one of the nuclear fission reactions that occurs when uranium-235 absorbs a