

## Section Quiz

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### Section: Development of the Atomic Theory

Write the letter of the correct answer in the space provided.

- \_\_\_\_\_ 1. The smallest particle into which an element can be divided and still have the properties of that element is called a(n)
- a. nucleus.
  - b. electron.
  - c. atom.
  - d. neutron.
- \_\_\_\_\_ 2. What particle did J. J. Thomson discover?
- a. neutron
  - b. electron
  - c. atom
  - d. proton
- \_\_\_\_\_ 3. How would you describe the nucleus?
- a. dense, positively charged
  - b. mostly empty space, positively charged
  - c. tiny, negatively charged
  - d. dense, negatively charged
- \_\_\_\_\_ 4. Where are electrons likely to be found?
- a. in the nucleus
  - b. in electron clouds
  - c. mixed throughout an atom
  - d. in definite paths
- \_\_\_\_\_ 5. Dalton believed that
- a. atoms of the same element are exactly alike.
  - b. most, but not all, substances are made of atoms.
  - c. atoms of different elements are the same.
  - d. atoms can be divided.

## Section Quiz

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### Section: The Atom

Match the correct definition with the correct term. Write the letter in the space provided.

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|---|----------------------------|
| _____ 1. particle in the nucleus with no electrical charge  | <b>a.</b> atomic number    |
| _____ 2. mass of an atom expressed in atomic mass units   | <b>b.</b> proton           |
| _____ 3. keeps a nucleus with two or more protons from flying apart   | <b>c.</b> strong force     |
| _____ 4. subatomic particle that has a positive charge  | <b>d.</b> neutron          |
| _____ 5. atom that has the same number of protons as other atoms of the same element do but that has a different number of neutrons | <b>e.</b> isotope          |
| _____ 6. a unit of mass that describes the mass of an atom or molecule  | <b>f.</b> mass number      |
| _____ 7. represents the sum of protons in the nucleus of an atom  | <b>g.</b> weak force       |
| _____ 8. enables a neutron to change into a proton and an electron in certain unstable atoms  | <b>h.</b> atomic mass unit |
| _____ 9. the sum of the protons and neutrons in an atom   | <b>i.</b> atomic mass      |

Write the letter of the correct answer in the space provided.

- \_\_\_\_\_ 10. Every atom of a given element has the same number of
- a.** protons.
  - b.** neutrons.
  - c.** electrons.
  - d.** isotopes.