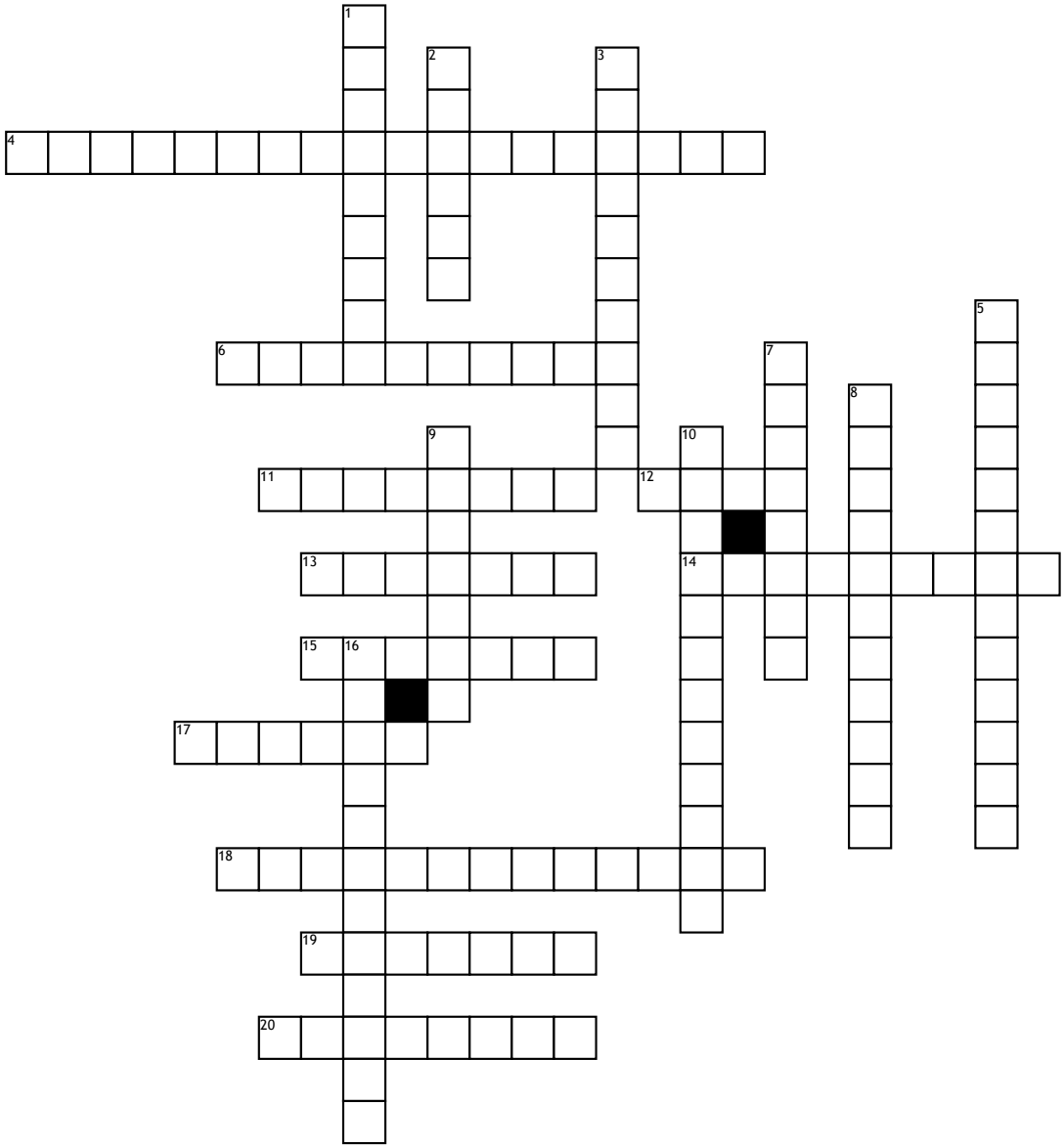
Name: _____ Date: _____ Period: _____

crossword puzzle



Across

4. any property used to characterize matter and energy and their interactions

6. the total number of protons and neutrons in a nucleus.

11. a part or aspect of something abstract, especially one that is essential or characteristic.

12. the basic unit of a chemical element.

13. each of two or more forms of the same element that contain equal numbers of protons but different numbers of neutrons in their nuclei, and hence differ in relative atomic mass but not in chemical properties; in particular, a radioactive form of an element.

14. an element (e.g., germanium or silicon) whose properties are intermediate between those of metals and solid nonmetals. They are electrical semiconductors.

15. any of the elements fluorine, chlorine, bromine, iodine, and astatine, occupying group VIIA (17) of the periodic table. They are reactive nonmetallic elements that form strongly acidic compounds with hydrogen, from which simple salts can be made.

17. a unit used in expressing the molecular weight of proteins, equivalent to atomic mass unit.

18. The electron cloud is the region of negative charge surrounding an atomic nucleus that is associated with an atomic orbital. The region is defined mathematically, describing a region with a high probability of containing electrons

19. the central and most important part of an object, movement, or group, forming the basis for its activity and growth.

20. any of the gaseous elements helium, neon, argon, krypton, xenon, and radon, occupying Group 0 (18) of the periodic table. They were long believed to be totally unreactive but compounds of xenon, krypton, and radon are now known.

Down

1. a thing that is composed of two or more separate elements; a mixture.

2. a stable subatomic particle occurring in all atomic nuclei, with a positive electric charge equal in magnitude to that of an electron, but of opposite sign.

3. a beam of electrons emitted from the cathode of a high-vacuum tube.

5. a table of the chemical elements arranged in order of atomic number, usually in rows, so that elements with similar atomic structure (and hence similar chemical properties) appear in vertical columns.

7. an element or substance that is not a metal.

8. any of the elements lithium, sodium, potassium, rubidium, cesium, and francium, occupying Group IA (1) of the periodic table. They are very reactive, electropositive, monovalent metals forming strongly alkaline hydroxides

9. a subatomic particle of about the same mass as a proton but without an electric charge, present in all atomic nuclei except those of ordinary hydrogen.

10. An atom gets larger as the number of electronic shells increase; therefore the radius of atoms increases as you go down a certain group in the periodic table of elements.

16. the number of protons in the nucleus of an atom, which determines the chemical properties of an element and its place in the periodic table.