

Science Test Prep.

1. Matter is anything that has mass and takes up space.

2. a) 1. All matter is made up of tiny particles.

2. Particles have empty spaces between them.

3. You can't see them, but they are randomly moving.

4. When heated, they move faster and farther.

5. Particles stay together because they attract.

3. a) Liquid → Move in all directions

Solid → Closely packed together

Gas → Are very far apart, but still have energy

b) Liquid → Water, Milk, Juice, Pop, Coffee, Tea

Solid → Apple, Coin, Pencil, Eraser, Banana

Gas → Helium, Air, Febreeze, Water Vapour

5. a) A pure substance is made up of particles that look alike.

b) A mixture is made up of combinations of pure substances.

6. Pure substance



Mixture



2. b) 2. Particles have empty spaces between them.



7. Clear apple juice is a mixture because of it's different contents.

9. a) A mechanical mixture (A.K.A. heterogeneous mixture) is a mixture with different visible parts.

b) A mechanical mixture is different from a solution because you can see the different parts of the mixture unlike a solution.

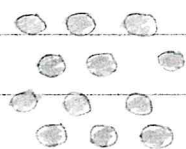
10. a) Mechanical mixture

b) Solution

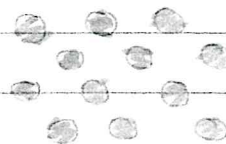
c) Mechanical mixture

12. You can see the different parts of a solution because particles are randomly moving creating empty spaces to disguise.

13. Mechanical mixture



Solution



15. Pure substances → a e

Mechanical mixtures → d

Solutions → b c f

18. Pedro is correct. Since you can see the pulp in the juice, it is a mechanical mixture.

22. Ken made a solution because the salt is not visible in the water.

24. I agree with Lakisha because you can have multiple states within a mechanical mixture.

25. a) The white solid was formed because of the salt particles that were building up.

b) Jayzee could use vinegar or lemon juice to rinse her kettle out and prevent the build up.