Unit 5

1. What is matter?

Matter is everything around us that occupies space. For example: trees or water.

2. What is a substance?

Substance is each type of matter. For example: wood

3. Properties of matter

Mass and volume

4. Other properties of matter

Hard, colour or shine

5. What is mass?

Mass is the amount of matter that an object has.

6. How can we measure mass?

We can measure mas in grams (gr) or kilograms (kg)

7. What is volume?

Volume is the space that an object takes up.

8. How can we measure volume?

We can measure volume in litres (l)

9. States of matter

Solid, liquid and gas

10. Characteristics of solids

They have a fixed shape and volume. They don't change

11. Characteristics of liquids

They don't have a fixed shape.
They have a fixed volume.

12. Characteristics of gases

They don't have a fixed shape or volume.

13. What are materials?

Materials are the substances that we use to make different objects.

14. Types of materials

Natural materials and Human made materials

15. Examples of natural materials

- From animals: wool or leather
- From plants: cotton or wood
- From minerals: rocks

16. Human made materials

- Glass from sand
- Plastic from petroleum

17. Properties of materials

- A fragile material breaks easily.
- A strong material doesn't break easily
- A flexible material bends easily
- A light material doesn't weight too much
- An elastic material can stretch and return to its original shape.
- A waterproof material doesn't allow liquids to go through it.

18. What are conductors?

Are materials that transfer heat well. For example, metals

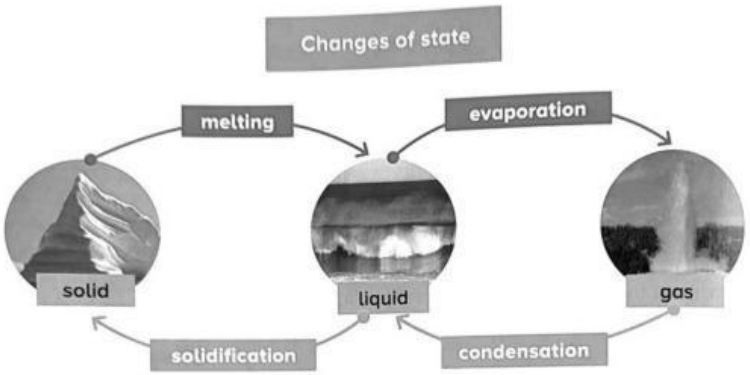
19. What are insulators?

Are materials that don't transfer heat well. For example, wood

20. What is temperature?

Temperature is how hot an object is. We measure temperature in degrees (ºC) and with a thermometer

21. Changes of state



22. What is a Chemical change?

When a substance changes and produces another different substance. For example,

- Combustion transforms paper into ashes.
- Oxidation transforms iron into oxide iron

23. What is energy?

Energy is the capacity to produce changes.

24. Types of energy

- Thermal energy- The heat
- Light energy- The light
- Chemical energy- Food and explosives
- Electrical energy – Through cables
- Mechanical energy. – Motion

25. Energy transformation

For example:

From electrical energy to light energy

From electrical energy to thermal energy

From electrical energy to mechanical energy

26. Where does the electrical energy comes from?

-Thermal power stations

- Solar power stations
- Hydroelectric power stations
- Wind power stations

27. What is air pollution?

When fuels burn in thermal power stations they produce gases that cause air pollutions.