



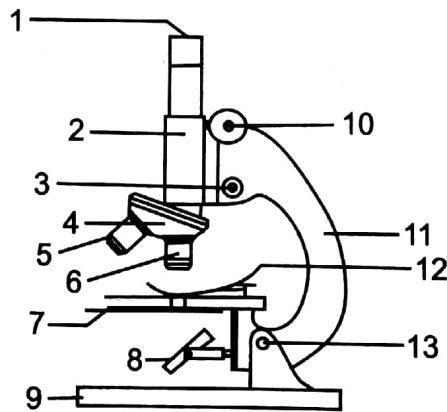
- Mercy put a tea bag in a cup full of hot water. She observed that the dark colour of the tea leaves spread out to all parts of the water until it was evenly distributed. This happened as a result of ..... (1 mark)
- Scientists use chemical symbols instead of names to refer to elements since they are easier and convenient. Chemical symbols of elements can either be derived from their English names or Latin names. Match the elements below with their Chemical symbols. (4 marks)

- Helium .....
- Magnesium .....
- Copper .....
- Nitrogen .....
- Fluorine .....

- Compound has unique chemical formulas that show the elements that make up the compound and their proportions. Write down word equations to represent the reactions of elements that form the compounds below. (3 marks)

- Copper oxide .....
- Carbon dioxide .....
- Sodium chloride .....

- Cells are too tiny to be seen with the naked human eye thus the need for a light microscope. Identify the parts of a light microscope and their functions. (3 marks)



- 1 .....
- 3 .....
- 11 .....

- Grade 8 learners inflated balloons of different shapes by blowing air into them as shown below



What conclusion did they make? (1mk)

.....

6. Fill in the blank areas with the correct observations in terms of colour change when different indicators come into contact with acids or bases.(6 marks)

Indicator	Acidic Solution	Basic Solution
Methyl orange		
Phenolphthalein		
Litmus paper		

7. Grade 8 learners were discussing characteristics of particles in the three states of matter. Write the characteristics of particles in each state. (3 marks)

- a) Solid .....  
 b) Liquid.....  
 c) Gas.....

8. The human excretory system removes waste from our bodies.

- a. Mention two body organs that help in excretion (2 marks)

- i. ....  
 ii. ....

- b. Mention 3 parts that make up the Urinary system and their functions (3 marks)

- i. ....  
 ii. ....  
 iii. ....

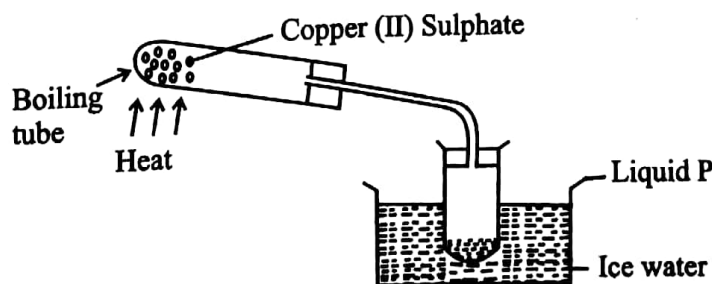
- c. Skin lightening creams are beauty products used to reduce melanin in the skin. Give three effects of such creams (3 marks)

- i. ....  
 ii. ....  
 iii. ....

9. Elements and compounds are important as they have many uses in our day to day lives. List three such uses. (3 marks)

- i. ....  
 ii. ....  
 iii. ....

10. Grade 8 learners carried out the experiment below as they were learning temporary and permanent changes in substances. They heated blue hydrated copper (II) Sulphate as shown below.



- a. What did they observe? ..... (1 mark)

- b. The product formed after heating is known as ..... (1 mark)

- c. When water was added to the substance in (b) above, what was observed? ..... (1 mark)

d. The above experiment demonstrates an example of a ..... change  
(1 mark)

11. Matter exists in three states. It can change from one state to another either on heating or on cooling. List three applications of changes of state of matter in day-to-day life. (3 marks)

- i. ....
- ii. ....
- iii. ....

12. Fire safety is very important and therefore every institution should have fire safety posters. Indicate what each of the following fire safety posters means (3 marks)

i.



.....

ii.



.....

iii.



.....

13. Grade 8 students were learning fire control measures and they learnt that to prevent the spread of fire, one or more components should be removed from the fire triangle. Mention the 3 components of fire. (3 marks)

- i. ....
- ii. ....
- iii. ....

14. Grade 8 learners carried out the following experiments. Indicate whether the changes observed are temporary or permanent. (2 marks)

- i. They placed some papers in a crucible and lit them to completely burn and only ash was left behind .....
- ii. They heated candle wax in a boiling tube dipped in a beaker of boiling water. After the wax melted, they removed the boiling tube from the hot water and allowed it to cool and the wax became solid again. ....

15. Grade 7 learners were learning about the excretory system. They were taught several ways of maintaining a healthy skin. Mention 3 ways they could have learnt during the lesson. (3 marks)

- i. ....
- ii. ....
- iii. ....