1. Differentiate between reversible and irreversible changes.
2. What is a physical change? Write four properties of physical change.
3. Give an example of:
   (a) A reversible physical change.
   (b) An irreversible physical change.
4. Give reasons. Why
   (a) Freezing of water into ice is considered a physical change.
   (b) Inflation of balloon is considered a physical change.
   (c) Adding sugar to milk is a physical change.
5. Is conversion of milk to curd a physical change? Why or Why not?
6. Define chemical change. What is the other name given to this change?
7. Define: reactants, products.
8. Write four properties of chemical change.
9. Give two examples of chemical changes.
10. Give reasons why –
    (a) Cooking of an egg in a chemical change.
    (b) Burning of matchstick is a chemical change.
    (c) Rusting of iron is a chemical change.
11. When a candle is burnt/lit. Identify this physical and chemical changes taking place (Hint: wax, wick)
12. Define:
    (a) Exothermic change (b) Endothermic change.
13. Is evaporation endothermic or exothermic? Give reasons.
14. What happens when magnesium is burnt in an to produce ash. Write an equation also.
15. If we collect this ash and mix it with water and then put it on blue and red litmus papers. What would happen and why?
16. Is burning of Mg a physical or chemical change?
17. Is a new substance formed when magnesium ash is dissolved in water? Name it.
18. Name the substance formed:
    (a) Mg is burnt in air.
    (b) Ash of Mg is dissolved in H_2O.
19. 

    (a) What happens when an iron blade is dropped in a blue copper sulphate solution?
    (b) What kind of change is this and why?

(c) Is a new substance(s) formed? If yes, name the new substance(s) formed.

20. In the above activity:

(a) Why does the colour of solution change from blue to green.

(b) Why do we see a brown deposit on the blade?

21. Write the missing words:

Copper sulphate ( ) + _____ □ _____ (green) + _____ (brown deposit)

22. When baking soda is added to vinegar, we see gas bubbles rising with a hissing sound. Is this a chemical/physical change? Why?

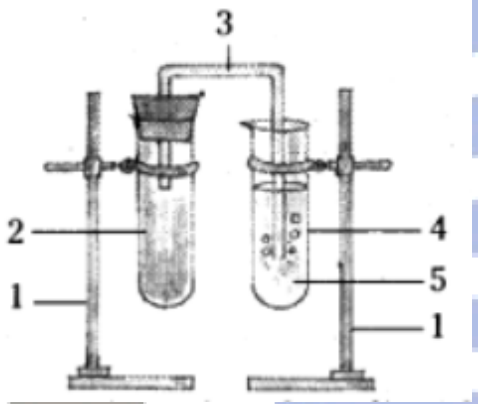
23. How can we identify the gas evolved in the above expt.?

24. If we pass the gas through lime water, what happens? Why?

25. Complete the reaction:

Vinegar ( ) + Baking soda □ _____ (gas) + other substances

26. Identify carbon dioxide, lime water, calcium carbonate in this set up, Vinegar baking soda



27. Name the new substance formed in the reaction where CO_2 is passed through lime water.

28. Write the chemical formula of water, carbon dioxide, magnesium oxide, magnesium hydroxide, lime water, milk of magnesia, calcium carbonate, rust of iron.

29. Define chemical change.

30. What is a chemical reaction? Give an example.

31. What are the uses of chemical reactions? (ores, medicines etc)

32. What are the results of a chemical change? What happens when a chemical changes takes place? (1 + 5 effects)

33. Is burning a physical or chemical change? Give reasons.

34. Give reason, why these are chemical changes

(a) burning

(b) explosion of five works

(c) Spoiling of food

(d) Browning of cut apple/potato/brinjal.

35. Is neutralisation a chemical change? Why?

36. What is ozone? What role does it play in the atmosphere?

37. What will happen if ozone layer is depleted?

38. What is the reason for depletion of ozone layer?
39. Is photosynthesis a chemical change? Why?
40. Is digestion a chemical change? Why?
41. is chewing of food in the mouth a chemical change? Why?
42. What is rusting? Why should it be avoided?
43. Write the equation for rusting.
44. Which substances are essential for rusting to take place?
45. Complete the equation

    _____ (Fe) + Oxygen ( ) + Water ( ) □ Rust ( )
46. Why does rusting happen more often in rainy season?
47. How can we prevent rusting? Write two methods.
48. Name the metals that are deposited on iron to prevent rusting.
49. What is galvanisation?
50. Why is rusting seen more in coastal areas?
51. Why do ships suffer a lot of damage in the sea?
52. How is stainless steel made?
53. Name the components/constituent metals of stainless steel.
54. Define crystallisation.
55. How would you form crystals of copper sulphate?
56. How much copper sulphate should be added to the solution?
57. List the precautions necessary while forming crystals of a substance.
58. Why does an apple slice acquire a brown colour after some time?
59. Is breakdown of ozone a chemical change? Why?