

Charotar English Medium School

Sem – 1

Std : 7

Sub : Science

Marks : 80

Date:

Time: 3 Hours

SECTION-A

MCOs. [Q-1 to Q-5]

[6]

1. On adding iodine solution to starch it turns _____.
(a) blue-black (b) green (c) colourless (d) red
2. The process by which the food is taken inside the body is called _____.
(a) assimilation (b) ingestion (c) absorption (d) digestion
3. Which country leads the world in silk production ?
(a) India (b) Pakistan (c) China (d) Japan
4. The cut surface of brinjal turns black due to a _____ change.
(a) physical (b) chemical (c) biological (d) mechanical
5. All changes in the weather are called by the _____.
(a) moon (b) earth (c) sun (d) altitude
6. _____ turns very hard on drying.
(a) Clayey soil (b) Sandy soil (c) Loamy soil (d) Mixed soil

Fill in the blanks. [Q-7 to Q-11]

[5]

7. The silky covering spun by the silkworm for its protection is called _____.
A: cocoon
8. Rusting makes the iron objects _____.
A: weak
9. We can separate salt from salt solution by _____.
A: evaporation
10. _____ soil is not suitable for growing crops.
A: Sandy
11. When there is sufficient rain, ground water level _____.
A: rises

Circle the odd one. [Q-12 to Q-16]

[5]

12. silkmoth pupa caterpillar tadpole
A: tadpole
13. silver copper wood aluminum
A: wood
14. spinach curd tomato guava
A: curd
15. stretching of a rubber band formation of clods photosynthesis in plants melting of wax
A: photosynthesis in plants
16. cyclone thunderstorm rainfall tornado
A: rainfall

SECTION-B

[20]

Very short answer questions. [Q-17 to Q-26]

17. How do aquatic plants prepare their food ? Name two aquatic plants.

A: Aquatic plants like hydrilla water lily and Vallisneria taking carbon dioxide dissolved in water to prepare their food

18. What is the difference between milk teeth and permanent teeth ?

A: The temporary set of teeth which grow when the child is in the age group of 6 months to 8 years are called milk teeth.

19. What are the effects of tooth decay ?

A: (i) The effects of tooth decay are as follows :

(ii) Holes or cavities in the teeth

(iii) Foul smell

(iv) Losing of teeth

(v) Toothache

(vi) Stomach disorders

20. Give two characteristics of wool.

A: 1. Wool has a high tensile strength and has high elasticity.

2. It is lightweight and considerably resilient.

OR

20. Why are the cocoons boiled in hot water or treated in ovens ?

A: The cocoons are boiled in hot water or treated in ovens to kill the pupa inside.

21. What is the difference between laboratory thermometer and clinical thermometer ?

A:

Clinical thermometer	Laboratory thermometer
1. There is a slight kink in the stem just above the bulb in clinical thermometer.	1. There is not kink in laboratory thermometer.
2. Clinical thermometer is used to measure the temperature of human body.	2. Laboratory thermometer is used to measuring temperature while performing experiments.

OR

21. Convert 77°F into degree Celsius.

A: We know, $\frac{C}{100} = \frac{F-32}{180}$

$$\therefore \frac{C}{100} = \frac{77-32}{180}$$

$$\therefore C = \frac{45}{180} \times 100$$

$$\therefore C = \frac{45}{9} \times 5$$

$$\therefore C = 5 \times 5$$

$$\therefore C = 25^{\circ}\text{C}$$

22. How will you test whether a given solution is acidic or basic ?

A: (i) Acidic solutions turn blue litmus paper red.

(ii) Basic solutions turn red litmus paper blue.

23. Give two methods to prevent the rusting of iron.

A: (i) Galvanisation (coating iron with other metal)

(ii) coating the iron surface with paint or grease.

24. What kind of climate do we observe in (a) the Himalayan region (b) the Thar desert ?

A: (a) the Himalayan region- very cold climate

(b) the Thar desert- very hot and dry climate

OR

24. How do elephants keep themselves cool in hot and humid climate of the tropical rain forest ?

A: . Elephants have large ears. When the temperature rise, the elephants flap their largest ears and use them as fans to cool themselves in the hot and humid climate of tropical rainforests

25. What are the two stages of cyclone warnings ?

A: . 1 First stage warning - cyclone alerts / cyclone watch.

2 Second stage warning - cyclone warning

26. What are the properties of soil ?

A: (i) it contains air

(ii) it contains water (moisture)

(iii) it allows Water to percolate.

(iv) it can absorb water.

SECTION-C

[24]

Short answer questions. [Q-27 to Q-34]

27. What are plant parasites ? Name any two plant parasites.

A: The organisms which obtain the ready-made food from the body of a plant are called plant parasites.

Eg. Cuscuta, mistletoe

28. What is the action of intestinal juice on the following food components (a) carbohydrates (b) fats (c) proteins ?

A: (a) The carbohydrates breakdown simple sugars called glucose.

(b) fats break down into fatty acids and glycerol

(c) the proteins breakdown into amino acids

OR

28. Write any three functions performed by the tongue ?

A: . 1. Tongue helps in mixing saliva with the food

2. It helps in pushing and swallowing the food into the food pipe.

3. It has several taste buds which help in giving the different tastes of food.

4. It enables us to speak.

29. What is meant by the following terms (a) shearing (b) sorting of wool (c) combing of wool ?

A: . (a) the process of removing hair from the body of sheep is called shearing.

(b) the process of separating the long fine quality of fleece from the remaining inferior quality of wool is called sorting.

(c) the process of removing the burrs from the fleece is called combing.

30. Why is mercury used in thermometer ?

A: . Mercury is used in thermometers because it is the only metal which is in liquid state at room temperature. It is shiny, visible and very sensitive to the slight changes in temperature. It does not stick to the glass.

OR

30. Give three precautions to be taken while reading a clinical thermometer.

A: 1. Thermometer should be washed before and after use

2. Hold it horizontally so as to keep the level of Mercury along the line of sight.

3. Handle the thermometer with care, if it hits against some object, it can break.

31. Give one use each of (a) sulphuric acid (b) hydrochloric acid (c) nitric acid.

A: . Sulphuric acid - used in manufacturing of fertilizers.

Hydrochloric acid - used in manufacture of chemicals

Nitric acid - used in manufacture of fertilizers

32. List the adaptations in polar bears that help them survive in polar region.

A: . Following adaptations in polar bears help them to adapt in polar regions

- (i) Presence of outer thick layer of fur
- (ii) Presence of blubber under the skin
- (iii) White colour fur
- (iv) Short ears and tail
- (v) Long, curved and sharp claws
- (vi) Wide and large paws.

33. Why is it safe to take shelter in a bus during a thunderstorm ?

A: . It is safe to take shelter in a bus during a thunderstorm. If the lightning strikes the bus, its metal Body Can conduct lightning to the earth safely without causing any damage.

34. Write any three features of clayey soil.

- A: .
1. Clayey soil turns very hard on drying.
 2. Clayey soil is very sticky when wet.
 3. Clayey soil is heavy because it can hold more water than the sandy soil.

SECTION-D

[20]

Long answer questions. [Q-35 to Q-39]

35. Draw a labeled diagram of a thermo flask.

A:

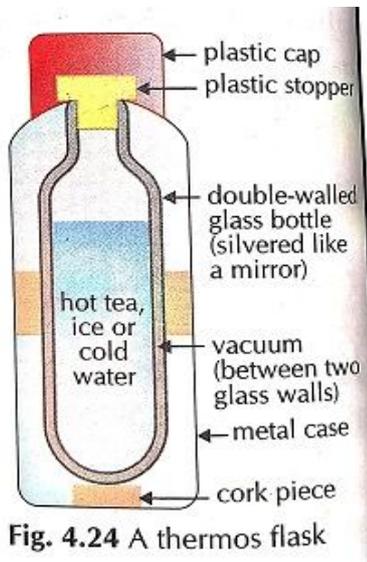


Fig. 4.24 A thermos flask

OR

35. Give reasons for the following:

(i) cooking utensils are made up of metals

A: . Metals are good conductors of heat

(ii) Pressure cooker is provided with Bakelite handle

A: Bakelite is an insulator so it does not allow the flow of heat from hot appliances into your hand.

(iii) Air conditioned buildings have double walled windows

A: Air conditioned buildings have double walled Windows so that the air trapped between the two walls prevents the transfer of heat from both sides

(iv) Asbestos sheets are preferred over iron sheets for roofing

A: Asbestos sheets are preferred over iron sheets for roofing because asbestos is a non-conductor of heat.

36. Differentiate between acids and bases.

Parameters	Acids	Bases
1. Taste	Sour	Bitter
2. Touch	Not soapy	Soapy
3. Effect on litmus paper	Turns blue litmus paper red	Turns red litmus paper blue
4. Effect on yellow turmeric paper	No effect	Turn yellow turmeric paper indicator red
5. Effect on colorless phenolphthalein indicator	No effect	Turn colorless phenolphthalein indicator pink
6. Effect on pink china rose indicator	Turn pink china rose indicator magenta (dark pink)	Turn pink china rose indicator green
7. Solubility in water	Most of the acids are soluble in water	Most of the bases are insoluble in water

37. What are the characteristics of physical changes ?

A: 1. During a physical change, only physical properties such as size, shape, colour and state change.

2. During a physical change, no new substance is formed.

3. Generally a physical change is reversible

4. Generally no overall energy change takes place

38. What are tusks ? How does an elephant make use of tusks for its survival ?

A: . The big and long pointed teeth of elephants are called tusks. Tusks are modified teeth of the elephant.

Elephants use the tusk to tear off the bark of trees which they eat as food. They also used the tusks for fighting with their Enemies and protecting themselves.

OR

38. How does a camel live and survive in a desert ?

A: Adaptation in camel to survive in desert region are

(i) A large amount of water gets stored in its stomach

(ii) It has large soles which help to walk on soft ground.

(iii) It has long legs which keep the body away from the heat of sand

(iv) Long eyelashes protect the eyes from sand.

39. What actions should be taken by the people before a cyclone hits their area ?

A: . The following actions should be taken by the people before a cyclone hits their area.

The people should

(i) Not ignore the warning issued by the Meteorological Department through TV, radio or newspaper.

(ii) Make necessary arrangements to shift the essential household goods, domestic animals, vehicles etc. safer places.

(iii) Avoid driving on roads through standing water as roads get damaged due to floods

(iv) Store enough drinking water, food, clothing, blankets and first aid kits.