

परमाणु ऊर्जा शिक्षण संस्था
Atomic Energy Education Society
वार्षिक परीक्षा 2025-26 / Annual Examination 2025-26

कक्षा/ Class : VII

अवधि/ Duration : 3 Hours

विषय / Subject : Science

अधिकतम अंक/ Maximum Marks : 80

ANSWER KEY

SECTION A

[1X20=20]

1. (b) opaque object blocks the path of light
2. (c) Formation of bones
3. (b) Radiation
4. (a) is a better conductor of heat than the wooden tile
5. (b) Odometer
6. (c) stopwatch
7. (d) the contraction of muscles in the wall of the food pipe
8. (b) Contracts and moves down
9. (c) Neutralise stomach acid and break down fats
10. (c) grinding food in the gizzard
11. (c) 30 km/h
12. (b) Carbon dioxide
13. (c) Dorothy Hodgkin
14. (c) On the ceiling
15. (a) Sundial
16. (d) 24 hours
17. (b) Both A and R are true but R is not the correct explanation of A.
18. (c) A is true but R is false.
19. (d) A is false but R is true.
20. (a) Both A and R are true and R is the correct explanation of A.

SECTION B

21. . Characteristics that help distinguish males from females- 1mark

Any two characteristics in boys- 1 mark

22. . a) the longer one b—1 mark

b) Time period= time taken/ no. of oscillations---½ mark

$$= 60s/60\text{oscillations} = 1s. \text{---} 1/2 \text{ mark}$$

23. Air trapped between the layers of clothing acts as a poor conductor of heat and keeps us warm. The presence of air between two thin blankets is the reason why we prefer them over one thick blanket to keep us warm. (2 marks)
24. Due to increased activity of sweat and oil glands -1 marks , any one correct suggestion (1 mark)
25. a) small intestine-1 mark
b)help in absorption of food- 1 mark
26. Water and minerals are transported to the leaves and other parts of plants through the xylem . The food prepared by plants in the leaves is transported to all parts of the plant. This food is transported through another set of thin tube-like structures called the phloem. (1+1) marks
27. luminous- Torch($\frac{1}{2}$ mark) as it is emitting light of its own-1/2 mark
Non-luminous- Ball (- $\frac{1}{2}$ mark)as it is not emitting any light-1/2 mark
28. help in trapping dust and dirt from the air we breathe in-2 mark
29. summer cloths (1 mark), Australia is in Southern Hemisphere which experiences summer in December.

SECTION C

30. Dos-Be respectful and kind. Think before posting. Protect privacy.
Don'ts - Do not share personal photos with strangers/ virtual friends. Do not share real time data. Do not share passwords. Or any correct answer (1+1+1) marks
31. Fig 7.9, page no.98. (3 marks)
32. Speed of the bicycle = Distance covered / Time taken

$$= 3.6 \text{ km} / 15 \text{ min} = \frac{3.6 \text{ Km} \times 1000 \text{ m} / \text{km}}{15\text{min} \times 60 \text{ s} / \text{min}}$$

$$= \frac{3.6 \times 1000\text{m}}{15 \times 60\text{s}} = 4 \text{ m/s} \quad (3 \text{ marks})$$
33. An object moving along a straight line with a constant speed is said to be in uniform linear motion. On the other hand, if the speed of an object moving along a straight line keeps changing, it is said to be in non-uniform linear motion. An object in uniform linear motion covers equal distances in equal intervals of time, while it covers unequal distances in equal intervals of times when it is in non-uniform linear motion. Example – any one correct example for each. (2+1) marks
34. a) The air we exhale contains more percentage of carbon dioxide than the air we inhale.-1 Mark
b) Lime water turns milky- 1 mark
c) Blood carries oxygen to different parts-1 mark

35. a) stomata-1 mark

b) leaves -1 mark , exchange of gases/transpiration (any one) - 1 mark

36. Activity 11.2, page no 155

Take a long hollow pipe of some flexible material and align it so that you can see the candle flame. Now, bend the pipe and try to see the candle flame again. You could see the candle flame through a straight pipe but not through a bent pipe. This shows that light travels in a straight line. (3 marks)

37. (a) The Earth's axis of rotation points very close to the Pole Star in the Northern Hemisphere.

Therefore, the Pole Star appears nearly stationary in the sky from the Earth. (1)

(b) There is little difference in the intensity of the sunrays falling on the equator in different months. Thus, for the southern states of India that lie close to the equator, the effect of seasons is not very prominent (1)

c) Earth rotates from West to East (1)

SECTION D

38. a) A- oesophagus-1/2 mark B- Stomach-1/2 mark

C- Large Intestine-1/2 mark D- Anus-1/2 mark

b) Removal of waste- / egestion 1mark

c) Stomach- 1mark

d) Bile- 1 mark

39. a. The change in the direction of light by a mirror is called reflection of light. (1)

Periscope , Kaleidoscope (1)

b. The image formed by a plane mirror is of the same size as that of the object, is erect, is at the same distance as that of the object, cannot be obtained on a screen, and is laterally inverted (3)

SECTION E

40. a) Nostril → Nasal cavity → wind pipe → alveoli (1)

b) diaphragm (1)

c) Glucose + oxygen-----→ Carbon dioxide+ Water+ Energy- 1mark

d) any one correct difference (1)

41. a) Solar eclipse (1)

b) (ii) (1)

c) Watching a solar eclipse directly can damage the eyes and should be avoided. (1)

d) A total solar eclipse happens when the Moon fully covers the Sun from the Earth's perspective.(1)