



Indian School Al Wadi Al Kabir

Pre-Midterm Examination (2026-2027)

Sub: SCIENCE

Class: VII

Set I

Max. Marks: 30

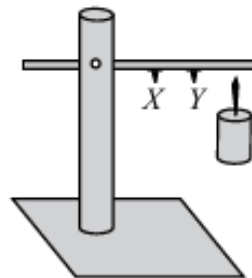
Date: 18/05/2026

Time: 1 Hour

General Instructions:

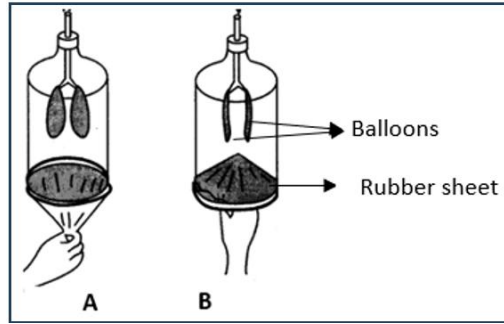
- i. All questions are compulsory. Marks are indicated against each section.
- ii. The question paper comprises 4 pages and 15 questions in 5 sections: A, B, C, D and E.
- iii. Q 1 to Q 4 in **section A** -MCQ carry **ONE** mark each. Write the correct answer along with the option in the answer script.
- iv. Q 5 to Q 7 in **section A** -Assertion and Reason carry **ONE** mark each.
- v. Q 8 to Q 10 in **section B** are Short Answer Type Questions and carry **TWO** marks each.
- vi. Q 11 to Q 13 in **section C** are Short Answer Type Questions and carry **THREE** marks each.
- vii. Q 14 in **section D** is a Long Answer Type Question and carries **FIVE** marks.
- viii. Q 15 in **section E** is a Case study/Paragraph question and carries **THREE** marks.
- ix. Write the same question number as given in the question paper.
- x. Correction fluid should not be used in the answer script.
- xi. Diagrams should be drawn using a pencil.

Q. No.	SECTION A (1x7=7)	Marks
1.	What is considered essential to think like a scientist? (a) Learning from textbooks (b) Asking interesting questions (c) Memorising dates and years (d) Repeating answers	1
2.	Which among the following options is correct regarding the percentage of oxygen and carbon dioxide in inhaled and exhaled air? (a) Inhaled air – 16.4% oxygen and 21% carbon dioxide (b) Exhaled air – 0.04% oxygen and 16.4% carbon dioxide (c) Inhaled air – 21% oxygen and 0.04% carbon dioxide (d) Exhaled air – 4.4% oxygen and 21% carbon dioxide	1
3.	In the given experimental setup, a metal strip is heated at one end. Pins X and Y are fixed at equal distances using wax. Pin Y is closer to the flame. If the positions of the pins are reversed (X near flame, Y away from flame), what will happen to the pins? (a) Pin X will fall first. (b) Pin Y will fall first. (c) Pin X and Y will fall together. (d) None of the pins will fall.	1

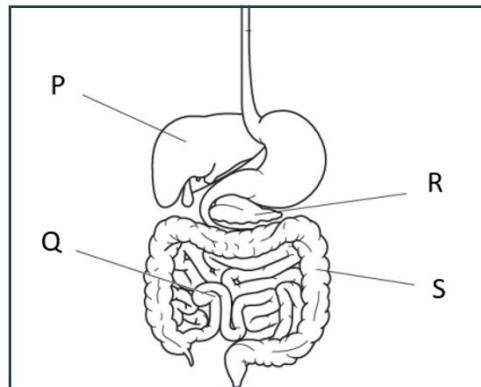


4.	Why is there a reversal of wind direction between day and night in coastal areas? (a) Wind always blows in only one direction and then reverses randomly. (b) The Sun changes its position in the sky. (c) Land and Sea heat and cool at different rates. (d) The Sun heats only the sea during the day.	1
5.	For the following questions, two statements are given- one labelled Assertion (A) and the other labelled Reason (R). Select the correct answer to these questions from the codes (A), (B), (C), and (D) as given below: (A) Both A and R are true, and R is the correct explanation of the assertion. (B) Both A and R are true, but R is not the correct explanation of the assertion. (C) A is true, but R is false. (D) A is false, but R is true. Assertion (A): The cup placed above the burning candle goes down due to the heat. Reason (R): Warm air expands, becomes lighter, and rises upward.	1
6.	Assertion (A): Animals need oxygen continuously to stay alive. Reason (R): Oxygen is required for the breakdown of glucose/food to release energy.	1
7.	Assertion (A): Observations and experiments are important in learning science. Reason (R): Discoveries in one field of science can lead to discoveries in another.	1
SECTION B (2x3=6)		
8.	a) Define rumination. b) How does mechanical digestion take place in birds?	2
9.	a) How does science help us understand the natural world? b) How does the movement of the Earth affect our lives?	2
10.	Explain how human activities and science are connected to environmental responsibility?	2
SECTION C (3x3=9)		
11.	a) State the difference between conductors and insulators of heat. b) Draw a neat labelled diagram of the land breeze.	3
12.	a) Observe the model given below and name the processes demonstrated in: i) A ii) B	3

b) What do the rubber sheet and the balloons in the model represent?

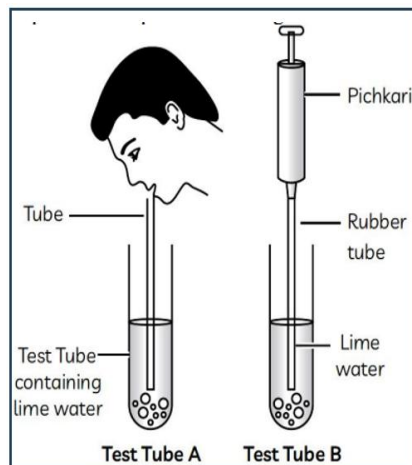


13. a) Identify and name the parts labelled **P**, **Q**, **R** and **S** in the given diagram.
b) Write the name of the digestive juice secreted by **P**.
c) Mention any one function of **Q** in the process of digestion.



SECTION D (5x1=5)

14. a) What is the role of nasal hair and mucus in the respiratory system?
b) What can be concluded from the given activity?



c) Write the word equation for the process of Respiration.

	d) Name the organs responsible for the exchange of gases in: i) Earthworm ii) Fish	
	SECTION E (3x1=3)	
15.	<p>Read the following passage and answer the questions given below.</p> <p>During winter, we prefer wearing woollen clothes to keep ourselves warm. Woollen fabric traps air in its pores, and as air is a poor conductor of heat, it reduces heat flow from our bodies to our surroundings. As a result, we feel warm. Similarly, 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. Houses constructed in places with a very hot or cold climate often use the concept of heat transfer to keep them cool or warm. There are houses with outer walls that are constructed using hollow bricks that keep them warm in winters and cool in summers. This happens because the air that gets trapped in the hollow bricks is a poor conductor of heat.</p> <p>i) Why do we feel warm while wearing woollen clothes?</p> <p>ii) Why are hollow bricks used to construct the outer walls of houses in hot regions?</p> <p>iii) Which one can keep you warmer - A thick blanket or two thin blankets? Give a reason.</p>	3

All the Best