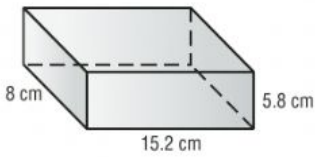
INDIAN SCHOOL AL WADI AL KABIR
Class VIII, Mathematics
WORKSHEET-2 (2025-26)
Mensuration

Multiple Choice Questions

Q.1	The circumference of the base of cylindrical flasks is 44 cm and its height are 10cm. How many litres of water can it hold?							
	A	1.54 litres	B	1540 litres	C	154.0 litres	D	15.4 litres
Q.2	How many 4 m cubes can be cut from a cuboid measuring 72 m x 80 m x 16 m?							
	A	1944 cubes	B	1440 cubes	C	1080 cubes	D	1044 cubes
Q.3	The volume of a cuboid whose length, breadth and height are $2x$, $6x$ and $4x$ is:							
	A	$40x^3$	B	$24x^3$	C	$48x^3$	D	$49x^3$
Q.4	If the height of a cylinder is 2 times the radius of its base, then the total surface area of the cylinder is							
	A	$2\pi r$	B	$2\pi r^3$	C	$6\pi r^2$	D	$4\pi r^2$
Q.5	The volume of a Multipurpose hall is 5000 m³. The area of the floor is 1000 m². The height of the room is:							
	A	1 m	B	2 m	C	3 m	D	5 m
Q.6	The height of a cylinder with lateral surface area $440cm^2$ and diameter of the base is 28 cm is_____.							
	A	0.5 cm	B	5cm	C	2 cm	D	7 cm
Q.7	What is the volume of the prism? 							
	A	208.8 cm³	B	705.28 cm³	C	728.7 cm³	D	802.4 cm³
Q.8.	A cylindrical-shaped glass bottle is half full of milk. Its base radius is 9 cm and its height are 20 cm. The amount of milk in the glass is:							
	A	810π cm³	B	910π cm³	C	360π cm³	D	180π cm³

Q.9	A dressing room having length, breadth and height of 6 m, 4 m and 3 m respectively. The cost of whitewashing the walls of the room and the ceiling at the rate of ₹ 8 per m^2 is _____.							
	A	₹726	B	₹1072	C	₹672	D	₹720
Q.10	A rectangular paper of width 7 cm is rolled along its width and a cylinder of radius 20 cm is formed. Find the volume of the cylinder.							
	A	3080 cm^3	B	3800 m^3	C	8800 cm^3	D	8080 m^2

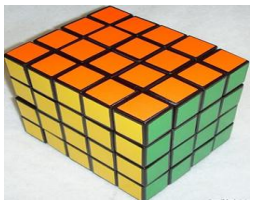
Q.11 **CASE STUDY-1:**


Mohan decided to prepare a vessel from recycled material to provide water for birds. He found a flexible blue-coloured plastic rectangular sheet of length 42 cm and breadth 15 cm**.** He rolled it along its length, joined the two opposite edges using tape, and made a cylindrical vessel with a circular base of radius 7 cm. He also found an old box measuring 15 cm × 10 cm × 10 cm to keep the grains. The cylindrical vessel is half-filled with water for the birds.

Answer the following questions:

1) Find the curved surface area of the cylinder formed.
2) Find the volume of the old box used to feed the birds.
3) How much water is there in the cylindrical vessel?
4) Find the area of the sheet used to make the cylinder.
5) What is the capacity of the cylinder formed?

Q12 **CASE STUDY-1:**



A carpenter wants to make a wooden box that is 60 cm long, 40 cm broad, and 30 cm high. Answer the following questions:

a) Find the cost of covering the box with glitter paper at the rate of ₹2 per cm^2.
b) Cubes each having a surface area of 600 cm^2 are placed inside the box. Find the side of the cube.
c) Find the number of cubes that can be placed in the wooden box.
d) What would be the capacity of a water tank (in litres) having the same dimensions as the wooden box?

Answers	**1**	A	**2**	B	**3**	C	**4**	C
	5	D	**6**	B	**7**	B	**8**	A
	9	C	**10**	C	**11**	1) 660cm² 2) 1500 cm³ 3) 1155 cm³ (or 1.155 litres) 4) 630 cm² 5) 2.31 litres	**12**	a) ₹21,600 b) a=10 cm c) 72. d) 72 litres