

DELHI PUBLIC SCHOOL JAMMU
SESSION (2024-25)
HALF YEARLY EXAMINATION

SAMPLE PAPER

Class: VI
Subject: MATHS

Time: 3 hours
Max. Marks: 80


General Instructions:

- All the questions are compulsory.
- The question paper has 5 sections A, B, C, D and E.
- Section A has 20 Multiple Choice Questions (MCQs) carrying 1 mark each.
- Section B has 5 Short Answer-I (SA-I) type questions carrying 2 marks each.
- Section C has 6 Short Answer-I (SA-II) type questions carrying 3 marks each.
- Section D has 4 Long Answer (LA) type questions carrying 5 marks each.
- Section E has 3 Case-Study based questions (4 marks each) with subparts of the values 1 marks each.
- All questions are compulsory. However, an internal choice in 2Qs of 2 marks, 2Qs of 3 marks and 2Qs of 5 marks has been provided.
- Draw neat figures wherever required.

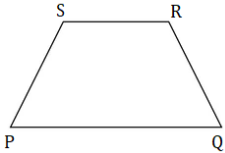
Section – A			
Multiple Choice Questions			
SN			Marks
1	How many thousands make a crore? (a) 10 (b)100 (c)1000 (d)10000		1
2	How many four digit numbers are there in all ? (a)8000 (b)9000 (c)9989 (d)8999		1
3	Which one is the greatest of the following? (a)572845 (b)569784 (c) 572685 (d)570987		1
4	How many zeros are there in ten crore? (a)6 (b)7 (c)8 d) (9)		1
5	How many whole numbers are smaller than 9? (a)7 (b)9 c) (8) (d)10		1
6	The natural number that has no predecessor is (a) 1 (b) 10 (c) 100 (d) 1000.		1
7	The predecessor of 100 is (a) 101 (b) 100 (c) 99 (d) none of these.		1

8	_____ is the smallest whole number. (a) -1 (b) 1 (c) 0 (d) none of these	1
9	The LCM of 5 and 20 is (a) 5 (b) 10 (c) 15 (d) 20.	1
10	Which of the following numbers is divisible by 11? (a) 1111111 (b) 22222222 (c) 3333333 (d) 4444444	1
11	7563 is divisible by (a) 11 (b) 2 (c) 3 (d) 5.	1
12	The succeeding number of the number - 1 is (a) - 1 (b) 1 (c) 0 (d) -11.	1
13	Which of the following is true? (a) $0 < - 8$ (b) $0 > - 8$ (c) $4 < - 4$ (d) $0 > 6$	1
14	An integer between - 3 and - 1 is (a) - 3 (b) - 1 (c) - 2 (d) 0	1
15	A figure formed by two rays with a common initial point is (a) a line segment (b) a line (c) a ray (d) an angle	1
16	How many lines can be drawn through given two points? (a) Only one (b) 2 (c) 4 (d) Countless	1
17	Which of the following has two end points? (a) Line (b) Ray (c) Line-segment (d) None of these	1
18	The vertex of an angle lies (a) in its interior (b) in its exterior (c) on the angle (d) none of these	1
	(Q19-Q20) <u>Assertion and Reason Based Questions</u> This type of reasoning questions consists of two statements; an assertion (statement of fact) and a reason (explanation for the assertion). You have to determine whether each statement is correct. If both the statements are correct, you have to determine whether the reason supports the assertion. There will be four answer choices for the possible outcomes and you have to select the correct one.	

19	Assertion (A) – A line has no end point Reason (R) – A line extends indefinitely in all directions. a) Both A and R are true and R is the correct explanation of A b) Both A and R are true but R is not the correct explanation of A c) A is true but R is false d) A is false but R is true	1
20	Assertion (A) – 2 is a prime number. Reason (R) – Prime numbers are those numbers which have more than two factors. a) Both A and R are true and R is the correct explanation of A b) Both A and R are true but R is not the correct explanation of A c) A is true but R is false d) A is false but R is true	1

Section-B		
21	Form the greatest 6-digit number using the digits 1,4,3,5,0 and 7 each only once OR Write the greatest and the smallest 8-digit numbers using different digits.	2
22	How many whole numbers are there between 32 and 53?	2
23	Find the common factors of 4, 12 and 16. OR Write all prime numbers between 10 and 35	2
24	Do as directed (a) Find the additive inverse of -415 (b) Write any four integers less than -10	2
25	Name the given line in two different ways. 	2

Section-C		
26	A factory produces 8565 screws in a day. How many screws will it produce in a year if the factory has 291 working days in a year ?	3
27	Represent each of the following on the number line: (i) $3+2$ (ii) $8-6$	3


28	The sum of two integers is 156. If one of them -24. Find the other number. OR From the sum of 26 and -42 , subtract (-70) .	3
29	Test the divisibility of 57624 by 6.	3
30	Find the HCF of 120, 144 and 204 by long division method. OR Find the LCM of 20, 24 and 36 by common division method.	3
31	How many angles are formed in each of the following figures? Name the angles. 	3

Section-D		
32	Find the largest number which divides 615 and 963 leaving remainder 6 in each case. OR In a morning walk, three persons step off together. Their steps measure 80 cm, 70 cm and 75 cm, respectively. What is the minimum distance each should walk so that all can cover the same distance in complete steps?	5
33	If 45kg 450g of sugar be equally distributed among 15 persons, how much will each get? OR Samaksh had Rs 10,00,000 with him. He purchased a TV for Rs 16,750, a motorcycle for Rs 45,000 and a flat for Rs 8,50,000. How much money was left with him?	5
34	Draw rough diagrams of two angles such that they have (a) One point in common (ii) two points in common (c) three points in common. (iv) four points in common (v) One ray in common	5
35	Find the sum. (a) $(-7) + (-9) + 4 + 16$ (b) $(37) + (-2) + (-65) + (-8)$	5

Section-E		
Case Study based Questions		
36	A merchant has 120 litres of oil of one kind and 240 litres of another kind. He wants to sell the oil by filling the two kinds of oil in tins of equal capacity. What should be the greatest capacity of such a tin?	4

	<p>I. The LCM of 120 and 240 is_____</p> <p>a)210 b)240 c)260 d)280</p> <p>II. The HCF OF 120 and 240 is_____</p> <p>a) 120 b)130 c)140 d)150</p> <p>III. what are the prime factors of 120 ?</p> <p>a) $2 \times 2 \times 2 \times 3 \times 4$ b) $2 \times 2 \times 2 \times 3 \times 5$ c) $2 \times 2 \times 2 \times 2 \times 2$ d) $2 \times 2 \times 2 \times 2 \times 5$</p> <p>IV. The Difference between LCM and HCF is_____</p> <p>a) 120 b)130 c)140 d)150</p>	
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37	<p>The table below shows the scores for three teams A,B and C playing four rounds of a game</p> <table border="1" data-bbox="277 747 1398 905"> <thead> <tr> <th>Rounds</th> <th>Round 1</th> <th>Round 2</th> <th>Round 3</th> <th>Round 4</th> </tr> </thead> <tbody> <tr> <td>Team A</td> <td>-5</td> <td>10</td> <td>-5</td> <td>5</td> </tr> <tr> <td>Team B</td> <td>10</td> <td>10</td> <td>-5</td> <td>0</td> </tr> <tr> <td>Team C</td> <td>-5</td> <td>-5</td> <td>10</td> <td>10</td> </tr> </tbody> </table> <p>(i) Which team out of three is the winner ?</p> <p>a) Team A b) Team B c) Team C d) none of these</p> <p>(ii) Which team has the least score after four rounds ?</p> <p>a) Team A b) Team B c) Team C d) none of these</p> <p>(iii) What is the difference between the scores of Team A and Team B after 4 rounds ?</p> <p>a) 5 b) 10 c) 15 d) -5</p> <p>(iv) What is the difference between the scores of Team A and Team C after 4 rounds ?</p> <p>a) 5 b) 10 c) 15 d) -5</p>	Rounds	Round 1	Round 2	Round 3	Round 4	Team A	-5	10	-5	5	Team B	10	10	-5	0	Team C	-5	-5	10	10	4
Rounds	Round 1	Round 2	Round 3	Round 4																		
Team A	-5	10	-5	5																		
Team B	10	10	-5	0																		
Team C	-5	-5	10	10																		

38	<p>The students were asked to draw a closed figure with few points inside the figure, few points outside the figure and few on the boundary of the figure. One of the child drew a figure like this:</p>  <p>(1)Where do points C, Z, M lie in the figure?</p>	4
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<p>(a) Interior (b) Exterior (c) On the boundary (d) None of the above.</p> <p>(2) Which points lie in the exterior of the figure?</p> <p>(a) Q, R, O, S (b) C, Z, M (c) P, K (d) All of these</p> <p>(3)What kind of figure is it ?</p> <p>(a) Point (b) Simple closed figure(c) Circle (d) None</p> <p>(4) Where does the point P and k lie in the figure ?</p> <p>a) Interior (b) Exterior (c) On the boundary (d) None of the above</p>	
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Reflection Box					
1. How confident do you feel about your understanding of the topics covered in this assessment?	A) Very Confident		B) Somewhat Confident		C) Not Confident
2. How well do you think you prepared for this assessment?	A) Very Well		B) Somewhat Well		C) Not Well
3. What do you think you could have done differently to improve your performance on this assessment?	A) Studied thoroughly		B) Practiced more		C) Asked for help from the teachers or peers.