



INDIAN SCHOOL SALALAH

FIRST TERM EXAMINATION – SEPTEMBER 2025



Class: VI

MATHEMATICS (041)

Date: 23/09/2025

Time: 3 hours

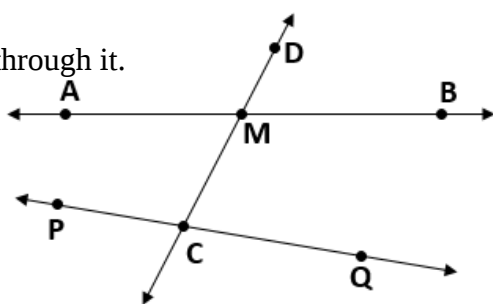
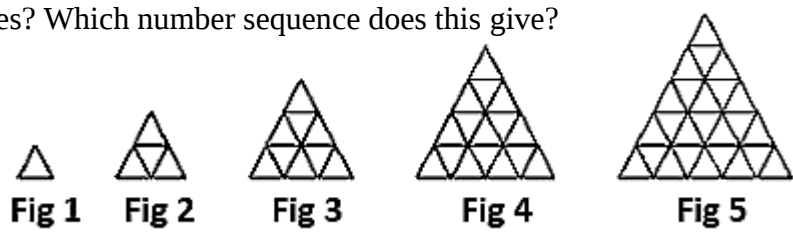
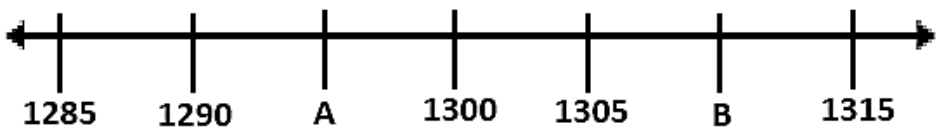
Maximum Marks: 80

General Instructions:

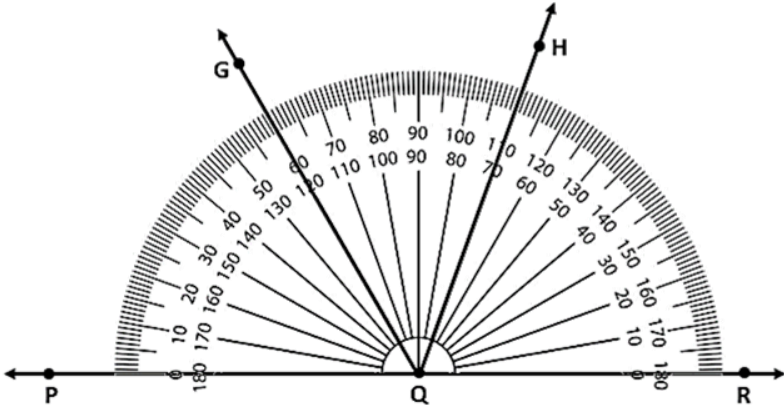
- a) All questions are compulsory.
- b) This question paper consists of 30 questions divided into 4 sections.
- c) Section A contains 6 questions of 1 mark each. Section B contains 6 questions of 2 marks each.
Section C contains 10 questions of 3 marks each. Section D contains 8 questions of 4 marks each.

NO	SECTION A	MARKS
1	The next number in the series 1, 2, 3, 5, 8, 13..... is _____. a) 15 b) 21 c) 20 d) 25	1
2	The measure of a complete angle is _____. a) 180° b) 90° c) 270° d) 360°	1
3	On a number line, 7256 would be exactly between _____. a) 7250 & 7500 b) 7350 & 7500 c) 7450 & 7500 d) 7000 & 7250	1
4	Which of the following numbers is divisible by 4? a) 134 b) 238 c) 342 d) 748	1
5	Two lines that meet at right angles are called _____. a) bisector b) perpendicular c) line segment d) none of these	1
6	Which of the following numbers is both a triangular number and a square number? a) 36 b) 25 c) 10 d) 16	1
	SECTION B	
7	In a pictograph, 3 pictures of apples are used to show the number of apples sold in a week. If each picture represents 10 apples, how many apples were sold in that week?	2

8	If we group the 5-digit numbers between 45,000 and 85,000 such that all of their digits are odd: a) What is the largest number in the group? b) What is the smallest number in the group?	2
9	a) While drawing bar graph, the horizontal axis represents the _____ axis. b) _____ are the counts of the occurrences of values, measures, or observations. c) Facts, numbers, measures, observations, and other descriptions of things that convey information about those things is called _____ d) _____ represent data in the form of pictures, objects, or parts of objects.	2
10	How many rounds does the number 9210 take to reach the Kaprekar constant? (Show the calculations in each step)	2
11	a) What is the numerical value represented by $\overline{\text{NN}} \text{ III}$? b) 10 students are participating in the Math Day quiz from class VI. Represent the number of students in a tally mark.	2
12	a) Who am I? _____ . I am less than 50 and a multiple of 9. The sum of my digits is 9, and I am also a multiple of 5. b) State whether each of the following statements is Always true, Sometimes true, or Never true. i) 3-digit number + 3-digit number gives a 5-digit number. ii) 4-digit number – 2-digit number gives a 3-digit number.	2
SECTION C		
13	a) What is the smallest prime number that has 4 different prime factors? b) Which is the greatest prime number less than 50? c) A number for which the sum of all its factors is equal to twice the number is called a _____ number.	3

14	A class of 30 students was asked to name their favourite fruit. The responses are given below. <table border="1"><tr><td>Apple</td><td>Banana</td><td>Orange</td><td>Strawberry</td><td>Apple</td><td>Banana</td></tr><tr><td>Strawberry</td><td>Orange</td><td>Apple</td><td>Banana</td><td>Strawberry</td><td>Apple</td></tr><tr><td>Orange</td><td>Apple</td><td>Banana</td><td>Apple</td><td>Orange</td><td>Strawberry</td></tr><tr><td>Apple</td><td>Banana</td><td>Orange</td><td>Strawberry</td><td>Banana</td><td>Apple</td></tr><tr><td>Orange</td><td>Strawberry</td><td>Banana</td><td>Apple</td><td>Apple</td><td>Banana</td></tr></table> Make a frequency distribution table to show the number of students who chose each fruit.	Apple	Banana	Orange	Strawberry	Apple	Banana	Strawberry	Orange	Apple	Banana	Strawberry	Apple	Orange	Apple	Banana	Apple	Orange	Strawberry	Apple	Banana	Orange	Strawberry	Banana	Apple	Orange	Strawberry	Banana	Apple	Apple	Banana	3
Apple	Banana	Orange	Strawberry	Apple	Banana																											
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15	From the given figure, name a) 2 rays with M as its initial point. b) 2 points with exactly 2 lines passing through it. c) An angle with vertex C. 	3																														
16	In the treasure hunting game, Grumpy has kept treasures on 24 and 30. What jump sizes will land on both the numbers?	3																														
17	a) Which sequence do you get when you start to add the counting numbers up? (Show the calculations) b) How many little triangles are there in each shape of the sequence of Stacked Triangles? Which number sequence does this give? 	3																														
18	a) Write the smallest palindromic 4-digit number. b) Write the numbers indicated by A and B in the given number line.  c) Which of the following numbers are in supercell in the given table? <table border="1"><tr><td>208</td><td>1895</td><td>1734</td><td>543</td><td>792</td></tr></table>	208	1895	1734	543	792	3																									
208	1895	1734	543	792																												

19	Classify as right angle, acute angle, obtuse angle, reflex angle, or straight angle a) 180° b) 270° c) 98° d) 5° e) 72° f) 181°	3																					
20	a) What is the sum of the first 40 odd numbers? b) Why are the numbers 1, 3, 6, 10, 15, ... are called triangular numbers? c) Fill in the missing numbers : $2 + 4 + \underline{\hspace{1cm}} + 8 = \underline{\hspace{1cm}}$	3																					
21	a) Find the product of the smallest composite number and the smallest prime. b) Give the prime factorisation of 245.																						
22	The following pictograph shows the number of pears in 6 bags Find the following. <table border="1"> <thead> <tr> <th>Bag</th><th>Pears</th><th>1  = 2 pears</th></tr> </thead> <tbody> <tr> <td>1</td><td></td><td></td></tr> <tr> <td>2</td><td></td><td></td></tr> <tr> <td>3</td><td></td><td></td></tr> <tr> <td>4</td><td></td><td></td></tr> <tr> <td>5</td><td></td><td></td></tr> <tr> <td>6</td><td></td><td></td></tr> </tbody> </table> a) Bag with the maximum number of pears. b) Bag with the minimum number of pears. c) Total number of pears in all the bags.	Bag	Pears	1  = 2 pears	1			2			3			4			5			6			3
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4																							
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6																							
SECTION D																							
23	a) Use prime factorisation to verify whether 15 and 18 are coprime. b) Identify whether each statement is true or false. i) There is no prime number whose unit's digit is 4. ii) All even numbers are composite numbers.	4																					
24	Draw an angle measuring 75° using a protractor. a) Name it as $\angle PQR$. b) What type of angle is it?	4																					
25	a) A honeycomb is in a hexagonal pattern. The first row has 1 cell, the second has 7 cells, and the third has 19 cells. Then what will be the number of cells in the fourth row? b) Find out the missing numbers and figure out the rule used for the pattern 1,5,9,13,_____,_____	4																					

26	The table below shows the number of Maths textbooks sold by a shopkeeper in six days. Draw a bar graph to represent this data. <table><tr><th>Days</th><th>Number of books sold</th></tr><tr><td>Saturday</td><td>35</td></tr><tr><td>Sunday</td><td>20</td></tr><tr><td>Monday</td><td>50</td></tr><tr><td>Tuesday</td><td>10</td></tr><tr><td>Wednesday</td><td>25</td></tr><tr><td>Thursday</td><td>15</td></tr></table>	Days	Number of books sold	Saturday	35	Sunday	20	Monday	50	Tuesday	10	Wednesday	25	Thursday	15	4				
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27	a) Find the difference between the largest and smallest 4-digit numbers that can be made using the digits 4, 7, 3 and 2 without repeating the digits. b) Write the smallest 2-digit number whose digit sum is 11.	4																		
28	Match the following <table><tr><th>Column A (Sequences)</th><th>Column B (Names)</th></tr><tr><td>1) 1, 2, 4, 8, 16, 32, ...</td><td>a) Squares</td></tr><tr><td>2) 1, 3, 6, 10, 15, 21, ...</td><td>b) Powers of 3</td></tr><tr><td>3) 1, 8, 27, 64, 125, ...</td><td>c) Triangular numbers</td></tr><tr><td>4) 1, 3, 9, 27, 81, 243, ...</td><td>d) Virahānka numbers</td></tr><tr><td>5) 2, 4, 6, 8, 10, 12, ...</td><td>e) Cubes</td></tr><tr><td>6) 1, 2, 3, 5, 8, 13, ...</td><td>f) Even numbers</td></tr><tr><td>7) 1, 4, 9, 16, 25, 36, ...</td><td>g) Odd numbers</td></tr><tr><td>8) 1, 3, 5, 7, 9, 11, ...</td><td>h) Powers of 2</td></tr></table>	Column A (Sequences)	Column B (Names)	1) 1, 2, 4, 8, 16, 32, ...	a) Squares	2) 1, 3, 6, 10, 15, 21, ...	b) Powers of 3	3) 1, 8, 27, 64, 125, ...	c) Triangular numbers	4) 1, 3, 9, 27, 81, 243, ...	d) Virahānka numbers	5) 2, 4, 6, 8, 10, 12, ...	e) Cubes	6) 1, 2, 3, 5, 8, 13, ...	f) Even numbers	7) 1, 4, 9, 16, 25, 36, ...	g) Odd numbers	8) 1, 3, 5, 7, 9, 11, ...	h) Powers of 2	4
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29	Find the degree measures of $\angle PQG$, $\angle PQH$, $\angle GQH$, and $\angle GQR$. Show necessary calculations. 	4																		

30	a) Time on the clock is 03:30, which is a palindromic time. How many minutes until the clock shows the next palindromic time? b) How many times does the digit 5 appear when writing all the numbers from 1 to 100? c) Change 235 to a palindromic number by reversing and adding. d) How many three-digit numbers are there?	4
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