

# VASISHTHA GENESIS SCHOOL, BARDOLI

(Academic Session: 2025-26)

Date: \_\_\_\_\_

Class: VIII Div: A/B/C/D

Roll No: \_\_\_\_\_

Sub: Maths

Worksheet: Pattern in Mathematics

Data Handling and Presentation

Name: \_\_\_\_\_

<b>A</b>	<b>Fill in the Blanks</b> _____ is a collection of facts or information. Data collected by a person himself is called _____ data. Data taken from books or internet is called _____ data. Unorganized data is called _____ data. The number of times a value occurs is called _____. A pictograph uses _____ to represent data. Bars in a bar graph can be drawn _____ or vertically. 1, 3, 6, 10 are _____ numbers. 1, 4, 9, 16 are _____ numbers. The 7th triangular number = ____ $12^2 =$ ____ A square with side 9 has ____ dots. Number of line segments from 6 points = ____ A number arranged as $4 \times 5$ has ____ dots and is a _____ number
<b>B</b>	<b>Section A: Multiple Choice Questions (MCQs)</b> Which of the following is a triangular number? a) 24            b) 28            c) 30            d) 32 Which number is a perfect square? a) 121           b) 130           c) 140           d) 150 Which number is both triangular and square? a) 36            b) 49            c) 64            d) 81 Which number can be arranged in the maximum number of rectangular ways? a) 18            b) 20            c) 24            d) 27 The number of line segments formed by 8 points is: a) 24            b) 28            c) 32            d) 36 Which graph uses symbols? a) Bar graph    b) Pictograph   c) Line graph   d) Table
<b>C</b>	<b>Do as Directed</b> 1) Complete the series: i) 1, 3, 6, 10, __, __ ii) 1, 4, 9, 16, __, __ iii) 2, 6, 12, 20, __, __

2) Arrange 12 dots in two different rectangular forms.

3) Find the difference between the 8th square number and 8th triangular number.

4) Draw dots to show the 4th triangular number.

5) Draw dots to show the 3rd square number.

6) The favourite colours of students are recorded:

Red red yellow green yellow green blue blue blue red red yellow green green green red red yellow blue  
blue red red yellow green blue red red red yellow blue

Answer the following:

- a) Which colour is most liked? \_\_\_\_\_
- b) How many students like Green? \_\_\_\_\_
- c) Which colour is least liked? \_\_\_\_\_
- d) Total number of students = \_\_\_\_\_
- e) Draw a tally mark table
- f) Draw a pictograph
- g) Draw a bargraph for the above information?

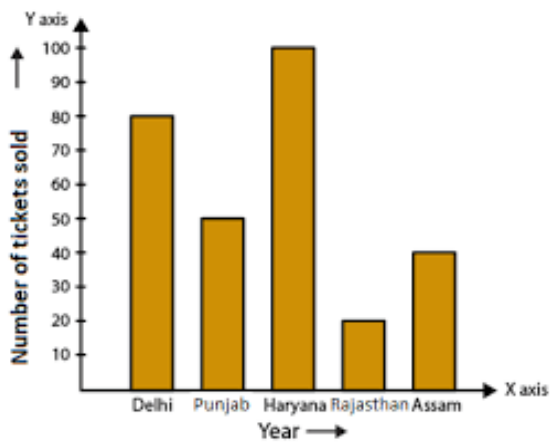
### 7) Pictograph

Each ★ represents 5 students.

Sport	Football	Cricket	Hockey	Tennis	Volleyball
Students	★ ★ ★ ★	★ ★ ★ ★ ★	★ ★ ★ ★ ★	★ ★ ★	★ ★

- How many students like Cricket? \_\_\_\_\_
- Which sport is least popular? \_\_\_\_\_
- How many students like Tennis? \_\_\_\_\_
- How many more students like Cricket than Hockey? \_\_\_\_\_

### 8) Observe the bargraph and answer the following



- Which place was visited the most?
- Which place was least visited?
- Total number of tickets sold?
- how many more tickets were sold in Haryana than Punjab?