|                                 | INDIAN SCHOOL AL WADI AL KABIR                                 |                                  |
|---------------------------------|--|----------------------------------|
| CLASS: XI                       | DEPARTMENT: SCIENCE 2024 – 25<br>SUBJECT: ENGINEERING GRAPHICS | DATE OF<br>SUBMISSION:30.01.2025 |
| WORKSHEET NO: 6<br>WITH ANSWERS | UNIT 6: ISOMETRIC PROJECTION                                   | NOTE:<br>A4 FILE FORMAT          |
| CLASS & SEC:<br>XI C/G          | NAME OF THE STUDENT:   | ROLL NO.                         |

| MULTIPLE CHOICE QUESTIONS   |         |
|---|---------|
| The isometric projection of a circle is                                   |         |
| a) Ellipse  |         |
| b) Circle   |         |
| c) Sphere   |         |
| d) None of the above  |         |
| In isometric projection all the three principal axes are inclined at an a | ngle of |
| a) 30 degree  |         |
| b) 45 degree  |         |
| c) 120 degree   |         |
| d) 90 degree  |         |
| The angle difference between true scale and isometric scale is            |         |
| a) 30 degree  |         |
| b) 15 degree  |         |
| c) 45 degree  |         |
| d) None of the above  |         |
| The isometric length is measured in isometric scale at an angle of        |         |
| a) 90 degree  |         |
| b) 45 degree  |         |
| c) 30 degree  |         |
| d) 20 degree  |         |
| The true length is measured in isometric scale at an angle of             |         |
| a) 15 degree  |         |
| b) 90 degree  |         |
| c) 45 degree  |         |
| d) 30 degree  |         |

| i. Isometric projection is smaller than actual drawings up to the valuea) 82 % |  |
|--|--|
| b) 90 %  |  |
| c) 75%   |  |
| d) None of the above   |  |
| . The word isometric means   |  |
| a) unequal   |  |
| b) equal measure   |  |
| c) parallel  |  |
| d) perpendicular   |  |
| 3. The lines which are parallel to the isometric axes are called               |  |
| a) Parallel lines  |  |
| b) Perpendicular lines   |  |
| c) Non-isometric lines   |  |
| d) Isometric lines   |  |

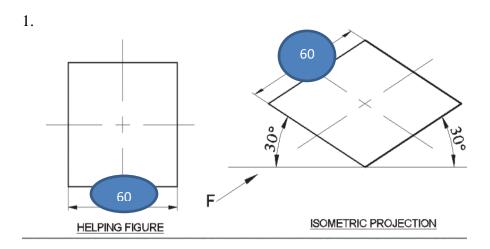
## **Descriptive Type Questions**

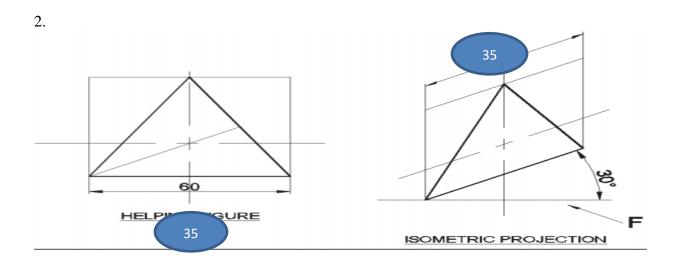
- 1. Draw the isometric projection of square of 60 mm in HP.
- 2. Draw the isometric projection of an equilateral triangle of 35 mm in VP.
- 3. Draw the isometric projection of pentagon of 30 mm in HP.
- 4. Draw the isometric projection of hexagon of 50 mm in VP
- 5. Draw the isometric projection of a rectangle ABCD having AB = 40 mm and AD = 60 mm, standing on the horizontal plane on one of its sides AB.
- 6. Draw the isometric projection of circle of 50 mm diameter having its surface parallel to HP.

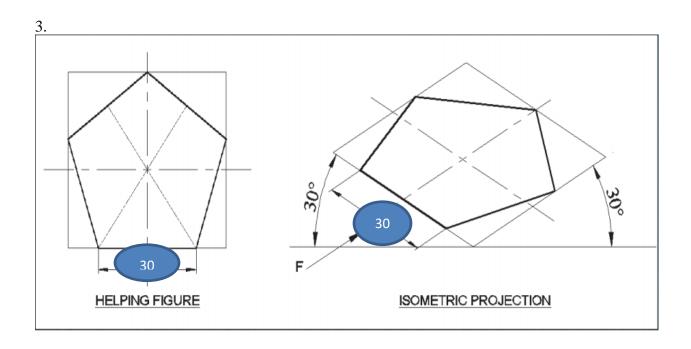
## MULTIPLE CHOICE QUESTIONS ANSWERS

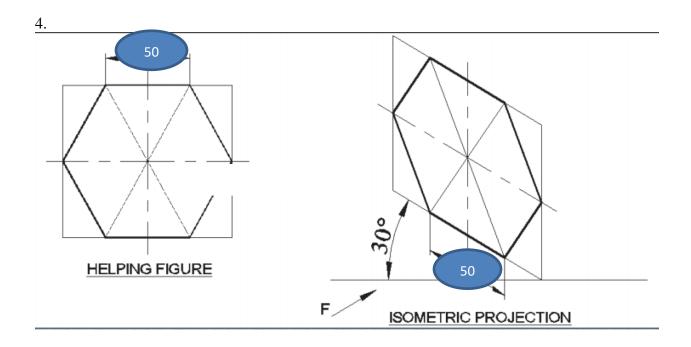
| S.NO | ANSWERS            |
|------|--------------------|
| 1.   | a) Ellipse         |
| 2.   | c) 120 degree      |
| 3.   | b) 15 degree       |
| 4.   | c) 30 degree       |
| 5.   | c) 45 degree       |
| 6.   | a) 82%             |
| 7.   | b) equal measure   |
| 8.   | d) isometric lines |

## **SOLUTIONS FOR DRAWINGS**

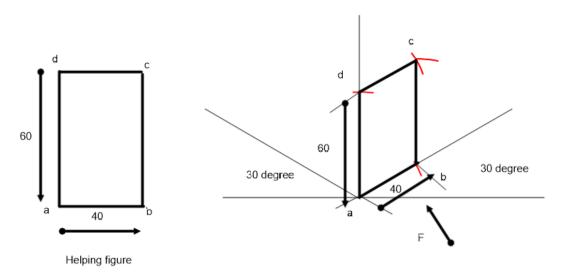


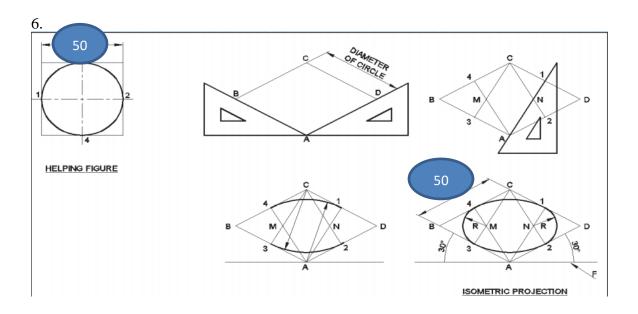






## Isometric projection of rectangle





| Prepared by:       | Checked by: |
|--------------------|-------------|
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