



### MATHS

# **BOOKS - SWAN PUBLICATION**

# **VISUALISING SOLID SHAPES**

Exercise 151

1. Match the two dimensional figure with the

names



Watch Video Solution

# 2. Match the three dimensional shapes with

the names.



**3.** Identify the nets which can be used to make cubes (cut out copies of the nets and try it):



#### 4. Identify the nets which can be used to make

cubes (cut out copies of the nets and try it):





5. Identify the nets which can be used to make

cubes (cut out copies of the nets and try it):



**6.** Identify the nets which can be used to make cubes (cut out copies of the nets and try it):



8. Draw a net for the following cylinder.





#### 9. Draw the net of the solid given in figure.



**10.** Dice are cubes with dots on each face. Oppsite faces of a die always have a total or seven dots on them. Following are two nets to make dice (cuber) the number Inserted in each square. Indicate the number of dots in that box insert suitable number in the blank squaes.



**11.** Dice are cubes with dots on each face. Oppsite faces of a die always have a total or seven dots on them. Following are two nets to make dice (cuber) the number Inserted in each square. Indicate the number of dots in that box insert suitable number in the blank

squares.







#### 12. Which solid will be obtained by folding the

ŝ

#### following net ?





#### 13. Complete the following table



Face		3		
Edges	.12			8
Vertices	8		10	



Watch Video Solution

#### 14. Multiple choice questions

Out of following which is 3-D figure ?

A. Square

- B. Triangle
- C. Sphere
- D. Circle

Answer: C



15. Multiple choice questions

Total number of faces a cylinder has :

A. 0

B. 2

C. 1

D. 3

Answer: D

## Watch Video Solution

**16.** Multiple choice questions

How many edges are there in a square

pryamid ?

A. 5

B. 8

C. 7

D. 4

Answer: B

#### Watch Video Solution

17. Multiple choice questions

Sum of number on the opposite faces of a die

A. 8

B. 7

C. 9

D. 6

Answer: B

Watch Video Solution

18. Multiple choice questions

Which is not a solid figure ?

#### A. Cuboid

- B. Sphere
- C. Quadrilateral
- D. Pyramid

#### Answer: C

Watch Video Solution

Exercise 15 2

**1.** Give (i) an oblique sketch and (ii) an isometric sketch for each of the following:An isometric sheet is attached at the end of the book. You could try to make on it some cubes or cuboids of dimensions specified by your friend.

A cube with an edge 4 cm long.

Watch Video Solution

**2.** Draw

an oblique sketch

A cuboid of length 6cm, breadth 4cm and

height 3cm

Watch Video Solution

3. Draw

Isometric sketch for

A cuboid of length 6cm, breadth 4cm and

height 3cm





**4.** Draw

Isometric sketch for

A cuboid of length 6cm, breadth 4cm and

height 3cm

Watch Video Solution

**5.** Three cubes each with 2 cm edge are placed side by side to form a cuboid. Sketch an oblique or isometric sketch of this cuboid



**6.** Draw an Isometric sketch of trianguiar pyramid with base as equilateral triangle of 6cm and height 4cm.



7. Draw an Isometric sketch of trianguiar pyramid with base as equilateral triangle of 6cm and height 4cm.





8. Make an oblique sketch for each of the given

#### Iso metric shapes



Watch Video Solution

#### 9. Make an oblique sketch for each of the given

#### Iso metric shapes



#### Watch Video Solution

**10.** Using an isometric dot paper draw the solid shape formed by the given net.





**11.** Multiple choice questions :-

An oblique sheet is made up of

A. Rectangles

**B.** Squares

C. Right angled triangles

D. Equilateral triangles

Answer: B

Watch Video Solution

12. Multiple choice questions :-

An isometric sheet is made up of dots forming

A. Squares

**B.** Rectangles

C. Equilateral triangles

D. Right angled triangle

Answer: C

Watch Video Solution

13. Multiple choice questions :-

An oblique sketch has

A. Proportional lengths

**B.** Parallel lengths

C. Non proportional lengths

D. Perpendicular lengths

Answer: C

Watch Video Solution

14. Multiple choice questions :-

An Isometric sketch has.

A. Non proportional lengths

**B.** Parallel lengths

C. Prependicular lengths

D. Proportional lengths

Answer: D

Watch Video Solution

15. Multiple choice questions :-

Isometric sketch shows objects of

A. Two dimensions

B. Shadows

C. Three dimensions

D. One dimension

#### Answer: C

Watch Video Solution













#### 5. If three tubes of dimensions 2 cm $\, imes\,$ 2 cm

imes 2 cm are placed side by side, what would

be the dimensions of resulting cuboid?



**6.** If we throw light on the following solids from the top name the shape of shadow obtained in each case and also give a rough

#### sketch of the shadow.



Watch Video Solution

**7.** What cross-sections do you get when you are given a.

(i) Vertical cut

(ii) Horizontal cut to the following solids?

A die

Watch Video Solution

**8.** What cross-sections do you get when you are given a.

(i) Vertical cut

(ii) Horizontal cut to the following solids?

A square pyramid

Watch Video Solution

**9.** What cross-sections do you get when you are given a.
(i) Vertical cut

(ii) Horizontal cut to the following solids?

A round melon

Watch Video Solution

**10.** What cross-sections do you get when you are given a.

(i) Vertical cut

(ii) Horizontal cut to the following solids?

A circular pipe

**11.** What cross-sections do you get when you give a

(i) vertical cut (ii) horizontal cut to the following solids?

A brick

Watch Video Solution

12. What cross-sections do you get when you

give a

(i) vertical cut (ii) horizontal cutto the

following solids?

An ice cream cone



13. If we throw light on following solids, from

left name the shape of shadow in each and also give a rough sketch of the shadow.





**14.** Here are the shadows of some 3-D objects, when seen under the lamp of an overhead projector. Identify the solids that match



**15.** Here are the shadows of some 3-D objects, when seen under the lamp of an overhead projector. Identify the solids that match





**16.** Here are the shadows of some 3-D objects, when seen under the lamp of an overhead projector. Identify the solids that match





**17.** Here are the shadows of some 3-D objects, when seen under the lamp of an overhead projector. Identify the solids that match





**18.** Sketch the front, side and top view of the

following figures.



19. Sketch the front, side and top view of the

following figures.





**20.** Sketch the front, side and top view of the following figures.



# **21.** Sketch the front, side and top view of the

following figures.





# 22. Multiple choice questions :-

The number of cubes in the given structures ?

A. 12

B. 0

C. 9

D. 8

#### Answer: A



23. Multiple choice questions :-

The number of unit cubes to be added in above students to make a cuboid of dimensions 4 unit  $\times$  2 unit  $\times$  3 unit is? A. 11

B. 12

C. 13

D. 24

Answer: B



24. Multiple choice questions :-

What cross-section is made by vertical cut in a

cuboid ?

## A. Square

- B. Rectangle
- C. Circle
- D. Triangle

#### Answer: B



25. Multiple choice questions :-

What cross section is made by horizontal cut

in a cone ?

A. Triangle

- B. Circle
- C. Square
- D. Rectangle

#### Answer: B



26. Multiple choice questions :-

Which solid cast a shadow of triangle under

the effect of light ?

A. Sphere

- B. Cylinder
- C. Cone
- D. Cube

#### Answer: C



# Other Important Questions I Multiple Choice Questions

1. Identify the top view of the solid:







Β.



D. None of these

Answer: A

Watch Video Solution

2. Identify the top view of the solid





D. None of these

#### Answer: C



# 3. Identify the front view of the solid





D. None of these

#### Answer: C

## 4. Identify the side view of the solid









D. None of these

#### Answer: B



# 5. Match the nets with appropriate solids







#### Answer: A::B::C::D



# 6. A cube has ..... vertices and ..... edges.

A. 6, 8

B. 8, 12

C. 6, 12

D. None of these

#### **Answer: B**



#### 7. A cuboid has ...... faces and ..... vertices.

A. 6, 12

#### B. 8, 12

D. None of these

Answer: C

Watch Video Solution

8. Football is an example of .....

A. Cube

B. Cylinder

C. Cuboid

D. Sphere





9. A book is an example of .....

A. Pyramid

B. Cylinder

C. Cuboid

D. Sphere

Answer: C



# 10. Which of the following is not an example of

a solid?

A. Cylinder

B. Quadrilateral

C. Cone

D. Cube

Answer: B





11. A solid having no vertex or edge is known

as .....

A. Cone

B. Cylinder

C. Sphere

D. Cube

#### Answer: C

12. Base of a cone is.....

A. Square

- B. Quadrilateral
- C. Circle
- D. Rectangle

Answer: C



# 2. A cone has ..... faces and ..... edges.



4. Multiple choice questions :-

What cross-section is made by vertical cut in a

cuboid?



**1.** A sphere has 2 faces.



is seven.

Watch Video Solution

3. Sketch of 2D objects is drawn on isometric

sheet.



**4.** What cross-sections do you get when you are given a.

(i) Vertical cut

(ii) Horizontal cut to the following solids?

A round melon

5. A triangle in which all the sides are equal in

length is an .....triangle.

Watch Video Solution

**6.** Plane figures are three dimensional.