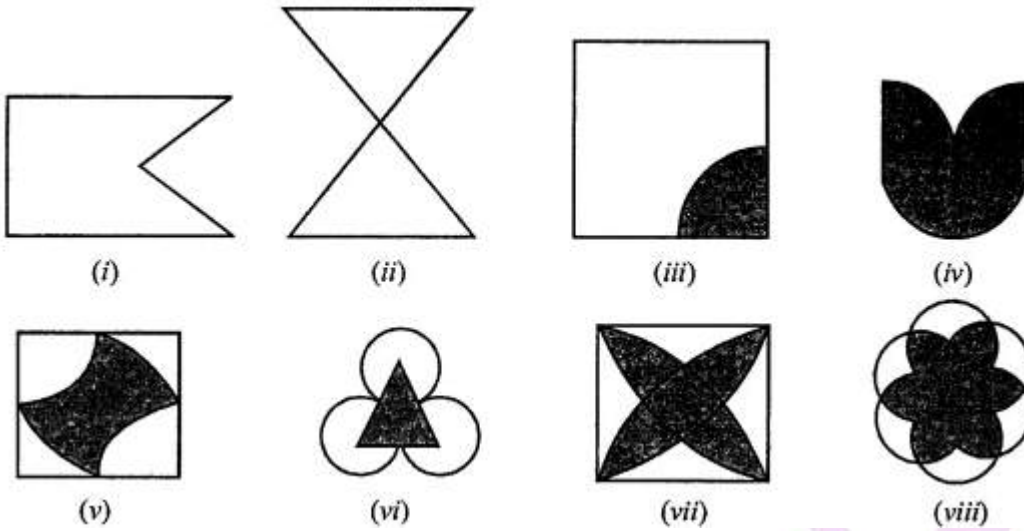
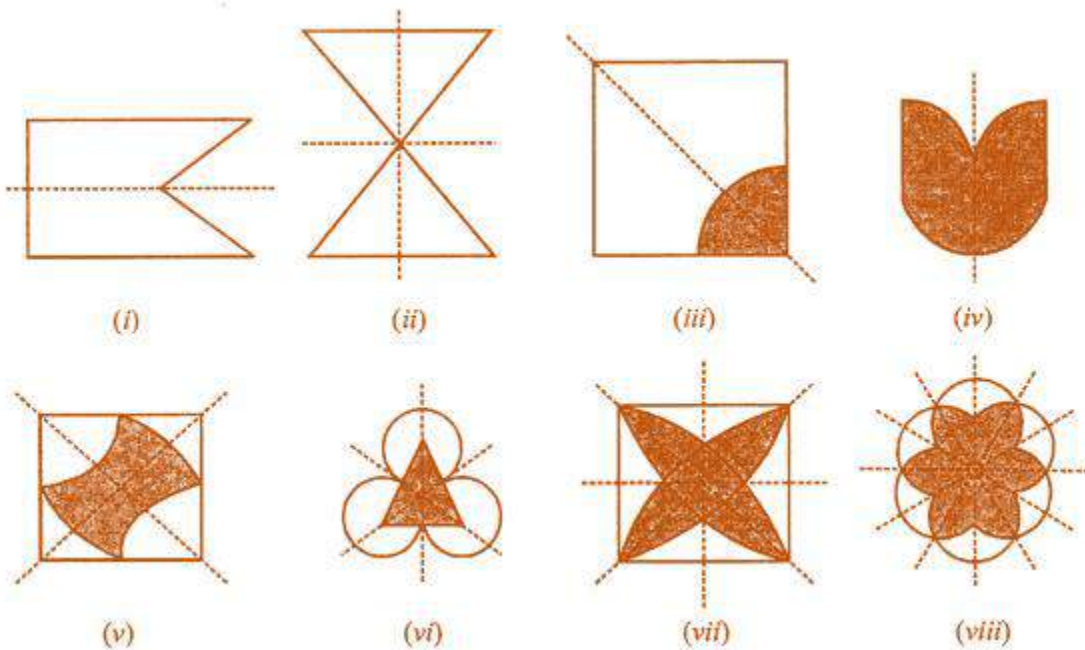


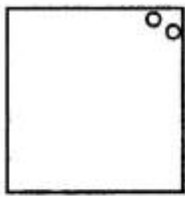
1. Draw all lines of symmetry, if any, in each of the following figures:



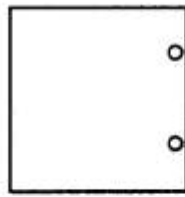
Solution:-



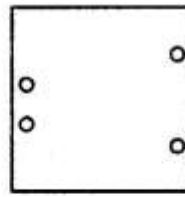
2. Copy the figures with a punched hole(s) and draw all the axes of symmetry in each of the following:



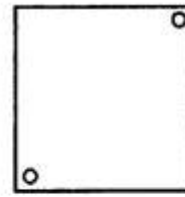
(i)



(ii)



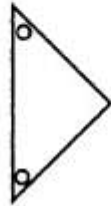
(iii)



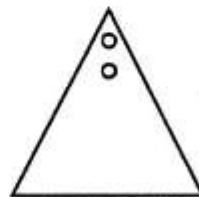
(iv)



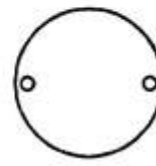
(v)



(vi)

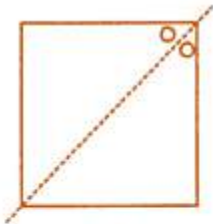


(vii)

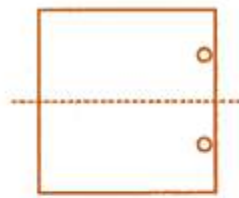


(viii)

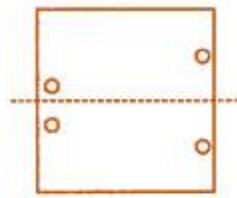
Solution:-



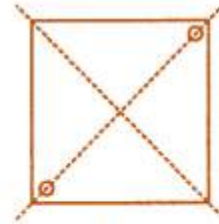
(i)



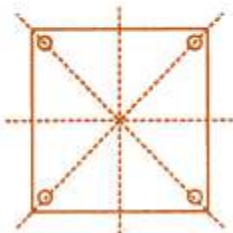
(ii)



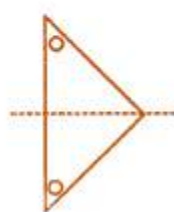
(iii)



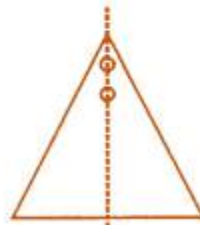
(iv)



(v)



(vi)

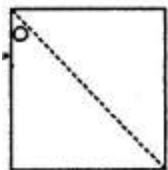


(vii)

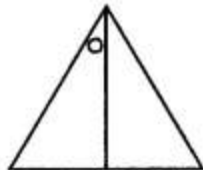


(viii)

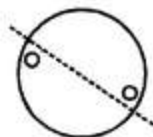
3. In the following figure, mark the missing hole(s) in order to make them symmetrical about the dotted line:



(i)



(ii)



(iii)

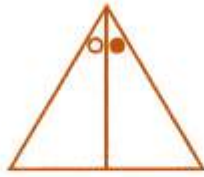


(iv)

Solution:-



(i)



(ii)

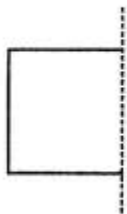


(iii)



(iv)

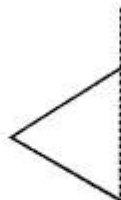
4. In the following figures, the mirror line (line of symmetry) is given as dotted line. Complete each figure by performing reflection in the mirror (dotted) line and name the figure you complete:



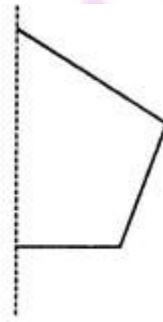
(i)



(ii)



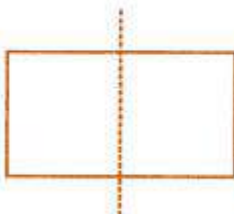
(iii)



(iv)

Solution:-

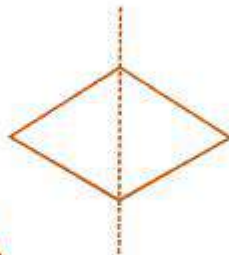
The mirror line (line of symmetry) is given as dotted line. The Completed figure are shown below.



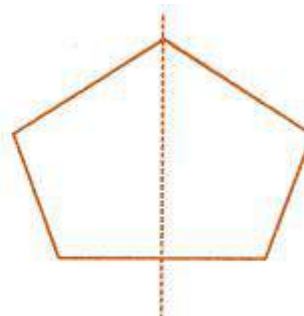
(i)



(ii)



(iii)

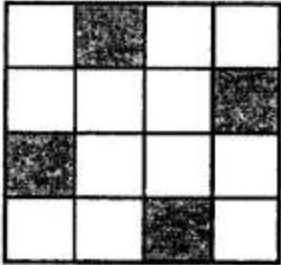


(iv)

- (i) Rectangle
- (ii) Triangle
- (iii) Rhombus
- (iv) Pentagon

5. Copy the adjoining figure.

Take any one diagonal as a line of symmetry and shade a few more squares to make the figure symmetric about a diagonal. Is there more than one way to do that? Will the figure be symmetric about both the diagonals?



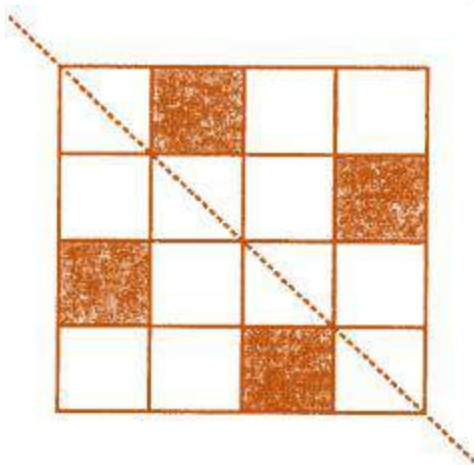
Solution:-

As per the condition given in the question,

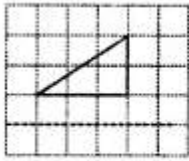
We get the same figure, by taking any one diagonal as a line of symmetry.

Then, we get the same figure if we shade according to the other diagonal as a line of symmetry.

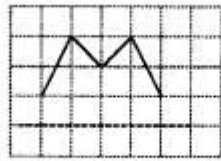
So, by taking the line joining the midpoint of the opposite sides, the figure is symmetrical about both diagonals.



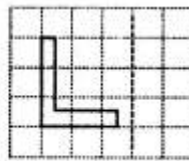
6. Draw the reflection of the following figures/letter in the given mirror line shown dotted:



(i)



(ii)



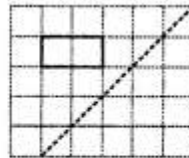
(iii)



(iv)

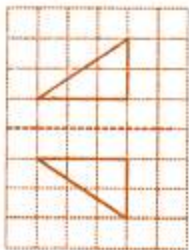


(v)

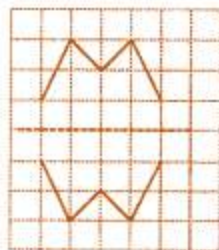


(vi)

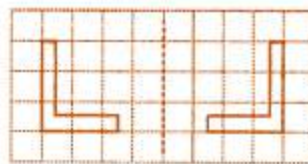
Solution:-



(i)



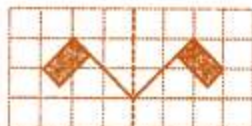
(ii)



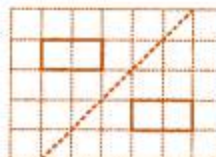
(iii)



(iv)



(v)



(vi)

7. What other names can you give to the line of symmetry of

(i) an isosceles triangle

(ii) rhombus

(iii) circle

Solution:-

(i) In an isosceles triangle other name is given to the line of symmetry is the angle bisector or median of the triangle.

(ii) In rhombus other name is given to the line of symmetry is the diagonal of the rhombus.

(iii) In circle other name is given to the line of symmetry is the diameter.