

# Deductive-Logical (scales 1st)

## Free Test

### Solutions Booklet

#### Instructions

This test comprises **4 questions**. There is an overall time limit of **2 minutes** for the test. You are not expected to complete all questions in the time provided. The questions become more difficult as you progress through the test.

Each question contains a grid of symbols and blank spaces. In each question one of the spaces in the grid will contain a question mark. Your task is to choose which one of the symbols best fits into this space.

Each question will have 1 correct answer from a choice of 4 or 5 possible answers, and you must select the most correct option.

There are some rules regarding which symbols can occupy which space.

**Rule 1:** Each row and each column must contain one of each shape.

**Rule 2:** You cannot have two or more of the same shape in the same column or row.

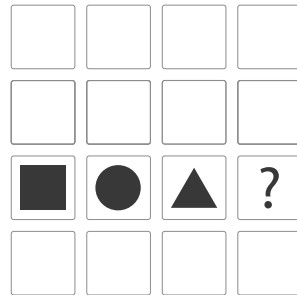
**Hint:** Look for other symbols in the immediate row and column to narrow down your answer options.

**Hint:** Look for the symbol that appears most frequently. There may be less of these remaining to populate the grid.

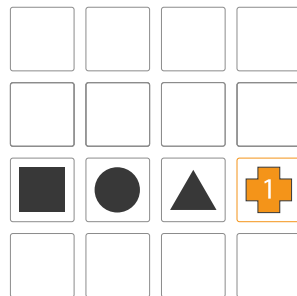
**Hint:** Sometimes you may have to solve other blank spaces in the grid to determine what goes in the space with the question mark.

Try to find a time and place where you will not be interrupted during the test. The test will begin on the next page.

**Q1** Select the correct symbol which occupies the space indicated by the question mark.

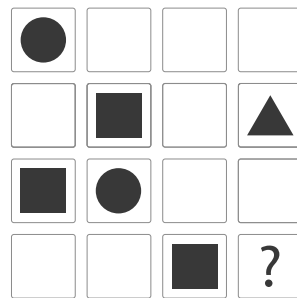


1) The question mark is found in a row which also contains a square, a circle and a triangle. This leaves just one option remaining for which shape could be placed here: a cross.

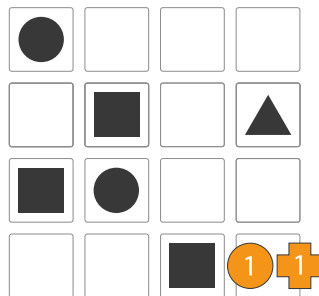


**Answer:** Cross

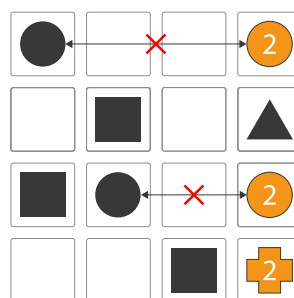
**Q2** Select the correct symbol which occupies the space indicated by the question mark.



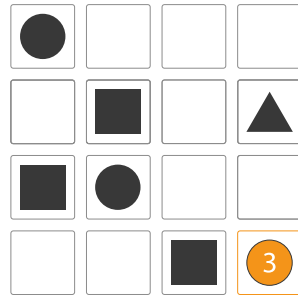
1) The question mark is found at the bottom of the final column which also contains a triangle. A square may also be found in the same row as the question mark. This leaves two possible answer options as to which shape could occupy the space of the question mark: a circle or a cross.



2) A cross could be placed in the bottom right-hand corner, meaning that a circle would have to be placed elsewhere in the column. The only other two unoccupied spaces it could go would result in there being two circles in the same row, breaking one of the rules.

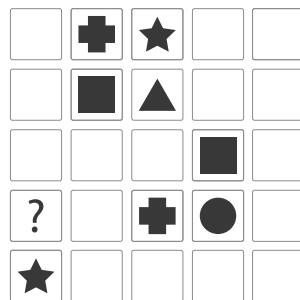


3) Hence, a circle must go in the bottom right-hand corner.

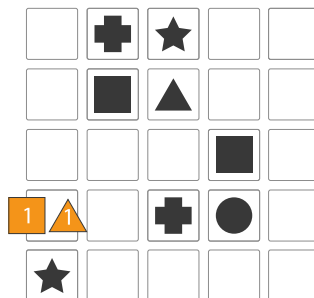


**Answer:** Circle

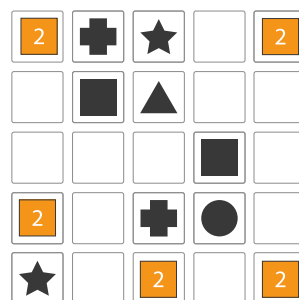
**Q3** Select the correct symbol which occupies the space indicated by the question mark.



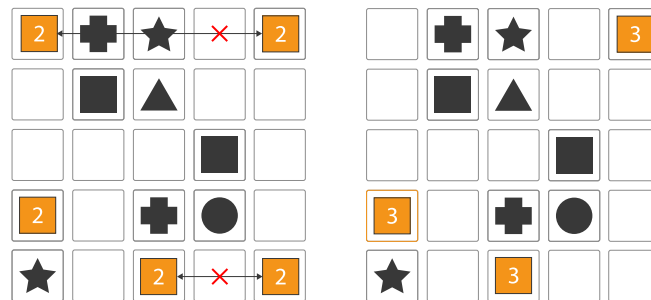
1) The question mark is found in the first column which also contains a star. A cross and a circle may also be found in the same row as the question mark. This leaves two options as to which shape could occupy the space of the question mark: a square or a triangle.



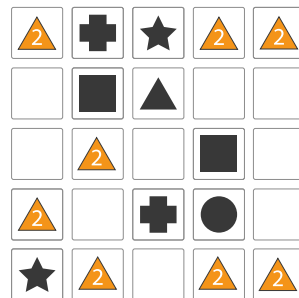
2) There are two squares, two crosses and two stars, so it makes sense to solve one of these first. It makes the most sense to solve the squares first because this is one of the potential answer options. There are five spaces where the three remaining squares could be found with only one potential space in the middle column.



3) Placing a square in the middle column because it is the only place it can go without breaking the rules. This then allows the location of the other two squares to be easily determined in a domino effect leading to the answer of a square occupying the space of the question mark.

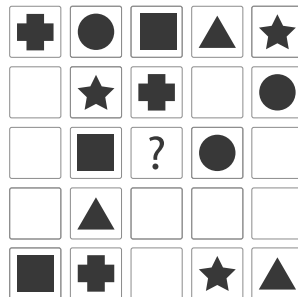


4) Placing a triangle in the position of the square will help to identify all the other spaces where a triangle could be placed. There are far more positions where the triangles can be placed, with multiple positions in each column so that no matter where a square is placed, a triangle can always accommodate the other available space. This restriction on the suitable places for a square and the flexibility of the triangle mean that a square must go in the place of the question mark.

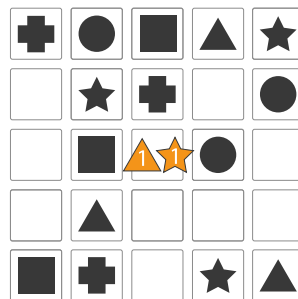


**Answer: Square**

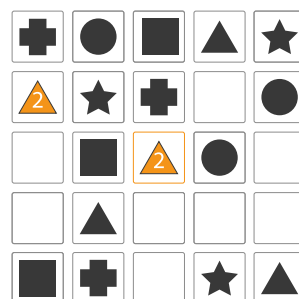
**Q4** Select the correct symbol which occupies the space indicated by the question mark.



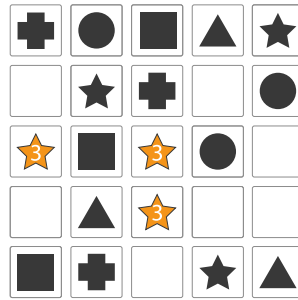
1) The question mark is found in the third column which also contains a square and a cross. Another square and a circle may also be found in the same row as the question mark. This leaves two options as to which shape could occupy the space of the question mark: a star or a triangle.



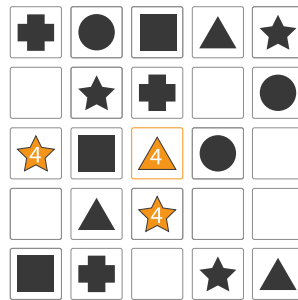
2) There are three of each shape present in the grid. It is difficult to see which shape would make the most sense to solve the first. It would make the most sense to go for either triangle or star as these are both potential answer options. There are two spaces where the two remaining squares could be found.



3) Had you opted to solve for stars first there are three spaces where the two remaining stars could be found in the grid.



4) The next step would either have been to return to solve for the triangles or to recognise that a star must go in the fourth row of the middle column and, hence, cannot go in the third row of the middle column, eliminating one answer option and leaving triangle as the correct answer.



**Answer:** Triangle



**End of test**