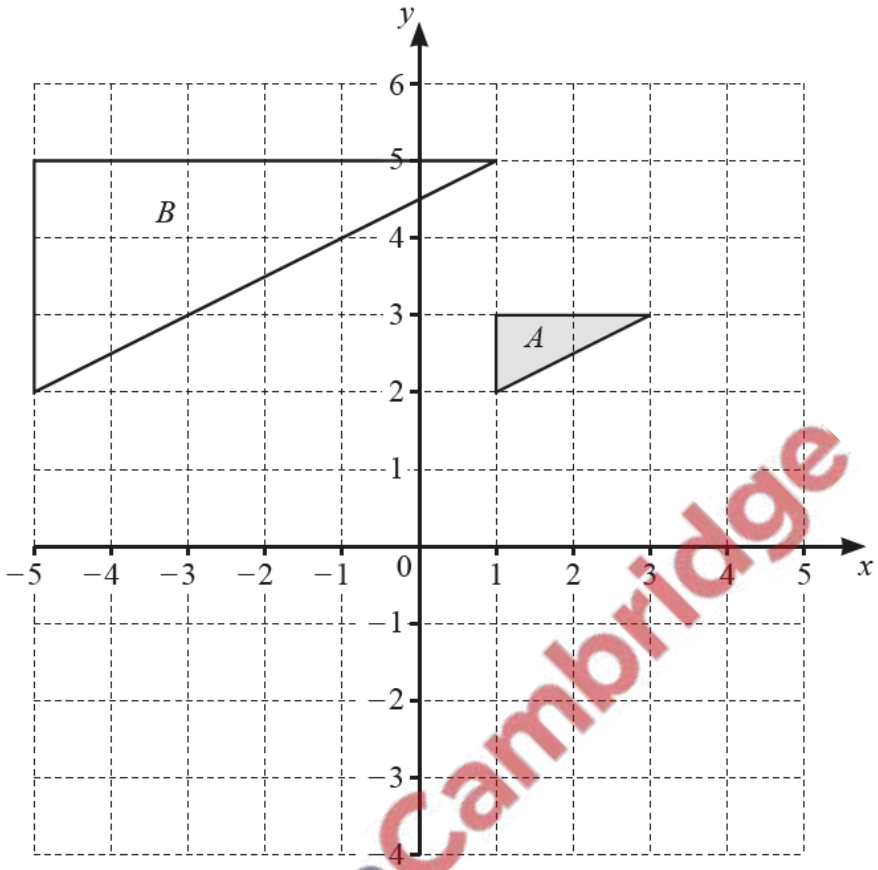
Transformations – 2020 O Level Math D

1. Nov/2020/Paper_11/No.20



Triangle A and triangle B are drawn on the grid.

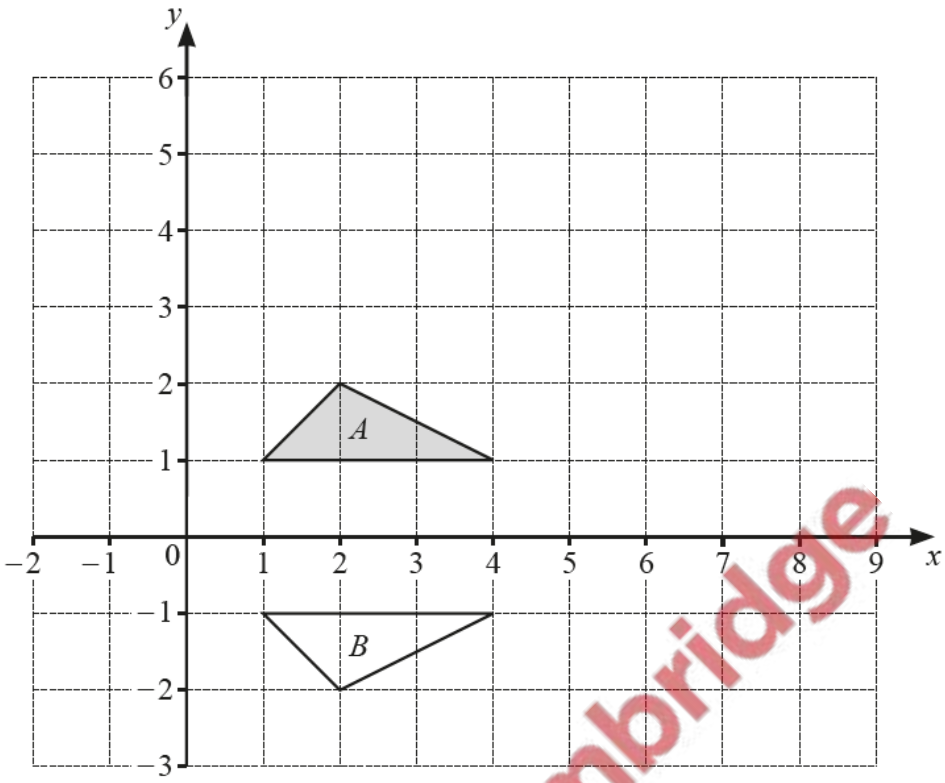
(a) Complete the description of the transformation that maps triangle A onto triangle B.

Enlargement ..... [2]

(b) Triangle A is mapped onto triangle C by a reflection in the line $y = -x$.

On the grid, draw and label triangle C. [2]

2. June/2020/Paper_21/No.2



(a) Describe fully the **single** transformation that maps triangle A onto triangle B.

..... [2]

(b) Triangle A is mapped onto triangle C by a rotation 90° anticlockwise about (1, 1).

Draw triangle C. [2]

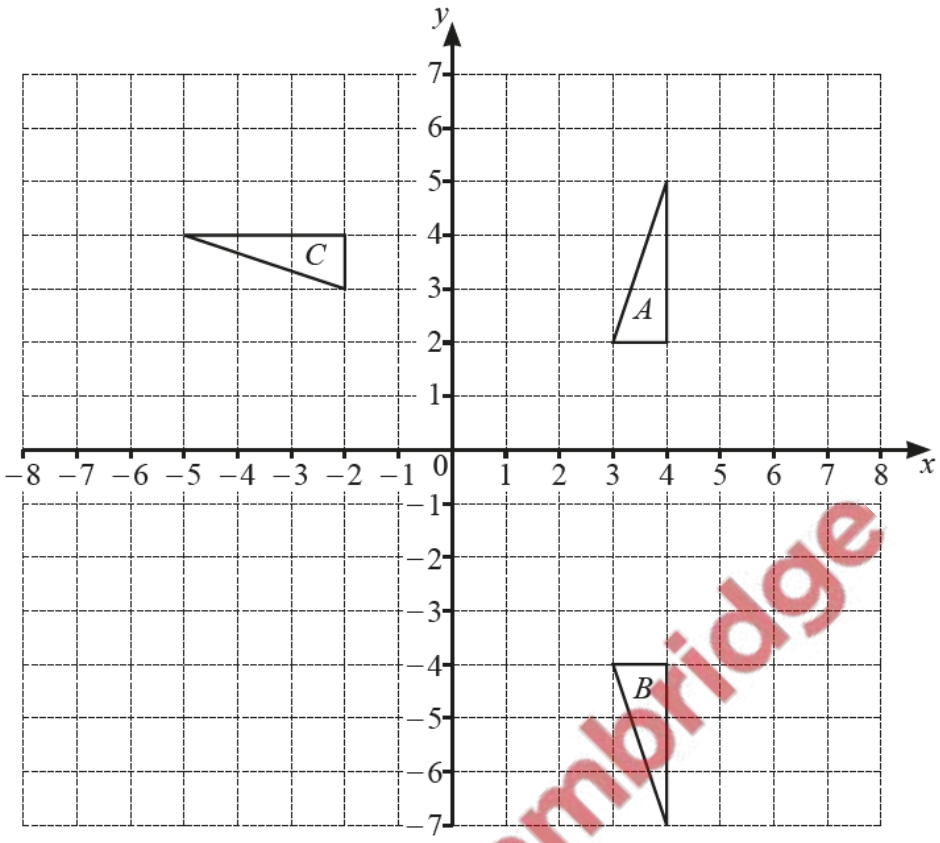
(c) Triangle A is mapped onto triangle D by the **single** transformation P.

The matrix representing P is $\begin{pmatrix} 2 & 0 \\ 0 & 2 \end{pmatrix}$.

Describe fully the **single** transformation P.

..... [3]

3. June/2020/Paper_22/No.11



(a) Describe fully the **single** transformation that maps triangle A onto triangle B.

.....

[2]

(b) Triangle A is mapped onto triangle C by the **single** transformation H.

Find the matrix representing H.

( )

[2]

(c) Transformation M is a reflection in the line $x = 2$.
Transformation R is a rotation 180° about (0, 0).

Triangle A is mapped onto triangle D such that $RM(A) = D$.

Draw and label triangle D. [3]