

and angle  $AOB = 90^\circ$ .

$$\overrightarrow{OA} = \begin{pmatrix} 3 \\ -6 \\ p \end{pmatrix} \quad \text{and} \quad \overrightarrow{OB} = \begin{pmatrix} 2 \\ -6 \\ -7 \end{pmatrix},$$

and angle  $AOB = 90^\circ$ .

[2]

This image shows a full page of white paper with ten horizontal dashed lines, typical of primary school handwriting practice paper. The lines are evenly spaced and extend across the entire width of the page. There is no text or other markings on the paper.

The point  $C$  is such that  $\overrightarrow{OC} = \frac{2}{3}\overrightarrow{OA}$ .

[4]

This image shows a single sheet of white paper with ten evenly spaced horizontal dotted lines, typical of primary school handwriting practice paper. The lines run across the entire width of the page, leaving equal margins at the top and bottom. There are no vertical lines or other markings present.