

7 A curve C has equation $y = \log_{10}(x + 2)$

(a) Using the axes below, sketch the graph of C .

Label the coordinates of the points of intersection of C with the coordinate axes.

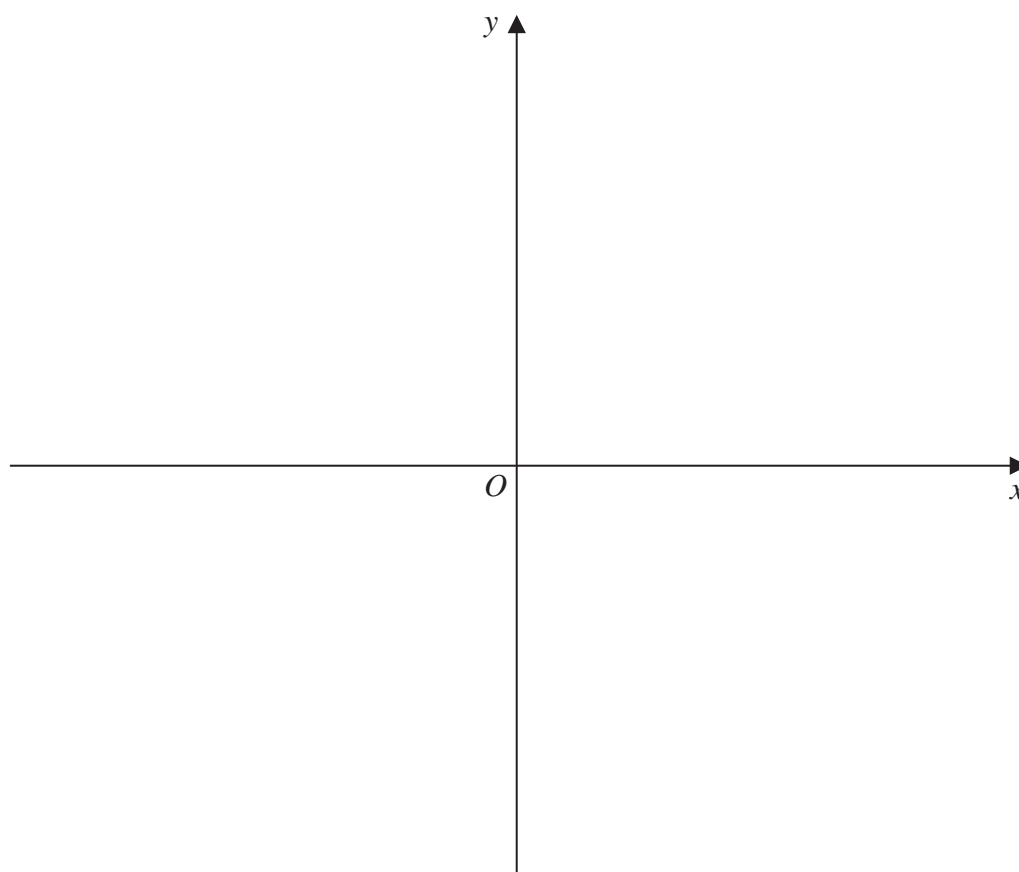
(2)

(b) Solve the equation $2(\log_a 4 + \log_a 16) = 1$

(3)

(c) Solve the equation $5\log_q 16 + 4\log_2 q = 24$

(6)



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Question 7 continued

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Handwriting practice area with 25 horizontal dotted lines.



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Question 7 continued

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Question 7 continued

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(Total for Question 7 is 11 marks)