2

The diagram shows two curves. One curve has equation $y = \sin x$ and the other curve has equation $y = f(x)$.

(a) In order to transform the curve $y = \sin x$ to the curve $y = f(x)$, the curve $y = \sin x$ is first reflected in the x-axis.

Describe fully a sequence of two further transformations which are required. [4]

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(b) Find $f(x)$ in terms of $\sin x$. [2]

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