

1. Fig. 6 shows the curve with equation $y = x^4 - 6x^2 + 4x + 5$.

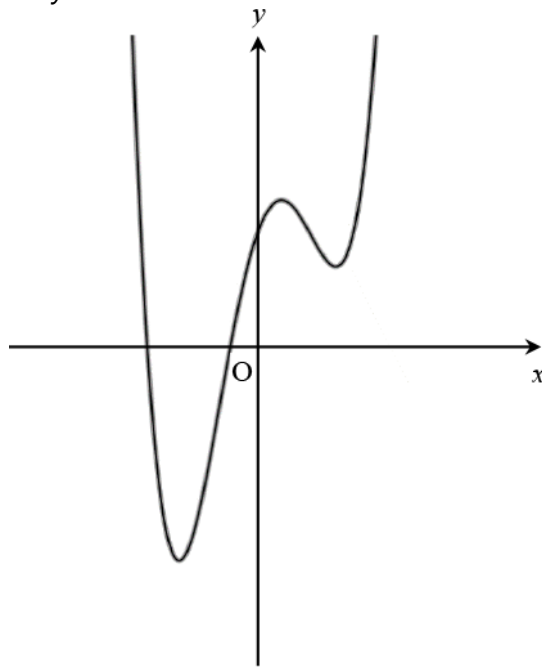


Fig. 6

Find the coordinates of the points of inflection.

[5]

END OF QUESTION PAPER

Question		Answer/Indicative content	Marks	Guidance
1		$\frac{dy}{dx} = 4x^3 - 12x + 4$ $\frac{d^2y}{dx^2} = 12x^2 - 12 = 0$ $x = \pm 1$ $(-1, -4) \text{ and } (1, 4)$	M1(AO1. 1) A1(AO1. 1) M1(AO1. 2) A1(AO1. 1) A1(AO2. 1) [5]	Differentiating once First derivative Differentiating a second time and equating to zero
		Total	5	