(a)	Find $\int_{1}^{\infty} f(x) dx$ .	
		•••••
		•••••
		•••••

A point is moving along the curve y = f(x) in such a way that, as it passes through the point A, its y-coordinate is **decreasing** at the rate of k units per second and its x-coordinate is **increasing** at the rate of k units per second.

<b>(b)</b>	Find the coordinates of $A$ .	[6]