

$x(t)$

t



The figure shows a 2D plot with a vertical axis labeled $x(t)$ and a horizontal axis labeled t . The axes intersect at the origin. A smooth, continuous curve is plotted. The curve begins in the second quadrant (negative t , positive $x(t)$), crosses the t -axis into the first quadrant, reaches a local minimum, and then rises to a local maximum before slightly decreasing. The curve is smooth and has no sharp corners or discontinuities.