

Q1. Find an equation of the tangent to the graph of $y + \sin(xy) = x$ when $x = 0$.

Q2. Find 2 values of $(f^{-1})'(0)$ when $f(x) = \sin(2x + x^2)$
(Hint: Use 0 to find two values of x).

Q3. Find

$$\frac{dy}{dx} \text{ when } y = \log_e \left(\frac{(x-1)^3 \tan^2 x \sin x^2}{\sqrt{x^4(2x-1)}} \right)$$