

Source:

1 | find taylor series

1.1 | $y = \cos(x)$

$$P_n(x) = f(0) + \frac{d}{dx}f(0)x + \frac{\frac{d^2}{d^2x}f(0)}{2!}x^2 + \frac{\frac{d^3}{d^3x}f(0)}{3!}x^3 + \dots$$