

$$\frac{d}{dx} (y = xy^2 + 2x^2)$$

$$\frac{dy}{dx} = y^2 + x \cdot 2y \cdot \frac{dy}{dx} + 4x$$

$$y' = 4 + 1.6y' + 1.6$$

$$-0.6y' = 5.6$$

$$y' = \frac{5.6}{-0.6} = -9.333$$

$$\frac{d}{dx} (\tan y = x + y)$$

 $(1, 1.132)$ 

$$\sec^2 y \frac{dy}{dx} = 1 + \frac{dy}{dx}$$

$$\frac{1}{\cos^2 1.132} \cdot y' = 1 + y'$$

$$5.540 y' = 1 + y'$$

$$4.540 y' = 1$$

$$y' = \frac{1}{4.540}$$