

3.7

$$(2) \quad x^2 + xy - y^3 = xy^2$$

$$2x + \left(y + x \frac{dy}{dx}\right) - 3y^2 \frac{dy}{dx} = y^2 + x(2y) \frac{dy}{dx}$$

$$x \frac{dy}{dx} - 3y^2 \frac{dy}{dx} - 2xy \frac{dy}{dx} = y^2 - y - 2x$$

$$\frac{dy}{dx} = \frac{y^2 - y - 2x}{x - 3y^2 - 2xy}$$

$$(17) \quad (x-a)^2 + y^2 = a^2$$

$$2(x-a) + 2y \frac{dy}{dx} = 0$$

$$2y \frac{dy}{dx} = 2a - 2x$$

$$\frac{dy}{dx} = \frac{2a - 2x}{2y} = \frac{a - x}{y}$$