

Übungen

S. 137/2

$$a) f'(x) = 3(1+x^2)^2 \cdot 2x$$

$$b) f'(x) = \frac{1}{18} \cdot 6(3x+2)^5 \cdot 3$$

$$c) f'(x) = 2(1-x+x^3) \cdot (-1+3x^2)$$

$$d) f'(t) = -(8t-7)^{-2} \cdot 8$$

$$e) f'(x) = 6x - 3(x^2-1)^2 \cdot 2x$$

$$f) f'(x) = -3 \sin x^2 \cdot 2x$$

$$g) f'(x) = \cos 2x \cdot 2$$

$$h) f'(x) = \frac{1}{4} \cos(2x+1) \cdot 2$$

$$i) f'(t) = -2 \cdot \frac{3}{(5-t)^3} \cdot (-1)$$

$$k) f'(x) = -3 \cdot \frac{1}{2(5x-7)^4} \cdot 5$$

$$l) f'(x) = -\frac{1}{(\cos x)^2} \cdot (-\sin x)$$

$$m) f'(t) = \frac{-2}{t^3} + \cos \frac{1}{t} \cdot \left(-\frac{1}{t^2}\right)$$

$$n) f'(x) = 2(2x+1) \cdot 2 + \frac{-2}{(2x+1)^3} \cdot 2$$