

1.  $\frac{d}{dx}(c) = 0$ , where  $c$  is a constant

2.  $\frac{d}{dx}(x^n) = nx^{n-1}$ , where  $n$  is any real number

3.  $\frac{d}{dx}(e^x) = e^x$

4.  $\frac{d}{dx}(\ln x) = \frac{1}{x}$ , for  $x > 0$

5.  $\frac{d}{dx}(\sin x) = \cos x$

6.  $\frac{d}{dx}(\cos x) = -\sin x$