## This is a mathematics book

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February 8, 2025

### Definition

$$\lim_{n\to\infty} a_n = L$$

$$|a_n - L| < \epsilon$$

### Definition

1.  $\lim_{x \to c} f(x) = f(c)$ 

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### Definition

$$f'(a) = \lim_{h \to 0} \frac{f(a+h) - f(a)}{h}$$

# Basic Principle

1.

$$\int_{a}^{b} f(x) dx = F(b) - F(a)$$

2.

$$\frac{d}{dx}\left(\int_{a}^{x} f(t) dt\right) = f(x)$$