

$$\int x^n dx = \frac{x^{n+1}}{n+1} + C \quad n \neq -1$$

$$\bullet \int 3x^5 dx$$

$$\int 3x^5 dx = 3 \int x^5 dx = 3 \cdot \frac{x^6}{6} + C = \frac{1}{2} x^6 + C$$