

TABLA I. CÁLCULO DE PRIMITIVAS DE FORMA DIRECTA

$$1. \int f'(x) \cdot [f(x)]^n dx = \frac{[f(x)]^{n+1}}{(n+1)} + C \quad \text{con } n \neq -1$$

$$2. \int \frac{f'(x)}{f(x)} dx = \ln|f(x)| + C$$

$$3. \int f'(x) \cdot e^{f(x)} dx = e^x + C$$

$$4. \int f'(x) \cdot \operatorname{sen}(f(x)) dx = -\cos(f(x)) + C$$

$$5. \int f'(x) \cdot \cos(f(x)) dx = \operatorname{sen}(f(x)) + C$$

$$6. \int f'(x) \cdot [1 + \operatorname{tg}^2(f(x))] dx = \operatorname{tg}(f(x)) + C$$

$$\int \frac{f'(x)}{\cos^2(f(x))} dx = \int f'(x) \cdot \sec^2(f(x)) dx = \operatorname{tg}(f(x)) + C$$

$$7. \int -f'(x) \cdot [1 + \operatorname{cotg}^2(f(x))] dx = \operatorname{cotg}(f(x)) + C$$

(la unidad de otro signo)

$$\int f'(x) \cdot [1 + \operatorname{cotg}^2(f(x))] dx = -\operatorname{cotg}(f(x)) + C$$

$$\int \frac{-f'(x)}{\operatorname{sen}^2(f(x))} dx = \int -f'(x) \cdot \operatorname{cosec}^2(f(x)) dx = \operatorname{cotg}(f(x)) + C$$

$$\int \frac{f'(x)}{\operatorname{sen}^2(f(x))} dx = \int f'(x) \cdot \operatorname{cosec}^2(f(x)) dx = -\operatorname{cotg}(f(x)) + C$$

$$8. \int f'(x) \cdot \operatorname{senh}(f(x)) dx = \cosh(f(x)) + C$$

$$9. \int f'(x) \cdot \cosh(f(x)) dx = \operatorname{senh}(f(x)) + C$$

TABLA II. CÁLCULO DE PRIMITIVAS DE FORMA DIRECTA (TIPO ARCO)

$$1. \int \frac{f'(x)}{\sqrt{1 - [f(x)]^2}} dx = \arcsen(f(x)) + c$$

$$2. \int \frac{-f'(x)}{\sqrt{1 - [f(x)]^2}} dx = \arccosen(f(x)) + c$$

$$3. \int \frac{f'(x)}{1 + [f(x)]^2} dx = \arctg(f(x)) + c$$

$$4. \int \frac{f'(x)}{\sqrt{1 + [f(x)]^2}} dx = \operatorname{argsenh}(f(x)) + c = \ln |f(x) + \sqrt{[f(x)]^2 + 1}| + c$$

$$5. \int \frac{f'(x)}{\pm \sqrt{[f(x)]^2 - 1}} dx = \operatorname{argcosh}(f(x)) + c = \ln |f(x) \pm \sqrt{[f(x)]^2 - 1}|$$

$$6. \int \frac{f'(x)}{1 - [f(x)]^2} dx = \operatorname{argtgh}(f(x)) + c$$