

$$m \frac{d^2 X(t)}{dt^2} = F(X(t))$$

$$\frac{d}{dt} \frac{\partial L(X(t), \dot{X}(t))}{\partial \dot{X}^i(t)} - \frac{\partial L(X(t), \dot{X}(t))}{\partial X^i} = 0.$$

$$\frac{dZ(t)}{dt} = J(dH(Z(t)))$$

$$p^2 = m^2 c^2$$

$$dF = 0, \quad \delta F = j$$

$$i\hbar \frac{\partial \psi(t, x)}{\partial t} = (-\Delta + V)\psi(t, x)$$

$$(\alpha \cdot (-i\nabla) + m\beta + V)\psi(t, x) = 0$$

$$(\square + m^2 + V)\phi(t, x) = \lambda |\phi(t, x)|^2 \phi(t, x)$$

$$[Q, P] = i\hbar$$

$$[H, T] = i\hbar$$

$$\Psi(t) = e^{-itH/\hbar} \Psi$$

$$A(t) = e^{itH/\hbar} A e^{-itH/\hbar}$$

$$(\nabla_X h)Y = (\nabla_Y h)X$$

$$\psi(z) = \operatorname{Re} \int_0^z \left(\frac{1}{2}(1-g^2), \frac{\sqrt{-1}}{2}(1+g^2), g \right) \omega$$

$$\int_D d\omega = \int_{\partial D} i^* \omega$$

$$\varphi(f) = \hat{f}(\varphi)$$

$$\mathcal{D}'(\mathbb{R}^n)$$

$$T_\varphi(f) = P(\varphi f)$$

$$[M : N] = \dim_N L^2(M)$$

$$I_n, I_\infty, II_1, II_\infty, III_\lambda (0 \leq \lambda \leq 1)$$

