

$$\left[\sum_{i=1}^5 \frac{-\hbar^2}{2m_i} \nabla_{\mathbf{r}_i}^2 + \sum_{i=1}^5 v_{\text{ext}}(\mathbf{r}_i) + \sum_{i < j}^5 \frac{e^2}{|\mathbf{r}_i - \mathbf{r}_j|} \right] \Psi(\{\mathbf{r}_i\}) = E \Psi(\{\mathbf{r}_i\})$$