Second Quantization Review

Bosons: Canonical Commutation Rules

$$\left[\hat{b}_i^\dagger, \hat{b}_j\right] = \delta_{ij} \qquad \left[\hat{b}_i, \hat{b}_j\right] = 0$$

“Ladder” Operators for Harmonic Oscillator

Second Quantization Review

Fermions: Canonical *Anti*commutation Rules

$$\left\{\hat{a}_i^\dagger, \hat{a}_j\right\} = \delta_{ij} \qquad \{\hat{a}_i, \hat{a}_j\} = 0$$

Pauli Exclusion Principle, Fermionic Exchange