

Conduction Band

$E_{\text{CBM}}$

$E_F$

$E_{\text{VBM}}$

Valence Band

$T_1^+$   $\uparrow\downarrow$   $\uparrow$   $\uparrow$

$E^+$   $\uparrow\downarrow$   $\uparrow\downarrow$

$T_2^-$   $\uparrow\downarrow$   $\uparrow\downarrow$   $\uparrow\downarrow$

$T_1^-$   $\uparrow\downarrow$   $\uparrow\downarrow$   $\uparrow\downarrow$

$T_1^-$   $\uparrow\downarrow$   $\uparrow\downarrow$   $\uparrow\downarrow$

$T_2^+$   $\uparrow\downarrow$   $\uparrow\downarrow$   $\uparrow\downarrow$

$A_1^+$   $\uparrow\downarrow$

$\uparrow\downarrow$   $\uparrow$   $\uparrow$  **P**

$\uparrow\downarrow$  **S**

