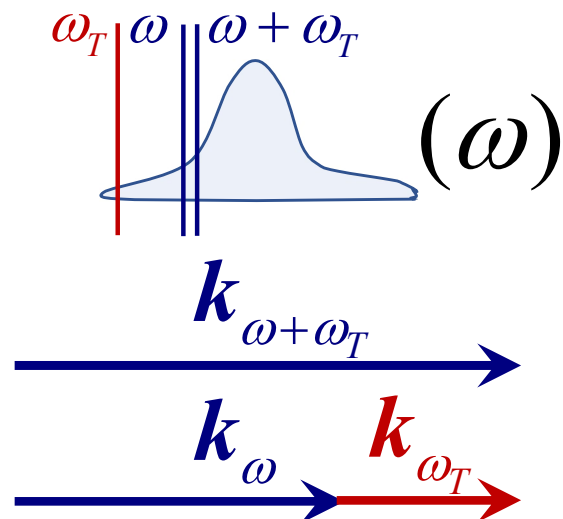


LiNbO₃, LiTaO₃, BBO 中光整流产生多周期 THz 脉冲

1. OR 中的 相位匹配

所有 满足相同
相位匹配的
DFG 相干叠加

$$\left\{ \begin{array}{l} (\omega + \omega_T) - \omega = \omega_T \\ k_{\omega + \omega_T} - k_{\omega} = k_{\omega_T} \end{array} \right.$$



$$v_g = \frac{d\omega}{dk} = \frac{(\omega + \omega_T) - \omega}{k_{\omega + \omega_T} - k_{\omega}} = \frac{\omega_T}{k_{\omega_T}} = v_T$$

$$n_g = n_{\text{THz}}$$

"Multicycle terahertz pulse generation by OR in LiNbO₃, LiTaO₃, and BBO crystals,"
Opt. Express 28, 21220-21235 (2020)