

Maxima

$$\theta = a \sin\left(\frac{m \cdot \lambda}{d}\right)$$

$$\frac{\partial \theta}{\partial \lambda} = \sqrt{\frac{m^2}{d^2 - m^2 \lambda^2}}$$

$$\frac{\partial \theta}{\partial d} = -\sqrt{\frac{m^2 \lambda^2}{d^4 - m^2 \lambda^2 d^2}}$$

$$V_\theta = \left| \frac{\partial \theta}{\partial \lambda} \right| \cdot V_\lambda + \left| \frac{\partial \theta}{\partial d} \right| \cdot V_d \cdot \frac{180^\circ}{\pi}$$

Minima:

$$\theta = a \sin\left(\frac{(2m-1) \cdot \frac{\lambda}{2}}{d}\right)$$

$$\frac{\partial \theta}{\partial \lambda} = \sqrt{\frac{(m - \frac{1}{2})^2}{d^2 - ((2m-1) \cdot \frac{\lambda}{2})^2 d^2}}$$

$$\frac{\partial \theta}{\partial d} = -\sqrt{\frac{(\lambda m - \frac{\lambda}{2})^2}{d^4 - ((2m-1) \cdot \frac{\lambda}{2})^2 d^2}}$$

$$V_\theta = \left| \frac{\partial \theta}{\partial \lambda} \right| \cdot V_\lambda + \left| \frac{\partial \theta}{\partial d} \right| \cdot V_d \cdot \frac{180^\circ}{\pi}$$