Dispersion formulas

1: Sellmeier (preferred)

$$n^2 - \quad C_1 \quad \frac{C_2\lambda^2}{\lambda^2 - C_3^2} \quad \frac{C_4\lambda^2}{\lambda^2 - C_5^2} \quad \frac{C_6\lambda^2}{\lambda^2 - C_7^2} \quad \frac{C_8\lambda^2}{\lambda^2 - C_9^2} \quad \frac{C_{10}\lambda^2}{\lambda^2 - C_{11}^2} \quad \frac{C_{12}\lambda^2}{\lambda^2 - C_{13}^2} \quad \frac{C_{14}\lambda^2}{\lambda^2 - C_{15}^2} \quad \frac{C_{16}\lambda^2}{\lambda^2 - C_{17}^2}$$

2: Sellmeier-2

$$n^2 - \quad C_1 \quad \frac{C_2\lambda^2}{\lambda^2 - C_3} \quad \frac{C_4\lambda^2}{\lambda^2 - C_5} \quad \frac{C_6\lambda^2}{\lambda^2 - C_7} \quad \frac{C_8\lambda^2}{\lambda^2 - C_9} \quad \frac{C_{10}\lambda^2}{\lambda^2 - C_{11}} \quad \frac{C_{12}\lambda^2}{\lambda^2 - C_{13}} \quad \frac{C_{14}\lambda^2}{\lambda^2 - C_{15}} \quad \frac{C_{16}\lambda^2}{\lambda^2 - C_{17}}$$

3: Polynomial

$$n^2 \quad C_1 \quad C_2\lambda^{C_3} \quad C_4\lambda^{C_5} \quad C_6\lambda^{C_7} \quad C_8\lambda^{C_9} \quad C_{10}\lambda^{C_{11}} \quad C_{12}\lambda^{C_{13}} \quad C_{14}\lambda^{C_{15}} \quad C_{16}\lambda^{C_{17}}$$

4: RefractiveIndex.INFO

$$n^2 \quad C_1 \quad \frac{C_2\lambda^{C_3}}{\lambda^2 - C_4^{C_5}} \quad \frac{C_6\lambda^{C_7}}{\lambda^2 - C_8^{C_9}} \quad C_{10}\lambda^{C_{11}} \quad C_{12}\lambda^{C_{13}} \quad C_{14}\lambda^{C_{15}} \quad C_{16}\lambda^{C_{17}}$$

5: Cauchy

$$n \quad C_1 \quad C_2\lambda^{C_3} \quad C_4\lambda^{C_5} \quad C_6\lambda^{C_7} \quad C_8\lambda^{C_9} \quad C_{10}\lambda^{C_{11}}$$

6: Gases

$$n - \quad C_1 \quad \frac{C_2}{C_3 - \lambda^{-2}} \quad \frac{C_4}{C_5 - \lambda^{-2}} \quad \frac{C_6}{C_7 - \lambda^{-2}} \quad \frac{C_8}{C_9 - \lambda^{-2}} \quad \frac{C_{10}}{C_{11} - \lambda^{-2}}$$

7: Herzberger

$$n \quad C_1 \quad \frac{C_2}{\lambda^2 -} \quad C_3\left(\frac{}{\lambda^2 -}\right)^2 \quad C_4\lambda^2 \quad C_5\lambda^4 \quad C_6\lambda^6$$

8: Retro

$$\frac{n^2 -}{n^2} \quad C_1 \quad \frac{C_2\lambda^2}{\lambda^2 - C_3} \quad C_4\lambda^2$$

9: Exotic

$$n^2 \quad C_1 \quad \frac{C_2}{\lambda^2 - C_3} \quad \frac{C_4\ \lambda - C_5}{\lambda - C_5^{\ 2}} \quad C_6$$