

## Coating Designer

CODE is the up-to-date solution for realistic design of optical coatings. Based on our powerful SCOUT thin film analysis software we have developed the right tool for you if you

- Design thin films on glass for architectural applications
- Develop car glass coatings
- Produce thin films for displays
- Design properties of optical filters
- Optimize coatings for solar energy conversion

CODE predicts optical spectra for almost arbitrary layer stacks, angles of incidence and polarizations. Several quantities characterizing coating products are computed and can be optimized:

- Color coordinates ( $L^*$ ,  $a^*$ ,  $b^*$ ,  $X$ ,  $Y$ ,  $Z$ ,  $x$ ,  $y$ ,  $z$ ,  $L$ ,  $a$ ,  $b$  for light sources A, D65, C and observation angles of  $2^\circ$  and  $10^\circ$ ), color visualization
- Light transmittance for light sources A, D65, C
- Light reflectance for light sources A, D65, C
- Solar transmittance (DIN 67507, EN 410, P.Moon)
- Solar reflectance (DIN 67507, EN 410, P.Moon)
- $g$  (DIN 67507, EN 410)
- Color rendering index  $R$ ,
- Emissivity (normal and effective)
- $U$  ( $15^\circ$  and  $10^\circ$  temperature difference)
- Dominant wavelength, Purity
- Front pane absorption

With automatic spectrum multiplication and integration you can easily compute and optimize efficiencies of absorbers or reflectors. Achieve highest flexibility making use of OLE automation technology.

Graphically varying thicknesses or optical constant parameters you can easily inspect and optimize coating properties. Investigate systematically the consequences of parameter variations and fluctuations (due to production tolerances) and create corresponding charts.

