

Technical Discussion for Filter glass with Cd/Pb used in Spectro-equipment

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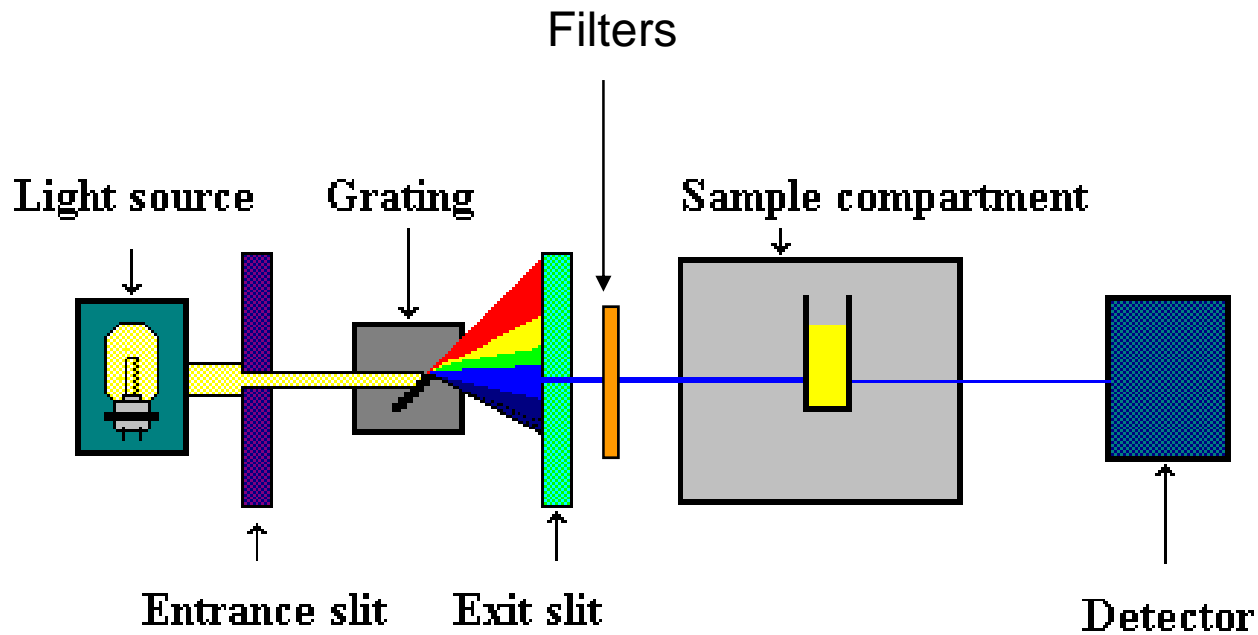
Shimadzu Europa GmbH

Spectro-equipment

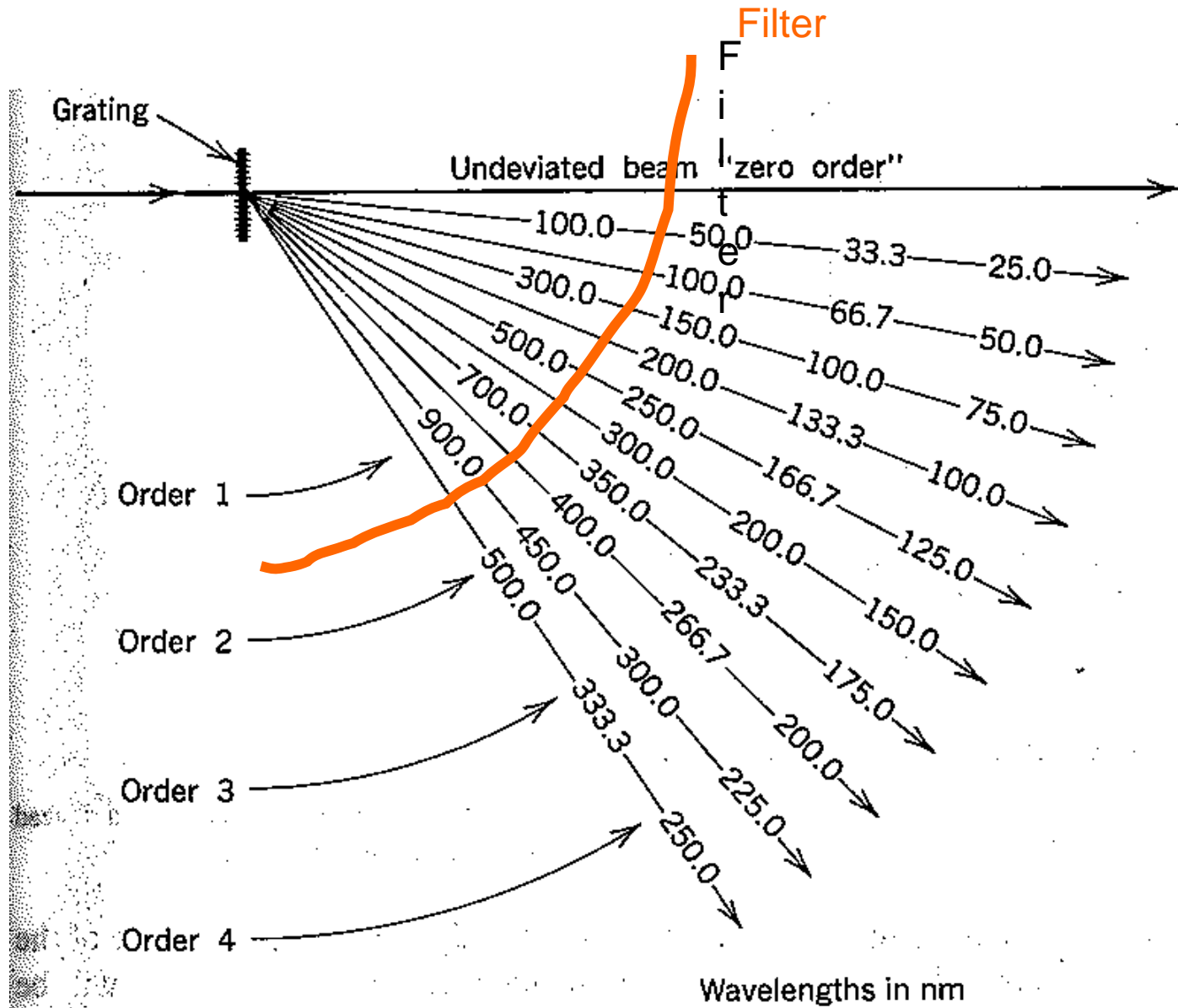
- Spectrophotometer
 - Ultraviolet (UV)
 - Visible (VIS)
 - Near-infrared (NIR)
- Infrared radiation thermometer
- Light applied ingredient meter
- Thickness meter
- Others

Spectrophotometer

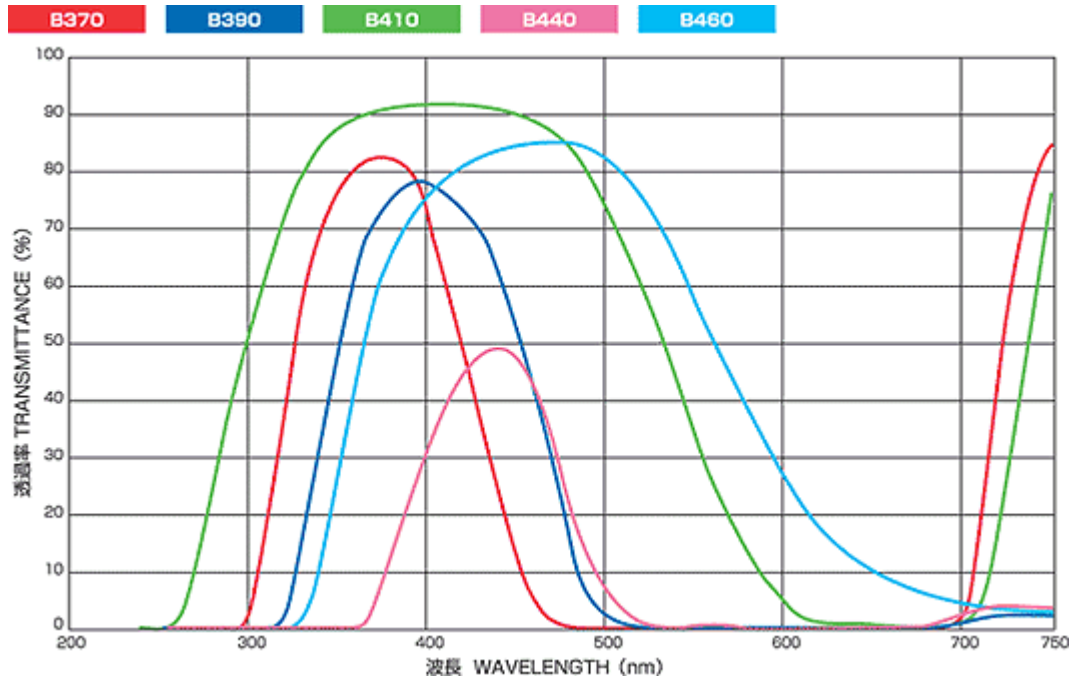
Basic Construction



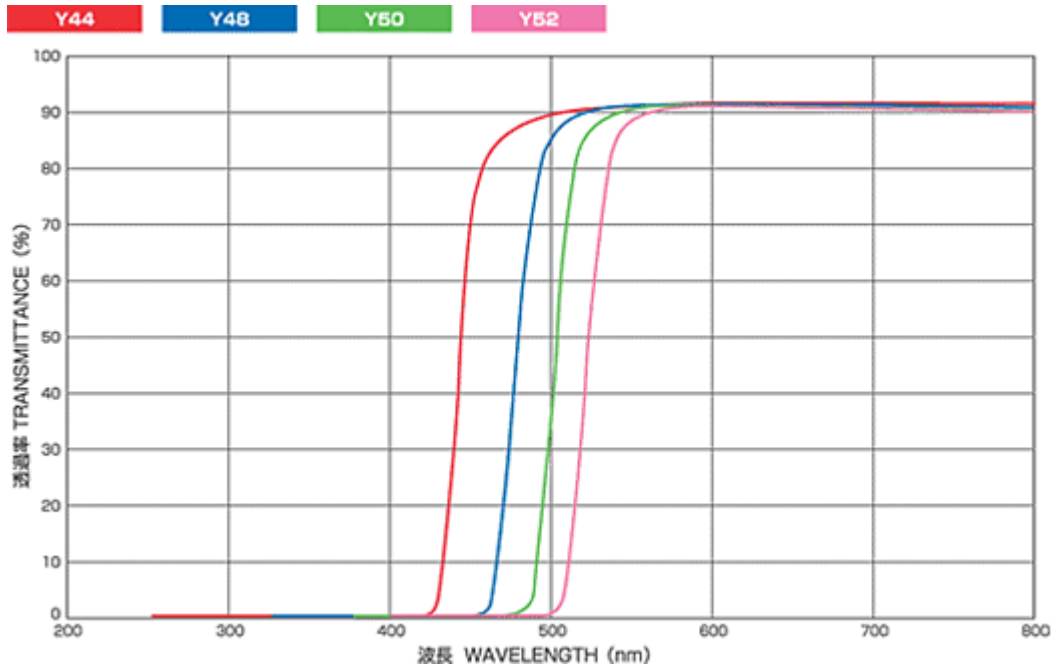
Why filters are required?



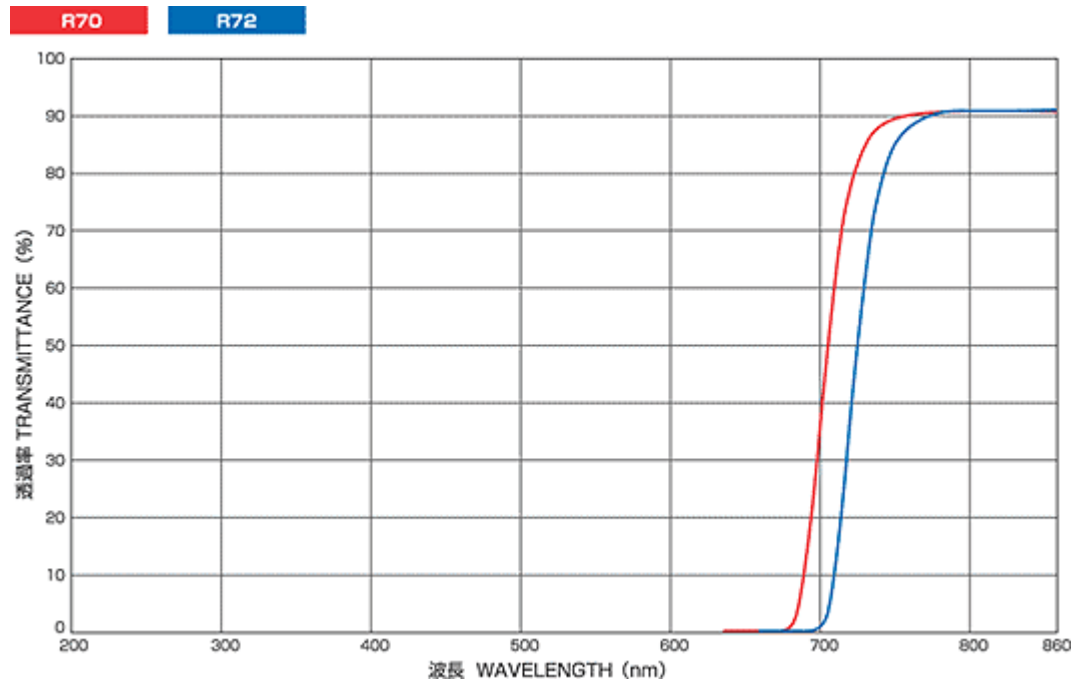
PbO contained



CdCO₃ and CdS contained

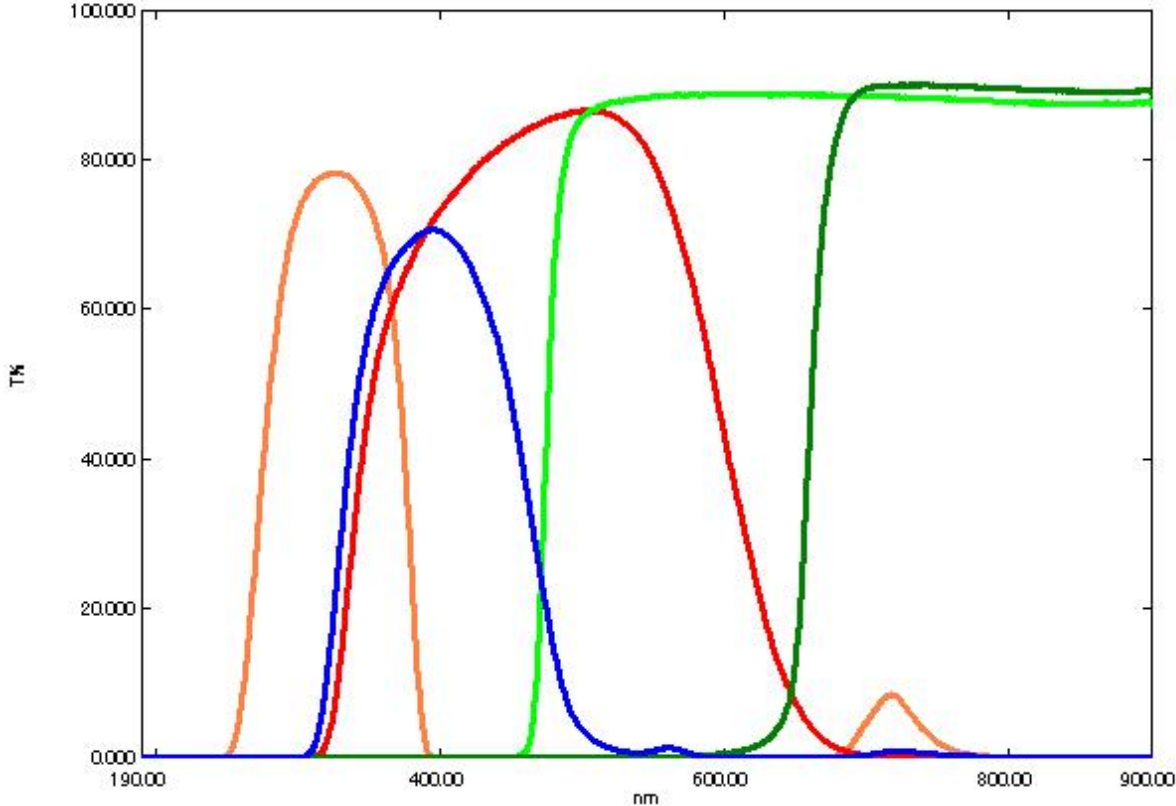


CdS contained



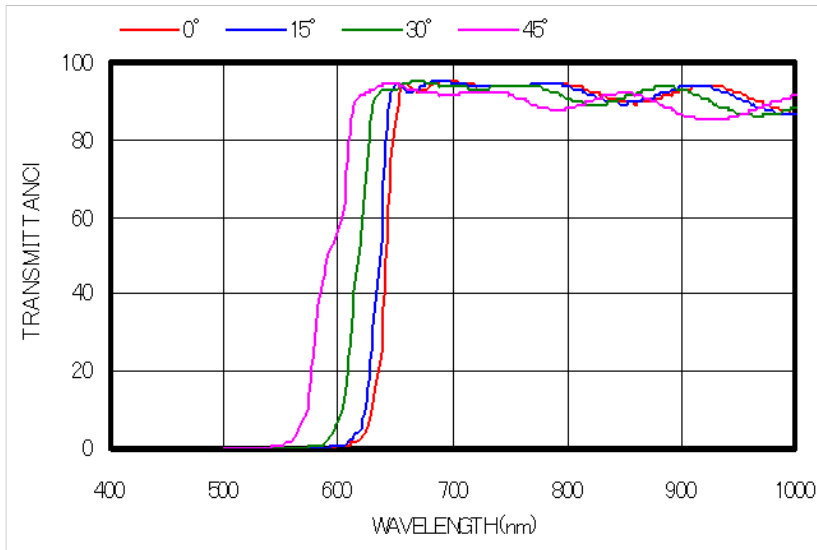
R76: CdO contained

An example of the filter set used for UV-Vis spectrophotometer

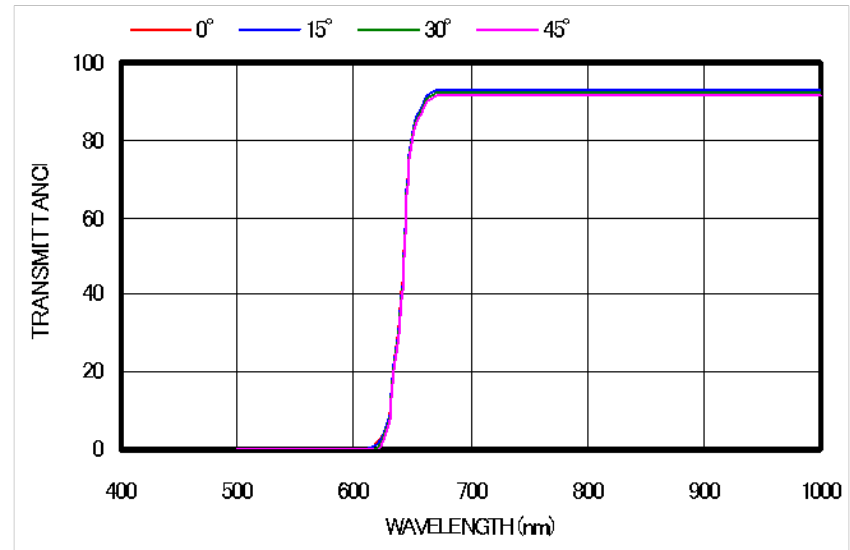


Why are thin film filters (without Cd, Pb) not used?

- Sensitive to the temperature change
- Sensitive to the humidity
- Sensitive to the angle of the incident light



thin film filter



glass filter