

204.1 - Molecular Absorption (film, filter, solid, and solution forms)

204.1 - Molecular Absorption (film, filter, solid, and solution forms) The optical SRMs for spectrophotometry are certified transfer standards that fall into three general categories: transmittance, wavelength, and stray radiant energy; each of which addresses a specific instrumental parameter of an absorption spectrometer that must be in control for accurate optical transmittance measurements. To obtain optimum verification results, each SRM must be used within the specified range of conditions for which it is intended.

SRM 2065 has been replaced by SRM 2035b.

[Also see: Table 204.2 - Optical Properties](#)

PLEASE NOTE: The tables are presented to facilitate comparisons among a family of materials to help customers select the best SRM for their needs. For specific values and uncertainties, the certificate is the only official source.

| SRM | Description | Unit Size | Parameter |
|-----------------------|---|-----------|--|
| 931h | Liquid Absorbance Standard for Ultraviolet and Visible Spectrophotometry | set (12) | absorbance standard |
| 1921b | Infrared Transmission Wavelength/Wavenumber Standard | 1 card | 3 μm to 18 μm |
| 2031c | Metal-on-Fused-Silica Neutral Density Filters (250 nm to 635 nm) | set (3) | 250 nm to 635 nm |
| 2034 | Holmium Oxide Solution Wavelength Standard (240 nm to 650 nm) | Cuvette | 250 nm to 650 nm |
| 2035b | Ultraviolet-Visible-Near-Infrared Wavelength/Wavenumber Transmission Standard | each | UV-Vis peak locations between 334 nm and 804 nm NIR band locations between 975 nm and 1945 nm |
