### Band filters

**Spectral range**

400 nm to 599 nm

<table>
<thead>
<tr>
<th>Preferred dimensions [mm]</th>
<th>DMZ 20 (2 cavities)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Type</strong></td>
<td><strong>λ_m-tolerance [% of λ_m]</strong></td>
</tr>
<tr>
<td></td>
<td>± 1</td>
</tr>
</tbody>
</table>

**Spectral values**

- **Half width HW [nm]**: 18–22
- Maximum spectral transmittance $\tau_{\text{max}}$ within passband:
  - $\geq 0.45$ ($\lambda_m$ from 400 nm to 449 nm)
  - $\geq 0.50$ ($\lambda_m$ from 450 nm to 599 nm)

- Q = tenth width
- q = thousandth width

- **Blocking range [nm]**: unlimited
- Average value $\tau_{\text{SM}}$ of spectral transmittance within blocking range: $\leq 10^{-5}$

**Other properties**

- **Humidity resistance of filters** with preferred dimensions: MIL-Std-810 C, method 507, proc. 1 : 5 cycles
- **Operating temperature**:
  - up to 70 °C for several hours
  - up to 100 °C for short periods
- **Temperature dependence of $\lambda_m$** $\Delta \lambda_m/\Delta T$ [nm/°C]: approx. +0.02
- **Notes**: Fit filters with mirror side facing light source.

![Spectral transmittance curve (general curve) of filter type DMZ 20](image)

**Table 10: Specifications of filter type DMZ 20**

![Preferred dimensions](image)

**Fig. 18: Spectral transmittance curve (general curve) of filter type DMZ 20**