Data Sheet CUV

TPX Cuvette for THz transmission measurements of liquids

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1 General

The TPX Cuvette (CUV) has been developed for simple transmission measurements of liquids. For the best results we recommend using our Sample Holder Transmission (SHT)\(^1\) to position the TPX Cuvette properly in the THz beam path.

2 Parameter

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Material</td>
<td>TPX</td>
</tr>
<tr>
<td>Complex refractive index</td>
<td>1.46 (k = 0.85 * 10(^{-3}))</td>
</tr>
<tr>
<td>Dimensions</td>
<td>50 x 20 x 41 mm (L x W x H)</td>
</tr>
<tr>
<td>Volume</td>
<td>13.6 ml</td>
</tr>
<tr>
<td>Path length (TPX)</td>
<td>2x 5.0 mm</td>
</tr>
<tr>
<td>Path length (liquid)</td>
<td>10.0 mm</td>
</tr>
<tr>
<td>Time delay</td>
<td>15.3 ps</td>
</tr>
</tbody>
</table>

\(^1\) Not included

Figure 1: CUV on our Sample Holder Transmission (SHT)\(^1\)
3 Terahertz Transmission Measurements

Figure 2: THz pulse (a) and spectrum (b) without and with an empty CUV
Figure 3: THz pulse (a) and spectrum (b) with an empty CUV and with two motor oil samples
4 Contact Details

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