Orthomode Transducers

FEATURES:
- VSWR < 1.2
- Isolation > 30dB in Linear Mode
- Higher Frequency Units will be Quoted on Request
- Available from 18.0 to 110 GHz with 3% or Greater Bandwidth

DESCRIPTION:
Cernex’s COT series orthomode transducer couples two orthogonal linearly polarized signals simultaneously while providing polarization isolation between transmit and receive.

SPECIFICATIONS:

<table>
<thead>
<tr>
<th>Waveguide Band</th>
<th>X</th>
<th>X/Ku</th>
<th>Ku</th>
<th>K</th>
<th>Ka</th>
<th>Q</th>
<th>U</th>
<th>V</th>
<th>E</th>
<th>W</th>
<th>F</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frequency Range (GHz)</td>
<td>8.2 to 12.4</td>
<td>10 to 15.0</td>
<td>12.4 to 18.0</td>
<td>18 to 26.5</td>
<td>26.5 to 40</td>
<td>33 to 50</td>
<td>40 to 60</td>
<td>50 to 75</td>
<td>60 to 90</td>
<td>75 to 110</td>
<td>90 to 140</td>
</tr>
<tr>
<td>% Bandwidth</td>
<td>±1 GHz</td>
<td>±1 GHz</td>
<td>±2 GHz</td>
<td>4%</td>
<td>4%</td>
<td>4%</td>
<td>3%</td>
<td>3%</td>
<td>3%</td>
<td>3%</td>
<td></td>
</tr>
</tbody>
</table>

A
- in | - | - | - | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 |
- mm | - | - | - | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 |

B
- in | - | - | - | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 |
- mm | - | - | - | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 |

C
- in | - | - | - | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 | 1.25 |
- mm | - | - | - | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 | 31.8 |

HOW TO ORDER:
Specify Model Number COT – LF HF IL IS – XX To be specified by the Factory

Example: To order an orthomode transducer with circular waveguide size of WR-10, and a frequency band of 90-91GHz, with an Insertion loss of 0.8dBand Isolation of 30dB specify COT909108030-XX.

CERNEX RESERVE THE RIGHT TO CHANGE THE SPECIFICATIONS WITHOUT NOTICE