**FINAL INSPECTION REPORT**

1x2 Wavelength Combiner / Splitter (WDM)

<table>
<thead>
<tr>
<th>Item #: RB41A1</th>
<th>SN: T005110</th>
</tr>
</thead>
</table>

**Port Jacket Color:** Blue Red

**Wavelength:**
- Blue Port: 488 nm
- Red Port: 640 nm

**Transmission**
- Blue: 95.7%
- Red: 96.8%

**Insertion Loss**
- Blue: 0.19 dB
- Red: 0.14 dB

**Isolation**
- Blue: 33.7 dB
- Red: 30.2 dB

**Bandwidth:**
- 483-493 nm
- 635-645 nm

**Transmission**
- Blue: 95.9%
- Red: 97.3%

**Insertion Loss**
- Blue: 0.18 dB
- Red: 0.12 dB

**Isolation**
- Blue: 24.8 dB
- Red: 23.7 dB

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**Center Wavelength**
- Blue Port: 488 nm
- Red Port: 640 nm

**Maximum Optical Power**
- With Connectors or Bare Fiber: 50 mW
- Spliced: 100 mW

**Fiber Type:** Nufern 460-HP

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**Test Data at Center Wavelength**

<table>
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<th>Red</th>
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**Test Data over Bandwidth**

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*a.* Specifies the maximum power allowed through the component. Performance and reliability under high power conditions must be determined within the user's setup.

*b.* All values are measured at room temperature without connectors.

*c.* Calculated from measured insertion loss data below.

*d.* Insertion loss is the ratio of the input power to the output power for each port of the wavelength combiner / splitter (WDM).

*e.* Isolation represents the minimum crosstalk between ports.

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**Verified by:** ____________________
This wavelength combiner / splitter (WDM) operation is only guaranteed over the specified bandwidth as defined by the colored regions above. Thorlabs displays a wider wavelength range to provide insight into how this particular device would perform if used outside its guaranteed operating range. The out-of-band performance can vary from device to device.