Radiant Communications VAB705 Series is available in multimode or Singlemode system.

The system can transmit distances of up to 140+ km on Singlemode fiber, and 8 km on multimode. The Series is capable of transmitting one way video and two channels of audio over one fiber, and can be ordered as a standalone module, in a 1U rackmount or rack mounted card cage in our CR200.

Radiant offers two versions of NTSC video quality for fiber transport, 8-bit which the VAB705 uses offering RS-250 medium haul quality featuring greater than 60 db signal to noise quality. Or 12-bit quality with the VAB740 series offering RS-250 short haul quality that has greater than 68 db signal to noise.

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## VAB705 Specifications

### RS250 Medium Haul Video
- **8-bit Digitaly Encoded Video**
  - Video Level: 1 Volt peak to peak
  - Video Bandwidth: 8 MHz
  - SNR/CTN: > 60 dB
  - I/O Impedance: 75 Ohms

### Audio
- **18-bit Digitaly Encoded Audio**
  - Input/Output Signal Level: 0 dB (2 Volt peak to peak)
  - Input/Output Impedance: 10k or 600 Ohms
  - Bandwidth: 16 kHz

### Optical
- **Wavelength:** 850nm, 1310nm, 1550nm, CWDM, DWDM
- **Number of Fibers:** 1
- **Power Budget:** see table below

### General Characteristics
- **Power:** 5W @ 90 to 240V AC
- **Operating Temp:** -20° to 50° C
- **Storage Temp:** -40 to 85° C
- **Size:**
  - rackmount: 17.0" W x 13.0" D x 1.75" H
  - Can/module: 2.8" W x 3.75" D x 1.1" H
  - Card cage: 2 Slots in CR200 card cage

### Ordering Information

<table>
<thead>
<tr>
<th>PART NUMBER</th>
<th>DESCRIPTION</th>
<th>ATTENUATION</th>
<th>MAX DISTANCES</th>
</tr>
</thead>
<tbody>
<tr>
<td>VAB705M-T-XY8</td>
<td>Transmitter A/V, Multimode 850nm</td>
<td>14dB</td>
<td>4km</td>
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<tr>
<td>VAB705M-R-XY8</td>
<td>Receiver A/V, Multimode 850nm</td>
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<td></td>
</tr>
<tr>
<td>VAB705ML-T-XY2</td>
<td>Transmitter A/V, Multimode 1300nm</td>
<td>12dB</td>
<td>8km</td>
</tr>
<tr>
<td>VAB705ML-R-XY2</td>
<td>Receiver A/V, Multimode 1300nm</td>
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<td></td>
</tr>
<tr>
<td>VAB705S-T-XY3</td>
<td>Transmitter A/V, Singlemode 1310nm</td>
<td>18dB</td>
<td>50km</td>
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<tr>
<td>VAB705S-R-XY3</td>
<td>Receiver A/V, Singlemode 1310nm</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Note:**
- Specify X—packaging of the unit: U—IU rack mount, M—modular (standalone), R—card cage rack mount
- Specify Y—connector type: A—SC/APC, E—SC, B—FC, Z—FC/APC, D—ST
- D= Digital version, analog version available check with factory
- Add –48 for 48VDC power
- CR200 Card Cage available for multiple units or multiple products
- For higher optical budgets and distances, 1550nm versions, CWDM and DWDM systems, contact factory
- Due to product enhancements, specifications are subject to change without notice.