

### 10-Bit Digitally Encoded Fiber Optic Video Transmission 4-Channel Video + 8 Simplex Audio over Fiber

4 →  
Video

#### System Design

Fiber Optic Video & Audio Transmitter & Receiver  
10-Bit Digitally Encoded Video & Audio Transmission  
VOS-4800FFT/R-10B provides for the digital transmission of 4-Channel Composite 10-Bit Video and 8 simplex 24-Bit audio. Ideal for Broadcast/Studio, CCTV audio and Professional AV applications.



8 →  
Audio

Stand-alone or rack-mount. All units of VOS-4800FFT/R-10B come in an insert card version. The cards can be inserted into our 14-slot, 19inch 4U rack-mountable card cage (VOS-CH04). One 4-Ch video and 8 simplex audio card require two slots widths.

Data

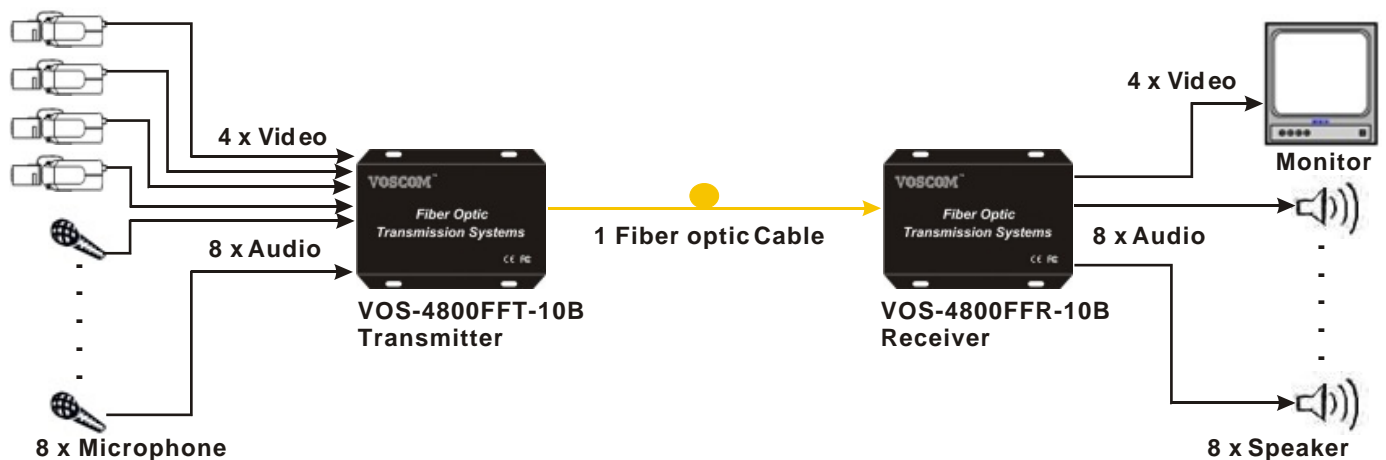
Single-Mode or Multi-Mode, VOS-4800FFT/R-10B can support FC/PC or ST/PC optical connector, can be used in Daisy-Chain system (Need to customize). The Transmission distance range according to the Optical Budget.

Ethernet

#### Features

- Support Point-to-Point or Daisy-Chain connection
- Uncompressed Digital Composite Video over one fiber
- 24-Bit Digitally Encoded Audio over one Fiber
- Compatible with all PAL, NTSC, SECAM Video Systems
- Multi-mode Fiber Support for Distances up to 1.5 km
- Single-Mode Fiber Support for Distances up to 100 km
- LED Status Provide Rapid Indication of Operating Parameters
- No EMI or RFI and no ground loops
- Support Coarse Wavelength Division Multiplexing (CWDM)
- Stand alone or rack-mount
- Produce according to customer's specifications, providing OEM

#### Typical Configuration



# 10-Bit Digitally Encoded Video

## Ordering Information

Model Number		Fiber Mode	Wavelengths	Optical Power Budget	Maximum Transmission Distance
Transmitter	Receiver				
VOS-4800FFMT-10B	VOS-4800FFMR-10B	Multi-Mode	1310nm	12dB	1.5km
VOS-4800FFST-10B	VOS-4800FFSR-10B	Single-Mode	1310nm	12dB	20km

### Note:

- The Optical Power Budget data fit Multi-mode(62.5/125  $\mu$  m), Single-Mode(9/125  $\mu$  m).
- When using 50/125  $\mu$  m multimode fiber, subtract 3 dB from the optical power budget.
- Optical transmission distance is limited to optical loss of the fiber and any additional loss introduced by connectors, splices and patch panels.
- Maximum transmission distance is also limited by fiber bandwidth.
- Power adapter is manufactured by third party and is supplied with fitted screw-terminal output cables. Power adapter included (for standalone) US, European, UK or Australian power plug.
- Please feel free to consult factory for any special requirement and customization

## Specification

<ul style="list-style-type: none"> <li>• Video</li> </ul>	<ul style="list-style-type: none"> <li>• Connectors</li> </ul>
<ul style="list-style-type: none"> <li>Number of Channels: 4-Channel Video</li> <li>Input/output impedance: BNC 75<math>\Omega</math></li> <li>Input/output Compatibility: PAL, NTSC, SECAM</li> <li>Input/output voltage: 1.0 Volt p-p</li> <li>Bandwidth: 6.5MHz</li> <li>Bit Resolution: 10-Bit Digital Transmission</li> <li>Differential Gain: &lt; 1.5%</li> <li>Differential Phase: &lt; 1.5<math>^{\circ}</math></li> <li>Tilt: &lt; 5%</li> <li>Signal-to-Noise Ratio(SNR): &gt; 67 dB</li> </ul>	<ul style="list-style-type: none"> <li>Video: 75<math>\Omega</math> BNC (Gold Center Pin)</li> <li>Audio: Terminal Block</li> <li>Optical: FC (standard), ST Optional</li> <li>Stand-Alone Power: Screw terminal block</li> <li>Rack Power: AC line cord</li> </ul>
<ul style="list-style-type: none"> <li>• Audio</li> </ul>	<ul style="list-style-type: none"> <li>• Electrical &amp; Mechanical</li> </ul>
<ul style="list-style-type: none"> <li>Number of Channels: 8 Channels Simplex Audio</li> <li>Audio input/output Level: 6 dBm</li> <li>Audio in/output impedance: 600<math>\Omega</math> Balanced/Unbalanced</li> <li>Bandwidth: 10Hz ~ 20KHz</li> <li>Bit Resolution: 24-Bit</li> <li>Signal-to-Noise Ratio(SNR): &gt; 80 dB</li> </ul>	<ul style="list-style-type: none"> <li>Input Power Requirements: DC 5V@3A</li> <li>Power Adapter: AC 100V~240V</li> <li>Power Consumption: &lt; 5W</li> <li>Stand-Alone Dimensions: 176.5mm <math>\times</math> 158mm <math>\times</math> 59mm</li> <li>Card for 4U Rack Dimensions: 145mm <math>\times</math> 170mm <math>\times</math> 45.4mm</li> <li>Shipping Weight: 2.5kg (include TX &amp; RX)</li> </ul>
	<ul style="list-style-type: none"> <li>• Environmental</li> </ul>
	<ul style="list-style-type: none"> <li>Operating Temperature: -45<math>^{\circ}</math> C ~ +75<math>^{\circ}</math> C</li> <li>Storage Temperature: -45<math>^{\circ}</math> C ~ +85<math>^{\circ}</math> C</li> <li>Relative Humidity: 0% ~ 95% (non-condensing)</li> <li>MTBF: &gt; 100,000 hours</li> </ul>

Due to continuous improvement, all products specifications are subject to change without further notice.  
 Contact us for custom requirements. E-mail: [Sales@voscom.com](mailto:Sales@voscom.com) Website: [www.voscom.com](http://www.voscom.com)