

### Fiber Optic Audio Transmission 1-Channel Duplex Analog Audio over Fiber

#### System Design

Video



Audio

Fiber Optic Audio Transmitter & Receiver  
VOS-0100DT/R provides for the 24-Bit digitally transmission of 1-Channel Duplex Analog Audio. Ideal for Broadcast /Studio, CCTV audio and Professional AV applications.

Stand-alone or rack-mount. All units of VOS-0100DT/R come in an insert card version. The cards can be inserted into our 14-slot, 19inch 4U or 6U rack-mountable cardcage (VOS-CH04 or VOS-CH06).

Data

Single-Mode or Multi-Mode, VOS-0100DT/R 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. Manufacturer's standard is: Single-mode 20km or Multi-mode 2km.

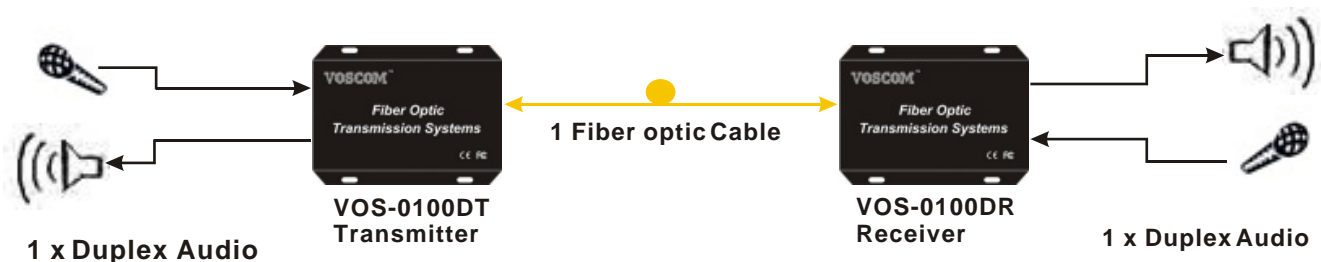
Ethernet



#### Features

- Support Point-to-Point or Daisy-Chain connection
- 24-Bit Digitally Encoded Audio over one fiber
- Multi-mode Fiber Support for Distances up to 2.0 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
- Stand alone or rack-mount
- Produce according to customer's specifications, providing OEM

#### Typical Configuration



# Analog Audio over Fiber

## Ordering Information

Model Number		Fiber Mode	Wavelengths	Optical Power Budget	Maximum Transmission Distance
Transmitter	Receiver				
VOS-0100DMT	VOS-0100DMR	Multi-Mode	1310nm/1550nm	16dB	2km
VOS-0100DST	VOS-0100DSR	Single-Mode	1310nm/1550nm	12dB	20km
VOS-0100DST-4	VOS-0100DSR-4	Single-Mode	1310nm/1550nm	18dB	40km
VOS-0100DST-6	VOS-0100DSR-6	Single-Mode	1310nm/1550nm	25dB	60km

- 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>• Audio</li> </ul> <p>Number of Channels: 1-Channel Duplex Audio            Audio input/output Level: 6 dBm            Audio in/output impedance: 600<math>\Omega</math> Unbalanced            Bandwidth: 20Hz ~ 20KHz            Bit Resolution: 24-Bit            Signal-to-Noise Ratio(SNR): &gt; 80 dB</p>	<ul style="list-style-type: none"> <li>• Connectors</li> </ul> <p>Audio: Terminal Block            Optical: FC/PC or ST/PC Optional            Stand-Alone Power: Screw terminal block            Rack Power: AC line cord</p>
	<ul style="list-style-type: none"> <li>• Electrical &amp; Mechanical</li> </ul> <p>Input Power Requirements: DC 5V@2A            Power Adapter: AC 100V~240V            Power Consumption: &lt; 3W            Stand-Alone Dimensions: 142mm <math>\times</math> 107mm <math>\times</math> 25mm            Card for 4U Rack Dimensions: 145mm <math>\times</math> 170mm <math>\times</math> 20mm            Shipping Weight: 1.8kg (include TX &amp; RX)</p>
	<ul style="list-style-type: none"> <li>• Environmental</li> </ul> <p>Operating Temperature: -45<math>^{\circ}</math> C ~ +75<math>^{\circ}</math> C            Storage Temperature: -45<math>^{\circ}</math> C ~ +85<math>^{\circ}</math> C            Relative Humidity: 0% ~ 95% (non-condensing)            MTBF: &gt;100,000 hours</p>