

# Fiber Optic Video Transmission for Fixed Cameras 16-Channel Composite Video over Fiber



## **System Design**

**Fiber Optic Video Transmitter & Receiver** VOS-16000FT/R can transmission 16-Channel composite video over fiber optical cable for fixed camera, no audio, no data.



Audio

**Stand-alone or rack-mount**. All units of VOS-16000FT/R come in an insert card version. The cards can be inserted into our 14-slot,19inch 4U or 6U rack-mountable card cage (VOS-CH04 or VOS-CH06). One 16-Channel video card require **Three slots widths**.

Data

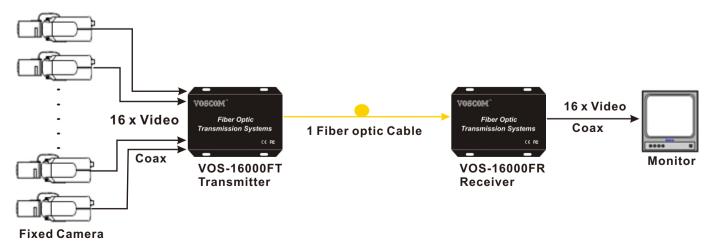
**Single-Mode or Multi-Mode**, VOS-16000FT/R can support FC/PC or ST/PC Optical connector, can be used in Daisy-Chain system (Need to customize). The Transmission distance range according to the Optical Budget. Manufacturer's standard is: Single-mode 20km or Multi-mode 500m.

#### Ethernet

#### **Features**

- Support Point-to-Point or Daisy-Chain connection
- Uncompressed Composite Video over one fiber
- Compatible with AHD, HD-TVI, HD-CVI and Normal Analog Video
- Compatible with all PAL, NTSC, SECAM Video Systems
- Multi-mode Fiber Support for Distances up to 500m
- Single-Mode Fiber Support for Distances up to 60 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**



# **Composite Video over Fiber**

#### **Ordering Information**

Model	- Fiber Mode	Wavelengths	Optical Power	Maximum Transmission		
Transmitter	Receiver	Fibel Mode	wavelengths	Budget	Distance	
VOS-16000FMT	VOS-16000FMR	Multi-Mode	1310nm	10dB	500m	
VOS-16000FST	VOS-16000FSR	Single-Mode	1310nm	12dB	20km	
VOS-16000FST-4	VOS-16000FSR-4	Single-Mode	1310nm	18dB	40km	
VOS-16000FST-6	VOS-16000FSR-6	Single-Mode	1550nm	25dB	60km	

#### Note

- The Optical Power Budget data fit Mulit-mode(62.5/125 μm), Single-Mode(9/125 μM.).
- When using 50/125 µM. 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**

_	N	/	н	a	_	_	

Number of Channels: 16-Channel Video

Input/output impedance: BNC 75 $\Omega$ 

Input/output Compatibility: PAL, NTSC, SECAM

Input/output voltage: 1.0 Volt p-p

Bandwidth: 6.5MHZ

Bandwidtn: 6.5MHZ

Bit Resolution: 8-Bit Digital Transmission

Differential Gain: < 1.5% Differential Phase: < 1.5°

Tilt: < 5%

Signal-to-Noise Ratio(SNR): > 67 dB

#### Connectors

Video: 75Ω BNC (Gold Center Pin)

Optical: FC/PC or ST/PC Optional

Stand-Alone Power: Screw terminal block

Rack Power: AC line cord

## • Electrical & Mechanical

Input Power Requirements: DC 5V@2A

Power Adapter: AC 100V~240V

Power Consumption: < 3W

19inch 1U Rack: 445mm x 220mm x 44.5mm

Shipping Weight: 6.0kg (include TX & RX)

#### • Environmental

Operating Temperature: -45°C~+75°C Storage Temperature: -45°C~+85°C

Relative Humidity: 0%~95% (non-condensing)

MTBF: >100,000 hours

www.voscom.com 2