

HDMI 2-FIBER Optical Extender HM-2TRL-110

The HDMI 2-Fiber Extender module supports WUXGA (1920 x1200@60Hz) resolution and transmits HDMI signals in non-compressed methods up to 2,000m using the 2-Fiber Duplex LC Single-Mode and up to 500m using the 2-Fiber Duplex LC Multi-mode. Using Self-EDID functions, it reads display information and stores in its transmitter and can use internal power with its Auto power switching function. (Using adapter power is recommended) It satisfy major overseas industrial certification standards such as FCC/CE.

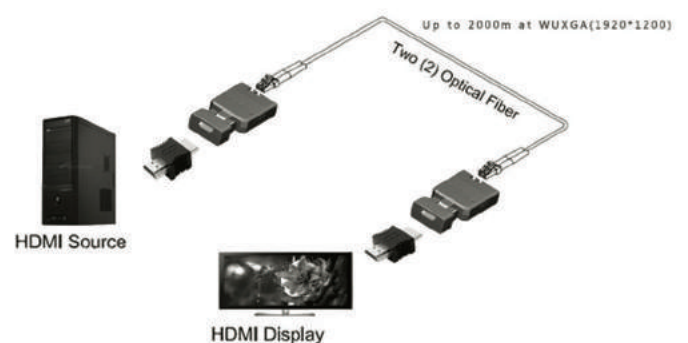
- Metal cases in compact sizes (zinc alloy)
- Utilize small spaces with its Flexible function (TILT function)
- Easy installation with two fibers (supports LC Single, Multi)
- Support Self-EDID function (display information entry)
- Installed with LED for checking the power and signals detected (transmitter-receiver)
- Support the largest WUXGA (1920x1200@60Hz) FULL HD
- Support transmission speed of 1.65Gbps per channel
- Transmit signals through Duplex LC single and multi mode fibers
- Transmit signals up to 2,000m (single), 500m(multi)
- Operating temperature range: 0 ~ 50°C
- Storage temperature range: -30 ~ 70°C
- Input power : +5V 1A(3.5mm x1.35mm), Auto Power switching-
- Module size : 70mm (D) x 37mm (W) x 15mm (H)

Product features

- Support WUXGA (1,920 X1,200@ 60Hz) resolution
- Applied to both single and multi mode optical fibers
 - (1) Transmit signals up to 2,000m using Duplex LC single mode fibers.
 - (2) Transmit signals up to 500m using multi mode fibers
 Using Self-EDID functions, it reads display information and stores in its transmitter
- Using Self-EDID functions, it reads display information and stores in its transmitter
- Compact designs were adopted so that it can be directly connected to graphic source systems and display systems
- +5 V DC power adapters for transmitters and receivers are included.
- Support CE standards for FCC and EMI / RFI certifications

Scope of application

- Digital LCD, PDP, meeting rooms, lecture halls, and kiosks
- Digital display system integration, military, aerospace industry
- Factory automation, traffic control platforms, etc.
- LED sign display and stadiums.
- Personal, business home theater systems, beam projector
- HDCP can be supported when our HDMI converter is applied



HDMI 2-FIBER Optical Extender : HM-2TRL-110

Electrical and Optical Characteristics

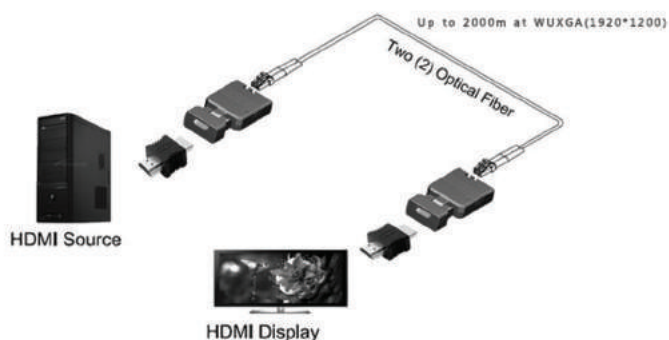
Transmitter module : HM-2TL-110

	Parameter	Symbol	Minimum	Typical	Maximum	Units
Power Supply	Supply Voltage	VCC	4.5	5.0	5.5	V
	Supply Current	ITCC	350	400	570	mA
	Power Dissipation	PTX	1.75	2.0	2.85	W
	Power Supply Rejection (Note1)	PSR		50		mVp-p
TMDS	Data Output Load	RLD		50		Ω
	Graphic Supply Voltage (Note2)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended High Level Input Voltage	GVIH	GVCC - 0.01	GVCC	GVCC + 0.01	V
	Single-Ended Low Level Input Voltage	GVIL	GVCC - 0.6	-	GVCC - 0.4	V
	Single-Ended Input Swing Voltage	GVISWING	0.4	-	0.6	V
Optical Link	Output Optical Power	Po	-10.0		-3.0	dBm
	Wavelength	c1	1260	1310	1360	nm
		c2	1480	1550	1580	
	Relative Intensity of Noise (Note3)	RIN		-117		dB/Hz
	Extinction Ratio	Ext	4	5		dB
	Rising/Falling Time	Trise/Tfall			260	ps
	Jitter in p-p value (Note4)	Tjitter			270	ps

Receiver module : HM-2RL-110

	Parameter	Symbol	Minimum	Typical	Maximum	Units
Power Supply	Supply Voltage	VCC	4.5	5.0	5.5	V
	Supply Current	IRCC	350	420	570	mA
	Power Dissipation	PRX	1.75	2.1	2.85	W
	Power Supply Rejection (Note5)	PSR		50		mVp-p
TMDS	Data Input Load	RLD		50		Ω
	Graphic Supply Voltage (Note6)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended Output Swing Voltage (Note7)	GVISWING	0.2		0.4	V
Optical Link	Receiving Optical Power	Po	-20		-3.6	dBm
	Receiving Wavelength	c1	1260	1310	1360	nm
		c2	1480	1550	1580	
	Signal_Detect Good	SDg			-17	dBm
	Signal_Detect Fail	SDf	-25			dBm
	Link Power Budget	Pbgt	10			dB
	Total Jitter (note 8)	Tjitter			309	ps

Note:The transmitter, ESL2B-Tx and the receiver ESL2B-Rx have the same mechanical dimensions.



DVI 2-Fiber Optical Extender DV-2TRL-110

The DVI 2-Fiber Extender supports WUXGA(1920x1200@ 60Hz) resolution and transmits DVI signals in non-compressed methods up to 2,000m using the 2-Fiber Duplex LC Single-Mode and up to 500m using the 2-Fiber Duplex LC Multi-mode. Using Self-EDID functions, it reads display information and stores in its transmitter and can use internal power with its Auto power switching function. (Using adapter power is recommended) It satisfy major overseas industrial certification standards such as FCC/CE.

- Metal cases in compact sizes (zinc alloy)
- Utilize small spaces with its Flexible function (TILT function)
- Easy installation with two fibers (supports LC Single, Multi)
- Support Self-EDID function (display information entry)
- Installed with LED for checking the power and signals detected (transmitter-receiver)
- Support the largest WUXGA (1920x1200@60Hz) FULL HD
- Support transmission speed of 1.65Gbps per channel
- Transmit signals through Duplex LC single and multi mode fibers
- Transmit signals up to 2,000m (single), 500m(multi)
- Operating temperature range: 0 ~ 50°C
- Storage temperature range: -30 ~ 70°C
- Input power : +5V 1A(3.5mm x1.35mm), Auto Power switching
- Module size : 70mm (D) x 37mm (W) x 15mm (H)

Product features

- Support WUXGA (1,920 X1,200@ 60Hz) resolution
- Applied to both single and multi mode optical fibers
 - (1) Transmit signals up to 2,000m using Duplex LC single mode fibers.
 - (2) Transmit signals up to 500m using multi mode fibers
 Using Self-EDID functions, it reads display information and stores in its transmitter
- Using Self-EDID functions, it reads display information and stores in its transmitter
- Compact designs were adopted so that it can be directly connected to graphic source systems and display systems
- +5 V DC power adapters for transmitters and receivers are included.
- Support CE standards for FCC and EMI / RFI certifications

Scope of application

- Digital LCD, PDP, meeting rooms, lecture halls, and kiosks
- Digital display system integration, military, aerospace industry
- Factory automation, traffic control platforms, etc.
- LED sign display and stadiums.
- Personal, business home theater systems, beam projector

DVI 2-Fiber Optical Extender : DV-2TRL-110

Electrical and Optical Characteristics

Transmitter module : DV-2TL-110

	Parameter	Symbol	Minimum	Typical	Maximum	Units
Power Supply	Supply Voltage	VCC	4.5	5.0	5.5	V
	Supply Current	ITCC	350	400	570	mA
	Power Dissipation	PTX	1.75	2.0	2.85	W
	Power Supply Rejection (Note1)	PSR		50		mVp-p
TMDS	Data Output Load	RLD		50		Ω
	Graphic Supply Voltage (Note2)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended High Level Input Voltage	GVIH	GVCC - 0.01	GVCC	GVCC + 0.01	V
	Single-Ended Low Level Input Voltage	GVIL	GVCC - 0.6	-	GVCC - 0.4	V
	Single-Ended Input Swing Voltage	GVISWING	0.4	-	0.6	V
Optical Link	Output Optical Power	Po	-10.0		-3.0	dBm
	Wavelength	λc1	1260	1310	1360	nm
		λc2	1480	1550	1580	
	Relative Intensity of Noise (Note3)	RIN		-117		dB/Hz
	Extinction Ratio	Ext	4	5		dB
	Rising/Falling Time	Trise/Tfall			260	ps
	Jitter in p-p value (Note4)	Tjitter			270	ps

Receiver module : DV-2RL-110

	Parameter	Symbol	Minimum	Typical	Maximum	Units
Power Supply	Supply Voltage	VCC	4.5	5.0	5.5	V
	Supply Current	IRCC	350	420	570	mA
	Power Dissipation	PRX	1.75	2.1	2.85	W
	Power Supply Rejection (Note5)	PSR		50		mVp-p
TMDS	Data Input Load	RLD		50		Ω
	Graphic Supply Voltage (Note6)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended Output Swing Voltage (Note7)	GVISWING	0.2		0.4	V
Optical Link	Receiving Optical Power	Po	-20		-3.6	dBm
	Receiving Wavelength	c1	1260	1310	1360	nm
		c2	1480	1550	1580	
	Signal_Detect Good	SDg			-17	dBm
	Signal_Detect Fail	SDf	-25			dBm
	Link Power Budget	Pbgt	10			dB
	Total Jitter (note 8)	Tjitter			309	ps

Note:The transmitter, ESL2B-Tx and the receiver ESL2B-Rx have the same mechanical dimensions.



DVI 2-FIBER Optical Extender DV-2TRL-100

The DVI 2-Fiber Extender supports WUXGA(1920x1200@ 60Hz) resolution and transmits DVI signals in non-compressed methods up to 2,000m using the 2-Fiber Duplex LC Single-Mode and up to 500m using the 2-Fiber Duplex LC Multi-mode. Using Self-EDID functions, it reads display information and stores in its transmitter and can use internal power with its Auto power switching function. (Using adapter power is recommended) It satisfy major overseas industrial certification standards such as FCC/CE.

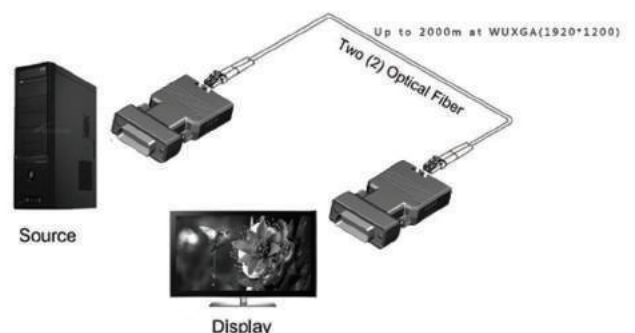
- Metal housing in compact sizes (zinc alloy)
- Easy installation with two fibers (supports LC Single, Multi)
- Support Self-EDID function (monitor information)
- Installed with LED for checking the power and signals detected (transmitter-receiver)
- Support the largest WUXGA (1920x1200@60Hz) FULL HD
- Support transmission speed of 1.65Gbps per channel
- Transmit signals up to 2,000m (single), 500m(multi)
- through Duplex LC single and multi mode fibers respectively
- Operating temperature range:0 ~ 50°C
- Storage temperature range:-30 ~ 70°C
- Input power : +5V 1A(3.5mm x 1.35mm), Auto Power switching
- Module size : 80mm (D) x 40mm (W) x 15mm (H)

Product features

- Support WUXGA (1,920 X1,200@ 60Hz) resolution
- Applied to both single and multi mode optical fibers
 - (1) Transmit signals up to 2,000m using Duplex LC single mode fibers.
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Scope of application

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DVI 2-FIBER Optical Extender _ DV-2TRL-100

Electrical and Optical Characteristics

Transmitter module : DV-2TL-100

	Parameter	Symbol	Minimum	Typical	Maximum	Units
Power Supply	Supply Voltage	VCC	4.5	5.0	5.5	V
	Supply Current	ITCC	350	400	570	mA
	Power Dissipation	PTX	1.75	2.0	2.85	W
	Power Supply Rejection (Note1)	PSR		50		mVp-p
TMDS	Data Output Load	RLD		50		Ω
	Graphic Supply Voltage (Note2)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended High Level Input Voltage	GVIH	GVCC - 0.01	GVCC	GVCC + 0.01	V
	Single-Ended Low Level Input Voltage	GVIL	GVCC - 0.6	-	GVCC - 0.4	V
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Optical Link	Output Optical Power	Po	-10.0		-3.0	dBm
	Wavelength	c1	1260	1310	1360	nm
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Receiver module : DV-2RL-100

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	Supply Current	IRCC	350	420	570	mA
	Power Dissipation	PRX	1.75	2.1	2.85	W
	Power Supply Rejection (Note5)	PSR		50		mVp-p
TMDS	Data Input Load	RLD		50		Ω
	Graphic Supply Voltage (Note6)	GVCC	+ 3.1	+ 3.3	+ 3.5	V
	Single-Ended Output Swing Voltage (Note7)	GVISWING	0.2		0.4	V
Optical Link	Receiving Optical Power	Po	-20		-3.6	dBm
	Receiving Wavelength	c1	1260	1310	1360	nm
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	Signal_Detect Good	SDg			-17	dBm
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	Link Power Budget	Pbgt	10			dB
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