

# DMX-2131

## Digital Video and 2 Channel AUDIO Demultiplexer

The DMX-2131 is a digital video and 2 channel **audiodemultiplexer**. It is used in i-MOD platform. It provides 2 analog stereo outputs or 4 AES3 digital audio outputs, 4 AES-3id digital audio outputs. The DMX-2131 demultiplexer extracts embedded audio from the SDI(SMPTE-259M-C, 270 Mbps, 525/59.94, 625/50 component). De-embedding channels are selectable and de-embedded audio can output to designated port. De-embedding modes are selectable, including L/R swap, copy and mix. 1 SDI outputs, SDIOUT with by-pass protection supported and 2 CVBS outputs for monitoring. Optional audio meter can be inserted on CVBS outputs. Level control is available for each audio channel. Equalizing is up to 984 ft (300 m). (Belden 1694A cable or equivalent cables).

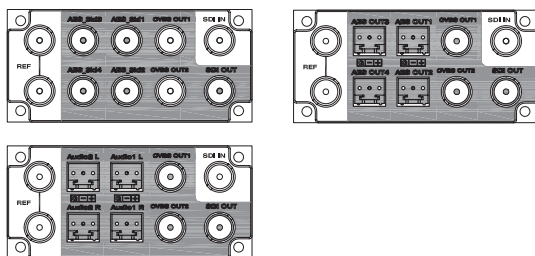
The DMX-2131 can be controlled locally by means of an intuitive card-edge interface or remotely using i-MOD platform control software IM-MASTER.

### FEATURES

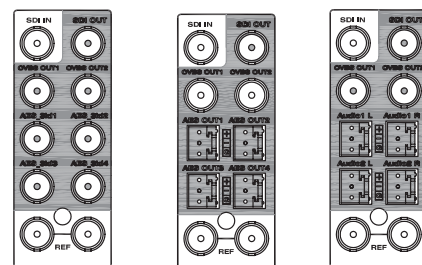
- Supports SMPTE 259M-C, 525/625 component inputs
- Supports SMPTE 272M standard
- 1 SDI outputs, by-pass protection supported
- 4 analog audio de-embedding or 4 AES/AES3-id digital audio outputs(option)
- Output audio gain selectable within  $\pm 20$ dB
- De-embedding channel selectable; de-embedded audio can output to designated port
- De-embedded mode selectable, including L & R swap, copy and mixing
- Automatic detection of input video and audio loss
- 2 CVBS outputs for monitoring, audio meter available
- Individual level control on each audio channel
- Equalizing up to 984 ft (300 m)
- Non-volatile memory
- Hot-swappable

### BACK MODULES

1RU



2RU



### SPECIFICATIONS

Specifications are subject to change without notice.

#### VIDEO INPUT

Signal Format.....SMPTE-259M-C, 270 Mbps,  
525/625 component  
Connector.....BNC (x1)  
Impedance.....75  $\Omega$   
Return Loss.....>15 dB @ 270 MHz  
Cable EQ.....<656 ft (200 m), 270 Mbps,  
Belden1694A cable or equivalent

#### DIGITAL VIDEO OUTPUT

Signal Format.....SMPTE-259M-C, 270 Mbps,  
525/625 component  
Connector.....BNC (x1)  
Impedance.....75  $\Omega$   
Return Loss.....>15 dB @ 270 MHz  
Amplitude.....800 mVp-p  $\pm 10\%$   
Jitter.....<0.2 UI  
Rise/Fall Time.....400~1500 ps,  
20%~80% of amplitude  
Overshoot.....<10% of amplitude

#### ANALOG VIDEO OUTPUT

Signal Format.....CVBS  
Standards.....NTSC, PAL  
Quantization.....10 bits  
Connector.....BNC (x2)  
Impedance.....75  $\Omega$   
Return Loss.....>40 dB @ 6 MHz  
Amplitude.....1.0 Vp-p  $\pm 3\%$   
Chr/Lum Delay Diff.....<5 ns

S/N Ratio.....>70 dB @ 6 MHz

#### AES-3ID DIGITAL AUDIO OUTPUT

Signal Format.....BNC AES-3id  
Connector.....BNC (x4)  
Impedance.....75  $\Omega$   
Output Sampling Rate..... 48 kHz  
S/N Ratio.....>75 dB  
Audio Frequency Response.....< -80 dB, 20 Hz ~ 20 kHz  
Level.....1Vp-p $\pm 10\%$   
Jitter.....< 0.02 UI

#### AES3 DIGITAL AUDIO OUTPUT

Signal Format.....AES3  
Connector.....3Pin (x4)  
Level.....5Vp-p $\pm 10\%$   
Impedance.....110 $\Omega$   
Jitter.....< 0.02 UI  
Output Sampling Rate..... 48 kHz

#### ELECTRICAL

Power.....7 W

#### ENVIRONMENTAL

Operating Temperature.....32° ~ 104° F (0° ~ 40° C)  
Relative Humidity.....10% ~ 90%

# BLOCK DIAGRAM

