MAGEWELL

Pro Convert SDI TX Technical Specifications

Copyright (c) 2011–2023 Nanjing Magewell Electronics Co., Ltd. All rights reserved.

Specifications are based on current hardware, firmware and software revisions, and are subject to change without notice.

NDI® is trademark or registered trademark of Vizrt Group.

Revised on 22/12/2023

Input Features

- Max video input: 2048x1080 60fps. Supported resolutions include:
 - 2048x1080p/1920x1080p 23.98/24/25/29.97/30/47.95/48/50/59.94/60
 - o 2048x1080i/1920x1080i 23.98/24/25/29.97/30/47.95/48/50/59.94/60
 - 1280x720p 50/59.94/60
 - 720x576 25p/50i (PAL SD)
 - 720x480 29.97p/59.94i (NTSC SD)
- Support RGB/RGBA/YUV/YUVA signals with 10/12-bit color depth
- Support RGB 4:4:4, YCbCr 4:4:4, YCbCr 4:2:2 color sampling
- Support RGB, YUV BT.601/709/2020 video input
- 16-channel SDI embedded audio inputs
- SD/HD/3G-SDI BNC input
- Support SD (ST 259)/HD (ST 292)/3Ga (ST 425)/3Gb (ST 425)/3Gb-DL (ST 425)/3Gb-DS (ST 425) SDI standards
- Receive 3G-SDI transmitted up to 180m (591ft)

NDI[®] Encoding Features

- Encoding Full NDI real-time stream at up to 2048x1080 60fps 4:2:2 8-bit
- Output the same resolution as input or any custom resolution. Typical outputs include:
 - 2048x1080p/1920x1080p 23.98/24/25/29.97/30/47.95/48/50/59.94/60
 - o 2048x1080i/1920x1080i 25/29.97/30/47.95/48/50/59.94/60
 - 1280x720p 50/59.94/60
- Output frame rate same as the original, 1/2, 1/3 or 1/4 of input frame rate
- Encoding 16-channel NDI-embedded audio
- Support NDI 5.x

Configuration Management

- Register with Control Hub
- Remote control via WebUI and Control Hub
- Provide comprehensive information regarding the device and signals in real-time
- Allow to configure how an input is processed and encoded, including deinterlacing, up/down scaling, frame rate, aspect ratio, as well as the network connection
- Update firmware
- Support USB RNDIS/ECM
- Support IE/Edge/Firefox/Chrome/Safari/Opera web browsers
- Provide HTTP APIs

On-board Control Buttons

• 16 Position Rotary DIP Switch: set board-index from 0 to F

PTZ Control

- Control PTZ cameras using protocols of VISCA, Visca UDP, Visca UDP2rs232, PELCO-P and PELCO-D via NDI
- Mini-DIN–8 jack (shared with Tally light)

Network Interfaces

• 10/100/1000Mbps Ethernet

USB Interface

- USB2.0 Type B
 - 5V/2.1A power supply
 - USB RNDIS/ECM

Supported Products

- NDI Studio Monitor
- OBS
- vMix
- Any other NDI-enabled product

LED Indicators

- Status LEDs indicate:
 - o Power supply: on/off
 - Input signal: locked/unlocked

Form Factor

• 100.9mm (L) x 60.2mm (W) x 23.3mm (H)

Accessories

- USB 2.0 A to B cable
- 5V/2.1A power adaptor
- Mini-DIN 8 breakout cable
- Tally light
- L-bracket

Screw Mounting Hole

• 1/4-20 threaded hole

Power Consumption

- 5V max current: ~1.5A
- Max power consumption: ~7W

Working Environment

- Operating temperature: 0 to 40 deg C
- Storage temperature: -20 to 70 deg C
- Relative humidity: 5% to 90% non-condensing