



3-G SDI to Analog Scaling Video Converter

Overview

The AVI SDI to Analog Scaling Video Converter is a rugged stand-alone unit that can convert SDI video inputs to analog video.

The SDI input accepts SD, HD, and 3-G SDI video and converts it to NTSC/PAL composite, NTSC/PAL S-Video signals, or Component Video. Low latency, high performance processing with advanced scaling provides SDI decoding to the analog outputs. The SDI input includes a re-clocked SDI loop through. For multiple channel units, each channel can be independently configured for video types. Available in 1, 2, or 4 channel versions.

Stand-alone or in combination with various AVI system components, AVI's rugged SDI to Analog Scaling Video Converter offers a high-performance solution for converting, SDI video signals to NTSC, PAL, S-Video, or Component video. Now all sensors and mission video sources can be used, maximizing the capability of the mission system.



Standard Features

- SMPTE 259M through SMPTE 425M SDI input
- SDI re-clocked SDI loop through
- Component outputs can be scaled to any SMPTE standard resolution
- Inputs auto detected
- Advanced video processing with Anti-Aliasing and 3D interlacer
- Aspect ratio conversion and selection



Two channel unit shown.

- For 2 and 4 channel versions, each channel is independent
- SMPTE 425M, 259M, 292M, 296M, ITU-R BT.656 and ITU-R BT.601 compliant
- Input resolution and frame rate auto detected
- Easy setup by USB for each channel
- Setup software included
- 9 – 36 V DC Power
- MIL-STD 38999 circular power connector
- Three-year warranty

Benefits

- Converts SDI format to analog for legacy devices
- Reduction in wiring weight and complexity – low weight coaxial cable can be used
- Open - works with any Component, NTSC, PAL, or S-Video signal source
- Continue using legacy video sink devices with upgraded SDI sensors and distribution infrastructure
- Available in 1, 2, or 4 channel versions

Typical Applications

- Surveillance systems
- Naval, Air Force and Coastguard rotary and fixed wing mission systems
- Ground Vehicle sensor mission systems



AVI – Optimize your sensor

3-G SDI to Analog Scaling Video Converter - Specifications

Video Inputs	<ul style="list-style-type: none"> • HD/SD/3-G SDI <ul style="list-style-type: none"> ○ Re-clocked, 10 bit, 4:2:2 color encoding ○ Connector type – BNC 75 Ω 	Functionality	<ul style="list-style-type: none"> • Analog output type • Component Output SDI resolution and frame rate • Output aspect ratio selection • Component, Composite, and S-Video input type • SDI color sampling type
Video Outputs	<ul style="list-style-type: none"> • HD/SD/3-G SDI loop through <ul style="list-style-type: none"> ○ Re-clocked, 10 bit, 4:2:2 color encoding ○ Connector type – BNC 75 Ω • Component (Y'P_BP_R), or NTSC/PAL (Composite), or NTSC/PAL S-Video (Y'/C) <ul style="list-style-type: none"> ○ Connector type – BNC 75 Ω 		
Video Input Formats	<ul style="list-style-type: none"> • SDI SMPTE 259/292M/425M <ul style="list-style-type: none"> ○ 1080p 60/50/30/25/24/23.98Hz ○ 1080i 60/50Hz ○ 720p 60/50/30/25/24Hz ○ 625i 50Hz ○ 525i 60Hz 	Environmental	<ul style="list-style-type: none"> • Operating Temp Low -45°C DO-160G Cat B2 • Operating Temp High +70°C DO-160G Cat B2 • Short Term Op Temp Low -45°C DO-160G Cat B4 • Short Term Op Temp High +70°C DO-160G Cat B4 • Ground Survival Low Temp -55°C DO-160G Cat B4 • Ground Survival High Temp +85°C DO-160G Cat B4 • Temp Variation 5C° per minute DO-160G Cat B • Humidity 38C° to 95@ 50C° DO-160G Cat A • Operational Shock 6g @ 11ms, 20G DO-160G Cat B • Vibration Random, 10-2000Hz DO-160G Cat U, U2 • Explosion Proofness* MIL-STD-810G Method 511.6 • Waterproofness Drip Test DO-160G Cat W • Magnetic Effect DO-160G Cat A • Power Input* DO-160G Cat A • Voltage Spike 2x Line Voltage DO-160G Cat B • EMI/EMC Sec 18, 19, 20, 21 DO-160G Cat B, CC, R, M • ESD* DO-160G Cat A • Ingress Rating IP67
Video Output Formats	<ul style="list-style-type: none"> • Analog Inputs <ul style="list-style-type: none"> ○ 1080p@60/50/30/25/24Hz ○ 1080i@60/50Hz ○ 720p @60/59.94/50Hz ○ 625/25 PAL, 525/29.97 NTSC 		
Model Numbers	<ul style="list-style-type: none"> • C150304-00 4 channel Product Number • C150302-00 2 channel Product Number • C150301-00 1 channel Product Number 	DO-160 testing to be completed *By Similarity	
Power	<ul style="list-style-type: none"> • +9 to +36 DC • 0.21 amps @28V DC, Single Channel • 0.41 amps @28V DC, Two Channel • 0.81 amps @ 28V DC, Four Channel • Connector Type MIL-STD D38999/20MB98PN 	Dimensions and Weight	<ul style="list-style-type: none"> • 181 mm [7.13 in] W, 36.81 mm [1.45 in] H, 100 mm [3.9 in] D, 1 CH • 181 mm [7.13 in] W, 49.81 mm [1.96 in] H, 100 mm [3.9 in] D, 2 CH • 302 mm [11.1 in] W, 50.81 mm [2.0 in] H, 100 mm [3.9 in] D, 4 CH • 0.65 kg [1.43 lb], Single Channel • 0.74 kg [1.63 lb], Two Channel • 0.97 kg [2.14 lb], Four Channel

