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Product Data Sheet

(01/27/2022)

NTSC to SDI Video Converter/Splitter Family

ADV-2NTSDI-2SVSDI

Example Models:	Inputs	Outputs
ADV-NTSDI-11	1 NTSC	1 SDI
ADV-NTSDI-12	1 NTSC	2 SDI
ADV-NTSDI-22	2 NTSC	2 SDI/2 channels
ADV-2NTSDI-2SVSDI	2 NTSC	1 SDI/each
	+	
	2 SVSDI	1 SDI/each

General:

Eon's **V**ideo **D**istribution **A**rchitecture includes a family of existing or customized converters that process analog (10Hz – 30MHz) video (VGA, NTSC, PAL, RS343) inputs to digital SDI outputs in fixed or switchable configurations. All units are Environmental and EMI qualified to MilStd 810, 461, 704, DO160.

An example of a more complex unit is the ADV-2NTSDI-2SVSDI that has two NTSC inputs and two S-video inputs, each with its own dedicated SDI output. Above is a picture of the unit and below is the Outline and Mounting (4"w x 2"h x 3.06"d) drawing to show this configuration.

The least complex is 1 or 2 NTSC in and 1 or 2 SDI out in a 3.06"w x 1.60"h x 3.06"d chassis. The Outline and Mounting drawing is attached below. It is easy for Eon to customize these configurations.

Please access Eon's website for information regarding other video products, including rugged military splitters/converters/selectors, cameras, monitors and recorders. Additional Eon product offerings are Interference Blankers, Rugged Power Supplies, Audio Systems, and System Engineering/Custom Development. **Through our recently acquired Instrumentation Technology Systems (ITS) product line**, Eon also offers a broad array of test instrumentation including HD-SDI and Analog Video Inserters, Recorders, Controllers, Time Code Generators/Displays.

NTSC to SDI:

Power input of 16 – 40vdc is received through a MilStd D38999/20WA98PN connector. All units accept standard NTSC, PAL or S-Video inputs through 75ohm BNC connectors and distribute the converted SDI outputs through 75ohm BNC's. The output digital signal is determined by the frame rate of the incoming video. Each output is amplified and equalized to unity gain with respect to the input signal level.

Configuration:

See the attached Example Outline and Mounting Drawing.

Specifications:

Signal Input:
NTSC, PAL, SECAM
Signal Output:
SDI - SMPTE ST 259-C (270 Mb/sec)
Gain: Unity
Finish: (except for screws, base and connectors): Carc White or Black Anodize
Input Voltage: 16-40 VDC
Power Consumption: 2.5 - 5 Watts nominal depending on configuration
Weight: < 1 lb (nominal)

Qualification (Data available upon request):

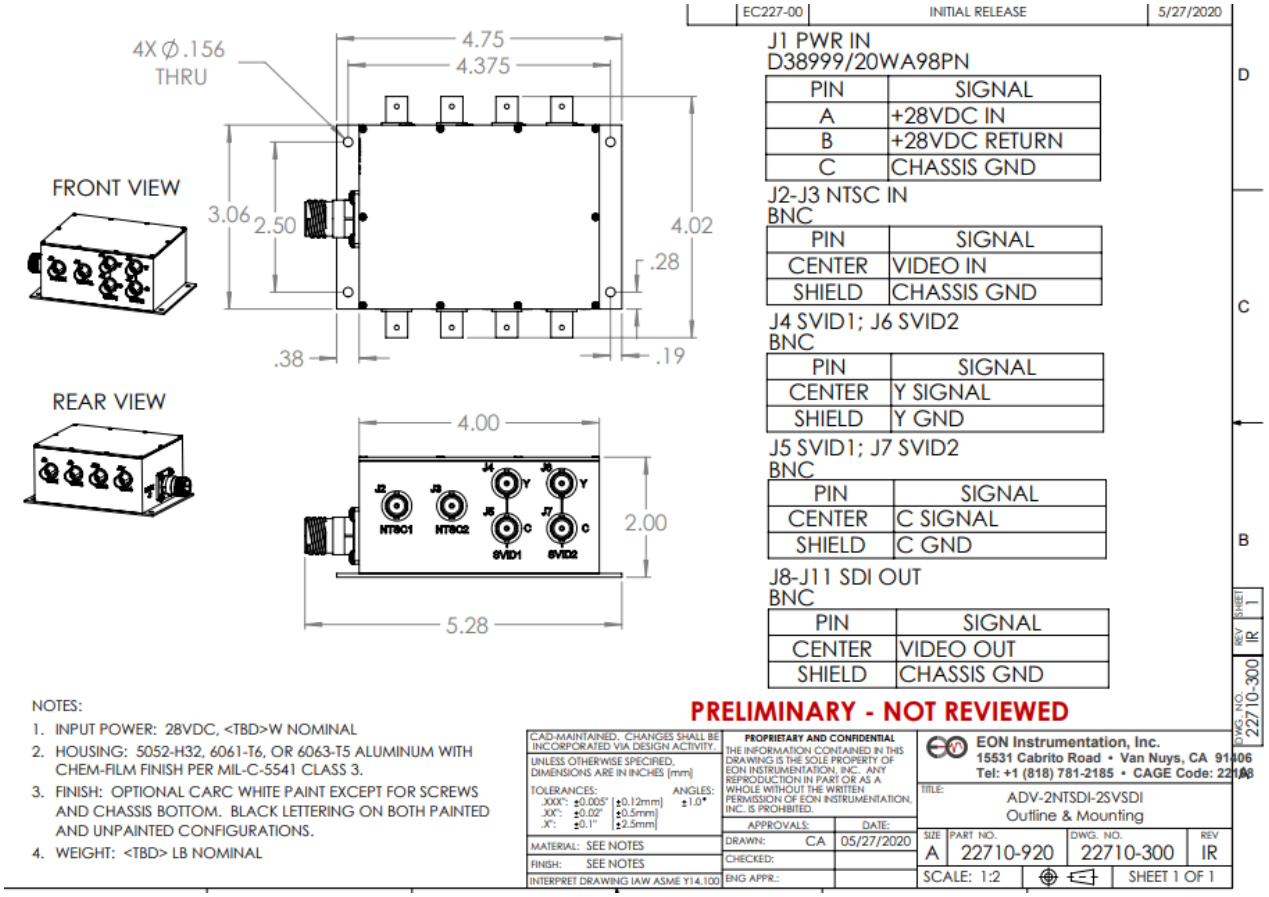
Power: Mil-Std-704D, 1275
Environmental: Mil-Std-810G
Temperature:
Storage: -55° to +85°C
Functional: -25° to +55°C
Altitude: Non-Pressurized Area, Cl 1 per MIL-E-5400T (0-50,000Ft)
Humidity: DO-160C, Cat A
MIL-STD-810E Method 507.3, Procedure III (Aggravated), 10ea 24 hr cycles
Salt Fog: MIL-STD-810E Method 509.3, Procedure I
Sand and Dust: MIL-STD-810E Method 510.3, Procedure I
Acceleration: Operational: +/-6.5G's, Non-operational: +/-9 G's
Endurance Sine on Random Vibration:
MIL-STD-810F Method 514.5 Category 13 and IF-3AA0-08002B.
Rapid Decompression: MIL-STD-810E Method 500.3 para II-3.3 Procedure III
Functional and Crash Safety Shock Testing:
DO-160C Section 7 Impulse, 6 G's Operational, 15 G's Crash Safety.

EMI: Mil-Std-461

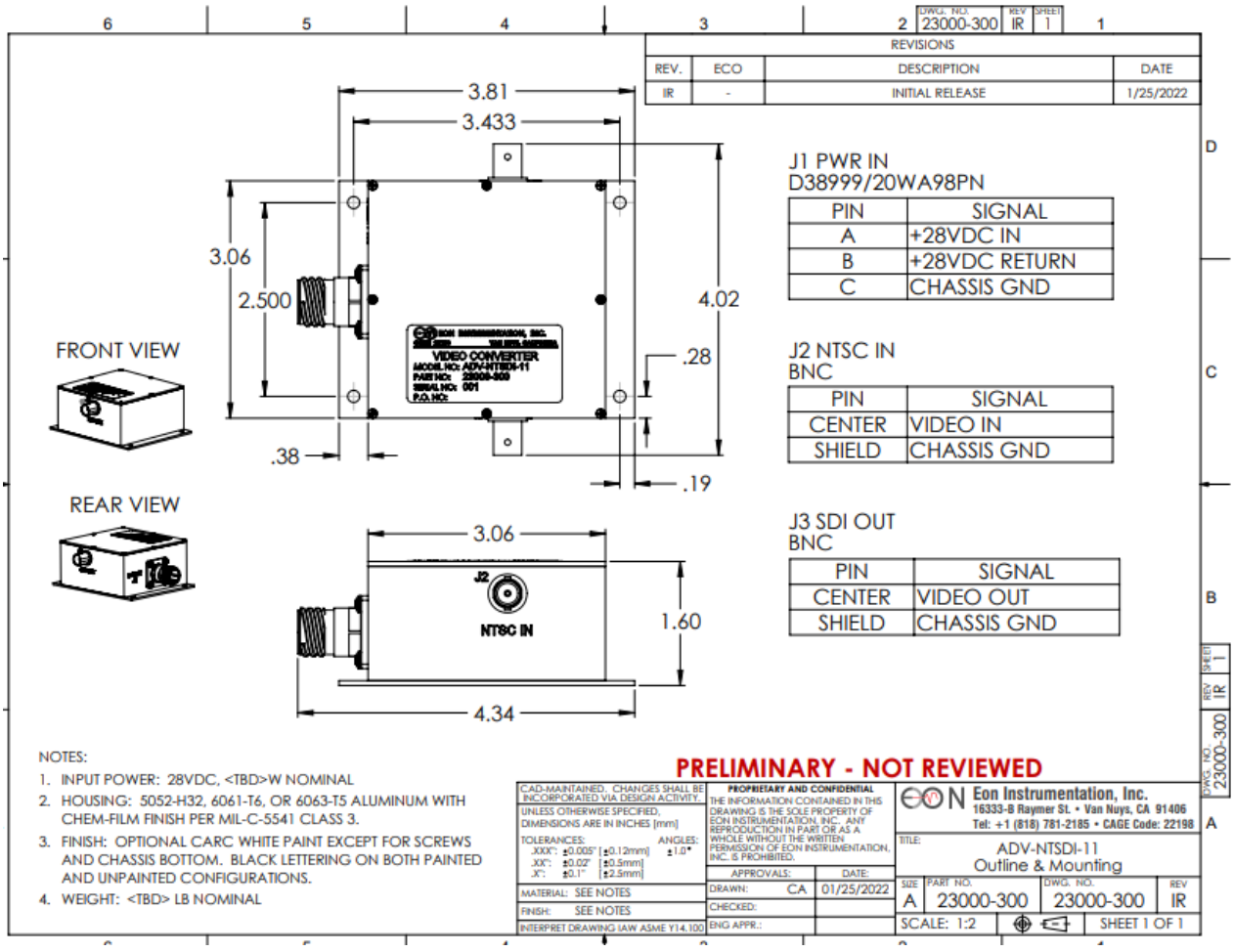
Conducted Emissions, CE101; CE102
Radiated Emissions, RE101; RE102
Conducted Susceptibility, CS101; CS114
RF Conducted Susceptibility, RFCS
Radiated Susceptibility, RS103
RF Radiated Susceptibility
Electrostatic Discharge, ESD
Lightning Induced Transient Susceptibility, LITS

MTBF: > 150,000Hrs operating

Example Outline and Mounting Drawings:



ADV-2NTSDI-2SVSDI Outline and Mounting Drawing



ADV-NTSDI-11 Outline and Mounting Drawing