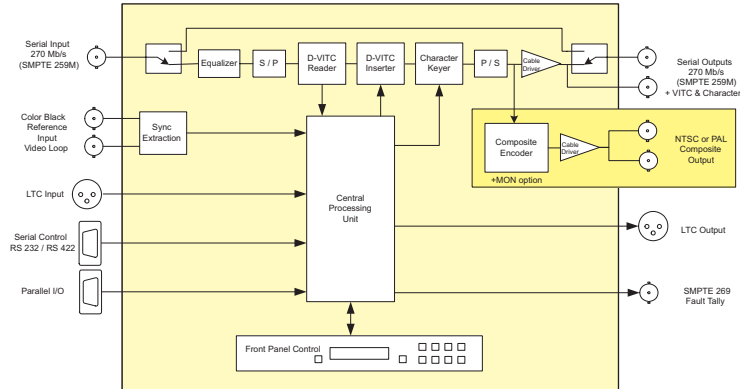


The 8010TM SDI Time Code Master is a full function time code reader/generator system for serial digital video. The 8010TM is a combination generator/reader for Linear Time Code (LTC) and Digital Vertical Interval Time Code (D-VITC), and contains a high resolution character inserter that can burn the generator or reader numbers directly into the digital program output as well as an optional analog monitoring output. A 16 digit alphanumeric display can be quickly delegated to show the required data.

The 8010TM will accept 525 or 625 line component digital video. The 8010TM's time code generator can be preset to lock to the digital program video either by simple frame locking, or where necessary it will color lock to an analog Color Reference in accordance with the 4 field NTSC or 8 field PAL color sequence.



►Features & Benefits

- Accepts 4:2:2 (525 and 625 line) digital video signals
- Serial digital video input provides automatic cable equalization on cable lengths up to 200 meters of low loss coax such as Belden 8281
- Optional bypass relay for program path protection on power loss
- Auxiliary serial digital video output (not bypass protected)
- Passes embedded audio and other ancillary data signals
- LTC and D-VITC Time Code Reader with line select
- LTC and D-VITC Time Code Generator with line select
- Character Inserter displays reader & generator time and user bits in the picture
- Separate positioning of each character window
- 16 digit Alpha-numeric display, with 16 pushbuttons
- Serial Remote Control of most functions - Broadcasts reader data or sends it on request
- Rack mountable
- Momentary or continuous jam sync modes
- User bit transfer from reader time or user bits
- 25Fps ↔ 29.97Fps SMPTE drop frame converter
- Optional composite monitor output converts digital video to analog
- GPI Remote Control mode allows user to pass remote control contact closure information in VITC user bits
- Recalculates EDH after VITC and character insertion
- Optional input bypass relay for power failure bypass protection
- Optional dual power supply configuration

►Specifications

Serial Digital Video Input:

Standards: SMPTE 259M-C (270Mb/s)
 Connector: 1 BNC per IEC 61169-8 Annex A
 Equalization: Automatic 200m @ 270Mb/s with Belden 8281 or equivalent cable 150m @ 270Mb/s when bypass relay is active
 Return Loss: > 15dB up to 540Mb/s
 D-VITC Reader: SMPTE 266M

Frequency Response: 0.8dB to 4MHz
 Differential Phase: < 0.9° (< 0.6° typical)
 Differential Gain: < 0.9% (< 0.5% typical)
 SNR: > 56dB to 5MHz (shallow ramp)
 Impedance: 75Ω

Serial Remote Control:

Standard: RS-232 or RS-422, programmable baud rate
 Connector: 9-pin female "D"
 Control: Firmware upgrade, serial remote control of all functions

Serial Digital Video Outputs:

Number of Outputs: 1 with relay bypass (+BP option)
 1 additional output
 Connector: BNC per IEC 61169-8 Annex A
 Signal Level: 800mV nominal
 DC Offset: 0V ±0.5V
 Rise and Fall Time: 900 ps nominal
 Overshoot: < 10% of amplitude
 Return Loss: > 15dB up to 540Mb/s
 Wide Band Jitter: < 0.2UI
 D-VITC Generator: SMPTE 266M

LTC Generator:

Standard: SMPTE 12M-1
 NTSC 2/4 field; PAL 4/8 field menu selectable
 NTSC or 24Fps (5010-24Fps only)
 Output: 3-pin male XLR type
 Level: Adjustable, 0.5V to 4.5V p-p
 Rise Time: 40 ± 10 ms
 Jitter: < 2 ms

Electrical:

Power: Auto ranging 100-240V AC 50/60Hz 30W
 Safety: TÜV listed
 Complies with EU safety directives
 EMI/RFI: Complies with FCC Part 15 Class A
 EU EMC Directive

LTC Reader:

Standard: SMPTE 12M-1
 Input: 3-pin female XLR type
 Level: 0.2 to 4V p-p, balanced or unbalanced
 Speed: 1/30th to 70x play speed, fwd and rev, machine dependent

Physical:

Single Power Supply version:
 Dimensions: 19" W x 1.75" H x 7.75" D.
 (483mm W x 45mm H x 196mm D)
 Weight: 7 lbs. (3.2 Kg)

Analog Monitor Video Outputs (with +MON option):

Standards: Analog composite NTSC if input is 525i/59.94 video
 Analog composite PAL if input is 625i/50 video
 Connectors: 2 BNC per IEC 61169-8 Annex A
 Signal Level: 1V p-p nominal, internally adjustable
 DC Offset: 0V ±0.1V
 Return Loss: > 35dB up to 5MHz

General Purpose Inputs and Outputs:

Inputs: 6, programmable control functions
 Outputs: 2, programmable tally functions
 Connector: 9-pin female "D"
 Type: Opto-isolated, active low
 Signal Level: Pulled up to +5V. 3.3V DC provided

Dual Power Supply version:

Dimensions: 19" W x 1.75" H x 18.75" D.
 (483mm W x 45mm H x 477mm D)
 Weight: 8 lbs. (3.5 Kg)

►Ordering Information

8010TM SDI Time Code Generator/Reader with Character Inserter

Ordering Options

- +2PS Redundant Power Supply
- +MON Analog Monitoring Option
- +BP Bypass Relay Option