IRIG TIME CODE GENERATOR/TRANSLATOR

The ES-295 is an IRIG (A, B or G) Time Code Generator and Translator. When in the Generator (stand-alone) mode, day of year and time are manually set using the front panel controls or the supplied PC software. In the Translator (sync) mode, the unit accepts IRIG-A, IRIG-B or IRIG-G time code. In either mode, the ES-295 provides an IRIG-A, IRIG-B or IRIG-G time code output (AM & TLL) and a 1 pps output. Input and output time code selections are also made using the front panel controls or the supplied PC software.

Available on the ES-295 is the option GPS. When in the GPS mode, the unit is synchronized to UTC via the internal GPS receiver. The Generator or Translator modes can alternatively be selected when the GPS option is specified.

Features

- IRIG-A, B or G Input/Output
- Generates/Translates Time Code
- USB Setup Interface
- Universal Power Supply (90-264 VAC)
 Rack Mount Enclosure

• Settings Retained in Battery Backed Ram

LCD Setup/Status Display

• Time Delay

- Error Bypass/Freeze Modes Analog or TTL Input Modes
- Time Code Lock Ouput
- Optional GPS Receiver



A nine-digit .56" amber LED display (Days, Hours, Minutes & Seconds) provides a readout of the input/ output time code. The IRIG time code input and outputs are via rear mounted BNC connectors. There are two outputs of the AM signal and two outputs of the TTL signal. The 1pps signal is also available on a pair of BNC connectors. The ES-295 is housed in a single height rack mount enclosure which is black anodized.

The ES-295 incorporates an Error Bypass mode and a Freeze mode. In Error Bypass mode the outputs are continuously generated whether time code is erroneous or lost. In Freeze mode the outputs stop when errors in the time code input are detected or when time code is lost.

The front panel controls (Menu, Up & Down) allow access to all configuration settings as displayed on the 16 x 2 character "Setup/Status" LCD. The same controls are available on the PC software which is accessible via the rear mounted USB port.

SPECIFICATIONS

1 PPS Outputs: TTL outputs, positive edge true

Option GPS>10nS

Accuracy: Standard VCTCXO >15mS per day

Option OCXO >2mS per day

Options: DC, EXT, GPS, LED, OCXO, NTP2, UL, Custom

50% duty output < 1 mS accuracy, 2 BNCs

Power: 90 – 264 VAC, 47 – 63 Hz, 15 Watts max (Option "DC" only) +11 to +35 VDC, 1 Amp max

Mechanical: Rackmount Enclosure 134" H x 19" W x 91/2" D Time Display: 9-digits, 0.56" yellow LED

Setup/Status Display: 16 x 2 character LCD IRIG Input: IRIG-A, IRIG-B or IRIG-G

100 mVPP - 10 VPP AGC input IRIG AM Outputs: IRIG-A, IRIG-B, or IRIG-G

0.5-5 Vpp (mark amplitude), Mark to Space 3 to 1, 600Ω , 2 BNCs

IRIG TTL Outputs: IRIG-A, IRIG-B or IRIG-G

 \geq 4.0 V high and \leq 0.6 V low, 5 Vpp, 2 BNCs

