

HD /SD Video Processing Frame Synchronizer

The 7550 HD Processing Frame Sync accepts a high definition or standard definition video signal for processing, synchronization and timing.

Flexible Synchronization

An infinitely adjustable timing system genlocks to your house reference. The 7550 genlocks to either composite video (PAL or NTSC) or to HD Tri-Level Sync. The module can lock to the frame's master reference or reference can be connected directly to the module's external reference BNC. The serial output timing can be set anywhere within a frame of the selected input reference, which can be the module's external BNC reference or the frame's master timing reference.

Upon loss of signal, the 7550 provides freeze frame or black until the signal is recovered. In freeze mode, audio can be muted or passed as desired.

Uncompromised Pictures

The HD or SD SDI input is carried at full, uncompressed bandwidth throughout the entire module, and EDH monitoring of the digital input alerts you to any incoming problem. EDH detection, monitoring and insertion are standard on the 7550. Flags are reported through Avenue PC.

Complete Proc Amp Functions

The 7550 has a full-featured Proc Amp for adjustment of every signal parameter. Proc controls include Video and Chroma Gain, NTSC-style hue rotation, Black Balance, and Pedestal.

Audio Tracking

The 8415 Audio Processing option can be added to the 7550 module. The 8415 is an eight-channel processor that has been designed to provide superior handling of embedded audio. Embedded audio is safely bypassed around the video framestore with the lip sync properly preserved.

Total Control

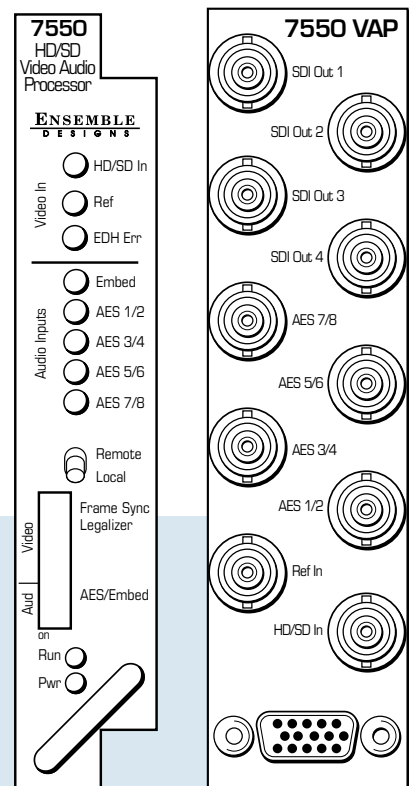
Every function and parameter on the 7550 and 8415 can be controlled from an Express Panel, Avenue Touch Panel, or the Avenue PC Control Application. Memory registers can be used to save the complete configuration of the module, making it easy to change instantly between different configurations.

Channel Density

Ten 7550 Video Processors (including the 8415 Audio Option) can be accommodated by the Avenue 3RU Frame. Now that's an efficient use of real estate!

Features

- » HD or SD SDI I/O
- » Full-featured Frame Synchronizer
- » Comprehensive Proc Amp controls
- » External genlock reference input
- » EDH detection and insertion
- » Internal Color Bar Generator
- » Memory Registers
- » Passes embedded audio
- » Accepts the 8415 Audio Processor option for tracking audio delay, audio mixing, shuffling



Input

Number One
Signal Type HD Serial Digital 1.485 Gb/s SMPTE 274M, 292M or 296M or SD Serial Digital 270 Mb/s SMPTE 259M
Impedance 75 Ω
Return Loss >15 dB DC to 1.5 GHz
Automatic Cable Input Equalization

Reference Input

Number One external (modules BNC)
 One internal (frame master ref BNC)
Signal Type PAL or NTSC composite video or HD Tri-Level Sync
Return Loss >40 dB
 (applies to external ref input)

Standards Supported

1080i (SMPTE 274M -4,5,6) 50, 59.94 or 60 Hz
 720p (SMPTE 296M -1,2,3) 50, 59.94 or 60 Hz
 1080p (SMPTE 274M -9,10,11) 23.98, 24, 25 Hz
 1080sF (RP211 -14,15,16) 23.98, 24, 25 Hz
 525i 59.94, 625i 50

General Specifications

Power Consumption 10 watts (with both options installed)
Temperature 0 to 40°C ambient (all specs met)
Relative Humidity 0 to 95%, noncondensing
Standard Avenue Module
Occupies one slot in 3RU or 1RU Frame
 (including the 8415 Audio Processor)

Output

Number Four
Signal Type HD or SD Serial Digital, follows input
Impedance 75 Ω
Return Loss >15 dB DC to 1.5 GHz

