



Stat Mux Advanced Broadcast DVB ASI Encoder

General

Stat-Mux Performance Standard Definition DVB MPEG Real-Time Encoder, ideal for any Broadcast & professional application such Broadband DSL/Fibre, Cable, Satellite, Digital Terrestrial or Distribution, with benefits as outstanding picture quality, MULTI-PASS encoding, HD ultra-advanced vector motion estimation, lower bandwidth consumption and VBR (variable bitrate) to maximize the quantity of TV services per transmission channel, ultimate technology and lower cost-per-channel .

The unit comes standard with SDI EMBEDDED and professional composite video in, VBI Teletext support, 4 EMBEDDED / Analog / Digital AES Balanced audio in (4 channels as 2 stereo) over Canon XLR professional connectors, aux serial data channel input for custom and remote control data transmission, built-in PSI-SI DVB descriptors and tables generator including Service and Provider names management plus NIT – TDT - EIT, IP streaming out 10/100 bt for multicast and unicast operations, outstanding PCR precision for perfect decoding on every set top box even after multiple hops, extensive remote control via Ethernet TCP-IP with provided NMS application CDROM, and more.

This unit is the next-level choice ideal for today's most demanding high performance Broadcast applications where outstanding picture quality, completeness management, and very low bitrate consumption are wanted, at the fraction of competitors cost.

Standard Features

- High-End Extended Software Features and controls
- SDI EMBEDDED and analogue composite PAL/NTSC VIDEO input
- Embedded audio extraction from SDI (two stereo)
- SDI Automatic cable equalization with clock / data recovery
- 4 Audio Channel (2 stereo) SDI EMBEDDED + Analog / AES-EBU over Full-Size Pro Canon XLR connectors
- High Performance Statistical Multiplexing Mode – Reduce bitrate and negotiate with ASI MX10 Multiplexer
- 10/100 IPI streaming unicast / Multicast output (10/1000) – compatible with any ip network and IP set top box
- High Performance professional grade composite video TBC/AGC/DNR noise reduction
- Advanced PSI-SI descriptors and Tables management plus NIT – EIT – TDT
- Two ASI bnc outputs
- Extensive TCP-IP NMS Remote Control with supplied NMS CD-ROM (Included)
- High Performance 4:2 :0 MPEG-2 MP@ML video compression from 0.25 to 8 Mbit/s stat mux
- Exclusive Multi-Pass Multi-Layer Encoding for Excellent picture quality with very lower bitrate consumption
- Auto I-Frame alignment for pre-encoded video sources
- VBR (variable bit-rate) encoding mode
- Advanced "Perfect Picture" vector motion estimation
- HQ Frame Synchronizer
- Programmable Variable GOP Structures
- Teletext VBI encoding
- Closed Caption Support
- Film Mode Detection (3:2 pulldown)
- 4:3 and 16:9 modes
- MPEG-1 Layer II audio encoding
- DVB PSI/SI tables generator (with Service & Provider Names PSI management)
- RS-232 / RS-422 low/ high speed data inputs
- Outstanding ASI Jitter performances lower than 10nanosec.
- High precision Fine-Adjustable output payload
- Multiple User preset memories
- Complete control via front panel Keyboard and display without requiring a computer
- Three internal option slots

Your Benefits

- **Configurable & price-winning**
Best quality and performances with the I/O you need
- **Outstanding picture Quality**
Advanced pre-processing and multi-pass compression catch your viewers with next-gen flawless picture quality
- **More Channels/Same Bandwidth**
Extreme performances to use lowest-bitrate per encoder and push more and more Channels to the same bandwidth
- **Best Price per Channel**
Last-generation HD/SD chips brings you Highest Quality and efficiency at lower price

Highlights

- 1U Rack Broadcast Encoder
- Composite in (SDI embed. opt)
- Teletext and VBI
- 2 full-size XLR Audio channels (Expandable to 4 or 8 also digital)
- Multi Dolby AC3 - (option)
- Video up to 8 Megabit/s 4:2:0
- Dynamic PSI/SI management
- "Perfect Picture" motion estim.
- Stat-Mux control - (option)
- Multi-Pass HQ VBR Encoding
- Choice of G.703 outs - (option)
- TCP & Serial Remote Control
- Windows Software CD included

Application Example

Stand Alone Video / Audio to ASI DVB C/S/T or Telco G703 Encoding

Composite / SDI embedded IN
4 Analog AES Audio Channels
Dolby AC3 PASS-Through
VBI / Teletext / opt. Data



DVB ASI Encoder

ASI DVB C/S/T (BNC)
ASI DVB C/S/T (S/PDIF)
E1 G.703 (BNC)
E2 G.703 (BNC)
E3 G.703 (BNC)
DS3 G.703 (BNC)
DVB over IP RJ45

Multi-Channel Video / Audio to ASI DVB C/S/T or Telco G703 Encoding

AV CH#1->



AV CH#2->



AV CH#3->



AV CH#4->



Multi Encoders



DVB ASI Multiplexer

ASI DVB C/S/T (BNC)
ASI DVB C/S/T (S/PDIF)
E3 G.703 (BNC)
DS3 G.703 (BNC)
DVB over IP RJ45

Ordering Information

Versions

E42-SX MK2

Options

ASI IN	Adds one ASI cascade IN to mux external ASI and encoder ASI without an external multiplexer Note: For IP / 4x E1 / E2 / E3-DS3 / in add also IP option Note: For IP in add also IP option
LWD	Adds LOW DELAY encoding mode for " LIVE " – 100 ms encoding delay performances
IP	Gigabit IPI streaming unicast / Multicast output (10/100/1000) – compatible with any ip network and IP set top box
4XE1	Add 4x E1 G.703 clear channel unframed outputs - 2 to 8 Megabit
E2	Add E2 G.703 clear channel unframed output - 8 Megabit
E3/DS3 CC	Add E3-DS3 selectable G.703 CLEAR CHANNEL unframed output - 34 / 45 Megabit
E3 ATM	E3/PDH, 34Mb/s, electrical AAL1 AAL5
DS3 ATM	DS3/PDH, 45 Mb/s, electrical AAL1 AAL5
STM1 ELE	Add STM 1 (OC3) SDH/Sonet output - 155 Megabit – Electrical - AAL1 AAL5
STM1 UTP	Add STM 1 (OC3) SDH/Sonet output - 155 Megabit – UTP - AAL1 AAL5
STM1 FMM	Add STM 1 (OC3) SDH/Sonet output - 155 Megabit – Optical Multi Mode
STM1 FSM15	Add STM 1 (OC3) SDH/Sonet out,155Mb/s, optical singlemode, short haul, <15km AAL1 AAL5
STM1 FSM40	Add STM 1 (OC3) SDH/Sonet out,155Mb/s, optical singlemode, LR1, <40km AAL1 AAL5
STM1 FSM80	Add STM 1 (OC3) SDH/Sonet out,155Mb/s, optical singlemode, LR2, <80km AAL1 AAL5
CG	Adds Static Logo generator
DNR	Adds High Performance professional grade video DNR noise reduction This option improve picture quality and filter-out unwanted noise
8AUD	Adds Additional audio option cards to support for up to 4 stereo pairs (8 channels)
AC3	Adds Dolby Digital® (AC-3) 5.1 channel pass-through
DE	Adds Dolby® E pass-through
DBENC	Adds Dolby Digital® (AC-3) two channel encoding
DTS	Adds DTS (Digital Theatre Sound) pass-through
RAS	Adds RAS scrambling for secure transmissions
BISS	Adds BISS mode 0, 1 & E Scrambling
SMPTE310	Adds SMPTE310 output interface to drive 8VSB Transmitters in ATSC applications
OPTOASI	Adds ASI optical output
422	Adds MPEG-2 422P@ML Contribution grade compression profile – @ 15 Mbit/s
YUV	Adds Analog Component Video Input
48V	Adds redundant power supply with one AC 90-240 VAC input + one 48 Volt DC input