



EN5980

Windows Media® 9 Series High Definition Encoder

Achieving the best picture quality at the lowest bitrate enables operators to broadcast more channels in their available bandwidth over Ethernet, maximizing return on investment of this valuable resource. For broadband operators offering TV services over xDSL networks, achieving the lowest bitrate can provide multiple simultaneous services into the home, or be used to extend the loop length over which TV services can be carried from the DSLAM to the consumers home - maximizing return on network investment.

TANDBERG Television has always led the market in provide encoding platforms that give optimum quality at the very lowest possible bitrates. The EN5980 combines Windows Media® Video 9 Series encoding with the TANDBERG High Definition Intelligent Compression Engine (HD-ICE). A dedicated hardware and software implementation, based on over 10 years in-house experience of creating high performance real-time encoders.

PRODUCT OVERVIEW

Market Leading Performance

Extensive video pre-processing helps get the best picture, whatever the source. A proven history of providing customers with in-field performance improvement upgrades over time, keeps our customers ahead of the market.

Reliable Service Delivery for any Application

Designed with all the proven system interconnect and control that our MPEG-2 product range enjoys today. In combination with the rest of the TANDBERG Television product range this makes Windows Media® 9 Series deployable today in any broadcast or broadband application.

BASE UNIT FEATURES

EN5980 Encoder (EN5980/BAS)

- Windows Media® 9 real-time video encoding
- Advanced profile at Level 3 (AP@L3)
- HD-SDI video input
- Extensive video pre-processing including:
 - Noise reduction (option)
 - Resolution changing
- Constant bitrate encoding from 1 Mbit/s to 20 Mbit/s
- Stereo audio encoding:
 - MPEG-1 Layer II and Dolby Digital® (AC-3)
 - Digital, analog and HD-SDI embedded inputs
- Control and monitoring via web browser, the front panel or TANDBERG nCompass Control

EN5980 Encoder (EN5980/BAS/48V)

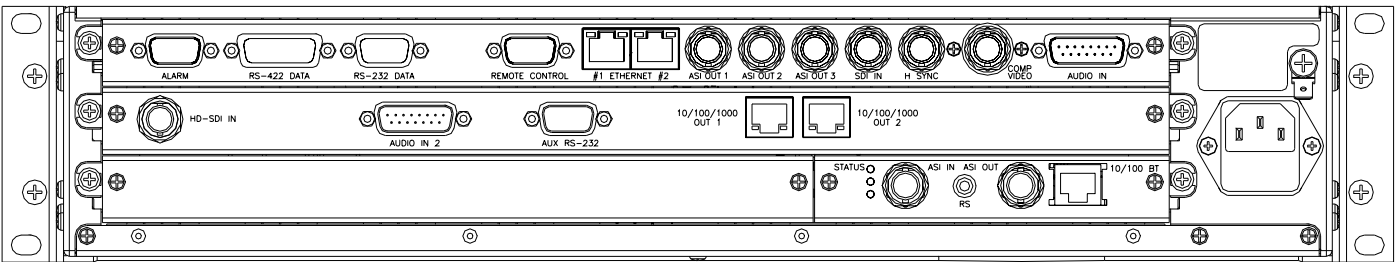
- As EN5980/BAS except with -48Vdc power supply

SOFTWARE OPTION

Professional Grade Noise Reduction (EN5800/SWO/NR)

- Improve picture quality and reduce bitrate requirement
- Fully adaptive spatial, temporal noise reduction

SAMPLE CONFIGURATION



SPECIFICATIONS

Inputs

Video

HD-SDI serial digital video with EDH error detection and health monitoring

Audio

2 stereo pairs input via analog audio balanced 600Ω/20kΩ or AES-EBU or HD-SDI

Up to 4 stereo pairs can be de-embedded from HD-SDI

Studio Reference

625 and 525 line HSYNC

Outputs

MPEG-TS over IP (100BaseT 1 port) (option)

Video Encoder

Windows Media® AVC Video Compression

Advance profile at level 3 (AP@L3)

1 Mbit/s to 20 Mbit/s, depending on resolution

Interface and progressive encoding support

Supported Video Resolutions

Resolutions Supported by Windows Media® Encoder

1080 x 1920/1440/1280/960pSF 25

1080 x 1920/1440/1280/960i 25

1080 x 1920/1440/1280/960i 29.97

1080 x 1920/1440/1280/960i 30

720 x 1280/960p 50

720 x 1280/960p 59.94

720 x 1280/960p 60

Audio Encoder

MPEG-1 Layer II

Dolby Digital® (AC-3)

Up to 2 stereo pairs audio encoding

Advanced Video Pre-processing

TANDBERG Television adaptive spatial and temporal noise reduction (option)

Closed captioning extraction from VBI

Image resizing (multiple resolutions)

Professional grade de-interlacer

Features

Easy-to-use front panel control

Web based control

Auto frame-rate input switching

Simple pre-configured set-ups

Accurate bitrate control

No frame loss guarantee

Physical and Power

Dimensions (W x D x H)

442.5 x 545 x 44.5mm (17.5" x 20.7" x 1RU)

Approximate Weight

7.5kg

Power Input

100 – 120 Vac or 220 – 240 Vac wide ranging – 48Vdc

Environmental Conditions

Operating Temperature

-10°C to 40°C (14°F to 104°F)

Compliance

CE marked in accordance with EU Low Voltage and EMC directives

EMC Compliance: EN55022, EN55024, AS/NZS3548, EN61000-3-2 and FCC CFR47 Part 15B Class A

Safety Compliance: EN60950, IE60950



Post Office Box 1639
101 Eagle Road - Building #7
Avon, Colorado 81620 USA
970 748-3094 or tollfree 866 SATCOM1
Fax 970 748-3096
www.satcomresources.com