STREAMHUB











VERSATILE TRANSCEIVER PLATFORM



The AVIWEST's STREAMHUB is the iconic transceiver platform that is compatible with all the AVIWEST live video encoders and transmitters: PRO series, RACK series, AIR Series, HE series, MOJOPRO Series as well as third party systems, such as IP cameras.

The AVIWEST's STREAMHUB is a Linux-based feature-rich high performance transceiver that has been designed to meet the demanding requirements of broadcasters deploying video contribution systems over unmanaged IP networks. The HEVC / 4K (UHD)-compliant platform can be deployed on-premises or operated as a cloud-based solution to enable quick and cost effective launch of new video services while reducing CAPEX and OPEX.

KEY FEATURES

VIDEO RECEIVER AND DECODER

The STREAMHUB packs a rich set of input IP protocols and the platform can receive up to 16 concurrent incoming streams from remote AVIWEST encoders or transmitters (PRO, RACK, AIR, HE, MOJOPRO) or third party systems through RTMP, RTSP/RTP, HLS, TS/IP streaming protocols. Up to 4 videos can be simultaneouslty decoded thanks to 4 SDI outputs with a Genlock input.

POINT TO POINT AND POINT TO MULTIPOINT DISTRIBUTION

The STREAMHUB offers multiples output streaming protocols (AVIWEST's SafeStreams, RTMP, RTSP/RTP, HLS, TS/IP, SRT) allowing video contents to be freely distributed over virtually any IP networks. Up to 32 IP outputs are supported to re-stream the video contents over LAN or WAN to CDNs, Media Servers, Streaming Platforms, Social Networks, IRDs or other STREAMHUBs.

VIDEO RECORDER AND TRANSCODER

The STREAMHUB combines the functions of a video recorder and implements a software encoder that enables video professionals to efficiently adapt video formats and resolutions according to each outputs constraints.

INTUITIVE WEB USER INTERFACE

The STREAMHUB application features an intuitive web user interface that enables to easily control and manage a fleet of remote AVIWEST's transmitters and encoders, optimize and monitor the video transmissions thanks to a large panel of features, such as video thumbnails and statistics.

IFB AND TALLY

The STREAMHUB includes an IFB application that enables broadcasters to communicate with remote transmitter operators over up to 16 independent two-way audio channels. It also includes a tally light function with an optional GPI or IP input.

FLEXIBLE HARDWARE AND SOFTWARE CONFIGURATIONS

Designed to fit customers' unique needs and head-end constraints, the STREAMHUB application can be hosted on a 1U server platform with various software configurations. The STREAMHUB also operates as a cloud-based solution to deliver all of the economic benefits of the cloud without compromising the performances required by today's media environments.



PLATFORM	1-RU server platform Internal storage: 1TB Redundant power supply Up to 4 SD-HD or 1 UHD [4K] SDI outputs Dual GigE network interfaces
GIGE INTERFACE	Dual port NIC adapter Up to 1 Gbps in Up to 1 Gbps out Unicast and multicast
os	Linux 64-bit Server
MANAGEMENT	Web-based GUI Integrated with MANAGER
VIDEO PROCESSING	Video Down-scaling & Upscaling Deinterlacing
VIDEO ENCODING	H.264/AVC, 4:2:0, 8 bit CBR only
STREAM PROCESSING	Transmuxing

INPUT FORMATS	Streaming protocols - TS/IP (SPTS) - RTSP/RTP - RTMP - HLS - IP Bonding (AVIWEST SafeStreams)		
	Video - H.264/AVC Audio - AAC-LC	- H.265/HEVC - AAC-HE v2	- MPEG-1 L2

OUTPUT FORMATS

Base-band video (SD/HD/UHD(4K) - SDI/HDMI)
Streaming protocols
- TS/IP (SPTS) - HLS - IP B
- RTSP/RTP - SRT (Safe) - IP Bonding (SafeStreams) - RTMP push

Video

- H.264/AVC - H.265/HEVC

Audio - AAC-LC

- AAC-HE v2 - MPEG-1 L2





SYSTEM OVERVIEW

