

AVerCaster Pro RS7180

HD / SD ASI and SDI Encoder



Highlights

- Highly flexible input signals
 - Supports up to 4 x HD-SDI/SD-SDI/ASI signal inputs
- High quality encoding capability
 - Supports MPEG-2, H.264, AAC and MP3 video and audio codecs,
- Intuitive user interface
 - Visualized Web UI for capture devices to handle signal inputs
- Cost-effective solution for OTT and IPTV services
 - Single source encoded to multi-screen streams
- Reliable platform
 - 1U rack-mounted server and Intel® Core® i7-2600 Sandy Bridge processor

The AVerCaster Pro RS7180 is a video capturing, encoding and streaming solution for the OTT and IPTV industries. It not only broadcasts live TV programs and HD video to audiences over LAN and WLAN, but also supports bit rate configurations, resolution configurations, and various encoding options to optimize viewing quality for different commercial applications. By supporting FLASH, Apple HLS, MPEG-DASH and 3GPP, the AVerCaster Pro RS7180 allows you to reach a large audience on computers and most 3G mobile devices, such as tablets and smartphones.

To enhance managerial convenience as a head-end device, AVerMedia has developed an intuitive management webpage with remote monitor functions for system integrators. With high video quality, high extendibility, and high durability under long-term video broadcasting, the AVerCaster Pro RS7180 helps OTT and IPTV companies reduce managerial costs and secure TV and video business opportunities.

Single input source, multi-screen stream outputs

- Supports single source encoded for multiple output streams for various client devices
- Compatible with standard video streaming protocols for OTT and IPTV applications

High-quality encoding

- Capable of encoding video in MPEG-2 and H.264, the major formats for the OTT and IPTV industries
- Allows resolution and output data rate configurations to meet different requirements
- Supports MPEG-2, H.264/ AAC, H.264/ MP3, H.263/ AMR, AAC, and MP3 video and audio codecs
- Integrates H.264 and Flash formats, allowing end users to watch high quality video on the web

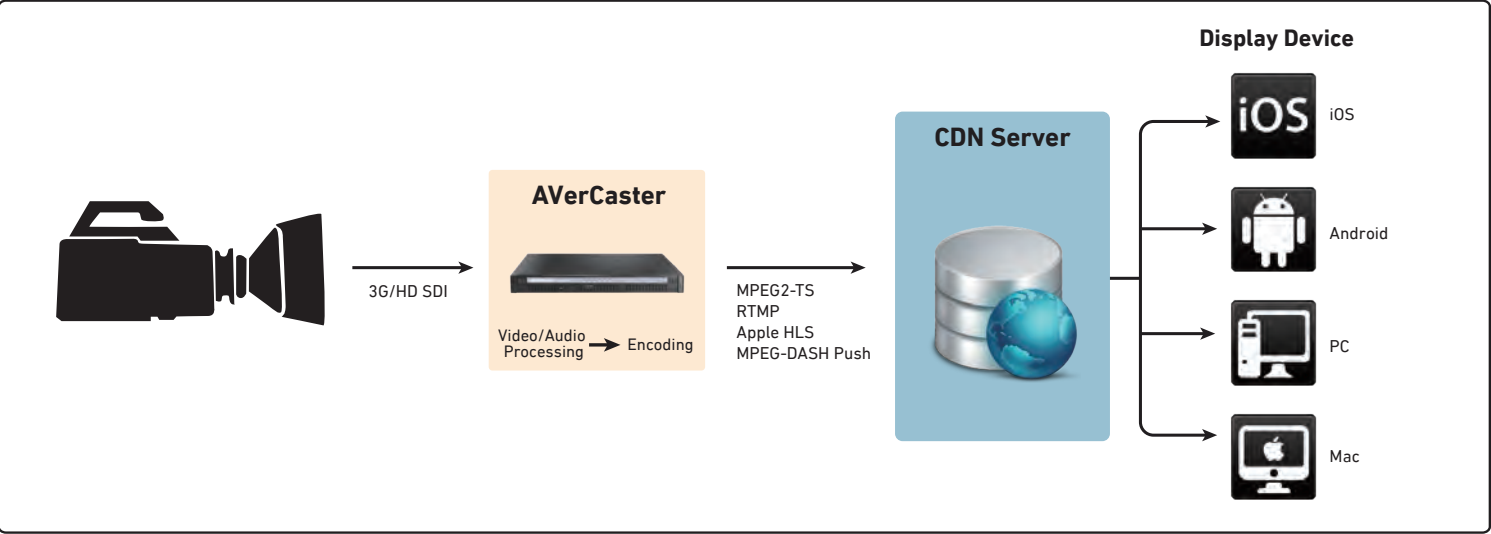
Reliable technology

- Built-in web-based server for cross-platform remote control
- AVerMedia's capture expertise and quality technical support ensures the device reliability during long-term video streaming

SW backup solution

- Server and channel redundancies to avoid contingencies
- Recovery disk and configuration reset can return the server to default settings
- All profile, streaming and server settings can be exported for backup

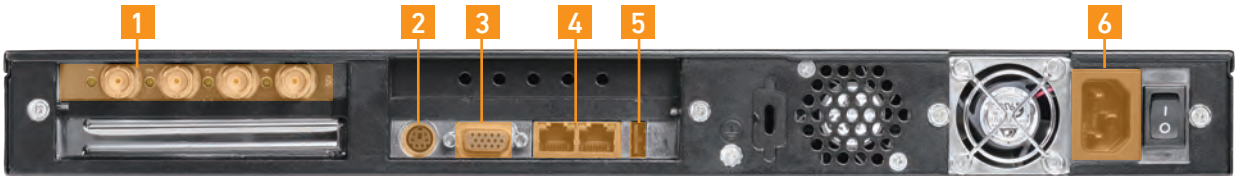
Workflow



Platform Specifications

Input Signal	Input Interface	HD-SDI/SD-SDI/ASI
	Max. Input Channels	4 x HD-SDI/SD-SDI/ASI
System	Operating System	Windows® 7 Embedded
	Processor	Intel® Core™ i7 2600 3.4GHz
	Memory	8G DDR3 1333
	HDD	250 GB
	Ethernet Controller	Intel® 82579LM & Intel® 82538V
Physical	Dimension (W x H x D)	430 x 44 x 497 mm / 16.9" x 1.73" x 19.6"
	Weight	10 kg / 22 lbs.
Power	Voltage	100V-240V, 63~47 Hz, 4~2 A
	Power Consumption	Redundant Power 500 W
Environment	Operating Temperature	0°C ~ 50°C (32°F ~ 122°F)
	Storage Temperature	-20°C ~ 60°C (-4°F ~ 140°F)
	Humidity Tolerance	10% ~ 85% @ 40°C (Non-condensing)

Appearance



- 1

SDI
- 2

Keyboard / Mouse
- 3

VGA
- 4

LAN Port
- 5

USB 2.0
- 6

Power

Encoder Specifications

Input Source	Video Input	1080p30, 720p, 720i, 575i, 480i, auto sensing
Codecs	Video Codecs	MPEG-4 AVC/H.264 High Profile, Main Profile, Baseline Profile MPEG-2 Main Profiles, Simple Profile
	Audio Codecs	MPEG-1 Layer II MPEG-2 AAC-LC, HE-AAC v1, HE-AAC v2
Preprocessing	Video Preprocessing	De-interlacing Watermark Image Cropping/Resizing Frame Rate Conversion Frame Rate Decimation BT.601/BT.709 Color Space Conversion
	Audio Preprocessing	Resampling Loudness Correction
Video Encoding Mode	Rate Control	CBR VBR ABR
	Data Rate	H.264: 10Kbps-20Mbps MPEG-2: 10Kbps-40Mbps
	GOP	Fixed Variable
	Key Framerate	5-300
	Scene Cut Detection	Automatic
	Encode Mode	Progressive MBAFF CABAC CAVLC
Audio Encoding Mode	Rate Control	CBR
Output Stream	Encode Stream	Up to 2 channels
	Resolution	1920x1080, 1760x990, 1600x900, 1440x810, 1280x720, 1024x576, 864x486, 720x576, 704x576, 640x576, 544x576, 480x576, 352x576, 960x540, 852x480, 720x480, 704x480, 640x480, 544x480, 480x480, 352x480, 480x360, 640x360, 352x288, 384x288, 480x270, 320x240, 320x180, 240x160, 176x144, 128x96, 96x96, 120x90, 160x90
	IP Version	IPv4 IPv6
	Protocol	HTTP MPEG2-TS (Support TR 101 290) RTSP RTMP RTP over UDP (Unicast & Multicast) RTP over TCP (Unicast & Multicast) Apple HLS MPEG-DASH Push
Redundancy	Redundancy	Server Channel

AVerCaster Web UI



1	Broadcast List	Manage AVerCaster proprietary capture cards and streaming status
2	Configuration	Configure video source inputs and streaming outputs
3	Encoding Profile	Preset encoding profiles for easy streaming control
4	Redundancy	Manage server redundancy and channel redundancy
5	Watermark	Overlay specific watermark on screen
6	Log	Log management
7	Administration	Account management
8	Visualized Video Inputs	Friendly UI to manage capture interfaces
9	System Status	Monitor CPU, memory and throughput statuses