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Live transcoder

GPU-powered software for professional video encoding and transcoding.

Comprimato Live Transcoder is high-performance encoder and transcoder software built explicitly for live streaming.

It is designated for broadcasters and content distributors to match the low latency and high-quality requirements.

Live transcoder enables end-to-end live video production from contribution encoding up to final distribution transcoding.

It is available as a flexible software license and high-density server appliance. Live transcoder has been developed to help

maximize revenue from content distribution by providing high-quality, cost-effective video processing.

CONTRIBUTION ENCODING

Encode live video using H.264 or JPEG2000 TR-01 codecs and transport the video to the studio or directly to the cloud. Avoid packet loss, reduce latency, and deliver high-quality video.
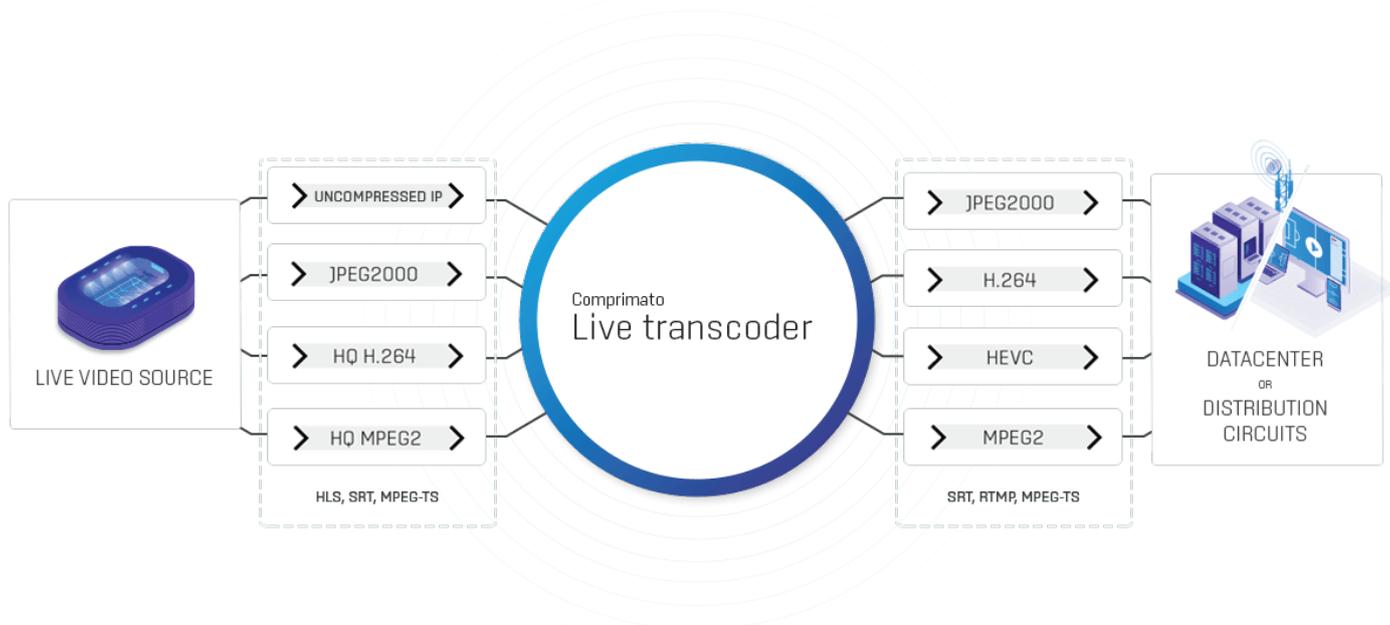
PRODUCTION TRANSCODING

The effectiveness lies in simplified transcoding workflow and reduced amount of hardware equipment. That is why our world's fastest JPEG2000 codec allows for direct transcoding between JPEG2000 TR-01 and AVC, HEVC distribution formats.

SOFTWARE-BASED SOLUTION

Comprimato Live Transcoder is GPU accelerated high-density software. It is available as a software license or 1RU server appliance.

End-to-end live video encoding and transcoding software.

LIVE VIDEO SOURCE

UNCOMPRESSED IP

JPEG2000

HQ H.264

HQ MPEG2

HLS, SRT, MPEG-TS

Comprimato
Live transcoder

JPEG2000

H.264

HEVC

MPEG2

SRT, RTMP, MPEG-TS

DATACENTER
OR
DISTRIBUTION
CIRCUITS

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Additional features

High Value Transcoding

ABR transcoding

Instantly adapt live video content to the resolution, quality and codec needs of current and future devices.

Image processing

Resizing, Change of sampling factor, Bit depth conversion, Interlacing/Deinterlacing, Framerate reduction, Color adjustments and others.

High bitrate formats

Native support for high bitrate broadcasting contribution formats including JPEG2000, H.264 or HEVC.

Low latency

End-to-end live video delivery with guaranteed latency cap of 700 ms.

Lowest CapEx and OpEx

Easy deployment

Software only solution simplifies deployment; no need for specialized support; maximum flexibility and portability.

Investment protection

Fully leverages existing IT and IP infrastructure.

Simple scalability

Extend the number of streams, resolution or frame rate simply by adding additional CPUs or GPUs.

Easy integration and management

3rd party integration

Easy insertion into existing workflows via REST API.

Centralized control

Set up, manage and control hundreds of streams from a single console via SNMP or web interface.

For more information contact sales@comprimato.com

Specifications

| Feature on product roadmap

Video input

Supported codecs:
JPEG 2000
H.264 (MPEG-4, AVC)
H.265 (HEVC)
MPEG-2

Resolutions:
FullHD 1080p
4K UHD

Color component sampling:
4:2:2 10bit/8bit
4:2:0 10bit/8bit

Audio input

Codec:
Uncompressed PCM - multichannel
(SMPTE 302M-2007)
AAC (ADTS / LATM)
MPEG2 Audio
AC-3
| E-AC-3

Metadata

SCTE-35
Metadata pass through
Subtitles embeding into H.264 SEI messages
Closed Captions (EIA-608/708)
SMPTE 2038

Video processing

Resizing
Automatic color component subsampling
(both configured automatically based on input and
output settings)
De-Interlacing
Cropping / Padding
Color adjustments
Frame-rate adjustment (to 1/2)
Logo insertion
FrameRate Upconversion

Containers & Protocols

UDP, RTP
MPEG-2 TS, MPTS
VSF TR-01
RTMP / RTMPS
SRT
NDI (input & output)
HLS
SDI Preview
Hittless Merge
Hittless Switch

Synchronization

Input PCR:
Configurable: global
(in separate transport stream) or local
(contained in each input transport stream)

Output PTS:
Configurable: pass-through or adding offset
to input PTS
Multipipeline synchronization using single
PCR stream in multiple pipelines

Audio processing

Shufling
Volume gain
Sampling rate conversion

Video output

Multiple output streams per each input
stream, different configuration per each
output stream.

Video codec:
H.264 (MPEG4, AVC)
JPEG2000
H.265 (HEVC)
MPEG2

Color component sampling:
4:2:2 10bit/8bit
4:2:0 10bit/8bit

Audio output

Audio codec:
AAC (ADTS / LATM)
AC-3
Uncompressed PCM (SMPTE 302M-2007)
MPEG2 Audio
E-AC-3

Configuration options:
Web UI, SNMP, REST API

System Monitoring options:
System webconsole, SNMP + custom OIDs