

RM6500-OC Cluster Offline Transcoder System



RM6500

RM6500-OC cluster offline transcoder system is a new generation of load balancing multi-format offline cluster transcoding system, which supports multi-resolution and multi-format file output from 4K to low definition. It adopts the world-leading and internationally patented digital video compression optimization algorithm to achieve perfect image compression quality. It perfectly supports mainstream formats such as H.265, H.264, and MPEG-2.

Multiple RM6500-OC HD/SD offline transcode server supports load balancing and multi-machine sharding integrated high-speed transcoding. Multi-node cluster can form high-performance cloud computing transcoding cluster, which is widely used in multi-screen integrated new media services.

Features & Benefits

- Large-scale load balancing, multi-machine sharding cluster transcoding
- Single device supports HD H.264 60 times speed, SD 120 times speed parallel transcoding
- Single device supports HD H.265 48 times speed and SD 100 times speed parallel transcoding
- Supports the latest H.265, 4K resolution 12 times speed parallel transcoding
- Support ASF, FLV, AVI, MPG, VOB, TS, MP4 MOV, 3GP, 3G2, MKV, MXF, GXF, F4V and other mainstream video and audio file packaging formats
- Support audio-only stream/video-only stream transcoding
- File sources input methods: Mainstream file acquisition methods such as FTP, SAMBA, CIFS, and NFS are supported for transcoding

Output:

Specifications

Input:

- Supports DVD and Blu-ray file transcoding

- Support AVI, TS, MP4, MOV, MKV, ASF, MPG, WMV, HLS, FLV etc.

- File source output methods: Mainstream file upload methods such as FTP, SAMBA, CIFS, and NFS are supported
- Output file name: Supports keep the original file name to upload the file
- Support SDR standard and HDR standard mutual transcode,
- Supports the setting of HLS file (Duration/Size)

Video Encode:

- Encode formats: H.264, H.265, AVS+, MPEG-2, MPEG-4 and WMV8
- Support resolution 96x96 to 4160x2160 continuously adjustable, up to 8K
- Support 4:2:2 and 4:2:0 sampling
- Supports automatic detection of scene switching and timed frame extraction
- Support I frame alignment of same origin multiple output files; Support video-only encoding output
- Supports customized settings for video frame rate, bit rate control mode, bit rate, video size, video aspect ratio, and filling mode
- Supports customized settings for profile, Level, frame scanning mode, field sequence, entropy code, and macro block partition
- Supports Settings for GOP type, key frame interval, numbers of reference frames, B-frame reference, B-frame numbers, and B-frame adaptive
- Support H.265 HDR
- Support Settings of TS:Service ID、Service Name、PMT PID、PCR PID、Video PID、Audio PID、Programs PID
- Support color gamut space selection, support BT.709, BT.2020, etc

Audio Encode:

- Encode formats: Support MP2,MP3,AAC,AC3, EAC3,AMR,PCM,DTS,WMA
- Supports customized settings for audio bit rate, audio sampling rate and channel selection
- Supports mono,dual channel,sterео,5.1 channel,and channel replication
- Support Audio delay and Audio gain adjustment
- Support the same video multi-audio encoding output

Video Edit Process

- Support JPG,PNG and other common image formats added
- Support Cover the original icon or selected image area of the transcoding video in a fuzzy way. The cover position and range can be customized
- Support to add or hide multiple logos or corner markers, the position and area can be set separately
- Supports the superposition of mainstream subtitle files such as SRT, SUB, and ASS
- Support transcoding video built-in subtitle track selection transcoding
- Supports superposition of subtitles,logos and corner markers simultaneously
- Black edge added automatically on up conversions
- Support automatic technical audit function, to achieve file coding error audit
- Supports brightness, contrast and other parameters
- Support SD to HD, HD to 4K

Management

- Supports the unified management platform to control and manage all transcoding devices
- Supports transcoding task delivery scheduling
- Supports authority management and log management

Typical Applications

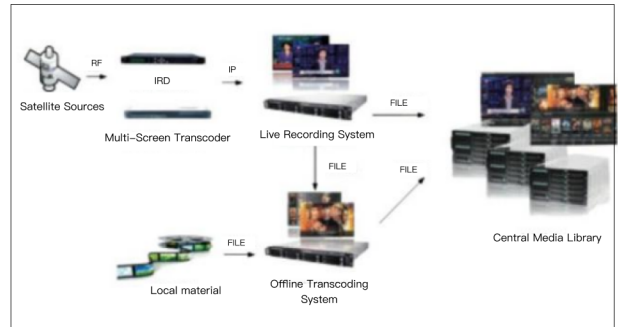
- Massive content production system of New Media
- High quality offline material production in Broadcast system
- Multi-node aggregation production of Film, Television, NEWS and Variety Show on demand materials

Physical Features

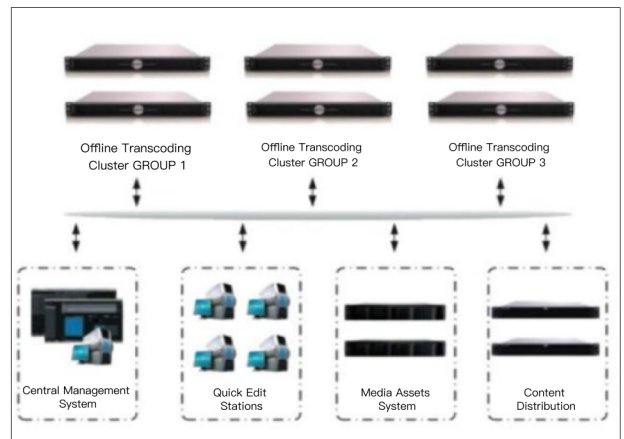
- Size: Standard 1U Rack (777mmx437mmx43mm)
- Weight: 15KG
- Voltage: Auto ranging 100–240 VAC, 50/60Hz.
- Redundant power supply
- Power: Up to 300W

Physical Features

Large-scale Live Program Material Production



New Media Content Production



High Speed Production of 4K Source Material

